CEPR PRESS

Edited by Dominic Rohner and Ekaterina Zhuravskaya

Nation Building
Big Lessons from Successes and Failures

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Contents

Foreword

What are the key ingredients for nation building? This is a question that has occupied politicians and heads of state for centuries and has no clear or uniform answer. This eBook draws from a rich array of examples from across the world to formulate broad policy guidelines and to determine what contributes towards constructing a stable and prosperous nation.

The authors identify social cohesion as a crucial determinate of security, development, and economic outcomes. However, various internal factors, including the level of segregation and polarisation within countries, strongly influence optimal policy options for each nation. The external security situation, meanwhile, can impact the ability to maintain peace and foster identity within borders. The eBook stresses that developing social cohesion is far from straightforward and highlights examples of homogenisation policies which can cause adverse effects, and in some cases, may even lead to conflict.

Chapters emphasise the importance of education in fostering a positive common identity and examine different methods of unifying diverse societal groups with the goal of nurturing inter-group trust. Importantly, national and local identity are not seen as mutually exclusive: an emphasis on tolerance and understanding between communities can create a sense of belonging to both the country and individual communities. Countries dealing with a high degree of segregation among the population, meanwhile, often employ power-sharing and federalist policies, and if implemented correctly, these can provide a unifying glue to avoid marginalisation. While countries differ widely in their makeup, the authors note that developing strong and democratic institutions is important in allowing the effective representation of minorities, strengthening the rule of law, and keeping fascism at bay.

Overall, the insights presented in this eBook provide a comprehensive framework to help policymakers navigate the complex and challenging process that is nation building. The authors show that there is no set policy solution for success, and strategies are highly dependent on individual circumstances.

CEPR is grateful to Dominic Rohner and Ekaterina Zhuravskaya for their expert editorship of the eBook. Our thanks also go to Anil Shamdasani for his skilled handling of its production.

CEPR, which takes no institutional positions on economic policy matters, is delighted to provide a platform for an exchange of views on this important topic.

Tessa Ogden
Chief Executive Officer, CEPR
February 2023

CHAPTER 1

Nation building: What could possibly go wrong?

Dominic Rohner[a,c] and Ekaterina Zhuravskaya[b,c]
[a]University of Lausanne; [b]Paris School of Economics; [c]CEPR

WHY CARE?

Aesop's fable "The Bundle of Sticks" illustrates the importance of cooperation by comparing the strength of individual sticks to that of their bundle. "Individually, you can easily be conquered, but together, you are invincible. Union gives strength," says the main character. This idea, that social cohesion is important for security and development, has been repeated by philosophers and politicians throughout history. For example, Abraham Lincoln paraphrased a verse from the New Testament in his most famous campaign speech, saying, "A house divided against itself cannot stand" (Illinois State Capitol, Springfield, 16 June 1858).[1]

Social cohesion is important for a variety of economic outcomes, including trust and cooperation in private transactions, as well as the efficiency and effectiveness of public goods provision such as national defence and local sewage collection. It is also a key factor for important political outcomes, such as avoiding political polarisation and civil conflict. Every nation strives for prosperity and happiness, and every leader wants their state to be strong, so achieving social cohesion is a desirable goal. However, it is important

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1   The original reads: "Every kingdom divided against itself is brought to desolation, and every city or house divided against itself will not stand" (Matthew 12:25).

to note that while social cohesion can make states stronger, it does not always guarantee peace, and in some cases it may even lead to conflict, which can lead to suffering in the long term.

What are the policy solutions for achieving social cohesion while ensuring peace and prosperity? The answer is not straightforward. In this introductory chapter, we will synthesise insights from recent political economy literature on nation building. The research in this book shows that the famous opening line of Tolstoy's *Anna Karenina*, "Happy families are all alike, every unhappy family is unhappy in its own way", does not apply to nations. While there are many wrong turns, pitfalls and ambushes that can lead to the failure of a state, there is no one path to happiness for a nation, and no one ready policy solution for nation-building success. For every combination of initial conditions of an aspiring nation state, different best practices exist and different dangers can thwart the endeavour.

THE BIG PICTURE

The actions that leaders take to build social cohesion, as well as what they should be doing, depend critically on various internal and external factors. Internal factors include the composition and spatial distribution of the population within the nation's territory, as well as the constraints on executive power (i.e. the level/quality of democracy). External factors that influence social cohesion include external threats or external anchors for the nation's groups.

If we abstract from external factors, two dimensions of ethno-linguistic (or religious) diversity of a nation's population are crucial: group polarisation and segregation. Group polarisation reflects potential salient antagonisms within society. High polarisation means that there are few powerful groups. It is highest when there are two equal-sized groups, as it is easiest to focus on group divisions in this case. Provided there are at least two groups, polarisation decreases with an increase in the number of groups when the size of different groups is similar. This dimension of diversity is particularly relevant for nation building because an increase in polarisation eases the emergence of so-called social identity, i.e. identity driven by social comparisons, such that people see themselves as members of one of opposing groups. Therefore, one can expect the options and constraints for creating social cohesion to vary with the level of polarisation. As expected, it has been documented that ethno-linguistic polarisation increases the scope for political violence (e.g. Montalvo and Reynal-Querol 2005, Rohner 2011, Esteban et al. 2012, 2015).

Segregation measures the extent to which representatives of different groups within a country live in separate areas. Segregation is highest when the country is divided into regions with homogenous populations and lowest when the group composition of the population is the same in all parts of the country. There are two main reasons why nation building is affected by the spatial segregation of different groups within a country. High

segregation makes the threat of secession credible, especially for groups whose homelands have access to the border. This can create inter-group tensions, as leaders may appease the group seeking secession, at a significant cost to other groups, or resort to oppression in order to prevent secession. High segregation also leads to reduced contact between representatives of different groups, which can negatively affect inter-group trust and the scope for cooperation. Segregation has been shown to affect the functioning and quality of national governments (Alesina and Zhuravskaya 2011), and there is also evidence that it is associated with conflict (Corvalan and Vargas 2015).

Figure 1 presents the position of modern countries along the axes of ethno-linguistic polarisation (horizontal axis) and ethno-linguistic segregation (vertical axis). Polarisation data come from Montalvo and Reynal-Querol (2015); this is the simplest index of polarisation, which only uses information on the size of different groups and abstracts from the cultural distances between them (Esteban et al. 2012). For countries missing in Montalvo and Reynal-Querol (2015), we calculate the polarisation index using data from Alesina and Zhuravskaya (2011) on ethnic diversity. The segregation index is calculated across actual subnational regions within countries; these data come from Alesina and Zhuravskaya (2011).[2] The sample consists of 102 countries.[3]

In Figure 1, most countries are labelled with their country code in light grey. A few countries are highlighted, with their full names spelled out in full and their level of democracy indicated. Blue labels correspond to highlighted countries classified as mature democracies by Polity IV[4] in 2018, with a Polity2 score of 6 or above. Red labels indicate highlighted countries with a lower level of democracy, with a Polity2 score of 5 or below in 2018.

Several observations can be made from this figure. First, it is clear that countries with low polarisation also have low segregation. Theoretically, this low-low corner of the plot could be populated by both very homogenous and very diverse countries, but in practice, it is only populated by very homogenous countries. Second, medium-to-high polarisation does not predict whether different groups live together or in separate parts of the country. There are examples of countries with high segregation (e.g. Nigeria) and low segregation (e.g. Argentina) among countries with medium-level polarisation, as well as high segregation (e.g. Afghanistan) and low segregation (e.g. Brazil) among countries with a very high level of ethno-linguistic polarisation. Third, the structure of a country's

2 We use the segregation formula for $\check{S}$ from Alesina and Zhuravskaya (2011: 1882). This formula ignores the small groups indicated as "other" in the data, as they are largely irrelevant for the self-identification of members of the large groups.

3 Using certain countries as natural and intuitive types, we define thresholds that split all countries into groups with low, medium, and high levels of polarisation and of segregation. Austria, which is very homogenous, is used to define the thresholds for low polarisation and low segregation. There are 17 countries in our sample with polarisation and segregation no higher than that of Austria. The United Kingdom, with its constituent territorial units of England, Scotland, Wales and Northern Ireland, is used to define the threshold for high segregation. There are 34 countries with segregation equal to or higher than the UK. The threshold for high polarisation is Ukraine, as it has two dominant groups: the Ukrainian-speaking majority and the Russian-speaking minority. There are 37 countries with polarisation equal to or higher than Ukraine.

4 https://www.systemicpeace.org/polity/polity4x.htm

population in terms of polarisation and segregation does not correlate with its political regime – there are democracies and autocracies in all parts of the plot where there are at least some countries.

FIGURE 1   ETHNO-LINGUISTIC DIVERSITY, CONTEMPORARY COUNTRIES
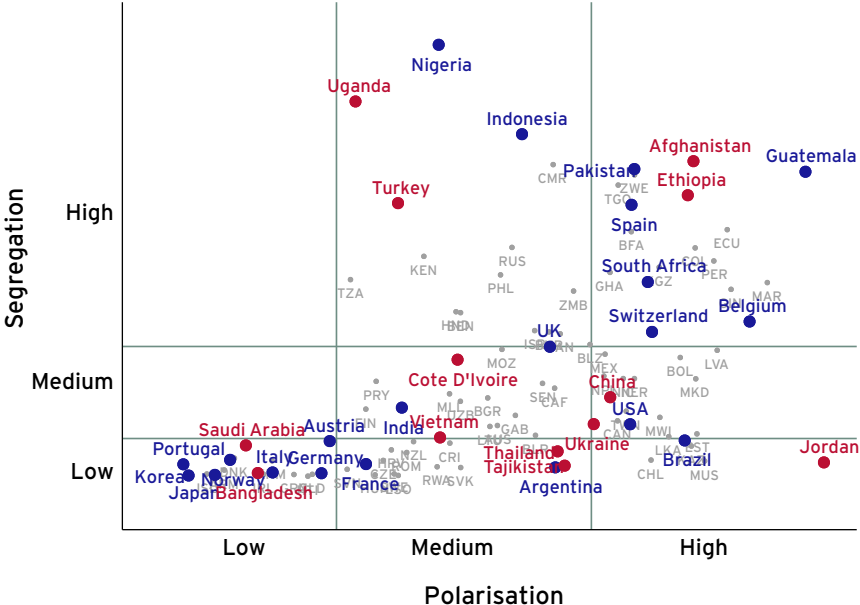
At a risk of over-simplifying, we can classify countries into three groups based on their level of polarisation and segregation, singling out Max Weber's 'ideal types'. The first group is characterised by low levels of both polarisation and segregation. These countries have relatively low diversity compared to other countries in the sample, and typically do not have strong secessionist movements or internal ethnic conflicts. Some of these countries, like Japan or Iceland, are homogenous because of their geographic isolation. Others became homogenous after a forced population exchange, as in the case of Greece after its population exchange with Turkey. Some had used forced assimilation policies, like Bismarck's German Empire. Some countries experienced murderous regimes that engaged in mass killing or forced expulsions of minority groups.[5]

Fostering a common national cohesion may be less challenging in a homogenous state than for a diverse country, as homogenous states are able to build national cohesion around common cultural features, such as a common language and common ethnic history, in contrast to multi-ethnic states which need to rely on more complex forms of identity (see discussion below).

5   Obviously, mass killings and forced expulsions are never morally justifiable. Just as Esteban et al. (2015) argue, understanding the cynical calculus of murderers by no means constitutes excusing their acts.

The national cohesion in low-polarisation states may feature a dark side in the form of aggressive nationalism. This can be particularly problematic in non-democratic regimes, as autocracies are more likely to engage in aggressive wars (e.g. Ray 1998). It is worth noting that many countries with large-scale fascist movements in the 1930s and 1940s, such as Germany, Italy, Japan and Austria, were located in this corner of the chart at the time. Put simply, while this corner offers a relatively easy prospect for society-wide national cohesion in democratic regimes such as in Germany, Italy, Japan or Austria today, it carries a significant risk of aggressive nationalism when non-democratic regimes are in place, as was the case in these countries during the 1930s and 1940s.

The second category of countries that we consider have high ethno-linguistic segregation (these countries have medium to high levels of polarisation). The population, which is ethnically (or religiously) homogenous within regions and different between regions in these countries, is likely to develop regionalist identities, which could mean that they reject a national identity. Highly segregated countries face a serious risk of instability, separatist movements and civil conflicts.[6] Two examples of countries that no longer exist – the Soviet Union and Yugoslavia – presented in Figure 2 vividly illustrate the perils of having high polarisation. The wars fought between the segregated parts of the former Yugoslavia caused devastating human suffering and genocide. The implosion of the USSR initially was relatively peaceful. Yet, several former USSR republics experienced severe conflicts and territorial disputes, with segregation and separatist movements playing a major role as an igniting factor in these conflicts. This was the case, for example, in the two Chechen wars and is the case in the ongoing conflict in Nagorno-Karabakh. One can argue that the break-up of the USSR was only partial, as the new states that were formed on its territory had large segregated minorities with strong secessionist movements. There are also very few fortunate examples of a completely peaceful split of a segregated state into several homogenous states, such as the devolution of Czechoslovakia into the Czech Republic and Slovakia.

Not all countries with high level of segregation are doomed, however. A model case in this group is Switzerland. The 1847 war between the segregated Catholic and Protestant areas of Switzerland was a secessionist conflict, in which the Catholic areas wanted to secede into a special union ('*Sonderbund*'). They were countered by Protestant forces, who aimed at creating a strong federal nation-state out of what was a loose defensive alliance.[7] After a swift victory, the Protestants, who understood the importance of the critical juncture at which they stood, decided on a new constitution (of 1848) that installed political institutions characterised by a wide range of checks and balances that led to power sharing between Protestants and Catholics. Bicameralism, proportional

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6   In addition to segregation, a number of factors increase the risk of secession movements. Alesina and Spolaore (1997, 2005) study the trade-off between preference heterogeneity and the economies of scale. Esteban et al. (2022), in addition to the role of group sizes, which are an integral component of polarisation, stress the importance of preference heterogeneity and patience in explaining secessionist conflict (see also a dynamic model of the construction of national identities by Almagro and Andrés-Cerezo 2020).

7   There was a string of regionalist religious conflicts in medieval times in Switzerland as well.

representation, coalition governments with a rotating presidency and regular popular votes on key issues led to a unique system where no religious or linguistic group could dominate the other. In fact, as every (full) canton holds two seats in the upper house and Catholic cantons are on average smaller, the losers of that war received – if anything – more rather than less political power under the new constitution. Switzerland has been at peace ever since and it grew prosperous. As argued by Kriesi (1998), key components of modern Swiss identity include multilingualism, federalism and direct democracy.

FIGURE 2   CIVIL CONFLICT, FORCED IDENTITY AND PUBLIC EDUCATION
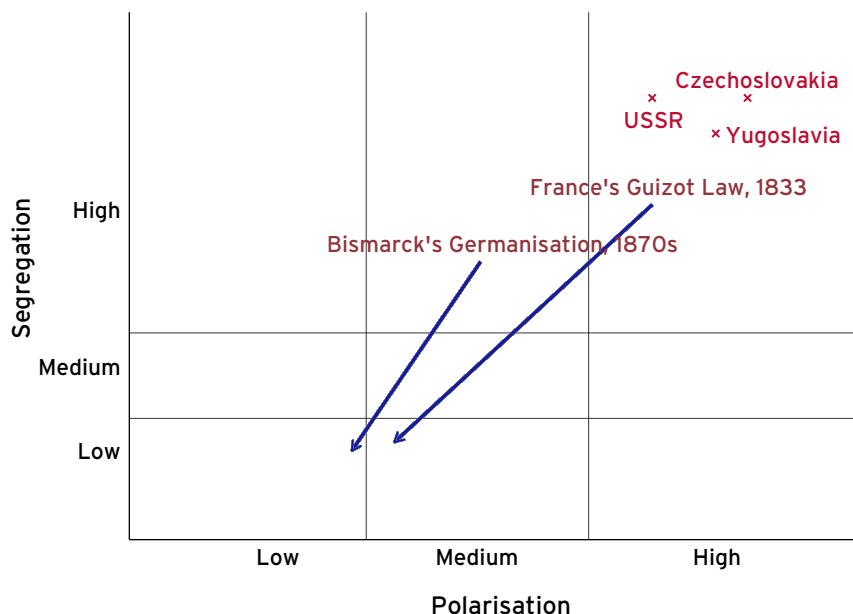
Switzerland is special in many respects, of course. Yet, as we discuss below, there is systematic evidence that power sharing is a key ingredient for peace and political stability across a large number of countries with particularly salient inter-group cleavages. Power sharing and the introduction of decentralisation and federalist institutions has been used as a (not always perfect) solution for state building when states are comprised of several segregated groups. Examples include the United Kingdom, with the devolution of power and power sharing in Northern Ireland; Spain, with the introduction of bilingual education (as discussed more in depth below); post-Apartheid South Africa, with 'co-operative governance'; and Belgium, with its institutions allowing power sharing between Flemish-speaking and French-speaking populations. In many of these examples, the journey has been much less of a smooth ride than in Switzerland. The Northern Irish civil conflict ('the Troubles'), ETA's violence in Spain, the challenges of post-Apartheid South Africa and spells of the absence of government in Belgium are all to a large extent linked to the problems created by segregation. Yet, without a doubt, power-sharing institutions have helped to prevent worse outcomes in each of these settings.

In contrast, in many high-segregation countries classified as non-democracies that do not have effective power-sharing institutions, such as Afghanistan, Turkey, Ethiopia and Uganda, ethnic tensions have exploded into full-blown wars in recent decades.

Some non-democratic regimes with high segregation and high polarisation undertook reforms that homogenised their population before democratisation occurred. For example, historically, the level of segregation in Spain and France was similar – Bretons, Basques and Catalans are geographically concentrated, and the Breton and Basque populations of France were as culturally distant from the French majority as the Catalan and Basque populations of Spain were from the Spanish majority. This is not the case today. The two countries chose very different strategies to cope with the challenges of ethnic segregation. While Spain did not introduce reforms to homogenise its population, France introduced national primary education with a common curriculum as early as 1833 and has kept it to this day. As discussed below, this reform was instrumental in homogenising the French population and assimilating minorities (Alesina et al. 2021). As illustrated in Figure 2, this reform moved France from the upper-right to lower-left corner of the polarisation–segregation space. Bismarck's Germanisation and Atatürk's Turkification had similar effects. Importantly, as shown below, forced assimilation can be very costly for the minorities affected by it and can backfire.

The third and last category of countries is located in the bottom-right corner of Figure 1.[8] They have medium-to-high polarisation but relatively low (medium-to-low) segregation. Due to high polarisation, these countries have inherent group divisions, but these divisions do not have a geographical dimension. Representatives of different groups live in close proximity all around the country. In this case, secession and a split into different states is not an option. Thus, there is essentially only one option for these countries to avoid conflict: make the group differences less salient by fostering national identity, for instance through public education (Blanc and Kubo 2021) and shared positive experiences (Depetris-Chauvin et al. 2020).

Both democracies and autocracies in this corner of the chart often use national public education to build national identity. But the type of the education differs for the two types of countries: in autocracies, education often takes the form of outright propaganda, while democracies more often more often emphasise positive values of tolerance and common destiny. As discussed in depth below, such deliberate efforts for identity building have been put in place in countries as different as the United States of the early 20th century and present-day Rwanda and China. As shown below, in democratic and inclusive contexts, identity fostering can bear fruit, while discriminatory repression of minority cultures typically backfires.

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8   As mentioned above, the top-left corner of the chart is empty, as with low polarisation levels, large-scale segregation can hardly arise.

Another important factor stressed by Caselli and Coleman (2013) are phenotype differences, which make practices of exclusion of certain minority groups easier to enforce. The authors argue that the use of phenotype differences as a marker of cultural differences explains why Black Americans have suffered from discrimination in the United States more than other minorities (such as, for example, Irish, Italian, Jewish or Polish immigrants). This may also explain why France – despite its national educational curriculum – has been unable to fully eliminate discrimination and animosity towards its 'visible minorities' (the official French term used to refer to the part of its population that originates from former colonies) (e.g. Valfort 2020). Similar patterns of discrimination have also been documented in China against citizens with ethnic Muslim names (Distelhorst and Hue 2014) despite the strong nation-building character of the Chinese educational curriculum (see discussion below).

From the discussion above and the insights from research presented below, it is clear that countries face different challenges in their paths to social cohesion depending on their initial conditions. Thus, their nation-building strategies should also be different. There are many dimensions of the initial conditions that we have not considered so far, such as the presence of historical conflicts or a painful common history (e.g. a colonial history), ideology, or the presence of an outside threat. As a consequence of this complexity, the problem of nation-building policies is also very complex and multifaceted. Yet, if one abstracts from differences other than polarisation and segregation, three alternative nation-building strategies emerge, as summarised in Figure 3.

FIGURE 3   NATION-BUILDING STRATEGIES
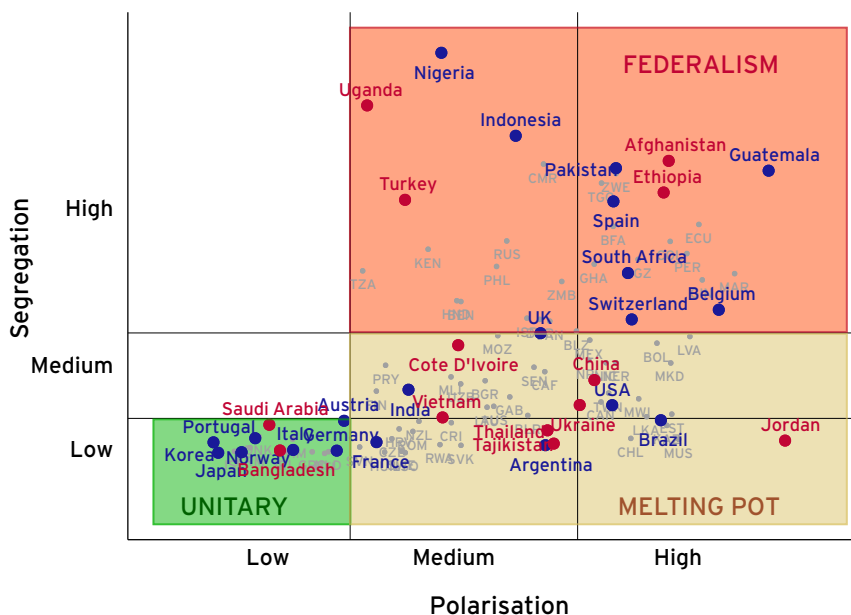
Countries with low ethno-linguistic diversity and, thus, low levels of polarization and segregation (green area in the figure) can build a '*unitary*' system with a strong sense of national identity and a common narrative. It is important, however, to keep in mind the dangers of aggressive nationalism which could accompany such common narratives in autocratic regimes. Thus, the tasks of democratisation and of consolidating democracy are crucial for long-term successful nation building and prosperity.

Polarised countries with low segregation (yellow area in the figure) may want to focus on minimising the salience of group divisions. We label this the '*melting pot*' strategy. Focusing public education on embracing inclusion and diversity, together with providing equal opportunities for different groups and making the benefits of shared positive experiences more salient, is crucial for countries with these initial conditions. In addition, opening up borders to immigration and thus allowing even greater diversity may actually help to attenuate intergroup tensions, as it would decrease polarisation and make 'melting pot' policies more efficient. As discussed below, nation building could be easier to achieve when polarisation decreases and fractionalisation – another measure of diversity that positively depends on the number of groups – increases (Bazzi et al. 2019).

Finally, the best hope for nation building in countries with high segregation (orange/pink area in Figure 3) is to recognise and embrace the existing divisions by building a decentralised system with effective power sharing between different segregated groups. With these initial conditions, assimilation of minorities may hardly be achievable in a democratic setting. Instead, the country needs to focus on integrating them into democratic political processes. We refer to this strategy as '*federalism*'

Importantly, none of these strategies is easy or obvious; each of them can fail and backfire. Yet, these are the best options that exist for democratic states that respect human rights.

So far, we have abstracted from external factors. Below, their role is discussed in detail. Here, we would like to highlight just one example that illustrates their importance, in line with Tilly's (1975) argument that a common enemy fuels nation building. Russia's unjustified invasion of Ukraine seems to have – at odds with Putin's intentions – fostered Ukrainian national cohesion (e.g. Person and McFaul 2022). Ukraine, a historically polarised state with large Ukrainian- and Russian-speaking populations, today stands united against Putin's aggression. Societal divisions are attenuated in the fight with the common enemy.

While external threats can unite a country, cross-border ethnic ties between partitioned ethnic groups can have adverse effects. This is one of the important challenges of nation building in Africa, where the homelands of many ethnic groups were divided into different states by artificial borders drawn by the colonisers (Alesina et al. 2011). As found by Michalopoulos and Papaioannou (2016), split ethnic groups are more often discriminated against, economically disadvantaged and entangled in ethnic wars.

Having sketched the big picture of different state trajectories and strategies, in what follows we discuss in more depth the key ingredients of nation building, describing the insights of the research presented in each chapter of this book. The chapters are organised into five distinct, but related sections. The first section considers the role of social interactions, and in particular contact versus social identity. The second section focuses on the role of education in nation building. The third section considers the propaganda, leadership and joint experiences. The fourth section tackles the role of external interventions and wars. The fifth section considers the role of representation and redistribution, as well as the question of what motivates leaders to invest in nation building.

After summarising the insights of the chapters, we conclude with a synthesis of the main policy lessons for achieving successful nation building leading to peace and prosperity.

IT TAKES TWO TO TANGO: CONTACT HYPOTHESIS VERSUS SOCIAL IDENTITY THEORY

As we discussed above, depending on the structure of groups, their geographical distribution and the history of hostilities, interaction between groups can have very different consequences. In Chapter 2, based on their findings in Bazzi et al. (2019), Samuel Bazzi, Arya Gaduh, Alexander Rothenberg and Maisy Wong use a unique policy experiment that allows them to test the effects of ethno-linguistic polarisation and fractionalisation on nation building. The authors consider the Indonesia's Transmigration programme, which was one of the largest resettlement efforts in history. In this programme, the ethnic mix of the destination localities was exogenously determined, which gave rise to exogenous variation in village-level ethnic fractionalisation and polarisation. Using this variation, they find that a pan-Indonesian inclusive national identity – as measured by the share of local population that speaks the national Indonesian language (Bahasa Indonesia) at home, by inter-ethnic marriages, and by non-ethnic naming patterns for children – was more prevalent in localities with many small groups (i.e. high fractionalisation) as compared to localities with few large groups (i.e. high polarisation). They also use lottery-assigned housing in the destination settlements as an exogenous source of variation in local segregation and find that segregation attenuates these patterns, which is consistent with the notion that regular interaction ('contact') helps to establish trust between many small groups.

National identity is hard to create in the presence of highly salient differences between groups, which may lead to hostilities and the emergence of social identity. According to the social identity theory (Tajfel et al. 1979), people seek the answer to the question about who they are in how the group they belong to differs from other groups, thus dividing everyone into 'us versus them'. Such divisions impede the emergence of a common identity. In Chapter 3, based on Grosfeld et al. (2013), Irena Grosfelda and Ekaterina Zhuravskaya present a test of the social identity theory. Consistent with this theory, the authors find

that identity of the non-Jewish majority in the Pale of Settlement region of the Russian Empire, where Jews constituted the largest minority, emerged from social comparisons. In particular, non-Jews defined themselves in opposition to what a stereotypical Jew represented in their eyes (i.e. a trader, a creditor or a market maker). This social identity enshrined persistent anti-market and anti-entrepreneurial values among non-Jewish population. Historical animosity – measured by the proximity to places where the anti-Jewish pogroms occurred – made these social comparisons more salient, leading to a stronger anti-market culture among non-Jews.

Even when inter-group relations have been historically conflicted and social comparisons lead to group-specific opposing social identities, conflict is not an inescapable outcome. As illustrated by Saumitra Jha in Chapter 4, based on Jha (2013), inter-group violence can be prevented even in the presence of clear-cut group divisions under three conditions: first, different groups should be economically complementary to each other, so that there are economic benefits of cooperation; second, group-specific comparative advantage should be intangible, making the replication of what the minority specialises in, or the seizure of it by force, unfeasible for the majority; and third, the minority group needs to be mobile and have a good outside option, so that it could credibly threaten to leave in case of an economic or political crisis that could fuel violence.

Applying this theory to Hindu majorities and Muslim minorities in South Asia, Jha finds that towns with natural harbours that led to the emergence of Medieval trading ports dominated by Muslim traders are characterised by lower levels of Hindu–Muslim violence. Curiously, the two first conditions that Jha argues as necessary for resilient inter-ethnic peace were present both in the case of Hindu–Muslim relations in South Asia and the case of the relationship between Jewish middlemen and the non-Jewish majority in the Russian Empire. However, the first condition – mobility – was limited in the case of Jews in the Pale of Settlement, in sharp contrast to Muslim maritime traders. This difference led to a drastically different outcome. Grosfeld et al. (2020) show that the waves of anti-Jewish pogroms took place on the rare co-occurrence of economic and political shocks, which led to extreme conditions that broke the possibility for economic cooperation, while the vast majority of Jews were not able to flee.

In his famous book, *The Nature of Prejudice*, Gordon Allport argued that inter-group contact is one of the most effective ways to reduce prejudice between the members of majority and minority groups if certain fairly restrictive conditions are met (Allport 1954). This premise is often referred to as Allport's contact hypothesis. What are the conditions under which contact leads to tolerance and acceptance and hence contributes to the emergence of a national identity? In Chapter 5, based on Rohner et al. (2013a), Dominic Rohner, Mathias Thoenig and Fabrizio Zilibotti develop micro-foundations of the contact hypothesis, highlighting the possibility for multiple equilibria. They show that the beneficial trust-promoting impact of inter-group interactions only kicks in when the interaction is fair, fruitful and non-abusive. Peaceful inter-group contacts foster trust, which in turn boosts inter-group trade, making inter-group conflict more costly.

This virtuous cycle can explain the building of a common identity and cooperative social norms even from difficult starting points, as in the case of the European Coal and Steel Community, which emerged in the aftermath of World War II and contributed to the ultimate creation of the European Union.

On the darker end of the spectrum, bad shocks triggering wars can deplete trust (Rohner et al. 2013b), harm trade and plant the seeds for future conflicts, giving birth to a vicious cycle dubbed a 'war trap' (Rohner and Thoenig 2021). This is in line with recent evidence that when inter-group relations are hostile, closer geographic proximity fuels the scope for armed attacks (Mueller et al. 2022). Security guarantees and peacekeeping can be helpful to keep initial interactions peaceful and non-abusive, hence promoting the building up of inter-group trust and social capital (see the survey by Rohner 2023).

The remaining two chapters in the section on social identity and the contact hypothesis empirically test the latter. In Chapter 6, Julio Cáceres-Delpiano, Antoni-Italo De Moragas, Gabriel Facchini and Ignacio González illustrate that one way in which peaceful interaction among equals from different groups can be fostered is through student mobility programmes such as ERASMUS in Europe, or by making it compulsory for national military service to take place in a different region of the country. The authors present their findings in Caceres-Delpiano et al. (2021), in which they test the contact hypothesis by exploring the random assignment of army conscripts to different regions of Spain. They find that for men born in regions with a weak Spanish national identity (such as Catalonia or the Basque Country), assignment to military service in a different region of Spain led to a strengthening of their Spanish national identity (as measured by self-identification as Spanish), a higher likelihood of voting in national elections, and lower propensity to vote for a regionalist party. Similar results are found for Burundi by Samii (2013), who exploits exogenous exposure to ethnic integration through the age of military retirement to show that ethnic integration reduces ethnic prejudices. An important reason why contact strengthened national identity in these contexts is that the conditions of the inter-group interaction are special, as Allport hypothesised – the context of military service ensures contact among equals within the military hierarchy and incentives for cooperation due to common tasks.

In Chapter 7, based on Okunogbe (2022), Oyebola Okunogbe presents strikingly similar results in a different context. She examines the impact of random assignment across different ethnic regions of Nigeria in the context of a large-scale mandatory national service programme for young adults. She finds that inter-ethnic exposure leads to greater national pride, more knowledge about Nigeria and more positive attitudes towards it, and greater mobility in the long run. At the same time, this does not come at the cost of giving up regional/ethnic identity, as inter-ethnic exposure also leads to more positive attitudes about own ethnic groups and stronger intra-ethnic friendship ties. This suggests that more interaction in a setting of equality and non-domination yields the understanding

that identity at the national level versus the local level is not necessarily a zero-sum game – in some circumstances, it is possible to foster national identity without weakening local ties and identity.

Overall, the research presented in this section of the book shows that polarised and segregated countries face a serious risk of inter-ethnic animosity due to the formation of ethnic social identity. Yet, there are ways to circumvent this with policies that ensure interactions between different groups that take place under conditions of fair and equal exchange and the absence of domination of representatives of one group by representatives of another. There are also important benefits of economic integration, specialisation and complementariness between different groups.

SCHOOL TO RULE? EDUCATION AND NATION BUILDING

Education is one of the pillars of nation building; it is often used by leaders to transmit national values and teach national language(s), which are key ingredients of a national identity. A shared language and shared values, gained through a national education curriculum, can improve communication, trust and good governance. Yet, education can also be oppressive for minorities and divisive. It can lead to nationalist violence, discrimination against minorities and sectarianism. It is important to recognise that the benefits and drawbacks of education as a tool for indoctrination can be intertwined. While teaching patriotic norms can increase national cohesion, it can also exclude minorities and create the risk of a slippery slope from strong national identity to aggressive nationalism.

We start with the discussion of how education can contribute to national cohesion, and then consider the potential nasty side-effects. In Chapter 8, based on Blanc and Kubo (2021), Guillaume Blanc and Masahiro Kubo study the effects of the introduction of national primary education in France in 1833 (the 'Guizot law'). They exploit a particularity of this law which introduced a threshold for the size of the locality (more than 500 inhabitants) to have a primary school as a source of variation in access to primary national education. Using a regression discontinuity design, they show that exposure to mass French education significantly increased the use of the French language. In Chapter 9, based on Bandiera et al. (2019), Myra Mohnen and Martina Viarengo show that a similar nation-building strategy was applied in the United States, with compulsory schooling in the 19th century deliberately aimed at migrants, with the goal of transmitting American civic values. State-level compulsory schooling laws were passed significantly earlier in those US states that featured a larger share of migrants from European countries without historical exposure to compulsory state schooling in their origin country.

Does teaching in a group-specific regional language and the teaching of regional history in a segregated country strengthen regional identity? Is it detrimental to national identity? In Chapter 10, Irma Clots-Figuerasa and Paolo Masella investigate these

questions, based on the results of Aspachs-Bracons et al. (2008) and Clots-Figueras and Massella (2013). Drawing on a 1983 education reform in Catalonia that introduced compulsory bilingual (Spanish and Catalan) education and teaching of Catalan history, they find that children who were exposed to education in Catalan developed a stronger Catalan identity in adulthood. The authors contrast these results with the findings from a reform in the Spanish Basque Country, where teaching in the Basque language was instead optional. In the Basque Country setting, there was no effect on regional identity.

In Chapter 11, drawing on Cantoni et al. (2017), Davide Cantoni, David Yang and Noam Yuchtman stress the ideological goals of another example of an educational reform, namely, the revision of the curriculum in China. Exploiting the sharp, staggered introduction of new textbooks across China, the authors conclude that the new curriculum led to more positive views of China's governance, a more critical stand on Western democracy and increased scepticism towards free markets. This last result is in line with the finding of Alesina and Fuchs-Schündeln (2007) that East Germans favoured more state intervention even after reunification, and especially so for older cohorts.

In the cases of the educational reforms described above, the goals of policymakers were generally achieved. In France and the United States, the reforms contributed to the development of a national identity (although from the perspective of fostering political pluralism, the goals of these two reforms may be questionable). In Catalonia, the reform was also effective in strengthening regional identity at the expense of Spanish identity.

We now turn to educational reforms that, from the perspective of the initiators, partially backfired. In Chapter 12, Francesco Cinnirella and Ruth Maria Schüler present their findings from Cinnirella and Schueler (2018), in which they studied the impact of increased centralised education spending in Otto von Bismarck's Prussia as part of a Germanisation policy. This policy was targeted at Polish and Catholic minorities in the aftermath of the '*Kulturkampf*'. From 1886 to 1911, the share of central state spending on education quadrupled from 10% to 40%, with a significant portion of these funds going towards teacher salaries. The authors find that this led to higher overall voter turnout and increased support for pro-nationalist parties. Yet, they also show that discriminatory measures against the Polish population actually strengthened Polish identity, and thus backfired.

In Chapter 13, based on Fouka (2020), Vasiliki Fouka demonstrates how policies for cultural homogenisation in the United States also led to a backlash. She finds that German identity actually increased as a result of a ban on the use of the German language in US schools after World War I. Affected individuals were less likely to volunteer in World War II, more likely to marry within their ethnic group, and more likely to give their children distinctly German names.

Similarly, the massive investment in secular public primary schools in Indonesia, which has had a remarkable positive impact on human capital accumulation (Duflo 2001), has had unintended side effects in terms of secular national identity. In Chapter 14, based

on Bazzi et al. (2020), Samuel Bazzi, Masyhur Hilmy and Benjamin Marx show that while primary enrolment shifted towards state schools, Islamic secondary schools were able to capitalise on the higher completion rate of primary education to increase their enrolment. Overall, the cohorts exposed to the school construction programme did not report more attachment to secular values or greater use of the national language, but instead reported greater religiosity and greater literacy in Arabic.

To summarise, the studies described above demonstrate that education can be a powerful force for good, promoting tolerance, knowledge and prosperity, but it can also be misused by non-democratic governments to promote nationalism, indoctrination or discrimination. Lott (2019) argues that, across a range of countries, more totalitarian governments tend to increase public education spending and state ownership of the media. Next, we discuss media campaigns and propaganda as alternative tools for nation building which can also be abused by non-democratic regimes.

PROPAGANDA, CHARISMA AND SHARED EXPERIENCES

As we discussed above, education is a double-edged sword that can be used to transmit positive values of inclusion to create a pluralistic 'melting pot' society and also (mis) used for the indoctrination of nationalist ideology and anti-democratic values. The same applies to indoctrination by means of propaganda and political rallies. For every campaign promoting unity and tolerance, there is another planting the seeds of division and discord. An example of political propaganda promoting inter-ethnic reconciliation is Rwanda's President Paul Kagame's campaign on state radio promoting post-genocide reconciliation. In Chapter 15, Arthur Blouina and Sharun Mukand describe their findings in Blouin and Mukand (2019), in which they exploit exogenous topographic features of mountainous Rwanda affecting the reach of radio signals to identify the impact of exposure to this state-radio propaganda. The authors find that residents of localities that were able to receive state radio have significantly lower salience of ethnic divisions and greater inter-ethnic trust than residents of localities that did not receive the radio signal. The effectiveness of this campaign was at least partly due to the fact that Rwanda is an autocracy with limited access to independent information, including low internet penetration and no independent media (Reporters Without Borders ranked Rwanda 136th out of 180 countries in 2022 on media freedom).

In many contexts, leaders who engage in propaganda have goals that are opposite to those of Kagame. Yanagizawa-Drott (2014) used the same identification strategy to show that the propaganda of the *Radio des mille collines* (Radio of the Thousand Hills) played a key role in inciting violence during the Rwanda genocide in 1994. Adena et al. (2015) showed that Goebbels' propaganda was effective in Nazi Germany, leading to increased anti-Jewish sentiment among ordinary Germans and more denunciations of Jews that

resulted in their deportations. These effects are observed only in cities with populations that were positively predisposed to the message of the propaganda. In cities with low anti-Semitism, it even backfired.

It is not clear if propaganda promoting reconciliation and inclusion is effective in a free media environment. However, we do know that hate speech on social media in modern democracies can be very persuasive. Müller and Schwarz (2021) find that the posting of right-wing anti-refugee content on Facebook predicted crimes against refugees in Germany, consistent with the logic of 'echo chambers'. In another paper (Müller and Schwarz 2022), the authors find that tweets about Islam-related topics in the United States were associated with an increase in hate crimes.

In Chapter 16, Elena Esposito, Tiziano Rotesi, Alessandro Saia and Mathias Thoenig demonstrate that not all propaganda with a reconciliation message is truly inclusive. The chapter reports their results from Esposito et al. (2021), in which they analyse the screening of the 1915 American propaganda movie, *Birth of a Nation*. The movie's message of reconciling the Northern and Southern US states used African Americans as scapegoats, blaming them for the outbreak of the Civil War. The authors found that exposure to this message did indeed leave an impact on the audience, promoting North–South reconciliation, but it also spread racism and caused racial violence.

Nation-building propaganda can also have unintended consequences on audiences that are not its intended target, as shown by Stefano DellaVigna, Ruben Enikolopov, Vera Mironova, Maria Petrova and Ekaterina Zhuravskaya in Chapter 17 (based on DellaVigna et al. 2014). In particular, the authors find that Serbian radio aimed at promoting Serbian national identity after the Yugoslavian wars led to an unintended rise of ultra-nationalists in the bordering region of Croatia, which was exposed to the Serbian nation-building radio.

Propaganda can take many different forms. In-person political rallies have a long tradition. In Chapter 18, based on her findings in Assouad (2020), Lydia Assouad demonstrates how the visits of leader Mustafa Kemal 'Atatürk' to Turkish cities impacted the rise of the new Turkish identity. Exposure to Kemal's visits was found to boost the new national identity, as proxied by the adoption of first names in the newly introduced 'Pure Turkish' language. In particular, Kemal's meetings with local elites were decisive in the diffusion of the Turkish national identity. Assouad also shows that propaganda was ineffective and even backfired on non-Turkish minorities. The fact that exposure to political gatherings can have real-world effects has also been observed in the case of Nazi marches in 1932 Hamburg. Caesmann et al. (2021) show that among supporters, direct exposure to Nazi marches helped to mobilise troops and even spilled over to members of the social networks of people who were exposed.

Taken together, the findings of Adena et al. (2015), Assouad (2020) and Caesmann et al. (2021) demonstrate that propaganda is effective only on audiences that are positively predisposed to its message, regardless of the means used for its dissemination.

In addition to mob psychology, the charisma of a leader may also impact followers in one-to-one interactions. In Chapter 19, Julia Cagé, Pauline Grosjean and Saumitra Jha report their results from Cagé et al. (2021), in which they use the random rotation of French troops among regiments in World War I to analyse the effect of the exogenous exposure of soldiers to serving under then-general Philippe Pétain during the Battle of Verdun. When Pétain embraced right-wing ideologies after the war, his previous soldiers were more likely to follow their 'hero'. Serving in Verdun under Pétain was associated with a higher likelihood of becoming a Nazi collaborator in France, joining a fascist party, serving in the German forces, and participating in paramilitary groups that hunted Jews and the Resistance. There was also a persistent effect on right-wing voting, even after World War II.

Joint experiences and role models can shape beliefs, preferences and identities not only in times of extreme hardship, such as fighting on the same side as 'brothers-in-arms', but also in more 'ordinary' circumstances, especially when the experiences are happy. In Chapter 20, Filipe Campante Emilio Depetris-Chauvin and Ruben Durante presents their finding from Depetris-Chauvin et al. (2020) that important victories by a national football team in major international competitions can lead to a reduction in ethnic self-identification in favour of improved national identity, especially in weak states with poor infrastructure, and when the victory is achieved by an ethnically diverse team. This 'role model of inter-ethnic cooperation' effect can also lead to higher trust and a lower likelihood of conflict in the six months following key football victories, such as qualification for the finals of a tournament.

This result, which shows that football can shape inter-ethnic relations and identity, aligns with the recent work of Alrababa'h et al. (2021), who find that after the Muslim football player Mohamed Salah joined Liverpool, hate crimes in the Liverpool area fell and anti-Muslim tweets by Liverpool fans decreased relative to other cities with football teams. Mousa (2020) found that mixed amateur football teams can contribute to inter-religious tolerance, while Cilliers et al. (2016) conducted a randomised control trial in post-war Sierra Leone and found that reconciliation ceremonies can increase inter-group trust, though at a cost to psychological health.

Overall, propaganda is an effective tool for shaping identity in autocratic states, but its results depend on the dictator's idiosyncratic preferences. Sadly, in many cases dictators have exploited propaganda to instil division and hatred. In democracies, role models from 'other' groups and shared happy experiences of effective inter-group cooperation are more viable strategies for nation building.

EXTERNAL INTERVENTIONS AND WARS

Can nation building be influenced from abroad? Interventionist arguments often point to the example of the German '*Wirtschaftswunder*' following World War II, where denazification and reconstruction through the Marshall Plan were successful

in transforming a cruel and murderous fascist regime into a stable and prosperous democracy, which became a backbone of European unification. However, the scale of military enforcement (for example, the US base at Rammstein in Germany) and the amount of economic assistance involved in German reconstruction make it more of an exception than the norm.

Studies of smaller-scale interventions yield a bleaker picture (see, for example, the survey of outside interventions in conflict by Rohner 2022). In Chapter 21, Eugen Dimant, Tim Krieger and Daniel Meierrieks describe the results from Dimant et al. (2022), in which they draw on data on US military aid to 174 countries over a period of half a century (1968–2018). By exploiting temporal variation in US budgets and cross-country differences in the scope for US aid, they estimate the impact of changes in US military aid that are arguably exogenous, as they stem from the overall size of the military budget and the need to direct military aid. They find that, if anything, more US military aid translates into more (not fewer) anti-American terrorist acts. They highlight the following mechanism: military aid leads to more corruption and exclusionary policies, which undermines institutions in the recipient country. This is consistent with the view that benefits from US military support (which may be unequally distributed and targeted at non-democratic leaders) can backfire and create anti-American resentment.

In Chapter 22, Melissa Dell and Pablo Querubin focus on a specific example of an outside intervention that backfired. They describe their findings in Dell and Querubin (2018) on the impact of different US counter-insurgency strategies used in the Vietnam War. The strategy relying on heavy bombing did not help to foster a pro-Western democratic regime, compared to an approach of 'winning hearts and minds'. To identify a causal effect of heavy bombing, they exploit discontinuities around the rounding thresholds of the continuous quantitative scoring of the calculated level of security of Vietnamese population centres. The authors show that focusing on firepower and bombing led to stronger military and political activities by the communist insurgency, weaker local governance, a shrinking non-communist civic engagement, and worsened attitudes towards the US and South Vietnamese governments. The authors also compare two counter-insurgency strategies: a US Army strategy based on heavy bombing, and a US Marine Corps strategy that instead emphasised providing development programmes to local communities. The identification comes from arbitrary geographical borders that divided the areas under Marine Corps and Army control. Citizens in the region where the Marines operated reported less anti-American sentiment and more positive attitudes towards all levels of the South Vietnamese government than citizens in the neighbouring Army-controlled region.

This is in line with a study of the impact of US aid to Columbia by Dube and Naidu (2015), who conclude that American foreign military assistance may strengthen armed nonstate actors and undermine domestic political institutions. In contrast, service provision aiming at 'buying hearts and minds' can reduce counter-insurgency for small-scale projects in areas under government control (Berman et al. 2011, 2013 for Iraq,

Sexton 2016 for Afghanistan).[9] It is important to note that, while unilateral military aid often backfires, UN peacekeeping often succeeds in reducing violence and stabilising a country (e.g. Hultman et al. 2014, Ruggeri et al. 2017, Fjelde et al. 2019).

In Chapter 23, Kai Gehring describes broader consequences of geopolitics for political identity formation, summarising the results in Dehdari and Gehring (2022) and Gehring (2022). The former paper analyses the impact of occupation and repression of local culture on the part of the Alsace and Lorraine region that was ruled by Germany from 1871 to 1918, compared to the remainder of Alsace and Lorraine that remained with France during this time period. The authors find that the occupied region has developed a stronger regional identity that still persists today. Gehring (2022) studies a very different context, namely, the impact of the Russian invasion and annexation of Crimea in 2014 on EU identity. By comparing the impact of this major geopolitical shock on member countries that are geographically closer versus further away from Russia, Gehring shows that there was a comparably large surge in EU identity in Eastern European countries. This was reflected by persistently greater trust in EU institutions and support for common policies.

One can conclude that while nation building is a task that can only be achieved by a nation and not imposed by a foreign power, UN peace corps could facilitate the end of fighting for ongoing conflicts.

INSTITUTIONS: REPRESENTATION AND REDISTRIBUTION

A fundamental ingredient for any nation-building endeavour is to put in place the 'right' political institutions. First of all, as stressed by Besley and Persson (2009, 2011), nation building requires state capacity, which is fostered by external threats and inclusive political institutions.[10] Indeed, institutions shape incentives for peace and conflict, which are fundamental determinants of the destiny of a given state. Several recent papers find that democratic institutions and the rule of law in general provide the 'glue' for keeping a society peaceful (Lacroix 2022, Laurent-Lucchetti et al. 2022, Marcucci et al. forthcoming).

One particular aspect of political institutions that matters heavily for nation building – especially in societies with high levels of ethnic or religious polarisation and segregation – is power sharing (Francois et al. 2015). The works of Mueller and Rohner (2018) and Mueller and Rauh (2022), featured in Chapter 24 by Hannes Mueller, Christopher Rauh and Dominic Rohner, are devoted to this issue. Mueller and Rohner (2018) examine the

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9   There is also a literature studying the impact of (foreign) aid on civil conflict, beyond counter-insurgency settings. This literature shows that the effect is highly context-dependent (e.g. De Ree and Nillesen 2009, Nunn and Qian 2014, Crost et al. 2014, 2016, Weintraub 2016, Premand and Rohner 2022).
10 In terms of further drivers of state capacity, Queralt (2022) shows that state capacity is strengthened by relying on domestic financing as opposed to foreign loans, while Besley and Reynal-Querol (2014) find that historical conflict weakens trust and national identity.

impact of local-level power-sharing arrangements in Northern Irish district councils, exploiting sharp time discontinuities and close elections. They find that when exogenous electoral arithmetic gave rise to shared local power, the scope for political violence dropped substantially. This finding is consistent with the conclusions drawn in Mueller and Rauh's (2022) systematic study of the effects of 440 power-sharing agreements. They find that, on average, these result in an 8% drop in the occurrence of violence and an 18% decrease in violence intensity, with comprehensive agreements with power, judicial and resource-related provisions being most effective. Egalitarian political features championing the respect of civil and political rights and warranting equal access to justice and public jobs are also found to be key building blocks for successful reduction of violence. Related to this, Cederman et al. (2015) find that the combination of power sharing with territorial autonomy reduces the scope for conflict.

Beyond incentives, political and welfare state institutions also affect identities. In Chapter 25, Bruno Caprettini and Hans-Joachim Voth describes their findings in Caprettini and Voth (2023) on the impact of the post-1933 New Deal large-scale social spending programme in the United States on political preferences. They find that those who benefited from social spending showed more patriotism during World War II, as measured by the purchase of war bonds, volunteering and winning medals for bravery. This is consistent with the notion that benefiting from support from the state in hard times fosters national identity. A related mechanism has been found for HIV treatment: better access to powerful medical drugs to combat AIDS results in greater trust in the state and curbs the scope for political violence (Berlanda et al. 2022).[11]

A key dimension of institutional development is, of course, the extent to which a leader is motivated to invest in nation building, as studied by Alesina et al. (2020, 2021) and described in Chapter 26 by Paola Giuliano, Bryony Reich and Alessandro Riboni. Drawing on Charles Tilly's (1975) logic that war makes states, Alesina et al. (2020) argue that when there is a need for a (more sizeable) conscript army, the government strives to win popular support by providing public goods, reducing rent-extraction and homogenising the culture of the population (either by instilling 'positive' national sentiment or 'negative' propaganda against the adversary). As shown in Alesina et al. (2021), the strongest incentives for cultural homogenisation – in particular, through mass primary education – occur in the presence of a 'threat of democratisation'.

LESSONS LEARNED

1. **Democracy is the backbone of sustainable and peaceful nation building.** First of all, as shown throughout the book, the fate of nation-states in all zones of the polarisation–segregation space (see Figures 1 and 3) are more favourable

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11 The nexus between nation building and public good provision has also been studied by Miguel (2004). He finds that nation building has led to substantially better local good provision for diverse communities in rural Tanzania than in Kenya.

for democracies. This is particularly crucial in the zone of low polarisation and low segregation when the nation-building strategy focuses on building a unitary state with a strong national identity, as democracy helps to escape the perils of nationalist madness and fascism in this context.

2. **Inter-group contact with horizontal equality and security guarantees can reduce inter-group animosity and promote a 'melting pot' society.** As shown in Section II of the book, in high-polarisation settings, more peaceful and fair interactions between groups nurture inter-group trust. Importantly, local and national identities are not mutually exclusive. They are not a zero-sum game, as positive interaction can foster a sense of belonging to both the country and a local community.

3. **Fostering a positive common identity, for example through education, is key in contexts of high polarisation and low segregation.** In countries with high ethnolinguistic polarisation and where the groups share the same territory, fostering a common inter-group identity by building a 'melting pot' society is the only way to avoid discrimination and inter-group hostilities. As shown in Sections III and IV of the book, while democracies typically stress positive values of tolerance and common destiny through public education, some autocracies choose indoctrination and defamation of minorities either through education or media propaganda, often with dire consequences. Reducing polarisation by opening up to diverse migrants could reduce the salience of group divisions and facilitate the 'melting pot'.

4. **Power sharing and federalism are crucial in high-segregation settings.** As shown in Section VI of the book, power sharing and federalist policies provide the glue that holds high-polarisation, high-segregation countries together.

5. **Unilateral military interventions and military aid often backfire in terms of their effect on attitudes of local populations, but UN peacekeeping security guarantees work to reduce conflict.** As shown in Section V of the book, nation building pursued militarily from outside faces many risks and pitfalls, but multilateral UN peacekeeping can create favourable ground conditions for national reconciliation in post-conflict settings.

REFERENCES

Adena, M, R Enikolopov, M Petrova, V Santarosa, and E Zhuravskaya (2015), "Radio and the Rise of The Nazis in Prewar Germany Get access", *Quarterly Journal of Economics* 130(4): 1885–1939.

Alesina, A and N Fuchs-Schündeln (2007), "Good-bye Lenin (or not?): The effect of communism on people's preferences", *American Economic Review* 97(4): 1507–1528.

Alesina, A and E Spolaore (1997), "On the number and size of nations", *The Quarterly Journal of Economics* 112(4): 1027–1056.

Alesina, A and E Spolaore (2005), *The size of nations*, MIT Press.

Alesina, A and E Zhuravskaya (2011), "Segregation and the Quality of Government in a Cross Section of Countries", *American Economic Review* 101(5): 1872–1911.

Alesina, A, J Matuszeski, and W Easterly (2011), "Atrificial States", *Journal of the European Economic Association* 9(2): 246–277.

Alesina, A, B Reich, and A Riboni (2020), "Nation-building, nationalism, and wars", *Journal of Economic Growth* 25(4): 381–430.

Alesina, A, P Giuliano, and B Reich (2021), "Nation-building and education", *The Economic Journal* 131(638): 2273–2303.

Almagro, M and D Andrés-Cerezo (2020), "The construction of national identities", *Theoretical Economics* 15(2): 763–810.

Alrababa'h, A, W Marble, S Mousa, and A Siegel (2021), "Can exposure to celebrities reduce prejudice? The effect of Mohamed Salah on Islamophobic behaviors and attitudes", *American Political Science Review* 115(4): 1111-1128.

Allport, G W (1954), *The Nature of Prejudice*, Addison-Wesley.

Aspachs-Bracons, O, I Clots-Figueras, J Costa-Font, and P Masella (2008), "Compulsory language educational policies and identity formation", *Journal of the European Economic Association* 6(2-3): 434-444.

Assouad, L (2020), "Charismatic Leaders and Nation Building", PSE Working Paper.

Bandiera, O, M Mohnen, I Rasul, and M Viarengo (2019), "Nation-building through compulsory schooling during the age of mass migration", *The Economic Journal* 129(617): 62–109.

Bazzi, S, A Gaduh, A D Rothenberg, and M Wong (2019), "Unity in diversity? How intergroup contact can foster nation building", *American Economic Review* 109(11): 3978–4025.

Bazzi, S, M Hilmy, and B Marx (2020), "Islam and the state: Religious education in the age of mass schooling", NBER Working Paper No. w27073.

Berlanda, A, M Cervellati, E Esposito, D Rohner, and U Sunde (2022), "Medication against conflict", *medRxiv*.

Berman, E, J N Shapiro, and J H Felter (2011), "Can hearts and minds be bought? The economics of counterinsurgency in Iraq", *Journal of Political Economy* 119(4): 766–819.

Berman, E, J H Felter, J N Shapiro, and E Troland (2013), "Modest, secure, and informed: Successful development in conflict zones", *American Economic Review* 103(3): 512–17.

Besley, T and T Persson (2009), "The origins of state capacity: Property rights, taxation, and politics", *American Economic Review* 99(4): 1218–44.

Besley, T and T Persson (2011), *Pillars of prosperity*, Princeton University Press.

Besley, T, and M Reynal-Querol (2014), "The legacy of historical conflict: Evidence from Africa", *American Political Science Review* 108(2): 319–336.

Blanc, G and M Kubo (2021), "Schools, Language, and Nations: Evidence From a Natural Experiment in France", Working Paper, Brown University.

Blouin, A and S W Mukand (2019), "Erasing ethnicity? Propaganda, nation building, and identity in Rwanda", *Journal of Political Economy* 127(3): 1008–1062.

Cáceres-Delpiano, J, A-I De Moragas, G Facchini, and I González (2021), "Intergroup contact and nation building: Evidence from military service in Spain", *Journal of Public Economics* 201, 104477.

Caesmann, M, B Caprettini, H-J Voth, and D Yanagizawa-Drott (2021), "Going viral: Propaganda, persuasion and polarization in 1932 Hamburg", CEPR Discussion Paper No. 16356.

Cagé, J, A Dagorret, P Grosjean, and S Jha (2021), "Heroes and Villains: The Effects of Combat Heroism on Autocratic Values and Nazi Collaboration in France", Stanford Institute for Economic Policy Research (SIEPR).

Cantoni, D, Y Chen, D Y Yang, N Yuchtman, and Y J Zhang (2017), "Curriculum and ideology", *Journal of Political Economy* 125(2): 338–392.

Caprettini, B, and H-J Voth (2023), "New Deal, New Patriots: How 1930s Government Spending Boosted Patriotism During World War II", *The Quarterly Journal of Economics* 138(1): 465–513

Caselli, F and W J Coleman (2013), "On the theory of ethnic conflict", *Journal of the European Economic Association* 11: 161–192.

Cederman, L-E, S Hug, A Schädel, and J Wucherpfennig (2015), "Territorial autonomy in the shadow of conflict: Too little, too late?", *American Political Science Review* 109(2): 354–370.

Cilliers, J, O Dube and B Siddiqi (2016), "Reconciling after civil conflict increases social capital but decreases individual well-being", *Science* 352(6287): 787–794.

Cinnirella, F, and R Schueler (2018), "Nation building: The role of central spending in education", *Explorations in Economic History* 67: 18–39.

Clots-Figueras, I and P Masella (2013), "Education, language and identity", *The Economic Journal* 123(570): F332–F357.

Corvalan, A and M Vargas (2015), "Segregation and conflict: An empirical analysis", *Journal of Development Economics* 116: 212–222.

Crost, B, J Felter, and P Johnston (2014), "Aid under fire: Development projects and civil conflict", *American Economic Review* 104(6): 1833–56.

Crost, B, J H Felter, and P B Johnston (2016), "Conditional cash transfers, civil conflict and insurgent influence: Experimental evidence from the Philippines", *Journal of Development Economics* 118: 171–182.

De Ree, J and E Nillesen (2009), "Aiding violence or peace? The impact of foreign aid on the risk of civil conflict in sub-Saharan Africa", *Journal of Development Economics* 88(2): 301–313.

Dehdari, S H and K Gehring (2022), "The origins of common identity: Evidence from Alsace-Lorraine", *American Economic Journal: Applied Economics* 14(1): 261–92.

Dell M and P Querubin (2018), "Nation Building Through Foreign Intervention: Evidence from Discontinuities in Military Strategies", *Quarterly Journal of Economics* 133(2): 701–764.

DellaVigna, S, R Enikolopov, V Mironova, M Petrova, and E Zhuravskaya (2014), "Cross-border media and nationalism: Evidence from Serbian radio in Croatia", *American Economic Journal: Applied Economics* 6(3): 103–32.

Depetris-Chauvin, E, R Durante, and F Campante (2020), "Building nations through shared experiences: Evidence from African football", *American Economic Review* 110(5): 1572–1602.

Dimant, E, T Krieger, and D Meierrieks (2022), "Paying Them to Hate US: The Effect of US Military Aid on Anti-American Terrorism, 1968-2018", available at SSRN 3639277.

Distelhorst, G and Y Hou (2014), "Ingroup bias in official behavior: A national field experiment in China", *Quarterly Journal of Political Science* 9(2): 203–230.

Dube, O and S Naidu (2015), "Bases, bullets, and ballots: The effect of US military aid on political conflict in Colombia", *The Journal of Politics* 77(1): 249–267.

Duflo, E (2001), "Schooling and labor market consequences of school construction in Indonesia: Evidence from an unusual policy experiment", *American Economic Review* 91(4): 795–813.

Esposito, E, T Rotesi, A Saia, and M Thoenig (2021), "Reconciliation Narratives: The Birth of a Nation after the US Civil War", CEPR Discussion Paper 15938.

Esteban, J, L Mayoral, and D Ray (2012), "Ethnicity and conflict: An empirical study", *American Economic Review* 102(4): 1310–42.

Esteban, J, M Morelli, and D Rohner (2015), "Strategic mass killings", *Journal of Political Economy* 123(5): 1087–1132.

Esteban, J, S Flamand, M Morelli and D Rohner (2022), "Stay, Split or Strike: Theory and Evidence on Secessionist vs Centrist Conflict", Working Paper.

Fjelde, H, L Hultman, and D Nilsson (2019), "Protection through presence: UN peacekeeping and the costs of targeting civilians", *International Organization* 73(1): 103–131.

Fouka, V (2020), "Backlash: The unintended effects of language prohibition in US schools after World War I", *The Review of Economic Studies* 87(1): 204–239.

Francois, P, I Rainer, and F Trebbi (2015), "How is power shared in Africa?", *Econometrica* 83(2): 465–503.

Gehring, K (2022), "Can external threats foster a European Union identity? Evidence from Russia's invasion of Ukraine", *The Economic Journal* 132(644): 1489–1516.

Grosfeld, I, A Rodnyansky, and E Zhuravskaya (2013), "Persistent antimarket culture: a legacy of the pale of settlement after the holocaust", *American Economic Journal: Economic Policy* 5(3): 189–226.

Grosfeld, I, S Orcan Sakalli, and E Zhuravskaya (2020), "Middleman minorities and ethnic violence: anti-Jewish pogroms in the Russian empire", *The Review of Economic Studies* 87(1): 289–342.

Hultman, L, J Kathman, and M Shannon (2014), "Beyond keeping peace: United Nations effectiveness in the midst of fighting", *American Political Science Review* 108(4): 737–753.

Jha, S (2013), "Trade, institutions, and ethnic tolerance: Evidence from South Asia", *American Political Science Review* 107(4): 806–832.

Kriesi, H (1998), *Le système politique Suisse*, Economica.

Lacroix, J (2022), "Ballots instead of Bullets? The effect of the Voting Rights Act on political violence", *Journal of the European Economic Association*.

Laurent-Lucchetti, J, D Rohner, and M Thoenig (2022), "Ethnic conflicts and the informational dividend of democracy", *Journal of the European Economic Association*, forthcoming.

Lott, Jr, J R (1999), "Public schooling, indoctrination, and totalitarianism", *Journal of Political Economy* 107(S6): S127–S157.

Marcucci, A, D Rohner, and A Saia (forthcoming), "Ballot or Bullet: The Impact of UK's Representation of the People Act on Peace and Prosperity", *Economic Journal*.

Michalopoulos, S and E Papaioannou (2016), "The long-run effects of the scramble for Africa", *American Economic Review* 106(7): 1802-48.

Miguel, E (2004), "Tribe or nation? Nation building and public goods in Kenya versus Tanzania", *World Politics* 56(3): 327–362.

Montalvo, J G and M Reynal-Querol (2005), "Ethnic polarization, potential conflict, and civil wars", *American Economic Review* 95(3): 796–816.

Mousa, S (2020), "Building social cohesion between Christians and Muslims through soccer in post-ISIS Iraq", *Science* 369(6505): 866–870.

Mueller, H and C Rauh (2022), "Building Bridges to Peace: A Quantitative Evaluation of Power-Sharing Agreements", Cambridge Working Papers in Economics No. 2261, University of Cambridge.

Mueller, H and D Rohner (2018), "Can power-sharing foster peace? Evidence from Northern Ireland", *Economic Policy* 33(95): 447–484.

Mueller, H, D Rohner, and D Schönholzer (2022), "Ethnic violence across space", *The Economic Journal* 132(642): 709–740.

Müller, K, and C Schwarz (2021), "Fanning the flames of hate: Social media and hate crime", *Journal of the European Economic Association* 19(4): 2131–2167.

Müller, K and C Schwarz (2022), "From hashtag to hate crime: Twitter and anti-minority sentiment", CEPR Discussion Paper No. 17647.

Nunn, N and N Qian (2014), "US food aid and civil conflict", *American Economic Review* 104(6): 1630–66.

Okunogbe, O M (2022), "Does Exposure to Other Ethnic Regions Promote National Integration? Evidence from Nigeria", *American Economic Journal: Applied Economics*.

Person, R and M McFaul (2022), "What Putin fears most", *Journal of Democracy* 33(2): 18–27.

Premand, P and D Rohner (2022), "Buying Peace? Large-Scale Experimental Evidence on Cash Transfers and Conflict", working paper.

Queralt, D (2022), *Pawned States: State Building in the Era of International Finance*, Princeton University Press.

Ray, J L (1998), "Does Democracy Cause Peace?" *Annual Review of Political Science* 1: 27–46.

Rohner, D (2011), "Reputation, group structure and social tensions", *Journal of Development Economics* 96(2): 188–199.

Rohner, D (2023), "Mediation, military and money: The promises and pitfalls of outside interventions to end armed conflicts", *Journal of Economic Literature*.

Rohner, D and M Thoenig (2021), "The elusive peace dividend of development policy: From war traps to macro complementarities", *Annual Review of Economics* 13: 111–131.

Rohner, D, M Thoenig, and F Zilibotti (2013a), "War signals: A theory of trade, trust, and conflict", *Review of Economic Studies* 80(3): 1114–1147.

Rohner, D, M Thoenig, and F Zilibotti (2013b), "Seeds of distrust: Conflict in Uganda", *Journal of Economic Growth* 18(3): 217–252.

Ruggeri, A, H Dorussen, and T-I Gizelis (2017), "Winning the peace locally: UN peacekeeping and local conflict", *International Organization* 71(1): 163–185.

Samii, C (2013), "Perils or promise of ethnic integration? Evidence from a hard case in Burundi", *American Political Science Review* 107(3): 558–573.

Sexton, R (2016), "Aid as a tool against insurgency: Evidence from contested and controlled territory in Afghanistan", *American Political Science Review* 110(4): 731–749.

Tajfel, H, J C Turner, W G.Austin, and S Worchel (1979), "An integrative theory of intergroup conflict", in *Organizational Identity: A Reader*, Oxford University Press.

Tilly, C (1975), "Reflections on the History of European State Making," in C Tilly (ed.), *The Formation of National States in Western Europe*, Princeton University Press.

Valfort, M-A (2020), "Anti-Muslim discrimination in France: Evidence from a field experiment", *World Development* 135: 105022.

Weintraub, M (2016), "Do all good things go together? Development assistance and insurgent violence in civil war", *The Journal of Politics* 78(4): 989–1002.

Yanagizawa-Drott, D (2014), "Propaganda and conflict: Evidence from the Rwandan genocide", *The Quarterly Journal of Economics* 129(4): 1947–1994.

ABOUT THE AUTHORS

Dominic Rohner is a Professor of Economics at the Faculty of Business and Economics (HEC) of the University of Lausanne. He is a Research Fellow of CEPR, CESifo, OxCarre and HiCN. His research focuses on political and development economics and has won several prizes, such as for example the KfW Development Bank Excellence Award or the SNIS International Geneva Award. He has held a Starting Grant of the European Research Council (ERC) investigating "Policies for Peace" and is an Associate Editor at the *Economic Journal*. He is also the leader of the CEPR Research and Policy Network (RPN) on Preventing Conflict. He has published papers in various international journals,

including, among others: *American Economic Review, Econometrica, Journal of Political Economy, Quarterly Journal of Economics* and *Review of Economic Studies*. He holds a PhD in Economics from the University of Cambridge.

Ekaterina Zhuravskaya is a Professor of Economics at the Paris School of Economics (EHESS), which she joined in 2010. She is a Research Fellow of CEPR in Political Economy and Development Economics programs. She got her PhD at Harvard University in 1999 and spent 10 subsequent years working as Professor at the New Economic School and as the Academic Director of the Center for Economic and Financial Research in Moscow. Her main academic interests are in political economy, with applications to media, economic history, and institutions. She is the recipient of the Birgit Grodahl Award and CNSR Silver Medal. She also was elected a Fellow of the Econometric Society.

SECTION I
THE ROLE OF INTERACTIONS: CONTACT VERSUS SOCIAL IDENTITY

CHAPTER 2

Diversity, contact and nation building: Evidence from population resettlement in Indonesia

Samuel Bazzi,[a] Arya Gaduh,[b] Alexander Rothenberg,[c] and Maisy Wong[d]
[a]UC San Diego; [b]University of Arkansas; [c]Syracuse University;[d]University of Pennsylvania

> [T]he most certain prediction that we can make about almost any modern society is that it will be more diverse a generation from now than it is today … the central challenge of modern, diversifying societies is to create a new, broader sense of 'we'.
>
> Robert Putnam, The 2006 Johan Skytte Prize Lecture

A shared national identity – a sense of 'we' that encompasses all citizens regardless of background – is critical to the creation and perpetuity of a nation state. Many leaders throughout history have enacted policies to promote a national identity with the goal of building an 'imagined political community' in which citizens remain connected by shared history and values, despite never meeting one another (Anderson 1983). Such ambition is aptly captured by modern Italy's founder Massimo d'Azeglio's famous remark: "Italy has been made; now it remains to make Italians" (1860, cited in Alesina and Reich, 2015). Many mottos capture this spirit of unity amidst diversity, including *E Pluribus Unum* in the United States, "United in Diversity" in the European Union, and *Bhinneka Tunggal Ika* in Indonesia.

With rising geographic mobility, there are concerns that growing diversity may undermine efforts to sustain a shared sense of identity. Social theorists offer opposing views on the impact of increasing diversity on national identity formation. Some argue that exposure to different groups provokes backlash and conflict (Blumer 1958, Huntington 2004), while others posit that intergroup contact would, over time, mitigate such hostilities (Allport

1954). Alternatively, diversity may engender social anomie or isolation, which limits integration (Putnam 2007). Whether intergroup contact is conducive to integration or to conflict may also depend on the relative sizes of different groups (Esteban and Ray 2008, 2011).

Empirically, it is difficult to distinguish the effect of diversity from the confounding influence of endogenous sorting and location-specific amenities. Part of the challenge arises because intergroup relationships take time to develop after initial contact, but local diversity tends to dissipate over time as people sort into homogenous communities (Schelling 1971). Places where diversity persists tend to be naturally advantaged, including dense parts of major cities that may attract more tolerant individuals. This makes it difficult to know whether greater integration in these areas is due to diversity (and intergroup contact) or to these other factors.

In Bazzi et al. (2019), we address these empirical challenges using Indonesia's Transmigration programme, one of the largest resettlement efforts in history. Between 1979 and 1988, the programme assigned two million voluntary migrants (hereafter, 'transmigrants') from the Inner Islands of Java and Bali to nearly 1,000 newly created villages across the Outer Islands (see Figure 1). Each settlement was endowed with the same public institutions but included a different mix of Inner and Outer Islanders. We combine this variation in diversity across communities with long-run socioeconomic outcomes to understand how intergroup contact shapes the intergenerational process of nation building.

FIGURE 1   MAP OF TRANSMIGRATION VILLAGES
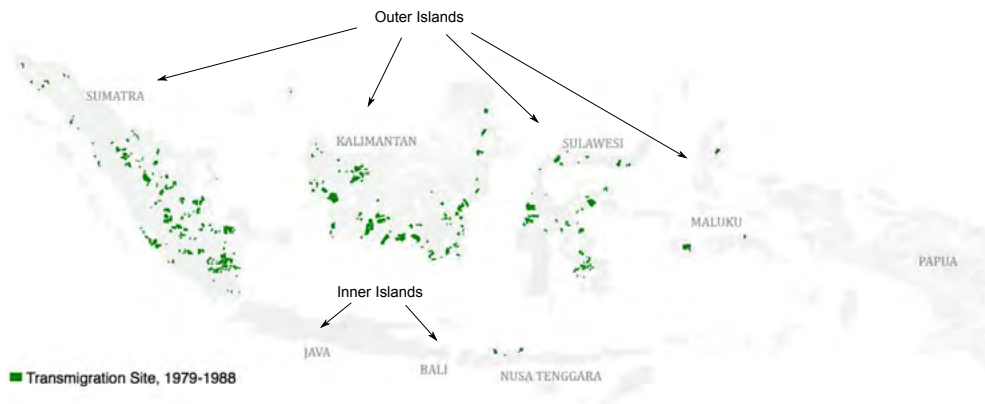
Source: Figure 1 in Bazzi et al. (2019).

Indonesia is an interesting setting to study the link between diversity and nation building. As the world's fourth most populous country, it is home to more than 1,200 self-identified ethnic groups, and there is an 81% chance that any two randomly drawn citizens from the population belong to *different* ethnicities (according to the 2010 Population Census). Yet, most citizens live in homogenous communities: in the median village – the lowest

administrative unit, with roughly 4,000 people – there is a 96% chance that any two residents belong to the *same* ethnicity. Such national diversity amid local homogeneity implies limited opportunities for intergroup contact, and this has important implications for the nation building process.

In addition to promoting agricultural development, the central government also envisioned the Transmigration programme as part of a broader effort to foster nation building. After declaring independence, Indonesian leaders faced urgent pressures to forge a national identity that would unite people from diverse cultures across the archipelago and overcome secessionist tendencies. It was hoped that when transmigrants were sent to new locations, they would mix with culturally disparate groups and break down ethnic divisions, converging towards a new Indonesian national identity.[1] The allocation process of the program created many settlements with different mixtures of ethnic groups, allowing us to explore different aspects of diversity.

Our research examines the distinct effects of two different dimensions of diversity on the nation building process: *fractionalisation* (denoted by *F*); and *polarisation* (denoted by *P*). A highly fractionalised (large *F*) community has many small ethnic groups, which offers large returns to integrating through a common identity. However, a polarised (large *P*) community with a few large groups tends to face intergroup antagonism as the incentives for cultural dominance grow stronger, making integration more difficult.

We use variation in *F* and *P* across Transmigration settlements to demonstrate that these two forces shape numerous outcomes in a dynamic, intergenerational nation building process, including national language use at home, intermarriage, name choices for children, social capital, public goods provision, and conflict – all of which we observe up to 30 years after the initial settlements.

INTERGROUP CONTACT AND IDENTITY CHOICE: A THEORETICAL FRAMEWORK

To build a nation is to promote a shared national identity, with similar values and preferences that are strong enough to glue citizens together (Alesina and Reich 2015). We develop a model of how diversity influences the adoption of a national (vis-à-vis an ethnic) identity. In the model, we treat language choice as synonymous with identity choice – a framing that is not only useful empirically but also, more substantively, resonates with linguistic theories of identity.[2]

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1   The Minister of Transimgration in 1985, Martono, remarked that "[b]y way of transmigration, we will try to . . . integrate all the ethnic groups into one nation, the Indonesian nation. The different ethnic groups will in the long run disappear because of integration and there will be one kind of man, Indonesian."

2   As Kramsch and Widdowson (1988) argue, "[t]here is a natural connection between language and identity insofar as language often defines membership to a specific group to the exclusion of nonmembers. Through language the group manifests 'personal strength and pride' and a 'sense of social importance and historical continuity' and most of all belonging to an 'imagined community'...".

Our setup is general enough to capture different dimensions of diversity. With many small groups, a neutral national identity can resolve coordination problems and facilitate market and non-market interactions (Lazear 1999). However, with a few large groups, intergroup antagonism becomes more salient (Esteban and Ray 1994). Depending on the initial values of F and P, a community's ethnic composition may either hasten or slow down the diffusion of the national identity. We embed these insights in a framework that generalises the Darity Jr. et al (2006) model on the evolution of identity.

The model, based on evolutionary game theory, predicts how a community's initial ethnic mix determines the long-run prevalence of the national identity. Using fairly innocuous assumptions, we derive the following closed-form expression for the equilibrium growth of the national identity:

$$growth\ of\ national\ identity = \beta_0 + \beta_1 F - \beta_2 P$$

In high-F villages (with many small groups), the national identity is more pervasive given the benefits of coordination. In high-P villages (with a few large groups), ethnic attachment is more likely as it provides protection from intergroup antagonism. An extension shows that both forces are more muted in segregated communities where, holding F and P fixed, intergroup contact is more limited.

TRANSMIGRATION: A NATURAL EXPERIMENT IN ETHNIC MIXING

The Transmigration programme offers a unique opportunity to identify causal effects of diversity. Several million people were resettled between 1979 and 1988 and, given the programme's rapid scale up and haphazard implementation, planners had little ability to systematically match transmigrants to specific destinations (Bazzi et al. 2016, Kebschull 1986).

Furthermore, transmigrants could not choose their destination settlements. They queued for a short time at transit camps, waiting for settlements to open in the Outer Islands. If a diverse mix of Inner Islanders happened to be in a transit camp at a given time, the destination community opened up at that time would be more diverse. The government also mandated quotas for Outer Island natives in settlements that varied over time and across regions. This combination of ethnic diversity among Inner Island transmigrants and between Inner and Outer Island groups yielded wide, and plausibly exogenous, variation in ethnic mixes across settlements.

Other features of the Transmigration programme enable us to isolate exogenous variation in segregation within villages. Upon arrival, all settlers received houses and farm plots by lottery. Full ownership rights were transferred after 5–10 years, but imperfect land markets effectively tied migrants to their initial plot.

The 2010 Population Census suggests that variation in local ethnic diversity across these settlements persisted for decades after the initial placement. Figure 2 highlights the continuum of fractionalisation (Panel A) and polarisation (Panel B) across Transmigration villages compared to the typically more homogenous, non-programme villages that tend to have low fractionalisation and polarisation. This persistent local diversity suggests limited sorting that would have otherwise neutralised the initial policy assignment.

FIGURE 2   ETHNIC DIVERSITY IN TRANSMIGRATION AND NON-TRANSMIGRATION VILLAGES

A) Fractionalisation

B) Polarisation
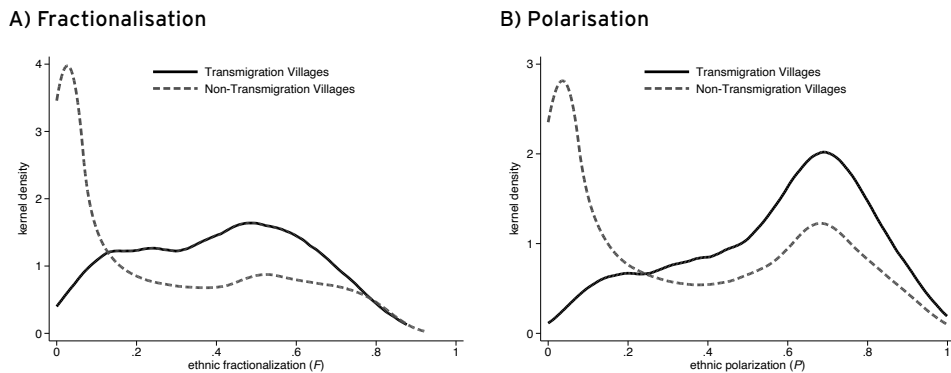
Source: Figure 2 in Bazzi et al. (2019).

MEASURING NATIONAL IDENTITY AND INTEGRATION

Our main measure of national identity is whether an individual self-reports using the national language, *Bahasa Indonesia* (or 'Indonesian'), as their *primary language at home*. Across the globe, most people consider language to be one of the most critical components of identity, even more important than birthplace (Pew Research Center 2017). In Indonesia, policymakers viewed the national language as a key vehicle to socialise the young country's national identity, widely promoting its use across economic and social domains, including in public schools where Indonesian was mandated as the main language of instruction in the 1980s. Indonesian is rooted in Malay, a minority ethnic language that was spoken by only 5% of the country when it was chosen as the national language in 1928. By 2010, although nearly all Indonesians could speak the national language, only 20% used it as their primary language at home.

Data from two independent surveys suggest that Indonesian use at home is generally associated with weaker ethnic attachment and stronger national integration.[3] Children raised in households using Indonesian at home exhibit stronger national affinity, less co-ethnic bias, and weaker attachment to their own ethnic identity as adults. This resonates

3   These include the longitudinal Indonesia Family Life Survey and the cross-sectional AsiaBarometer survey.

with the views of policymakers like Alisjahbana (1962), who led the early efforts to diffuse Indonesian. He believed that as people "learned to express themselves in Indonesian, the more conscious they became of the ties which linked them".

In addition to Indonesian use at home, we also consider other proxies for national identity and integration, including measures of ethnic-sounding names, social capital, conflict and public goods.

DIVERSITY AND NATION BUILDING

Our main results support the opposing effects of fractionalisation and polarisation as suggested by the model. A one standard deviation increase in fractionalisation leads to a 12.9 percentage point greater Indonesian use at home, consistent with the benefits of intergroup contact in settings with many small groups. However, a one standard deviation increase in polarisation leads to an 8 percentage point lower Indonesian use at home, consistent with greater intergroup antagonism in settings with a few large groups. These are large effects relative to the village-level mean Indonesian use at home of 14.4%.[4]

Figure 3 visualises this core result. The different shapes and colours across villages correspond to different quintiles of Indonesian use at home. We also highlight three case studies to illustrate the identifying variation. For example, Tanjung Gading (TG) was settled with 43 ethnic groups and a very high fractionalisation of 0.76. By contrast, Bukit Kemuning (BK) was settled by only 14 ethnic groups. The two villages have similar polarisation levels (0.63 in TG and 0.59 in BK), but BK has a much lower fractionalisation of 0.41. We would expect that TG would have more Indonesian use at home than BK because of its greater fractionalisation, and indeed, 95% of the population chose Indonesian as the primary language at home in TG compared to 22% in BK.

Now, consider the village of Tri Dharma Wirajaya (TDJ) and compare it to BK. Both villages have the same fractionalisation (0.41), a similar number of groups (17 and 14), and a large majority (around 75% Javanese). The key difference is that TDJ also has a large minority group (21% Sundanese) whereas BK has many small minorities (each with less than 10%). Accordingly, polarisation is substantially higher in TDJ (0.71) relative to BK (0.59). The model suggests that intergroup antagonism is more intense in polarised villages, and only 7% of TDJ speaks Indonesian at home, compared to 22% in BK.

Looking across the hundreds of other Transmigration villages in the figure, one sees a clear pattern wherein villages with greater fractionalisation and less polarisation exhibit the strongest integration through national language use at home.

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4   For reference, a one standard deviation increase in *F* equals 0.21 relative to a mean of 0.41, and a one standard deviation increase in *P* equals 0.23 relative to a mean of 0.57.

FIGURE 3   ETHNIC DIVERSITY AND NATIONAL LANGUAGE AT HOME
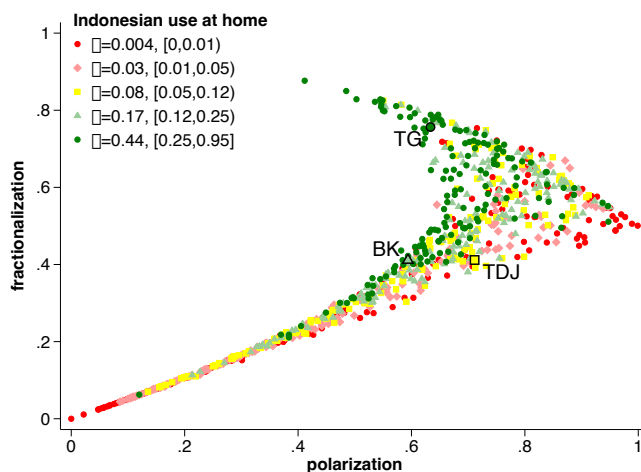
Source: Figure 3 in Bazzi et al. (2019).

Several additional findings point to an identity-based interpretation of this core finding. If individuals speak Indonesian at home solely to improve language skills, we would expect to see different effects across education levels or employment sectors, but we do not. It is particularly telling to find sizable effects of F and P on ethnic Malays, whose native language forms the base of Indonesian. For Malays to speak Indonesian at home rather than their mother tongue, they must feel relatively more invested in the national identity. In fact, we find stable effects of F and P across major ethnic groups. Together, these results suggest that national language use at home captures something deeper than latent fluency or effort to improve skills.

Beyond language: Other measures of identity and integration

We identify similar effects of diversity on two additional proxies for ethnic attachment. First, interethnic marriage rates, a leading indicator of integration (Gordon 1964), are positively related to fractionalisation and negatively related to polarisation. Second, we study the identity content of names given to children born after resettlement. Name choices are the first act of intergenerational cultural transmission, conveying information about parental preferences and expectations about the value of different identities. Using a likelihood-based index of ethnic names, we find that parents give their children less ethnically distinctive names in villages with greater fractionalisation and lower polarisation.

At the individual level, we also use survey data to measure intergroup tolerance, trust, community engagement and preferences for redistribution. These subjective responses line up with village-level outcomes: polarisation reduces growth-enhancing public goods

provision by local governments, increases the likelihood of ethnic conflict, and ultimately hinders economic development. Meanwhile, fractionalisation works in the opposite direction, indicating possible downstream benefits of integration.

INTERGROUP DISTANCE AND THE SALIENCE OF ETHNIC DIVISIONS

How does diversity lead to the adoption of a more inclusive, national identity? Our research design allows us to identify three potentially important mechanisms that help clarify when and why ethnic divisions matter. These can be broadly construed as spatial, economic and linguistic distance.

Spatial distance

First, residential segregation determines the scope for intergroup contact to change behaviour in diverse communities. Below the village lie more localised neighbourhoods in which diversity might shape behaviour. By exploiting the lottery assignment of housing units in Transmigration settlements, we can identify the effect of segregation. Our findings suggest that diversity's effects can be hyper-local, with strong effects of exposure to diverse next-door neighbours and those living within the closest residential proximity.

Moreover, consistent with the model extension, segregation dampens the effects of F and P by limiting day-to-day contact with other groups. This proves beneficial in polarised villages where intergroup antagonism runs high and residential segregation might reduce opportunities for such antagonisms to erupt publicly and further entrench ethnic divisions. Analogously, when opportunities for intergroup contact are rare because of segregation, it may be difficult to reap gains from coordination amidst many small groups.

Economic distance

Second, as in Lowe (2021), the type of contact matters: fractionalisation has weaker positive effects in settings with greater interethnic inequality in economic resources, which we proxy by location-specific human capital endowments. Although settlers received the same quantity and expected quality of assets upon arrival in the new settlements, they may not be equally adept at using such resources due to the arbitrary assignment process.

We capture these differences using a measure of location-specific human capital that is predetermined and exogenous with respect to initial diversity: agroclimatic similarity between an initial settler's origin and destination district. In Bazzi et al. (2016), we show that agroclimatic similarity is a good proxy for skill transferability and an important determinant of resettlement success. Inequality between ethnic groups in this skill may exacerbate ethnic differences to the extent that it leads, for example, to inequality in economic opportunities or in the ability to cope with shocks.

Linguistic distance

Third, deep-rooted linguistic differences between ethnic groups amplify both the benefits of fractionalisation and the costs of polarisation. As a baseline, and in keeping with much prior work on diversity, we treat, for example, the Batak Tapanuli as equidistant from the Javanese and the Batak Toba even though both Batak sub-groups have mutually intelligible languages and similar cultures. Using various approaches, we then show that it is the deeper-rooted divisions, like those between Javanese and Batak, which matter most in terms of shaping integration through the national language.

Together, these results shed new light on how residential mixing, interethnic inequality and linguistic differences determine the scope for both the costs and benefits of diversity to be realised.

DISCUSSION

Our research provides fresh insights into how diversity and intergroup contact affect nation building. Our findings suggest an important role for the national language and should be of broad interest given Indonesia's remarkable diversity and relative success in promoting a national identity. This novel focus may offer a new window into the nation building processes in historical Europe as well as post-colonial developing countries.[5]

More broadly, the distinct effects of fractionalisation and polarisation that we identify suggest a possible middle ground in the debate on the costs and benefits of migration-induced diversity (e.g. Alesina et al. 2015, Ashraf and Galor 2013). Fractionalisation may increase the benefits while polarisation may increase the costs. These results could inform the design of resettlement or housing policies where group composition is malleable.

Our study also offers a novel perspective on the legacy of this controversial resettlement program. While policymakers viewed Transmigration as a tool for nation building, critics accused the government of Javanese imperialism in the Outer Islands (Hoshour 1997). Even today, popular accounts remain coloured by egregious cases of failed integration (e.g. Fearon and Laitin 2011, Pisani 2014). However, Barter and Cote (2015) provide ethnographic evidence against this popular view, arguing that state-sponsored Transmigration communities were not associated with the ethnic violence that erupted in the Outer Islands in the 1990s. Ultimately, our findings offer support for this more sanguine view of the programme.

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5   There is comparatively little empirical work on either setting. There are rich case studies on France (Weber 1976, see also Chapter 8 of this eBook) and several African countries (Laitin 2007), and with various discussions on national language policies (Barbour and Carmichael 2000, Simpson 2007, 2008). A few empirical studies examine the effects of banning ethnic languages (see Chapter 10 based on Clots-Figueras and Masella 2013 and Chapter 13 based on Fouka 2020) and the determinants of national language choice by the government (Laitin and Ramachandran 2015, Liu 2015). Yet, a recent survey of the economics literature on language reveals no work on the national language and its implications for nation building in diverse countries (Ginsburgh and Weber 2018).

While some villages may have achieved limited integration over the long run, this was but one possible outcome. For many others, we find national integration of the sort one only sees in Indonesia's most diverse and vibrant cities. That such outcomes can also be realized in remote and underdeveloped rural areas is a testament to the importance of intergroup contact in the nation building process.

REFERENCES

Alesina, A and B Reich (2015), "Nation Building", unpublished manuscript.

Alesina, A, J Harnoss and H Rapoport (2016), "Birthplace Diversity and Economic Prosperity", *Journal of Economic Growth* 21(2): 101–138.

Alisjahbana, S T (1962), *Indonesian language and literature: Two essays*, Yale University, Southeast Asia Studies.

Allport, G W (1954), *The nature of prejudice*, Cambridge University Press.

Anderson, B (1983), *Imagined Communities*, Verso.

Ashraf, Q and O Galor (2013), "The "Out of Africa" Hypothesis, Human Genetic Diversity, and Comparative Economic Development", *The American Economic Review* 103(1): 1–46.

Barbour, S and C Carmichael (2000), *Language and nationalism in Europe*, Oxford University Press.

Barter, S J and I Côté (2015), "Strife of the soil? Unsettling transmigrant conflicts in Indonesia", *Journal of Southeast Asian Studies* 46(1): 60–85.

Bazzi, S, A Gaduh, A Rothenberg and M Wong (2016), "Skill Transferability, Migration, and Development: Evidence from Population Resettlement in Indonesia", *American Economic Review* 106(9): 2658–2698.

Bazzi, S, A Gaduh, A Rothenberg and M Wong (2019), "Unity in Diversity? How Intergroup Contact Can Foster Nation Building", *American Economic Review* 109(11): 3978-4025.

Blumer, H (1958), "Race prejudice as a sense of group position", *Pacific Sociological Review* 1(1): 3–7.

Borjas, G (2016), *We Wanted Workers: Unraveling the Immigration Narrative*, W W Norton & Company.

Clots-Figueras, I and P Masella (2013), "Education, Language and Identity", *The Economic Journal* 123(570): F332–F357.

Darity Jr, W A, P L Mason and J B Stewart (2006), "The economics of identity: The origin and persistence of racial identity norms", *Journal of Economic Behavior & Organization* 60(3): 283–305.

Esteban, J and D Ray (2008), "On the measurement of polarization", *Econometrica* 62(4): 819–851.

Esteban, J and D Ray (2008), "Polarization, fractionalization and conflict", *Journal of Peace Research* 45(2), 163–182.

Esteban, J and D Ray (2011), "Linking conflict to inequality and polarization", *American Economic Review* (4): 1345–1374.

Esteban, J, L Mayoral and D Ray (2012), "Ethnicity and Conflict: An Empirical Study", *American Economic Review* 102(4): 1310–1342.

Fearon, J D and D D Laitin (2011), "Sons of the soil, migrants, and civil war", *World Development* 39: 199–211.

Fouka, V (2020), "Backlash: The Unintended Effects of Language Prohibition in US Schools after World War I", *Review of Economic Studies* 87(1): 204–239.

Gordon, M M (1964), *Assimilation in American life: The role of race, religion, and national origins*, Oxford University Press.

Ginsburgh, V and S Weber (2018), "The economics of language", *Journal of Economic Literature* 58(2): 348–404.

Hoshour, C A (1997), "Resettlement and the Politicization of Ethnicity in Indonesia", *Bijdragen tot de Taal-Land-en Volkenkunde/Journal of the Humanities and Social Sciences of Southeast Asia* 153(4): 557–576.

Huntington, S P (2004), *Who are We? America's Great Debate,* Free Press.

Kebschull, D (1986), *Transmigration in Indonesia: An Empirical Analysis of Motivation, Expectations and Experiences*, Transaction Publishers.

Kramsch, C and H G Widdowson (1998), *Language and Culture,* Oxford University Press.

Lazear, E (1999), "Culture and Language", *Journal of Political Economy* 107: s95–s126.

Laitin, D D (2007), *Language repertoires and state construction in Africa*, Cambridge University Press.

Laitin, D D and R Ramachandran (2015), "Linguistic Diversity, Official Language Choice and Nation Building: Theory and Evidence", unpublished manuscript.

Liu, A H (2015), *Standardizing diversity: the political economy of language regimes*, University of Pennsylvania Press.

Lowe, M (2021), "Types of Contact: A Field Experiment on Collaborative and Adversarial Caste Integration", *American Economic Review* 111(6): 1807-44.

Pew Research Center (2017), "What It Takes to Truly Be 'One of Us'", February.

Pisani, E (2014), *Indonesia, Etc.: Exploring the Improbable Nation*, W W Norton & Company.

Putnam, R D (2007), "E Pluribus Unum: Diversity and Community in the Twenty-first Century The 2006 Johan Skytte Prize Lecture", *Scandinavian Political Studies* 30(2): 137–174.

Schelling, T C (1971), "Dynamic models of segregation", *Journal of Mathematical Sociology* 1(2): 143–186.

Simpson, A (2007), "Indonesia", in *Language and National Identity in Asia*, Oxford University Press.

Simpson, A (2008), *Language and National Identity in Africa*, Oxford University Press.

Weber, E (1976), *Peasants into Frenchmen: The Modernization of Rural France, 1870-1914*, Stanford University Press.

ABOUT THE AUTHORS

Samuel Bazzi is an Associate Professor at the School of Global Policy and Strategy and the Department of Economics at the University of California, San Diego. His research lies at the intersection of development economics and political economy, with a focus on how individuals and nations adapt to the challenges of diversity in a global world. Bazzi is a co-editor at the Journal of Development Economics, a Research Affiliate at the Centre for Economic Policy Research (CEPR), and a Research Associate at the National Bureau of Economic Research (NBER).

Arya Gaduh is an Associate Professor at the Department of Economics at the Sam Walton College of Business, University of Arkansas. He studies policies related to human and social capital accumulation, and urban economics in low-and-middle-income countries. Gaduh is a Research Associate at the National Bureau of Economic Research (NBER) and an Affiliate at the Abdul Latif Jameel Poverty Action Lab (JPAL).

Alexander D. Rothenberg is an Assistant Professor of economics at Syracuse University. He is an applied microeconomist whose research interests lie at the intersection of urban and development economics. His research uses a combination of reduced form and structural techniques to study the impact of different urban, regional and private-sector policy interventions. Rothenberg is a Senior Research Associate at the Maxwell School's Center for Policy Research.

Maisy Wong is the James T. Riady Associate Professor of Real Estate at the Wharton School of the University of Pennsylvania. Her research interests include labor mobility, urbanization, and real estate finance. Dr. Wong is a Research Associate at the NBER and on the editorial board of the Journal of Urban Economics. Dr. Wong earned her undergraduate degree from U.C. Berkeley and her Ph.D. from the Massachusetts Institute of Technology (MIT).

CHAPTER 3

Defining national culture in opposition to a domestic outgroup: Identity in the Russian Empire

Irena Grosfeld[a] and Ekaterina Zhuravskaya[bc]
[a]Paris School of Economics; [b]Paris School of Economics; [c]CEPR

One of the most powerful ideas of social psychology relevant for nation building is the social identity theory (Tajfel and Turner 1979, 1986). According to this theory, people define themselves based on the most visible characteristics of the social groups they do belong to and groups they do not belong to. In particular, the view of the world is divided into *ingroup* ('us') and *outgroup* ('them'). The characteristics of these social groups are based on stereotyping (e.g. Bordalo et al. 2016), which means that people tend to overstate both the differences between the ingroup and the outgroup and the similarities within each of these groups. Furthermore, to strengthen their own positive self-image, people develop a negative view of the stereotypical distinguishing features of the outgroup. Some of such group characteristics, such as the member's phenotype, are not choice variables; others, such as occupations or cultural norms, can be chosen by people for themselves or for their children. For those stereotypical features of the groups that can be changed by individual choices, social identity theory implies that people will make choices to distance themselves from the outgroup, as this will make them feel better about themselves. As a result, an ingroup social stigma of some occupations or cultural norms may emerge simply because these features are stereotypical of the outgroup.

One could hypothesise that national identity, defined as the common identity of a country's majority group, follows the logic of social identity theory. Testing this hypothesis is challenging. One needs exogenous variation in the composition of the population, which

would result in varying ability to define the characteristics of the outgroup. As, in normal times, people choose their settlement locations, such exogeneity is not attainable. This is why the literature has turned to extraordinary historical experiments to study the roots of shared identities. Chapter 2 of this eBook, based on Bazzi et al. (2016), describes one such drastic experiment: the mass population resettlement of Indonesia that resulted in settlements with varying degrees of diversity measured by ethnic fractionalisation and ethnic polarisation. Consistent with social identity theory, the authors find that a high degree of polarisation, which is maximised when there are just two equal-sized ethnic groups, making the between-group competition and social comparisons particularly salient, resulted in smaller adherence to pan-Indonesian national identity (measured by the use of Indonesian, rather than ethnic language, at home). In contrast, people in very fractionalised settlements with many ethnic groups were more likely to adopt this language and cooperate, especially when these settlements were not segregated, just as Allport (1954) postulated in his contact hypotheses.

The history of Russia also provides ample exogenous sources of variation in interethnic contact (for a review of the research that utilises historical experiments conducted in the Russian empire and in Eastern Europe after the collapse of the European empires, see Zhuravskaya et al. forthcoming). Many dramatic historical events and policies, such as the multiple redrawing of the map of Europe after each of the two World Wars (e.g. Charnysh 2019, Becker et al. 2020) or Stalin's deportations of entire ethnic groups (e.g. Milo et al. 2022) affected local ethnic and religious mixes and, as a result, people's attitudes towards each other and their own self-identification.

For a test of the social identity theory, it is useful not only to have exogenous variation in the group composition, but also a clear division in stereotypical characteristics of each of the groups. An example of a historical experiment that is particularly well suited to test the social identity theory is the institution of the Pale of Settlement – a large area in the western part of the Russian Empire outside of which Jews were not allowed to live (see Figure 1 for the map). The Pale of Settlement was instituted at the end of the 18th century after the Russian Empire acquired a vast territory of the Polish-Lithuanian Commonwealth, where Jews had been living since the 14th century. In order to keep Jews away from predominantly Orthodox Russia's central provinces, Catherine the Great made a list of western provinces (*gubernii*) of the Empire (subsequently called the Pale), allowing Jewish residence only in urban and quasi-urban settlements and only within these territories. Historical sources point out that the Pale border within the Russian Empire was arbitrary, binding and enforced (e.g. Klier 1986), despite the fact that most areas inside the Pale were the areas of long historical Jewish presence. The reason why this policy is an ideal setting to study social identity theory is that the Pale generated a large and exogenous discontinuity in the presence of a visible and distinct minority – the Jews – among localities that, otherwise, were very similar.

FIGURE 1   MAP OF THE PALE OF SETTLEMENT

Legend
— **The Pale of Settlement**
  Russian Empire
  Contemporary country borders
  Subnational administrative units

Inside the Pale of Settlement, Jews were a minority constituting over 30% of the non-rural population and 11% of the total population, according to the 1897 Russian Empire census. In contrast, outside the Pale in the Russian Empire, Jews were essentially absent. Most importantly, there were significant occupational differences between the Slavic majority and Jewish minority within the Pale. Jews dominated the 'middleman' market-intermediary professions, constituting 84% of all traders of agricultural and non-agricultural goods, 92% of all grain traders and 37% of all moneylenders.

Although a substantially larger share of the Jewish population was engaged in small-scale artisan activities, such as shoe- and clothes-making, blacksmithing, food manufacturing, as well as food- and inn- related services, middleman occupations appeared most stereotypical for the Jewish minority. This was because the representatives of the majority were not engaged in these activities. Instead, the majority dominated the agricultural sector within the Pale, both in absolute numbers and relative to the Jews, who were not engaged in agriculture at all. Thus, the stereotypical majority occupation was a peasant.

There are two main reasons for the differences in engagement in these occupations between the non-Jewish majority and the Jewish minority. First, Jews had a comparative advantage in middleman occupations due to their traditionally high literacy rates that allowed them to keep book and write contracts (e.g. Botticini and Eckstein, 2012). This

was in contrast to a largely illiterate majority.[1] Second, Jews were not allowed to own land or work on it, which directly precluded them from engaging in agricultural occupations (with the exception of the agricultural colonies of Novorossiya).

Such a sharp difference in the stereotypical image of the majority and the minority creates a setting that is particularly suited for testing the social identity theory, because if social comparisons are important for group identity, one should expect the majority to define itself in opposition to the stereotypical image of the minority inside the Pale. Moreover, the majority might create norms under which the behaviour of the representatives of the majority that maximises the differences between groups is socially rewarded, whereas that which closes the gap between the groups is frowned upon.

The evidence that we present Grosfeld et al. (2013), which documents the long-term effects of the Jewish presence in the Pale of Settlement, could be interpreted as a test of these predictions. In particular, we examine a discontinuity in contemporary attitudes, voting patterns and economic outcomes on the two sides of the Pale of Settlement border. Since the Pale defined the pattern of Jewish residency for over a century, which largely persisted after the revolution of 1917, when the Pale restrictions were lifted, the binding and arbitrary nature of the border of the Pale helps to identify the long-run effect of the former presence of Jews on one side of the border on self-identification of the majority group. Figure 2 illustrates the discontinuity in the former Jewish presence at the Pale border. It presents the share of Jews in the population of counties (panel A) and of urban settlements (panel B) on the two sides of the Pale border in 1897.

After World War II and the Holocaust, which caused the mass murder of 5.6–6 million Jews, the majority of whom lived in the area of the Pale of Settlement, the ethnic and religious composition of the populations on the two sides of the Pale border became indistinguishable. Thus, the discontinuous effects of the Pale border today cannot be attributed to differences in the ethnic or religious mix of the population. They also cannot be driven by any other economic, political or geographic factors, as these factors are smooth at the Pale border (as we verify formally).

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1   Next to the eastern Pale border, the majority of the Pale was comprised of ethnic Belorussians, Russians and Ukrainians. In the western parts of the Pale, Poles constituted the majority and, on average, had higher literacy rates than Belorussians, Russians and Ukrainians, but lower than Jews.

FIGURE 2   SHARE OF JEWS ON THE TWO SIDES OF THE PALE OF SETTLEMENT BORDER, 1897

A) Share of Jews, counties
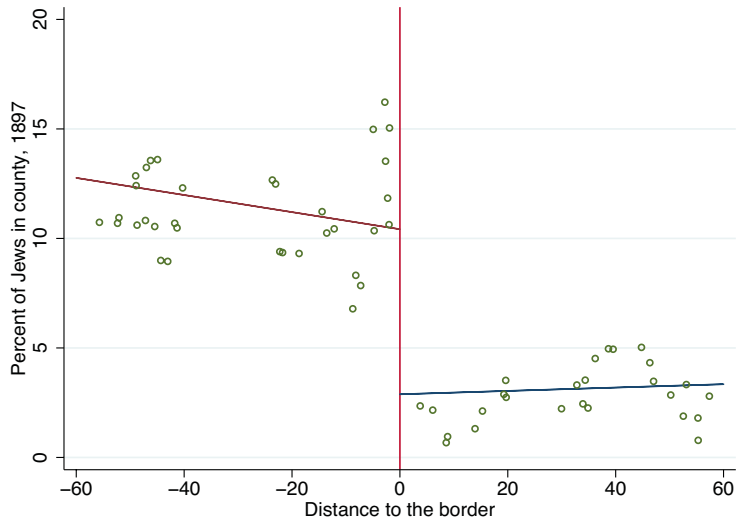
B) Share of Jews, urban settlements
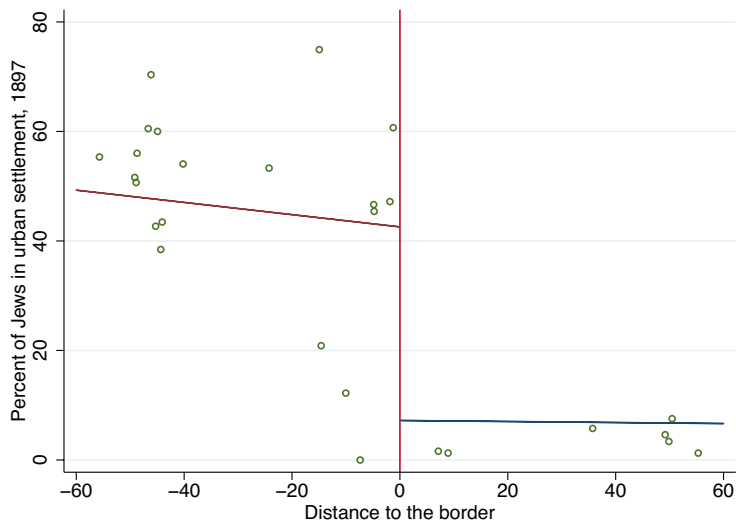
Note: Each observation is the match of a county or an urban settlement with the Primary Sampling Unit (Locality) of the Life in Transition survey. Observations to the left of the vertical line are inside the Pale of Settlement, to the right – outside the Pale of Settlement. Horizontal axes show the distance to the Pale border.

FIGURE 3   ATTITUDES TOWARD THE MARKET AND SELF-EMPLOYMENT RATES ON THE TWO SIDES OF THE PALE OF SETTLEMENT BORDER

A) Market is preferable
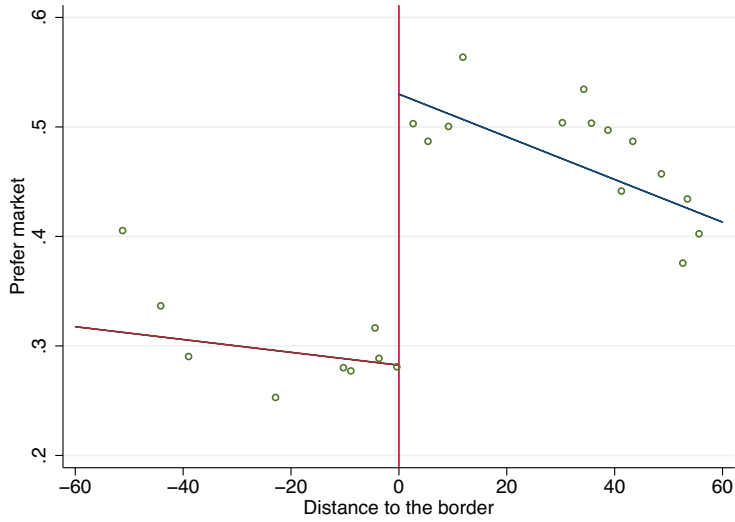
B) Self-employment rate

Note: Each observation is the mean of the respective outcome in the Primary Sampling Unit (Locality) of the Life in Transition survey. Observations to the left of the vertical line are inside the Pale of Settlement, to the right – outside the Pale of Settlement. Horizontal axes show the distance to the Pale border.

We document substantial discontinuities at the border of the Pale of Settlement that are consistent with the gentile population of the Pale of Settlement developing a set of behavioural norms in opposition to what a stereotypical member of the Jewish minority represented in the eyes of the majority.

We find that current residents of the Pale area, when compared to their counterparts outside the Pale in Latvia, Russia, and Ukraine (the three contemporary countries through which the Pale border cuts such that one part of their territory is outside and another part inside the Pale), are much more sceptical about the market economy and are less entrepreneurial. The magnitude is substantial: crossing the border of the Pale from outside into the Pale leads to an 18 percentage point drop in support for the market and a 30 percentage point drop in support for democracy. The size of the jump at the border equals to about 0.4 and 0.6 of the standard deviations of these variables in the considered sample, respectively. Figure 3 illustrates this discontinuity at the Pale border.

The probability that a resident in an urban area is self-employed is also significantly smaller in urban settlements inside the Pale compared to similar settlements outside the Pale. Moreover, the residents of the Pale vote significantly less for political parties with pro-market liberal ideologies and more for anti-market parties with socialist or communist ideologies. In addition, they tend to be less satisfied with the state of the economy and its progress during the transition from communist rule. Yet, there is absolutely no evidence of discontinuity at the Pale border for any of the economic outcomes, such as consumption, relative income, unemployment, education of respondents or measures of size of the middle class. This suggests that the roots of these difference are not in economic development.

In contrast to all other outcomes that seem to hurt market development inside the Pale, trust (measured by the answer to the question of whether people in general can be trusted or one cannot be too careful in dealing with people) is significantly higher in urban settlements inside the Pale compared to similar settlements outside the Pale. Trust, measured this way, is usually considered as conducive to market development (Putnam 1993). Crossing the Pale border into the Pale leads to a 25 percentage point increase in the share of the population who trust others (about one half a standard deviation). Figure 4 presents this result. We come back to the interpretation of this seemingly surprising result below.

FIGURE 4   TRUST RATES ON THE TWO SIDES OF THE PALE OF SETTLEMENT BORDER

Other people can be trusted
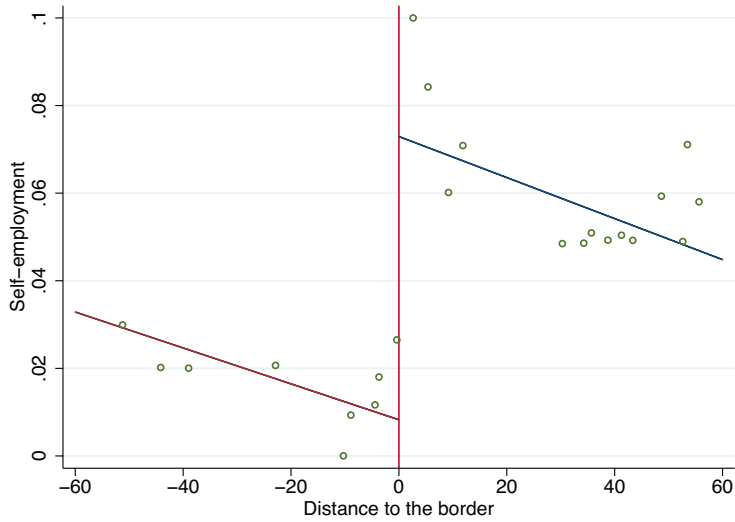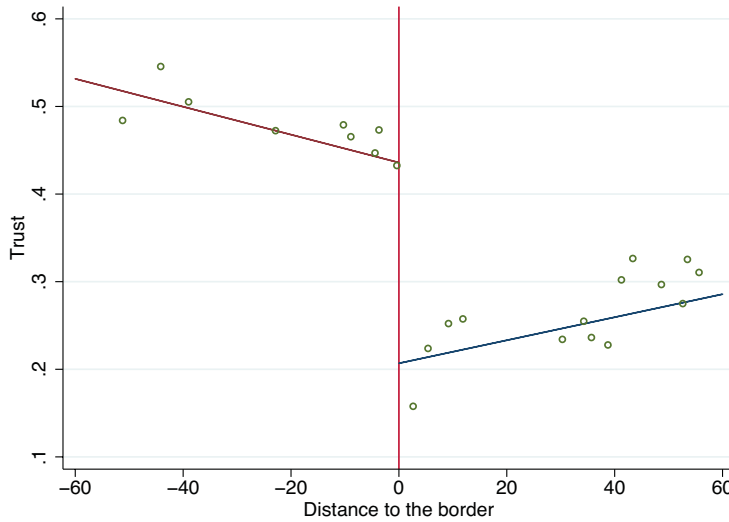

Note: Each observation is the mean of the trust outcome in the Primary Sampling Unit (Locality) of the Life in Transition survey. Observations to the left of the vertical line are inside the Pale of Settlement, to the right – outside the Pale of Settlement. Horizontal axes show the distance to the Pale border.

All of the discontinuities that we find at the Pale border are present only in urban areas; there are no differences in attitudes or behaviour in rural areas across the Pale border. As Jews did not live in rural areas on either side of the border, one can consider the effect of the Pale in rural areas as a placebo treatment. If our results were driven by some omitted spatial variation rather than the fact that the Pale defined the Jewish presence in the Russian Empire, we would expect to obtain similar results for rural and urban areas.

After establishing the discontinuities at the Pale border, we test between the two possible channels for the effect: the Pale can have a long-run effect either (1) because Jews used to live there before World Ward II (our main hypothesis), or (2) because there was an inflow of new migrant populations into the areas where Jews used to live to fill emptied space (and houses) after World War II. We test for the effect of the renewal of the population as a potential channel and reject it by showing that residents of the areas that experienced a substantial renewal of the population caused by a mass outmigration of non-Jews after World War II do not exhibit similar attitudes, political preferences or self-employment penetration to residents whose origins are in the Pale. Thus, we conclude that the Pale matters because Jews used to live there.

How can one interpret these effects? Social identity theory helps to understand them. We argue that the Gentile (non-Jewish) population developed a special anti-market culture and within-group bonding trust at the time when Jews and non-Jews lived side-by-side in towns and *shtetls* inside the Pale. The majority defined itself through social comparisons with the Jews. This had two important consequences for the Gentile

population within the Pale. First, since Jews as a group represented a liberal pro-market force because of their distinct traditional stereotypical occupations, the majority's social comparison of itself with the Jews triggered the development of an anti-market culture, as an anti-market sentiment was equated with positioning oneself as far as possible from the outgroup (i.e. the Jews).

Second, ethnic antagonism between the two groups led to the development of within-group solidarity and trust. As this kind of trust is developed in opposition to the rival group, it is often referred to as 'bonding' (restricted to homogenous groups) as opposed to 'bridging' (across diverse social groups) social capital (e.g. Putnam 2000), or 'limited' as opposed to 'generalised' morality (Tabellini 2008). Both the anti-market culture and within-group bonds have persisted among descendants of the non-Jewish population up to the present day.

This bonding trust manifests itself in a higher percentage of people who trust others as the Jews perished in the Holocaust, while the anti-market culture manifests itself in political support for communist parties, opposition to the market and lower entrepreneurship inside the Pale. We also provide evidence that trust observed inside the Pale is bonding in nature, as membership in civic non-political non-governmental organisations is smaller inside than outside the Pale and there is no difference in trust in institutions such as banks and foreign investors.

This social-identity mechanism implies that an anti-market culture and bonding trust should be more pronounced in places that had higher ethnic animosity for a given group composition of the population, since the social comparisons are only important along the dimensions that are salient. As it is reasonable to assume that the extent of anti-Semitism was positively correlated with the occurrence of pogroms during the three pogrom waves in the Russian Empire given the share of the Jewish population, this prediction is testable. We test it using historical data on the location of anti-Jewish pogroms perpetrated by the local non-Jewish population between 1821 and 1946. Indeed, we find that proximity to places where pogroms occurred is significantly positively related to anti-market sentiment and trust among the contemporary local population.

In a companion paper (Grosfeld et al. 2020), we examine the conditions under which pogroms occurred in the Russian Empire and show that when economic shocks coincided with political turmoil, pogroms primarily occurred in places where Jews dominated the middleman occupations (i.e. moneylending and grain trading), conditional on the share of Jews in the population and, as we mention above, despite the fact that the Jews who

engaged in middleman occupations were a minority among the Jewish population. This result highlights the fact that stereotyping was easier in localities where Jews occupied this specific niche.[2]

CONCLUSIONS

Overall, the formation of an anti-market and de facto anti-Jewish culture among non-Jews in places where the two groups co-existed closely speaks to the general issue of formation of shared group identity. Our results provide empirical support to the social identity theory that the self-identification of a majority group and cohesion among its members may depend on the co-existence with another (rival) minority group. This phenomenon has important parallels to other examples of social identities, such as the emergence of social stigma against 'acting white' among the US Black population (Tyson et al. 2005), the polarisation of political views of white population in the US South as a consequence of racial fragmentation (Key Jr 1984), or the emergence of the Hindu custom of kala pani ('black water') to ostracise any Hindus who chose to sail overseas from medieval South Asian ports, as this was the main activity of the Muslim minority (Jha 2013).

Broader implications emerge from our analysis. The co-existence of hostile ethnic and religious groups in close proximity not only influences attitudes of the representatives of these groups towards each other, but also has an important effect on the cohesion within groups as self-identification of group representatives is affected by distinctive stereotypical features of an outgroup. In particular, an ingroup may define itself in opposition to the outgroup and develop a set of behavioural norms that distinguishes its members from the outgroup. Social cohesion and social interactions within each of these groups may also be affected by the presence of the other group, as group members develop within-group loyalty in the face of a perceived external threat from the other group. Such attitudes and beliefs, when formed in the distant past by a series of historical accidents, can persist in the long term and may have an important effect on political choices and national identity many decades later.

2 As we show in Grosfeld et al. (2020), scapegoating of the outgroup in times of economic trouble is not enough to explain the occurrence of pogroms. Jews and non-Jews inside the Pale were economically integrated because the non-Jewish majority relied on the middleman services provided by the Jews, who served as providers of insurance against crop failures. The mechanisms behind anti-Jewish sentiment in the Russian empire highlighted in Grosfeld et al. (2013) and in Grosfeld et al. (2020) are not mutually exclusive.

REFERENCES

Allport, G W (1954), *The Nature of Prejudice*, Cambridge University Press.

Bazzi, S, A Gaduh, A Rothenberg and M Wong (2016), "Skill Transferability, Migration, and Development: Evidence from Population Resettlement in Indonesia", *American Economic Review* 106(9): 2658–2698.

Becker, S O, I Grosfeld, P Grosjean, NNico Voigtländer and E Zhuravskaya (2020), "Forced migration and human capital: Evidence from post-WWII population transfers", *American Economic Review* 110(5): 1430–1463.

Bordalo, P, K Coffman, N Gennaioli and A Shleifer (2016), "Stereotypes", *Quarterly Journal of Economics* 131(4): 1753–1794.

Botticini, M and Z Eckstein (2012), *The Chosen Few: How Education Shaped Jewish History,* Princeton University Press.

Charnysh, V (2019), "Diversity, Institutions, and Economic Outcomes: Post-WWII Displacement in Poland", *American Political Science Review* 113(2): 423–441.

Grosfeld, I, A Rodnyansky and E Zhuravskaya (2013), "Persistent Antimarket Culture: A Legacy of the Pale of Settlement after the Holocaust", *American Economic Journal: Economic Policy* 5(3): 189–226.

Grosfeld, I, S O Sakalli and E Zhuravskaya (2020), "Middleman Minorities and Ethnic Violence: Anti-Jewish Pogroms in the Russian Empire", *Review of Economic Studies* 87(1): 289–342.

Jha, S (2013), "Trade, Institutions and Ethnic Tolerance: Evidence from South Asia", *American Political Science Review* 107(4): 806–832.

Key Jr, V O (1984), *Southern Politics in State and Nation*, University of Tennessee Press.

Klier, J D (1986), R*ussia Gathers Her Jews: The Origins of the 'Jewish Question' in Russia, 1772–1825*, Northern Illinois University Press.

Miho, A, A Jarotchkin and E Zhuravskaya (2022), "Diffusion of Gender Norms: Evidence from Stalin's Ethnic Deportations", Paris School of Economics, mimeo.

Putnam, P (1993), *Making Democracy Work*, Princeton University Press.

Putnam, R (2000), *Bowling Alone: The Collapse and Revival of American Community,* Simon and Schuster.

Tabellini, G (2008), "The Scope of Cooperation", *Quarterly Journal of Economics* 123: 905–950.

Tajfel, H and J C Turner (1979), "An Integrative Theory of Intergroup Conflict", *The Social Psychology of Intergroup Relations* 33: 47.

Tajfel, H and J C Turner (1986), *The Social Identity Theory of Inter-Group Behavior*, Nelson-Hall.

Tyson, K, W Darity Jr and D R Castellino (2005), "It's not a 'Black Thing'", *American Sociological Review* 70(4): 582–605.

Zhuravskaya, E, S Guriev and A Markevich (forthcoming), "New Russian Economic History", *Journal of Economic Literature*.

ABOUT THE AUTHORS

Irena Grosfeld is Professor emeritus at the Paris School of Economics. She received a PhD from the University Paris I - Sorbonne and a Master's degree from the University of Warsaw. She served as senior researcher at the National Center for Scientific Research in Paris. Her research interests include political economics, development economics, and economics of transition. She has published in multiple journals, including the *American Economic Review, Review of Economic Studies, American Economic Journal, European Economic Review, Journal of Comparative Economics, Economics of Transition*, and the *Journal of Economic Literature*.

Ekaterina Zhuravskaya is a Professor of Economics at the Paris School of Economics (EHESS), which she joined in 2010. She is a Research Fellow of CEPR in Political Economy and Development Economics programs. She got her PhD at Harvard University in 1999 and spent 10 subsequent years working as Professor at the New Economic School and as the Academic Director of the Center for Economic and Financial Research in Moscow. Her main academic interests are in political economy, with applications to media, economic history, and institutions. She is the recipient of the Birgit Grodahl Award and CNSR Silver Medal. She also was elected a Fellow of the Econometric Society.

CHAPTER 4
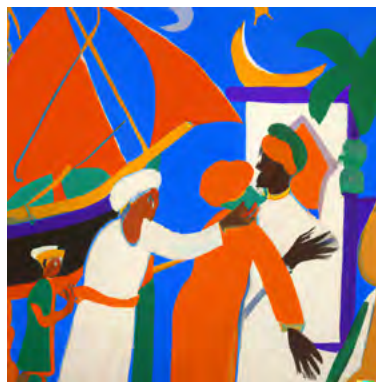
Building resilient inter-ethnic peace: Hindus and Muslims in South Asia

Saumitra Jha

Stanford Graduate School of Business and Freeman-Spogli Institute for International Affairs

A key challenge that many nations face in the 21st century is to build societies that not only are able to peacefully accommodate increasing ethnic diversity but also to leverage its potential benefits. This is not a straightforward task. Ethnically diverse communities tend to provide fewer public goods to their citizens (e.g. Alesina et al. 2004, Alesina and La Ferrara 2005) and are less likely to voice common priorities (e.g. Ban et al. 2012). With ethnic identities often coordinating political competition as well, it is perhaps not surprising that violent conflict is more likely in ethnically polarised countries and regions (e.g. Montalvo and Reynal-Querol 2005, Esteban et al. 2012, Jha 2023 and Figure 1 below). With 82.1 million people around the world forcibly displaced due to persecution and conflict in 2020,[1] and widespread economic migration, the challenge of building resilient inter-ethnic peace is one faced not only by societies that have been diverse historically but increasingly in nations and communities with less experience navigating a diverse setting.

What can economic theory, in combination with the historical experiences of these communities, tell us about the necessary conditions for resilient inter-ethnic peace, and how these can be fostered?

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1   Source: United Nations High Commissioner for Refugees (www.unhcr.org), accessed 22 February 2022.

FIGURE 1   VIOLENT CLASHES BETWEEN TWO ARMED GROUPS, 2018-2020
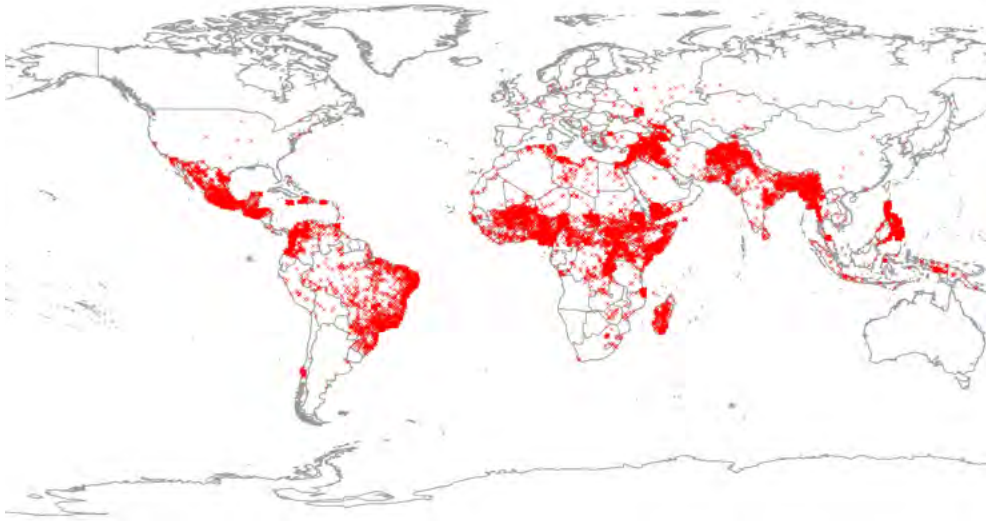
Source: Armed Conflict Location and Event Data (ACLED) and Jha (2023).

The very process of moving to a mixed location means that individuals from different ethnic backgrounds, though now living side-by-side, often bring with them different endowments – knowledge, networks or other resources – that can both influence their relative mobility and shape their economic opportunities as well. It is true that ethnic identities often coordinate both economic and political competition, and in turn such competition often renders ethnic identities more salient (e.g. Olzak 1992, Posner 2004, Jha 2014). But members of different ethnic groups can also bring their complementary skills and endowments to the table as well. When can such inter-ethnic trade provide a path to resilient peace, and when does it fail?

THE CONDITIONS FOR RESILIENT INTER-ETHNIC PEACE

In a series of papers (Jha 2007, 2013, 2018, 2023, Diaz-Cayeros and Jha 2017, Diaz-Cayeros et al. 2022), I provide evidence for a simple model for understanding the conditions that can support inter-ethnic peace over time even when one group starts off highly *vulnerable to violence* (i.e. lacking resources to defend itself through physical force). I distinguish between cases with vulnerable local (*indigenous*) and non-local (e.g. *immigrant*) groups, who differ in their relative mobility. For example, indigenous groups, with their knowledge, skills and networks concentrated locally, may find leaving a location more costly than for immigrant groups, who may have retained endowments and ties in other places. I consider a setting, where, every period, individuals in each group can choose to leave, to produce and trade a good if they stay, and then choose whether or not to target another with violence. Violence is costly and risky but can be used to seize the target's profits or to punish actions.

I show that even when one group is extremely vulnerable to violence, *peaceful co-existence* is still possible over long periods of time.[2] But this requires three conditions. First, members of ethnic groups need to be able to produce goods and services that complement each other rather than competing with each other. Second, the source of the inter-ethnic complementarity needs to be costly to simply seize or copy. Finally, over time, the vulnerable group has to enjoy sufficiently good outside options or work in an activity that is difficult to precisely monitor, so that they can credibly threaten to leave or not produce if targeted with violence.

To understand why, suppose that instead of producing complements, ethnic groups do compete. Then the strong will have an incentive to attack the weak, not just to steal their profits but also to try to induce them to stop producing or to leave, thereby reducing the future competition they face. Note that simple inter-ethnic contact among those living side-by-side *does not* solve this problem over time. In fact, the longer the strong expect the weak to remain, the *greater* the gains from getting rid of their future competition.

Second the source of the inter-ethnic complementarity needs to be hard to steal or replicate. If it comes from land, wealth, machines or other endowments that are easy to simply seize, strong individuals will have incentives to do just that. Skills and knowhow, being intangible, are naturally impossible to steal, but can be potentially replicated over time as well. This is particularly true of low-skilled activities that are easy to enter.

In contrast, trading networks are intangible, thus impossible to steal, and when the networks become large are difficult to replicate. Similarly, as I illustrate below, other types of specialised skills and organisations developed by some ethnic groups can also be difficult to copy by others. These can provide robust sources of complementarity.

Yet, even with such complementarity, there may be incentives for violence: instead of the strong seeking to expropriate, replicate and then get rid of vulnerable competitors, now they have incentives to *coerce vulnerable groups into producing* their valuable complementary good, and if the niche they occupy becomes too lucrative, to target them with violence to seize the resultant wealth. Indeed, the histories of Latin America, the Caribbean and sub-Saharan Africa, in particular, contain many examples where new access to trade has led to vulnerable indigenous groups facing violence and forced labour instead (e.g. Nunn 2008, Dell 2010, Bobonis and Morrow 2014, Diaz-Cayeros et al. 2022). Elsewhere, non-local trading minorities, rather than enjoying robust peace, have often been the targets of violence and expropriation instead. This is particularly the case in periods of political instability when local dictators and others for whom violence is cheap care more about extracting income than about potential future losses of trade (e.g. Chua 2003, Grosfeld et al. 2020).

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2   Formally, by a peaceful coexistence equilibrium, I mean a subgame perfect Nash equilibrium where there exists there are mixed populations, no one has an incentive to leave, everyone produces, and there are no incentives for violence.

Thus, vulnerable group members need to be able to credibly threaten to withhold their complementary production in order to deter attempts to coerce them through the threat of violence. As their mobility improves – as can be the case for trading minorities as their networks expand or immigration barriers elsewhere fall – vulnerable non-local groups can deter attempts to coerce them through the threat of violence by themselves credibly threatening to leave, taking the joint gains from trade with them. However, for less mobile groups, including many indigenous communities, leaving is often less of an option and deterring coercive violence that much harder. One avenue that remains is to provide complementary goods whose production is difficult to monitor and therefore to coerce (Diaz-Cayeros and Jha 2017, Jha 2018).

The conditions above not only ensure robust potential gains from inter-ethnic trade but also that the strong prefer to cooperate with, rather than coerce, the weak. Further, such conditions not only mitigate the incentives for violence, they also generate incentives for members of both strong and vulnerable groups to make mutual investments in further complementary *institutions* to reinforce the incentives for peace over time.

Though they share a common logic, these institutions have historically taken a number of forms, all of which provide useful clues for contemporary policy. One often crucial supporting set of institutions are those that facilitate non-violent means to share the gains from trade and peace between and within groups. This role has been played in some places by joint political decision making, in others by businesses that internalise the gains from peace, and still others by explicitly religious organisations. Other complementary organizations insure against negative shocks and coordinate the development of norms and beliefs supporting trust, trustworthiness, and continued complementarity in new areas. Such institutions can persist and support resilient inter-ethnic peace even if the initial source of inter-ethnic complementarity – for example, in overseas trade – has been undermined over time (e.g. Milgrom and Roberts 1990, Milgrom et al. 1991, Jha 2013).[3]

TESTING THE CONDITIONS: HINDUS AND MUSLIMS IN SOUTH ASIA

One useful environment to test the importance of these conditions is the history of Hindu and Muslim relations in South Asia. South Asia has a rich history of cultural diversity and houses the largest population of Muslims in the world, yet Muslims are still a minority overall. That history has been punctuated by waves of terrible religious violence, including in the 21st century. In February 2002, a railway carriage carrying Hindu activists caught fire in the town of Godhra in the affluent western Indian state of Gujarat, killing more than 58 people. This led to a wave of Hindu–Muslim rioting in the state, with close to a thousand killed and 98,000 forced to flee their homes (Jha 2014).

3 On institutions as sets of beliefs, norms and organisations that induce regularities of behaviour and evolve over time, see Greif (2005) and Greif and Laitin (2004).

Gujarat was the home state of Mahatma Gandhi and has long traditions of *ahimsa*, or non-violence. Yet there was widespread religious rioting in erstwhile medieval capitals, mint towns and other places where, historically, Hindus and Muslims competed for political and economic patronage (Jha 2014). In contrast, Gujarati medieval ports, like Surat and Gandhi's own hometown of Porbandar, where Hindus and Muslims enjoyed centuries of robust inter-ethnic complementarity in overseas trade, the violence was much more muted, and they remained 'oases of peace' despite often having larger Muslim minorities (see Figure 2a). Snap state elections were called by the incumbent Bharatiya Janata Party (BJP) state government just three months after the riots subsided. The BJP gained ten seats with a 4.84 percentage point *increase* in its vote across the state, despite (or in the eyes of some, because of) their failure to check the ethnic violence. In sharp contrast, in medieval ports voters *swung away* from the BJP by 6.28 percentage points, despite the fact that the BJP had previously enjoyed a majority in many of those constituencies in the 1998 elections (Jha 2014, see also Figure 2b).

Why were Porbandar, Surat and other Gujarati medieval port towns different? It turns out that they, and other medieval ports in the Indian Ocean, satisfied the three conditions for resilient inter-ethnic peace between Muslims and non-Muslims outlined above. Medieval overseas trade in the Indian Ocean was largely coordinated by Muslim pilgrimage routes, particularly the Hajj, which meant that for one month a year, for close to a thousand years, Mecca became one of the largest markets in the world. And one had to be a Muslim to go to Mecca. This created a Muslim-specific advantage in overseas trade that was highly complementary to local production. As a trading network it was naturally intangible, so impossible to seize, and given the immense scale of the Hajj, very difficult for others to replicate. These Muslim traders were highly mobile and came to dominant overseas trade in the Indian Ocean in the medieval period, with trading outposts not only along all of South Asia's coasts, but also those of East Africa and Southeast Asia, reaching as far as China (Jha 2013).

They also benefited from a decentralised means of sharing the gains from trade. Unlike many ethnic trading networks, which are hard to enter for non-members, entry into trade was relatively easy for any Muslim simply by following the pilgrimage routes, and whenever prices were high for goods and services from the Middle East, conversion and immigration generated sufficient competition within Muslim groups that the gains from trade were shared relatively equitably with locals as well. Indeed, contemporaries, such as Sheikh Zayn-al-din al-Malibari, writing in 1528, noted both the presence of the inter-ethnic complementarity in trade and the "remarkable" nature of the tolerance Muslims had enjoyed in these ports.[4]

4   In *Tohfat-ul-Mujahideen* ("Gift to the Holy Warrior" – as its name suggests, not a treatise on peace), al-Malibari (1528) writes: "Now in all these [Malabari ports] the population became much increased and the number of buildings enlarged, by means of the trade carried on by the Mahomedans, towards whom the chieftains of those places abstained from all oppression; and, notwithstanding that these rulers and their troops were all pagans, they paid much regard to their prejudices and customs, and avoided any act of aggression on the Mahomedans, except on some extraordinary provocation; this amicable footing being the more remarkable, from the circumstance of the Mahomedans not forming a tenth part of the population . . ." (p. 17).

FIGURE 2   HINDU-MUSLIM RIOTS IN GUJARAT, FEBRUARY-APRIL 2002, AND PRE-RIOT (1998, TOP) AND POST-RIOT (JULY 2002, BOTTOM) LEGISLATIVE ELECTION SEAT WINNERS
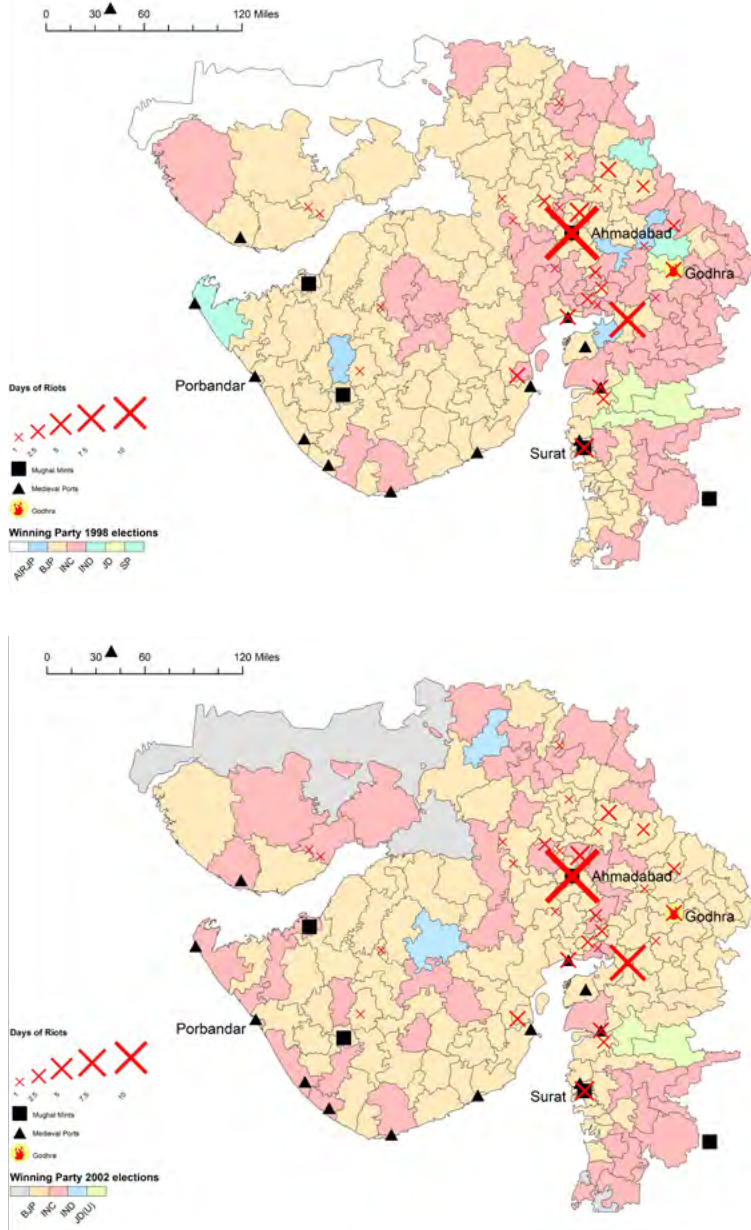
Source: Jha (2014).

Due to intense cyclonic activity, inlets that could provide sheltered natural harbours to sailing ships were heavily favoured as locations for these medieval ports, and such natural harbours competed with one another to attract the highly mobile Muslim traders (see Figure 3a). The monsoon rains also force large amounts of silt down the mouths of such

inlets. Some – like Mahad, named for the 'Great Market' that once existed there, and even the main Mughal Hajj port Surat itself – would silt up and cease to be directly accessible to overseas trade (Figure 3b). Muslim trade advantages further diminished with European colonisation, with concerted efforts by the Portuguese, Dutch and the English to divert trade beginning in the 16th century. Yet, beliefs, norms and organisations supporting tolerance continued to persist in the medieval port towns (Jha 2013).[5]

For example, Gandhi would recount his upbringing in the medieval port of Porbandar as an important influence on his non-violent beliefs, citing in particular his mother's temple. She was of the Pranami sect, founded in the medieval port of Jamnagar and known for keeping Korans within their temples and for fostering active discussions about the common ground between religions.

FIGURE 3

A) A navigators' map (portolan) by Portuguese cartographer, Diogo Homem, ca. 1559, emphasises the natural harbours connected by trade and pilgrimage routes in the Indian Ocean

B) Competing medieval ports emerged at these sheltered inlets on India's coasts and elsewhere to tap both coastal and trans-oceanic trade
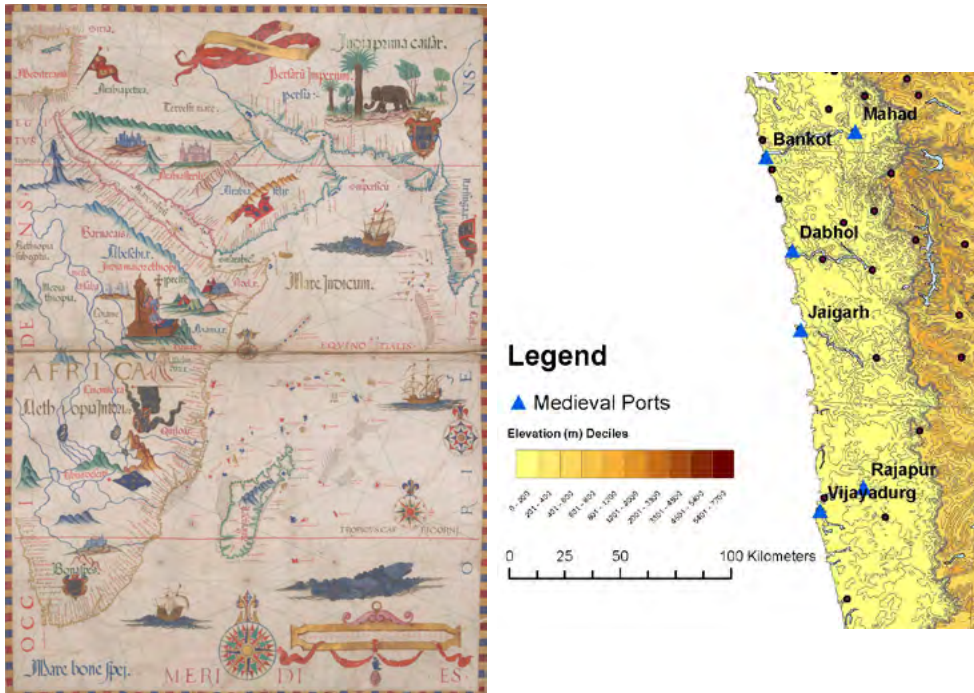
Source: The British Library digital collections, now in the public domain.

Norms also emerged to reinforce the incentives for inter-ethnic trade, particularly as Muslim advantages began to erode. Hindus in medieval ports adopted a custom called *kala pani* (black water), whereby any Hindu who sailed overseas (i.e. in competition with Muslims) would lose their caste and be subject to ostracism by other Hindus.

Organisations also emerged to share the gains from trade and ensure against shocks. Members of Muslim trading communities engaged in local philanthropic endeavours, including dispensaries and sponsoring relief efforts in response to cyclones. On the Coromandel coast, Muslims even endowed Hindu temples. Local peace committees and joint political delegations formed in other ports in times of crisis as well (Varshney 2002, Jha 2013). To this day, in some communities, like the Daudi Bohras and the Ismailis, religious authorities encourage and help facilitate members seeking to enter businesses and create joint ventures with locals in new but complementary areas (Penrad 2000, Blank 2001, Jha 2013).

These institutional legacies have had measurable and large effects on peace. In Jha (2013), I measure the causal effects of robust historical inter-ethnic complementarities on contemporary ethnic violence by using small medieval-era natural harbourages that subsequently silted up as a natural experiment – an exogenous factor that drove the location of robust inter-ethnic complementarities in trade that is specific to the medieval period. I show that medieval ports experienced around five times fewer riots on average between 1850 and 1950 (see also Figure 3a). However, medieval ports were on average poorer and more mixed populations; these are factors generally associated with more rather than less ethnic violence.

Further, and in contrast, medieval mint towns, despite also being historically wealthy but where skilled Hindu and Muslim artisans competed for patronage, experienced twice as many riots as otherwise similar towns in the colonial period. Colonial-era ports, founded after Muslim advantages had eroded, and towns on internal trade routes, which could be replicated, also did not benefit from increased tolerance.

Such differences in peace and conflict have also proven to be resilient. Peaceful coexistence in medieval ports mostly survived the wave of Hindu–Muslim riots that followed the failure of South Asia's first major mass political movement (the Khilafat/ Non-Cooperation movement of 1919–1922, Figure 4a), which saw the first breakdown of tolerance in other towns (Figure 5, see also Bhavnani and Jha 2022). Districts with medieval ports were also less likely to witness ethnic cleansing of their religious minorities during the Partition of South Asia, one of the greatest forced migrations in world history (Figure 4b and Jha and Wilkinson 2012).

FIGURE 4A   MEDIEVAL TOWNS AND COLONIAL-ERA HINDU–MUSLIM RIOTS BEFORE (1850-1920) AND AFTER (1922-1950) THE KHILAFAT/NON-COOPERATION MOVEMENT
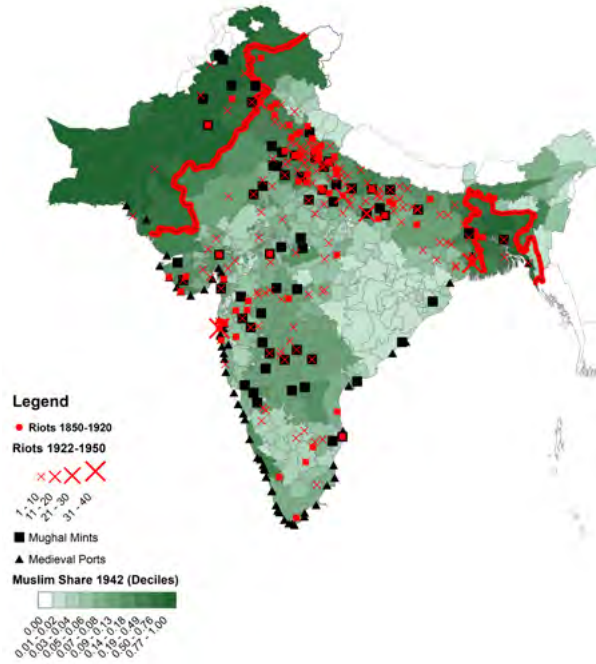
FIGURE 4B   RIOTS IN INDEPENDENT INDIA, 1950-1995 AND 1995-2019
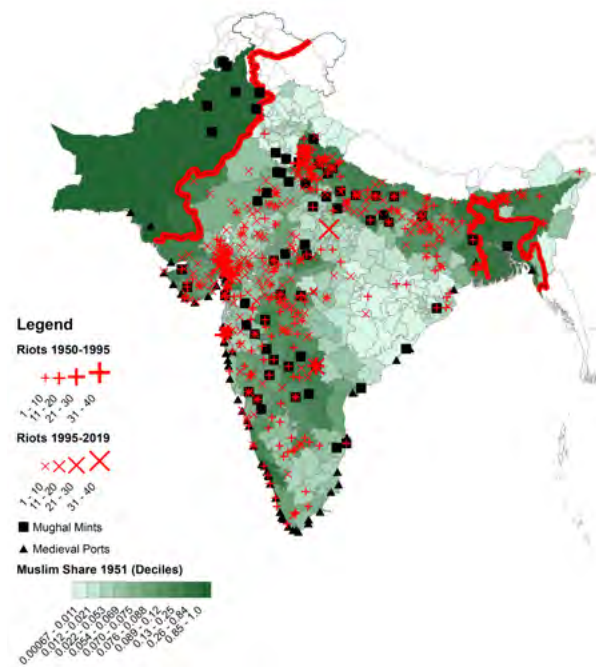
Sources: Wilkinson (2004), Varshney and Wilkinson (2004), Jha (2013) and Ahmed et al. (2022).

Since independence, these differences have persisted over time, though some medieval ports have succumbed to their first breakdown of peaceful coexistence (Figures 4b and 5). This appears to have accelerated following the oil shocks of the 1970s, which were followed by an inflow of resources for less-homegrown institutions coming from the Middle East. However, riots have remained less frequent and intense in medieval port towns. Further, into the 21st century, household surveys show that relative to other urban Muslims, those in medieval ports are less likely to report violence in their communities, reveal smaller wealth gaps with Hindus and continue to be more specialised in trading relationships. Unlike other urban Muslims, they were as likely as Hindus to vaccinate their sons against polio, a useful indicator of trust in an environment where vaccinations have often been viewed with fear (Jha 2013).

FIGURE 5   THE SURVIVAL OF ETHNIC TOLERANCE: KAPLAN-MEIER PLOTS OF THE PROPORTIONS OF MEDIEVAL PORTS AND OTHER SOUTH ASIAN TOWNS SURVIVING WITHOUT ANY HINDU-MUSLIM RIOTS BETWEEN 1850 AND 1995
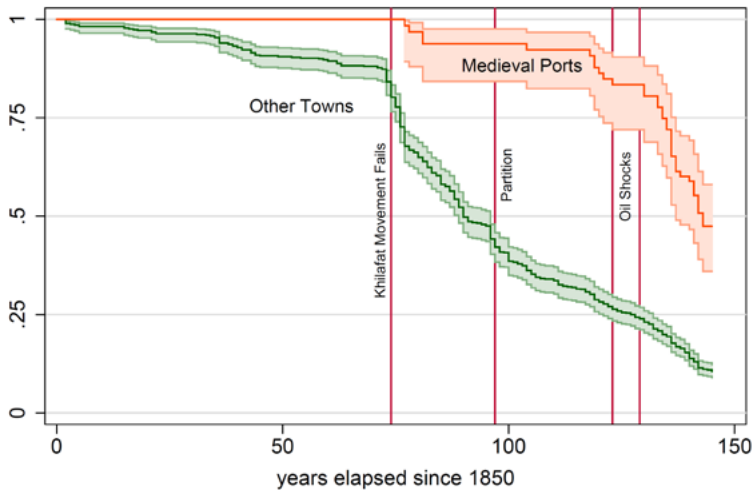
Source: Jha (2013).

OTHER SETTINGS

Inter-ethnic complementarities appear to have had historically similar effects in mitigating pogroms and violence faced by other vulnerable minorities as well, including Jews in Salonica and elsewhere in Europe (Benbassa and Rodrigue 2000, Mazower 2005, Jha 2018, Becker and Pascali 2019, Grosfeld et al. 2020). In Mexico, indigenous communities producing cochineal, a highly fragile, indigenously domesticated insect that was the finest known source of red dye for centuries, were five times more likely to survive the years that followed the devastating European conquest of Mexico (Diaz-Cayeros et al. 2022) and continue to benefit from better development outcomes to this

day (Diaz-Cayeros and Jha 2017). Cochineal-producing communities also satisfied our conditions: cochineal was the most valued processed good in New Spain, its fragility made it difficult to transplant, and it required careful attention and skill that was hard to monitor (Diaz-Cayeros and Jha 2017). In contrast, among pastoralist and cultivator communities in sub-Saharan Africa, historical complementarities in the timing of grazing patterns are now being disrupted by climate change, leading to increasing conflict (McGuirk and Nunn 2021).

CONCLUDING REMARKS

Building resilient inter-ethnic peace is not easy. Yet, throughout history, organisations have been created to support tolerance that can provide useful insights into how it can be done. Alongside power-sharing approaches (Mueller and Rohner 2018), other methods that have been employed include the creation of institutionalised mechanisms to facilitate the nonviolent sharing of the gains from peaceful exchange and the fostering of joint business organisations based upon the existing complementary skills and opportunities of groups.

A number of these approaches may yield dividends for ethnic tolerance, particularly when combined with 21st century technologies. For example, if designed to align incentives and encourage learning, modern financial approaches can be effective in empowering citizens while sharing the gains from, and raising support for, peace (Jha 2012, Jha and Shayo 2017, 2021, Jha et al. in progress). Organisations that match members of different communities with complementary skills in the creation of joint business ventures may also be effective in improving ethnic relations.[6] The challenge of building resilient inter-ethnic peace goes far back in history, but so too do potential solutions.

REFERENCES

Ahmed, R, S Jha, D Rohner, A Saia, and E Zhuravskaya (2022), "A New Dataset on Hindu-Muslim Violence, 1950 to 2019", mimeo.

Alesina, A and E La Ferrara (2005), "Ethnic diversity and economic performance", *Journal of Economic Literature* 43(3): 762–800.

Alesina, A, R Baqir and C Hoxby (2004), "Political jurisdictions in heterogeneous communities", *Journal of Political Economy* 112(2): 348–395.

al-Malibari, Z D (1528), *Tohfat-ul-Mujahideen*, translated by M.J. Rowlandson [1833].

6   See, for example, Penrad (2000) on the Ismaili Industrial Promotion Services in Africa and Jha (2018) for a description of the activities of Business Alternatives of Peace and Reconciliation, an NGO founded by Stanford Sloan Fellow Vivek Garg to leverage artisanal designs from conflictual groups in Manipur in northeast India.

Becker, S O and L Pascali, (2019), "Religion, Division of Labor, and Conflict: Antisemitism in Germany over 600 Years", *American Economic Review* 109(5): 1764–1804.

Benbassa, E and A Rodrigue (2000), *Sephardi Jewry: a history of the Judeo-Spanish community, 14th-20th centuries*, University of California Press.

Bhavnani, R and S Jha (2022), "Broken Bridges: The Effects of India's First Nonviolent Struggle on Mass Ethnic Violence", mimeo, Stanford.

Bobonis, G J and P M Morrow (2014), "Labor coercion and the accumulation of human capital", *Journal of Development Economics* 108: 32–53.

Ban, R, S Jha and V Rao (2012), "Who Has Voice in a Deliberative Democracy? Evidence from Transcripts of Village Parliaments in South India", *Journal of Development Economics* 99: 428–438.

Blank, J (2001), *Mullahs on the Mainframe: Islam and Modernity Among the Daudi Bohras*, University of Chicago Press.

Chua, A (2003), *World on Fire: How Exporting Free Market Democracy Breeds Ethnic Hatred and Global Instability*, Doubleday.

Dasgupta, A (2004), *India and the Indian Ocean World: Trade and Politics*, Oxford University Press.

Dell, M (2010), "The Persistent Effects of Peru's Mining Mita", *Econometrica* 78(6): 1863–1903.

Diaz-Cayeros, A and S Jha (2017), "Conquered but not Vanquished: Complementarities and Indigenous Entrepreneurs in the Shadow of Violence", mimeo, Stanford.

Diaz-Cayeros, A, J Espinosa-Balbuena and S Jha (2022), "Pandemic Spikes and Broken Spears: Indigenous Resilience after the Conquest of Mexico", *Journal of Historical Political Economy* 2(1): 89–133.

Esteban, J, L Mayoral and D Ray (2012), "Ethnicity and Conflict: An Empirical Study", *American Economic Review* 102(4): 1310–1342.

Greif, A (2005), *Institutions and the path to the modern economy: lessons from medieval trade*, Cambridge University Press,.

Greif, A and D D Laitin (2004), "A theory of endogenous institutional change", *American Political Science Review* 98(4): 633–652.

Grosfeld, I, S O Sakalli and E Zhuravskaya (2020), "Middleman Minorities and Ethnic Violence: Anti-Jewish Pogroms in the Russian Empire", *The Review of Economic Studies* 87(1): 289–342.

Jha, S (2007), "Maintaining peace across ethnic lines: new lessons from the past", *Economics of Peace and Security Journal* 2(2): 89–93.

Jha, S (2012), "Sharing the Future: Financial Innovation and Innovators in Solving the Political Economy Challenges of Development", in M Aoki, G Roland and T Kuran (eds), *Institutions and Comparative Economic Development*, Proceedings of the 16th World Congress of the International Economic Association, Palgrave Macmillan.

Jha, S (2013), "Trade, Institutions and Ethnic Tolerance: Evidence from South Asia", *American Political Science Review* 107(4): 806–832

Jha, S (2014), "Unfinished Business": Historic Complementarities, Political Competition and Ethnic Violence in Gujarat", *Journal of Economic Behaviour and Organisation* 104: 18–36.

Jha, S (2018), "Trading for Peace", *Economic Policy* 33(95): 485–526.

Jha, S (2023), "Civil and Ethnic Conflict in Historical Political Economy", forthcoming in the *Oxford Handbook of Historical Political Economy.*

Jha, S and M Shayo (2019), "Valuing Peace: The Effects of Financial Market Exposure on Votes and Political Attitudes", *Econometrica* 86(5): 1561–1588.

Jha, S and M Shayo (2021), "Trading Stocks Builds Financial Confidence and Compresses the Gender Gap", Stanford GSB Working Paper No. 3673.

Jha, S and S Wilkinson (2012), "Does Combat Experience Foster Organizational Skill? Evidence from Ethnic Cleansing during the Partition of South Asia", *American Political Science Review* 106(4): 883–907.

Jha, S, K Mitchener and M Takashima (in progress), "Swords into Bank Shares: Finance, Conflict and Political Reform in Meiji Japan".

Mazower, M (2005), *Salonica, City of Ghosts*, Alfred A. Knopf.

McGuirk, E and N Nunn (2021), "Transhumant Pastoralism, Climate Change and Conflict in Africa", NBER Working Paper No. 28243.

Milgrom, P and J Roberts (1990), "The Economics of Modern Manufacturing: Technology, Strategy and Organization", *American Economic Review* 80(3): 511–528.

Milgrom, P, Y Qian and J Roberts (1991), "Complementarities, momentum and the evolution of modern manufacturing", *American Economic Review: Papers and Proceedings* 81(2): 84–88.

Montalvo, J G and M Reynal-Querol (2005), "Ethnic polarization, potential conflict and civil wars", *American Economic Review* 95(3): 796–816.

Mueller, H and D Rohner (2018), "Can power-sharing foster peace? Evidence from Northern Ireland", *Economic Policy* 33(95): 447–484.

Nunn, N (2008), "The Long-Term Effects of Africa's Slave Trades", *Quarterly Journal of Economics* 123(1): 139–176.

Olzak, S (1992), The dynamics of ethnic competition and conflict, Stanford University Press.

Penrad, J-C (2000), "The Ismaili Presence in East Africa: A Note on its Commercial History and Community Organization", in D Lombard and A Aubin (eds), *Asian Merchants and Businessmen in the Indian Ocean and the China Sea*, Oxford University Press.

Posner, D (2004), "The Political Salience of Cultural Difference: Why Chewas and Tumbukas Are Allies in Zambia and Adversaries in Malawi", *American Political Science Review* 98(4): 529–545.

Varshney, A (2002), Ethnic Conflict and Civic Life: Hindus and Muslims in India, Yale University Press.

Varshney, A and S I Wilkinson (2004), "Varshney Wilkinson Dataset on Hindu-Muslim Violence in India, Version 2", Inter-university Consortium for Political and Social Research.

Wilkinson, S I (2004), *Votes and Violence: Electoral Competition and Ethnic Riots in India*, Cambridge University Press.

ABOUT THE AUTHOR

Saumitra Jha does research on economic, financial and organsational approaches to mitigating political polarisation and conflict. He is an Associate Professor of Political Economy at Stanford's Graduate School of Business, a Senior Fellow at both the Freeman-Spogli Institute for International Affairs and the Stanford Institute for Economic Policy Research, a Faculty Fellow at the Center for Advanced Study in the Behavioral Sciences and convenes the Stanford Conflict and Polarization Lab. Jha holds a BA *summa cum laude* from Williams College, Master's degrees in Economics and Mathematics from the University of Cambridge, and a PhD in Economics from Stanford University.

CHAPTER 5

Building trust, not bombs: Micro-foundations of contact theory

Dominic Rohner,[ac] **Mathias Thoenig**[ac] **and Fabrizio Zilibotti**[bc]
[a]University of Lausanne; [b]Yale University; [c]CEPR

1 INTRODUCTION

Successful nation building requires the building of trust and tolerance between different groups and communities and some common identity. One key hypothesis in social science is that social interactions may foster tolerance and hence contribute to the foundations of nation building. This hypothesis was formulated in the 1950s by Gordon Allport (e.g. Allport 1954) and has been dubbed the 'contact hypothesis' in psychology. A succinct definition on the website of the American Psychological Association states that, according to this hypothesis, "contact between two groups can promote tolerance and acceptance, but only under certain conditions, such as equal status among groups and common goals".[1] Pettigrew and Tropp (2006) performed a meta-analysis, drawing on 713 independent samples from 515 studies, and found that, on average, intergroup contact decreases intergroup prejudice.

In what follows, we will offer a synthesis of our recent game-theoretic model providing micro-foundations for the 'contact hypothesis' and linking it to the drivers of conflict persistence and war traps (Section 2). Section 3 then confronts these insights with recent empirical results in economics, while Section 4 concludes.

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1   See www.apa.org/monitor/nov01/contact.

2 THE THEORY

In this section, we provide a concise description of Rohner et al. (2013b). In our theory, asymmetric information and lack of intergroup trust are the culprits for the onset of civil wars. The channel for the two-way links between trust and conflict (and vice versa) is intergroup trade. On the one hand, conflict harms business relationships between the rival factions. Thus, ongoing thriving trade relations between two groups prevent conflict by raising its opportunity cost. On the other hand, trust is a pre-requisite for engaging in intergroup business, as economic partnerships often extend beyond spot transactions and it is not possible to cover all future contingencies in encompassing contracts. Hence, higher levels of trust reduce the risk of war by fostering intergroup trade.

These ideas are formalised in a dynamic model where individuals belong to two opposing groups. People are bilaterally randomly matched with members of the other group and face the opportunity to engage in trade. Propensities to cooperate are heterogeneous across individuals and groups; even within a match, they are imperfectly observed. Agents use public information related to the history of violence to update their beliefs about the expected willingness to trade and trustworthiness of their potential trade partner. This information is transmitted across generations.

Finally, groups can wage conflict against each other. This causes an immediate trade disruption.

In addition, there is also a persistent reputational cost of perpetrating aggression: war plants the seeds of future distrust! In particular, waging war today undermines the future trust of the victimised group, which perceives the attack as a signal that the aggressor has a low propensity for cooperative business. By depleting future trust, war today makes war tomorrow more likely.

This setting yields a series of important testable predictions for real-world situations. First of all, civil wars are persistent and each outbreak of conflict fuels the war risk in future periods. Further, the theory predicts a negative correlation between trust and conflict, with causation running both ways. Beliefs turn more pessimistic after an aggression and the lack of trust hampers business relationships. In turn, this reduces the opportunity cost of aggression making war more likely. Path dependency plays a key role in our framework (as in, for example, Acemoglu and Zilibotti 1997). We allow for 'accidental wars' triggered by negative (possibly irrational) shocks to occasionally occur, even when the fundamentals of the intergroup relations are 'good', i.e. the groups have an intrinsically high propensity to cooperate (and would cooperate under perfect information). Yet, the endogenous process of belief updating may lead to so much 'pessimism' that peace breaks down irreversibly. We call such a situation a 'war trap'.

In mathematical terms, war traps are absorbing states. In plain words, as intergroup relationships fall in the war trap zone, war is endemic and intergroup business is dismal even in times of peace.[2]

In terms of policy implications, our theory provides foundations to the contact hypothesis. To the extent that conditions of interaction are broadly favourable, then greater business (and non-business) links have the potential to build trust, foster trade and hence attenuate future conflict risks. Furthermore, policies facilitating intergroup business can result in 'virtuous cycles'. Specifically, promoting the knowledge of several national languages can champion intergroup contact and business. Such policies lead to the 'double dividend' of promoting both prosperity and peace (e.g. Rohner and Thoenig 2021). Related to this, rule of law, democratic institutions and inclusive governance reduce the incentives for 'cheating' and engaging in conflict alike, which can foster rational belief updating towards more intergroup trust.[3]

Importantly, to be sustainable and effective in the long run, pacification policies need to result in belief updating towards a more positive view of the other groups. While, for example, peacekeeping interventions that keep groups apart can save many lives in the short run (see the survey in Rohner forthcoming), 'gluing' the country together in the long run requires some level of interaction, so that intergroup trust can be built. In this respect, policies promoting intergroup tolerance and empathy and 'positive' beliefs about the other group can be useful. This may include publicising 'success stories' of successful and peaceful intergroup interaction/business relationships. Similarly, laws banning hate speech can be productive.

In what follows, we shall confront the main features, implications and predictions of this model with existing empirical evidence.

3 EMPIRICAL EVIDENCE

As discussed above, our theory predicts that unfortunate dynamics can lead intergroup relations into a war trap where conflicts are common and persistent. This prediction is in line with a well-developed empirical literature highlighting substantial risks of conflict recurrence and enduring rivalries (e.g. Collier and Hoeffler 2004, DeRouen Jr and Bercovitch 2008).

When it comes to the negative association between conflict and trust, the literature is less clear-cut. A series of articles have highlighted that, in some contexts. war exposure can foster civil involvement and social capital (e.g. Bellows and Miguel 2009 for Sierra Leone, Blattman 2009 for Uganda, Voors et al. 2012 for Burundi, as well as the survey by Bauer et al. 2016). Some of the findings are not easy to interpret, as when individual

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2   In an extension of our model, war cycles – alternating recurrent wars and peaceful spells – can occur. On war cycles, see also the related paper by Acemoglu and Wolitzky (2014).
3   See recent work highlighting the pacifying impact of democracy (Marcucci et al. 2022, Laurent-Lucchetti et al. forthcoming).

variation is exploited selection bias may be an issue, and outcome variables such as political participation can be interpreted as higher general social capital, while higher political participation in contexts of ethnically polarised politics can also reflect greater divisiveness. In contrast to the above results, several recent studies have found that intergroup trust or generalised trust decreases in the aftermath of a conflict (e.g. Rohner et al. 2013a for Uganda, Cassar et al. 2013 for Tajikistan, De Juan and Pierskalla 2016 for Nepal, Kijewski and Freitag 2018 for Kosovo, Conzo and Salustri 2019 for World War II).[4] Some of these share the methodological issues highlighted above, while others exploit arguably exogenous variation in exposure and are able to draw on data measuring specific forms of within- versus between-group trust.

Another relevant strand of the empirical literature studies the nexus between trade and conflict. In line with our model, there is evidence that, at least for bilateral business links, more trade is associated with a reduction in conflict risk (Polachek 1980, Martin et al. 2008, Gallea and Rohner 2021).

Last but not least, there is a growing literature using randomised control trials to manipulate patterns of intergroup contact. Among others, Cilliers et al. (2016) show that reconciliation ceremonies can foster intergroup trust, while Mousa (2020) finds that mixed football teams can build inter-religious 'bridges'.

While overall the model matches stylised facts quite well, some caveats are in order. First, more interaction can backfire in the context of negative belief manipulation or hate speech. For example, DellaVigna et al. (2014), featured in Chapter 17 of this eBook, find that nationalistic cross-border radio – if anything – exacerbates tensions. Second, geographical proximity does not only foster interaction but can, in the case of conflict outbreaks, also bear military risks. As found by Mueller et al. (2022), greater spatial proximity of ethnic groups is associated with more violence.

4 CONCLUSION

In this short contribution, we have highlighted a theory that provides micro-foundations to the influential contact hypothesis. Geographical proximity on its own is not a sufficient condition for building trust and business partnerships between groups. The construction of intergroup ties is a subtle process nourished by thriving and peaceful past interactions. Given its capital role in successful nation-building, understanding the process of trust building is key. Importantly, wise policy decisions can help. When sound rule of law and democratic institutions make 'cheating' and conflict behaviour less attractive, rational beliefs will filter in the lower likelihood of 'bad fundamentals', i.e. a dismal general propensity for cooperation is deemed less likely. Similarly, stepping up investments in

4   Kibris and Gerling (2021) find heterogeneous effects, depending on individual combat experiences.

human capital – for example, promoting the knowledge of several national languages – can contribute to promoting peaceful intergroup interaction, which ultimately leads to virtuous cycles of greater trust, trade and peace.

REFERENCES

Acemoglu, D and A Wolitzky (2014), "Cycles of conflict: An economic model", *American Economic Review* 104(4): 1350–1367.

Acemoglu, D and F Zilibotti (1997), "Was Prometheus unbound by chance? Risk, diversification, and growth", *Journal of Political Economy* 105(4): 709–751.

Allport, G W (1954), *The Nature of Prejudice*, Addison-Wesley.

Bauer, M, C Blattman, J Chytilová, J Henrich, E Miguel and T Mitts (2016), "Can war foster cooperation?", *Journal of Economic Perspectives* 30(3): 249–274.

Bellows, J and E Miguel (2009), "War and local collective action in Sierra Leone", *Journal of Public Economics* 93(11-12): 1144–1157.

Blattman, C (2009), "From violence to voting: War and political participation in Uganda", *American Political Science Review* 103(2): 231–247.

Cassar, A, P Grosjean and S Whitt (2013), "Legacies of violence: trust and market development", *Journal of Economic Growth* 18(3): 285–318.

Cilliers, J, O Dube and B Siddiqi (2016), "Reconciling after civil conflict increases social capital but decreases individual well-being", *Science* 352(6287): 787–794.

Collier, P and A Hoeffler (2004), "Greed and grievance in civil war", *Oxford Economic Papers* 56(4): 563–595.

Conzo, P and F Salustri (2019), "A war is forever: The long-run effects of early exposure to World War II on trust", *European Economic Review* 120, 103313.

De Juan, A and J H Pierskalla (2016), "Civil war violence and political trust: Microlevel evidence from Nepal", *Conflict Management and Peace Science* 33(1): 67–88.

DellaVigna, S, R Enikolopov, V Mironova, M Petrova and E Zhuravskaya (2014), "Cross-border media and nationalism: Evidence from Serbian radio in Croatia", *American Economic Journal: Applied Economics* 6(3): 103–132.

DeRouen Jr, K R and J Bercovitch (2008), "Enduring internal rivalries: A new framework for the study of civil war", J*ournal of Peace Research* 45(1): 55–74.

Gallea, Q and D Rohner (2021), "Globalization mitigates the risk of conflict caused by strategic territory", *Proceedings of the National Academy of Sciences* 118(39): e2105624118.

Kibris, A and L Gerling (2021), "Armed conflict exposure and trust: Evidence from a natural experiment in Turkey", HiCN Working Paper Series 2021(363).

Kijewski, S and M Freitag (2018), "Civil war and the formation of social trust in Kosovo: Post-traumatic growth or war-related distress?", *Journal of Conflict Resolution* 62(4): 717–742.

Laurent-Lucchetti, J, D Rohner and M Thoenig (forthcoming), "Ethnic conflicts and the informational dividend of democracy", *Journal of the European Economic Association*.

Marcucci, A, D Rohner and A Saia (2020), "Ballot or bullet: The impact of the UK's Representation of the People Act on peace and prosperity", *The Economic Journal*, ueac092.

Martin, P, T Mayer and M Thoenig (2008), " Make trade not war?", *The Review of Economic Studies* 75(3): 865–900.

Mousa, S (2020), "Building social cohesion between Christians and Muslims through soccer in post-Isis Iraq", *Science* 369(6505): 866–870.

Mueller, H, D Rohner and D Schönholzer (2022), "Ethnic violence across space", *The Economic Journal* 132(642): 709–740.

Pettigrew, T F and L R Tropp (2006), "A meta-analytic test of intergroup contact theory", *Journal of Personality and Social Psychology* 90(5): 751.

Polachek, S W (1980), "Conflict and trade", *Journal of Conflict Resolution* 24(1): 55–78.

Rohner, D (forthcoming), "Mediation, military and money: The promises and pitfalls of outside interventions to end armed conflicts", *Journal of Economic Literature*.

Rohner, D and M Thoenig (2021), "The elusive peace dividend of development policy: From war traps to macro-complementarities", *Annual Review of Economics* 13: 111–131.

Rohner, D, M Thoenig, M and F Zilibotti (2013a), "Seeds of distrust: Conflict in Uganda", *Journal of Economic Growth* 18(3): 217–252.

Rohner, D, M Thoenig and F Zilibotti (2013b), "War signals: A theory of trade, trust, and conflict", *Review of Economic Studies* 80(3): 1114–1147.

Voors, M J, E E Nillesen, P Verwimp, E H Bulte, R Lensink and D P Van Soest (2012), "Violent conflict and behavior: A field experiment in Burundi", *American Economic Review* 102(2): 941–964.

ABOUT THE AUTHORS

Dominic Rohner is a Professor of Economics at the Faculty of Business and Economics (HEC) of the University of Lausanne. He is a Research Fellow of CEPR, CESifo, OxCarre and HiCN. His research focuses on political and development economics and has won

several prizes, such as for example the KfW Development Bank Excellence Award or the SNIS International Geneva Award. He has held a Starting Grant of the European Research Council (ERC) investigating "Policies for Peace" and is an Associate Editor at the *Economic Journal*. He is also the leader of the CEPR Research and Policy Network (RPN) on Preventing Conflict. He has published papers in various international journals, including, among others: *American Economic Review, Econometrica, Journal of Political Economy, Quarterly Journal of Economics* and *Review of Economic Studies*. He holds a PhD in Economics from the University of Cambridge.

Mathias Thoenig is the PPE Centenary Visiting Professor at University of Oxford and a Professor of Economics at University of Lausanne. He is a Research Fellow at CEPR and IMD Business School. His research focuses on development, international trade and political economy. He has been awarded an ERC Grant for his work on ethnic conflicts. He has held appointments at International Monetary Fund, MIT, Queen Mary University of London, SciencesPo Paris, University of British Columbia and University Pompeu Fabra. He has published and forthcoming papers in, among others, *American Economic Review, Econometrica, Quarterly Journal of Economics, Review of Economic Studies*. He holds a Ph.D. from University Paris Sorbonne and a B.A. in engineering from Ecole Polytechnique.

Fabrizio Zilibotti is Tuntex Professor of International and Development Economics in the Department of Economics at Yale University. He earned a Laurea in Political Science at the Università di Bologna (1989) and a Ph.D. (1994) of Economics at the London School of Economics. He holds a Honorary Master of Arts degree (M.A., privatim) from Yale University. He is a former professor at Universitat Pompeu Fabra, University College London, Stockholm University, and the University of Zurich. He is a Fellow of the Econometric Society, EEA, CEPR and CESifo. He was the President of the European Economic Association in 2016. He has served in several editorial positions including co-editor of *Econometrica* (2016-19), chief editor of the *Journal of the European Economic Association* (2009-14), and director and managing editor of the *Review of Economic Studies* (2002-06). His research interests include macroeconomics, economic growth and development, family economics, and the economic development of China. He has published articles in many international journals, among them, *American Economic Review, Econometrica, Journal of Political Economy, Quarterly Journal of Economics*, and *Review of Economic Studies*.

CHAPTER 6

Building nations through internal mobility: Evidence from Spanish conscripts

Julio Cáceres-Delpiano,[a] Antoni-Italo De Moragas,[b] Gabriel Facchini[c] and Ignacio González[d]

[a]Universidad Carlos III de Madrid; [b]CUNEF; [c]Royal Holloway University of London; [d]American University

1 INTRODUCTION

According to Anderson (1983), nations are imagined communities as they are characterised by a sense of communion between people who do not know each other but who see themselves as members of the same collectivity. This sense of belonging comes from the mutual belief that there is a distinct history and a set of traits and attitudes, which help conform a recognisable community with similar interests and goals, regardless of the spatial and social distances between its members.

What factors contributed to the historical development of national feelings is a question that has been studied extensively across disciplines. Anderson himself emphasised the increasing importance of mass vernacular literacy and the emergence of the printing press at the end of the 18th century, which allowed people to gain the collective consciousness that modern nations would require. Relatedly, other institutions and certain events can contribute to acquiring such type of consciousness, as recent literature has shown for the case of compulsory schooling (Bandiera et al. 2018, featured in Chapter 9 of this eBook), language policies (Aspachs-Bracons et al. 2008, featured in Chapter 10) and experiences resulting in national exaltation (see Chapter 20 on Depetris-Chauvin et al. 2020).

The endeavour of building and maintaining a sense of national belonging becomes more challenging when there are persistent ethno-linguistic and regional cleavages (Desmet et al. 2012), when internal geographical mobility declines (Basso and Peri 2020) or when ethnic diversity increases due to immigration flows (Putnam 2007). Many societies face different versions of these phenomena, for which the type of institutions and policies described above might be rendered insufficient or inappropriate. The native backlash and political conflict recently experienced by countries with solid national institutions illustrates the complexity of this challenge (Gidron and Hall 2017, Rodrik 2021). This opens the door to studying alternative determinants of community building.

One potential determinant is the existence of settings that allow people with different characteristics or backgrounds to better know one another. An individual's identity is made up of different personal experiences, which can include relevant contact with members of the outgroup, potentially shaping the perception the individual has of the ingroup and the outgroup communities, as well as the boundaries between them.

If intergroup contact reduces prejudices, as postulated by the contact hypothesis (Allport 1954), contact between different groups can contribute to intergroup tolerance and mutual understanding, and even favour the formation of shared national identities – the latter being of particular importance in contexts where regional cleavages or confronting ethnic feelings are present. Our recent research shows that this might well be the case (Cáceres-Delpiano et al. 2021), which poses intergroup contact as an potential principle to guide new community-building strategies in societies where national ties are weakening.

2 INTERGROUP CONTACT AND NATIONAL IDENTITY

The contact hypothesis suggests that interaction among individuals with different backgrounds will reduce prejudices and adverse stereotyping attitudes, contributing to erasing the consciousness of difference between them (Allport 1954). Formulated in this way, the contact hypothesis seems entirely plausible. However, some theorists believe that contact between groups can also breed contempt and reinforce mistrust between groups, potentially exacerbating the consciousness of difference between them (Blumer 1958).

Given this theoretical indeterminacy, recent empirical literature has focused on testing the effects of contact in contexts characterised by different ingroup-outgroup relations. An important branch of the literature has studied the effect of contact in the context of race relations, finding results that are consistent with the contact hypothesis. For example, recent papers have shown that individuals who have contact with racial minorities are more prone to both developing future interracial interactions and having more tolerant attitudes towards minorities (Boisjoly et al. 2006, Merlino et al. 2019, Carrell et al. 2019, Bursztyn et al. 2022). Our work, instead, focuses on contact and the formation of national identities, joining an incipient literature that studies how inter-ethnic exposure contributes to nation building (Chapter 7 on Okunogbe 2018, Chapter 14

on Bazzi et al. 2019). Different to these papers, we exploit the contact induced by military service. Given the internal mobility that it usually triggers, the military is particularly well suited for studying contact and identity formation.[1]

Aware of the theoretical ambiguity of intergroup contact, Allport (1954) argued that the contact hypothesis would instead hold under four qualifying factors: (1) equal status within the context of the interaction; (2) the existence of common goals; (3) the achievement of such goals through cooperative behaviour; and (4) support from the institutional surrounding. Under such conditions, according to Allport, meaningful contact would be possible and prejudicial barriers would fall away. Because conscripts to military service hold the same status, perform common tasks and operate in a highly organisational environment, the military provided an excellent setting to test Allport's formulation of the contact hypothesis.

The military service is also well suited for the study of identity formation. This is because military service occurs during the period of an individual's life known as the impressionable years (Krosnick and Alwin 1989). This is the period of early adulthood when individuals are old enough to "really question and reflect on things", but their experiences are still "fresh contacts" (Mannheim and Kecskemeti 1936). Military service forces young individuals to leave their social group and enter a new one, usually for the first time in their lives, which helps make military service one of their more memorable experiences. These circumstances help explain why any factor affecting an individual's identity during those years might have very persistent effects. As we show below, this is consistent with our findings.

3 EVIDENCE FROM A NATURAL EXPERIMENT IN SPAIN

The biggest challenge of identifying the causal effect of intergroup contact is that contact is usually endogenous: someone with no prejudice towards other groups is more inclined to have contact with them. Therefore, observed differences in political attitudes between those individuals who had contact and those who did not might be unrelated to contact itself. We address this challenge using a nationwide quasi-experimental source of variation that forced people from different regions to live together for a year – military service in Spain.

Spanish military service provides an ideal scenario to study the effects of intergroup contact on nation building for two reasons. First, Spain is a multilinguistic country with historically significant ethnolinguistic cleavages. Approximately 20% of the population speaks a language different from Spanish at home (Pew Research Center 2019). Moreover, the existence of regional and peripheral nationalist movements has shaped the political

1   In contemporaneous work, Bagues and Roth (forthcoming) also exploit the allocation of conscripts to Spanish military service to study the effect of intergroup exposure on a set of outcomes, including identity, and find results consistent with ours.

landscape in Spain for decades. Not surprisingly, Spain is one of the countries with the highest regionalist vote share (Desmet 2021). Most of this support comes from four regions: Catalonia, the Basque Country, Navarre and Galicia. These regions also have official languages other than Spanish (Catalan, Basque and Galician), in addition to a substantial share of the population that report having strong feelings of regional identity in opposition to feelings of Spanish identity. In Cáceres-Delpiano et al. (2021) we refer to these regions as regions with 'weak Spanish identity'. They are central to our analysis as they are the regions where the Spanish nation-building endeavour has been more in jeopardy.

Second, the setup of the Spanish military service allows us to circumvent the issue of potential endogeneity in the relationship between contact and political preferences. From 1987 to 1991, a national lottery determined where conscripts had to do their mandatory military service. In practice, this meant that individuals from the same province would randomly end up doing the military service in different destinations. The allocation of conscripts to different military areas was designed such that most conscripts would do their military service in their own region. As a consequence, conscripts who did their military service outside their region were also more exposed to colleagues from other regions.

Our empirical strategy relies on comparing the national identity and political behaviour reported by individuals with the likelihood of completing their military service in a region other than their own. We gathered the lottery results from Spanish newspapers and the individual survey data from three waves (2013, 2015 and 2017) of the General Spanish Social Survey (ESGE, for its name in Spanish) conducted by the Spanish public Centro de Investigaciones Sociológicas (CIS). This is the only public survey that contains self-reported preferences on national identity, political behaviour and friendship formation, as well as sufficient information to infer the destination of the military service.[2]

An important aspect of the results we present below is that they are based on individuals that were interviewed around 25 years after they completed their military service. This implies that all the results we present should be interpreted as long-term effects of intergroup contact.

4 LONG-RUN EFFECTS OF INTERGROUP CONTACT

The design of Spanish military service guaranteed that people serving in a region different to their own had more contact with people from other parts of the country. First, this happened because either during the time of actual service or during their free time, conscripts had the opportunity to meet locals. There is plenty of anecdotal evidence showing how conscripts used to populate local cafes and clubs, or how they used to share

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2   See our paper for the details on how we exploit the features of the ESGE survey jointly with the lottery results we gathered from the newspapers to infer the military service destination of each conscript.

apartments in urban areas to spend the weekends outside the barracks.[3] Second, and as explained above, the rules for the territorial allocation of conscripts implied that those who did their military service outside of their region were more exposed to people from other regions. In fact, we find that the increase in contact lasted well beyond their period of military service. In our data, we observe that individuals who did their military service in a region different to their own are more likely to have someone from somewhere else in their inner social circle. This might occur because they met people from other regions during their military service, or because contact during service increased their predisposition to meet such people.

What is the impact of this contact on national identity and related political behaviour? We find that results on identity formation and voting crucially depend on the region of origin of conscripts. Conscripts from regions with a weak Spanish identity that were assigned to a camp outside their region increase their self-reported identity as Spanish by approximately 17 percentage points. In contrast, we do not find any effect for those coming from the other regions.

This heterogeneity contributes to nation building for two reasons. First, Spanish identity is positively affected precisely in those regions where regional identity jeopardises Spanish nation building. Second, it does not exacerbate nationalism in regions already featuring high levels of Spanish identity, which implies that overall identity became less polarised between regions with weak and strong Spanish identities.

Finally, we find that the change in national identity has electoral implications. First, individuals assigned to serve outside their region are 14 percentage points less likely to vote for a regionalist party than those who were assigned to their home region. This is particularly relevant for nation building as most regionalist parties are openly secessionist. Second, those individuals are also 18 percentage points more likely to participate in national elections, which we interpret as a sign of greater engagement with Spanish affairs.

5 CONCLUDING REMARKS

Our findings in Cáceres-Delpiano et al. (2021) show that the distribution of conscripts around Spain created personal ties between people from different regions and contributed to the formation of a shared national identity. Importantly, these effects are not directly related to military service per se, which leads us to think that similar results could be achieved with other policies unrelated to the army, as long as they result in the geographical mobility of young people.

3   For some anecdotal evidence see, for example, *La Voz del Sur* (2021).

A natural candidate for this is educational exchange programmes. Since 1987, over 12 million young Europeans have used the Erasmus programme to live and study in other European countries. Although there is certain consensus that the Erasmus programme has been successful at fostering a European identity, there are no studies assessing its causal impact, partly due to the difficulty of dealing with the endogeneity problem that is inherent to the analysis of any voluntary programme. However, if European policymakers are aiming to foster a European identity, our results are indicative that policies reaching broader audiences, such as more generous student travel and subsistence grants, would be successful at reaching that goal.

In general, our results show that policies that allow people to better know one another might indeed work in creating shared identities. This is of particular importance given the increasing concern that some societies might be suffering from the rise of new regional and identity cleavages (Klein 2021).

REFERENCES

Allport, G W (1954), *The Nature of Prejudice*, Cambridge University Press.

Anderson, B (1983), *Imagined communities: Reflections on the origin and spread of nationalism*, Verso Books.

Aspachs-Bracons, O, I Clots-Figueras, J Costa-Font and P Masella (2008), "Compulsory Language Educational Policies and Identity Formation", *Journal of the European Economic Association* 6(2-3): 434–444.

Bagues, M and C Roth (forthcoming), "Interregional Contact and the Formation of a Shared Identity", *American Economic Journal: Economic Policy*.

Bandiera, O, M Mohnen, I Rasul and M Viarengo (2018), "Nation-building through Compulsory Schooling during the Age of Mass Migration", *The Economic Journal* 129: 62–109.

Basso, G and G Peri (2020), "Internal mobility: The greater responsiveness of foreign-born to economic conditions", *Journal of Economic Perspectives* 34(3): 77–98.

Bazzi, S, A Gaduh, A D Rothenberg and M Wong (2019), "Unity in Diversity? How Intergroup Contact Can Foster Nation Building", NBER Working Paper No. 25683.

Blumer, H (1958), "Race prejudice as a sense of group position", *The Pacific Sociological Review* 1(1): 3–7.

Boisjoly, J, G J Duncan, M Kremer, D M Levy and J Eccles (2006), "Empathy or Antipathy? The Impact of Diversity", *The American Economic Review* 96(5): 1890–1905.

Bursztyn, L, T Chaney, T A Hassan and A Rao (2022), "The Immigrant Next Door: Long-Term Contact, Generosity, and Prejudice", NBER Working Paper No. 28448.

Cáceres-Delpiano, J, A-I De Moragas, G Facchini and I Gonzalez (2021), "Intergroup contact and nation building: Evidence from military service in Spain", *Journal of Public Economics* 201: 104477.

Carrell, S E, M Hoekstra and J E West (2019), "The Impact of College Diversity on Behavior Toward Minorities", *American Economic Journal: Economic Policy* 11(4): 159–182.

Depetris-Chauvin, E, R Durante and F R Campante (2020), "Building nations through shared experiences: Evidence from African football", *The American Economic Review* 110(5): 1572–1602.

Desmet, K (2021), "The Instability of Nations: A Global Analysis of 3,000 Subnational Regions".

Desmet, K, I Ortuño-Ortin and R Wacziarg (2012), "The political economy of linguistic cleavages", *Journal of Development Economics* 97(3): 322–338.

Gidron, N and P A Hall (2017), "The politics of social status: Economic and cultural roots of the populist right", *The British Journal of Sociology* 68: S57–S84.

Klein, E (2021), *Why We're Polarized*, Avid Reader Press/Simon & Schuster.

Krosnick, J A and D F Alwin (1989), "Aging and susceptibility to attitude change", *Journal of Personality and Social Psychology* 57(3): 416.

La Voz del Sur (2021), "Te acuerdas del servicio militar?", 15 April.

Mannheim, K and P Kecskemeti (1936), *Essays on the Sociology of Knowledge*, Routledge.

Merlino, L P, M F Steinhardt and L Wren-Lewis (2019), "More than Just Friends? School Peers and Adult Interracial Relationships", *Journal of Labor Economics* 37(3).

Okunogbe, O (2018), "Does Exposure to Other Ethnic Regions Promote National Integration? Evidence from Nigeria", World Bank Policy Research Working Paper.

Pew Research Center (2019), "Spring 2019 Global Attitudes Survey".

Putnam, R D (2007), "E pluribus unum: Diversity and community in the twenty-first century the 2006 Johan Skytte Prize Lecture", *Scandinavian Political Studies* 30(2): 137–174.

Rodrik, D (2021), "Why Does Globalization Fuel Populism? Economics, Culture, and the Rise of Right-Wing Populism", *Annual Review of Economics* 13(1): 133–170.

ABOUT THE AUTHORS

Julio Cáceres-Delpiano is an Associate Professor of Economics at Universidad Carlos III de Madrid. Julio's research focuses on i) fertility and its impact on the accumulation of human capital, ii) reforms in divorce laws, their impact on crime and on the welfare levels of children and mothers, and iii) the economics of education. He holds a PhD in Economics from the University of Maryland, College Park.

Antoni-Italo De Moragas is an Assistant Professor of Economics at CUNEF Universidad. Antoni's research focuses on political economy both empirical and theoretical. He holds a PhD in Economics from the European University Institute.

Gabriel Facchini is a Lecturer (Assistant Professor) at the Department of Economics at Royal Holloway, University of London. Gabriel is an applied microeconomist mainly interested in health, development, and political economy. He holds a PhD in Economics from the European University Institute.

Ignacio González is an Assistant Professor of Economics at American University. He has previously been a Postdoctoral Research Scholar at Columbia Business School. Ignacio's research focuses on macroeconomics, public finance, inequality and political economy. He holds a PhD in Economics from the European University Institute and a Mphil in Political Philosophy from Pompeu Fabra University.

CHAPTER 7

Promoting national integration through national service programmes: Evidence from Nigeria's National Youth Service Corps[1]

Oyebola Okunogbe
World Bank

1 INTRODUCTION

National service programmes are a popular government policy for promoting national values and developing a shared sense of national identity among young people, while deploying their skills for national development goals. McBride et al. (2003) provide information on 73 national, non-military service programmes across the world, and Bodley-Bond and Cronin (2013) identify 18 such programmes across Africa. While the programmes differ in length, voluntariness and focus of activities, they almost always have an explicit goal of promoting unity, citizenship and cooperation.[2] In many cases, these programmes involve the physical relocation of service participants from one region of the country to another. Using evidence from Nigeria's National Youth Service Corps,

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2 In Nigeria, the National Youth Service Corps pursues "the proper encouragement and development of common ties among the youths of Nigeria and the promotion of national unity" (http://www.nysc.gov.ng/downloads/nysc-decree.php). Malaysia's service programme seeks to "develop and enhance the spirit of patriotism amongst youths and encourage national integration and racial unity" (www.khidmatnegara.gov.my/en/plkn/objektif). Similarly, one of the objectives of the National Service Scheme in Ghana is to "promote national unity and strengthen the bonds of common citizenship among Ghanaians" (www.nss.gov.gh). In Kenya, the National Youth Service seeks to promote among its participants "values of discipline, democracy, citizenship and cooperation" (http://nys. go.ke/public/index.php/content/item/43/Core-Values).

this chapter discusses key findings from Okunogbe (forthcoming) on the impact of living in a different ethnic region for one year during national service on participants' actions and attitudes that are important for nation building. It compares participants who are randomly assigned to serve in their ethnic region to those assigned to serve in a different ethnic region.

Different features of national service programmes may affect nation building. First, by having young people from different backgrounds live, work and serve together, these programmes allow for positive interpersonal contact among participants from different groups, which may reduce prejudice and increase tolerance (Allport 1954, Brown and Hewstone 2005). Beyond their cohort, participants are also exposed to members of the local community in their service location. If they are serving in a different region, this provides further exposure to other groups. Second, moving to a different region, seeing the breadth of the country first-hand and experiencing different cultures may expand participants' identity beyond their ethnic or religious group and lead them to embrace a national identity. Third, migrating temporarily to a different part of the country may increase participants' future likelihood of migrating to other regions by reducing mental barriers to migration, such as the fear of living in unfamiliar places. It may also make them more knowledgeable about opportunities in other parts of the country. Importantly, this study does not capture the overall effect of national service or the potential effects from exposure to a diverse cohort. Rather, it focuses specifically on the impact of serving in a different ethnic region. As such, those mechanisms related to the service location as opposed to the service cohort are more likely to be at play.

2 METHODOLOGY AND DATA

Nigeria's National Youth Service Corps (NYSC) was founded in 1973 to reconstruct, reconcile and rebuild the country in the aftermath of the three-year civil war that ended in 1970. It is a one-year, mandatory programme for all graduates of universities and other tertiary institutions.[3],[4] Although the programme is only for one year, it may have persistent effects because it comes at a critical transition point in the lives of these young people. Corps members are commonly assigned to teach in schools but may also be assigned to work in government agencies or private organisations. From an initial cohort of 2,364 corps members, the programme has grown to over 250,000 annually – the largest such programme in Africa. With an annual budget of $400 million in 2020, it commands resources equivalent to one-third of the country's federal budget for health.

3   The only exempt individuals are those who are more than 30 years' old at the time of graduation, those who have received national honours or those who have served in the police, military or other security agency.
4   The government enforces participation by making it illegal for private or public sector employers to employ any graduate who does not possess an NYSC completion or exemption certificate.

A unique feature of NYSC is that corps members are randomly assigned to serve in one of the 37 states of the country other than their state of origin, with the goal that the cohort in each state reflects the composition of the national cohort.[5] The research design in Okunogbe (forthcoming) exploits this feature of the programme to examine the impact of individuals' temporary exposure to a different ethnic region on their actions and attitudes that are important for nation building. The study examines the impact on graduates of one university who belong to one of the dominant ethnic groups, the Yoruba, when they are exposed to other regions of the country during NYSC. Figure 1 shows the different ethnic regions in Nigeria.

FIGURE 1   DISTRIBUTION OF MAJORITY ETHNIC GROUPS ACROSS STATES IN NIGERIA

Yoruba
Hausa
Northern minorities
Igbo
Southern Minorities
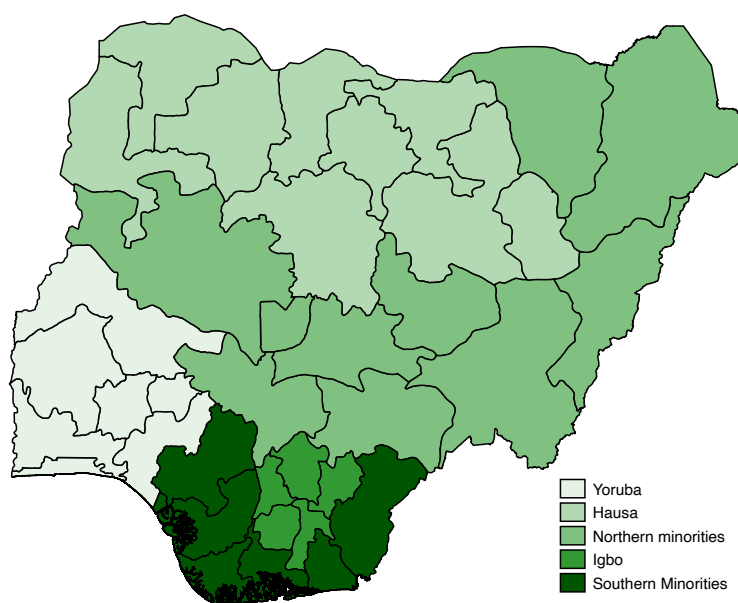
Note: This figure indicates the majority ethnic group (more than 50% of population) in each state. "Southern minorities" and "Northern minorities" states do not have any ethnic group with over 50% of the population. Proportion of ethnic groups are calculation with data from Demographic and Health Surveys 2008.

Given the randomised state assignments, participants posted to different states are similar in expectation. As such, the study compares outcomes across participants who were posted to Yoruba majority states (the control group) and those posted to non-Yoruba majority states (the treatment group). Notably, the study collects outcomes seven years later, providing an opportunity to observe sustained impacts after participants are removed from the institutional setting in which the exposure occurred.

5   The procedure for assigning graduates to states appears to have changed in more recent years as NYSC elicits graduates' location preferences but does not guarantee they will be posted to any of their preferred locations.

Another important consequence of the randomisation is that since each state receives a mix of students from different states of the country, each participant is exposed to a diverse cohort of peers. Any impacts from exposure to people from other ethnic groups, such as those predicted by intergroup contact theory, that occurs among NYSC participants will not be detected by this design since all participants receive this. Instead, the study focuses on the intensive margin of exposure: what is the impact of living in a different ethnic region, compared to living and working alongside a diverse mix of peers within one's own ethnic region?

The study uses three sets of data. First, administrative data were obtained on student postings and contact information from the alumni records of a partner university in a Yoruba majority state in southwest Nigeria. The study focuses on the 2008 cohort because it is the earliest year for which there is significant contact information for alumni. Second, using the available contact information, these alumni were contacted and a phone survey conducted to collect information on both observable revealed preference outcomes, such as future voluntary migration to other regions, knowledge of different parts of the country and close relationships with people from other ethnic groups, as well as stated attitudes towards the country, their ethnic group and other ethnic groups. To avoid priming respondents and to minimise experimenter demand bias, the survey was introduced as an alumni survey and there was no mention of NYSC until the last section of the survey. Of the 1,256 Yoruba students in the cohort, the survey team completed interviews with 644, who were equally distributed across the treatment and control groups. Third, using a variety of datasets, information was compiled on state characteristics such as the share of different religions and ethnicities, poverty levels, distance, rural share, political alignment with federal government and number of violent events in the study period.[6]

The paper describes in detail the NYSC procedure of using a computer algorithm to randomly assign students to different states and uses administrative and survey data to conduct randomisation balance checks to confirm that participant characteristics are not systematically correlated with being assigned to a non-Yoruba state. The study also considers the two main ways in which participants may depart from random assignment. First, about 10% of participants say they influenced their initial NYSC assignments (before assignments are known). These individuals are excluded from the analysis because these assignments are non-random. Second, about 13% of individuals do not serve in their assigned state but instead are redeployed to a different state. These individuals are retained in the sample. To address their noncompliance with the treatment assignment, the study uses the ethnic majority of the assigned state as an instrumental variable to

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6   Data on ethnic and religious composition of states come from the Nigeria Demographic and Health Survey (National Population Commission NPC Nigeria and ICF Macro 2009); ethnic fractionalisation data come from Gershman and Rivera (2018). I calculate geographic distance from the university town to the capital of each state using ArcGIS. Poverty data for each state come from the National Poverty Profile Report 2010 from the National Bureau of Statistics (National Bureau of Statistics 2009). I calculate the rural share for each state from the rural/ urban classification of local governments from Census file 2006. I measure political alignment of the state government with the federal government by whether the state governor at the time was from the same political party as the president. Data on the number of violent events in each state come from Armed Conflict Location and Event Data (ACLED) Project (Raleigh et al. 2010).

estimate the effect of the ethnic majority of the state in which the individual serves. This yields the local average treatment effect (LATE) for those for whom the NYSC assignment determines their state of service.

States in Nigeria differ along other dimensions besides ethnicity. To examine the impact of exposure to a different ethnic region holding other variables constant, an alternative specification includes as control variables other state characteristics: distance to the university town, rural share of the state, Muslim share, poverty rate, ethnolinguistic diversity, political alignment with federal government and number of violent events in the study period. The results are very similar to the specification without these variables, suggesting that the results are driven by ethnic exposure.

3 RESULTS

Serving in a non-Yoruba state increases daily interactions with non-Yorubas and decreases interactions with Yorubas during NYSC. Fifty-three percent of participants who served in a Yoruba state had more than half of their regular interactions with other Yorubas, relative to 24% of those who served in non-Yoruba states. Similarly, 47% (53%) of those who served in a Hausa (Igbo) state had majority of their daily interactions with Hausas (Igbos).

The results indicate two broad effects of exposure to other regions. The first set of results reveals that serving outside one's ethnic region promotes integration as evidenced by greater internal migration, greater knowledge of other states, and increased willingness to migrate among treated participants. Treated participants also have more national pride and are more likely to have dated someone from a different ethnic region. The second set of results reveal that serving in a different ethnic region leads participants to develop greater attachment to their ethnic group. Participants who live among other ethnic groups during national service have greater ethnic pride and improved attitudes towards their own group. These results suggest that national and ethnic identity may thrive together.

Internal migration is a key aspect of national integration. It is a tangible action that reflects individuals' openness to making their home in other regions of the country. From its inception, NYSC sought "to encourage members of the service corps to seek, at the end of their corps service, career employment all over the country thus promote free movement of labour".[7] Indeed, the study finds that, seven years later, Yoruba participants who served in a non-Yoruba region are five times more likely to be living in a non-Yoruba region (Figure 2). Importantly, this result is not limited to individuals choosing to remain

7   www.nysc.gov.ng/downloads/nysc-decree.php

in the state or ethnic region where they served, for example due to networks or culture-specific channels such as learning the local language. Instead, treated participants are also more likely to be living all across the country.

FIGURE 2   IMPACT OF SERVING IN A NON-YORUBA REGION ON INTERNAL MIGRATION
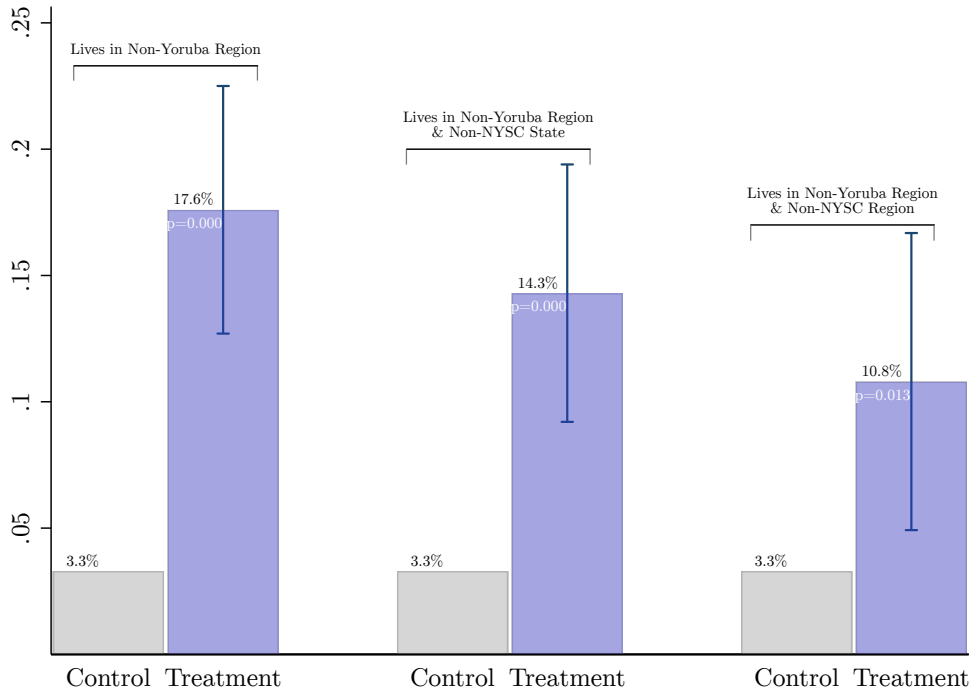
Note: Values are from coefficients of an IV regression of the given outcome variable on an indicator variable for whether the individual served in a non-Yoruba state (instrumented with an indicator variable for whether the individual was posted to a non-Yoruba state). All regressions include controls for baseline individual characteristics, as well as fixed effects for course studied, state of origin and interviewer. Standard errors are clustered by state of posting. Vertical lines show 95% confidence interval of difference between treatment and control. Outcome variables are coded from response to the question: "In which state are you currently living?" and exclude the 2% of respondents living outside Nigeria. N=573.

This greater migration to other ethnic regions may be because exposed participants are more knowledgeable about opportunities in other parts of the country, or because they have a higher intrinsic willingness to migrate. The study finds evidence for both channels. Treated participants are more knowledgeable about other ethnic regions, as measured by a short quiz in the survey that asks participants to name the capitals and the governors of a given set of states (Figure 3). There was no difference in knowledge of Yoruba states. Similar to the result on migration, participants do not become more knowledgeable only about the region to which they were posted; they also become more knowledgeable about other non-Yoruba states
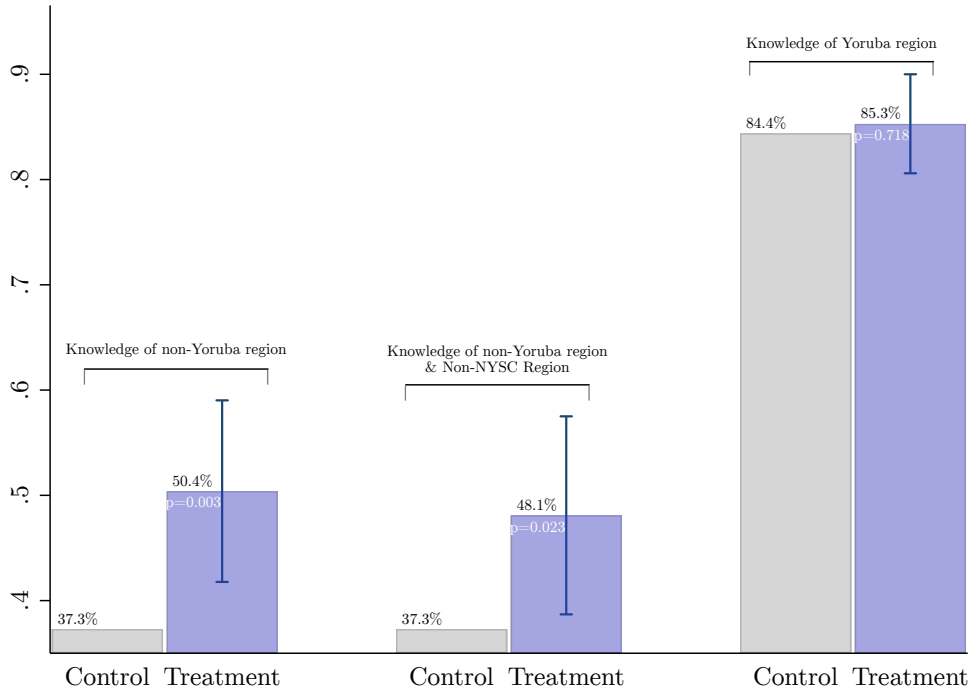
FIGURE 3   IMPACT OF SERVING IN A NON-YORUBA REGION ON KNOWLEDGE OF OTHER STATES

Note: Values are from coefficients of an IV regression of the given outcome variable on an indicator variable for whether the individual served in a non-Yoruba state (instrumented with an indicator variable for whether the individual was posted to a non-Yoruba state). All regressions include controls for baseline individual characteristics, as well as fixed effects for course studied, state of origin and interviewer. Standard errors are clustered by state of posting. Vertical lines show 95% confidence interval of difference between treatment and control. Outcome variable is coded from the share of correct responses to the question: "Who is the current governor of [insert state]?" and "What is the capital of [insert state]?" N=575.

To abstract from differences in information about opportunities in different states, the survey also elicits participants' willingness to migrate to different regions (Hausa, Igbo, Yoruba) to take up a hypothetical job offer with a given salary increase (10%, 50%, 100%), resulting in a total of nine potential outcomes for each participant. The dashed lines in Figure 4 show that for each location and income level, treated participants express a higher willingness to migrate. These results suggest that beyond increasing knowledge of opportunities, prior exposure to unfamiliar regions reduces the psychological costs of migrating. Supporting this idea, findings from focus groups with participants indicate that 'fear of the other' is an important mental barrier that exposure reduces.

FIGURE 4 IMPACT OF SERVING IN A NON-YORUBA REGION ON WILLINGNESS TO MIGRATE
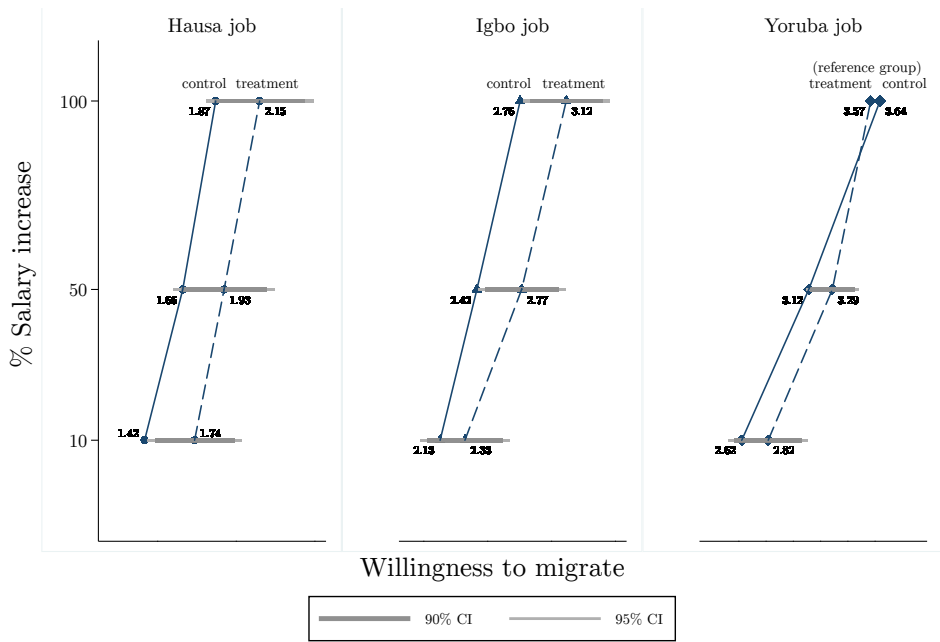
Note: This figure displays the shift to the right of treated respondents' willingness to migrate (dashed line) at different salary increase levels for states in different regions compared to the control group (solid line). Values are obtained from coefficients from an IV regression (with individual fixed effects) of an individual's willingness to migrate on indicator variables for each of the locations and salary increase combinations, interacted with whether the individual served in a non-Yoruba region (instrumented by the interaction term of the job location and salary combinations and whether the individual was posted to a non-Yoruba region). Standard errors are clustered by individual. Thick horizontal line shows 90 percent confidence interval of the difference between treatment and control. Light horizontal line shows 95 percent confidence interval. Questions are: "If you were offered a job in the same career line in [insert Hausa, Igbo, Yoruba states] with a [10%, 50%, 100%] increase in salary, how likely would you be to take it?" where 1 is "Very unlikely" and 4 is "Very likely." N=579

Another core aspect of nation building is for individuals to develop a sense of national identity, besides their ethnic identity. The survey asks participants to indicate, on a scale of 1 to 7, how proud they feel to be Nigerian as well as how proud they feel to be Yoruba. It also asks which of the two identities they identify with more. Serving in a non-Yoruba region increases both national and ethnic pride by 0.5 points, which is equivalent to 0.3 standard deviations (Figure 5). The study does not detect a statistically significant impact on respondents' choice between national and ethnic identity, and can rule out a 0.19 standard deviation increase and 0.45 standard deviation decrease in preference for national identity over ethnic identity.

FIGURE 5   IMPACT OF SERVING IN A NON-YORUBA REGION ON NATIONAL AND ETHNIC IDENTITY
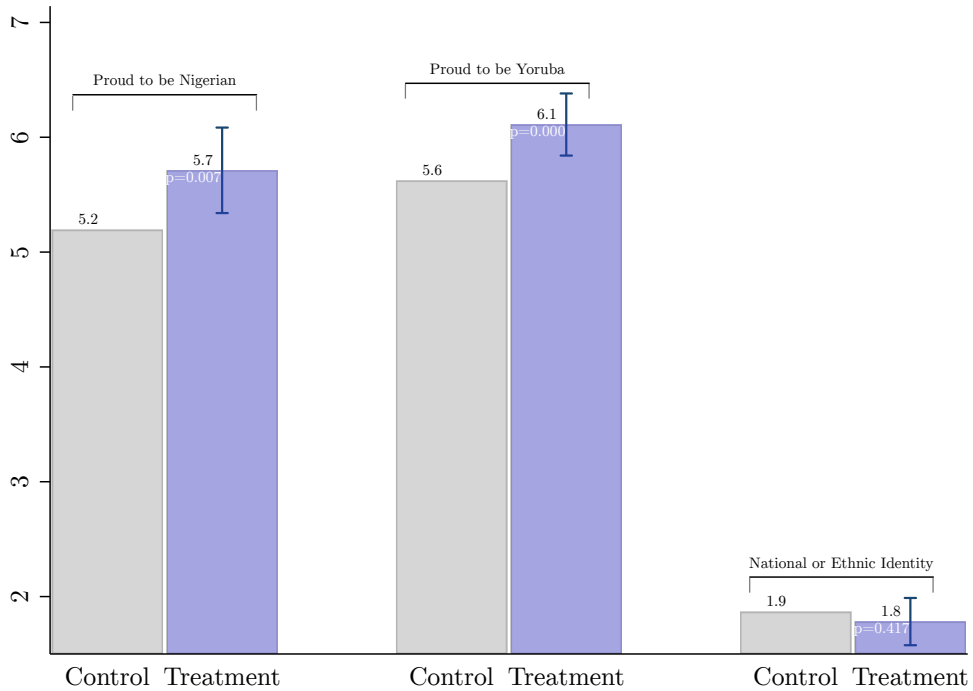
Note: Values are from coefficients of an IV regression of the given outcome variable on an indicator variable for whether the individual served in a non-Yoruba state (instrumented with an indicator variable for whether the individual was posted to a non-Yoruba state). All regressions include controls for baseline individual characteristics, as well as fixed effects for course studied, state of origin and interviewer. Standard errors are clustered by state of posting. Vertical lines show 95% confidence interval of difference between treatment and control. Outcome variables are from the questions: "How proud do you feel to be a [Nigerian, Yoruba]? where 1 is "Not proud at all" and 7 is "Extremely proud". And "If you had to choose between being a Nigerian and being a Yoruba, which of these two groups do you feel more attached to?" where options are: "Feel only Yoruba (0) Feel more Yoruba than Nigerian (1), Feel more Nigerian than Yoruba (2), and Feel only Nigerian (3).)" N=582, 579 and 566 for the three outcomes, respectively.

Interviews and focus groups provide further insights into these results. Participants described how their knowledge and appreciation of the country grew from seeing the beautiful physical landscape and cultural diversity of the country. These experiences made them realise that they belong to something greater than they were previously aware of. At the same time, they described how being a foreigner in the local community increased the salience of their ethnic identity. They also described unfamiliar cultural practices in their host community that they encountered, and would typically compare them less favourably to their own culture.

Together, these findings suggest that national and ethnic pride are not mutually exclusive; not only can they coexist, but they can also grow simultaneously. This finding resonates with the evidence from the international migration literature showing that migrants may display strong association and commitment to both their culture of origin as well as their host culture (Constant et al. 2009, Georgiadis and Manning 2013).

Developing positive attitudes towards and relationships with people from other backgrounds is another important element of nation building. The survey asks participants about how close they feel to Nigerians from other ethnic groups (Hausas, Igbos, and Yorubas), how much they trust them, and whether they would support a close relative marrying someone from the group. The analysis does not detect a statistically significant impact of serving in a non-Yoruba state on an index of these attitudes towards non-Yorubas (Figure 6). It can rule out an increase of 0.27 standard deviations and a decrease of 0.32 standard deviations on an index of attitudes towards other groups. Instead, consistent with the result on ethnic pride, participants who lived in non-Yoruba states during NYSC develop increased affinity for their co-ethnics.

FIGURE 6   IMPACT OF SERVING IN A NON-YORUBA REGION ON INTER-ETHNIC ATTITUDES
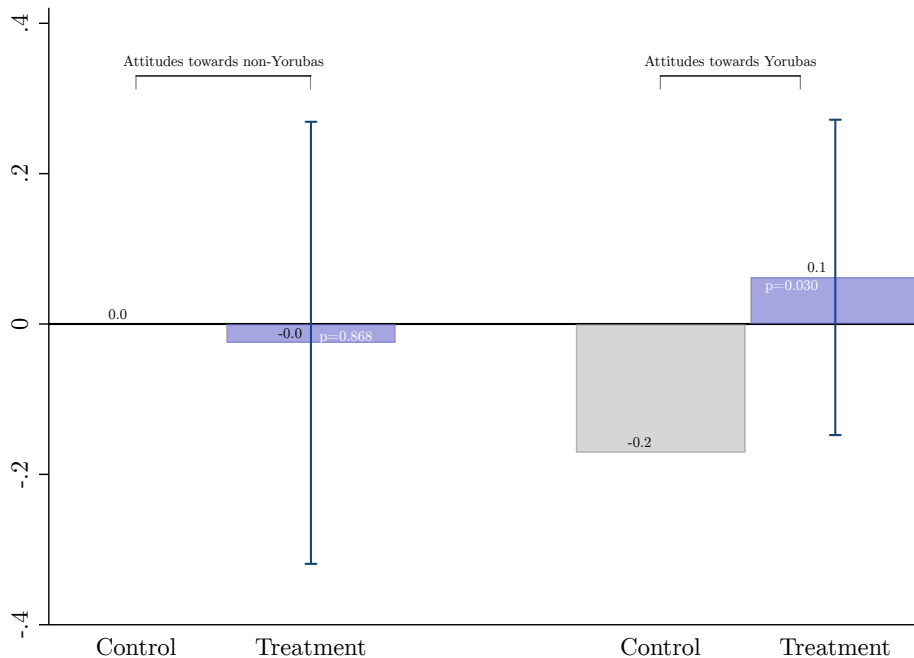

Note: Values are from coefficients of an IV regression of the given outcome variable on an indicator variable for whether the individual served in a non-Yoruba state (instrumented with an indicator variable for whether the individual was posted to a non-Yoruba state). All regressions include controls for baseline individual characteristics, as well as fixed effects for course studied, state of origin and interviewer. Standard errors are clustered by state of posting. Vertical lines show 95% confidence interval of difference between treatment and control. Outcomes: Index of Attitudes towards different ethnic groups is the standardized mean of responses to the following questions: How close do you feel to [Hausas, Igbos, Yorubas]? where 1 is "Not close at all" and 7 is "Extremely close", How much do you trust [Hausas, Igbos, Yorubas]? where 1 is "Not at all" and 7 is "A lot", and Let us suppose your close relative marries a [Hausa, Igbo, Yoruba], would you be in favor of this or opposed to it happening? where 1 is "Strongly oppose" and 5 is "Strongly in favour." N=582.

Beyond attitudes, the survey also asks respondents about their romantic relationships. The results reveal that those who served in a non-Yoruba region are 14 percentage points more likely to have ever dated a non-Yoruba person (Figure 7). In addition, there is a positive but not statistically significant impact on the probability of marrying a non-Yoruba person. Importantly, the results on romantic relationships are concentrated in the ethnicity of the host state to which participants were exposed: participants who served in an Igbo state are 7.4 percentage points more likely to be married to an Igbo (p=0.05). This result suggests that the relevant mechanism was increased opportunity to develop relationships conditional on affinity level, rather than increased affinity for the group.
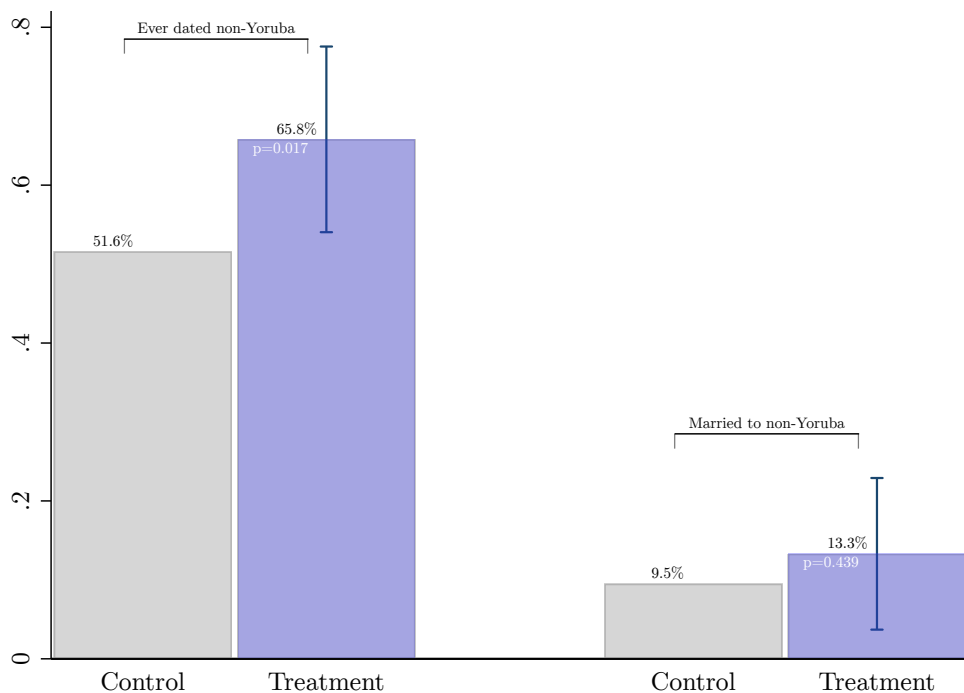
FIGURE 7   IMPACT OF SERVING IN A NON-YORUBA REGION ON INTER-ETHNIC RELATIONSHIPS

Note: Values are from coefficients of an IV regression of the given outcome variable on an indicator variable for whether the individual served in a non-Yoruba state (instrumented with an indicator variable for whether the individual was posted to a non-Yoruba state). All regressions include controls for baseline individual characteristics, as well as fixed effects for course studied, state of origin and interviewer. Standard errors are clustered by state of posting. Vertical lines show 95% confidence interval of difference between treatment and control. Ever dated Non-Yoruba is coded from the response to the question: "Have you dated or been in a serious relationship with anyone who is from [Hausa, Igbo, Yoruba, Other] ethnic group?" Married to Non-Yoruba (among married) is coded from the response to the question: "From which ethnic group is your spouse?" N=581 and 388 for the two outcomes, respectively.

Besides ethnicity, the other most important dimension of identity in Nigeria is religion. Unlike the majority Muslim Hausa region and the majority Christian Igbo region, Yoruba states have a good representation of both Muslims and Christians. The study therefore examines whether the national integration outcomes differ when a participant shares the

religion of the host community. While having the same religion could increase mutual trust, having a different religion may present an additional layer of exposure to broaden participants' worldviews. The study does not find statistically significant impacts on the main outcomes, but does find suggestive evidence that the result on migrating to a non-Yoruba region is doubled for those who served in a non-Yoruba state with a different religion.

4 POLICY IMPLICATIONS

The results from this study highlight the long-lasting impact of the physical relocation feature of the NYSC. Exposing participants to a different ethnic region increases their familiarity with other parts of the country and makes them more likely to migrate to other regions. They also have greater national pride. In addition, being exposed to more people of the host state ethnicity increases the likelihood of romantic relationships with them. These results suggest that national service programmes can play a key role in nation building.

Importantly, the results are not driven by increased closeness or trust towards non-Yorubas from living among them (over and above any improved attitudes control group participants may have had from serving alongside peers from different parts of the country). Observing greater physical mobility in the absence of increased intergroup cohesion raises the question of the extent to which physical integration is desirable in and of itself if it does not promote greater understanding and cooperation among groups. While there may be important economic benefits for individuals who now freely pursue economic opportunities across different regions, the social consequences are unclear. Kaufmann (1996) argues that in countries with a history of civil conflict, physical separation of different groups into different regions is the only way to prevent future conflict. However, as Laitin (2004) points out with the examples of the Igbo in Nigeria, who returned to the Hausa state of Kano in large numbers after the civil war, voluntary ethnic mixing continues even after a severe conflict. In cases like this, when physical integration occurs independent of increased social cohesion, further research is needed to assess the impact on a range of outcomes such as violence, public goods provision, economic growth and political stability, among others.

At the same time that participants become more attached to the country, they also become more attached to their own ethnic group. One possible explanation for this is that treated participants, who in this case are from a majority group, become a minority when they move to a different group. This change of status may make their own ethnicity more salient to them. As such, physical relocation of national service participants may have different effects on different types of participants.

Lastly, in contrast to the common view that national and ethnic identities are in conflict, these results show that attachment to both identities can grow in response to interventions such as this. This finding suggests that national service programmes do not need to diminish participants' ethnic identities to promote a national identity.

REFERENCES

Allport, G W (1954), *The Nature of Prejudice*, Addison-Wesley.

Bodley-Bond, C and K Cronin (2013), "Overview of the national youth service landscape in Sub-Saharan Africa", Volunteer and Service Enquiry Southern Africa (VOSESA) Working paper series.

Brown, R and M Hewstone (2005), "An Integrative Theory of Intergroup Contact", *Advances in Experimental Social Psychology* 37: 255–343.

Constant, A F, L Gataullina and K F Zimmermann (2009), "Ethnosizing Immigrants", *Journal of Economic Behavior and Organization* 69(3): 274–287.

Georgiadis, A and A Manning (2013), "One Nation Under a Groove? Understanding National Identity", *Journal of Economic Behavior and Organization* 93: 166–185.

Gershman, B and D Rivera (2018), "Subnational Diversity in Sub-Saharan Africa: Insights from a New Dataset", *Journal of Development Economics* 133: 231–263.

Kaufmann, C (1996), "Possible and Impossible Solutions to Ethnic Civil Wars", *International Security* 20(4): 136–175.

Laitin, D D (2004), "Ethnic Unmixing and Civil War", *Security Studies* 13(4): 350–365.

McBride, A M, C Benitez, and M Sherraden (2003), *The forms and nature of civic service: A global assessment, Center for Social Development*, Washington University.

National Bureau of Statistics (2009), "Nigeria Poverty Profile Report 2010", Harmonised Nigeria Living Standard Survey 2009.

National Population Commission NPC Nigeria and ICF Macro (2009), "Nigeria Demographic and Health Survey 2008".

Okunogbe, O M (forthcoming), "Does Exposure to Other Ethnic Regions Promote National Integration? Evidence from Nigeria", *American Economic Journal: Applied Economics*.

Raleigh, C, A Linke, H Hegre and J Karlsen (2010), "Introducing ACLED: An Armed Conflict Location and Event Dataset: Special Data Feature", *Journal of Peace Research* 47(5): 651–660.

ABOUT THE AUTHOR

Oyebola Okunogbe is an Economist in the World Bank Development Research Group, working in the intersection of development economics, public finance and political economy. She is also an International Research Associate at the Institute for Fiscal Studies. Her research examines key aspects of the relationship between the state and citizens, and implications for economic development in low- and middle-income countries. She has studied topics in taxation, public service delivery and nation building. She received her BA in Economics from Dartmouth College, MPA in International Development (MPA/ID) from Harvard Kennedy School and PhD in Public Policy from Harvard University. She completed her National Youth Service Corps assignment in Nigeria in 2007.

SECTION II
NATION BUILDING THROUGH EDUCATION

CHAPTER 8

State-sponsored education and French identity

Guillaume Blanc[a] and Masahiro Kubo[b]
[a]The University of Manchester; [b]Brown University

1 INTRODUCTION

Why do French people speak French? And what makes them French? These seem like trivial questions, but they are not. The building of a national identity in a fragmented society is an important driver of economic development and social cohesiveness. Yet, why some countries successfully become nations, and the role of the state in this process, is not well understood.

To understand this, we study France, one of the canonical examples of nation-building (Blanc and Kubo 2021). Only 200 years ago, French was a foreign language to the vast majority of the French population, and most of the population did not identify as French. Today, France is a relatively homogenous country where French is the common language. Eugen Weber (1976) and Eric Hobsbawm (1990) document this in *Peasants into Frenchmen* and *Nations and Nationalism since 1780*, but statistical evidence for this change is lacking.

Using a natural experiment and drawing on a detailed survey of the languages spoken across municipalities in France, we document the process of homogenisation and nation building and empirically establish that state-sponsored mass education played a substantial role in the adoption of the French language and in the formation of a national identity in France.

2 HISTORICAL CONTEXT

"France is diversity" and "the dazzling triumph of the heterogeneous" (p. 38) are two of the phrases used by the historian Fernand Braudel to describe France (Braudel 1986). More than 40 different languages or dialects were spoken in the beginning of the 19th century, in particular the *langues d'oc* (Occitan and its dialects) in the south, the *langues d'oïl*, including French language, in the north, and other regional languages such as Breton or Alsatian elsewhere. On the French identity, Weber (1976) documents that, in the mid-19th century in a remote village in the south of France, "not a single child could answer questions like 'Are you English or Russian?' or 'What country is the department of Lozère in?'". More than 80% of the population was rural at the time, and French was only spoken by the elites in the cities and in the region around Paris.

3 DATA

We gather data on the languages spoken around 1900 in 577 municipalities from the *Atlas Linguistique de la France*. The *Atlas* was published in nine volumes from 1902 to 1910 and relied on a survey carried out by linguist Jules Gilliéron to study Romance languages in the rural parts of the country.

For four years, Gilliéron's assistant Edmond Edmont travelled across the country and asked locals for the standard, common pronunciation of 1,920 words or expressions in their municipality. The survey captures spoken language, including vocabulary and pronunciation, and paints a particularly detailed picture of the languages and dialects spoken by ordinary people in their daily life at the time (see Figure 1).

Importantly, the *Atlas* was conducted to capture the common language spoken in the surveyed municipality and not the language spoken by the individuals surveyed. Moreover, the timing of the survey is ideal for studying the effect of state-sponsored education during the time of François Guizot and to abstract from potential confounding factors resulting from the Freycinet Plan and Ferry Laws – the two other important drivers of homogenisation at the time (Weber 1976). Most adults in 1900, at the time of the *Atlas*, had not been affected by the Jules Ferry Laws of 1881 and 1882, which made education free, universal and secular, or by the Freycinet Plan of 1878, which mandated the construction of railways, canals and ports and was only completed in 1914.

FIGURE 1   MAP OF *"CIEL"* ("SKY")

Panel A: France

Panel B: Zoomed-in
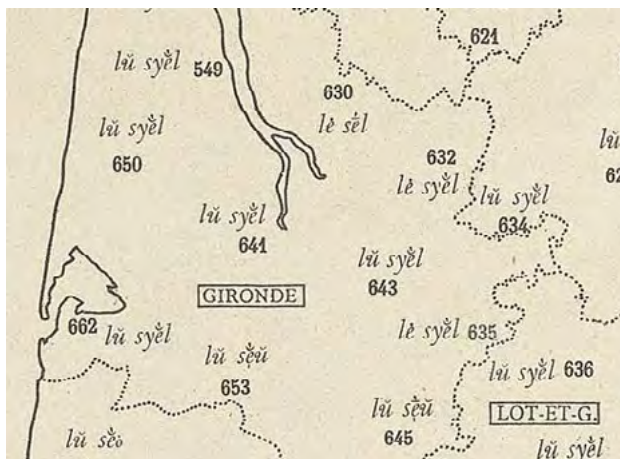
Note: This figure displays a map from the Atlas Linguistique de la France (Gilliéron and Edmont, 1902-1910) showing the pronunciation of *"ciel"* ("sky") across municipalities in France (Panel A) and in the southern part of France only (Panel B). The map displays *"le ciel"* ("the sky"), but we only digitised the word "sky."

FIGURE 2   HISTORICAL LANGUAGE REGIONS AND LINGUISTIC DISTANCE FROM FRENCH IN 1900

Panel A: Historical language regions
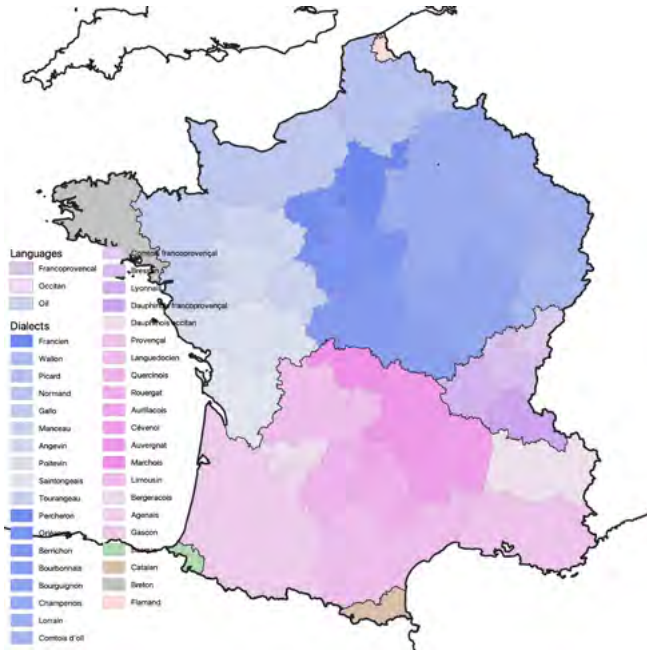
Panel B: Linguistic distance from French (1900)
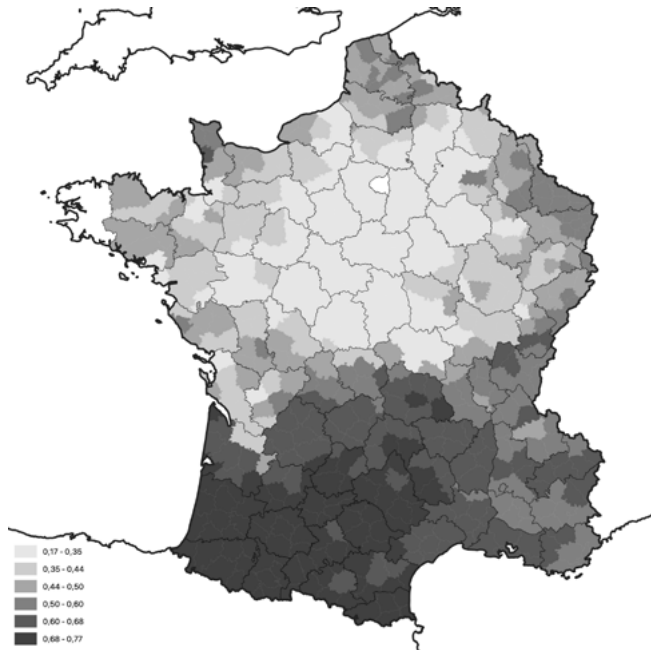
We rely on the *Atlas* to measure linguistic distance from French. We use a Levenshtein distance algorithm – defined as the minimal number of edits by insertions, deletions or substitutions between phonetic representation of words – to capture linguistic dissimilarity.

In order to measure linguistic distance, we chose the pronunciation of 50 representative words in the *Atlas* from a list of words that exist in most languages and cultures and correspond to a "standardised universal list of meanings" (Ginsburgh and Weber 2020: 367). We use the list compiled by Swadesh (1952) – including words such as "cat", "dog", "drink", "fruit", "hand", "mouth", "night", "rain", "sun", "trees" and "water" – and show the robustness of our results to using other distance metrics across the entire corpus of 1,681 words in the Atlas.

Panel B of Figure 2 displays the spatial distribution of our measure of linguistic distance from French in 1900. The darker areas indicate a larger linguistic distance from the standard language. Our measure closely tracks the historical language regions (Panel A), showing that the Atlas captures recent changes but also deep-rooted historical differences – which provides variation we can exploit.

4 EMPIRICAL STRATEGY

We exploit quasi-exogenous variation in the provision of state-sponsored education during the July Monarchy, which laid the foundations of mass public primary schooling and undertook important state-building efforts with the *Loi Guizot* of 28 June 1833 and the municipal law of 21 March 1831.

In municipalities of more than 500 inhabitants, primary schools for boys were built (Furet and Ozouf 1977); a national curriculum designed by the state was followed, with the national language and a national history taught using textbooks created and distributed by the state; schoolteachers benefitted from a standardised education provided by the state in newly created *écoles normales*; a body of nationally recruited school inspectors supervised the schoolteachers and enforced the law; larger municipal councils raised additional taxes and significantly increased state capacity to fund the provisions of the law (Montalbo 2021); and members of a same family could not be on the municipal council together.

Figure 3 shows that the number of primary schools increased nearly two-fold in a decade, from one school for every 1,000 inhabitants to one for every 600, and universal literacy was achieved in the aftermath of the law.

FIGURE 3   LITERACY AND SCHOOLS
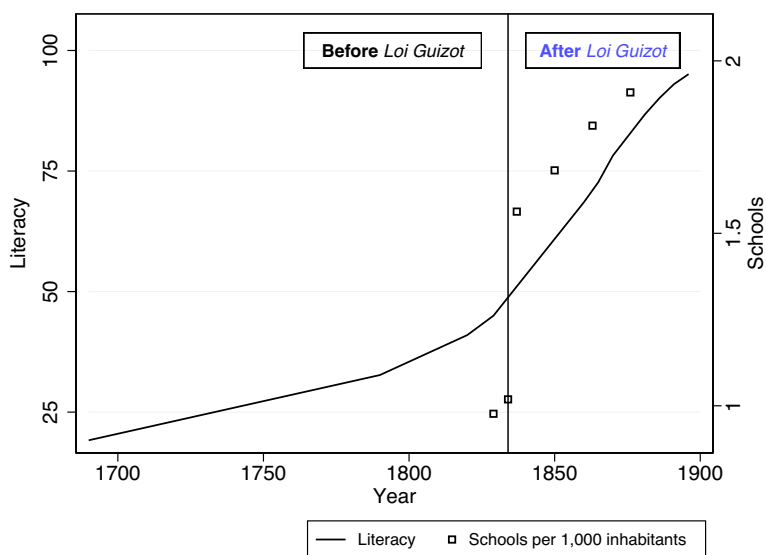
Paul Lorain, a close advisor of Guizot, argued at the time that "each school shall be a colony of French language in a conquered land" (Lorain 1837: 29), while Guizot himself wrote that "through the teaching of the French language, primary schools will instill and spread the spirit and unity of nationality everywhere" (Guizot 1833: 102).

Using a regression discontinuity design exploiting the 500-inhabitant threshold at the time of the *Loi Guizot*, we evaluate the causal impact of state-sponsored education on the adoption of the French language and the formation of a national identity across municipalities in France.

5 THE ADOPTION OF THE FRENCH LANGUAGE

We find that state-sponsored education decreased linguistic distance from French by 10 percentage points at the threshold – a 20% decrease relative to the counterfactual mean. The effect is statistically significant at the 1% level and robust across a wide range of alternative and placebo specifications, suggesting that state-sponsored education fostered the adoption of the French language.

Additionally, building on the regression discontinuity framework, we show that we can estimate a lower bound on the speed of homogenisation over time from our cross-sectional data.

FIGURE 4   STATE-SPONSORED EDUCATION AND LINGUISTIC DISTANCE FROM FRENCH
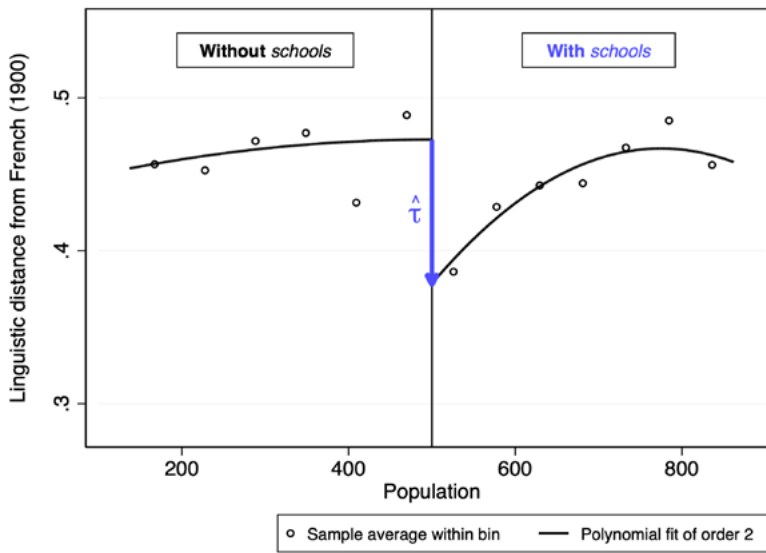
Note: This figure plots linguistic distance from French against population around the discontinuity at the time of the *Loi Guizot*. Each point plots the average value within a bin, partialled out of distance from Paris, administrative region fixed-effects, and historical language region fixed-effects. Linguistic distance from French is defined as the Levenshtein distance from Le Plessis-Robinson. We apply a local-polynomial fit of order 2 and a mean-squared-error optimal bandwidth for local-polynomial estimation. Observations are at the municipality level.

How fast homogenisation took place is an unknown parameter of interest in the literature. While our data allow us to observe linguistic distance from French in 1900, we do not observe it before the July Monarchy. However, we expect that it should be smooth at the threshold. Moreover, if the policy only contributed a portion of the total change over time – that is, if the total change over time and the effect of treatment are of the same sign – then the rate of change estimated from the policy alone (i.e. the percentage change relative to the counterfactual) will be lower than the total rate of change (i.e. the speed of homogenisation). Hence, our results suggest that linguistic distance from French decreased by at least 20% from 1833 to 1900 in municipalities at the threshold.

6 THE FORMATION OF A NATIONAL IDENTITY

We also explore the persistent effects of the policy on the salience of national identity and preferences for the centralisation of political authority. We leverage data on a set of different outcomes to proxy for national identity and political preferences, in particular data on the birthplace of heroes resisting Nazi Germany during World War II and on votes against the regionalisation of political authority in 1969.

FIGURE 5   STATE-SPONSORED EDUCATION AND NATIONAL IDENTITY

Panel A: Resistance heroes (WWII)
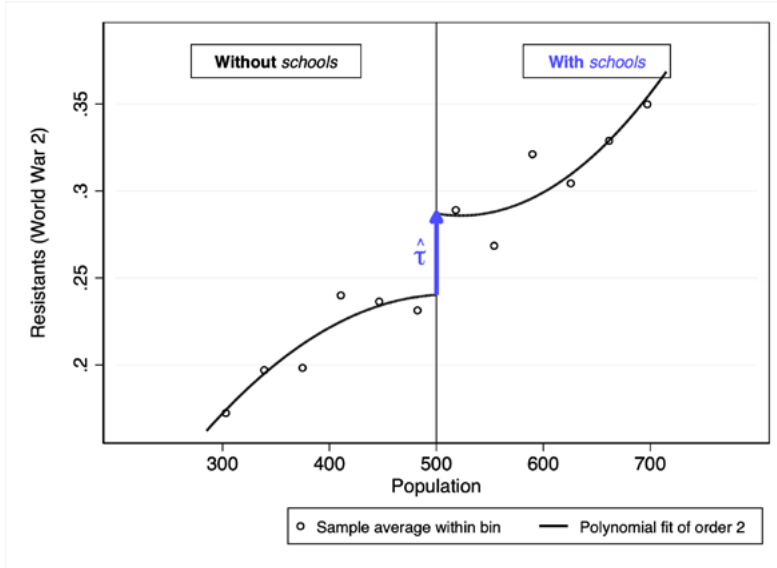
Panel B: 1969 referendum on regionalisation
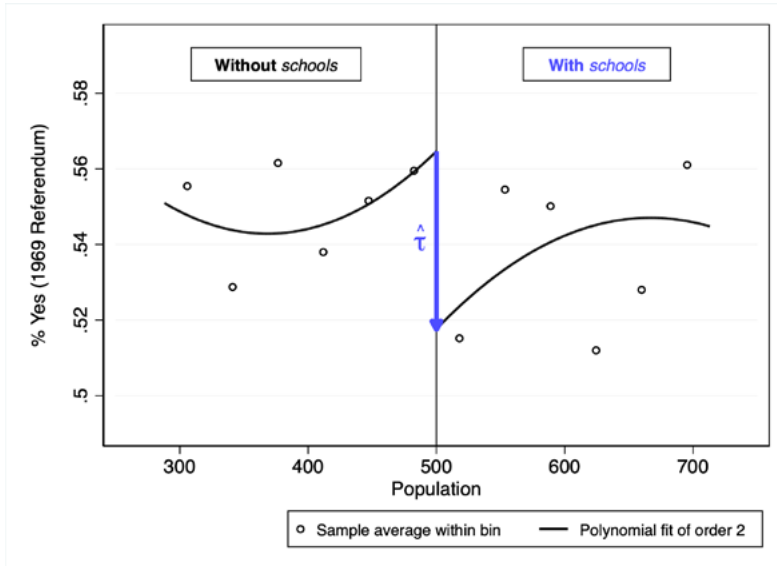
Note: This figure plots measures of the salience of national identity against population around the discontinuity at the time of the *Loi Guizot*. Each point plots the average value within a bin, partialled out of distance from Paris, *département* fixed-effects, and historical dialect region fixed-effects. In Panel A, French Resistance during World War II is defined as a dummy variable that equals 1 if at least one individual born in the municipality was awarded a *Médaille de la Résistance* for documented "remarkable acts of faith and courage that contributed to the resistance of the French people against the enemy." In Panel B, votes on the 1969 constitutional referendum on regionalisation are defined as the vote share in favour of the referendum. We apply a local-polynomial fit of order 2 and a mean-squared-error optimal bandwidth for local-polynomial estimation. Observations are at the municipality level.

The policy significantly increased the likelihood that individuals born in treated municipalities were heroes of the French Resistance who were awarded a *Médaille de la Résistance* for documented "remarkable acts of faith and courage that contributed to the resistance of the French people against the enemy" (Figure 5, Panel A).

Then, we leverage data on votes against the regionalisation of political authority in the 1969 referendum on regionalisation, where Charles De Gaulle proposed to return significant power and autonomy to regional authorities. The outcome of the vote is not readily available at the municipality level. We obtained this data in the Lorraine region from Dehdari and Gehring (2022) discussed in Chapter 23 of this eBook, and digitised it in Provence from the archival records of a local newspaper, *Le Petit Varois*, which published the municipality-level results the day after the election.

Using the municipality election data, we show that state-sponsored education significantly reduced the vote share in favour of regionalisation by 2 to 6 percentage points – a particularly important effect since the referendum was rejected by 52.4% of voters. The referendum would have been adopted and France would look more like Spain today had nation building not taken place in the 1830s.

7 SOCIAL INTERACTIONS

Last but not least, we use data on migration flows across *départements* and trade links across districts to estimate the relationship between linguistic proximity and the exchange of ideas and goods. There are unfortunately no data on migration and trade flows across municipalities, either historically or in contemporary times, hence we can only provide suggestive evidence of the role of the policy on these variables.

We find that a one standard deviation increase in linguistic distance between municipalities is associated with a decrease in migratory flows of more than half of a standard deviation and a decrease in trade of one-fifth of a standard deviation. The estimated coefficients remain statistically significant even after accounting for gravity forces. Our results suggest that language shapes migration and trade and that the homogenisation brought about by state-sponsored education had far-reaching and persistent impacts.

8 WHY WAS NATION BUILDING SUCCESSFUL?

Why was the policy successful? There are numerous examples of state initiatives to shape ideology and identity that have resulted in backlashes (see Chapter 14 of this eBook on Bazzi et al. 2021, Chapter 13 on Fouka 2020 and Carvalho and Koyama 2016). Looking at the heterogeneous effects of the policy, we contend that the answer is found in a variety of elements.

Where the returns to education were high and schools were very much needed, the policy was successful. We also show that local elites played a significant role in the implementation and enforcement of the policy, and that the policy was more successful where state building went hand-in-hand with nation building – in municipalities where state capacity was initially weak. Last but not least, another important factor could be that the population had a long shared history within stable and long-established national borders. This might be an avenue for future research.

9 CONCLUDING REMARKS

Using a novel, detailed dataset on spoken languages in France and a natural experiment, we document the adoption of a common language and the formation of a national identity in the process of nation building in a fragmented society.

REFERENCES

Bazzi, S, M Hilmy, and B Marx (2021), "Islam and the State: Religious Education in the Age of Mass Schooling", working paper.

Blanc, G and M Kubo (2021), "Schools, Language, and Nations: Evidence from a Natural Experiment in France", working paper.

Braudel, F (1986), *The identity of France: History and environment,* Vol. 1, 1990 edition (translated Sian Reynolds), Collins.

Carvalho, J-P and M Koyama (2016), "Resisting education", working paper.

Dehdari, S H and K Gehring (2022), "The Origins of Common Identity: Evidence from Alsace-Lorraine", *American Economic Journal: Applied Economics* 14(1): 261–92.

Fouka, V (2020), "Backlash: The unintended effects of language prohibition in US schools after World War I", *The Review of Economic Studies* 87(1): 204–239.

Furet, F, and J Ozouf (1977), *Lire et écrire : l'alphabétisation des Français de Calvin à Jules Ferry,* Les Editions de Minuit.

Gilliéron, J and E Edmont (1902-1910), *Atlas linguistique de la France*, Vol. 1-9, Champion.

Ginsburgh, V and S Weber (2020), "The Economics of Language", *Journal of Economic Literature* 58(2): 348–404.

Hobsbawm, E J (1990), *Nations and Nationalism since 1780: Programme, Myth, Reality,* Cambridge University Press.

Guizot, F (1833), "64. 2 janvier 1833. Exposé des motifs de la loi sur l'instruction primaire".

Lorain, P (1837), *Tableau de l'instruction primaire en France: d'après des documents authentiques, et notamment d'après les rapports adressés au ministre de l'instruction publique par le 490 inspecteurs chargés de visiter toutes les écoles de France, à la fin de 1833*, Hachette.

Montalbo, A (2021), "State intervention, education supply and economic growth in nineteenth-century France", working paper.

Swadesh, M (1952), "Lexico-statistic dating of prehistoric ethnic contacts: with special reference to North American Indians and Eskimos", *Proceedings of the American Philosophical Society* 96(4): 452–463.

Weber, E (1976), *Peasants into Frenchmen: The Modernization of Rural France, 1870–1914*, Stanford University Press.

ABOUT THE AUTHORS

Guillaume Blanc is an Assistant Professor of Economics and Deputy Director of the Arthur Lewis Lab for Comparative Development at the University of Manchester. After undergraduate studies at the École normale supérieure, he graduated with a Master of Arts from the École des hautes études en sciences sociales and undertook doctoral studies in Economics at Brown University, during which he was awarded a Cambridge University Press Dissertation Fellowship and the Larry Neal Prize.

Masahiro Kubo is a PhD candidate in Economics at Brown University. He holds a BA in Economics from Kyushu University, and an MA in Economics from Hitotsubashi University. His current research topics include nation building and conflict.

CHAPTER 9

America's melting pot: Lessons from the Age of Mass Migration

Myra Mohnen[ab] and Martina Viarengo[cde]
[a]University of Ottawa; [b]Centre for Economic Performance, LSE; [c]Geneva Graduate Institute;
[d]Harvard University; [e]CEPR

> *The main hope of a nation lies in the proper education of its youth.*
>
> Erasmus

Nation building aims at the unification of people within the state so that it remains politically stable and viable in the long run. In his influential 1882 essay, "What is a nation?", the French philosopher Ernest Renan wrote about the bonds that hold a nation together. He defined a nation as an entity based on acts of the free will of individuals forming a collective identity. Homogenising a heterogeneous population is therefore a core element of nation building. Recent large inflows of international migrants and refugees into Western democracies caused by conflicts, climate change and demographic pressures have led to a renewed interest in the fundamental question of how societies can integrate different cultures while maintaining social cohesion.

Nations stay together when its citizens share enough values and preferences, thereby forming a collective identity. Education plays a pivotal role in instilling these shared values. In this chapter, we examine the United States during the Age of Mass Migration (1850–1930) to bring insights into the role of education in nation building. During this period, the United States experienced one of the largest flows of voluntary migration ever recorded in modern history with the arrival of tens of millions of Europeans. Roughly 40% of Americans are descendent of the 24 million individuals who arrived between 1892 and 1924 (Bandiera et al. 2013). As a nation, the United States was therefore confronted

with the question of how to integrate and assimilate this large and diverse group of migrants. Education was an integral part of the nation-building effort and played an important role in transforming immigrants into Americans that share common values of democracy, freedom and civic responsibility. Americans used compulsory schooling was a tool to instil these values among migrant children. This is corroborated by historical records and supported by empirical analysis using historical data.

A collective identity can also be achieved through other ways than education, as has been documented in the large and quickly growing literature on national identity and social cohesion in economics. The adoption of a state religion has been shown to create a collective identity (Kets and Sandroni 2021). Interactions between groups through internal migration or military service help form a national identity (see Chapter 2 in this eBook on Bazzi et al. 2019 and Chapter 6 on Cáceres-Delpiano et al. 2021). Shared experiences, whether positive or negative, have also been shown to bond individuals and strengthen national cohesion and patriotic attachment. For instance, the victories of the national football teams in sub-Saharan Africa led to a lower likelihood of primarily identifying with ethnicities and a higher likelihood of trusting other ethnic groups (see Chapter 20 on Depetris-Cahuvin et al. 2020). Many nations have structured their national histories around the wars they have waged with other nations or internally. This was the case for Vietnam's national identity which was strengthened as a result of the US bombing during the Vietnam War (see Chapter 22 on Dell and Querubin 2018). Similarly, the regional identity of Alsace-Lorraine, as opposed to the identity of either French or German, is strongly associated with negative experiences with nation-states, including war, occupation and repression (see Chapter 23, which summarises findings of Dehdari and Gehring 2022). More recently, it has been found that the 2014 Russian invasion of Ukraine increased the European identity in Eastern European countries (see Chapter 23, which also presents findings of Gehring 2020). In addition, various public policies have been implemented for the purpose of nation building. The infrastructure policies of Spain from 1720 to 2010, including the railway, motorways and high-speed rail, were driven by the desire to centralise the transportation around the national capital, rather than commercial reasons (Bel 2011). Mass media, in the form of direct state propaganda and advertising, plays a role in nation building as it acts as bridge between the government and the public. It is an effective instrument of political socialization, modernisation and development (see Chapter 15 on Blouin and Mukand 2019, Kersting and Wolf 2021 and Tajuddin and Zulkepli 2019).

THE ROLE OF EDUCATION IN NATION BUILDING

In Western countries, the historical expansion of primary school provision is regarded as a key driver in the process of nation building. European rulers during the 19th century relied on state-controlled primary schooling to teach their subjects a common language, a shared identity and a sense of duty and loyalty to the regime.

A common language taught in school is fundamental to communicate and understand each other. Blanc and Kubo (2021) demonstrate that state-sponsored education brought about the homogenisation of language in France. This had a persistent impact on national identity and preferences for political centralisation, with increased participation in the Resistance during World War II and votes against the 1969 referendum on regionalisation. Clots-Figueras and Masella (2013), described in Chapter 10, and You (2018) reach a similar conclusion for Catalonia and China. In both cases, the authors find that the common language contributed to national identify. The restriction of language in education can also backfire. Fouka (2019) finds that excluding the German language from schools in several US states after World War I led to a backlash in nation building – the affected individuals were less likely to volunteer in World War II, and more likely to marry other German-speakers or give their children German names.

Education also shapes ideology and civic values (Almond and Verba 1963, Kamens 1988, Brady et al. 1995, Pritchett and Viarengo 2015, Cantoni et al. 2017). Civic values are generally seen as an important element of state building as they underpin democratic institutions (Glaeser et al. 2007). It has been found that individuals exposed to compulsory schooling are more likely to be registered to vote, to vote, to engage in political discussion with others and to follow political campaigns and attend political meetings, as well as having higher rates of participation in community affairs and trust in government (Dee 2004, Milligan et al. 2004). Civic values not only weaken the likelihood of social unrest, but also reduce the costs of social interaction, coordination and information exchange (Bowles and Gintis 1976, Gradstein and Justman 2002, Helliwell and Putnam 2007). They also make individuals more likely to take actions to improve the common welfare of their community (as described in Chapter 26 of this eBook, which features Alesina et al. 2021).

INSIGHTS FROM THE UNITED STATES DURING THE AGE OF MASS MIGRATION

By the mid-19th century, Americans were the most educated population in the world – financial investments in education were substantial and voluntary attendance was high (Landes and Solomon 1972, Black and Sokoloff 2006, Goldin and Katz 2008). Figure 1 shows that US enrolment rates were above 50%, trending upwards, and diverging from other countries from 1850 onwards. It was also during this period that US states began passing compulsory schooling laws. Massachusetts passed the first compulsory schooling laws in 1852. New York followed the next year and, by 1929, all American children were required to attend at least elementary school.

FIGURE 1   ENROLMENT RATES BETWEEN 1830 AND 1890
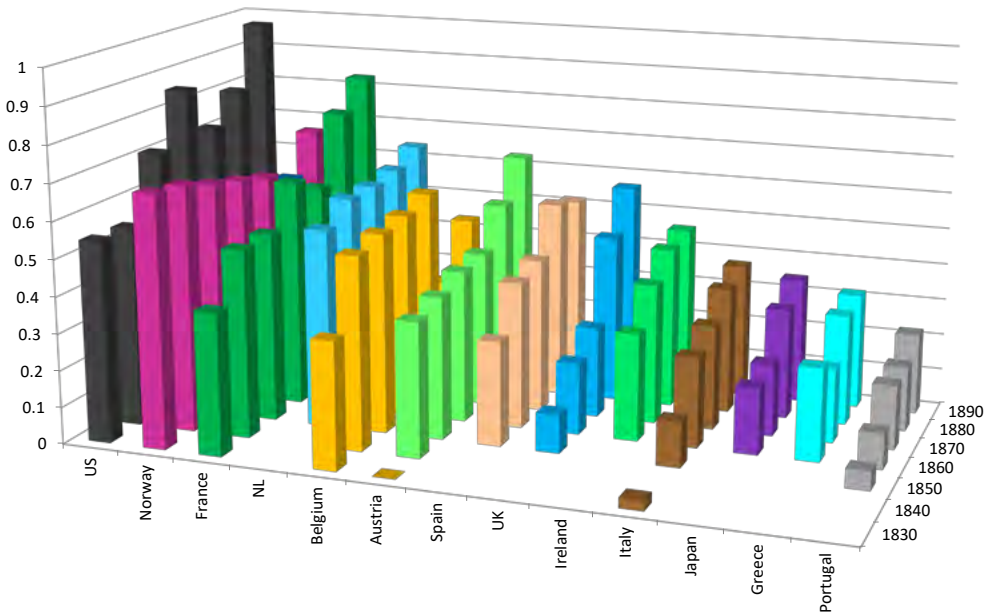
Source: Bandiera et al. (2019).

The timing of these laws is therefore puzzling, as voluntary school attendance, enrollment rates and grades completed were high and trending upwards (Goldin and Katz 2003, 2008). Furthermore, these laws were not targeted at Black children, as legislative caveats often effectively excluded them from schools even post-compulsion (Black and Sokoloff 2006, Collins and Margo 2006). Why were compulsory schooling laws passed at that time? Who was targeted by these laws? In Bandiera et al. (2019), we posit that compulsory schooling laws were in fact aimed at the large and diverse inflows of migrants. Consequently, compulsory schooling was used as a nation-building instrument to instil American civic values among migrant children.

Education as part of a nation-building effort is corroborated by historical records. American legislators and educators at the time viewed compulsory schooling as the key policy tool to nation-build in response to mass migration. They believed exposure to American public schools would instil the desired civic values among migrants, and a recognition that such values could be transmitted from children to their parents. EC Wines, an advocate for common schools in Philadelphia, perhaps best articulated the link between compulsory schooling, immigration and nation building:

"We refer to that overflowing tide of immigration, which disgorges our shores its annual tens of thousands of Europe's most degraded population – men without knowledge, without virtue, without patriotism, and with nothing to lose in any election. Are these persons fit depositaries of political power? The only practicable antidote to this, the

only effectual safe-guard against the other, the only sure palladium of our liberties, is so thorough an education of all our citizens, native and foreign, as shall nullify the dangerous element in immigration" (Wines 1851: 742–3).

The relationship between the timing of the passage of compulsory schooling laws by US states and the types of migrants further substantiates the role of education in nation building. The benefit of teaching civic values in schools would have been higher in states where there was a larger population that lacked such values. This in turn would have pushed US states to pass compulsory schooling laws earlier. One empirical challenge is that the actual civic values held by migrants and the American born are not observed. Given the multidisciplinary body of work documenting the nation-building motives for the development of compulsory state education systems in Europe (Weber 1976, Holmes 1979, Ramirez and Boli 1987, Aghion et al. 2012), Europeans' exposure to such laws is the best available proxy of the civic values held by Europeans. For this purpose, in our paper we create a new data set on the timing of compulsory schooling laws across European countries and US states (see Figure 2). European migrants with historical exposure to compulsory schooling laws were more likely to have been taught civic values than those from countries without such law. One can therefore distinguish between migrants from European countries that had passed compulsory schooling law prior to 1850 (i.e. before the first US state had passed such laws) and those from European countries that passed it later.

FIGURE 2   COMPULSORY SCHOOLING LAWS
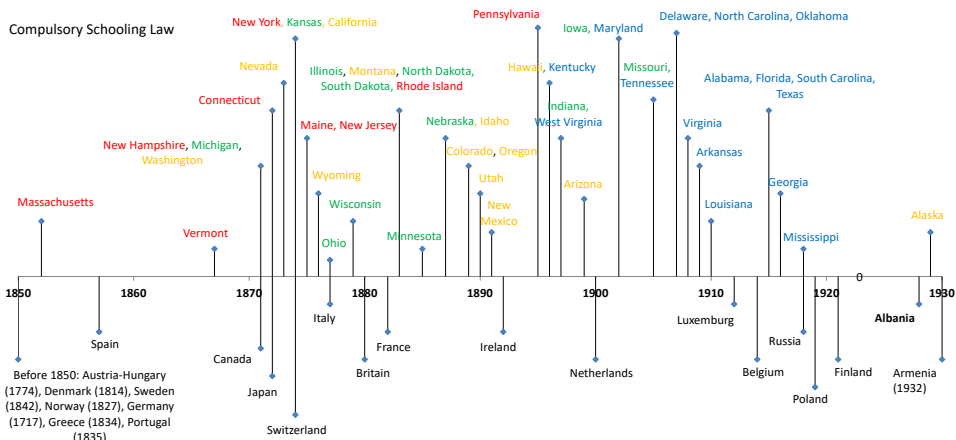
Source: Bandiera et al. (2019).

The key empirical finding is that compulsory schooling laws were passed significantly earlier in US states with a larger share of migrants from European countries without historic exposure to compulsory state schooling in their country of origin. Put differently, the presence of European migrants from countries that do not have historic experience

of compulsory state schooling at home significantly brings forward in time the passage of compulsory schooling in US states: a one standard deviation increase in the population share of such Europeans (representing roughly 100,000 migrants) is associated with a 64% higher probability of compulsory schooling law being passed in that state within the next decade, conditional on compulsory schooling not having been passed in that state until that time. In contrast, the presence of Europeans with a long history of compulsory schooling at home did not influence the timing of the passage of compulsory schooling laws.

Naturally, migrants from different countries differ along many dimensions other than civic values. These, however, do not drive this result, which is robust to controlling for literacy rates among adult migrants, attendance rates of migrant children to some form of school, religion and English language proficiency. Moreover, unobserved state factors that make a location equally attractive to both migrant groups do not bias this result. Finally, this result is robust to accounting for the endogenous location choices of migrants. It also holds across US regions, including Southern and Western states.

Targeting migrants most in need of having their civic values shaped towards what was being taught to American-born children would have been necessary only if the demand for schooling among migrants were sufficiently low. Based on information on local provision of American schools, the relative demand for American schooling among migrants can be inferred. This establishes a counterfactual of migrants' exposure to American schools, absent compulsory schooling laws. European migrants from countries without historic exposure to compulsory state schooling in their country of origin had significantly lower demand for American schools, relative to European migrants from countries with exposure to compulsory schooling. Furthermore, there was a significant convergence in demand for schools and pupil attendance between natives and both groups of European migrants when compulsory schooling laws were introduced. Hence, compulsory schooling did lead to European migrants being more exposed to the civic values being taught in American schools, and this was especially the case for Europeans from countries without historic exposure to compulsory state schooling in their country of origin.

CONCLUSION

International economic disparities, poverty and environmental degradation, combined with wars and human rights violations, are all factors affecting international migration. Today, it is estimated that there nearly 281 million migrants are living in countries in which they were not born (McAuliffe and Triandafyllidou 2021). This has raised challenges in terms of assimilation, integration and national identity. History can offer insights into how to successfully build a nation. The United States is often depicted as a 'melting pot' in which diverse cultures and ethnicities come together to form the fabric of the nation. During the Age of Mass Migration (1850–1930), the United States

experienced an unprecedented wave of migrants. The qualitative and quantitative evidence shows that Americans intentionally used education to homogenise the large and diverse group of migrants. Moreover, compulsory schooling laws effectively changed the demand of migrants for American schooling, bringing them closer to Americans. Through compulsory schooling laws, migrant children were taught the same civic values as American children.

REFERENCES

Aghion, P, X Jaravel, T Persson and D Rouzet (2019), "Education and military rivalry", *Journal of the European Economic Association* 17(2): 376–412.

Alesina, A, P Giuliano and B Reich (2021), "Nation-Building and Education", *Economic Journal* 131(638): 2273–2303.

Almond, G A and S Verba (1963), *An approach to political culture*, Princeton University Press.

Bandiera O, I Rasul and M Viarengo (2013), "The Making of Modern America: Migratory Flows in the Age of Mass Migration", *Journal of Development Economics* 102: 23–47.

Bandiera O, M Mohnen, I Rasul and M Viarengo (2019), "Nation-Building through Compulsory Schooling during the Age of Mass Migration", *Economic Journal* 129(617): 62–109.

Bazzi, S, A Gaduh, A D Rothenberg and M Wong (2019), "Unity in Diversity? How Intergroup Contact Can Foster Nation Building", *American Economic Review* 109(11): 3978–4025.

Bel, G (2011), "Infrastructure and Nation Building: The Regulation and Financing of Network Transportation Infrastructures in Spain (1720-2010)", *Business History* 53(5): 688–705.

Black, S E and K L Sokoloff (2006), "Long-term trends in schooling: the rise and decline(?) of public education in the United States", in E A Hanushek and F Welch (eds), *Handbook of the Economics of Education*, Vol. 1, North-Holland.

Blanc, G and M Kubo (2021), "Schools, Language, and Nations: Evidence From a Natural Experiment in France", Brown University, mimeo

Blouin, A and S W Mukand (2019), "Erasing Ethnicity? Propaganda, Nation Building, and Identity in Rwanda", *Journal of Political Economy* 127(3): 1008–62.

Bowles S and H Gintis (1976), *Schooling in Capitalist America: Educational Reform and the Contradictions of Capitalist Life*, Basic Books .

Brady H, S Verba and K L Schlozman (1995), "Beyond SES: a resource model of political participation", *American Political Science Review* 89(2): 271–94.

Cáceres-Delpiano, J, A I de Moragas, G Facchini and I González (2021) "Intergroup Contact and Nation Building: Evidence from Military Service in Spain", *Journal of Public Economics* 201.

Cantoni, D, Y Chen, D Y Yang, N Yuchtman and Y J Zhang (2017), "Curriculum and ideology", *Journal of Political Economy* 125(2): 338–92.

Clots-Figueras, I and P Masella (2013), "Education, Language and Identity", *Economic Journal* 123(570): 332–57.

Collins, W J and R A Margo (2006), "Historical perspectives on racial differences in schooling in the United States", *Handbook of the Economics of Education*, Vol. 1, pp. 107–54.

Dee, T (2004), "Are there civic returns to education?", *Journal of Public Economics* 88(9): 1697–720.

Dehdari, S H and K Gehring (2022), "The Origins of Common Identity: Evidence from Alsace-Lorraine", *American Economic Journal: Applied Economics* 14(1): 261–92.

Dell, M and P Querubin (2018), "Nation Building through Foreign Intervention: Evidence from Discontinuities in Military Strategies", *Quarterly Journal of Economics* 133(2): 701–64.

Depetris-Chauvin, E, R Durante and F Campante (2020), "Building Nations through Shared Experiences: Evidence from African Football", *American Economic Review* 110(5): 1572–1602.

Fouka, V (2019), "Backlash: The Unintended Effects of Language Prohibition in U.S. Schools after World War I", *American Historical Review* 124(2): 204–239.

Gehring, K (2020) "External Threat, Group Identity, and Support for Common Policies - The Effect of the Russian Invasion in Ukraine on European Union Identity", Cesifo Working Paper.

Glaeser, E, G Ponzetto and A Shleifer (2007), "Why does democracy need education?", *Journal of Economic Growth* 12(2): 77–99.

Goldin, C and L Katz (2003), "Mass secondary schooling and the state: the role of state compulsory schooling in the high school movement", NBER Working Paper No. 10075.

Goldin, C and L Katz (2008), *The Race Between Education and Technology*, Belknap Press for Harvard University Press.

Gradstein, M and M Justman (2002), "Education, social cohesion, and economic growth", *American Economic Review* 92(4): 1192–204.

Helliwell, J and R Putnam (2007), "Education and social capital", *Eastern Economics Journal* 33(1): 1–19.

Holmes, B (1979), *International Guide to Education Systems*, UNESCO.

Kamens, D H (1988), "Education and democracy: A comparative institutional analysis", *Sociology of Education* 61(2): 114–127.

Kersting, F and N Wolf (2021), "On the Origins of National Identity. German Nation-Building after Napoleon", CEPR Discussion Paper No 16314.

Kets, W and A Sandroni (2021), "A Theory of Strategic Uncertainty and Cultural Diversity", *Review of Economic Studies* 88(1): 287–333.

Landes, W and L Solomon (1972), 'Compulsory schooling legislation: an economic analysis of law and social change in the nineteenth century", *Journal of Economic History* 32(1): 53–91.

McAuliffe, M and A Triandafyllidou (eds) (2021), *World Migration Report 2022*, International Organization For Migration.

Milligan, K, E Moretti and P Oreopoulos (2004), "Does education improve citizenship? Evidence from the United States and the United Kingdom", *Journal of Public Economics* 88(9): 1667–1695.

Pritchett, L and M Viarengo (2015), "The State, Socialization and Private Schooling: When Will Governments Support Alternative Producers?", *Journal of Development Studies* 51(7): 784–807.

Ramirez, F O and J Boli (1987), "The political construction of mass schooling: European origins and worldwide institutionalization", *Sociology of Education* 60(1): 2–17.

Renan, E (1995), *Was ist eine Nation?...und andere politische Schriften*.

Tajuddin, S N A A and N Zulkepli (2019), "An Investigation of the Use of Language, Social Identity and Multicultural Values for Nation-Building in Malaysian Outdoor Advertising", *Social Sciences* 8 (1).

Weber, E (1976), *Peasants into Frenchmen: The Modernization of Rural France, 1870–1914*, Stanford University Press.

Wines, E C (1851), *The Biblioteca Sacra and American Biblical Repository*, Vol. 8, W. F. Draper.

You, Y (2018), "Language unification, labor and ideology", working paper.

ABOUT THE AUTHORS

Myra Mohnen is an Assistant Professor at the University of Ottawa. She holds a PhD in Economics from the University College London. She is also a Research Fellow at ECONtribute (Universities of Bonn and Cologne) and a Research Associate of the Centre for Economic Performance (LSE). Her research is at the intersection of economic history,

labour economics, and innovation. Her current work focuses on the effect of connectivity on labour market outcomes, in particular the impact of social contacts, research collaborations and geographical proximity.

Martina Viarengo is a tenured Associate Professor in the Department of International Economics of the Geneva Graduate Institute. She is faculty associate at the Harvard University, Center for International Development, principal investigator of the Swiss National Center of Competence in Research and a CEPR fFllow. Prior to joining the Graduate Institute's faculty, Professor Viarengo was an economist at the Centre for Economic Performance of the London School of Economics and a postdoctoral fellow at the Harvard University, John F. Kennedy School of Government. Professor Viarengo is a specialist in public policy, labour economics and economic development. Her research focuses on labor markets, comparative education policy and international migration. She holds a PhD from the London School of Economics and a Master's Degree from Northwestern University.

CHAPTER 10

Education, language and national identity: Evidence from education reform in Catalonia

Irma Clots-Figueras[a] and Paolo Masella[b]
[a]University of Kent; [b]University of Bologna

Throughout history, mass education has often been considered a powerful tool in the hands of governments to homogenise the population of a country, instil civic values and shape the hearts and minds of the young generations.

Ramirez and Boli (1987) discuss the political origins of mass education in Europe between the 18th and 19th centuries. Internal political turmoil and the perception of external threats often contributed to the salience of the mass education issue within the political agendas of European states. The extension of schooling to a larger share of the population was considered instrumental to the creation of a national sentiment within the state, and to the mobilisation of a country to overcome internal and external obstacles. Indeed, we observe increased funding in the educational system and/or the introduction of compulsory education in Prussia after the defeats against Napoleon, in France after the defeat against Prussia in 1870, and in Italy once the political (but not cultural) unification was completed.

Several features of an educational system may help strengthen national identity within the school population. First, the adoption of the national language as the main language of instruction may induce a stronger sense of belonging to the nation, especially within societies where language is historically a crucial feature of national identification. The diffusion of a common national language may also increase the intensity of communication between individuals from different groups and between citizens and their government,

therefore increasing the level of homogenisation within a country. Second, education is likely to affect identities through indoctrination and the contents of the subjects taught at school. Curricula, textbooks and teachers are chosen by the government. Teaching national history, for instance, could very well impact the national sentiment of students.

The overall effects of indoctrination and a common language of instruction on the national identification of the young generations are obviously very likely to depend on how large the share is of children who attend school. Policies that increase the number of schools in rural areas, or that make schooling compulsory for a certain period of time may certainly amplify the effects of indoctrination and the introduction of a national language of instruction. Bandiera et al. (2018), featured in Chapter 9 of this eBook, argue that making education compulsory was used as a nation building tool in the United States during the Age of Mass Migration.

EDUCATION, LANGUAGE AND NATIONAL IDENTITY IN CATALONIA

One strand of the social sciences literature has investigated the complex relationship between education and national sentiments by trying to quantify the effects of country-specific reforms of the schooling system on people's identity. In 1983, the Catalonia region of Spain experienced a quite radical reform of the educational system. Until that year, Spanish was the official language of instruction in Catalan schools. After the end of Franco's dictatorship, more competencies were attributed to regions and, in an effort to promote the diffusion of the Catalan language, the Catalan government introduced bilingualism in the educational system and both Catalan and Spanish language were adopted as the main languages of instruction.

The implementation of such an important reform of the schooling system also required other non-trivial adjustments. Old textbooks and teaching materials had to be either translated or replaced, with new textbooks written in Catalan by Catalan speakers. Teachers had to be retrained and new teachers proficient in the Catalan language had to be hired. School curricula changed as well – Catalan history, culture and geography were supposed to have a more prominent role.

Using survey data provided by the Centro de Investigaciones Sociologicas (CIS) on the political and social attitudes of residents in Catalonia and comparing cohorts that were differentially affected by the reform, in Clots-Figueras and Masella (2013) we estimate the global effect of the reform on national identity.

In 2001, respondents were asked questions about their national attachment – in particular, with which of the following sentences they identified the most: (1) "I feel Spanish", (2) "I feel more Spanish than Catalan", (3) "I feel as Spanish as Catalan", (4) "I feel more Catalan than Spanish, (5) I feel only Catalan" – their political behaviour and their preferences about how the Spanish state should be organised and what degree of independence the Catalan region should have.

With the reform, younger cohorts were affected by greater exposure to teaching in Catalan. In 1983 only primary education was compulsory in Spain; therefore, only individuals born in 1970 or afterwards received at least one year of compulsory education in Catalan language, while individuals born after 1976 received all their primary education under the new regime.

FIGURE 1   IDENTITY: INDIVIDUALS MOST AFFECTED AND NOT AFFECTED BY THE REFORM
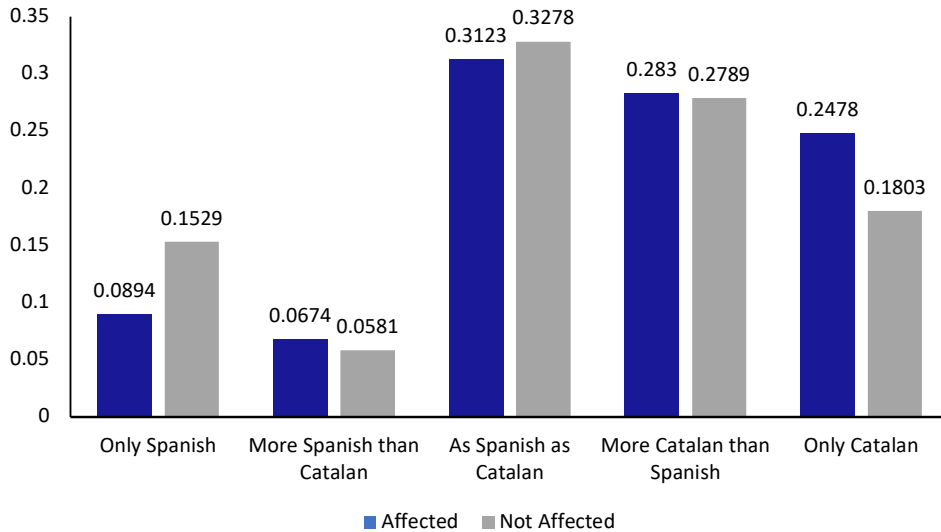
We provide robust evidence that those individuals in Catalonia who experienced greater exposure to the schooling system after the reform were more likely to have a stronger Catalan identity. In Figure 1, the answers given to the identity question for two groups of individuals are plotted: those who had at least one year of compulsory education after the reform, and thus were affected by it, and those who did not. Differences are notable and mostly at the extremes: the proportion of individuals answering "I feel only Catalan" increases by 6.75 percentage points with the reform, while the proportion of individuals answering "Only Spanish" decreases by 6.35 percentage points. Respondents from cohorts more exposed to the new Catalan schooling system were also more likely to vote for Catalan parties and to have stronger separatist attitudes.

Regression results suggest that one year of exposure to the reform increases the probability of feeling only Catalan, more Catalan than Spanish or as Catalan as Spanish by more than two percentage points.

In an earlier paper (Aspachs-Bracons et al. 2008), we also compare the results of the reforms in Catalonia and the Basque Country. In both regions, in 1983 the education system became bilingual. But there was a significant difference between the reforms

implemented in these two Spanish regions: whereas in Catalonia the reform was compulsory, in the Basque Country parents could choose the language used to educate their children. Using survey data, we study how parental choices and schooling interact with each other and contribute to the development of individual identity. Results confirm a significant effect of the compulsory language policy implemented in Catalonia on identity, in sharp contrast to the results in the Basque Country, where the non-compulsory language policy did not have an effect.

RELATED LITERATURE

Language of instruction and nation building

The language of instruction has been changed in other countries at different times in history. For example, linguistic homogenisation through education was the main goal of the Chinese Pinyin Act of 1958–1960. In a country with such strong linguistic diversity as China, the government required all the schools to have Mandarin as the main language of instruction. After the reform, teachers had to teach in Mandarin and students were strongly encouraged to communicate in Mandarin.

You (2018) discusses the effect of the educational law on a variety of social and economic outcomes. In particular, he investigates changes in the national sentiments of cohorts affected by the reform and how these changes depend on the linguistic distance between Mandarin and the dialect commonly spoken in the location where they live. As a result of the introduction of a common language in education, the author finds that the Chinese were more likely to have a stronger national sentiment; in fact, they were more likely to be proud to be Chinese and to identify with the entire country rather than with their local community. The reform also increased support for the government, and in general for a stronger government role in the economy. The media was found to be one likely channel, given that the language unification policy increased access to radio programmes promoting the merits of the national government and of socialism in general.

Forced assimilation policies can be successful, but they may also backfire. For example, they may be perceived to be aimed at repressing the culture of a specific minority. As pointed out by Fouka (2019) (see Chapter 13 of this eBook), before World War I, German Americans represented the largest group among first-generation immigrants in the United States and given the large share of German-speaking population, bilingual education was often provided not only by private schools but also by public schools in districts where the German minority was more widespread. The political climate, however, changed rapidly during World War I when strong anti-German feelings became predominant, and the German community was the subject of numerous episodes of discrimination and hate crimes. The use of German soon came under scrutiny and several restrictions were placed to limit its use in media and public places. Between 1917 and 1923, mainly as a result of the growing anti-German sentiment, several US states banned the use of foreign languages in elementary schools. However, the policy led to a backlash: the

children of German American origin affected by the policy were less likely to volunteer for the US army during World War II, they were more likely to get married within their group and more likely to choose German names for their sons and daughters. The effect was more intense in counties where the size of the German minority was smaller or the initial strength of ethnic identification within the German community was higher.

Educational content and nation building

Changes in educational content can also affect nation building. Cantoni et al. (2017), featured in Chapter 11 of this eBook, focus on the effects of educational content on national sentiment and attitudes towards the government using data from China. Between 2004 and 2010, the Chinese Communist Party implemented an Eight Curriculum Reform that introduced massive changes to the high school curriculum and involved deep revisions of textbooks. By analysing government documents on the aims of the reform, as well as differences between old and new textbooks and between the old and new curricula, the authors argue that the government's objectives were to emphasise the institutional legitimisation of the Chinese government, the merits of a 'socialist democracy', the advantages of an 'orderly political participation' ensured by the Communist Party, the superiority of the 'socialist market economy' compared to Western market institutions, and the importance of a strong national spirit.

The authors show that the reform was broadly successful in shaping the attitudes and beliefs of students. Students exposed to the reform indeed have more positive feelings towards government officials and Chinese institutions in general and are more sceptical towards Western economic institutions. However, there is no detectable change in national sentiment and the strength of Chinese identity. Also, no change in political behaviour was observed as a consequence of the reform.

State capacity, education and nation building

The extent to which the introduction of a new language of instruction or the revision of the curricula affects the national sentiment of the population may very well depend on the dissemination of schools across the territory of a country or, more generally, on the share of state spending on education.

The Guizot Act (1983) represented a major reform of the French educational system that not only changed the content and language of education but at the same time extended the share of population exposed to public education. The law introduced a unique national language of instruction and the teaching of national history. It also centralised the recruitment system of teachers and led to a massive increase in school buildings, as it required every city with more than 500 inhabitants to have a school. Blanc and Kubo (2021), featured in Chapter 8, discuss several possible effects of the Guizot Act. In particular, they compare cities of populations slightly below 500 inhabitants before the implementation of the act with cities of populations slightly above. They observe a stronger linguistic homogenisation and a stronger national identity (measured by

participation in the Resistance during World War II) in the latter. Evidence on how state capacity may be crucial to effectively indoctrinate students is also provided by Belmonte (2020) in the context of the Italian fascist regime. In addition, Cinnirella and Schueler (2018), described in Chapter 12, show a positive association between central spending on education and the share of votes obtained by pro-nationalist parties in Prussia in the period between 1886 and 1911.

CONCLUSIONS

Historically, education has often been perceived as a tool to shape the hearts and minds of the young generations. Studies analysing different types of educational reforms in different countries at different points in times seem to suggest that both the language of instruction and the content of education are indeed likely be important determinants of the diffusion of a national sentiment among students. More research, however, is needed to have a more refined understanding of the mechanisms and the factors through which the educational process affects nation building.

While nation building policies in education have been shown to affect national identity and preferences, this does not necessarily imply that these types of policies can be used to foster immigrant integration.

REFERENCES

Aspachs-Bracons, O, I Clots-Figueras, J Costa-Font and P Masella (2008), "Compulsory Language Educational Policies and Identity Formation", *Journal of the European Economic Association* 6(2-3): 434–444.

Bandiera, O, M Mohnen, I Rasul and M Viarengo (2019), "Nation-building through compulsory schooling during the age of mass migration", *Economic Journal* 129: 62–109.

Belmonte, A (2020), "State Capacity, Schooling, and Fascist Education: Evidence from the Reclamation of the Pontine Marshes", CAGE Working Paper.

Blanc, G and M Kubo (2021), "Schools, Language, and Nations: Evidence From a Natural Experiment in France", mimeo.

Cantoni, D, Y Chen, D Y Yang, N Yuchtman and Y J Zhang (2017), "Curriculum and Ideology", *Journal of Political Economy* 125(2).

Cinnirella, F and R Schueler (2018), "Nation building: The role of central spending in education", *Explorations in Economic History* 67: 18–39.

Clots-Figueras, I and P Masella (2013), "Education, Language and Identity", *The Economic Journal* 123: F332–F357.

Fouka, V (2019), "Backlash: The Unintended Effects of Language Prohibition in U.S. Schools after World War I", *American Historical Review* 87(1): 204–239.

Ramirez, F O and J Boli (1987), "The Political Construction of Mass Schooling: European Origins and Worldwide Institutionalization", *Sociology of Education* 60(2).

You, Y (2018), "Unified Language, Labor and Ideology", mimeo.

ABOUT THE AUTHORS

Irma Clots-Figueras is a Professor of Economics at the University of Kent and a co-director of DeReCK (Development Economics Research Centre at Kent). She was previously at Universidad Carlos III de Madrid, and received her PhD from the London School of Economics in 2006. Her research interests include development economics, labor economics, migration, cultural economics, and political economy. In 2019 she was awarded the Sabadell-Herrero Prize for the Best Young Spanish Economist.

Paolo Masella is a Professor of Economics at the University of Bologna. He received a PhD in Economics from the London School of Economics and is IZA Research Fellow from 2013. His main research interests include the economics of identity, discrimination and migration. He has worked on the consequences of the expansion of citizenship rights and on patterns of diffusion of social norms, ideas and ethnic sentiments.

CHAPTER 11

Curriculum and ideology: Evidence from China

Davide Cantoni,[a] David Y Yang[b] and Noam Yuchtman[c]
[a]Ludwig Maximilian University of Munich; [b]Harvard University; [c]London School of Economics

Education shapes young minds. Scholars across the social sciences have long argued that schools play an important role in shaping political attitudes and creating national identity (Alesina et al. 2021, featured in Chapter 26 of this eBook). Examples that have received scholarly attention include the formation of a French national identity in the 19th century (Weber 1976, and Blanc and Kubo 2021 featured in Chapter 8); the creation of a Russian identity encompassing the Ukraine (Plokhy 2017); the development of an ultranationalist, Nazi ideology in the Third Reich (Voigtlaender and Voth 2015); and the development of Catalan identity (Clots-Figueras and Masella 2013, described in Chapter 10). Scholars have also made the case for a role for education in shaping a polity, such as the cultivation of citizens capable of participating in the US democratic system in the 19th and 20th centuries (Dewey 1916, Lipset 1959, and Bandiera et al. 2019, described in Chapter 9) or the production of masses who fit into the capitalist (Bowles and Gintis 1976) or socialist (Lott, Jr 1999) systems of the 20th century.

Contemporary debates continue to rage regarding the politics of curricular reforms. Examples range from the teaching of evolution in US schools (Arold 2022), to the role of madrassas in the Islamic world (Bazzi et al. 2020), to the coverage of wartime atrocities in Japanese or Turkish history textbooks (Dixon 2018).[1] In 2012, an attempt to introduce a mainland Chinese curriculum into Hong Kong schools led to tens of thousands of

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1   See also www.nytimes.com/2007/04/01/world/asia/01japan.html

people taking to the streets in protest.[2] The idea that schooling can be used to mould – or more pejoratively, 'brainwash' – children's views of their social, economic and political environment is powerful; it resonates across time and space.

Yet, despite this resonance and despite historical examples of schooling changes being associated with ideological changes, it is extremely difficult to determine whether schooling plays a causal role in shaping beliefs. Consider the case of Nazi education in 1930s Germany. One might wish to study the effects on the attitudes of individuals who were of school age during the Third Reich, comparing them to other cohorts. However, when observing different attitudes among individuals who studied in Nazi-era schools, one might question whether the schools themselves affected beliefs or whether young people in the time of the Third Reich were differentially affected by the environment around them – their parents, the media and what they observed in their daily lives. More generally, it is difficult to disentangle the effects of curriculum from those other social, political or economic changes which also shape preferences.

A REFORM IN CHINA

Starting in 2004, China introduced a nationwide reform of its curriculum, including significant changes to the textbooks used by students in senior high school (grades 10 to 12). This reform was shaped by a series of documents issued by the Ministry of Education and the State Council (the highest administrative body in the Chinese government), which reveal the importance attributed by Chinese officials to the textbooks and their ability to shape citizens' views. One of the authors of the new textbooks wrote,

> *"Writing the Politics textbook is an act at the state level, rather than an academic activity of the individual author … With a large readership, it will influence an entire generation of young people."*

The new textbooks were rolled out in a staggered manner across China's 29 provinces between 2004 and 2010. In different years in different provinces, cohorts of students entering high school began studying from the new textbooks, preparing for a college entrance exam (*gaokao*) that would be based on the new materials. Cohorts already in high school continued to study the old textbooks and were tested on these. Figure 1 shows the dates when the new curriculum was introduced in each province.

In Cantoni et al. (2017), we attempt to identify the causal effects of this new curriculum. The staggered introduction allows us to compare the attitudes of adjacent cohorts of students who were exposed to different curricula within a particular province, while accounting for the cross-cohort differences that existed even when the curriculum was the same across those cohorts.

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2   See www.nytimes.com/2012/09/04/world/asia/04iht-educbriefweb.html

FIGURE 1   YEARS OF INTRODUCTION OF THE NEW CURRICULUM
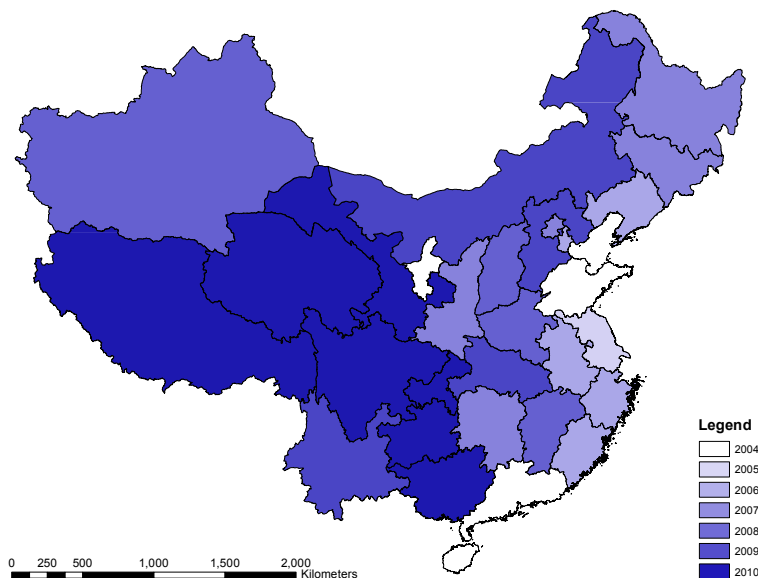
THE OBJECTIVES OF THE REFORM

We match the goals of the curriculum reform articulated by the Ministry of Education and the State Council in official documents to changes in textbook content across curricula, and also to changes in the frameworks structuring the high-stakes gaokao exams. We identify the following attitudes as key objectives of the reforms:

1. **Views on governance**. Teaching students about institutions that legitimised the Chinese government and its officials, especially adherence to rule of law.

2. **Views on Chinese political institutions**. Teaching students about 'socialist democracy'. This notion of democracy is more limited than the Western concept – it involves the participation of citizens while maintaining the political status quo of one-party rule.

3. **Views on economic institutions**. Emphasising the importance of the 'socialist market economy' (as opposed to a free market economy) for economic and social development.

4. **Views on Chinese identity**. Cultivating a 'national spirit' encompassing both the majority Han Chinese and the minority ethnic groups in China.

5. **Attitudes towards the environment**. Instilling consciousness of the environment as a value.

In addition to our qualitative analysis of the textbooks' content, we conduct a quantitative analysis of the text in the old and new politics curricula. To structure our analysis, we search for each word contained in the Chinese State Council document outlining the government's objectives for the reform. We then calculate the frequency of those words in the old politics textbooks and the new ones. We also refine our search for words by manually identifying 67 out of the 1,166 words within the State Council document that match our five broad categories of interest. For comparison, we also search for the 1,166 most frequent words in the Chinese language, taken from the Modern Chinese Frequency Dictionary, and again calculate the frequency of each word in the old and new textbooks.

In Figure 2, we present the cumulative distribution functions of the percentage change in the frequency of words across curricula, for three sets of words: (1) the full set of government document words, (2) the subset of government document words that match our five main attitudes of interest, and (3) the dictionary words. One can see in the figure that the words present in the government document increase in frequency systematically more than the comparison dictionary words. Moreover, the words linked to our five broad categories of interest show much greater increases in frequency than the other government document words – again, this is seen across the distribution of words.

FIGURE 2   WORD CHANGE FREQUENCY: CURRICULUM CONTENT VERSUS COMMON WORDS
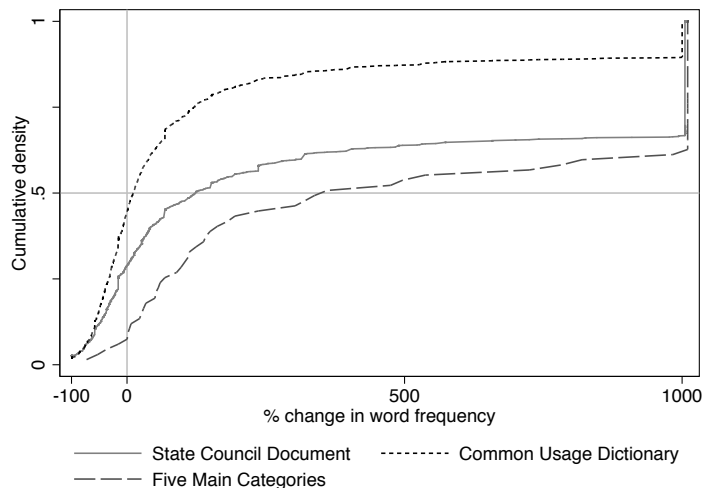
SURVEYING CHINESE STUDENTS

To identify the impact of the new curriculum on the attitudes it was designed to shape, in 2013 we conducted a novel survey among nearly 2,000 Peking University undergraduate students. The survey covered four cohorts of elite Chinese university students who

entered high school between 2006 and 2010, drawn from 29 provinces. For each one of the textbook reform's goals listed above, we designed a series of survey questions aimed at identifying changes in relevant attitudes.

It is important to note that we specifically asked students questions in a manner that did not look like a series of examination questions; nor do the patterns of responses look like responses to examination questions. There is a great deal of variation; indeed, the variation in responses to questions about trust in government officials is actually greater within our sample than in the broader AsiaBarometer sample of individuals. This also confirms the general view of Peking University students at the time as relatively liberal and outspoken.

FINDINGS: SUCCESSFUL INDOCTRINATION

We find that the new curriculum was often successful in changing students' attitudes on important issues, in the direction intended by the Chinese government (see Figure 3). Regarding *governance*, students exposed to the new curriculum have greater trust in government officials, view government officials as more civic-minded, and see bribery as less prevalent and effective. With respect to *political institutions*, students exposed to the new curriculum see China as more democratic and view individuals' political participation as a defining characteristic of democracy, but are more sceptical of unconstrained democracy. Finally, students exposed to the new curriculum express more sceptical views of unconstrained free markets, again matching the content of the new curriculum and the government's aim of teaching students about Chinese *economic institutions*, as opposed to Western, free-market institutions.

On the other hand, we do not find statistically significant effects for some of the attitudes that we examine. As desired by the government, students express somewhat more 'multi-ethnic' views of Chinese *national identity* and also express a somewhat stronger sense of their own national identity, though these effects are not statistically significant. The new curriculum did not cause students to favour policies protecting the *environment*. In fact, attitudes move in the opposite direction to what the government intended, perhaps because environmental protection can be seen as opposed to economic growth – another high priority.

Note that these results account for differences in attitudes across provinces and cohorts, and do not result from different (socioeconomic) characteristics of the cohorts studying under the old and the new curriculum. In fact, along all observable dimensions, the students in our sample who studied under the old and the new curriculum are virtually indistinguishable. This similarity in demographic characteristics across the two curricula suggests that we are able to identify a causal effect within our sample.

FIGURE 3   ATTITUDINAL CHANGES BY (RELATIVE) COHORT AND TOPIC
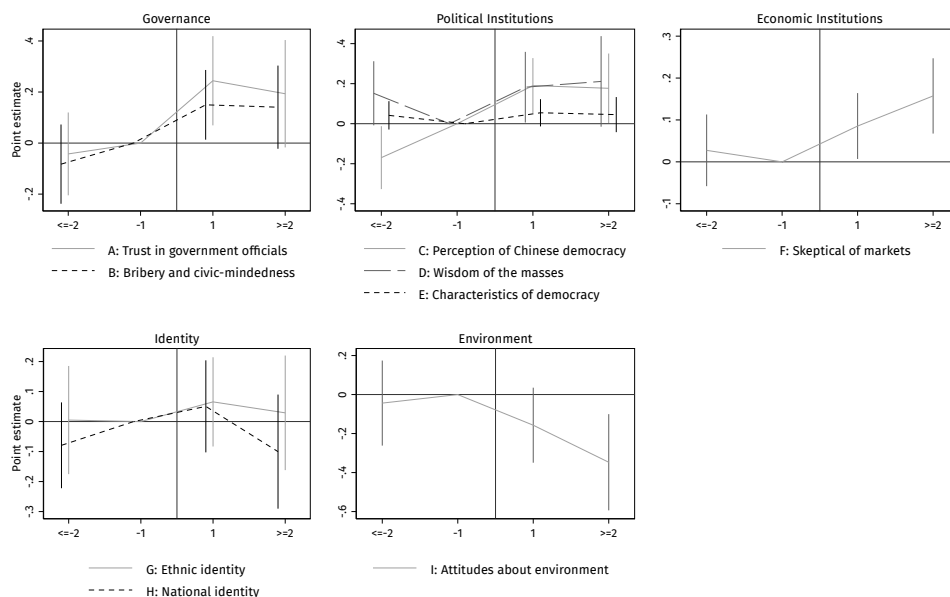
HOW BIG OF AN IMPACT?

The magnitudes of the effects we observe are substantial. We estimate that around 20% of students who would not have held the government's desired views in the absence of exposure to the new curriculum were persuaded by it. This makes schoolbooks a much more effective tool of persuasion than other means of so-called 'oblique' transmission of beliefs, such as advertising or mass media (DellaVigna and Gentzkow 2010).

We can also compare the effect of the new curriculum to the association between attitudes and students' socioeconomic or demographic characteristics that might plausibly affect views and attitudes. Our estimates imply that studying under the new curriculum moves a student's belief about democracy in China by about 25% of one standard deviation in the direction desired by the government. For comparison, having parents who are Communist Party members has an effect of only 10% of a standard deviation.

HOW GENERAL ARE THE LESSONS FROM THIS REFORM?

It is natural to wonder what our results imply about attempts by the state to shape attitudes in other cultural and social settings, for example in the United States or in Western Europe. On the one hand, one might think that our findings represent the upper bound of what the state can achieve with a curriculum reform. After all, we studied a project of a strong autocratic Chinese state, and measured the results on the hyper-competitive Chinese students who achieved nearly perfect scores on their college entrance exams to attain admission to Peking University. On the other hand, Peking

University students at the time of our study were known to be especially critical of their state and willing to speak out against it, having been at the centre of pro-democracy movements, with continued open discussions of attitudes deviating from the party line. If the politically liberal students at Peking University had their views changed by their high school textbooks, it is reasonable to hypothesise that a less critical population might be even more susceptible to the persuasive power of educational content.

CURRICULUM AND IDEOLOGY TODAY

The evidence we find of successful state indoctrination is more relevant than ever in light of the increased politicisation of educational content around the world today. Authoritarian examples include Chinese Communist Party efforts to indoctrinate the populations of China and Hong Kong and Russia's 'Patriotic Education' campaigns. Even within democracies, sensitivity towards the ideological content of education has increased as societies have become more polarised – for example, whether education should attempt to correct historical injustices is a topic of heated debate in the United States and the United Kingdom.

What will the future bring? Much recent research suggests that even as governments aim to shape students' ideologies, they will face limits to what they can achieve. Parents will naturally push back against indoctrination that they oppose (see, for instance, Chapter 13 on Fouka 2020); students will mobilise against education that they perceive to be propaganda (for example, in Hong Kong in the early 2010s); and religious and civil society organisations will respond by offering their own educational institutions, when the state allows it (as described in Chapter 14 featuring Bazzi et al. 2022).

The creation of national identity through common educational content has no necessary normative implications. Like technology, it depends on the purpose to which it is put. All governments – whether well- or ill-intentioned – are likely to apply ever more effective indoctrination tools towards the shaping of national identity. Yet, multiple equilibria are possible (Carvalho et al. 2022). Just as government propaganda tools become more sophisticated, so does the technology that allows private citizens to maintain their culture, ideology and social networks. Governments may overcome private resistance to indoctrination or be constrained by it.

POLICY IMPLICATIONS

We see two important policy aims of individuals and institutions with liberal views. First, the promotion of democratic ideology can be strengthened in Western democracies, but only if states emphasise the (disappearing) common ground among their populations. Second, the spread of authoritarian ideology can be restrained through the empowering of civil society groups and opposition communities, who will naturally maintain and transmit their values in defiance of authoritarian education.

Alesina, A, P Giuliano and B Reich (2021), "Nation-building and education", *The Economic Journal* 131(638): 2273–2303.

Arold, B W (2022), "Evolution vs. creationism in the classroom: The lasting effects of science education", ifo Working Paper No. 379.

Bandiera, O, M Mohnen, I Rasul and M Viarengo (2019), "Nation-building through compulsory schooling during the age of mass migration", *The Economic Journal* 129(617): 62–109.

Bazzi, S, G Koehler-Derrick and B Marx (2020), "The institutional foundations of religious politics: Evidence from Indonesia", *The Quarterly Journal of Economics* 135(2): 845–911.

Bazzi, S, M Hilmy and B Marx (2022), "Islam and the state: Religious education in the age of mass schooling", NBER Working Paper No. 27073.

Blanc, G and M Kubo (2021), "Schools, Language, and Nations: Evidence From a Natural Experiment in France," unpublished manuscript, University of Manchester.

Bowles, S and H Gintis (1976), *Schooling in Capitalist America: Educational Reform and the Contradictions of Economic Life*, Basic Books.

Cantoni, D, Y Chen, D Y Yang, N Yuchtman and Y J Zhang (2017), "Curriculum and Ideology", *Journal of Political Economy* 125(2): 338–392.

Carvalho, J-P, M Koyama and C Williams (2022), "Resisting education", available at SSRN 4195117.

Clots-Figueras, I and P Masella (2013), "Education, language and identity", *The Economic Journal* 123(570): F332–F357.

DellaVigna, S and M A Gentzkow (2010), "Persuasion: Empirical Evidence", *Annual Review of Economics* 2(1): 643–669.

Dewey, J (1916), *Democracy and Education: An Introduction to the Philosophy of Education*, Macmillan.

Dixon, J M (2018), *Dark Pasts: Changing the State's Story in Turkey and Japan*, Cornell University Press.

Fouka, V (2020), "Backlash: The unintended effects of language prohibition in US schools after World War I", *The Review of Economic Studies* 87(1): 204–239.

Lipset, S M (1959), "Some Social Requisites of Democracy: Economic Development and Political Legitimacy", *The American Political Science Review* 53(1): 69–105.

Lott, Jr, J R (1999), "Public Schooling, Indoctrination, and Totalitarianism", *Journal of Political Economy* 107(S6): S127–S157.

Plokhy, S (2017), *Lost kingdom: The quest for empire and the making of the Russian nation*, Hachette.

Voigtländer, N and H-J Voth (2015), "Nazi indoctrination and anti-Semitic beliefs in Germany", *Proceedings of the National Academy of Sciences* 112(26): 7931–7936.

Weber, E (1976), *Peasants into Frenchmen: The Modernization of Rural France, 1870–1914*, Stanford University Press.

ABOUT THE AUTHORS

Davide Cantoni is an economist working on economic history and political economy. He studied economics in Mannheim, Berkeley, and Harvard, where he obtained his PhD in 2010. He is Professor of Economics and Economic History at the University of Munich, Germany. His research covers various topics focusing on the political economy of educational content, the effect of institutions and culture on long-run development, and the dynamics of political change. He is recipient of two ERC grants, Research Fellow at CEPR and CESifo, and member of the editorial board at the *Review of Economic Studies*.

David Y. Yang is a Professor in the Department of Economics at Harvard University, a Faculty Research Fellow at NBER and a Global Scholar at CIFAR. David's research focuses on political economy. In particular, he studies the forces of stability and forces of changes in authoritarian regimes, drawing lessons from historical and contemporary China. He received a BA in Statistics and a BS in Business Administration from University of California at Berkeley, and PhD in Economics from Stanford.

Noam Yuchtman is a Professor of Management at the LSE. He is also a co-managing editor of the *Review of Economic Studies* and serves on the editorial boards of the *Economic Journal* and the *Journal of Economic History*. Noam's research on political economy, labour economics, and economic history has been published in journals including the *American Economic Review, Econometrica*, the *Journal of Political Economy*, the *Quarterly Journal of Economics*, and the *Review of Economic Studies*.

CHAPTER 12

Lessons from Bismarck's Germanisation policy

Francesco Cinnirella[ac] and Ruth Maria Schüler[b]
[a]University of Bergamo; [b]German Economic Institute; [c]CEPR

1 INTRODUCTION

The German Empire was founded in 1871 with Prussia as its hegemon state. Being German-speaking and Protestant became the dominant ethnic and religious feature of the newly founded nation, the so-called 'norm' for a citizen. Emerging from the idea of a nation state requiring cultural and linguistic homogeneity, oppressive policies against linguistic and denominational minorities, mainly against Polish-speaking and Catholic citizens, were issued and unfolded German-Polish and Protestant-Catholic antagonism.

The 19th and early 20th centuries were marked by national movements all over Europe, amplified by national sentiments awakened after World War I. Examining the consequences of oppressive policies against the Polish-speaking and Catholic minorities in Prussia right after the foundation of the German Empire shows that these policies strengthened the identity of the minority group instead of achieving linguistic and denominational homogenisation. Consequently, instead of creating a unified nation, cultural and denominational segregation were fostered and both a Polish and a Catholic milieu emerged. However, Prussia of the end of the 19th century also yields an example of an alternative nation-building policy. With a shift in education spending towards the central state, voters in regions with a higher share of central spending tended to increase their support for pro-nationalist parties. Putting these pieces together, evidence shows

that repressive policies tend to fail in achieving homogenisation or even assimilation. Instead, higher investments from the central level, particularly for the identity-building educational sector, can shift political support towards system-supporting political actors.

In this chapter, we first look at the outcomes of marginalising policies against the Slavic-speaking and Catholic population in Prussia (sections 2 and 3) and then shift our attention towards central education spending and its effects on electoral outcomes (section 4), before concluding and deriving policy implications (section 5).

2 GERMANISATION POLICY STRENGTHENS POLISH IDENTITY

In the late 19th century, one third of the Prussian population had formerly belonged to the Polish-Lithuanian Commonwealth (Alexander 2008). This was due to the conquest of Pomerania and Silesia in the 17th and 18th centuries, the three partitions of Poland at the end of the 18th century, and the fourth partition during the Congress of Vienna in 1815 (Hansen and Wenning 2003). The regions of the Polish-Lithuanian Commonwealth had experienced an in-migration of German settlers since the early Middle Ages following the territorial expansion of both the Holy Roman Empire and the Teutonic Order. Consequently, Germans and Poles had lived side by side even before these regions became Prussian (Zernack 2008). After coming under Prussian rule, the Prussian authorities encouraged German-speaking colonisers to settle in the newly acquired Grand Duchy of Posen, and especially in West Prussia to populate vacant and devastated territories. At the beginning, mainly German-speaking settlers came. When wars and epidemics led to a shortage of German-speaking settlers, Lutheranian Austrians (*Salzburger*), Masurian Poles, Lithuanians and French Huguenots were invited to settle in the eastern parts of Prussia (Zbroschzyk 2014). The West-to-East migration was finally reversed when people – of both German and Polish origin – started to move to the industrialising regions of the Rhineland in the 1880s and 1890s (Wünsch 2008).

When the German Empire was founded in 1871, Imperial Chancellor Otto von Bismarck began to promote an oppressive Germanisation policy against the Poles, thus initiating a German-Polish antagonism (Alexander 2008). Primary schools played a particularly important role in the assimilation of Polish-speaking students in Prussia east of the river Elbe (Lamberti 1989). While a regulation in 1842 had mandated that the language of instruction was to be that of the majority of the students, German was gradually established as the only language of instruction after 1871. Beyond an oppressive language policy, more than half of the school curriculum was devoted to German and history lessons aiming at forming loyal citizens (Lundgreen 1976), leading to non-German speaking groups perceiving primary education policy as a threat to their cultural identity.

According to the historical narrative, the Germanisation policy did not achieve its objective of generating a homogenous German-speaking nationhood (Alexander 2008). Instead, Poles began to establish their own parallel society by founding their own

banks, organising themselves in clubs, and passing on Polish-specific human capital in confirmation classes. Beyond that, the establishment of Polish cooperatives was a central aspect of the Polish national movement (Suesse and Wolf 2020).

In Cinnirella and Schüler (2016), we show how the Polish-German antagonism, evoked by the Germanisation efforts in Prussian primary schools, affected local spending for the primary school system. In regions where polarisation between Germans and Poles was high, we find that local spending for primary schools was lower. Our research furthermore empirically traces the historical narrative of an unsuccessful Germanisation policy. Despite the repressive language policy, the share of Polish-speaking students *increased* in the province of Posen, which was particularly targeted by the Germanisation policy. Yet, we cannot disentangle whether this increase was due to migration patterns of German- and Polish-speaking Prussians or due to stronger identification with the Polish language. If the former was true, the Germanisation policy ultimately led to segregation with a concentration of Polish speakers in the former regions of the Polish-Lithuanian Commonwealth such as in the province of Posen.

3 CENTRALISED MONITORING, RESISTANCE AND REFORM OUTCOMES AGAINST THE BACKGROUND OF THE *KULTURKAMPF*: PROTESTANTS VERSUS CATHOLICS

The foundation of the German Empire evoked another cultural antagonism between the two major denominations, the Protestants and the Catholics. The Catholic population constituted a denominational minority in the newly founded empire, which was dominated by Prussian-Protestant hegemony (e.g. Landry 2011). In 1870, just one year before the German Empire was founded, the Catholic Church had declared the papal infallibility which later seemed incompatible with the sovereignty of the German Emperor as head of the state (Hatfield 1981). Both events led to a conflict between the Prussian government and the Catholic Church that characterised the Protestant–Catholic relationship throughout the first decade of the newly founded Empire and was labelled the *Kulturkampf*. In addition to a series of laws intended to limit the influence of the Catholic Church, primary education was used as a battlefield for this cultural conflict. As described in Lott's (1990) theoretical framework, the Prussian state stressed the socialisation function of the educational system, as opposed to its function to pass on knowledge.

FIGURE 1   SHARE OF CATHOLICS IN 1885
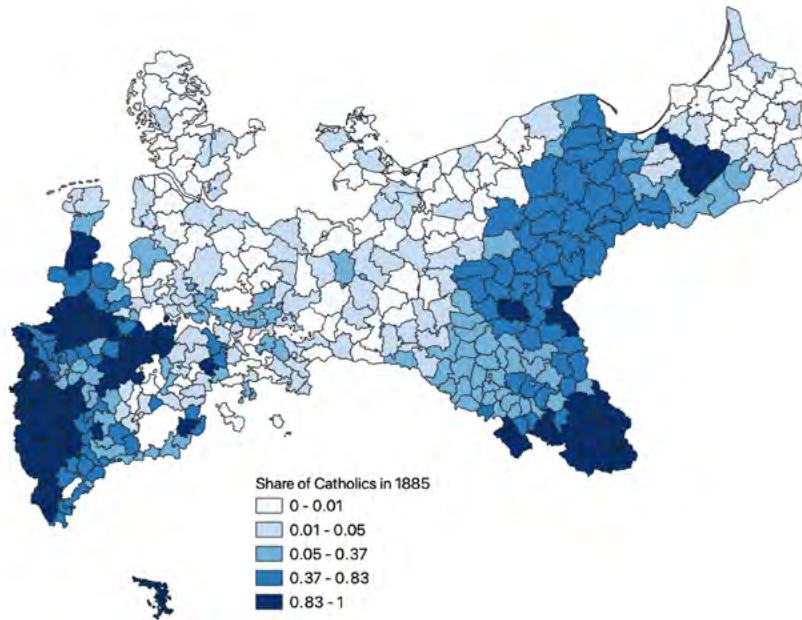
Note: The share of Catholics is constructed as the number of Catholics over the total population in 1885. Quartile 1 comprises the share of Catholics from 0 to 1.32 percent; Quartile 2 from ›1.32 to 16.1 percent; Quartile 3 from ›16.1 to 73.3 percent; Quartile 4 from ›73.3 to 100 percent. County borders as in 1871.

Source: ifo Prussian Economic History Database (iPEHD); own illustration.

Primary schooling in Prussia was organised locally, mainly at the municipal level, which made churches play an important role in the functioning of the educational system. In particular, school supervision was enforced by the clergy (Glück 1979). Clerical school inspectors were supposed to ensure that students attended school on a regular basis and, furthermore, they should have suggested general improvements for the school system. Clerical school inspectors exercised their task gratuitously and additional to their clerical office.

The Minister of Ecclesiastical and Education Affairs, Adalbert Falk, a strong advocate of the *Kulturkampf* policy, introduced the School Inspection Law in 1872 (Glück 1979). The law's objective was to professionalise school inspection. With the new law, the central government selected, paid and allocated the school inspectors. These central school inspectors were state officials (von Unruh 1992) and received a fixed salary (Neugebauer 1992). The law was motivated by the school deficiencies in the mainly Catholic and predominantly Polish-speaking regions in the East of Prussia. Thus, the law intended to put schools in this region under central control, taking away supervision from the Catholic Church (Kuhlemann 1991). However, due to a limited budget, central school inspectors could only be gradually deployed. This led to the fact that central school inspectors were first introduced in the Polish-speaking region east of the river Elbe, which had formerly belonged to the Polish-Lithuanian Commonwealth, followed by Catholic counties in

the West, namely, in the provinces of Rhineland and Westphalia, which were mainly populated by Catholics. This is illustrated in Figures 1 and 2. The school inspectors that were sent to the East were ignorant of the culture and history of the region and had no command of the Polish language (Lamberti 1989). Central school inspectors in the Western provinces, instead, were recruited from the respective region. No matter whether recruited locally or from other parts of the Empire, central school inspectors faced suspicion and resistance from the local population as the law was introduced as part of the *Kulturkampf*.

FIGURE 2   SHARE OF CENTRAL SCHOOL INSPECTORS, 1876-1886
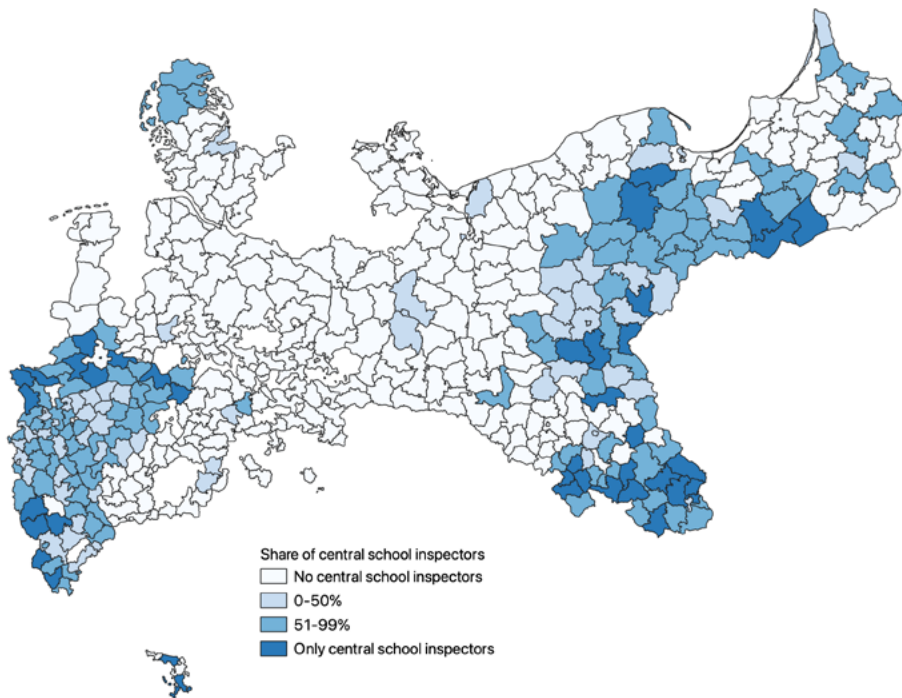
Note: The share of central school inspectors captures the sum of the fractions of central school inspectors over total school inspectors for each respective year between 1876 and 1886.

Source: ifo Prussian Economic History Database (iPEHD); own illustration.

Schüler (2016) also empirically examines the effects of the school inspection law. Was the reform, which aimed at assuring universal school attendance, effective in an environment where it evoked conflicts of identity? By comparing school attendance in regions where central school inspectors were installed against regions with clerical school inspectors before and after the reform, the study shows that the introduction of central school inspectors led to an *increase* in school enrollment. However, the reform was primarily effective in regions with mixed denominational population. Counties west of the river Elbe, that were primarily Catholic, opposed the reform. In fact, school

enrollment did not change in this region and the share of students enrolled in private schools increased. Private schools were used to avoid the repressive cultural policies of the central government.

The main findings on the impact of school inspection law are in line with the historical narrative on the overall effects of the *Kulturkampf*. The *Kulturkampf* strengthened the unity of the Catholic Church and established a solidarity between the clergy and the Catholic population (Hatfield 1981). Particularly in Westphalia, resistance by the Catholic population was expressed in demonstrations, held to manifest Catholic solidarity, and in strikes by Catholic industrial workers. The Catholic population boycotted national holidays such as the Day of Sedan, which celebrated the victory over the French army in 1871, or the emperor's birthday. The resistance of the Catholic population was also expressed in schools, where parents withdrew their children from joining military parades in honour of the emperor. The protest was supported and fuelled by the Catholic press. Eventually, the Kulturkampf had led to an even deeper and wider divide between the Protestant and the Catholic population (Hatfield 1981), which expressed itself in the Catholic social milieu, which was politically represented by the Centre Party (see Lepsius in Landry 2011).

4 EDUCATION SPENDING AND ELECTORAL OUTCOMES

Historical Prussia also provides an interesting case study to investigate whether centralisation versus decentralisation of public spending on education can be relevant for nation building. Previous literature has shown that there is, indeed, a strong relationship between public spending on education and nation building (Bandiera et al. 2017, Weber 1976, Lipset 1959). In Prussia, the share of central state spending increased from 10% to over 40% in the period 1886–1911. This change was due to a reform which aimed at relieving local municipal budget by, mainly, subsiding the payment of schoolteachers' salary. The successive introduction of a minimum wage for teachers and other school reforms contributed to further centralise public spending on education. At the same time, as mentioned before, Prussian authorities deliberately used primary education to create a homogeneous nation state, by instilling ideas and cultural values consistent with the idea of a 'loyal citizen' (Lott 1990). The Royal Decree of Wilhelm II in 1889 explicitly declared the school as an instrument to fight social democracy and foster Prussian virtues. These values manifested themselves in electoral turnout, paying taxes, military service, school attendance and respect of authorities.

It is plausible to assume that a higher level of centralisation in education spending, consequently increasing state control over the education system, affected people's perception of the nationalistic state and also influenced the political attitudes of the citizens. State control over the education system took the form of teacher recruitment. State funds were often granted conditional on shifting the decisional power from local to central authorities. For example, in the provinces of West Prussia (located in the eastern

part of Prussia) and Posen – areas characterised by a large share of Polish-speaking population – teacher recruitment passed from local to central authorities and was accompanied by a very large subsidy for primary schools. This illustrates how the share of central funds for education spending can capture the extent of the central state's control over the education system. Figure 3 shows the evolution of the share of state spending on education in general, state spending on teachers, and state spending on buildings for the period 1886–1911.

In Cinnirella and Schüler (2018), we find that an increase in the share of state spending on primary education is strongly related to (1) a higher voter turnout, and (2) a higher vote-share for pro-nationalist parties. In particular, we find a positive impact on the vote-share for the National Liberal Party, the Free Conservatives and the German Conservatives, which were supportive of the Prussian state and its constitution. We interpret this result as consistent with the notion that state investments in education can have 'positive' effects on nation building, in the sense of contributing to building a larger consensus around the ruling pro-nationalist party. However, it is important to qualify this result. Our results in Cinnirella and Schüler (2018) suggest that state intervention in education wins the support of marginal voters, in the case of Prussian voters politically close to the pro-nationalist positions. In contrast, state spending on education does not buy consensus of those segments of the population which opposed the conservative nation-building project, such as blue-collar workers.

FIGURE 3   THE SHARE OF STATE SPENDING ON EDUCATION IN GENERAL, ON TEACHERS, AND ON BUILDINGS IN PRUSSIA, 1886-1911
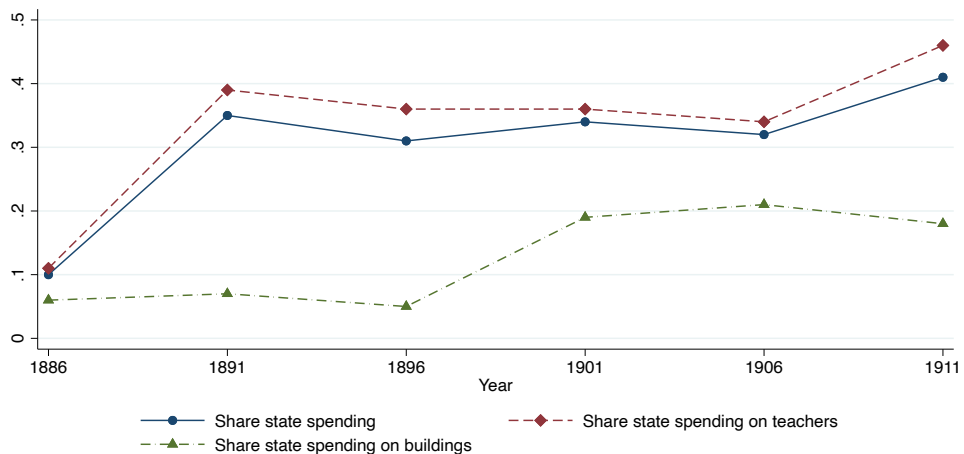
Source: Königliches Statistisches Bureau in Berlin. Preussische Statistik, Vol. 1-305. Berlin: Verlag des Königlichen Statistischen Bureaus.

Another important and related question is which destination of public spending buys consensus. In the context of education, public funds are mostly allocated to infrastructure (e.g. school buildings) or teachers' salaries. Teachers trained, hired and paid by the central state might have contributed to indoctrinating pupils and their respective families. Indeed, results from Cinnirella and Schüler (2018) suggest that a higher share of central spending on teachers had a larger impact on pro-nationalist votes than spending on school buildings. Furthermore, we find that the share of state spending on teachers lagged 15 years has a large impact on the share of conservative votes. This latter finding is consistent with the interpretation of state-controlled teachers indoctrinating primary school students who later became part of the electorate.

5 CONCLUSION

Using Prussia after the foundation of the German Empire in 1871 as a laboratory to evaluate the consequences of repressive minority policies reveals that targeted repression in the form of linguistic and cultural policies tended to strengthen the identity of minorities instead of generating a homogenous nation. In response to Polish language repression at school and to state-led school inspectors, Polish identity was fortified and a Catholic milieu developed. This points to the conclusion that nation building through social alienation is not effective and rather strengthens the identification of minorities with their respective community. At the same time, larger investments in primary education by the central government, with consequent stronger control, seems to have been relatively effective in gaining political support from the marginal voter for the ruling pro-nationalist party. Overall, the education system proves to be a particularly sensitive sphere for minting identities.

Despite the lack of a historical counterfactual, our findings suggest that an approach of encompassing cultures and languages of minority populations, especially in the educational sphere, might generate less cleavage and segregation and leaves unanswered the question of how history would have turned if Polish and other Slavic cultures had been perceived as an asset rather than a threat.

REFERENCES

Alexander, M (2008), *Kleine Geschichte Polens*, Reclam.

Bandiera, O, M Mohnen, I Rasul and M Viarengo (2019), "Nation-building Through Compulsory Schooling during the Age of Mass Migration", *The Economic Journal* 129: 62-109.

Cinnirella, F and R M Schüler (2016), "The Cost of Decentralisation: Linguistic Polarization and the Provision of Education", CESifo Working Paper No. 5894.

Cinnirella, F and R M Schüler (2018), "Nation Building: The Role of Central Education Spending", *Explorations in Economic History* 67; 18-39.

Glück, H (1979), *Die preußisch-polnische Sprachpolitik: eine Studie zur Theorie und Methodologie der Forschung über Sprachenpolitik, Sprachbewußtsein und Sozialgeschichte am Beispiel der preußisch-deutschen Politik gegenüber der polnischen Minderheit vor 1914*, Buske.

Hansen, G and N Wenning (2003), *Schulpolitik für andere Ethnien in Deutschland. Zwischen Autonomie und Unterdrückung*, Waxmann.

Hatfield, D (1981), "Kulturkampf: The Relationship of Church and State and the Failure of German Political Reform", *Journal of Church and State* 23: 465-485.

Kuhlemann, F-M (1991), "Schulen, Hochschulen, Lehrer", in C Berg (ed.), *Handbuch der deutschen Bildungsgeschichte, Band 4, 1870 – 1918: von der Reichsgründung bis zum Ende des Ersten Weltkriegs*.

Lamberti, M (1989), *State, Society and the Elementary School in Imperial Germany*, Oxford University Press.

Landry, S M (2011), "That All May Be One? Church Unity and the German National Idea, 1886-1883", *Church History* 80: 281-301.

Lipset, S M (1959), "Some social requisites of democracy: economic development and political legitimacy", *American Political Science Review* 53: 69-105.

Lott, J R (1990), "Public Schooling, Indoctrination, and Totalitarianism", *Journal of Political Economy* 107: 127-157.

Lundgreen, P (1976), "Educational Expansion and Economic Growth in 19th-Century Germany. A Quantitative Study", in L Stone (ed.), *Schooling and Society. Studies in the History of Education*, Johns Hopkins University Press.

Neugebauer, W (1992), "Das Bildungswesen in Preußen seit der Mitte des 17. Jahrhunderts", in O Büsch (ed.), *Handbuch der Preußischen Geschichte, Band II, Das 19. Jahrhundert und Große Themen der Geschichte Preußens*, Walter de Gruyter.

Schüler, R M (2016), "Centralized Monitoring, Resistance, and Reform Outcomes: Evidence from School Inspections in Prussia", Ifo Working Paper No. 223.

Suesse, M and N Wolf (2020), "Rural Transformation, Inequality and the Origins of Micro-Finance", *Journal of Development Economics* 143.

von Unruh, G-C (1992), "Provinz (Großherzogtum) Posen", in G Heinrich, F-W Henning, and K G A Jeserich (eds), *Verwaltungsgeschichte Ostdeutschlands 1815-1945. Organisation – Aufgaben – Leistungen der Verwaltung*, Verlag W. Kohlhammer.

Weber, E (1976), *Peasants into Frenchmen: The Modernization of Rural France 1870-1914*, Stanford University Press.

Wünsch, T (2008). *Deutsche und Slawen im Mittelalter: Beziehungen zu Tschechen, Polen, Südslawen und Russen*, Oldenbourg Verlag.

Zbroschzyk, M (2014), *Die preußische Peuplierungspolitik in den rheinischen Territorien Kleve, Geldern und Moers im Spannungsfeld von Theorie und räumlicher Umsetzung im 17. – 18. Jahrhundert*, University of Bonn.

Zernack, K (2008), "The Middle Ages", in C W Ingrao and F A J Szabo (eds), *The Germans and the East*, Purdue University Press.

ABOUT THE AUTHORS

Francesco Cinnirella is Professor of Economics at the University of Bergamo, Italy. He is CEPR Research Fellow, CESifo Research Affiliate, and CAGE Research Associate. His main research interests are in the fields of economic history, growth and development, public economics, and political economy. In particular, he studies the role of human capital in innovation and economic growth, the relationship between education and fertility, the political and socioeconomic factors that affect the provision of public education. He is member of the editorial board of the *Rivista di Storia Economica/Italian Review of Economic History* and was member of the editorial board of *Explorations in Economic History*. He has held visiting positions at the University of Munich, Brown University, University of Mannheim, and University of Bayreuth.

Ruth Maria Schüler works as an Economist for social security systems and income and wealth distribution at the German Economic Institute (IW). Previously, she worked as a Junior Economist at the ifo Institute. She obtained her PhD in Economics from the University of Munich. In her PhD thesis, she analysed Prussian education policies using quantitative methods. Her main research interests span public finance, political economy, and education economics.

CHAPTER 13

Language policies in education and the possibility of an identity backlash

Vasiliki Fouka
Stanford University

Education is one of the most powerful nation-building tools at the disposal of rulers and governments. During the consolidation of modern European nation-states, mass primary schooling in a national language was employed widely to homogenise populations and instill national conscience (Tilly 1975, Hobsbawm 1990). In the late 19th and early 20th century United States, compulsory education was introduced to integrate the millions of European immigrants who arrived with little exposure to civic values in their countries of origin (see Chapter 9 of this eBook on Bandiera et al. 2019). In France, in perhaps the most well-known experiment in successful nation building, massive investments in schooling infrastructure, curriculum design and teacher training played a crucial role in transforming linguistically diverse "peasants into Frenchmen" (Weber 1976).

But does homogenisation through education always succeed? Or do assimilation policies targeting minority pupil populations sometimes backfire, strengthening non-national identities?

A case study of the effects of foreign language bans in US primary schools during the Age of Mass Migration provides evidence that a backlash is a possible response to forced assimilation through schooling and elucidates some of the mechanisms behind this reaction.

BACKGROUND

By the early 1900s, Germans were the largest group of immigrants in the United States. German immigration had taken off in the mid-19th century and peaked in 1890. Compared to later arrivals of Eastern and Southern Europeans, this group was more literate, possessed more specialised labour market skills and had achieved fairly high rates of socioeconomic integration. Culturally, they were considered "one of the most assimilable and reputable of immigrant groups … law-abiding, speedily assimilated and strongly patriotic" (Higham 1998). Despite these perceptions, Germans, particularly in areas such as the Midwest, conserved their language and culture through networks of private schools operated by churches, and by using the German language in public schools of districts where their numbers were high.

Public opinion shifted against German immigrants during World War I, after the United States joined the war effort on the side of the Allied Powers. Suspected of disloyalty, Germans faced multiple isolated incidents of harassment, and their language and culture became the target of state and local bans. In 1919, Indiana and Ohio, home to a large German-born population, banned German from their elementary school curricula, both as a medium and as a subject of instruction. The provision applied to both public and private schools, including parochial schools that until that point had used German to teach religious subjects.

This setup provides a good opportunity to study the effects of forced monolingualism on the assimilation of a minority group. German language bans were motivated by an exogenous shock to anti-German sentiment, World War I, and not by lack of assimilation of the German community. Their professed goal was to reduce the cultural influence of Germany and instill patriotism in German-American pupils. Given that Germans were well integrated and culturally and linguistically close to Anglo-Saxons, one might expect this to be a most likely case for finding that assimilation policies successfully suppress minority identity.

EMPIRICAL SETUP

To understand how language bans affected German identity, I study assimilation in adulthood among children of German parents who were at school at the time of the enactment of the Indiana and Ohio laws (Fouka 2020a). I conduct a double comparison. First, I compare the outcomes of affected children to those of older cohorts of German-origin children in Indiana and Ohio, who had left elementary school before the German bans were enacted. Because any change between younger and older cohorts may capture general time trends (most likely, assimilation over time), I also compare this change to the change between older and younger cohorts in the states neighbouring Indiana and Ohio, which did not enact any bans in 1919. The difference in differences should capture the effect of language bans on assimilation for children exposed to bans in the two states

that introduced them. To make the comparison of affected and unaffected children even more valid, I focus on children living in counties at the border of Indiana and Ohio and neighbouring states at the time of the laws' enactment. I observe those children in the census of 1920 and link them to later censuses using their name and birth year, following procedures commonly used in the economic history literature (Abramitzky et al. 2014). Figure 1 shows the locations of all German-American children who lived in border counties in 1920 and who I traced in the 1930 and 1940 censuses.

FIGURE 1   CHILDREN OF GERMAN PARENTS WHO LIVED IN COUNTIES AT THE BORDER OF OHIO AND INDIANA IN 1920
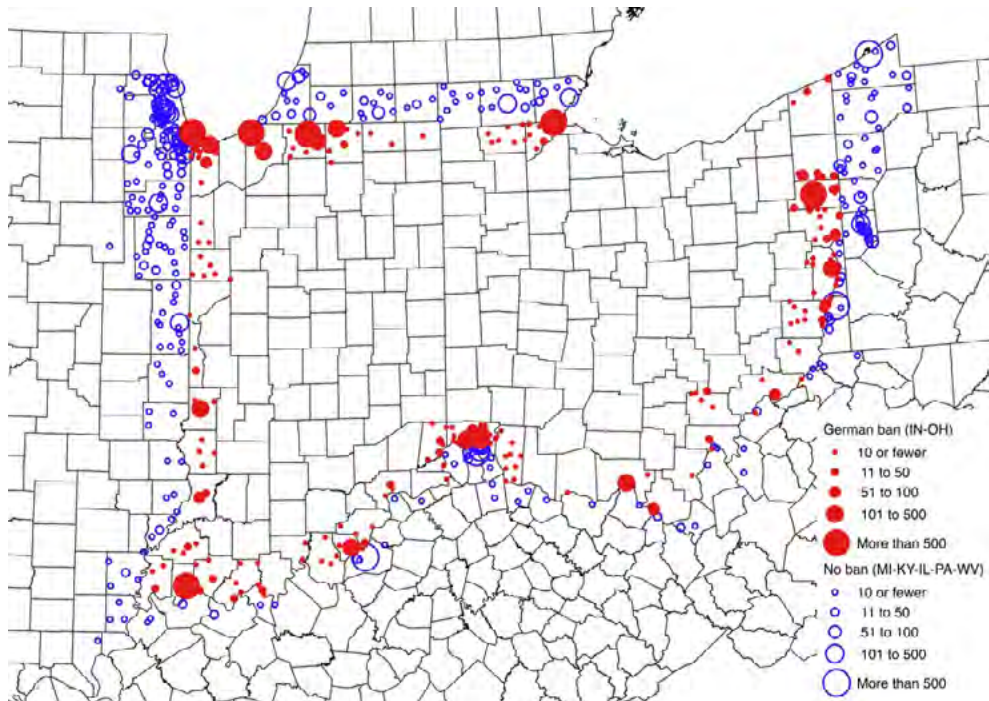
Notes: The map shows the location of all male children of German-born parents who were born between 1880-1916 and could be linked to the 1930 or 1940 census.

I examine three proxies of identity in the medium run: marriages with German spouses, names given to offspring, and the likelihood of volunteering in the US Army during World War II. Endogamous marriage partly reflects cultural attachment to the group and preferences for socialising children in the group's culture (Bisin et al. 2004). Naming practices also reflect parental preferences for cultural retention. Their availability in historical censuses makes them one of the few systematic measures that can be used to study cultural assimilation over time (Abramitzky et al. 2020). Volunteering in World War II is a strong and dichotomous signal of identity for German-origin individuals, since it implied explicitly siding with the United States and against the parents' country of origin. To capture the German content of first names, I compute an index of German

distinctiveness from the empirical distribution of names in the US census (Fryer and Levitt 2004). I identify volunteers in World War II by finding all men born in Indiana, Ohio and neighbouring states in the universe of army enlistment records, and linking them to the 1930 census to obtain information on the birthplace of their parents.

FINDINGS

Contrary to expectations and the goal of the bans, German-Americans affected by language laws were less culturally assimilated as adults. Compared to the difference between older and younger cohorts in states without bans, exposed cohorts were an additional 4 to 6 percentage points more likely than older ones to be married to German spouses. They also gave their children significantly more German-sounding names. The estimated effect of the bans corresponds to parents switching from assigning a name like Daniel – equally frequent among US residents of German and non-German origin – to a distinctively German name like Franz or Adolph.

Volunteering rates in World War II among affected German-origin children were also lower. Older cohorts who left school before the enactment of language laws in Indiana and Ohio volunteered at the same (low) rate as similar cohorts in neighbouring states; while volunteering rates among younger cohorts increased in states without bans, they barely moved in Indiana and Ohio.

These patterns are difficult to explain through channels other than the effect of bans. They could not have been driven by stronger anti-German sentiment in Indiana and Ohio, since such sentiment was not restricted to targeting only cohorts of school age at the time of the introduction of the bans. Several tests suggest that the estimated identity backlash cannot be explained by selective out-migration of German families out of Indiana and Ohio, which, if anything, would leave Germans with weaker German identity behind and result in estimates smaller than the true effect of the bans. I also conduct extensive reviews of other laws and regulations introduced in Indiana, Ohio and neighbouring states contemporaneously with the bans, and find no evidence that they drove the effects I estimate.

FIGURE 2   EFFECT OF THE GERMAN LANGUAGE BAN ON FIRST NAMES OF CHILDREN (TOP) AND VOLUNTEERING RATES IN WORLD WAR II (BOTTOM)
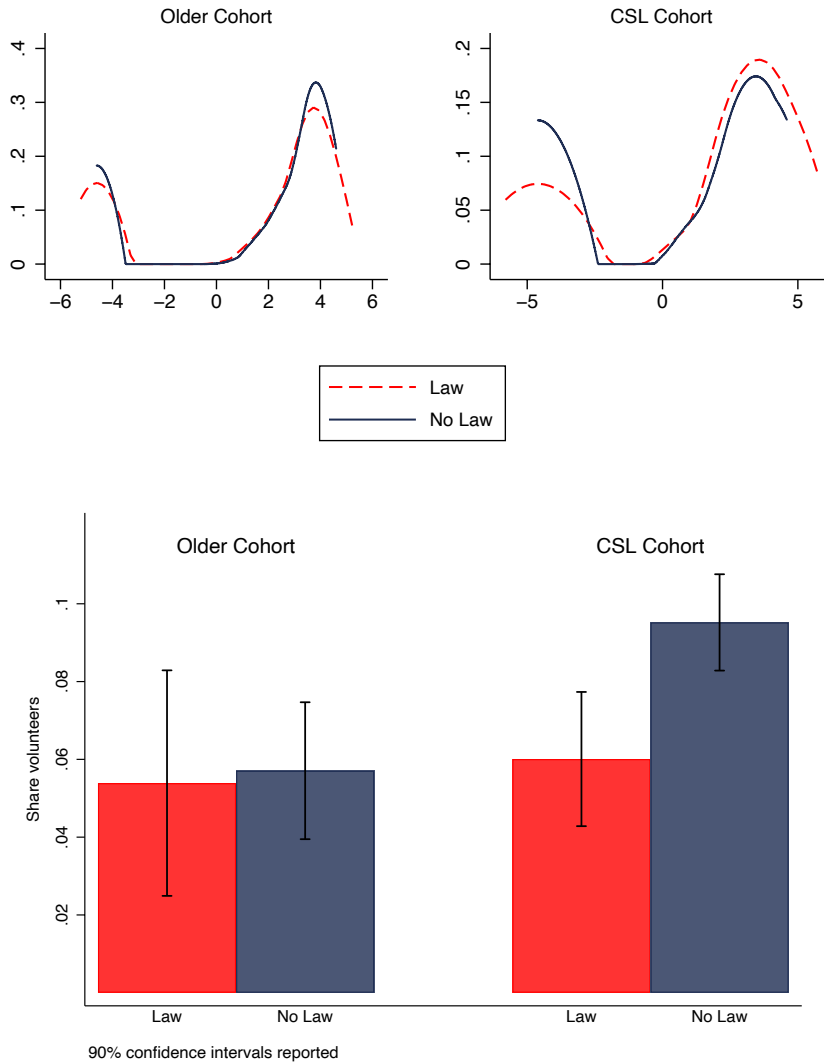
Notes: The top panel plots the density of the (log of the) index of German name distinctiveness for first-born sons of German-Americans in the linked sample. Higher values correspond to more distinctively German names. The bottom panel plots the share of volunteers among German-American men who enlisted in the US Army between 1940-1942 and who were born in Indiana, Ohio or their neighbouring states between 1880-1916.

MECHANISMS

What explains the backlash? The findings are consistent with substitution between the content of schooling and parents' investments in their children's cultural identity. When education stopped transmitting the German language and culture, parents with a strong attachment to German identity increased their investments in identity transmission in the home. This response, amplified by peer effect channels in communities with a strong German character, could theoretically be intense enough to reverse the effects of the law.

Three pieces of evidence support this explanation. First, the backlash was stronger for children with two German parents, compared to effects for children born to mixed couples. Endogamous couples plausibly had a stronger preference for transmitting their German identity to their offspring and were equipped with a better socialisation technology that allowed them to respond to state language bans more effectively by intensifying cultural transmission at home.

Second, the backlash was more pronounced in communities with a stronger German identity which invested more in intergenerational identity transmission. The effect of the bans on endogamy rates and ethnic naming was larger in counties with a higher share of Lutheran church members. The Lutheran church was heavily German dominated (Wustenbecker 2007) and was committed to parochial schooling and to the use of German in classrooms and church services; it is therefore a good proxy of German identity at the local level. The backlash effect of the ban was also stronger in counties with a smaller share of Germans. Models of cultural transmission (Bisin and Verdier 2000, 2001) suggest that parents belonging to smaller minorities may be more likely to invest in transmitting their cultural traits to their children, to counteract horizontal socialisation to the majority's traits. Smaller communities may therefore have a stronger sense of ethnic identity and be more likely to react to attempts of assimilation.

Finally, I use information from the yearbooks of the Lutheran Church-Missouri Synod – one of the largest Lutheran synods in the United States with a strong presence in German communities of the Midwest – to directly measure the substitution efforts of German parents. I digitize school- and church-related activities of the Synod at the state level before (1916) and after (1921) the enactment of language bans. The evidence is consistent with reaction to the bans coming from the parents: Indiana and Ohio registered a higher increase in Sunday pupils than control states, indicating a demand for church education with a religious, but also culturally German, content. There is no evidence of direct response by the church. Activities such as the share of sermons delivered in German did not change differentially in states with language bans. Anecdotal evidence also supports the central role of substitution efforts of the parents. In Ohio, supplementary schools (*Ergänzungsschulen*), which provided language and religious instruction and were not subject to language bans, increased in the period after World War I.

Taken together, these patterns suggest that assimilation policies in education can backfire, that this effect is driven by parental socialization efforts, and that it is stronger among individuals and communities with a strong minority identity.

FIGURE 3   CHANGE IN THE ACTIVITIES OF THE LUTHERAN CHURCH-MISSOURI SYNOD BETWEEN 1916 AND 1921
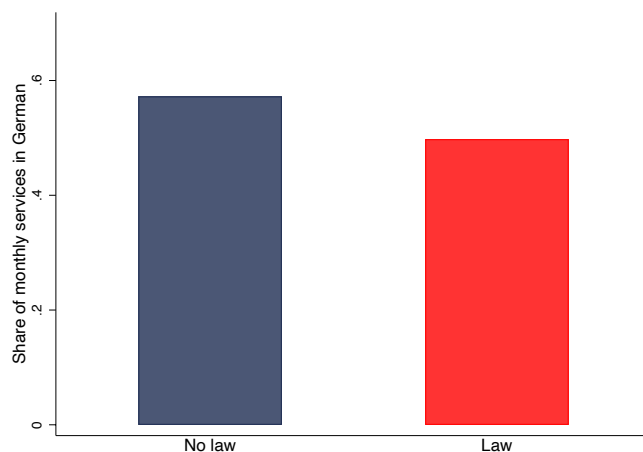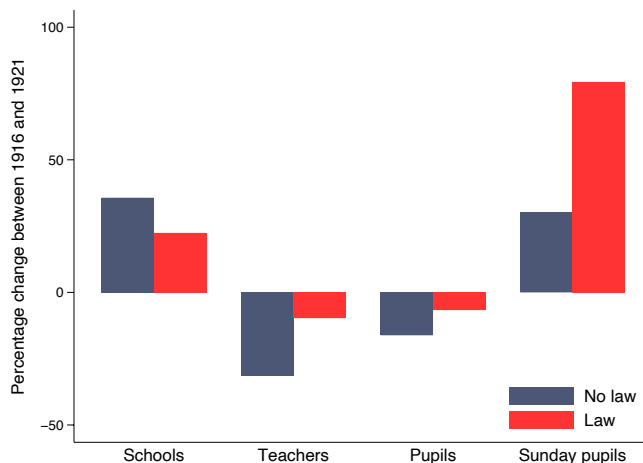
Notes: The figures plot average changes for Indiana, Ohio and their neighbouring states. Data are from the 1916 and 1921 Statistical yearbooks of the Lutheran Church-Missouri Synod.

EVIDENCE FROM OTHER CONTEXTS

How generalisable is the case of German-Americans in World War I for nation building through education? For drawing broader conclusions, it is instructive to compare the findings of this study to other contexts in which majority identity has been promoted through schooling.

Despite the possibility of backlash, existing work also shows that mass schooling in a national language can strengthen national identity. Blanc and Kubo (2021), described in Chapter 8 of this eBook, provide quantitative evidence for the historical accounts in Weber (1976) by showing that school construction, as mandated by the 1833 Guizot Law, drove linguistic homogenisation in France. They exploit the fact that the law required the construction of primary schools for boys in towns of more than 500 residents in a regression discontinuity design and use data from a unique linguistic atlas to show that schools reduced the linguistic distance of local spoken dialects from standard French. In a different country context, Clots-Figueras and Masella (2013), featured in Chapter 10, show that the introduction of bilingual education in Catalan and Spanish with the Linguistic Normalization Act of 1983 led to stronger self-reported Catalan identity among exposed cohorts of both Catalan and Spanish-origin students.

Other contexts yield more mixed findings. English-only laws enacted in the US during the early 20th century had little effect on English language proficiency and naturalisation rates of European immigrants (Lleras-Muney and Shertzer 2015) and even led to lower intermarriage rates of immigrants with a greater linguistic distance from English (Fouka 2020b). In cases where education was used as a nation-building tool to promote religious rather than linguistic identities, evidence of a backlash is less ambiguous. Sakalli (2019) finds that a 1920s secularisation reform in primary education in Turkey lowered education outcomes and increased the prevalence of religious names among pious parents. In the reverse setup, Benzer (2022) shows that the expansion of Islamic schools in Turkey during the 1970s improved the educational and labour market outcomes of women, by accommodating more conservative religious identities which led to increased female enrollment rates among religious families.

WHEN DO EDUCATION POLICIES LEAD TO AN IDENTITY BACKLASH?

Two strands of theoretical literature can account for an identity backlash and help square these disparate empirical findings. One focuses on individual-level incentives of students to adopt particular identities; the other on intergenerational transmission of identities through parental and community socialisation. The two explanations are complementary and together yield clear insights in terms of the policies that are most likely to provoke identity backlash.

At the individual level, the seminal framework of identity introduced by Akerlof and Kranton (2000) conceives of schooling as promoting particular social categories which prescribe certain ideal behaviours (Akerlof and Kranton 2002). Students whose characteristics deviate too much from the ideal type are more likely to reject the identities promoted by the school and reduce their educational efforts. This framework can explain why religious students would reject secular education or why immigrants and minorities with strong rooted identities would reject policies of cultural assimilation such as forced monolingualism. Carvalho and Koyama (2016) show this explicitly in an

application directly relevant to nation building: when schools promote a majority identity with assimilationist goals, minority students may underinvest in education as a form of cultural resistance, unless returns to education are strong enough.

Incidentally, this framework accords with the arguments of proponents of bilingual education and of culturally sensitive school curricula. Making it easier for minority pupils to comply with school prescriptions – by using their native language or through culturally appropriate content – allows for an easier transition into majority culture, and may facilitate rather than stall assimilation.

At the family and community level, another seminal framework by Bisin and Verdier (2000 2001) highlights that parents want their offspring to inherit their cultural traits and can invest in socialisation efforts to that end. Because children can be socialised both horizontally by peers and vertically by the family, minority parents may have incentives to exert stronger socialisation efforts than majority ones, lest their children lose their culture by exposure to majority role models. Such a framework can allow for an identity backlash among small or 'oppositional' communities in response to intensified assimilation efforts by the majority (Bisin et al. 2011).

This mechanism is directly supported by the evidence in the case of an identity backlash among German-Americans in response to language bans.

Together, these two frameworks of identity suggest a number of takeaways for the success of nation building through education. First, more attainable prescriptions may be more likely to assimilate minorities than odious policies threatening rooted identities, especially when these identities are strong. This explains why bilingualism in Catalan education may have been more successful than forced monolingualism in post-World War I United States or forced secularisation in Turkey. It is also consistent with the backlash against German language bans being stronger among homogamous German couples in small German communities with a strong presence of the Lutheran church.

Second, other things equal, high returns to education and to assimilation through schooling increase the success of nation-building policies. Linguistic homogenisation in 19th century France was achieved in large part because it was implemented in a context of radical modernisation, with expanding roads and railways connecting communities to the centre and raising the benefits to learning French through migration and upward mobility. Instead, foreign language bans in the United States increased the identity costs of education without altering the incentives for learning English.

Finally, the strictness of penalties associated with nation building also matters for the ultimate success of policies. The penalties imposed to pupils caught speaking a local dialect in French primary schools included public shaming and corporal punishment; instead, the enforcement of compulsory schooling laws in the United States was often lax, leaving room to parents to substitute public with private schooling (Lleras-Muney and Shertzer 2015, Mazumder, 2019).

Globally considering these factors – prescriptions, strength of minority identity, returns to education and incentives for policy compliance – is essential for understanding when nation building through education works, and for designing educational policies that promote social cohesion in diverse societies.

REFERENCES

Abramitzky, R, L P Boustan and K Eriksson (2014), "A Nation of Immigrants: Assimilation and Economic Outcomes in the Age of Mass Migration", *Journal of Political Economy* 122: 467–717.

Abramitzky, R, L P Boustan and K Eriksson (2020), "Do Immigrants Assimilate More Slowly Today than in the Past?", *American Economic Review: Insights* 2(1): 125–141.

Akerlof, G A and R E Kranton (2000), "Economics and Identity", *The Quarterly Journal of Economics* 115: 715–753.

Akerlof, G A and R E Kranton (2002), "Identity and Schooling: Some Lessons for the Economics of Education", *Journal of Economic Literature* XL: 1167—1201.

Bandiera, O, M Mohnen, I Rasul and M Viarengo (2019). "Nation-Building through Compulsory Schooling during the Age of Mass Migration", *Economic Journal* 129: 62-109.

Benzer, T (2022), "Removing Cultural Barriers to Education: State-Run Islamic Schools and Girls' Education in Turkey", mimeo.

Bisin, A and T Verdier (2000), "Beyond the Melting Pot": Cultural Transmission, Marriage, and the Evolution of Ethnic and Religious Traits", *Quarterly Journal of Economics* 115: 955–988.

Bisin, A and T Verdier (2001), "The Economics of Cultural Transmission and the Dynamics of Preferences", *Journal of Economic Theory* 97: 298–319.

Bisin, A, E Pattacchini, T Verdier and Y Zenou (2011), "Formation and Persistence of Oppositional Identities", *European Economic Review* 55: 1046–1071.

Bisin, A, G Topa and T Verdier (2004), "Religious Intermarriage and Socialization in the United States", *Journal of Political Economy* 112: 615–664.

Blanc, G and M Kubo (2021), "Schools, Language, and Nations: Evidence from a Natural Experiment in France", mimeo.

Carvalho, J-P and M Koyama (2016), "Resisting Education", George Mason University Working Paper in Economics 13–18.

Clots-Figueras, I and P Masella (2013), "Education, Language and Identity", *Economic Journal* 123: F332– F357.

Fryer, R G and S D Levitt (2004), "The Causes and Consequences of Distinctively Black Names", *The Quarterly Journal of Economics* 119: 767–805.

Fouka, V (2020a), "Backlash: The Unintended Effects of Language Prohibition in US Schools after World War I", *The Review of Economic Studies* 87(1):204–239.

Fouka, V (2020b), "What Works for Immigrant Integration? Lessons from the Americanization Movement", mimeo.

Higham, J (1998), *Strangers in the Land: Patterns of American Nativism, 1860-1925*, Rutgers University Press.

Hobsbawm, E J (1990), *Nations and Nationalism since 1780: Programme, Myth, Reality,* Cambridge University Press.

Lleras-Muney, A and A Shertzer (2015), "Did the Americanization Movement Succeed? An Evaluation of the Effect of English-Only and Compulsory Schooling Laws on Immigrants", *American Economic Journal: Economic Policy* 7: 258–90.

Mazumder, S (2019), "No Nation Left Behind? Assessing the Impact of Compulsory Schooling Laws on Immigrant Assimilation", mimeo.

Sakalli, S O (2019), "Secularization and Religious Backlash: Evidence from Turkey", mimeo.

Tilly, C (1975), "Reflections on the History of European State-Making", in C Tilly (ed.), *The Formation of National States in Western Europe*, Princeton University Press.

Weber, E (1976), *Peasants into Frenchmen: The Modernization of Rural France, 1870-1914*, Stanford University Press.

Wüstenbecker, K (2007), *Deutsch-Amerikaner im Ersten Weltkrieg: US-Politik und Nationale Identitäten im Mittleren Westen*, Steiner.

ABOUT THE AUTHOR

Vasiliki Fouka is an Assistant Professor of Political Science at Stanford University, a Faculty Research Fellow at NBER and a Research Affiliate at CEPR. Her research interests include political economy, cultural economics and economic history. She studies immigrant assimilation, group relations, and the long-run effects of history in various historical and geographic contexts, with a main focus on early 20th century US and contemporary Western Europe. She received a PhD in Economics from Pompeu Fabra University in 2015.

CHAPTER 14

Education for the masses or the pious? Public and Islamic schools in Indonesia

Samuel Bazzi,[a] Masyhur Hilmy[b] and Benjamin Marx[c]

[a]UC San Diego; [b]Boston University; [c]Sciences Po

The state is not a doctor in mathematics, humanities, or chemistry. If it is concerned with the hiring of teachers, it is not to spread scientific truths…. The state provides education to maintain a certain moral of the state, a certain doctrine of the state that is essential to its own conservation.

Jules Ferry, speech to the French Chamber of Deputies, 1879

Among the pious, education is seen as part of a collective duty to Islamize society.

Hefner (2008)

INTRODUCTION

History provides many examples of mass instruction policies designed to promote nation building. More often than not, these policies took place in settings where other organisations provided basic instruction to local communities before the emergence of a centralised state. To be successful in those contexts, mass schooling policies had to absorb, displace or eliminate these other forms of instruction, especially religious education. Today, many developing states struggle to or refrain from establishing control over education markets, as they typically face opposition from a variety of incumbent local and informal religious providers.[1]

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1   Religious schools cater to large student populations in low-income countries. A recent World Bank study found that faith-inspired schools accounted for 14% of primary students in 16 African countries, a market share comparable to that of private schools (Wodon 2014).

Because of these alternative providers, the adoption of mass schooling reforms has often been fraught with challenges historically. A tale of two neighbouring countries, Belgium and France, shows how different levels of resistance by religious schools can determine the fate of such reforms. In France, the establishment of free and secular education by Jules Ferry in 1882 remains one of the most celebrated policy changes adopted in the modern era. Today, religious instruction is heavily regulated inside all schools, and the French state exerts a great degree of oversight over Catholic schools (a more recent reform attempt to further diminish the influence of these schools in 1984 was met with considerable opposition and had to be abandoned). The historical importance of the 1882 law remains widely acknowledged even though Catholic schools mitigated the impacts of the policy on educational outcomes in practice (Squicciarini 2020). In Belgium, however, similar secularisation reforms proposed by liberal governments triggered a series of crises known as the 'School Wars' in 1879–1884 and 1950–1959, and failed to pass parliament. This ended with an uneasy compromise between the church and the state and enabled the persistence of a dual education system.

The Belgian and French examples are not isolated. Alesina et al. (2021), featured in Chapter 26 of this eBook, quoting Charles Tilly (1975), note that "almost all European governments eventually took steps which homogenized their populations", including "the institution of a national language [and] the organization of mass public instruction". Beyond Europe, various countries across the Americas and Asia sought to homogenise their education systems at the turn of the 20th century. A key determinant of the success of these reforms was the degree of opposition from private religious schools and the extent to which the state was successful at either dislodging or co-opting them (Ansell and Lindvall 2013, Paglayan 2021, and Chapter 9 on Bandiera et al. 2019).

Across countries, there is also considerable heterogeneity in the religiosity of those with more education. Popular wisdom, and indeed much of modernization theory holds that education leads to greater secularisation. However, the relationship between individual education levels and religiosity varies widely across countries (Figure 1). This relationship is positive in such diverse countries as New Zealand, South Africa, Indonesia and Sweden, but strongly negative in the United States, Iran, as well as Turkey and France – two countries with celebrated histories of secularisation reforms in education.

How can we make sense of such diverse national experiences in the adoption of mass education policies and their impact on religious and national identity? Answering this question requires a rigorous exploration of ideological competition in schooling markets as well as the role and objectives of religious providers of education. As much as the establishment of mass instruction matters for nation-building, religious schools may provide a socialisation tool that is essential for preserving the identity of certain social groups.[2]

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2   In the United States, there is evidence that the emergence of Catholic schooling at the end of the nineteenth century occurred as a response to a public education system that promoted Protestant values (e.g. La Belle and Ward 1994).

FIGURE 1   EDUCATION AND RELIGIOSITY ACROSS COUNTRIES

Dep. Var.: I am a religious person
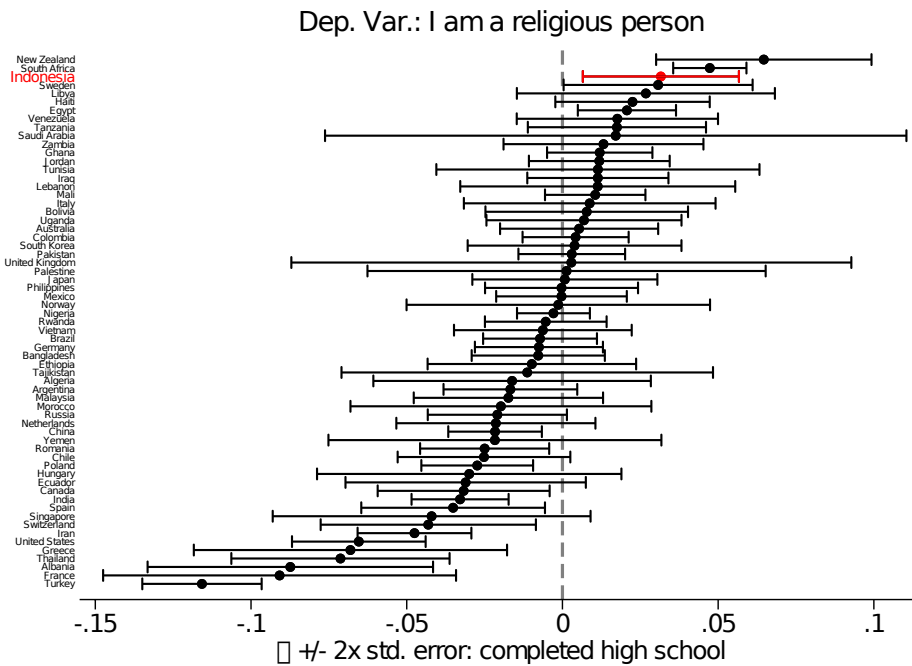
Notes: This figure reports the cross-sectional regression-based correlation between education and religiosity in the World Values Survey data spanning 1981 to 2020 with specific years of enumeration varying across countries. Education is an indicator for high school completion. Religiosity is measured based on the question, "How religious are you as a person?", with answers being "religious", "not religious", and "convinced atheist". Our outcome is a binary indicator for whether the respondent answers "religious". Each point estimate and 95% confidence interval is based on a country-specific regression pooling across all survey waves for the given country. The regression controls for age, gender, religious denomination and survey year fixed effects, and standard errors are robust.

Source: Appendix Figure A.1 in Bazzi et al. (2022).

In this chapter, we present research from Bazzi et al. (2022) tackling this set of questions in the world's largest predominantly Muslim society, Indonesia, where about a fifth of school-aged children attend an Islamic school today. Indonesia provides a fascinating setting to understand how religious schools adapt to governmental policy attempts to diminish their influence. As we describe below, several Indonesian governments since 1945 have tried and failed to gain a monopoly over local education markets at the expense of Islamic schools. Our analysis focuses on a mass schooling policy implemented in the 1970s which sought not only to expand access to public primary education, but also to homogenise and secularise education.

CONCEPTUAL FRAMEWORK

To better understand the competitive forces at work in education markets during the nation-building process, we develop a Hotelling (1929) model that can be generally applied to other episodes of mass schooling. This model clarifies the conditions under which mass schooling efforts can lead to confrontation with traditional providers of education, religious or otherwise.

Prior to mass schooling, secular public and religious private schools avoid serving the same markets, opting instead to capture populations with different religious preferences. Each sector wants to maximise enrollments, and budget constraints give rise to market segmentation. Religious schools enter more religious markets underserved by the state as well as markets where the state has entered but where preferences are heterogeneous enough to support both types of schools.

As the state modernises and the economy grows, the education budget expands and mass schooling becomes feasible, allowing the state to enter many more markets. However, because of the longstanding segmentation, the state-led expansion of schooling must necessarily target markets with a higher density of religious schools. This sets up a confrontation with the religious sector as new religious schools further increase the religiosity of their curriculum to capture conservative students. Moreover, because the religious sector also draws on the same tax base as the state, its resources have now grown as well, allowing it to continue to enter the more religious markets as well as the less religious, more diverse, larger markets that can accommodate both sectors.

Although these dynamics characterise well the competition between primary schools, incentives for entry also change at the secondary level. As the state first prioritises primary schools, this creates an opening for religious schools to capture growing demand for secondary education. Thus, the religious sector no longer seeks to avoid competition from state schools but rather may actively prioritise markets with growing demand for secondary schooling among public elementary graduates.

POLITICAL ECONOMY OF EDUCATION IN INDONESIA

We explore these dynamics in the context of a mass schooling intervention implemented in 1970s Indonesia. After several years of collaboration with Islamic organisations in the fight against communism, the new President Suharto began challenging organised religion in the early 1970s. This involved, among other actions, the repression of Islamic political parties and a major effort to incorporate Islamic schools into the secular educational framework of the state.

Central to these efforts was the policy known as *Sekolah Dasar Instruksi Presiden* (SD INPRES). Flush with windfall revenue from soaring oil prices, the regime embarked on a massive primary school construction programme, building more than 60,000 schools from 1973 to 1978.

In addition to developmental objectives, the state viewed these schools as a key vehicle for nation building. Planners aimed to replace Islamic subjects with civic education centred on the country's inclusive *Pancasila* ideology, and to impose that all instruction take place in *Bahasa Indonesia* (the national language, which is not the mother tongue of most Indonesians) rather than local languages or Arabic. Many religious leaders saw this intervention as a direct affront to the status of religious schools.

In practice, the state largely followed its plans of allocating primary schools proportional to the population of unenrolled school-age children across districts (see Figure 1a in Bazzi et al. 2022). However, as our model implies, this targeting necessarily led to more public schools being built in markets previously served by Islamic elementary schools (see Figure 1b in Bazzi et al. 2022).

Then and now, Indonesia's public schools compete with two main types of Islamic schools: (1) regular day schools known as *madrasa*, which follow a similar trajectory as the public system; and (2) *pesantren*, which tend to be more conservative in their orientation and allocate more classroom time to the study of Islam. The madrasa system teaches secular and Islamic subjects, with the latter comprising on average one-quarter of instruction time, compared to only two hours a week on religion in secular schools. All these religious schools operate in a decentralised system with both institutional actors and independent establishments drawing on private resources, often marshalled through Islamic charitable endowments known as *waqf* (Bazzi et al. 2020).[3]

CONFRONTING THE STATE: ISLAMIC SCHOOL ENTRY AND DIFFERENTIATION

In response to SD INPRES, Islamic organisations built more Islamic schools in areas with greater public primary school construction. We observe this at both the district level, where policy allocations were determined, and at the village level, where local officials had more discretion over when and where to build new public schools. Our main analysis draws on new administrative data identifying the date and type of establishment for all schools in operation as of 2019.

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3   Although the state, through the Ministry of Religious Affairs, funds some madrasas, entry costs and operating expenses are largely borne by private resources raised locally through informal means.

We identify the Islamic sector supply response at the district level using difference-in-differences (DID) approaches. Our findings point to a sizable dynamic supply response for *madrasa* and *pesantren* (see Figure 2 in Bazzi et al. 2022). These estimates are robust to allowing for trends to vary across districts with different levels of Islamic schooling as of 1960 and are validated at length in Bazzi et al. (2022).

Similar dynamics are observed in the short run at the village level, where we estimate generalised DID specifications that compare Islamic school entry across villages receiving public schools earlier versus later in the 1970s. This more granular specification provides a clear window into the nature of local competition. Islamic elementary schools were built immediately after public elementary schools entered, while Islamic junior secondary schools followed later, peaking in likelihood roughly six years after the public primary school entry. Such timing is consistent with a strategic effort by Islamic leaders to capture some of the new cohorts of public primary school graduates.[4]

Funding mechanisms

While the state relied on public revenue to finance its mass schooling effort, the Islamic sector financed its new schools through private fundraising. First, areas with a larger base of *waqf* endowments saw greater Islamic school entry. Second, the Islamic sector's response was larger in villages more exposed to a major spike in the price of rice – the main agricultural commodity in Indonesia – in the mid-1970s. Notably, the entry of other, non-Islamic private schools was not responsive to these same financial shocks. Third, modern data point to higher rates of informal taxation to fund schools in villages with more Islamic relative to public schools, as well as greater allocation of *waqf* endowments towards schools relative to other religious infrastructure. Together, these results are consistent with accounts by the founders of Islamic schools in the 1970s, which emphasised the critical role played by local revenue streams in hastening the construction of Islamic schools.[5]

Curriculum differentiation

The Islamic education sector not only built new schools but also further differentiated their curriculum inside those new schools. Using administrative data on school curricula, we identify an increase in religious instruction inside Islamic schools built in districts subject to greater public primary school construction. These religious curricula span topics such as Islamic law, doctrine and ethics as well as study of the Qur'an and Arabic. The increase in time spent on such material comes at the expense of civic education and Bahasa instruction. This pattern of substitution is consistent with a key prediction of

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4   Although the state also built secondary schools, it typically did so in different villages and in a manner that was not commensurate with the Islamic sector supply response. Our analysis also shows that Islamic schools captured a growing share of the market in districts with more public primary schools built in the 1970s.
5   These accounts are based on oral histories we conducted with nearly 100 former Islamic school principals and teachers in late 2021.

our model: when faced with competition from public schools, Islamic schools further differentiated their curriculum to capture children coming from more conservative households.

Through this process of entry and differentiation, the Islamic education sector was able not only to survive in the face of greater competition from the state but also to thrive and even capture new generations of students. In addition to simply building more schools and offering more religious content, the Islamic sector also undertook formalisation efforts in markets facing more competition. This meant greater construction of formal madrasa relative to informal pesantren, as such a shift gave students more option value on the margin: it is easier to move between madrasa and public schools than it is between pesantren and public schools. This formalisation was part of the broader response by which Islamic education endured in the long run.

RELIGIOUS SCHOOL CHOICE

These supply-side responses increased exposure to religious schooling. We identify these effects on school choice using National Socioeconomic Survey (Susenas) data from 2012 to 2018 and a cohort-based DID specification developed by Duflo (2001). These latest rounds of *Susenas* provide, for the first time, the set of variables and geographic scope needed to investigate the consequences of SD INPRES for religious school choice.

Comparing cohorts aged 12–17 (control) to those age 2–6 (exposed) at the onset of mass schooling, we see marked shifts in the likelihood of Islamic school choice at different instruction levels. At the primary level, despite greater entry of Islamic schools, exposed cohorts were less likely to attend Islamic establishments. Yet, those same cohorts were more likely to attend Islamic secondary schools. These findings hold whether or not we condition on the total years of schooling.

At the same time, many of those graduating from public elementary schools were not able to find junior secondary schools to continue their (secular) education. The strong Islamic sector supply response at this level absorbed some of this excess demand. These patterns can be seen in both the raw data comparing average rates of Islamic schooling in above- and below-median public primary school construction per 1,000 children (Figure 5 in Bazzi et al. 2022) and in event studies that estimate cohort-specific effects in the basic DID (Figure 6 in Bazzi et al. 2022).

Despite these countervailing dynamics across education levels, affected cohorts were, on average, more likely to have attended any Islamic schools in districts more exposed to SD INPRES. Each additional public primary school was associated with a 5% increase in the likelihood of the exposed cohorts attending any Islamic school relative to control cohorts.

Despite the state's massive intervention in new markets across the country, the Islamic sector managed to maintain its appeal to students from various backgrounds. It did so by competing head on at the primary level, by strategically entering at the junior

secondary level in locations where the state could not afford to enter, by differentiating its curriculum towards more religious content, and by formalising its own school system to ensure proper recognition of its graduates' credentials.

Another important component of the Islamic sector's strategic response was its effort to attract girls from religiously conservative households. Girls in exposed cohorts were even more likely than boys to increase attendance at Islamic schools in districts with greater public primary school construction. Although SD INPRES helped boys realise more total schooling than girls in exposed cohorts, religious schools provided an opportunity for girls to catch up, especially in more conservative communities. We even find evidence consistent with girls switching from public to Islamic schools in response to the government's ban on the wearing of the *hijab* (female headscarf) in public schools in the early 1980s.[6]

The mass schooling intervention by the Indonesian state thus not only expanded access to public education but also exposure to Islamic education. The durability of the Islamic school system and its growing influence on future generations was not part of the regime's vision for mass public schooling in the 1970s. And given the state's outright hostility to organised Islam in various public domains, it may be appropriate to view the competitive response of the Islamic sector as motivated, at least in part, by a generalised backlash against the secularisation push by the modernising state.

MASS SHOOLING, BACKLASH AND NATION BUILDING

As more communities experienced competition between Islamic and state schools, the regime's secular vision for nation building came under threat. Indeed, while most major development initiatives engender support for the incumbent regime, Suharto saw his party's electoral prospects decline significantly in districts where the state built more public schools. The estimates in Bazzi et al. (2022) suggest that each public primary school built from 1973 to 1978 leads to a 2–4 percentage point decline in the vote share for Suharto's party, Golkar, relative to the last election prior to mass schooling. Since these shifts materialised as early as the 1977 election, the shift away from Golkar was likely initiated by those already past school age when SD INPRES ensued.

We find similar patterns on the supply side of politics, looking at candidate entry in the 2019 legislative election. Those individuals exposed to greater SD INPRES intensity in their youth are significantly more likely to run on an Islamic party (PPP) ticket than on a Golkar ticket, suggesting that some of the contestation during the 1970s may have persisted among affected communities.

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6   These results resonate with findings from other Muslim countries such as Turkey (Meyersson 2014) where religious schools offered new opportunities for girls to enter school for the first time under Islamic rule.

Beyond the ballot box, we find marked shifts towards greater religious identity among exposed cohorts. This includes a generalised increase in piety looking across a range of both obligatory and non-obligatory Islamic practices. As discussed above, this result stands at odds with other historical settings where mass schooling hastened secularisation. Such a pattern is nevertheless consistent with the greater opportunities for religious education that came in response to SD INPRES.

Some of this increase in religious identity may have crowded out investments in the national identity. Firstly, exposed cohorts are more literate in Arabic but not other languages. This response is stronger for those educated in Islamic schools and is consistent with the increase in Arabic instruction inside Islamic schools built in response to SD INPRES. At the same time, cohorts exposed to greater SD INPRES school construction are no more likely to speak the national language at home, and, if anything, Muslims are slightly less likely to do so. The time spent learning Arabic may have come at the expense of instruction in the national language.[7]

Together, these results point to a counterbalancing of secular mass schooling, which, given our findings on supply-side dynamics, are consistent with a backlash against the state's nation-building objectives at the time. Further results support such an interpretation, including, among others, evidence of (1) limited support among exposed cohorts for the secular inclusive ideology of the state (*Pancasila*); (2) less appeal to nation-building themes among legislative candidates from exposed cohorts; and (3) greater intergenerational transmission of religious values from exposed cohorts to their children and fellow community members.

CONCLUSION

Our analysis provides important lessons for understanding the ideological consequences of mass education beyond the Indonesian context. Because they are often designed to homogenise educational content, mass schooling interventions are typically poised to generate political economy frictions. A myriad of alternative providers might resist or try to undermine efforts by the state to win over education markets. The extent to which mass schooling interventions are successful in promoting a common language or identity ultimately depend on the nature of strategic interactions with these other providers of education.

In Indonesia, as in many other countries, the resistance to the state's mass schooling efforts primarily came from religious schools. This suggests that the enduring importance of religion worldwide, which has puzzled the early proponents of modernisation theory, must also be understood in the context of societal conflicts over the provision of education.

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7   While nearly all Indonesians can speak the national language, Bahasa Indonesia, fewer than 20% choose to speak it at home, opting instead to retain their native ethnic language. As in many other multilingual countries, language choice in Indonesia is highly indicative of identity choice (see Chapter 2 of this eBook based on Bazzi et al. 2019).

The challenge of nation building may prove to be more persistent in societies that allow dual education systems to endure, if alternative providers of education promote of a vision of national identity at odds with that of the state. At the same time, the strategic response of the Islamic sector to mass schooling in Indonesia likely helped to address heterogeneous preferences for education, and in doing so, furthered the state's objective of expanding basic education. Future work should aim to shed light on these welfare considerations associated with the political economy of mass instruction policies.

REFERENCES

Alesina, A, P Giuliano and B Reich (2021), "Nation-Building and Education", *The Economic Journal* 131(638): 2273-2303.

Ansell, B and J Lindvall (2013), "The political origins of primary education systems: Ideology, institutions, and interdenominational conflict in an era of nation-building", *American Political Science Review* 107 (3), 505–522.

Bandiera, O, M Mohnen, I Rasul and M Viarengo (2019), "Nation-building through compulsory schooling during the age of mass migration", *The Economic Journal* 129 (617): 62–109.

Bazzi, S, A Gaduh, A Rothenberg and M Wong (2019), "Unity in Diversity? How Intergroup Contact Can Foster Nation Building", *American Economic Review* 109(11): 3978-4025.

Bazzi, S, G.Koehler-Derrick and B Marx (2020), "The Institutional Foundations of Religious Politics: Evidence from Indonesia", *Quarterly Journal of Economics* 135(2): 845–911.

Bazzi, S, M Hilmy and B Marx (2022), "Islam and the State: Religious Education in the Age of Mass Schooling", NBER Working Paper 27073.

Duflo, E (2001), "Schooling and labor market consequences of school construction in Indonesia: Evidence from an unusual policy experiment", *American Economic Review* 91 (4): 795–813.

Hefner, R (2008), *Making Modern Muslims: The Politics of Islamic Education in Southeast Asia*, University of Hawaii Press.

Hotelling, H (1929), "Stability in Competition", *The Economic Journal* 39(153): 41-57.

La Belle, T J and C R Ward (1994), *Multiculturalism and education: Diversity and its impact on schools and society*, SUNY Press.

Meyersson, E (2014), "Islamic Rule and the Empowerment of the Poor and Pious", *Econometrica* 82(1): 229-269.

Paglayan, A (2021), "The non-democratic roots of mass education: evidence from 200 years", *American Political Science Review* 115(1): 179-198.

Squicciarini, M P (2020), "Devotion and Development: Religiosity, Education, and Economic Progress in Nineteenth-Century France", *American Economic Review* 110 (11): 3454–91.

Tilly, C (1975), "Reflections on the history of European state-making", in C Tilly (ed.), *The Formation of National States in Western Europe*, Princeton University Press.

Wodon, Q (2014), "Education in Sub-Saharan Africa: comparing faith-inspired, private secular, and public schools", World Bank Working Paper.

ABOUT THE AUTHORS

Samuel Bazzi is an Associate Professor at the School of Global Policy and Strategy and the Department of Economics at the University of California, San Diego. His research lies at the intersection of development economics and political economy, with a focus on how individuals and nations adapt to the challenges of diversity in a global world. Bazzi is a co-editor at the Journal of Development Economics, a Research Affiliate at the Centre for Economic Policy Research (CEPR), and a Research Associate at the National Bureau of Economic Research (NBER).

Masyhur Hilmy is a PhD candidate in Economics at Boston University. His work explores the interaction between the state and civil society to understand how the lives of individuals in less-developed areas can be improved. His research fields are development economics, the economics of education, and political economy. Before studying economics, he worked at J-PAL Southeast Asia and taught in an elementary school in rural Sulawesi, Indonesia. Masyhur received his bachelor's degree in Astronomy from Institut Teknologi Bandung and his master's degree in Astronomy from Kyoto University, Japan.

Benjamin Marx is an Assistant Professor of Economics at Boston University and a CEPR Research Affiliate. He previously taught at Sciences Po Paris and completed his PhD in Economics at MIT in 2018. His research interests are in political economy, development economics, and economic history. In his current work, he studies institutions, state-building, accountability, and voting behavior in the developing world and in historical settings. Part of his research seeks to understand the interplay between the state and religious institutions and its consequences for economic development.

SECTION III
PROPAGANDA, LEADERSHIP AND JOINT EXPERIENCES

CHAPTER 15

Leadership and propaganda in nation building: Evidence from Rwanda under Kagame

Arthur Blouin[a] and Sharun W Mukand[b]
[a]University of Toronto; [b]University of Warwick

1 INTRODUCTION

Countries that are diverse (whether in terms of ethnicity, language, religion or any other characteristic) and polarised suffer from more conflict, higher corruption, weaker institutions and lower economic growth (Easterly and Levine 1997, Garcia Montalvo and Reynal-Querol 2005, Blattman and Miguel 2010). In light of this, some degree of nation building that aligns preferences and increases trust and cooperation across groups may be important for the *political sustainability* of economic development. In this chapter, we examine what kind of role leadership can play in nation building, especially in countries that are divided and have a history of conflict. In doing so, we cast light not only on the role of structural constraints, but also a leader's ideology and the incentives they face with respect to the shape of nation building – especially using media. In particular, we ask whether a political leader can use propaganda as a tool to help bridge divides in a society and achieve some degree of nation building.

Attempts at nation building by political leaders can come in various forms. As argued by Alesina et al. (2020) and discussed in Chapter 26 of this eBook, the precise shape of nation building, and how aggressively it is pursued, depends fundamentally on the incentives facing the political leadership. For instance, the authors show that democracies are more likely to pursue nation building than stable autocracies, but unstable autocracies may

pursue the most aggressive nation building of all. However, the incentives facing political leaders are important, the ideological convictions of political leadership can also shape the nature of nation building. For instance, do political leaders believe that the core identity of a nation and its peoples is fixed and unchanging over time? Such a view is associated with 'primordialism' and is commonplace among ethno-nationalist political leaders across the globe – from Turkey's Recep Tayyip Erdogan and India's Narendra Modi to Aung San Suu Kyi in Myanmar and Victor Orban in Hungary. In such instances, nation building is less about compromise and accommodation across different groups. Instead, it is about the imposition of the identitarian beliefs of the politically dominant group (be it ethnic, religious, or otherwise) on others. In this case, nation building is likely to be much more aggressive since it may require forced assimilation and adoption of the cultural and other practices of the ruling group.

However, irrespective of the precise shape of nation building, a crucial tool used by just about all leaders across political institutions is the deployment of propaganda. This propaganda may be delivered to the masses directly through state media, pamphleteering, speeches or mass rallies. But it could also be carried out through private media such as newspapers, books, as well as educational indoctrination. Indeed, this crucial role of propaganda through indoctrination in school is corroborated by the historian Hobsbawm (1992), who argues that over the course of the last two centuries, "states would use the increasingly powerful machinery for communicating with their inhabitants, above all the primary schools, to spread the image and heritage of the 'nation' and to inculcate attachment to it".

In the next section, we discuss the various ways in which propaganda can be deployed to catalyse and cement nation building. In Section 3, we describe a concrete empirical study that was used to study nation building in Rwanda under the autocratic rule of Paul Kagame. Section 4 concludes with a discussion.

2 LEADERSHIP AND PROPAGANDA

A key aspect of nation building is the construction of a national identity. Such nation building projects were adopted in much of Europe in the 19th century. In countries as diverse as Italy, Ireland, France and Germany, political leaders tried to construct a new sense of national identity. As memorably described by Sardinia's Massimo d'Aglezio on the eve of Italian unification, "[w]e have made Italy. Now we need to make Italians." This nation building project often involved not just the adoption of national infrastructure projects and the provision of common curricula in education and the gradual erasure of linguistic diversity, but also the use of propaganda through a variety of means.

We define political propaganda as a form of communication that is used by leaders to persuade their audience to further a particular political agenda – including nation building. Of course, such communication may involve the selective presentation of facts and/or the provision of information in a way that presses the emotional triggers

of the audience and gets them to act differently to how they would have otherwise (see Stanley 2015 for a discussion). This latter role of propaganda was perhaps put forth most sharply by the Minister of Propaganda in the Nazi government, Joseph Goebbels, who argued that "arguments must be crude, clear and forceful and appeal to emotions and instincts, not the intellect. Truth is unimportant and entirely subordinate to tactics and psychology" (Trevor-Roper and Trevor-Roper 1978).

The effectiveness of propaganda in either excluding individuals of certain religious, linguistic and ethnic categories or constructing an inclusive national identity depends on a number of factors.[1] These factors in turn depend on both the demand for information as well as its supply from political leadership. These twin demand-supply dimensions that make for effective propaganda are illustrated nicely in a recent study by Adena et al. (2015). On the supply side, the authors examine pro-government propaganda over radio used (at different times) by both the Weimar leadership and subsequently by the Nazi Party. On the demand side, they examine whether listeners in some regions were more likely to be receptive to anti-Semitic Nazi propaganda – for instance, those who grew up in regions with a history of anti-Semitism. Their results show that pro-government propaganda helped slow the spread of the Nazi Party. Subsequently, when the Nazis acquired political power, their radio propaganda helped consolidate their power with their nationalistic vision that excluded German Jews and worsened anti-Semitism.[2]

Propaganda can also have inadvertent side-effects, as illustrated by DellaVigna et al. (2014) (featured in Chapter 17 of this eBook), who show how Serbian nationalistic propaganda had cross-border effects. In particular, Croats listening to Serbian radio for entertainment purposes were also exposed to Serbian nationalist rhetoric and turned sharply against Serbs as a result.

However, the relative dearth of studies that evaluate whether a country has engaged in inclusive nation building (successful or otherwise) means we have to rely on a handful of studies. This is especially the case when evaluating studies that inform us whether such social engineering can be achieved, in particular in poor countries with a history of inter-ethnic conflict. We describe one such study in the next section, drawing on Blouin and Mukand (2019).

1   Populists as varied as Orban of Hungary, Modi in India and Boris Johnson in the United Kingdom have used propaganda and exclusionary rhetoric to rally popular support behind their policies and vision of the nation. For a recent survey on populism, see Guriev and Pappaiannou (2022).
2   For more on Nazi indoctrination, see Voigtlander and Voth (2015), who argue that Nazi schooling was probably even more important than propaganda over radio or cinema.

3 BRIDGING THE DIVIDE? PROPAGANDA IN KAGAME'S RWANDA

Bridging an ethnic divide would be challenging anywhere. Rwanda, a country that witnessed one of the worst genocides in recorded history, presents a special challenge. In 1994, extremists belonging to the majority Hutu ethnic group massacred up to a million Tutsi, comprising 70% of the total Tutsi population. Compounding the challenge, Rwanda is one of the poorest countries in the world and has never been a liberal democracy.

The autocratic leader of Rwanda is President Paul Kagame, a member of the Tutsi minority. Under his rule, the government has launched an ambitious programme of nation building that aims to bring Hutus and Tutsis together. Has there been real progress in ethnic reconciliation, or has the programme merely been a propaganda ploy to satisfy foreign investors and aid agencies? This question is hard to answer.[3]

Results on the ground are difficult to evaluate because, under President Kagame, Rwanda is an autocracy where the government directly controls the national narrative on reconciliation. Independent investigation of inter-ethnic attitudes is not permitted. Even if it were allowed, local people are often afraid to give honest answers about Hutu–Tutsi relations. The *New York Times* reported recently that "Mr. Kagame has created a nation that is orderly but repressive … Against this backdrop, it is difficult to gauge sentiment about the effectiveness of reconciliation efforts".

Despite these challenges, in Blouin and Mukand (2019) we investigate the Rwandan government's efforts to reshape ethnic attitudes through propaganda over radio. In Rwanda, much of the populace is illiterate and does not have access to television, so radio is the most important form of mass media and often the only source of information and entertainment. Although Rwanda now has many independent radio stations, the broadcast of news and information is largely confined to Radio Rwanda – the official radio station on which the government controls messaging tightly. The message of national unity comes in a variety of guises, of which two are notable: nation-building rhetoric that frames the presentation of the news, and radio dramas and soap operas that emphasise Hutu–Tutsi reconciliation.

We aimed to compare the ethnic attitudes and behaviour of those who have been exposed to propaganda and news from Radio Rwanda with those who were not. This is not straightforward. To illustrate the challenge, research from the United States tells us that households that decide to tune into Fox News can hold very different beliefs from those that do not. We had to allow for the possibility of a similar situation in Rwanda – households that own radios and listen to Radio Rwanda might already be very different from those who do not.

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3   For instance, while trust between Hutus and Tutsis is high, in Blouin and Mukand (2022) we document that in Rwanda and Burundi there remain feelings of victimhood that continue to shape the outcomes of inter-ethnic interactions.

To address this challenge, we used a natural experiment. Rwanda is known colloquially as the 'land of a thousand hills'. Its mountainous topography makes for accidental variation in the coverage of radio broadcasts. Some households that happen to live in villages in clear sight of a radio transmission tower receive clear Radio Rwanda broadcasts. Others, who happen to live out of the line-of-sight of the radio towers, receive poor radio reception and are less likely to have been exposed to government propaganda over the radio.

In general, to receive an audible radio signal a signal strength of about 45 decibel units (dBu) is required. We can therefore compare people who live in villages that receive a signal of this strength with those who do not. Moreover, we can look at other 'false' thresholds to make sure that it is radio, and not some other factor, that is generating any differences in attitudes that we observe. For example, if the 45 dBu signal strength that defines radio reception also marked the largest differences in attitudes, this would strongly indicate that the radio was responsible for shifting attitudes. If, on the other hand, there were multiple radio strength thresholds that generated large differences, or the largest differences came at a very different threshold, then we might be far less convinced that radio propaganda was an important factor in shaping views towards identity.

We conducted a series of experiments to compare Hutu–Tutsi attitudes of those exposed to Radio Rwanda broadcasts with others that were not. The results were striking and unexpected. First of all, those exposed to Radio Rwanda broadcasts proved to be much more willing to interact face-to-face with members of the other ethnic group. We asked all participants to identify five other people in attendance that they would like to complete an exercise with. If they completed the exercise productively, they had a chance to earn some additional money. We examined the share of the five people that they identified that were not from their ethnic group.

There were large differences in the inclusion of outgroup members on the lists of those who received the radio propaganda. Furthermore, when we look at all possible radio strength thresholds in the data, the one that generated the largest differences in inter-ethnic partner preferences was the 45 dBu threshold that defines an audible radio signal.

We can see this clearly in Figure 1, which plots the estimated difference in partner preference on the vertical axis, and various dBu thresholds that one can use to define comparison groups on the horizontal axis. The largest difference comes right at the 45 dBu threshold, with weakening effects as we move away from this threshold on either side. This is precisely the relationship that we would expect to see if the radio signal is causing differences in ethnic attitudes. If it was the radio signal that was generating differences, the more incorrectly we define an audible radio signal (by moving away from the 45 dBu threshold), the more we incorrectly categorise people who do receive a signal as not receiving one, and vice versa. At signal thresholds that are completely

uninformative of whether the village receives the propaganda (i.e. far to the left or right on the horizontal axis) we would expect no differences in inter-ethnic attitudes if the radio propaganda is effective. This is precisely what we see.

FIGURE 1   PARTNER SELECTION MEASURE AND RADIO RWANDA RECEPTION
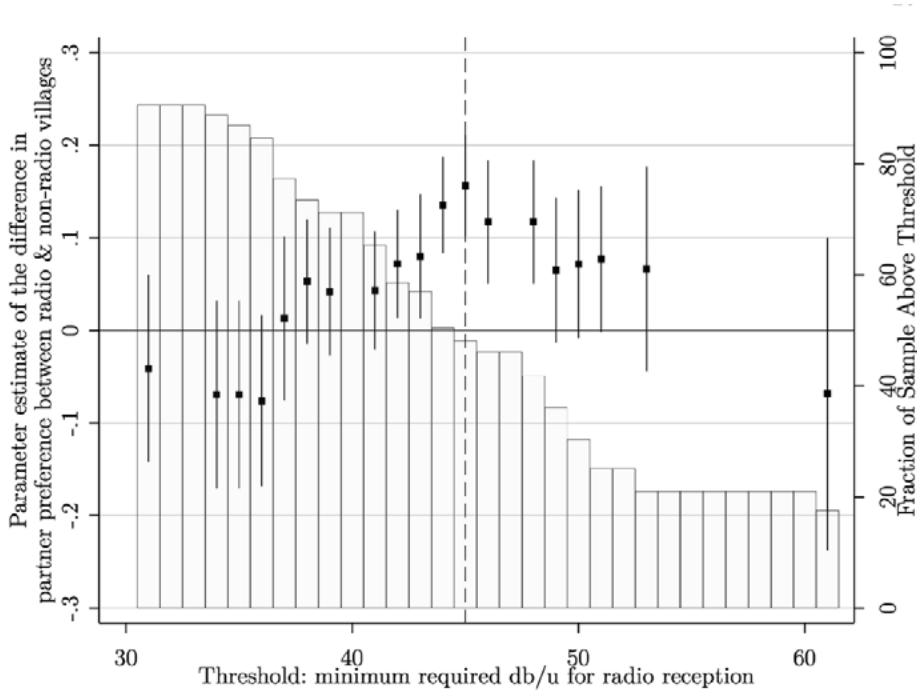
Rwandans exposed to propaganda did not only demonstrate increased willingness to partner with those that identified with the other ethnic group. We had respondents play a standard game used in economics to measure trust. The 'trust game' is played with two people: one person is randomly designated as the *sender*, the other as the *receiver*. The sender receives some money at the start of the game (in our case, about $1). They must then decide how much of their endowment they should risk. They are tasked with sharing some portion of their endowment with the receiver. The key is that whatever they share is matched by the research team. The receiver then can return as much or as little of what is shared back to the sender. So, if the sender trusts the receiver to reward them for risking a large share of their endowment, then they should risk everything, as that means more money is matched and everyone has a chance to be better off. If, on the other hand, they fear that the receiver will keep everything that was shared for themselves, then the prudent course of action is to share nothing, ensuring that they leave the game with at least their original endowment.

Just as in the partner preference exercise, when we analysed the offers in the inter-ethnic trust game it immediately became apparent that those exposed to radio propaganda exhibited levels of inter-ethnic trust that were much higher. Indeed, we see differences in inter-ethnic trust that mirror almost precisely the differences that we saw in partner preferences. The differences are the highest at the 45 dBu radio signal threshold, and they drop off consistently as we move away from that threshold (Figure 2).

FIGURE 2   PRIVATE, INTER-ETHNIC TRUST GAME OFFER AND RADIO RWANDA RECEPTION
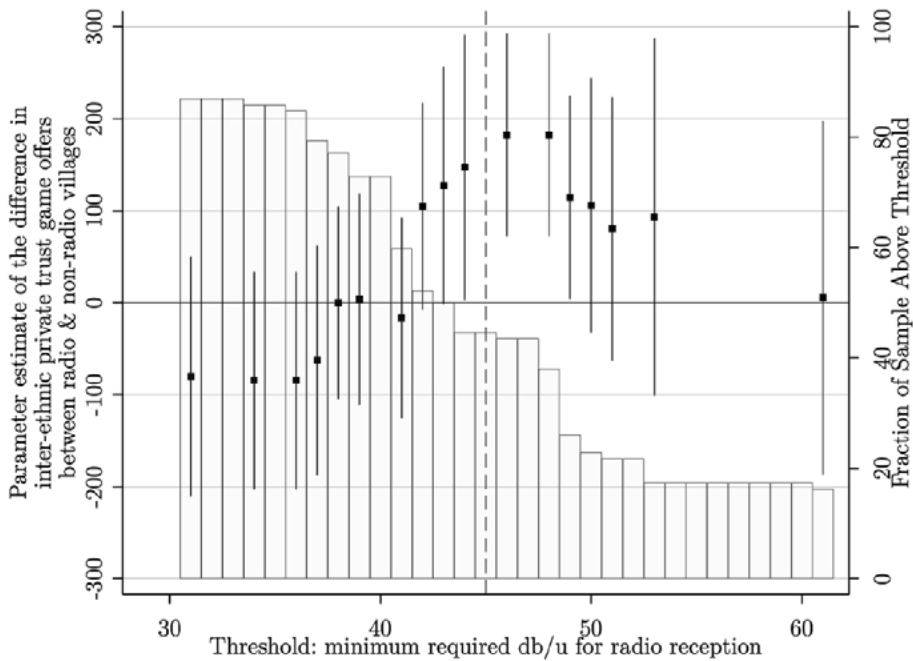
The most remarkable finding was on the salience of ethnic identity. Ethnic salience is not a concept that has been studied extensively by economists, so we adapted a tool from cognitive psychology to try to measure it. We showed each respondent eight different pictures. Some of the pictures were of young male Hutu, some of young male Tutsi. (some examples are in Figure 3). After showing each photo, our research team read a statement about the person in the photo. Each statement was innocuous, and we tried to avoid statements that might be associated with ethnic stereotypes. An example is: "This person likes bananas but dislikes guava".

After showing all eight photos and reading aloud the statements, and following a brief break, there was a surprise quiz. All participants made some mistakes in the quiz, but that was expected since they had not dedicated themselves to memorising the associations between the statements and photos. But that was not the point. The point was instead

to see, when they did inevitably make mistakes, whether they systematically confused a Hutu photo for another Hutu, or a Tutsi with another Tutsi. If they did this at far greater regularity than if they were choosing photos at random, we could infer that they were using ethnicity as a cognitive tool to help them categorise the photos. For these people, we can say that ethnicity is salient. If, on the other hand, they mistook a Hutu for another Hutu, or Tutsi with another Tutsi at about the rate we might expect by chance alone, we can infer that for these people, ethnicity is not salient.

FIGURE 3   EXAMPLE PHOTOS FROM SALIENCE EXERCISE

"This person owns a blue bicycle and two red motorbikes"

"This person really likes bananas but dislikes guava"

"This person has four children: two boys and two girls"

"This person has two brothers"

Once again, we found that exposure to radio broadcasts made individuals much less likely to categorise others based on their ethnicity. Ethnic salience was much lower among those exposed to radio propaganda than those not exposed – exhibiting again an almost identical pattern to inter-ethnic trust and partner preference (Figure 4). In other words, those individuals for whom ethnicity was cognitively 'erased' were also precisely the ones who were much more trusting and generous towards those of the other ethnicity.

FIGURE 4   SALIENCE OF ETHNIC IDENTITY AND RADIO RWANDA RECEPTION
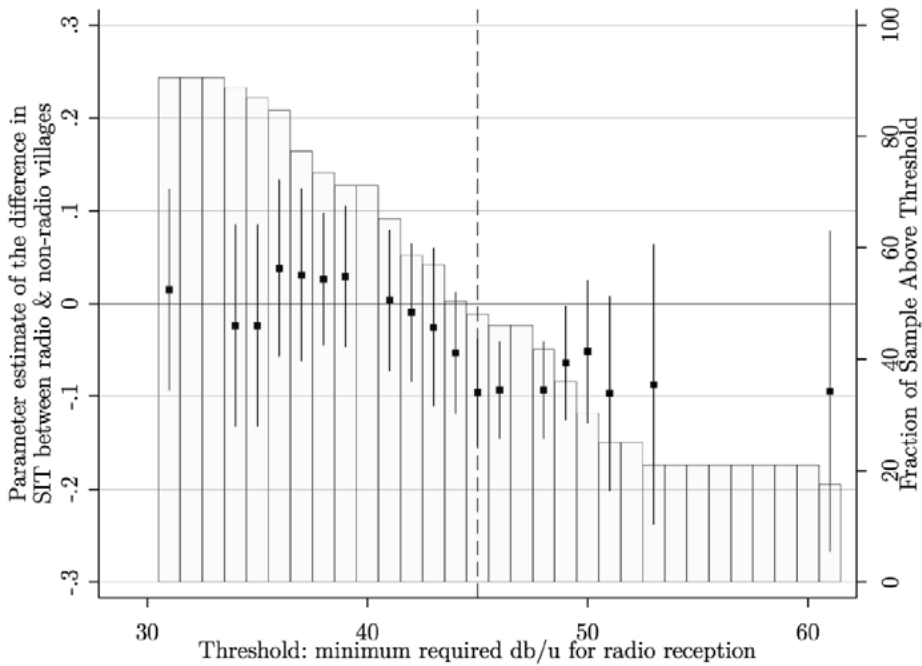
Taken as a whole, the evidence suggests something very surprising. In one of the poorest countries in the world, and one that recently experienced one of the worst genocides in human history, the government has found a way to bridge the ethnic divide between the Hutus and Tutsis. Moreover, this was done in a relatively short period of time, with just over ten years of radio propaganda.

In sharp contrast to what we have seen elsewhere across the globe, the media in Rwanda has helped reduce ethnic division.

4 DISCUSSION

The above study provides reason for optimism in the case of inclusive nation building. Propaganda can not only be used to divide and exclude groups. Instead, it may also help erase older identities and create a new identity that brings them together. However, there are also grounds for caution. For instance, might the improved inter-ethnic relations in Rwanda be reversed just as easily? Unfortunately, we have no evidence of the extent to which this relatively inclusive nation building is sustainable or not. In part this is because it may well depend on the shifting whims and priorities of President Kagame. The country's own battered history over the past 25 years suggests that the airwaves

have had considerable power in manipulating public opinion for ill (Yanagizawa-Drott 2014) as well as for good – by fomenting inter-ethnic hate before fostering inter-ethnic reconciliation.

Finally, more pessimistically, Rwanda's distinctive political environment makes it difficult to generalise its lessons to other societies. Can liberal democracies use the media to reduce ethnic polarisation in the same way? It is sobering to realise that reducing polarisation and bringing about inclusive nation building through propaganda may be easier in an autocratic country with no real media freedom, such as Rwanda, than in a noisy, competitive democracy where conflicting opinions are seen as normal and are readily voiced.

REFERENCES

Adena, M, R Enikolopov, M Petrova, V Santarosa and E Zhuravskaya (2015), "Radio and the Rise of the Nazis in Prewar Germany", *The Quarterly Journal of Economics* 130(4): 1885–1939.

Alesina, A, P Giuliano and B Reich (2021), "Nation-building and education", *The Economic Journal* 131(638): 2273 –2303.

Blattman, C and E Miguel (2010), "Civil war", *Journal of Economic Literature* 48(1): 3–57.

Blouin, A and S W Mukand (2019), "Erasing ethnicity? Propaganda, nation building, and identity in Rwanda", *Journal of Political Economy* 127(3): 1008 –1062.

Blouin, A and S W Mukand (2022), "Mistaking Noise for Bias: Victimhood and Hutu-Tutsi Reconciliation in East Africa", *Journal of Development Economics*.

DellaVigna, S, R Enikolopov, V Mironova, M Petrova and E Zhuravskaya (2014), "Cross-border media and nationalism: Evidence from Serbian radio in Croatia", *American Economic Journal: Applied Economics* 6(3): 103–32.

Easterly, W and R Levine (1997), "Africa's growth tragedy: policies and ethnic divisions", *The Quarterly Journal of Economics* 112(4): 1203–1250.

Garcia Montalvo, J and M Reynal-Querol (2005), "Ethnic Polarization, Potential Conflict, and Civil Wars", *American Economic Review* 95(3): 796–816.

Guriev, S and E Pappaiannou (2022), "The Political Economy of Populism", *Journal of Economic Literature* 60(3): 753–832.

Hobsbawm, E J (1992), *Nations and Nationalism since 1780: Programme, Myth, Reality,* Cambridge University Press.

Stanley, J (2015), *How Propaganda Works*, Princeton University Press.

Trevor-Roper, H and H R Trevor-Roper (eds) (1978), *Final Entries, 1945: The Diaries of Joseph Goebbels*, Putnam.

Voigtländer, N and H-J Voth (2015), "Nazi indoctrination and anti-Semitic beliefs in Germany", *Proceedings of the National Academy of Sciences* 112(26): 7931–7936.

Yanagizawa-Drott, D (2014), "Propaganda and Conflict: Evidence from the Rwandan Genocide", *Quarterly Journal of Economics* 129(4): 1947–1994.

ABOUT THE AUTHORS

Arthur Blouin is an Assistant Professor of Economics in the Department of Economics at the University of Toronto. His research primarily focuses on why some regions lag behind in economic development while others thrive, with a particular focus on social and cultural factors. He has worked extensively on the Hutu-Tutsi conflict and reconciliation in Burundi and Rwanda, on the importance of relationships in the coffee industry, and on the cultural roots of agricultural technology adoption across sub-Saharan Africa. Arthur earned his PhD in Economics from the University of Warwick.

Sharun Mukand is a Professor of Economics at the University of Warwick. He was previously a scholar at the Institute for Advanced Study at Princeton University. His research focuses on the political economy of policymaking and development.

CHAPTER 16

Memory and nation building: The dangers of common enemy narratives

Elena Esposito,[a] Tiziano Rotesi,[a] Alessandro Saia[b] and Mathias Thoenig[ac]
[a]University of Lausanne; [b]University of Bologna; [c]CEPR

Countries are most often built on common myths – shared narratives – about the nation's past and/or the country's mission (Renan 1882). Most of the time, these narratives feature a common enemy rhetoric, that is to say, they centre around a common threat or enemy that the nation needs to fight for peace and unity of the country to prevail. Examples abound. Switzerland, Italy and the French Republic after 1870 moulded their identities against their long-lasting external enemies, represented by the Holy Roman Empire, Austria and Prussia, respectively. Along similar lines, Evrigenis (2007: 14) notes that "[s]everal modern nations, the successors of empires, such as Turkey, and of colonialism, such as Indonesia, formed and consolidated their identities in opposition to others, neighbours, antagonists, enemies, and former despots".

Interestingly, in some cases this imagined common threat relates to an internal enemy – often a minority group within the country, such as Jews and Gypsies in Nazi Germany, minorities during the revolution of the Young Turks at the beginning of the 20th century, or in the dissolution of former Yugoslavia. In all these cases, concentrating on imagined internal enemies served the purpose of reconciling the nation around a common interest that these minority groups purportedly threatened. As the history of these countries indicates, these rhetorical constructions can have dramatic consequences for the fate of the targeted minority groups. Moreover, they can reveal themselves to be extremely fragile, as promoting unity or agreement at the expense of truth may foster new divisions, hindering the reconciliation process over the long term.

METHODOLOGICAL CHALLENGES FOR SOCIAL SCIENTISTS

The invention of a common threat for fostering unity is a mechanism that has been investigated by a host of different disciplines, ranging from sociology to evolutionary biology. According to several thinkers in sociology, including classical social theorists such as Georg Simmel, intergroup conflict increases intragroup cohesion and cooperation (e.g. Simmel 1908, Coser 1964). Evolutionary biologists, along similar lines, hypothesised that external threats are powerful drivers of parochial altruism (Henrich and Boyd 2001, Richerson and Boyd 2005, Bowles 2006, Choi and Bowles 2007). Balance theory in cognitive psychology and in social network analysis offers an interpretation of the psychological mechanism behind the common enemy rhetoric: when two individuals share negative attitudes towards a third person, experiencing negative attitudes versus each other induces cognitive dissonance and is destabilising (see Hummon and Doreian 2003 for a review). Instead, maintaining the same negative attitudes against a third individual promotes closeness, as in the motto "the enemy of my enemy is my friend".

Despite these large and variegated theoretical and analytical foundations, social sciences still offer scarce quantitative causal evidence on the functioning of the common enemy narrative for the purpose of country reconciliation.[1] The main reason for the lack of sound empirical evidence is the numerous empirical challenges that the study of common enemy narratives poses. First of all, observing narratives and mapping their spread is often impossible. Moreover, in historical or conflict-ridden contexts with a limited availability of surveys, it is difficult to monitor attitudes and beliefs in order to study how they are affected by narratives. Lastly, assessing the causal effect of narratives means relying on plausibly exogenous variations that are tricky to uncover in real-life settings. As a consequence of these methodological challenges, while anecdotes and case studies about the role of narratives for country reconciliation abound, causal evidence is limited. Do historical narratives meaningfully change opinions and behaviours? Or are they rather window-dressing explanations of economic and political processes that involve deeper stakes and special interests?

RECONCILIATION AFTER THE US CIVIL WAR: THE LOST CAUSE NARRATIVE AND *THE BIRTH OF A NATION*

In a recent paper (Esposito et al. 2021), we study the role of common enemy narratives for country reconciliation, exploring the evolution of North-South divisions in the aftermath of the US Civil War.

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1   De Jaegher (2021) surveys the common enemy effect within the game theory and experimental economics literature and presents evidence coming mostly from laboratory experiments.

The end of the American Civil War (1861–65) – "the largest and most destructive conflict in the Western world between the end of the Napoleonic Wars in 1815 and the onset of World War I in 1914"[2] – left a deeply divided society, with sectionalist tensions and partisan hatred polluting the political debate for decades after the ceasefire. In the aftermath of the war, a powerful narrative known as the Lost Cause emerged. According to this revisionist retelling of US history, the conflict was not caused by slavery. Instead, the South fought simply to defend its freedoms and neither of the two sides had been truly wrong: the real threat to both North and South was represented by the empowerment of Black people.

A major flag bearer of the Lost Cause narrative, responsible for popularising this myth throughout the country, was the movie *The Birth of a Nation* (1915) by director D W Griffith. The film was a phenomenal box office success, with a cumulative worldwide audience of more than 200 million, making it the first Hollywood hit and, according to some critics, one of the most influential films in US cinema history. The movie champions an extreme version of the Lost Cause narrative. A racist portrayal of African Americans and their emancipation struggle, it glorifies the violence of the Ku Klux Klan and advocates for national reunification in defence of white supremacy (see transcripts of the movie in Figure 1).

FIGURE 1   AN ADVERT FOR *THE BIRTH OF A NATION* AT THE ORPHEUM THEATRE (LEFT) AND A SCRIPT FROM THE MOVIE'S INCEPTION (RIGHT)
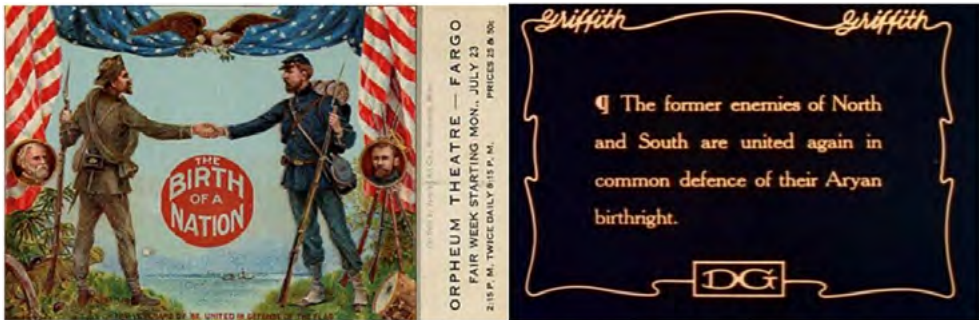
This setting allows to tackle many of the empirical challenges encountered by social scientists so far. The spread of the narrative is tracked by following the diffusion of the movie *The Birth of a Nation*, which faithfully embodies it. Moreover, to measure changes in attitudes across place and time, we perform an extensive data-collection exercise using data-scraping techniques on historical newspapers. Finally, to identifying the causal effect of exposure to the reconciliation narrative, we exploit sources of quasi-random variation in the geographical distribution of the movie generated by the logistics of movie distribution.

2   Source: American Battlefield Trust (www.battlefields.org/learn/articles/brief-overview-american-civil-war).

The findings of the study shed light on how effective the movie was in pacifying North–South divisions and, at the same time, how the 'common enemy' content of the narrative contributed to the upsurge of violence and discrimination against African Americans (complementing findings by Ang 2020). Our interpretation of the results suggests that discrimination against African Americans served the purpose of fostering North–South reconciliation, in a classical 'common enemy'-type framework.

FIGURE 2 NEWSPAPER ARTICLES DOCUMENTING THE SCREENING OF *THE BIRTH OF A NATION*
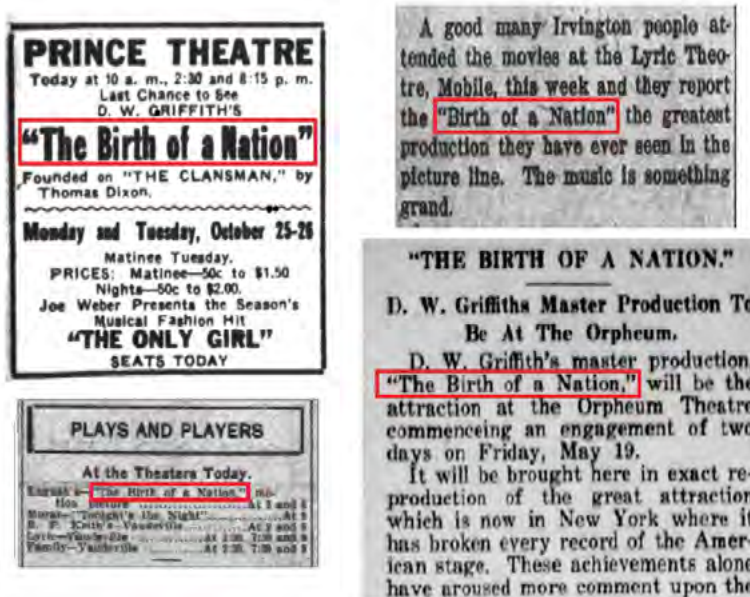
METHODS

Our empirical analysis tracks the distribution of the movie through US counties. We rely on an extensive data-collection exercise using information on movie screening from local newspapers. As an example, Figure 2 reports newspaper advertisements and articles documenting a local screening of the movie in Houston (top left), Indianapolis (top right), Mobile (bottom left) and Lewisburg (bottom right). Thanks to this detailed source of information on screenings, we can track the diffusion of the movie month by month. By 1920, the movie reached about half of the counties in our sample in 1920 (Figure 3).

Clearly, a first-order concern is that the airing of the movie was not random. For example, the data show that areas with a higher share of literate inhabitants were more likely to screen the movie. As a source of quasi-exogenous variations in movie exposure, we exploit a feature of the logistics of movie distribution in the early 20th century United States, namely, that movies were touring places following recurrent temporal and spatial

patterns. We therefore use a previously released movie with content completely unrelated to the plot of *The Birth of a Nation* to predict where and when the latter was more likely to be screened.

FIGURE 3   THE SPATIAL DISTRIBUTION OF *THE BIRTH OF A NATION* BY 1920

Note: Map of in-sample counties that had screened *The Birth of a Nation* by 1920. Counties in red were exposed to the movie and counties in white were not.

We then look at how the screening of the movie concurred to transform a variety of attitudes towards reconciliation, which are measured at the monthly level over the full 1910–1920 period, by comparing changes in attitudes between counties that screened the movie and counties that did not. The analysis employs a variety of sources to measure changes in attitudes and behaviours. The first measure of national unity is derived from a text analysis of a large dataset of local newspaper articles containing more than 25 million pages. The analysis combines machine learning methods and external evaluation of human judges to identify lists of words with a patriotic and divisive content. We also consider two outcome variables that relate to behavioral changes: one measures patriotism by looking at changes in enrollment in the US Navy, while the other analyses the evolution of names of newborn babies (ENI henceforth), comparing changes in the prevalence of names that evoke the Confederacy and the Union before and after the screening of *The Birth of a Nation*. Last, exploiting again information from local newspapers, we track the evolution of white supremacist ideology and discriminatory attitudes against African Americans in the labour market.

RESULTS

In the data, we see that screening *The Birth of a Nation* led to an immediate and continuously growing increase in the frequency of patriotic terms ("American flag", "national hymn", "Stars and Stripes", etc.). By contrast, words related to former North-South cleavages ("Confederacy", "secession", "carpetbagger", etc.) tend to be used less

frequently. Figure 4 illustrates this change. In counties reached by the movie, we find a gradual and cumulative impact of the screening of the movie on our measure of reconciliation in the public discourse.

FIGURE 4   CHANGES IN LANGUAGE FOSTERED BY THE SCREENING OF *THE BIRTH OF A NATION*
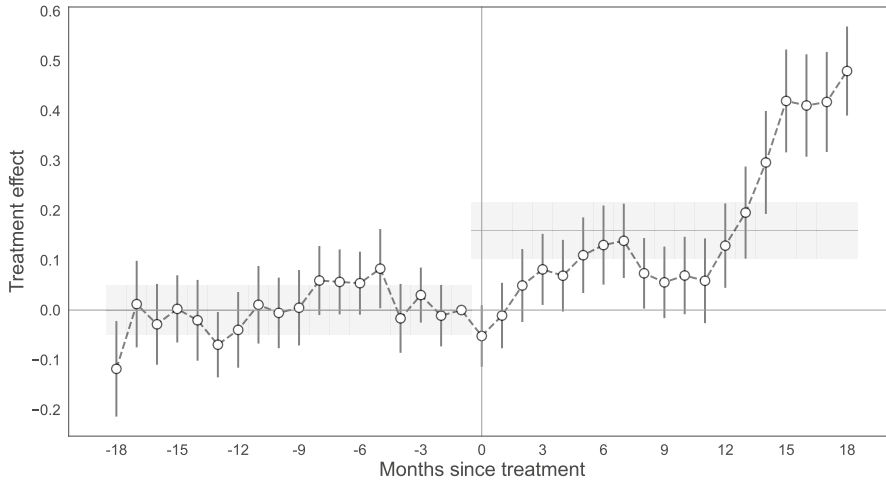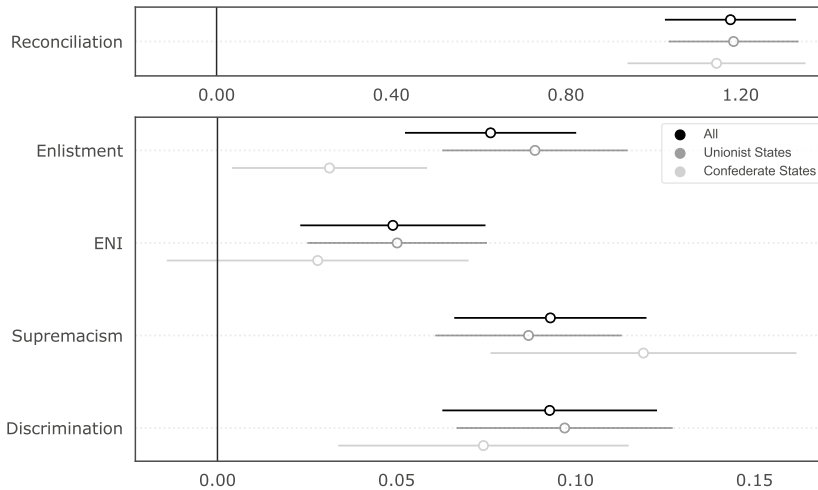

Note: The figure plots estimates of the effect on the variable *Reconciliation$_{c,t}$* (based on the difference between the first principal component of relative frequency of the patriotic terms and the first principal component of the frequency of divisive words) of 18 of lags and 18 leads (monthly increments) of the variable *BON$_{c,t}$*. In blue we show the average effect for the placebo estimates, while in red we show the average effect.

Beyond shifts in language, the movie also affected behaviours. We show that counties exposed to the movie experienced a surge in patriotism, with an increase in the rate of volunteering for the US military. Looking at naming patterns among babies born in counties that aired the movie, we find that the movie facilitated cultural reconciliation between North and South, with an increased adoption of first names traditionally associated with the former enemy's regional identity.

The cost of the non-inclusive reconciliation narrative conveyed by the movie, rooted in a common enemy argument, was dramatic. By measuring the salience of white supremacism and racial discrimination in local newspapers, the study documents the parallel shift in attitudes toward African Americans. We interpret these results as evidence that reconciliation was fostered by reshuffling anger and animosity from the North–South to the Black–White cleavage. Specifically, the Lost Cause narrative forged the myth of a common threat to all white Americans from the North and South in the form of Black Americans and their fight for enfranchisement.

Our statistical estimations point to a quantitatively sizeable effect of the movie on a series of attitudes towards national reconciliation and the racial discrimination of African Americans. Figure 5 summarises coefficient estimates for all outcome variables, including coefficients for the full sample of counties, and for former Confederate and Unionist states.

FIGURE 5   CHANGES IN ATTITUDES AND BEHAVIOURS FOSTERED BY THE SCREENING OF
**   *THE BIRTH OF A NATION***

Note: The figure summarises regression estimates of the effects of exposure to *The Birth of a Nation* on our outcome variables.

Our findings offer a new interpretation of the role of the Lost Cause in moulding internal cleavages that remain at the core of political debate today. More broadly, our paper questions the ability to reunite as one nation when reconciliation is based on excluding some of its members.

REFERENCES

Ang, D (2020), "The Birth of a Nation: Media and Racial Hate", HKS Working Paper No. RWP20-038.

Bowles, S (2006), "Group competition, reproductive leveling, and the evolution of human altruism", *Science* 314(5805): 1569–1572.

Boyd, R and P J Richerson (2005), *The origin and evolution of cultures*, Oxford University Press.

Choi, J-K and S Bowles (2007), "The coevolution of parochial altruism and war", *Science* 318(5850): 636–640.

Coser, L (1964), *Functions of Social Conflict*, Free Press.

De Jaegher, K (2021), "Common-enemy effects: Multidisciplinary antecedents and economic perspectives", *Journal of Economic Surveys* 35(1): 3–33.

Esposito, E, T Rotesi, A Saia and M Thoenig (2021), "Reconciliation Narratives: The Birth of a Nation after the US Civil War", CEPR Discussion Paper No. 15938.

Evrigenis, I D (2007), *Fear of enemies and collective action*, Cambridge University Press.

Henrich, J and R Boyd (2001), "Why people punish defectors: Weak conformist transmission can stabilize costly enforcement of norms in cooperative dilemmas", *Journal of Theoretical Biology* 208(1): 79–89.

Hummon, N P and P Doreian (2003), "Some dynamics of social balance processes: bringing heider back into balance theory", *Social Networks* 25(1): 17–49.

Simmel, G (1908), *Conflict, The Free Press*.

Renan, E (1882), *Qu'est-ce qu'une nation?*

ABOUT THE AUTHORS

Elena Esposito is a Rita Levi Montalcini Researcher at the University of Turin (ESOMAS). She is an applied economist with research interests in the fields of development economics, economic growth, political economy, and economic history. She earned a PhD in Economics from the University of Bologna in 2014 and was post-doctoral researcher at the European University Institute. Before joining the University of Torino, she was Assistant Professor at the University of Lausanne.

Tiziano Rotesi is a Postdoctoral Fellow at the University of Lausanne. His research in empirical political economy focuses on how media shape economic and social outcomes. In addition, he has experience in experimental economics and has published interdisciplinary research that utilizes behavioral insights to address public health issues. He holds a PhD in Economics from Bocconi University and degrees in Economics from the University of Florence and the Barcelona School of Economics.

Alessandro Saia is an Associate Professor of Economics at the University of Bologna. His research focuses on political economy. Prior to joining University of Bologna, he was a postdoctoral researcher at the University of Lausanne and an Economist at the Economics Department of the OECD. He holds a PhD in Economics from University of Bologna.

Mathias Thoenig is the PPE Centenary Visiting Professor at University of Oxford and a Professor of Economics at University of Lausanne. He is a Research Fellow at CEPR and IMD Business School. His research focuses on development, international trade and political economy. He has been awarded an ERC Grant for his work on ethnic

conflicts. He has held appointments at International Monetary Fund, MIT, Queen Mary University of London, SciencesPo Paris, University of British Columbia and University Pompeu Fabra. He has published and forthcoming papers in, among others, *American Economic Review, Econometrica, Quarterly Journal of Economics, Review of Economic Studies*. He holds a Ph.D. from University Paris Sorbonne and a B.A. in engineering from Ecole Polytechnique.

CHAPTER 17

Unintended cross-border effects of nation-building media

Stefano DellaVigna,[a] Ruben Enikolopov,[be] Vera Mironova,[c] Maria Petrova[be] and Ekaterina Zhuravskaya[de]

[a]University of California, Berkeley; [b]Pompeu Fabra University; [c]Harvard University; [d]Paris School of Economics; [e]CEPR

A number of recent papers suggest that state and private media may have important power in nation building and reconciliation after conflict (see, for instance, Chapter 15 of this eBook on Blouin and Mukand 2019). Sometimes, such nation-building propaganda to achieve reconciliation after a civil conflict is conducted by vilifying a common internal or external enemy. An example of this is the effect of the 1915 American film, *Birth of a Nation*, described in Chapter 16 (based on Esposito et al. 2021).

What are the effects of nation-building media in the aftermath of conflict on audiences that the media did not target? An important instance of unintended media audiences occurs near borders between countries that were engaged in conflict in the past, as the audience on one side of the border receives the media intended for the other side. The effect of the media on the non-target audiences is not clear *a priori*. This is particularly the case when the content of the nation-building media does not vilify the former adversary, but instead is aimed at moving past the conflict and on internal development. It is quite possible that the cross-border impact of the media is negligible, particularly if one expects people to ignore it because, for example, they self-select into media outlets that are in line with their own views (Sunstein 2001, Durante and Knight 2012). Or it is possible that exposure to the media of the former enemy intended for internal consumption, and in particular on moving past the conflict to peaceful development of the nation, may reduce informational asymmetries and alleviate ethnic tensions (Allport 1954).

On the other hand, it is also possible that the exposure to such cross-border nation-building media content may trigger sentiments of ethnic animosity among the neighbouring population by acting as a reminder of the past conflict. This could even result in increasing the likelihood of future conflict. Clarifying how post-conflict nation-building media affects the feelings of audiences that it does not intend to target is thus relevant for our understanding of the effects of nation-building propaganda.

Oftentimes, such exposure occurs across the border when neighbouring ethnic groups share a language, as is common for countries that formerly belonged to one larger entity (e.g. the USSR, Yugoslavia or Sudan). However, exposure to rival nation-building media is not limited to media waves travelling across borders, as unintended media exposure also can occur within countries when rival ethnic, racial or religious groups speak the same language. Examples include Muslims and Hindus in India, Basques and Spanish in Spain, and the population of African versus European descendants in the Americas.

Our paper (DellaVigna et al. 2014) documents the effects of exposure to media intended to strengthen the national identity of a particular ethnic group on nationalistic feelings and animosity of a rival group. In particular, we examine the impact of exposure to cross-border radio on nationalistic sentiment and behaviour in the context of one of Europe's deadliest conflicts since World War II and before the Russian full-scale invasion of Ukraine, namely, the Serbo-Croatian conflict in the 1991–1995 Yugoslavian wars. We focus on the region of Croatia near the Serbia–Croatia border (officially called Eastern Slavonia, Baranja and Western Srijem). A map of this region is presented in Figure 1. It was the theatre for an open armed conflict with heavy fighting between Serbs and Croats in 1991 and was under Serbian occupation till 1995. The military operations of the Serbian–Croatian conflict ended in 1995. Slobodan Milošević, the former president of Serbia, was overthrown in 2000 and handed to the International Criminal Tribunal in The Hague. Public media in Serbia has continued to promote Serbian nationalism, but after the conflict was over focused on internal affairs. In particular, public radio stations (i.e. stations of the Radio-Television of Serbia group, or RTS, also known as the Serbian Broadcasting Corporation) have operated with the official mission to strengthen Serbian national identity (IREX 2010).

The Serb-Croat case is an almost ideal setting to study cross-border effects of nation-building media. The signal of Serbian public radio intended for internal consumption by Serbs inside Serbia reaches several, but not all, villages in this region of Croatia. As Serbs and Croats speak the same language, despite using different alphabets, Croats can fully understand Serbian radio.[1] One can narrow down the analysis of cross-border effects of media to radio content for two reasons. First, radio is the primary media source

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1   According to Greenberg (2004), the difference between Serbian and Croatian spoken language is similar in magnitude to the difference between British and American English.

in this area. Second, due to different alphabets, a significant part of the press and even television, which often broadcasts foreign programmes with subtitles, does not travel as easily across the border.

We use detailed village-level information on media reception, voting and other nationalistic behaviour to answer two key questions: Do Croats actually listen to Serbian radio when it is available? And if so, does Serbian radio have any effect on their political views and attitudes towards Serbs?

Using a street survey of residents of Croatian villages located close to the Serbian border, we find that the answer to the first question is positive. As Panel A of Figure 1 shows, 87% of the respondents in villages that we categorise as receiving at least one Serbian radio station respond affirmatively to the question, compared to 56% in villages that we categorise as having no reception. We also asked respondents how often they listen to Serbian radio. As shown in Panel B of Figure 1, in the villages with at least one Serbian radio station (according to our hand-collected measure), only 26% of the respondents state that they never listen to Serbian radio, while 32% state that they listen to Serbian radio at least once a week. In contrast, in the villages that we code as not receiving Serbian radio, 62% state that they never listen to Serbian radio and only 16% state that they do so at least once per week. We verify that the difference between the two types of villages in the likelihood of listening to Serbian radio at least some times according to survey responses is statistically significant.

Figure 2 indicates a similar pattern using the signal strength variable. The dots representing the villages in the survey indicate a positive relationship between signal strength and the measure of listening to Serbian radio.

The share of listeners to Serbian radio in Croatian villages increases with the Serbian radio signal strength (calculated using information on the location of transmitters). The high percentage of listeners to Serbian radio among Croats stands in contrast with an extreme view of political polarisation – i.e. that consumers only listen to media outlets that conform to their political beliefs – and is consistent with more moderate evidence of polarisation in the US media (Gentzkow and Shapiro 2011). Both the results of our survey and anecdotal evidence from interviews we conducted with Croatian media experts suggest that Croats tune in to Serbian radio for two reasons: first, to satisfy their demand for alternative information; and second, to listen to Serbian singers from the times of Socialist Yugoslavia. In doing so, they also encounter political content. Sometimes – although less frequently – Croats listen to Serbian radio to learn about their past rival's point of view to be able to defend better their own view point.

FIGURE 1   ARE CROATS EXPOSED TO SERBIAN NATION-BUILDING RADIO?

A) Reported reception of Serbian radio from survey responses as function of hand-collected availability of Serbian radio in village

- % reporting reception of Serbian radio
- % reporting no reception of Serbian radio
- % who don't know if there is reception of Serbian radio
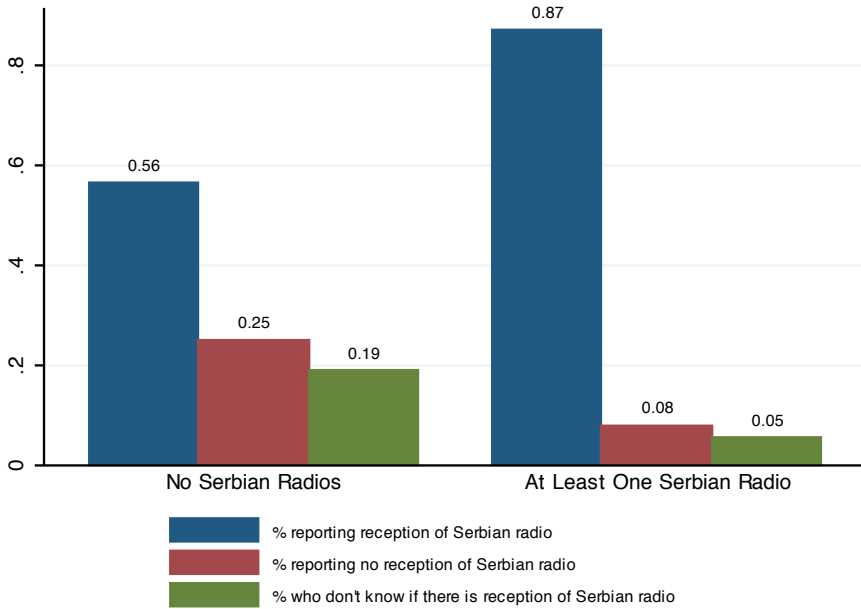
B) Reported frequency of listening to Serbian radio (survey response), as function of availability of Serbian radio in village

- % listening to Serbian radio at least once per week
- % listening to Serbian radio several times per month or rarely
- % who never listen to Serbian radio or don't know about radio reception
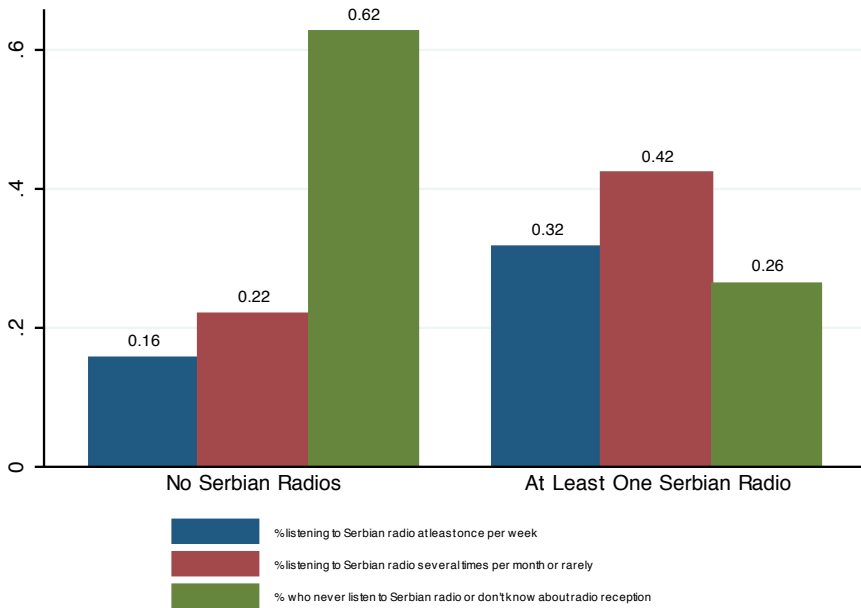
Notes: Figure 1 tabulates the responses to two questions of an in-person survey undertaken in Dec. 2010 and Jan. 2011 in 9 of the Croatian villages in the baseline sample. We report the average responses separately for the 32 respondents in villages which we code as not having reception of Serbian radio, and for the 38 respondents in villages which we code as having reception of at least one Serbian radio.

FIGURE 2 **REPORTED INCIDENCE OF LISTENING TO SERBIAN RADIO (FROM SURVEY RESPONSES) AS FUNCTION OF SIGNAL STRENGTH MEASURED FROM ITM IN VILLAGE**
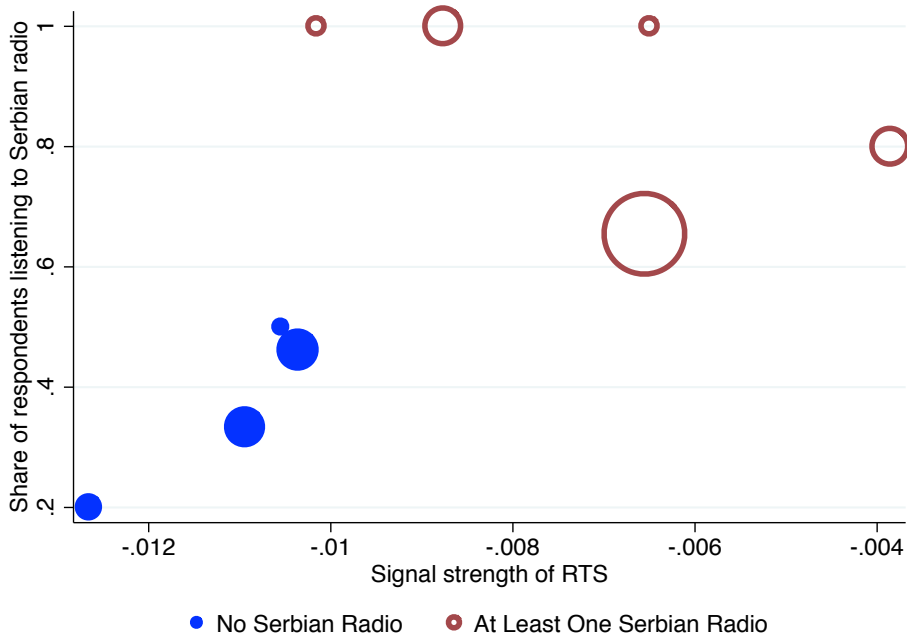

Notes: Figure 2 shows responses to a question on frequency of listening to Serbian radio in an in-person survey undertaken in Dec. 2010 and Jan. 2011 in 9 of the Croatian villages in the baseline sample. We report in solid circles the average responses for the 32 respondents in villages which we code as not having reception of Serbian radio, and with hollow circle for the 38 respondents in villages which we code as having reception of at least one Serbian radio. Size of the markers is proportional to the number of respondents in each village.

Does Serbian radio trigger ethnic animosity and nationalistic behaviour among Croats who are exposed to it? We estimate the effect of Serbian radio on the propensity to vote for extremist nationalist parties and expressions of ethnic hatred towards Serbians. Our identification strategy relies on variation in the availability of Serbian radio among different villages in the border region.

As the first measure, we use hand-collected data on the actual availability of Serbian radio in 139 villages in the region adjacent to the Serbian border (our baseline sample), measured using an ordinary receiver. As the second measure, we compute the signal strength of Serbian radio stations using information on Serbian transmitters and the topography of the region for all 417 villages in Croatia within 75 kilometres of the Croatian-Serbian border (our extended sample). Figure 3 presents the map of the region, the location of Croatian villages in both samples and the location of the two Serbian radio transmitters. The two measures of Serbian radio availability, which are positively correlated, are complementary: the hand-collected measure captures fine variation in

radio reception that the signal strength calculations do not, but is affected by unavoidable errors in hand measurement; the signal strength is available for a larger sample, but does not measure the impact of non-topographic obstacles such as forests.

FIGURE 3   MAP OF STUDY AREA
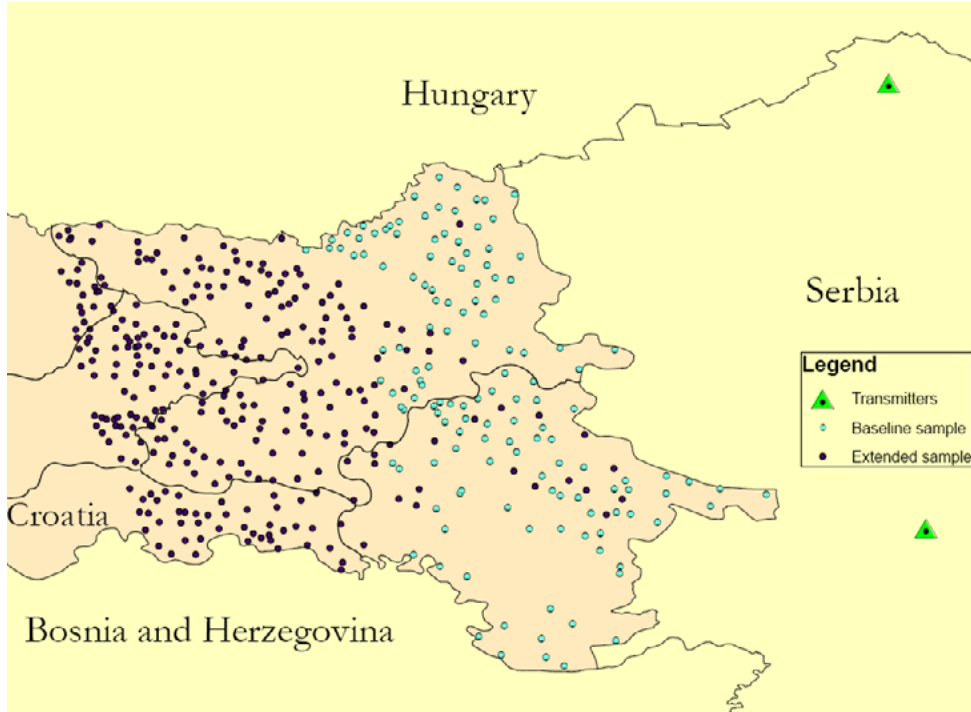
Note: Map shows the Serbian-Radio transmitter locations, the baseline sample of villages with hand-collected radio reception, and the extended sample of villages with radio signal predicted with Irregular Terrain Model

Next, we examine the effect of exposure to Serbian radio on voting outcomes in the border region. Our main electoral outcome is the village-level vote share of the ultra-nationalist political party, the Croatian Party of Rights (*Hrvatska stranka prava*, or HSP). This party is fairly popular in the border region with Serbia, receiving 8% of the total vote in the northern part of the border region and 5.2% in the southern part. As a result, it gained one seat in the Croatian parliament of 2007. This party is the main extreme nationalist party in Croatia with the ideology of supporting the 'Great Croatia'.[2] Despite the fact that HSP is a relatively small party, one should not underestimate its potential impact on policy. Even marginal political representation of small parties can have a large effect on policies, particularly in times of crisis (e.g. Folke 2011). In addition,

2 '*Velika Hrvatska*', or 'Great Croatia', is the ideology of modern Croatian ultra-nationalists, according to which Croatia should be only for Croats and its territory should unite all the lands that belonged to Croatia before the Ottoman invasions of the 15th, 16th and 17th centuries. These territories include parts of modern Serbia, Bosnia and Herzegovina and Montenegro (Vienna Profit, 3 August 1992, in FBIS Daily Report (Eastern Europe), 3 August 1992. pp, 26-7). In the 1990s, HSP created its own paramilitary unit that aimed to secure Croatian independence from Yugoslavia (UNCE 1994) and used symbols resembling those of the fascist state during World War II.

small extreme nationalistic parties could unexpectedly gain wide popularity in times of crisis, with potentially disastrous consequences (as in the case of the Nazis in the Weimar Republic).

In both the baseline and extended sample, the availability of Serbian (RTS) radio significantly increased the votes for the extremist nationalist HSP during the most recent parliamentary election in 2007. We illustrate this relationship in Figure 4, which presents the residual scatter plot of the variables of interest. The effect is larger where the radio signal is stronger and holds using both measures of radio availability. The estimates imply that a substantial part of the vote for ultra-nationalist parties in the border region of Croatia is explained by the reception of Serbian radio.

FIGURE 4   VOTE SHARE OF EXTREMELY NATIONALISTIC PARTIES AS FUNCTION OF SIGNAL STRENGTH OF SERBIAN RADIO (CONTROLS, BASELINE SAMPLE)

coef = 2.6781601, se = .63786342, t = 4.2
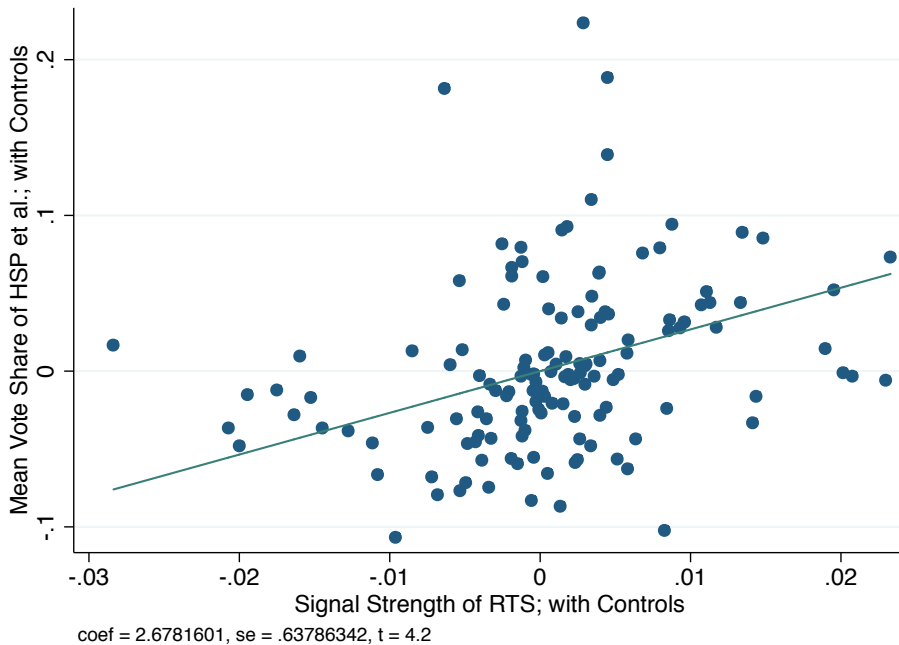
Notes: The figure shows share of votes for HSP et al. and predicted signal strength of Serbian radio after taking controls into account.

As the measures of availability of Serbian radio may correlate with other determinants of nationalistic voting and this correlation could generate spurious results, we conduct several tests that show that this is extremely unlikely. In particular, the hand-collected radio reception measure is orthogonal to a large set of observables, consistent with the variation being reasonably idiosyncratic. The predicted radio signal is correlated with variables such as distance from the border and the village population. However, we show that adding extra geographic and demographic controls generally makes the magnitude of the estimates *larger*. This suggests that the estimated impact of Serbian radio on

Croatian nationalism, if anything, is likely to be biased downward. In addition, we use reception of Hungarian radio and of two popular Croatian radio stations as controls and find that they do not affect our estimates, suggesting that the results are not due to differences between towns with generally better radio reception.

To quantify the effect of the media, we combine the voting results and the street survey results to compute a persuasion rate, i.e. the fraction of Croats who changed their voting behaviour in response to Serbian radio among those who were exposed (DellaVigna and Gentzkow 2010). The implied persuasion rate of 3–4% is at the lower end of the estimates of persuasion rates of media on their intended recipients. Yet, this is a sizeable effect given how extreme the outcome is.

Who are the people that get persuaded to vote for the Croatian ultra-nationalists because of exposure to nation-building Serbian radio? The effect on other voting outcomes sheds light on this question. The availability of Serbian radio has a negative effect on the vote share for the moderate nationalistic party, Croatian Democratic Community, and a positive effect on the vote share for the Social Democratic party (the main party without nationalistic ideology). An interpretation of this result is that exposure to Serbian radio made Croatian voters more nationalistic at the margin, shifting some voters from the moderate nationalist party to the extreme nationalist parties, while polarising the electorate, which leads to a higher vote share for the Social Democratic party.

As a measure of non-political expression of nationalistic sentiment, we consider the presence of hate-speech graffiti offensive to Serbs in the open spaces in the village. (Of the 139 villages we visited, 36 had ethnically offensive anti-Serb graffiti.) We find that in villages with Serbian radio, the probability of ethnically offensive graffiti in the streets is 35 to 40 percentage points larger, that is, about double the probability in the villages with no Serbian radio (a statistically significant difference). These results provide evidence that Serbian public radio increases expressions of Croatian nationalism beyond the voting booth.

To provide further evidence on the impact of radio exposure, we conducted a laboratory experiment. We asked 80 ethnic Croatian students at Vukovar University listen to different remixes of radio broadcasts and then asked them about their attitudes towards different ethnic groups and political parties. Students were randomly allocated into three groups: the control group listened to a remix of Croatian radios; the first treatment group listened to a remix of Croatian radios and Serbian nation-building public (RTS) radios; and the second treatment group listened to a remix of Croatian and Serbian private radio (B92), which has more neutral news-focused content. Compared to the control group, the two groups exposed to Serbian radio display significantly heightened animosity towards Serbs in attitude questions, and the increase is larger for the group exposed to the nation-building public RTS radio. We illustrate this result in Figure 5.

FIGURE 5   ATTITUDES TOWARD DIFFERENT ETHNIC GROUPS (LABORATORY EXPERIMENT)
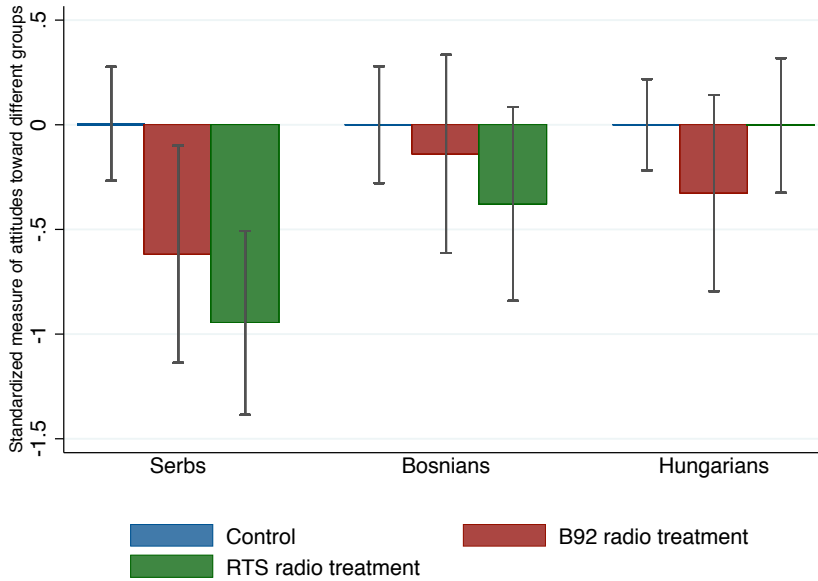
Notes: Difference for feeling towards Serbs between control and RTS treatment significant at 1% level, between control and B92 treatment at 5%. All other differences are not significant.

There is also weaker evidence that exposure to Serbian radio increased self-reported preference for nationalistic parties. As predicted, neither of the treatments changed subjects' attitudes towards other ethnic groups (i.e. Bosnians or Hungarians). Since subjects treated with Serbian nation-building public radio were more affected by the experiment than those treated with a more neutral Serbian station, we conclude that most of the estimated effect of Serbian public radio comes from reminding Croats specifically about *concurrent* Serbian nationalism rather than simply reminding them that their *former* enemy is just across the border.

CONCLUSION

Our results strongly suggest that Serbian public nation-building radio had an important unintended effect across the border resulting in a substantial increase in extremist nationalistic anti-Serbian sentiment among the Croatian population. As nation-building propaganda is often designed to foster a fresh start for a nation after a war, its effect on neighbouring nations should not be overlooked. The reason is that the nation-building efforts could backfire in the long run as they feed into persistent animosity between nations that were once caught in armed conflict.

REFERENCES

Allport, G W (1954), *The Nature of Prejudice*, Perseus Books.

Blouin, A and S W Mukand (2019), "Erasing ethnicity? Propaganda, nation building, and identity in Rwanda", *Journal of Political Economy* 127(3): 1008 –1062.

DellaVigna, S and M Gentzkow (2010), "Persuasion: Empirical Evidence", *Annual Review of Economics* 2: 643–669.

DellaVigna, S, R. Enikolopov, V Mironova, M Petrova and E Zhuravskaya (2014), "Cross-Border Media and Nationalism: Evidence from Serbian Radio in Croatia", *American Economic Journal: Applied Economics* 6(3): 103–132.

Durante, R and B Knight (2012), "Partisan Control, Media Bias, and Viewer Responses: Evidence from Berlusconi's Italy", *Journal of European Economic Association* 10(3): 451–81.

Esposito, E, T Rotesi, A Saia and M Thoenig (2021), "Reconciliation Narratives: The Birth of a Nation after the US Civil War", CEPR Discussion Paper 15938.

Folke, O (2014), "Shades of Brown and Green: Party Effects in Proportional Election Systems", *Journal of the European Economic Association* 12(5): 1361–1395.

Gentzkow, M and J M Shapiro (2011), "Ideological Segregation Online and Offline", *Quarterly Journal of Economics* 126(4): 1799–1839.

IREX – International Research & Exchanges Board (2010), "Media Sustainability Index 2010: Serbia".

Greenberg, R D (2004), *Language and Identity in the Balkans*, Oxford University Press.

Sunstein, C R (2001), *Republic.com*, Princeton University Press.

UNCE – United Nations Commission of Experts (1994), "Final report of the United Nations Commission of Experts established pursuant to security council resolution 780 (Annex III. A Special forces)", December.

ABOUT THE AUTHORS

Stefano DellaVigna (2002 Ph.D., Harvard) is the Daniel Koshland, Sr. Distinguished Professor of Economics and Professor of Business Administration at the University of California, Berkeley. He is a Fellow of the American Academy of Arts and Sciences and of the Econometric Society, an Alfred P. Sloan Fellow (2008-10), and a Distinguished Teaching Award winner (2008). He specializes in behavioural economics and has published in international journals such as the *American Economic Review*, the *Journal of Political Economy*, and the *Quarterly Journal of Economics*. He has been a co-editor of the *American Economic Review*, one of the leading journals in economics, since 2017.

His recent work has focused on (i) the ability of experts to forecast research results, (ii) the analysis of gender differences in editorial choices and academic honors, and (iii) the impact of nudges and bottlenecks in behavioural policy experiments.

Ruben Enikolopov is an ICREA Research Professor at UPF and Barcelona Institute of Political Economy and Governance and a Visiting Professor at the New Economic School. He is also a Research Fellow CPER and a Research Affiliate at the IGC. His research interests include political economy, economics of mass media, and development economics, with special focus on political effects of social media. He has published in *American Economic Review, Quarterly Journal of Economics, Review of Economic Studies, Econometrica, Proceedings of National Academy of Science*, etc. He is a Co-Editor of the *Journal of Comparative Economics* and a member of the Editorial Boards of the *Review of Economic Studies* and *Journal of European Economic Association*.

Vera Mironova, PhD, is an Associate Fellow at Harvard University and is famous for her extensive in-depth ethnographic fieldwork with armed groups in active conflict zones, terrorist sleeping cells, and criminal organisations. She conducted fieldwork in numerous active conflict zones and post-conflict regions all over the world including in Syria, Iraq, Sudan, DRC Congo, and Azerbaijan. From 2016 to 2017, she was embedded with Iraqi Special Operations Forces during the Mosul Operation and before that, with ultra-right Ukrainian armed groups in Donbas. And since 2018 she conducted extensive interviews with members of criminal organizations in former Soviet Union. She is an author of the award-winning book *From Freedom Fighters to Jihadists. Human Resources of Non-State Armed Groups* (Oxford 2019).

Maria Petrova is an ICREA Research Professor at the Universitat Pompeu Fabra, Researcher at the Barcelona Institute for Political Economy and Governance (IPEG), and an Affiliate Professor at Barcelona School of Economics. She is also a Research Fellow at CEPR. From 2008-2022 she was an Assistant/Associate Professor at the New Economic School, and she spent 2012-2013 as a Visiting Associate Research Scholar at the Center for the Study of Democratic Politics at Princeton University. She is a Co-Editor of the *Journal of Public Economics* and a member of the Board of Directors of the *Review of Economic Studies*. She was recently awarded a European Research Council Starting Grant for a five-year project EXTREME ("The Rise and Fall of Populism and Extremism") for 2019-2024. She received her PhD from Harvard University in 2008.

Ekaterina Zhuravskaya is a Professor of Economics at the Paris School of Economics (EHESS), which she joined in 2010. She is a Research Fellow of CEPR in Political Economy and Development Economics programs. She got her PhD at Harvard University in 1999 and spent 10 subsequent years working as Professor at the New Economic School and as the Academic Director of the Center for Economic and Financial Research in Moscow. Her main academic interests are in political economy, with applications to media, economic history, and institutions. She is the recipient of the Birgit Grodahl Award and CNSR Silver Medal. She also was elected a Fellow of the Econometric Society.

CHAPTER 18

Charismatic leaders and nation-building: The case of Mustafa Kemal 'Atatürk'

Lydia Assouad
London School of Economics

INTRODUCTION

Can leaders contribute to nation building, beyond policy choices? The idea that individual leaders are able to shape the future of their nations is a long-lasting hypothesis in social sciences. One can track it back to Thomas Carlyle's 'great man theory', according to which "the history of the world is but the biography of great men" (Carlyle 1841), or to Max Weber's more nuanced argument according to which some 'charismatic' leaders are able to rally people around a common vision and legitimise new political orders (Weber 1947). The economics literature takes this hypothesis seriously: the ability of individual leaders to shape identity, coordinate groups or persuade and organise followers motivates a large theoretical literature (Hermalin 1998, Acemoglu and Jackson 2015, Akerlof and Holden 2016, Verdier and Zenou 2018). While it is easy to find historical examples of individuals who created political movements aimed at national transformation for good or ill,[1] we still have little empirical evidence on how they had an impact, beyond invoking their 'charisma' to explain their success *ex post*.

This chapter summarises the main findings of my paper (Assouad 2021), in which I study the activities and legacy of one historical leader, Mustafa Kemal Atatürk, the founder of modern Turkey. The Turkish context constitutes the perfect historical set up to understand

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1   Examples include Alexander the Great, George Washington, Napoleon, Sukarno, Lenin, and Mao.

how leaders can nation-build. After the defeat of the Ottoman Empire during World War I, Atatürk led a group of Ottoman soldiers, secured the Turkish territory against European invasion and created the Turkish nation state in 1923. Atatürk then designed and led the Turkish nation-building reforms, and is therefore viewed as an archetypical example of a 'charismatic leader', whose biography is often confounded with Turkey's modern history (Heper 1980, Ibrahim and Wunsch 2012, Zürcher 2012). Concretely, his government implemented classic nation-building policies in an authoritarian manner, to promote a common national identity built around Turkish ethnicity. The government centralised the educational system and imposed a new and unique national curriculum, built railroads to homogenise the new territory and created a common national language.

Beyond designing the reforms, Atatürk took a personal role in rallying citizens around his programme and visited a quarter of all Turkish cities, which makes the setting particularly well suited to study his impact.

SETTING: THE TURKISH LANGUAGE REFORM AND ATATÜRK'S MASSIVE CAMPAIGN EFFORT

I focus on one nation-building policy, the language reform, to analyse Atatürk's role. The language reform was a pillar of Atatürk's cultural revolution, and one of his main legacies. Atatürk wanted to create a Turkish language, common across regions, religions, ethnicities and classes, in order to foster a common national identity (Türköz 2018). The reform, officially implemented in 1934, consisted in 'purifying' the Ottoman vocabulary, by removing words of foreign origin (Arabic, Farsi etc.) and replacing them with words in 'Pure Turkish', either invented or found in Turkish oral tradition and folklore (Lewis 1999, Caymaz and Szurek 2007, Aytürk 2008, Türköz 2018). As a result, a large number of booklets and dictionaries listing old Ottoman words and their synonyms in the new language were published (Türköz 2018).

In order to explain the ongoing nation-building policies, including the language reform, Atatürk visited more than 167 cities between 1923 and 1938. This massive campaign effort earned him the additional nicknames of 'first teacher' and 'name-giver'.[2] Figure 1 shows photographs taken during his visits.

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2   As described in Türköz (2018: 85), this nickname of 'name-giver' "begins with the performative act of naming of the new regime as Cumhuriyet (Republic). He then gives the surname Inönü to Ismet Pasa, for his bravery in the Inönü Battlefield during the Independence War". He also renamed geographic places and infrastructures during his visits, and advised people he met to give their children Pure Turkish names.

FIGURE 1   PHOTOGRAPHS TAKEN DURING THE VISITS OF ATATÜRK, THE 'NAME GIVER' AND 'FIRST TEACHER'
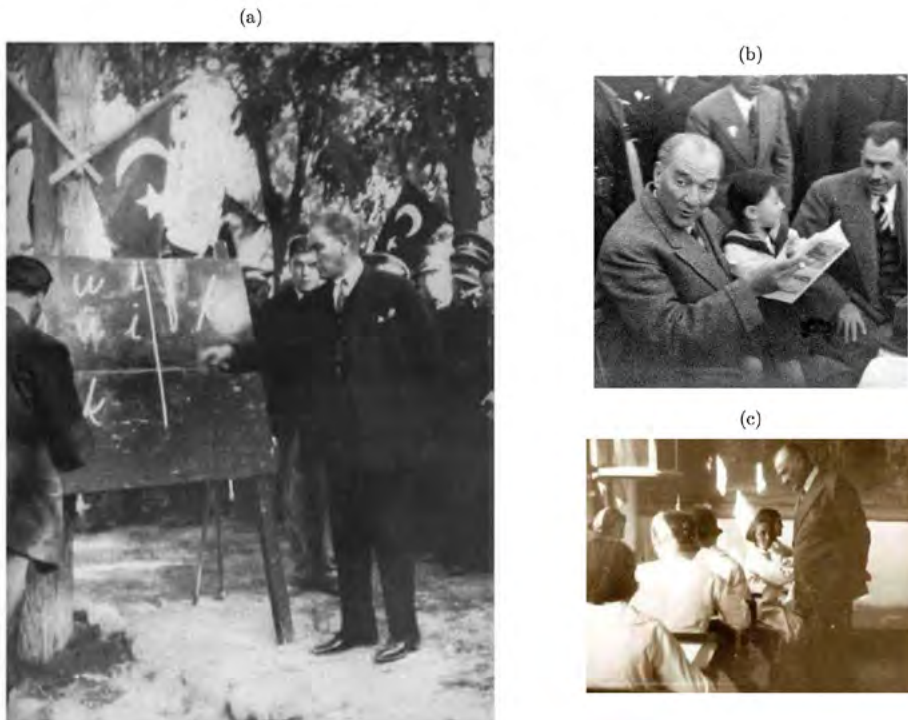
Source: Assouad (2021)

I assemble a novel and detailed historical database with information on the locations and dates of all Atatürk's visits. Figure 2 displays a map of the visited districts, as well as the timings. To estimate the impact of these propaganda visits on the diffusion of the new language locally, I collected and digitised all historical booklets and newspapers published in the 1930s to disseminate the new words. Figure 3 displays examples of these sources, which allowed me to create a comprehensive list of the new 'Pure Turkish' words. Finally, I also collected a unique historical source: the universe of birth certificates of Turkish citizens born between 1920 and 1950, with information on their first names and places of birth. As first names in Turkey are common nouns, I am able to identify first names in the new language. I use the share of newborns with a Pure Turkish name in a given district and year to proxy the successful diffusion of the central state national identity in the periphery.

FIGURE 2   NUMBER OF DISTRICTS VISITED BY ATATÜRK AND TIMING OF THE VISITS

Note: Districts in blue are visited by Atatürk and districts in white are not. Districts in light blue were visited first, starting in 1923. Darker shades indicate districts visited later on, until 1938.

Source: Assouad (2021).

FIGURE 3   EXAMPLE OF SOURCES USED TO CREATE THE LIST OF 'PURE TURKISH' WORDS

Note: Figures (a) and (b) display pages of a booklet published by Vural and Figure (c) is an excerpt of the newspaper *Ulus*.

Source: Assouad (2021).

To estimate the causal impact of Atatürk's visits on the diffusion of the new language locally, I compare visited and non-visited districts before and after Atatürk's first visits, controlling for a large number of variables. I additionally leverage the large amount of information available on the scheduling of his visits, which allows me to identify targeted districts (that is, all the origin and destination points he planned to visit). I restrict my analysis to districts that were visited due to their lying along the road of an itinerary (the treatment group). The control group is made up of nearby districts, crossed by the itinerary but not visited. As shown in Figure 4, visited and non-visited districts in the restricted sample appear to be very similar across a large set of historical and geographic covariates, and constitute a plausible comparison group to districts visited on Atatürk's way.

FIGURE 4   BALANCE PLOT BETWEEN VISITED AND NON-VISITED DISTRICTS
(RESTRICTED SAMPLE)
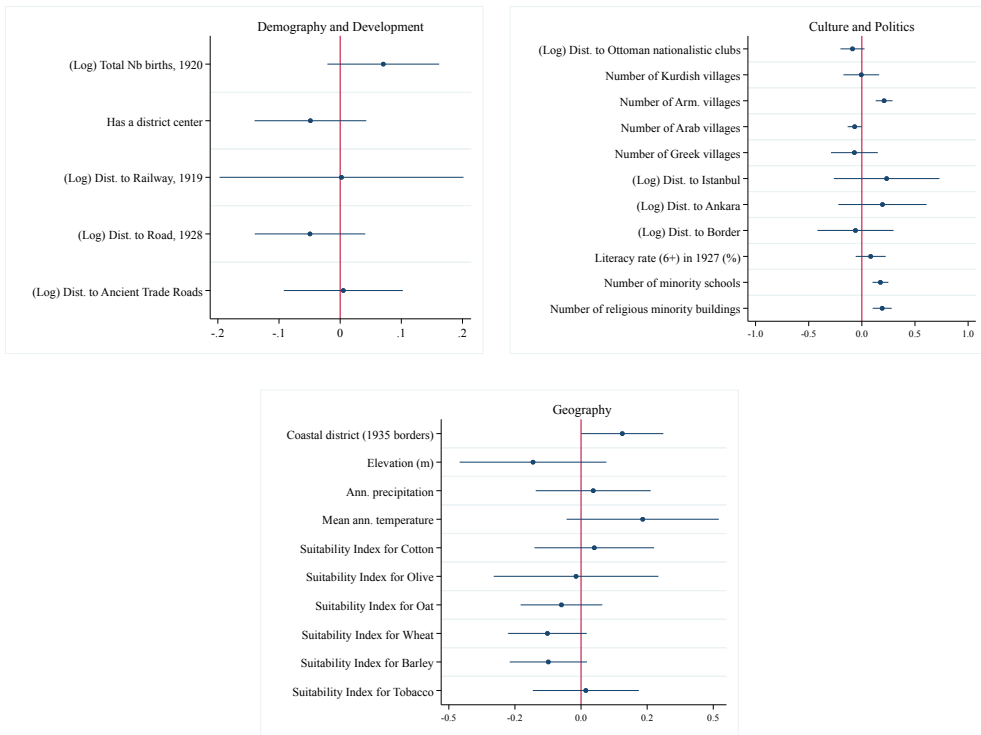
Source: Assouad (2021).

MAIN RESULTS: ATATÜRK'S VISITS INCREASED THE SHARE OF PURE TURKISH FIRST NAMES

I find that Atatürk's visits caused an increase of 7% in the use of first names in 'Pure Turkish', the new language introduced by the state as part of its homogenisation endeavour. Following the visits, the share of 'Pure Turkish' names in visited districts increases significantly relative to the share in control districts, as shown in Figure 5. The effect persists and its magnitude grows over time, reaching 1.5 percentage points after 15 years, which represents a medium-run increase of over 20%. The effect then decreases and disappears after 25 years. This result is robust across a wide range of specifications.[3]

FIGURE 5   IMPACT OF ATATÜRK'S VISITS ON USE OF 'PURE TURKISH' FIRST NAMES
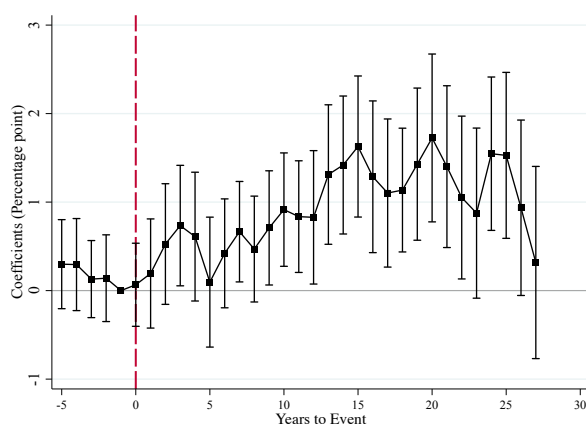
Source: Assouad (2021).

POSSIBLE MECHANISMS: RALLYING THE CROWD OR TOP-DOWN ELITE PERSUASION?

This finding raises a theoretical question. Did Atatürk shape identity by mobilising the masses (depictions of charismatic leaders often emphasise such a channel)? Or did Atatürk's effect work in a top-down manner, by persuading influential elites?

I find that the top-down mechanism seems to have been predominant. Atatürk's impact was larger in localities with higher literacy rates, as shown in Figure 6a. It was also larger in districts with more pre-existing nationalistic associations, founded under the

3   The estimated effect is robust to using the full sample (including the end point and targeted districts) and to using a sample including only districts on the railway; it is also robust to not including control variables, and to excluding children with fathers who were not born in the same districts (which might possibly have migrant parents who selected into the visited districts).

Ottomans by a modernising, educated elite (Figure 6b). This top-down mechanism is consistent with other studies which have shown that social capital can foster the rise and diffusion of an ideology (Satyanath et al. 2017).

FIGURE 6   HETEROGENEOUS IMPACT OF ATATÜRK'S VISITS ON THE SHARE OF PURE TURKISH NAMES

a) By literacy rate
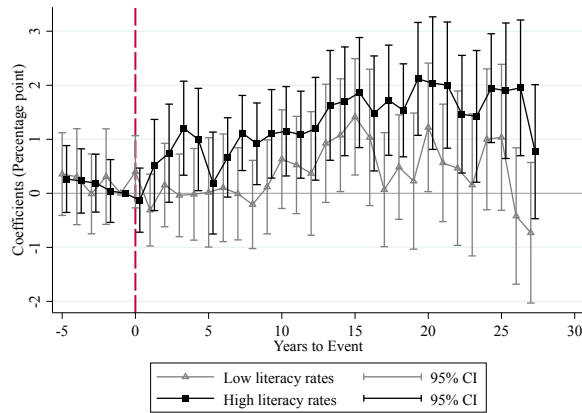
b) By distance to former Ottoman nationalistic clubs
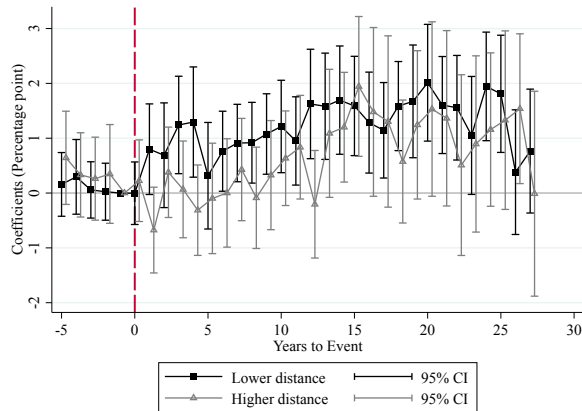
Source: Assouad (2021).

I also study the heterogeneity of the effect depending on the activities Atatürk conducted locally. I find that the effect is stronger in places where Atatürk met with local elites than where he held mass rallies, suggesting co-optation of the elite is a key driver of the effect (Figure 7). This finding is in line with a large historical literature that concludes that Atatürk's nation-building programme was mostly successful among an urbanised and educated upper and middle class, but did not reach the masses and the countryside, where 80% of the population lived (Tuna 2018).

FIGURE 7   HETEROGENEITY ANALYSIS, DEPENDING ON WHETHER OR NOT ATATÜRK MET WITH LOCAL ELITES
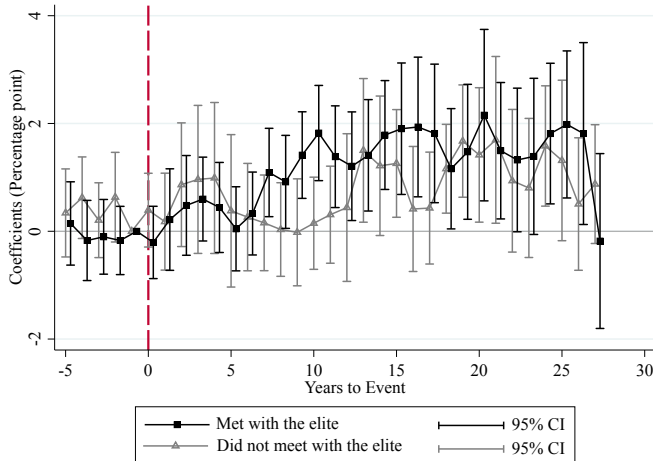
Source: Assouad (2021).

The role of the persuaded elite can also be seen in the institutions they support locally. Atatürk's visits led to the formation of branches of Atatürk's party (the Republican People's Party, or CHP) known as 'People's Houses' (*Halk Evleri*). These were community centres opened and operated by the CHP between 1932 and 1944, with the duty to "propagate the regime's ideology and policies to the population through the circulation, application and enactment of a variety of discourses and activities" (Lamprou 2015: 19). To understand whether the visits laid the seeds for institutional changes locally, I collect new data on the locations and dates of creation of the Houses. I find that the visits are strong predictors of the opening of a People's House.

Moreover, using the staggered establishment of the Houses and comparing localities before and after a House was established, I show that they also have a positive effect on the diffusion of 'Pure Turkish' names (Figure 8a). The effect is driven by places that had already been visited by Atatürk (Figure 8b). The Houses therefore appear to serve as a complement to the leader's individual actions. This is consistent with the dynamics of the main effect, shown in Figure 5, and with the fact that Atatürk's effect is significant only after a few years and is strongest after ten years. Rather than the visits themselves, it is the infrastructure and institution building they trigger that explain the diffusion of 'Pure Turkish' names, which relativises the 'great man' view.

FIGURE 8   IMPACT OF THE OPENING OF A PEOPLE'S HOUSE ON PURE TURKISH FIRST NAMES AND HETEROGENEITY DEPENDING ON THE VISIT STATUS

a) Effect of the Houses on Pure Turkish names
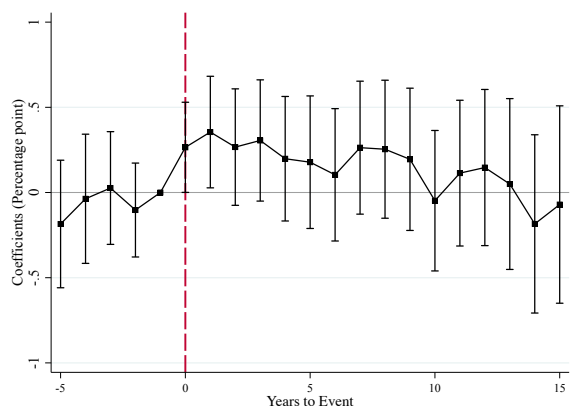
b) Effect of the Houses on Pure Turkish names: Heterogeneity by visit status
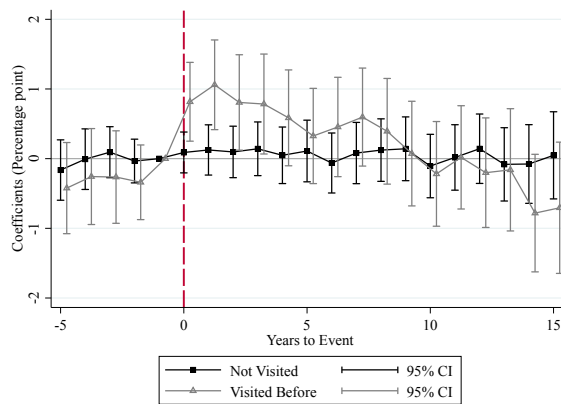
Source: Assouad (2021).

Finally, it is important to emphasise that the spread of Pure Turkish first names does not necessarily equate to the spread of the new Turkish national identity. Given the authoritarian and repressive nature of the regime, especially toward ethno-religious minorities, the adoption a 'Pure Turkish' name can be interpreted in three different ways (Kuran 1995). Giving a 'Pure Turkish' first name could be a sign of sincere adherence to the reform programme and to the new identity. Or it could be a sign of believing that the regime is well-entrenched and will last – naming your child with a 'Pure Turkish' name could therefore be opportunistic (to access new career opportunities, for example). Finally, it could be the result of fear and forced assimilation, especially among non-Turkish minorities urged to 'Turkify' their culture. The fact that localities with former nationalistic associations and higher literacy rates drive the main effect suggest that sincere adherence and opportunism from the elite explains the effect. I also find that

Kurdish areas, where the largest minority group lived, adopt more the new names in the short run, suggesting that fear of repression and forced assimilation also explain the results. The diffusion of 'Pure Turkish' first names locally should therefore be interpreted as the sign of a successful penetration of the central state into the periphery.

CONCLUSION

In this chapter, I provide empirical evidence on the ability of an individual leader to affect nation building, and identify elite persuasion and the institutional development it induced as the key mechanisms. These findings add to our understanding of what makes charismatic leaders – past and present – persuasive, in particular in respect to fostering nation building. Traditional depictions of charismatic leaders emphasise their ability to appeal to the masses, to lead by example and to build 'imagined communities' of nations during emotionally charged mass rallies (Anderson 1983). I find that in the case of Atatürk, the effect is not due to his visits to cities around the country per se but to what the visits induced – local institutional change and the creation of a class of supportive elite, which was enough to legitimise the new nation.

REFERENCES

Acemoglu, D and M Jackson (2015), "History, Expectations, and Leadership in the Evolution of Social Norms", *Review of Economic Studies* 82(2): 423–456.

Akerlof, R and R Holden (2016), "Movers and Shakers", *The Quarterly Journal of Economics* 131(4): 1849–1874.

Anderson, B (1983), *Imagined Communities: Reflections on the Origin and Spread of Nationalism*, Verso.

Assouad, L (2021), "Charismatic leaders and nation-building", working paper.

Aytürk, I (2008), "The First Episode of Language Reform in Republican Turkey: The Language Council from 1926 to 1931", *Journal of the Royal Asiatic Society* 18(3): 275–293.

Carlyle, T (1841), "The Hero as Divinity", in *On Heroes, Hero-Worship & the Heroic in History*, James Fraser.

Caymaz, B and E Szurek (2007), "La révolution au pied de la lettre. L'invention de 'l'Alphabet turc' [The revolution at face value. The invention of the 'Turkish alphabet']", *European Journal of Turkish studies* 6(6).

Heper, M (1980), "Transformation of Charisma into a Political Paradigm: 'Atatürkism' in Turkey", *Journal of the American Institute for the Study of Middle Eastern Civilization* 1: 65–82.

Hermalin, B E (1998), "Toward an Economic Theory of Leadership: Leading by Example", *The American Economic Review* 88(5): 1188–1206

Ibrahim, V and M Wunsch (2012), *Political Leadership, Nations and Charisma*, Routledge.

Kuran, T (1995), *Private truths, public lies: the social consequences of preference falsification*, Harvard University Press.

Lamprou, A (2015), *Nation-Building in Modern Turkey: The "People's Houses", the State and the Citizen*, I B Tauris.

Lewis, G (1999), *The Turkish language reform, a catastrophic success*, Oxford University Press.

Satyanath, S, N Voigtländer and H-J Voth (2017), "Bowling for Fascism: Social Capital and the Rise of the Nazi Party", *Journal of Political Economy* 125(2): 478–526.

Tuna, M (2018), "The Missing Turkish Revolution: Comparing Village-level Change and Continuity in Republic Turkey and Soviet Central Asia, 1920-50", *International Journal of Middle East Studies* 50(1): 23–43.

Türköz, M (2018), *Naming and Nation-building in Turkey: The 1934 Surname Law*, Palgrave Macmillan.

Verdier, T and Y Zénou (2018), "Cultural Leader and the Dynamics of Assimilation", *Journal of Economic Theory* 175(C): 374–414.

Weber, M (1947), "The Nature of Charismatic Authority and its Routinization", in *Theory of Social and Economic Organization*, translated by A R Anderson and T Parsons.

Zürcher, E J (2012), "In the Name of the Father, the Teacher and the Hero: the Ataturk personality cult in Turkey", in V Ibrahim and M Wunsch (eds), *Political Leadership, Nations and Charisma*, Routledge.

ABOUT THE AUTHOR

Lydia Assouad is an Assistant Professor at the London School of Economics, International Development Department and a research affiliate at the World Inequality Lab. Her research lies at the intersection of political economy, development economics and economic history, with a particular focus on the Middle East. She is interested in studying the determinants of social cohesion in societies divided along major ethno-religious, political or economic lines. In a first research agenda, she analyses the dynamics of income and wealth inequality in the region. Her second research agenda explores the consequences of nation-building policies. Her work has appeared in the *Washington Post*, the *New York Times, Al Jazeera, Le Monde*, and *Quartz*. She also worked as a

researcher at the Carnegie Endowment for International Peace (Middle East program) in 2019-2020. She holds a PhD and an MA from the Paris School of Economics and a BA from Ecole Normale Supérieure and Sorbonne University in France.

CHAPTER 19

The influence of heroic networks: French collaboration with the Nazis

Julia Cagé,[ad] **Pauline Grosjean**[bd] **and Saumitra Jha**[c]
[a]Sciences Po; [b]UNSW Sydney; [c]Stanford University; [d]CEPR

> *If the gravediggers that belong to the Republic do not understand that their duty is to disappear, to be forgotten and to give way to the young and true workers of greatest France, we will... put violence at the service of Justice. We will set up the guillotines in the four corners of Paris and we will cut off heads. And we will be careful not to show them to the people, because they are not worth it.'*
>
> Marcel Bucard, Verdun veteran, war hero honoured for valour by Philippe Pétain in 1917 and founder of the 'blue-shirt' Francisme party, writing in his journal in January 1934[1]

In their thousands, right-wing groups marched towards the legislative chamber to pressure the representatives gathered within. They marched under many different insignia and banners, including far-right, avowedly racist organisations (e.g. Millington 2012). Some believed reports spread through right-wing media of a deep state conspiracy, others sought to show strength that would lead to the fall of the left-wing government that was about to be seated. What gave the demonstration a deeper potential for escalation still was the presence of members of well-organised veterans groups. These veterans included decorated heroes who had sacrificed much in service to their country. But what of their commitment to democratic processes and values when on the losing side of an election?

1　Quoted in Deniel (1979: 81).

There are obvious parallels between this description and the insurrection in Washington, DC on 6 January 2021. But on 6 February 1934, the French police response to the riot just across the Seine from the Chamber of Deputies was more aggressive than that of the US Capitol Police. The police opened fire. Fourteen demonstrators were killed and 236 wounded. The left viewed the events as an attempted coup, the right as a symbol of government oppression that had created martyrs to freedom. Thus began a 'civil war' in France that would severely weaken the country in face of the looming crises to come (Jackson 2001). So much so, that six years later one of the world's most long-lived democracies would commit suicide – its representatives voting away their own power to a dictatorship headed by '*Le Maréchal*', Philippe Pétain. A hero credited with saving France at the iconic Battle of Verdun in World War I, Pétain would head the authoritarian, racist Vichy regime that would collaborate with Nazi Germany until France's Liberation in 1944.

France's crushing military defeat in 1940 was only part of the story. It was arguably in part a symptom of an underlying process that had led to an undermining of democratic values. Unlike other democratic states that had fallen that year to the Nazis, France's elected representatives in 1940 chose not to set up a legitimate government in exile. Instead, many appeared convinced that dictatorship was a necessary price to pay to facilitate a 'national renewal' of France.

A growing body of research points out how the failure of young democracies, such as that of 1930s Germany, often occurs when institutional gatekeepers allow would-be authoritarians to legally assume power in the name of short-term opportunism (e.g. Levitsky and Ziblatt 2018). However, democracies do tend to become more resilient as they survive. Some researchers emphasise the key role of the diffusion of democratic values among citizens in this resilience (Besley and Persson 2019, Acemoglu et al. 2021). But much less is known about how support for democratic values erodes, even in previously durable democracies. We argue that to help prevent the erosion of democratic values and to reduce political polarisation, a key dimension to understand is the importance of the embeddedness in social and economic networks of individuals with the potential for political influence.[2] And, throughout history, a common environment where such networks may emerge is through shared military heroism.

In Cagé et al. (2022),[3] we exploit a natural experiment that created an exogenous network of politically influential individuals in France – a hierarchical network of war heroes generated through the systematic 'millwheel' rotation of French regiments through the direct command of Pétain during the iconic World War I Battle of Verdun in 1916. We wed this to data on more than 95,000 individual extreme right-wing supporters and collaborators assembled by Free French army intelligence during the Pétain-led Vichy

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2   This chapter builds upon and incorporates some verbatim sections (included with permission) from an earlier Vox column (Cagé et al. 2021).
3   The paper was awarded the Oliver E. Williamson Best Conference Paper in 2020 by the Society for Institutional and Organizational Economics (SIOE).

regime (1940–44). We augment these with data collected by American intelligence on leading Vichy figures in 1944, data on individual French volunteers seeking to serve alongside the German Wehrmacht on the Eastern Front, data on participation in the French Resistance, and hand-collected administrative data on pre-war and inter-war voting in each of France's 34,947 municipalities.[4]

AN EXOGENOUS NETWORK OF HEROES: THE ROTATION OF REGIMENTS AT THE BATTLE OF VERDUN

The Battle of Verdun, the longest battle of world history, became the symbol of French fortitude and willingness to resist (Jackson 2001). A total of 305,440 soldiers on both sides were killed, almost a death a minute between February and December 1916.[5] The profound significance of the simple phrase "*J'ai fait Verdun*" ("I did Verdun"), adopted broadly among its veterans, was understood throughout the country (Ousby 2002).

After a secret build-up, the German offensive at Verdun took the French high command by surprise, leading to the sacking of four generals in five days. A 'snap decision', 'hastily made' was made to put Philippe Pétain in command (e.g. Horne 1962: 129, Ousby 2002: 98). At the start of World War I, Pétain was a 58 year-old colonel on the verge of retirement after an undistinguished career. He was assigned to Verdun only because he happened to be available at the time. Assigned command over an arbitrary rotation of regiments drawn from across France (see Figure 1), Pétain strengthened the logistics and slowed the German advance before he was promoted away from direct command in May 1916.[6] By the time the battle was declared over, 88.7% of France's 34,947 municipalities had raised a regiment rotated through Verdun, with 50.1% having served under Pétain's direct command (which we later refer to as 'Verdun under Pétain' municipalities). Pétain himself was already being fêted as the Hero of Verdun, and was later made Marshal of France.

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4   Some important features of the file are summarised in Lormier (2017). Since the file, while declassified, has not been made public, we are grateful to Dominique Lormier for allowing us access to the original documents.
5   These figures can be compared to the 405,399 military deaths the United States suffered during the entire World War II, and the 22,654 soldiers killed on both sides in the bloodiest battle in US history, Antietam.
6   The interchangeability of line regiments was a common feature in other militaries as well, including the British army (Jha and Wilkinson 2012).

NATION BUILDING: BIG LESSONS FROM SUCCESSES AND FAILURES

FIGURE 1   ROTATION OF REGIMENTS THROUGH VERDUN, BY MONTH, FEBRUARY TO DECEMBER 1916
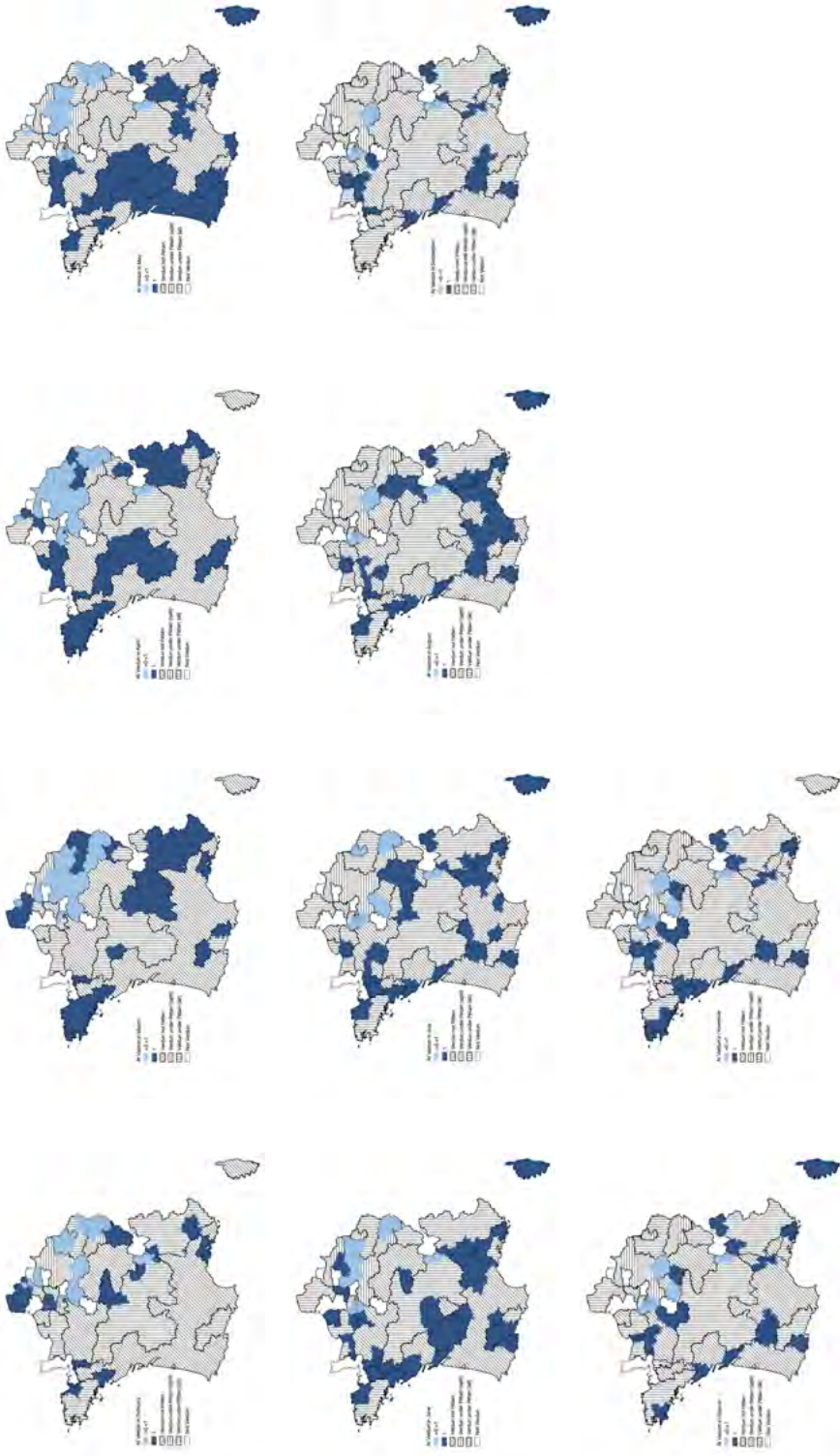
Notes: From the top left (February) to the bottom right (December), different regiments were dispatched to the Battle of Verdun. Pétain commanded between February and May 1st. The figure display where all (dark blue), some (light blue) or none of the line regiments that had originally been drawn from each municipality in 1914 were rotated through Verdun each month.

Source: Cagé et al. (2022).

SUPPORT FOR NAZI COLLABORATION AND EXTREME RIGHT PARTIES IN THE INTER-WAR PERIOD

In the hope that he would once more rescue France from Germany, Pétain was called to head France after her crushing defeat in World War II. On 10 July 1940, the two legislative chambers granted the Cabinet the authority to draw a new constitution (Lacroix et al. 2019). Soon, Pétain assumed plenipotentiary powers as Head of State. Upon gaining power, Pétain's regime rapidly dismantled liberal institutions and adopted an authoritarian course. In October 1940, Pétain's collaboration took an overt turn, when a photograph of him shaking hands with Hitler was widely publicised. The regime rapidly took on an extreme right-wing and racist agenda, which became even more repressive after the full military occupation of France by Germany in November 1942, when the Vichy regime sponsored the *Milice* ('militia') to hunt down and kill the French Resistance.

Figure 2 maps the distribution of collaborators recorded in the declassified file to their home municipality in 1945, overlaid with their regimental combat experience in World War I. While there is significant regional variation in the shares of collaborators, these shares are disproportionately higher in 'Verdun under Pétain' municipalities. These raw differences are robust in a regression framework: we show that exposure to 'Verdun under Pétain' significantly increases collaboration rates by 7.4 % compared to otherwise similar municipalities within the same department. These effects appear across the spectrum of collaboration, from joining extreme right-wing organisations and deep economic collaboration to volunteering for Vichy paramilitaries that hunted Jews and the Resistance, and even for the Waffen SS heading to the Eastern Front in 1944, when it was already clear that the Nazis would lose the war. 'Verdun-under Pétain' municipalities were also 8.45% *less* likely to raise civilian members of the French resistance (Figure 3).[7]

Why did some of France's greatest heroes become some of their gravest villains? We hand-collected administrative voting data to show that these extreme acts had their genesis in increasingly pronounced political choices that emerged in the post-World War I period and mimicked Pétain's own views. Widely known as an anti-communist, and with increasingly authoritarian sympathies, Pétain's speeches, which initially focused on veterans' groups, took a more overt political tone during the elections in 1936.

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7   See our companion paper, Cagé et al. (in progress).

FIGURE 2   QUINTILES OF THE DISTRIBUTION OF NAZI COLLABORATORS PER CAPITA OVERLAID WITH ROTATION AT VERDUN
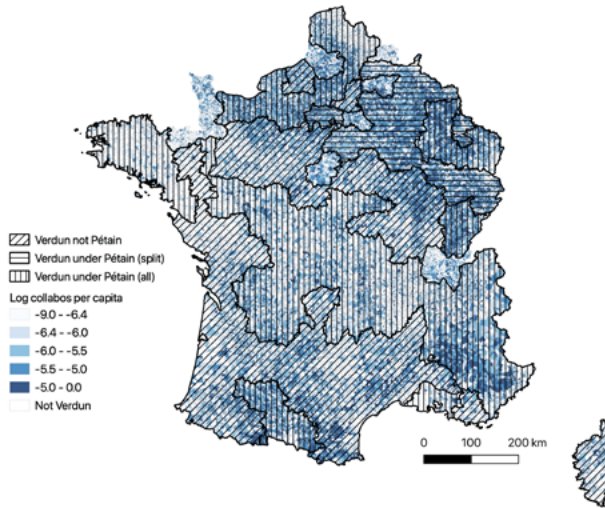
Notes: The map shows quintiles of the distribution of the logarithm of collaborators per capita across municipalities in 1944/1945, overlaid with the assignment of line regiments raised in a municipality to the Battle of Verdun under the generalship of Philippe Pétain. This map shows information for 85,389 collaborators in the 34,947 municipalities within France's 1914 borders.

Source: Cagé et al. (2022).

FIGURE 3   QUINTILES OF THE DISTRIBUTION OF MEMBERS OF THE FRENCH RESISTANCE PER CAPITA OVERLAID WITH ROTATION AT VERDUN
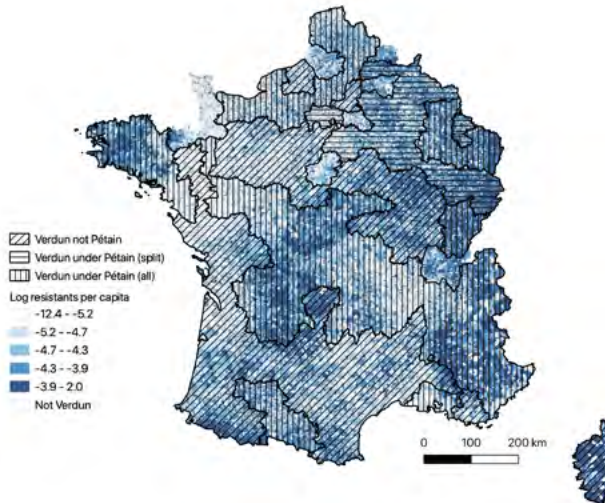
Notes: The map shows quintiles of the distribution of the logarithm of resistants per capita across municipalities in 1944/1945, overlaid with the assignment of line regiments raised in a municipality to the Battle of Verdun under the generalship of Philippe Pétain. This map shows information for 85,389 collaborators in the 34,947 municipalities within France's 1914 borders.

Source: Cagé et al. (2022).

We show that municipalities that served under Pétain at Verdun, although politically similar to other municipalities in 1914 (Figure 4a), begin to diverge after World War I, well before Pétain's ascent to power. And they do so in a manner that mimics Pétain's own views: initially anti-communist, and thereafter increasingly supportive of the right. Further, as extreme-right fascist parties emerged in the deeply polarised 1930s, these would also find more fertile ground in these very places. Founded by Marcel Bucard, a Verdun veteran and war hero honoured for his bravery by Pétain himself, the 'blue-shirts' of the Francisme party garnered a 2.6% higher vote share in the first round of the 1936 elections in 'Verdun under Pétain' municipalities relative to others in the same department (Figure 4b).

FIGURE 4   THE VOTE SHARE FOR THE RIGHT IN FIRST ROUND OF THE FRENCH LEGISLATIVE ELECTIONS, 1914 AND 1936 IN THE HOME MUNICIPALITIES OF LINE REGIMENTS ASSIGNED TO PÉTAIN AT VERDUN
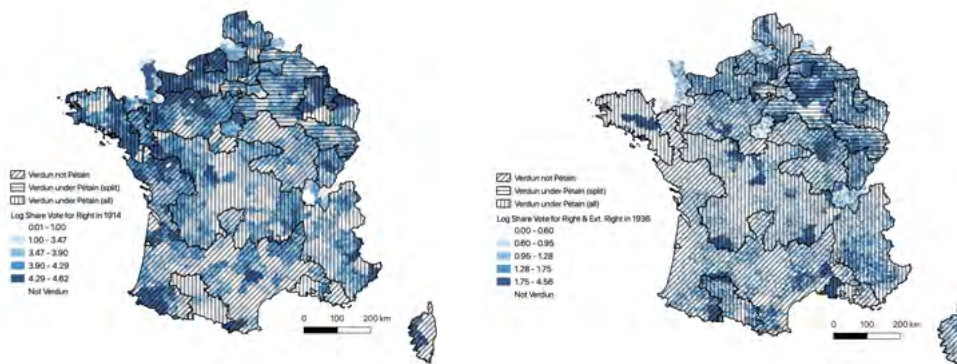
Notes: The map shows quintiles of the distribution of the (logarithm of the) vote share for the right in 1914 (left panel; no extreme right party ran for election in the 1914 elections) and for the right and extreme right in 1936 (right panel) across municipalities overlaid with the assignment of line regiments raised in a municipality to the Battle of Verdun under the generalship of Philippe Pétain. This map shows information for 33,709 municipalities within France's 1914 borders for which data on the 1914 elections is available; and 34,211 municipalities for which data on the 1936 elections is available.

Source: Cagé et al. (2022).

Further, 'Verdun under Pétain' municipalities responded more to Pétain's first overt calls for political action. The most dramatic evidence of this took place in the week between the two rounds of the 1936 elections.

The 1934 insurrection had arguably been successful in one way: the fears it raised did lead, almost immediately, to the fall of the left-wing government. But in the first round of the next elections on 26 April 1936 (Figure 4b), a left-wing coalition received more than 50% of the vote and appeared poised to return. Pétain "immediately broke cover" (Williams 2005: 137).

Pétain gave a highly publicised front-page interview to *Le Journal* on 1 May 1936, just two days before the second round of the elections, calling for a national rally (*rassemblement national*). He declared France "under threat" of socialism. He cited Fascist Italy and Nazi

Germany as examples to follow. He endorsed the actions of the veterans' organisation, the *Croix de Feu*, one of the far-right Leagues that had also marched in 1934, noting how they "occupy themselves with the moral and spiritual improvement of youth".

And those exposed to his command at Verdun appeared to have answered his call. Though the two rounds were held only one week apart, the vote share for the Socialist party (SFIO) decreased by a dramatic 6.98% in 'Verdun under Pétain' municipalities in the second round, largely in favour of the right-wing conservative Alliance Démocratique (AD) (Figure 5). The Alliance Démocratique was headed at the time by Pierre-Étienne Flandin, who would later serve Pétain's Vichy regime as vice-president and foreign minister.

FIGURE 5   **'VERDUN UNDER PÉTAIN' MUNICIPALITIES SWING 7% FROM THE SOCIALISTS TO THE RIGHT IN THE SECOND ROUND OF THE 1936 ELECTIONS JUST AFTER PÉTAIN'S OVERT PRO-RIGHT INTERVIEW**
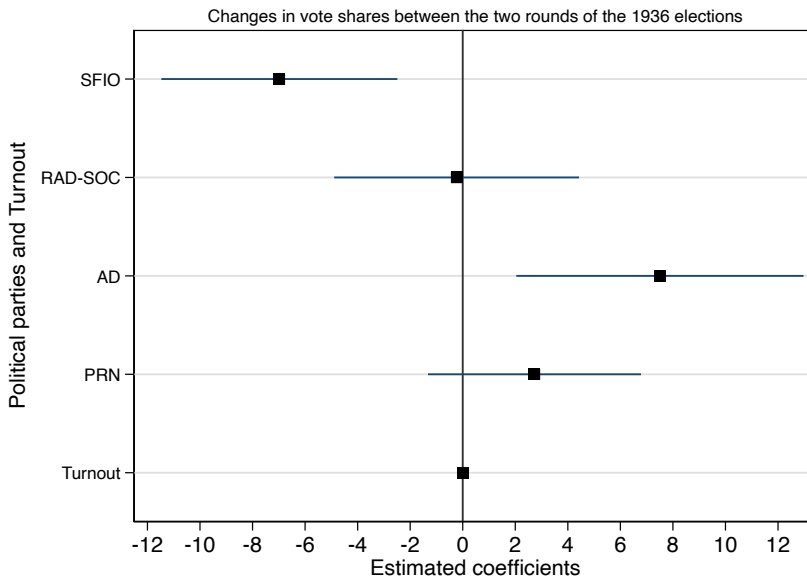
Notes: This figure reports the effect (and 90% confidence interval) of a municipality's exposure to 'Verdun under Petain' on the difference in vote shares for parties that contested both rounds of the 1936 elections. Ranked from left to right, SFIO stands for the Socialist party; RAD-SOC for the Radicaux Socialistes; AD for the Alliance Démocratique; and PRN for the Parti Républicain National. We find no effect on turnout.
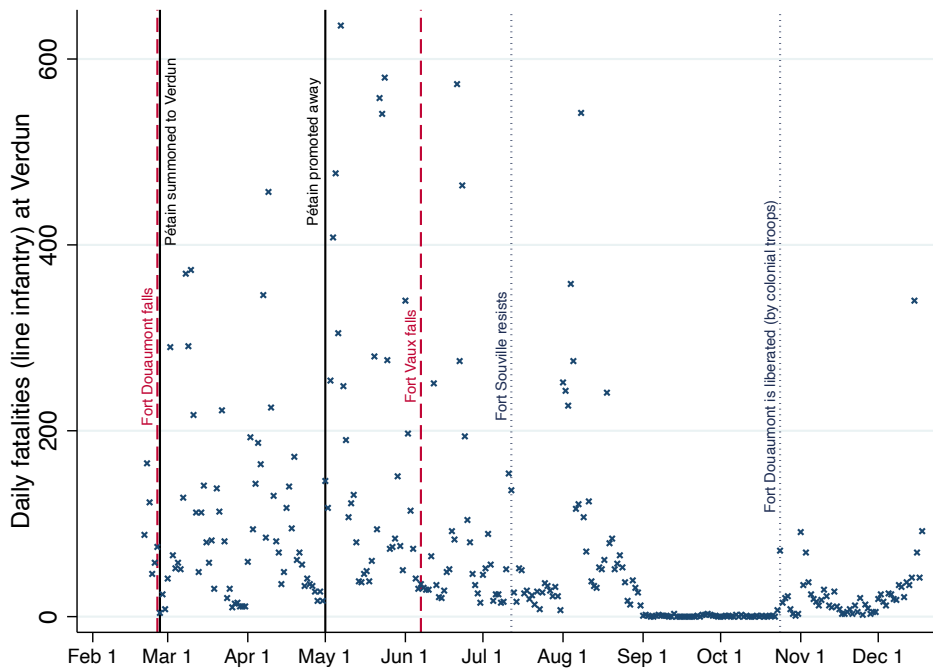
Source: Cagé et al. (2022).

BUILDING TRUST IN A FUTURE AUTOCRAT: HEROISM, MANAGEMENT STYLE AND LOYALTY

Why might the people whose regiments were exposed to Pétain at Verdun be more likely to follow him into collaboration? It helps to return to the battle itself. The Germans did not change their strategy and the intensity of the battle was largely unchanged at

Verdun just before and just after Pétain's promotion away from direct command (Figure 6). But Pétain's management style did differ in ways that were visible to the troops, and arguably demonstrated the greater weight that he put on their welfare. He moved his headquarters (and sleeping quarters) so that they were on the major supply road, the Voie Sacrée itself, "closer to the battle than many generals of his day would have thought necessary, or comfortable", making himself visible to them and visiting them in hospital when his schedule permitted (Ousby 2002: 100). Indeed, we show that soldiers interacted quantifiably more with Pétain than other commanding generals as they rotated through the Verdun sector. Further, under Pétain's command, soldiers were also *more likely to share in the credit*, receiving more medals for heroism under his command. These actions not only helped foster a shared identity of heroism, they also are likely to have evoked greater trust among those under his command, first on the battlefield and later in other domains as well.

FIGURE 6   DAILY FATALITIES AMONG LINE INFANTRY REGIMENTS AT THE BATTLE OF VERDUN

Source: Cagé et al. (2022).

We provide evidence that exposure to Pétain at Verdun does indeed appear to translate into longer-lasting *loyalty* among these veterans that served under his command, as measured by their subsequent willingness to follow Pétain's lead into collaboration. We exploit the individual age and sex information we possess for a subset of 23,566

individual collaborators to distinguish likely line veterans – i.e. those males age-eligible to have been conscripted into the line infantry in World War I, and thus more likely to have experienced Pétain's direct command. We wed this to biographical data on all of Pétain's peace-time and war-time assignments. We find evidence consistent with World War I military exposure to Pétain inducing loyalty: municipalities with soldiers that served under Pétain, whether at Verdun or before, subsequently raised 5.7% and 2.2% more collaborators, respectively, among those most likely to have served under him in the line infantry.

COMPLEMENTARITIES AND DIFFUSION BEYOND THE NETWORK

We next examine the propensity to collaborate beyond the line infantry. We show that it is only in 'Verdun under Pétain' municipalities that there is evidence of a significant increase (of 7.2%) in collaboration beyond the network, among non-veterans. In other words, while all likely line veterans exposed to Pétain's direct command were more likely to be loyal and follow him into collaboration, it is only among those who were exposed to Pétain at Verdun that the effects diffuse beyond the veterans themselves to influence the political behaviours of the communities around them.

These patterns are consistent with *complementarity* in political influence within the network: the political influence of Pétain's heroic credentials was stronger when legitimised and diffused through the network of those that served with him at Verdun, and they in turn became more influential the more their leader was viewed as a hero.

The presence of complementarities can help explain not only why the heroes of Verdun acquiesced in the demise of the Republic for which they had fought, but why some even became the staunchest supporters of the Nazis over time. If others who share heroic credentials are now considered traitors, this will reduce the value to each hero of their own heroic credentials and identity. This is particularly the case for the most public face of the network, Pétain. As a result, the heroes of Verdun had more incentives to support their leader: it was costlier to turn against him than for others who lacked their common group identity. Further, they faced greater incentives to participate in organisations and other reinforcing devices that strengthened the value of their heroic credentials and the network as a whole. And the more individuals that invest, the costlier it becomes to abandon the network.

These reinforcing incentives may explain the patterns of escalating commitment and persistence we observe in the data. Marcel Bucard, already mentioned, and Joseph Darnand provide useful concrete examples. Both were awarded medals for heroism by Pétain himself in World War I, and both were later inducted into the French Legion

of Honor.[8] Both were active in veterans' organisations. Both followed a trajectory of escalating authoritarian leanings, and participated in extreme-right organisations during the inter-war period. Bucard was present at the riot in February 1934. After contesting the 1936 elections, his extreme-right Francisme party would be banned, only to resurface (under the same name) as a collaborationist party during the Vichy regime. Darnand would become active in the shadowy *Cagoule* (the 'Hood'), so-called because its terrorist and assassination tactics were reminiscent of the Ku Klux Klan. The Cagoule too would go underground in 1936, only to re-emerge as a legal organisation under Vichy as the *Mouvement Social Révolutionnaire* (MSR).

Yet, both men were staunchly anti-German. Both would join the French army in World War II, winning further recognition for heroism *fighting* German forces in 1939–40. But, with the advent of Pétain's Vichy regime, when other military men in the extreme right considered joining the Resistance, they would instead follow Pétain into collaboration.

Darnand engaged in active discussions about joining the Resistance, but instead found a splinter group of veterans, the *Service d'Ordre Légionnaire*, that not only stayed loyal to Pétain after his overt collaboration with the Nazis but also provided shock troops for his regime. At Pétain's personal request, he went further, becoming the leader of the main paramilitary organisation, the *Milice*, founded in 1943 to hunt Jews and the Resistance. Despite the fact that the Germans were clearly losing, Darnand then swore personal allegiance to Hitler himself and joined the Waffen SS. He was executed for treason in 1945. In a letter to De Gaulle on the eve of his execution, Darnand pleaded that his Milice were "authentic Frenchmen, [whose] only mistake was to have been faithful to a great soldier [Pétain]". Bucard co-founded the LVF, a group of military volunteers to assist the Germans. He was executed in 1946.

Darnand and Bucard were not alone. Whether it be extremist groups that emerged during the polarised 1930s (like the *Cagoule*/MSR and Francisme), political parties forged under Vichy itself (like the RNP), direct German collaboration in the Gestapo or other organisations, or paramilitary and military groups that accepted French participants (like the SOL, *Milice* and later the Waffen SS), there is a consistent increase of about 5–6% in individuals participating in 'Verdun under Petain' municipalities (Figure 7).[9] This is despite the fact that some of these groups only accepted French participants in 1943–1944, when it was clear that the Nazis were losing and participating came with great risk.

8   Darnand enlisted in the army in 1916 was immediately sent to serve at Verdun under Pétain. Though Bucard had not served at Verdun under Pétain, he had served at Verdun (in October-December, as part of the 4e regiment) and he had developed ties with Pétain explicitly related to heroism. When Pétain awarded Bucard the Croix de Guerre for valor in 1917, he told him "I know your heroic behaviour and what your men think of you, it will be your greatest reward" (Deniel 1979).

9   It is also worth noting that the correlation between the 1936 vote share, coming from administrative data, and 1940-44 organisation members per capita, coming from the declassified collaborators file, for the one movement, Francisme, which had engaged in both forms of mobilisation, is reassuringly high (ρ=0.86).

FIGURE 7   INCREASE IN PER CAPITA PARTICIPATION IN MAJOR COLLABORATIONIST GROUPS IN 'VERDUN UNDER PETAIN' MUNICIPALITIES
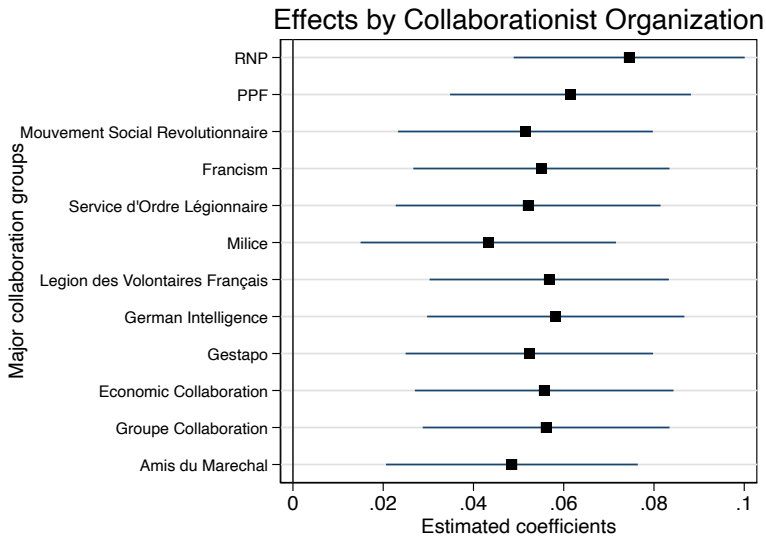
Notes: This figure reports the effect (and 90% confidence interval) of a municipality's exposure to Verdun-under-Petain on the participation in collaborationist groups. RNP stands for People's National Rally, PPF for French Popular Party, and SS for the military wing of the Nazi Schutzstaffel – the Waffen SS.

Source: Cagé et al. (2022).

Such continuation and escalation over time are consistent with the presence of complementarities in the network yielding reinforcing incentives. The complementarities can also explain why these preferences and identities proved durable in France, even after the collaborationist regime would fall, far-right parties were banned, and Pétain himself was convicted of high treason.[10]

CONCLUSION

In a different country, at a different time, mobilised by claims of a different rigged election, another armed mob gathered before the gates of a different State House. Concerned that the militia he commanded might themselves be politicised, the commander ascended the steps to talk to the crowd, unarmed and alone. "*Men, you wish to kill me, I hear,*" he said.

10 Pétain's deputy, Pierre Laval, was executed, along with a number of other high-ranking Vichy ministers. De Gaulle, who had served under Pétain in World War I, commuted Pétain's own sentence of execution to life imprisonment in recognition of Pétain's military contributions in World War I. Pétain's death in prison in 1951 sparked demonstrations in most French cities, orchestrated by veterans of Verdun (Williams 2005: 271). On how complementarities can induce momentum and persistence in technological adoption and organization, see Milgrom et al. (1991) and in political and social institutions, Jha (2018) and elsewhere in this eBook.

Killing is no new thing to me. I have offered myself to be killed many times, when I no more deserved it than I do now. Some of you, I think, have been with me in those days... I am here to preserve the peace and honour of this State, until the rightful government is seated—whichever it may be, it is not for me to say. But it is for me to see that the laws of this State are put into effect, without fraud, without force, but with calm thought and sincere purpose. I am here for that, and I shall do it. If anybody wants to kill for it, here I am. Let him kill!
Pullen (1999)

The commander who then threw open his coat to the mob in front of the Maine State House in 1880 was Joshua Chamberlain, who had commanded the 20th Maine Regiment that saved the Union line from being flanked at the Little Round Top during the Battle of Gettysburg. In a made-for-Hollywood moment, a veteran in the crowd then jostled through to the front, saying: "B*y God, old General, the first man that dares to lay a hand on you, I'll kill him on the spot*". The crowd then melted away (Pullen 1999).[11]

Having demonstrated through (often immensely) costly sacrifice their willingness to give up their private wellbeing for the good of the country, it is not surprising that heroes, whether demonstrating sacrifice through war or through nonviolent civil disobedience, are sought after to represent the people in politics, and are trusted when they endorse a political position.[12] This source of legitimacy can and has been used to sway opinion and strengthen democracy. Heroes' credentials for courage can also help them reach out and make peace.[13] When embedded in networks of others with such shared identities, this can lead to a potent group of politically engaged and organised individuals who can support one another in diffusing democratic values and pro-social behaviour.[14]

But those whose patriotism is hard to question may also use these credentials to legitimise views that would otherwise be proscribed and beyond the pale of public discourse. As France's experience shows, such networks can also be manipulated and lead to reinforcing incentives that can entrench extreme positions over time and make even those who do change their minds subject to sanctions and pressure from others within the network. This makes it harder for individuals to reverse course. Indeed, substantial evidence has emerged that numerous prominent Republicans, while expressing grave concern in private about the storming of the Capitol, subsequently refused to take such positions in

11 On the effects of leadership on unit cohesion in the civil war, including under Chamberlain's command, see also Dippel and Ferrara (2020).
12 On the role of punishment for nonviolent actions acting as a screening device for political leadership, see Bhavnani and Jha (2012).
13 It is a common observation in international relations that politicians from relatively hawkish parties are, ironically, often better positioned to make politically risky overtures for peace with long-standing adversaries than their dovish counterparts. One example is Nixon's famous rapprochement with China. However, our interpretation resonates with the greater set of options available to war heroes to shape politics regardless of party. For example, Yitzhak Rabin, a commando in Israel's war of independence who rose to be the Army chief during Israel's victory in the 6 Day War, was also able to pursue the Oslo Peace Accords as head of the centre-left Israeli Labour party.
14 For example, French veterans of the American War of Independence played an important role in spreading and defending democratic values in the constitutional phase of the French Revolution (Jha and Wilkinson 2019, and Jha and Wilkinson in progress).

public.[15] History teaches us the power of leveraging the legitimacy of networks of heroes. These can have great destructive force. But they can also support democratic values and peace.

REFERENCES

Acemoglu, D, N Ajzenman, C Giray Aksoy, M Fiszbein and C A Molina (2021), "(Successful) Democracies Breed Their Own Support", NBER Working Paper No. 29167.

Besley, T and T Persson (2019), "Democratic Values and Institutions", *American Economic Review: Insights* 1(1): 59–76.

Bhavnani, R and S Jha(2012), "Gandhi's Gift: On the Promise and Limitations of Non-Violent Civil Disobedience", *Economics of Peace and Security Journal* 9(1).

Cagé, J, A Dagorret, P Grosjean and S Jha (2021), "Heroes and villains: How networks of influential individuals helped destroy one of the world's most durable democracies and legitimise a racist, authoritarian state", VoxEU.org, 17 January.

Cagé, J, A Dagorret, P Grosjean and S Jha (2022), "Heroes and Villains: The Effects of Combat Heroism on Autocratic Values and Nazi Collaboration in France," CEPR Discussion Paper 15613 (revised).

Cagé, J, P Grosjean and S Jha (in progress), "Army of Shadows: Organizing Resistance in World War 2 France".

Deniel, A (1979), *Bucard et le Francisme*, Jean Picollec.

Dippel, C and A Ferrara (2020), "Oh Captain, My Captain: Leadership and Team Cohesion in the Union Army", UCLA Working Paper.

Horne, A (1962), *The Price of Glory: Verdun 1916*, MacMillan.

Jackson, J (2001), *France: The Dark Years, 1940–1944*, Oxford University Press.

Jha, S (2018), "Trading for Peace", *Economic Policy* 33(95): 485–526.

Jha, S and S Wilkinson (2012), "Does Combat Experience Foster Organizational Skill? Evidence from Ethnic Cleansing during the Partition of South Asia", *American Political Science Review* 106(4): 883–907.

Jha, S and S Wilkinson (2019), "Marching towards the Bastille: Veterans as Vanguards in the French Revolution", mimeo, Stanford.

Jha, S and S Wilkinson (in progress), *Wars and Freedoms*.

15 See, for example, the "Then and Now: GOP lawmakers' evolution on the Capitol riot", Associated Press, 8 June 2022.

Lacroix, J, P-G Meon and K Oosterlinck (2019), "A Positive Effect of Political Dynasties: the Case of France's 1940 Enabling Act", CEPR Discussion Paper No. 13871.

Levitsky, S and D Ziblatt (2018), *How Democracies Die*, Broadway Books.

Lormier, D (2017), *Les 100 000 collabos: Le fichier interdit de la collaboration française*, Cherche Midi.

Milgrom, P, Y Qian and J Roberts (1991), "Complementarities, momentum and the evolution of modern manufacturing", *American Economic Review: Papers and Proceedings* 81(2): 84–88.

Millington, C (2012), *From Victory to Vichy: Veterans in Inter-War France*, Manchester University Press.

Ousby, I (2002), *The Road to Verdun: France, Nationalism and the First World War*, Jonathan Cape.

Pullen, J J (1999), *Joshua Chamberlain: A Hero's Life and Legacy*, Stackpole Books.

Williams, C (2005), *Pétain: How the Hero of France became a convicted traitor and changed the course of history*, Palgrave Macmillan.

ABOUT THE AUTHORS

Julia Cagé is an Associate Professor of Economics in the Department of Economics at Sciences Po Paris, and a Research Fellow at the Center for Economic Policy Research (CEPR), where she also leads the Research and Policy Network on "Media Plurality". She is also co-director of the Laboratory for Interdisciplinary Evaluation of Public Policies (LIEPP)'s "Evaluation of Democracy" research group. She is the recipient of a starting grant from the European Research Council (ERC) for a five-year project on "Campaign finance, Information and Influence: A Comprehensive Approach Using Individual-Level Data and Computer Sciences Tools" (PARTICIPATE). She is particularly interested in media economics, political participation and political attitudes. Her work has been published in leading journals in economics, including the *Review of Economics Studies* and the A*merican Economic Review.*

Pauline Grosjean is a Professor of Economics at UNSW. Previously at the University of San Francisco and the University of California at Berkeley, she has also worked at the European Bank for Reconstruction and Development. She obtained her PhD in Economics at Toulouse School in Economics. Her research studies the historical and dynamic context of economic development. She has published research on the historical determinants and evolution of cooperation and violence, trust, gender norms, support for democracy, preferences for education, and conflict. Her recent book deals with the historical roots of gender norms and their influence on female-male economic inequality.

Saumitra Jha does research on economic, financial and organsational approaches to mitigating political polarisation and conflict. He is an Associate Professor of Political Economy at Stanford's Graduate School of Business, a Senior Fellow at both the Freeman-Spogli Institute for International Affairs and the Stanford Institute for Economic Policy Research, a Faculty Fellow at the Center for Advanced Study in the Behavioral Sciences and convenes the Stanford Conflict and Polarization Lab. Jha holds a BA *summa cum laude* from Williams College, Master's degrees in Economics and Mathematics from the University of Cambridge, and a PhD in Economics from Stanford University.

CHAPTER 20

One team, one nation: Football, identity and conflict in Africa

Filipe Campante,[a] Emilio Depetris-Chauvin[b] and Ruben Durante[cd]

[a]Johns Hopkins University; [b]Pontificia Universidad Católica de Chile; [c]Universitat Pompeu Fabra; [d]CEPR

Nation building often poses a 'catch-22' challenge for policy. Many of the policies that have been posited in order to help form a common identity overcoming ethnic, linguistic or regional cleavages, such as mass schooling or large infrastructure investments, require substantial state capacity. Yet the detrimental consequences of such cleavages for economic development (Easterly and Levine 1997, Alesina et al. 1999) can inhibit the creation of that state capacity in the first place. Some canonical examples of successful nation building, such as in 19th century Europe, bypassed this challenge by having economic development precede the full consolidation of the modern nation, but in many of the relevant cases today, this has proven to be a difficult challenge.

At the other end of the spectrum lie easily implementable policies of a purely symbolic nature. All countries have a national flag or anthem, but while this 'banal nationalism' (Billig 1995) might help sustain and foster a pre-existing national identity, it seems unlikely to be effective in creating one in the first place.

Between these extremes, however, are the experiences perceived by the citizens of a country as being collectively shared between them – for instance, major national events or civic dates (Madestam and Yanagizawa-Drott 2011, Kaplan and Mukand 2014). Nations are fundamentally 'imagined communities' (Anderson 1983), and highly symbolic and emotionally charged experiences could well help make the image of the national communion more vivid in citizens' minds.

A major source of such experiences is sports. Leaders from Hitler to Mandela have tried to use success in important sporting competitions to strengthen national identities. Of all sports, football is certainly among the most associated with national feelings, as illustrated by the passionate worldwide following of international competitions such as the FIFA World Cup. Indeed, the outpouring of patriotic sentiment triggered by a major football win is undeniable – as put by British historian Eric Hobsbawm (1990), "the imagined community of millions seems more real as a team of eleven named people".

This outpouring turns out to leave something behind. In recent work (Depetris-Chauvin et al. 2020), we investigate how victories for national football teams in major international competitions affect the strength of ethnic identification, as opposed to national identity, as well as attitudes towards other ethnicities and actual inter-ethnic violence. We do so in a context marked by low levels of state capacity and where nation building, and the tension between particular versus national identities, are especially salient – sub-Saharan Africa. This is an especially powerful setting, given how strong interest in football is in the region: survey data indicate that 75% of respondents in Africa report being interested in football, against a global average of 46% (Repucom 2014).

## SHARED COLLECTIVE EXPERIENCES AND INDIVIDUAL ATTITUDES: ETHNIC IDENTIFICATION AND TRUST

We start by considering self-reported national identification. Specifically, the Afrobarometer survey asks respondents from many different countries in the continent whether they identify primarily with their ethnic group or with the country as a whole. Because national football teams in Africa play many matches every year in the context of qualification for two major international competitions – the World Cup and the African Cup of Nations – it so happens that the Afrobarometer interviews some individuals just before one such match, while others are interviewed just after the same match. We compiled data from the FIFA statistical office on 69 official matches involving sub-Saharan African national teams, over the period between 2002 and 2015, for which Afrobarometer surveys were administered in one of the countries involved within a window of 15 days before or after each match. If survey timing does not respond systematically to international football scheduling, we can interpret any difference in answers between the two groups of individuals as reflecting the causal impact of the match.

When the national team wins these high-stakes matches, respondents become about 5 percentage points less likely to identify with their ethnic group rather than the nation – a substantial 37% drop, relative to the average probability. This can be seen in Figure 1, depicting how ethnic identification evolves in the days before and after a victory.[1] The

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1   Specifically, the figure plots the estimated coefficients and 95% confidence intervals for dummies for 3-day periods before and after the victory. The coefficients are estimated from a unique regression in which we control for individual characteristics and set of indicators for the match-country, and ethnic group of the respondent.

reduction in ethnic identification persists and, if anything, becomes stronger several days after the match. In contrast, ethnic identification does not seem to evolve in any particular way in the days prior to the match.

FIGURE 1   ETHNIC IDENTIFICATION BEFORE AND AFTER A VICTORY
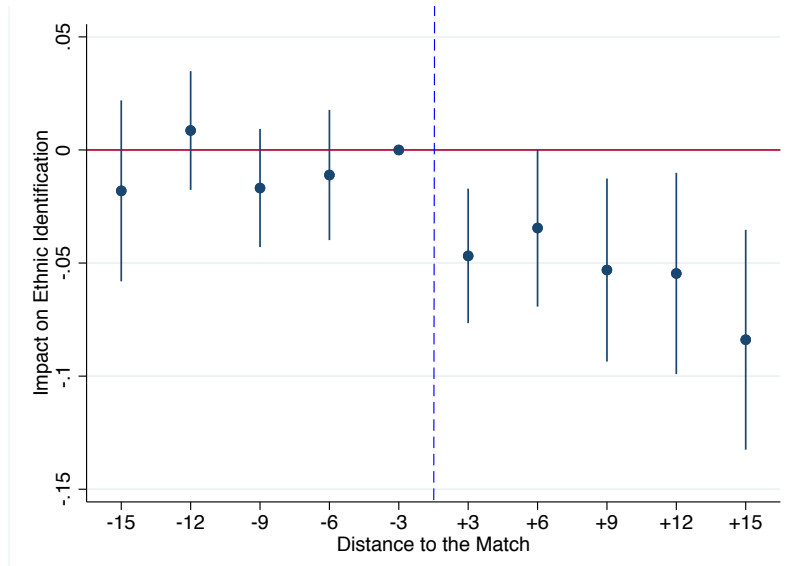
Interestingly, draws or defeats have no discernible effect on national versus ethnic identification. The latter, in particular, suggests that negative collective experiences do not necessarily undermine national unity. Nor is the effect associated with general euphoria or optimism; rather, it seems directly tied to nationalistic fervour. For instance, we do not find any effect on the approval ratings of the country's leader or ruling party, or on individual assessments of the country's or their own economic situation.

What does have an impact on the magnitude of the effect, then? For one, we can point to the strength of the emotional reaction evoked by the event: wins against traditional rivals have a larger impact.

In addition, two factors are especially interesting. First, the reduction in ethnic identification is more pronounced where the state is less present, specifically in ways that might lead to a stronger connection to the nation (i.e. roads, post office, schools). This suggests that shared experiences may substitute for other forms of nation building.

Second, we find that the impact is stronger when the national team is more ethnically diverse. This additional effect is quite large: if team diversity is increased by one standard deviation (i.e. 0.126), the total impact of a victory would be approximately 50% larger. This suggests a possible mechanism whereby the team may serve as a model for inter-ethnic cooperation leading to achievement against a foreign opposing group.

We then turn our attention to interpersonal trust, again using information from the Afrobarometer. We find that respondents are just over 6 percentage points more likely to report trust in their fellow compatriots, which corresponds to about 14% of the mean value for that variable.

The effect is stronger when the question specifically refers to individuals from other ethnic groups, indicating a specific effect on inter-ethnic trust. This is matched by an increased acceptance towards having neighbours from other ethnicities. Given the documented importance of trust for socioeconomic outcomes – and the related challenges faced by sub-Saharan African countries (Nunn and Wantchekon 2011) – this is another indication of the potential positive impact of shared experiences.

One might wonder, however, whether this increased trust in fellow citizens and across ethnic groups could be matched by greater animosity towards foreigners. After all, the experience embodied in national team success is obviously in opposition to a foreign adversary. We do not have enough precision to answer this question with great confidence, but we cannot rule out an increase in reported dislike of foreign neighbours.

SHARED COLLECTIVE EXPERIENCES AND ACTUAL BEHAVIOUR: CONFLICT

These results regarding self-reported identification and trust levels naturally beg the question: do these experiences also affect more tangible outcomes? For this, we turn to a very important issue in sub-Saharan Africa, which has been linked with the challenge of ethnic cleavages, namely, civil conflict. While many have speculated that international soccer victories can reduce civil conflict,[2] it is again very hard to prove a systematic causal impact.

We exploit a feature of the qualification process for the African Cup of Nations. Teams are divided into groups playing in a round-robin format and, very often, multiple teams in each group reach the last match with hopes of qualifying. To the extent that the outcome of last-round matches is largely dependent on sheer luck, one can estimate the effect of a successful qualification by comparing the evolution of conflict in countries that (only just) qualified relative to countries that (only just) failed to do so.

With that in mind, we collected information on teams' standings in ten African Cup of Nations qualifying rounds held between 1997 and 2015. We identify teams in the same group that, until the last match day of the group stage, were both in a position to qualify, but one of which only just did while the other did not. We then compare the evolution of conflict in the two countries in the six months before and after the qualification, using data from the Armed Conflict Location and Event Data Project (ACLED).

2   E.g. https://edition.cnn.com/2017/11/11/football/ivory-coast-didier-drogba-stops-civil-war-copa/index.html

We find that countries whose teams (only just) qualified experience significantly less conflict in the following six months than countries whose teams (only just) did not. This can be seen in Figure 2: the occurrence of conflict events decreases sharply (by about 9%) in the weeks following qualification.[3] The figure also shows conflict did not behave differently in countries that would later happen to qualify, relative to those who failed.

FIGURE 2   OCCURRENCE OF CONFLICT BEFORE AND AFTER FINAL QUALIFYING MATCH
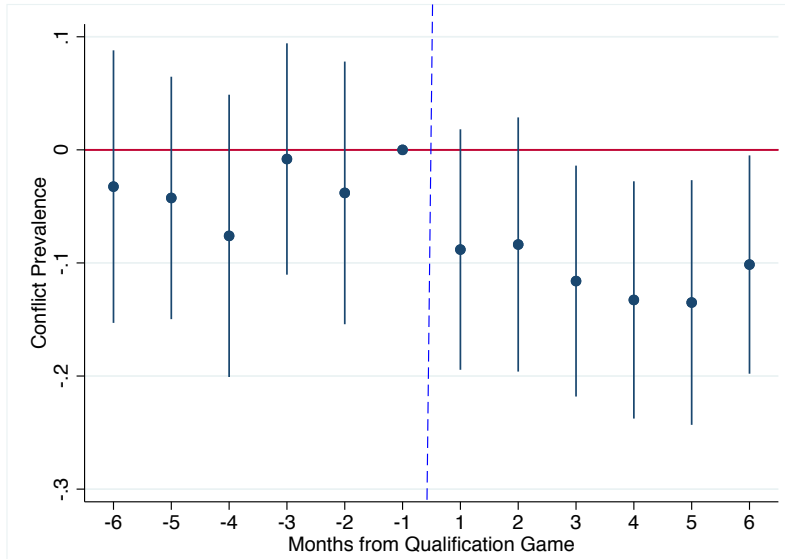
While the figure displays the relative conflict prevalence across treatment and control groups, this turns out to be driven by a fall in the former, as opposed to an increase in the latter. What is more, the reduction in conflict intensity is quite persistent, up to several months after the event – if anything, it seems to become stronger as more time elapses after qualification.

The effect is also stronger for teams that had never qualified or had not qualified for a long time, and whose success was rather unexpected, suggesting that success is less powerful when it becomes the norm. This underlines the point that close qualification constitutes a very different kind of shock in countries that regularly qualify. In fact, late qualification might well be perceived not as a positive shock, in these cases, but rather as a relative disappointment. This is illustrated by the patterns when it comes to qualification for the FIFA World Cup: Cameroon and Nigeria (historically by far the most successful African countries at that level) do not witness comparable reductions upon qualification.

3   Specifically, the figure plots the estimated coefficients and 95% confidence intervals of the interaction terms between the qualification indicator and dummies for eleven four-week periods in the months before and after the qualification. The coefficients are obtained from a regression that also includes 50 week dummies and 101 country×qualifier dummies.

Quite importantly, we are also able to show that there is a significant reduction in the prevalence of conflict that is classified by ACLED as ethnically related – i.e. conflicts that involve the participation of actors classified as ethnic militia, or whose denomination refers to an ethnic faction. This underscores that the reduction in conflict is plausibly related to an increased sense of national identity.

We also use the information on the specific location of conflict episodes and match it with information on the degree of national political power of the local ethnic group, as classified by the Ethnic Power Relations (EPR) dataset. In particular, we distinguish conflict events occurring in areas inhabited by politically strong groups ('monopoly' or 'dominant' groups, according to EPR) from those in places inhabited by politically weak ones ('discriminated', 'powerless' or 'self-excluded' groups). The effect is particularly strong for the latter areas, which is where we would expect issues of national identity to be more fraught.

Finally, along similar lines, we exploit information of local ethnic diversity, as proxied by the number of languages spoken in the (first-level) administrative subnational unit to which a given location belongs (from the Ethnologue dataset). We find that our documented effect is larger in areas with high linguistic diversity than in monolingual places. Once again, this is where we would expect issues of national versus ethnic identity to loom larger.

CONCLUSION

Our findings indicate that shared collective experiences – such as important sporting achievements – can prime sentiments of national unity and attenuate even deeply rooted ethnic mistrust, illustrating that relatively soft tools can be effective in fostering a national identity. Moreover, we find that this has tangible effects on the prevalence of conflict. Even if the effect of these events is transient, it may last long enough to open a precious window of opportunity for political dialogue, negotiations and reforms that may produce long-lasting gains.

We can also speculate over policy implications, beyond the specific realm of sports. First, policies that favour emotional participation (e.g. religious or civic events) may be most effective at forging a shared sentiment of unity, thereby facilitating more long-lasting cultural and political changes. In addition, the results underscore that nation-building strategies are available even with low state capacity. In fact, they might plausibly work as a substitute for other more demanding nation-building tools, especially by illustrating how different groups can successfully cooperate.

Needless to say, the power of these shared collective experiences need not be used for good. Even in our specific context, it is certainly possible that the reduction in friction and violence within countries could coexist with increased conflict with other countries. One should keep in mind that the passions ignited by sports can certainly be channelled to violence in other contexts as well.

REFERENCES

Alesina, A, R Baqir, and W Easterly (1999), "Public Goods and Ethnic Divisions", *The Quarterly Journal of Economics* 114(4): 1243–1284.

Anderson, B (1983), *Imagined Communities: Reflections on the Origin and Spread of Nationalism*, Verso.

Billig, M (1995), *Banal Nationalism*, Sage Publications.

Depetris-Chauvin, E, R Durante and F Campante (2020), "Building Nations through Shared Experiences: Evidence from African Football", *American Economic Review* 110(5): 1572–1602.

Easterly, W and R Levine (1997), "Africa's growth tragedy: policies and ethnic divisions", *The Quarterly Journal of Economics* (112(4): 1203–1250.

Hobsbawm, E J (1990), *Nations and nationalism since 1870: Programme, myth, reality*, Cambridge University Press.

Kaplan, E and S Mukand (2014), "The Persistence of Political Partisanship: Evidence from 9/11", University of Maryland (unpublished).

Madestam, A and D Yanagizawa-Drott (2011), "Shaping the Nation: The Effect of Fourth of July on Political Preferences and Behavior in the United States", University of Zurich (unpublished).

Nunn, N and L Wantchekon (2011), "The Slave Trade and the Origins of Mistrust in Africa", *American Economic Review* 101(7): 3221–3252.

Repucom (2014), *World Football: From Consumption to Sponsorship: How Fans Are Changing the Commercial Landscape of the Beautiful Game*, Nielsen Sports.

ABOUT THE AUTHORS

Filipe R. Campante is Bloomberg Distinguished Professor at Johns Hopkins University, and a Research Associate at the National Bureau of Economic Research (NBER). He is interested in political economy, development economics, and urban/regional issues, with a focus on what constrains politicians and policymakers beyond formal checks and balances: cultural norms, institutions, media, political protest. Campante's work has appeared in leading academic journals such as the *American Economic Review*

and the *Quarterly Journal of Economics*, among others. He holds a PhD from Harvard University, an MA from the Pontifical Catholic University of Rio de Janeiro, and a BA from the Federal University of Rio de Janeiro, all in economics.

Emilio Depetris-Chauvin is an Associate Professor of Economics and Research Director at the Pontificia Universidad Católica de Chile. He received a BA in Economics from Universidad de Buenos Aires and a Master's and PhD in Economics from Brown University. His areas of research are political economy and economic development. He is particularly interested in understanding the causes and consequences of conflict and violence. His work has been published or is forthcoming in the *American Economic Review, Journal of Economic Growth, Economic Journal, Journal of Development Economics*, and *Journal of Public Economics*.

Ruben Durante is Full Professor and ICREA Researcher in Economics at Universitat Pompeu Fabra, affiliated faculty to the Barcelona School of Economics and the Institute for Political Economy and Governance, Research Advisor at Gallup, Research Affiliate of the Centre for Economic Policy Research (CEPR), and Research Fellow at CESifo and IZA. His main area of research is political economy with a particular focus on the functioning and impact of traditional and new media in both mature and consolidating democracies. His work has been published in leading journals including in economics, political science, and management including the *American Economic Review*, the *Journal of Political Economy, Management Science*, the *American Journal of Political Science,* the *Journal of the European Economic Association*, and the *American Economic Journal: Applied Economics*. His research has been funded, among others, by the European Research Council. He holds a PhD and an MA from Brown University (US), an MA from Sorbonne University (France), and a BA from the University of Messina (Italy).

SECTION IV
EXTERNAL INTERVENTIONS AND WARS

CHAPTER 21

Nation building through military aid? Unintended consequences of US interventionism

Eugen Dimant,[a] Tim Krieger[b] and Daniel Meierrieks[c]
[a]University of Pennsylvania; [b]University of Freiburg; [c]WZB Berlin Social Science Center

We went there for two reasons, George. Two reasons. One, to get Bin Laden, and two, to wipe out as best we could, and we did, the Al Qaeda in Afghanistan. We did it. Then what happened? Began to morph into the notion that, instead of having a counterterrorism capability to have small forces therein – or in the region to be able to take on Al Qaeda if it tried to reconstitute, we decided to engage in nation building. In nation building. That never made any sense to me.
ABC News interview with US President Biden[1]

1 INTRODUCTION

After attempting to stabilise Afghanistan for almost two decades, US troops and their allies left the country under dramatic circumstances in 2021. Immediately after their withdrawal, the Taliban established a 'new' political regime that resembled the one the allies sought to overcome by entering the country in the first place (e.g. King 2022, Weigand 2022).

The original US military plan envisioned destroying Al-Qaeda, removing the Taliban regime and helping rebuild the country with the ultimate goal of sufficiently strengthening local state capacity to prevent the re-emergence of terrorism (Dobbins et al. 2008). Importantly, however, "[t]he United States did not intend to take upon itself the job of nation building in Afghanistan" (Dobbins et al. 2008: 91). Still, the United States effectively ended up in a 20 years long attempt to build an Afghan nation.[2] In former times, "nations were forged through 'blood and iron'. Today, the world seeks to build them through conflict resolution, multilateral aid, and free elections" (Ottaway 2002: 16).[3] That is, nations are usually no longer built through (interstate) war but internal processes, which, however, often interact with foreign influence and interests. The case of Afghanistan exemplifies that foreign actors may indeed closely observe and support nation-building efforts also to achieve their own goals, such as reducing or even eliminating the global threat of terrorism.[4]

While not aimed at building the Afghan nation in the first place, the example of (unintended) US nation-building efforts in Afghanistan highlights several challenges and problems that a country faces when trying to influence from the outside the political and societal developments in an institutionally weak country. Weigand (2022: 1) identifies three main factors that explain the US failure in Afghanistan:

> *First, different actors that were part of the intervention in the country pursued competing agendas, especially with the 'War on Terror' undermining human rights and state-building. Second, a gap between the Afghan internationally supported state and its citizens evolved and grew larger over time, especially due to the risk mitigation measures applied. Third, day-to-day interactions that ordinary people in Afghanistan had with the state were often perceived as corrupt and extractive, making it difficult for the state to convey that it was working in the interest of its citizens.*

These factors are not specific to the Afghan situation, and may also explain the frequent failures of 'armed state-building campaigns' (Miller 2013).[5] One may argue that foreign intervention and subsequent nation building in politically and institutionally fragile states occurs *because* of these countries' long-standing fragility. Nevertheless, various institutional or economic constraints are detrimental to the success of the operations even if choices and strategies are appropriately selected and applied (Wunische 2022).

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2 Nation building is understood here as a "process of creating—and identifying with—a common national identity to legitimize the authority of the state" (Sambanis et al. 2015), where legitimate authority "is connected to popular rule" (Mylonas 2013: 17).

3 An example of 'blood and iron' nation building is Prussia using the German-French War to establish the German Reich in 1871 (Ottaway 2002).

4 For the United States, the estimated costs attributed to the Afghanistan/Pakistan war zone (excluding future obligations for veterans' care and spending on homeland security) exceed $2.3 trillion (Crawford 2021), indicating the major importance the United States attached to this undertaking.

5 Miller (2013) focuses on those campaigns by 'liberal powers' only, typically, with either the United States or the United Nations involved, whose failures together outnumber any (broadly defined) successes from the past century until today.

The mechanisms behind the success or failure of foreign intervention in nation building, or – at least – initial foreign (military) support for the development of a self-contained path toward national identity and legitimate state authority, are not fully understood yet. Specifically, one may ask whether and how the features of foreign intervention (e.g. the inflow of aid or the presence of troops) interact with the local institutional setting. As Weigand (2022) points out, foreign intervention may affect how the local state is perceived by the local population. Historically, Germany and Japan are examples of successfully supported nation building; more recent cases like Afghanistan, Iraq, Mali and Somalia (all of them only indirectly related to nation building through the 'global war on terror') have led to – at best – ambiguous outcomes regarding US goals.

In this chapter, we provide insights into the success or failure of foreign military intervention and support from the perspective of the supporting country. Our focus is on the global and national interests of the United States in solidifying its security through 'armed nation building'. Specifically, after a general discussion of strategic options and their success in the following sections, we present some recent empirical findings on the effects of US military aid (as a component of nation building) as a means of reducing anti-American terrorism (as a self-interested goal of US interventionism).[6] In line with our reasoning above, we show, based on our own work in Dimant et al. (2022), that there is little empirical support for the notion that US military aid strengthens local state capacity and through this reduces terrorist activity directed against the United States.[7] Rather, we find that US military aid results in weaker institutions (e.g. more corruption) and the production of more anti-American terrorism in recipient countries, contradicting both the US intent of providing aid to serve its own security interests and nation building by contributing to institutional capacity.[8]

2 US INTERVENTIONISM SINCE WORLD WAR II AND ITS CONSEQUENCES

Historically, US interventions have been guided by broad geopolitical and geostrategic interests. For instance, World War II ultimately led to successful nation building in Germany and Japan (von Hippel 2000, Ottaway 2002). Arguably, it was successful because both were powerful countries with strong national identities before they waged

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6 Terrorism is "the premeditated use or threat to use violence against noncombatants by individuals or subnational groups to obtain a political objective through the intimidation of a large audience beyond that of the immediate victims" (Gaibulloev and Sandler 2019: 278).

7 According to Rohner (forthcoming), the conflict literature has concerned itself extensively with explanations of conflicts that have only limited policy relevance (because they are extremely hard to change) such as poverty, natural resource abundance and ethnic polarisation. The author makes the case for extending this research focus and taking a more policy-relevant perspective on issues like mediation, economic policies for raising productivity and military options to establish more peaceful surroundings. Our analysis of foreign interventions aimed at raising state capacity and their unintended consequences falls into the latter category of investigations.

8 There is contradictory empirical evidence on whether foreign aid has – because it has the characteristic of a rent that can be extracted or usefully employed – a destabilising (e.g. Grossman 1992, Djankov et al 2008) or a stabilizing effect (e.g. Collier and Hoeffler 2002, De Ree and Nillesen 2009). The aid-conflict nexus has also been dealt with in various other recent studies, including Crost et al. (2014), Strange et al. (2017) as well further references mentioned throughout this chapter.

World War II (Wunische 2022). Here, the main task for the United States was to rebuild an existing national identity within a democratic and peace-supporting institutional setting.

The global East-West divide after World War II precipitated the Korean and Vietnam Wars. These wars ultimately resulted in the building of three nations: the Republic of Korea (South Korea), the Democratic People's Republic of Korea (North Korea) and the Socialist Republic of Vietnam. From a US perspective, the latter two cases were considered failures as both countries entered the Soviet sphere of influence. In addition, the post-World War II era was characterised by various proxy wars (e.g. in Ethiopia, Somalia, Panama, Grenada and Nicaragua), in which the United States – officially or unofficially – contributed to nation-building efforts (e.g. Linantud 2008, Miller 2011, 2013, Ottaway 2008).

Importantly, however, these interventions were driven by superpower competition (Dobbins et al. 2007) and their ultimate aim was less 'democratization' than keeping countries in the Western bloc. Indeed, the concept of 'democratization' gradually evolved from "demilitarisation, denazification, and re-education of an entire country's population" to being "equated with the fight against communism" (von Hippel 2000: 9). According to Schmitz (2006: 10), the United States "[supported] pro-Western dictators who would provide stability, support for American Cold War policies, and a favourable atmosphere for American business". Local institutional factors (including democratic governance, human rights protection and anti-corruption measures) arguably played only a secondary role.

With the end of the Cold War and the perceived victory of the liberal-democratic Western model (famously, Fukuyama 1989), international peace and security became the dominant US goal (again). The United States started to cooperate with the United Nations and its branches, NGOs and other multinational actors more frequently to promote these common interests (von Hippel 2000).[9] This was necessary because there were – partly because of the loss of external benefactors (including the United States) – more cases of politically, economically and socially fragile countries on the brink of becoming 'failed states'.[10] Ideas of a 'democratic' or 'capitalist peace' (Choi 2011) played an increasing role by replacing the "doctrine of containment [with] a strategy of enlargement of the world's free community of market democracies" (Lake 1993: 659).

9   According to von Hippel (2000: 10), policy measures included programmes "that strengthen the rule of law, enhance respect for human rights, support international electoral observers, improve financial management and accountability, promote decentralisation, expand civilian control of the military, and improve electoral processes, the judicial system, the police, legislatures, political parties, the media, and education at all levels of society."

10 Following Miller (2011: 70-1), statehood comprises "five complementary aspects: security, legitimacy, capacity, prosperity, and humanity. To put it somewhat abstractly, states must be able to exercise coercion; articulate a theory of justice to legitimize their coercion; operate institutions to provide other goods and services; exchange and use goods and services; and orient their activities toward human flourishing. They are mediators of violence, justice, the social contract, economic exchange, and the human community. State failure can be understood under the same headings. States can fail in any of these five aspects of statehood, suggesting a typology of five types of a failed state: anarchic, illegitimate, incompetent, unproductive, and barbaric."

The 'War on Terror' started the most recent turn in US interventionism. Similar to the Cold War, countries could win the support of the United States when they entered the alliance against global terrorism. As Schmidt (2013: 213) puts it, "African dictators who had appealed to the West by playing up the communist menace were replaced by a new generation of strongmen who won support by cooperating in the fight against terrorism". Rather than using long-run prevention strategies to fight terrorism through strengthening local political institutions and economic development, security concerns became dominant and lead to support for mainly (short-run) state capacity for countering terrorism (e.g. Fleck and Kilby 2010).

3 SUCCESS AND FAILURE OF ALTERNATIVE STRATEGIES FOR INTERVENTION AND COUNTER-TERRORISM POLICIES

As discussed above, the potential failure or success of US interventionism may result from both US policy decisions and the local situation, where both aspects can interact in problematic ways. That is, poor policy choices may get aggravated in an institutionally weak society and when involved actors' interests diverge:[11]

> *The interests of local leaders and the intervening power almost always diverge.*
> *And local populations almost always resent foreign occupations and are unlikely*
> *to buy-in into the new system. Finally, the intervenors desire for quick results*
> *can undermine the state-building process, which has taken some countries*
> *several centuries to achieve.*
> Wunische (2022)

Consequently, US military interventionism often does not achieve its main goals because it frequently produces unintended consequences. These consequences will make it almost impossible to reach a development path that achieves the desired goals in the medium and long run. At the same time, an initially successful intervention (as in Afghanistan) may eventually turn problematic because, for example, experiences of corruption become more and more prevalent.

It is certainly not surprising that US interventionism has led to hostility from local populations and governments. For the Vietnam War, Kocher et al. (2011) and Dell and Querubin (2018) show that aerial bombing increased the military and political activities of insurgents, while weakening local governance and control as well as popular support for the US and the South Vietnamese government (see Chapter 22 of this eBook by Dell and Querubin). However, the opposite of a strategy of 'overwhelming firepower' (Dell and Querubin 2018) may lead to unintended and undesired effects as well, as Nunn and Qian (2014) indicate. They show that the provision of US food aid did not have a stabilising

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11 For instance, while economic liberalisation has the potential to create economic growth, a corrupt local elite may undermine the desired economic outcomes.

effect but increased the incidence and duration of civil conflict in recipient countries.[12] At the same time, evidence also points to other US policy choices potentially producing more favourable outcomes. For instance, Berman et al. (2011) for Iraq and Dell and Querubin (2018) for Vietnam show that strategies aimed at 'winning hearts and minds' may very well reduce insurgents' activities.

As stressed above, US interventions are not only carried out to stabilise foreign countries but also to aid the United States. In the global 'War on Terror', the United States also intervenes abroad to reduce the generation of more (transnational) terrorist activity against US interests. This raises the question of whether US policies have been successful in this regard or whether they also produced unintended consequences. Here, a small body of literature deals particularly with the nexus between US international involvement – ranging from US military aid, to the presence of US troops and US political support in international organisations – and anti-American terrorism.

Neumayer and Plümper (2011) show that US involvement correlates with more anti-American terrorism emanating from the targets of the intervention. They argue that attacking Americans is more attractive to domestic terrorists the more the terrorists' home government depends on military support from the United States. A similar finding is presented in Krieger and Meierrieks (2015). Similarly, Gries et al. (2015) find that local repression interacts unfavourably with US military aid to contribute to the production of anti-American terrorism in the aid-receiving country. Again, these studies point to the potentially unfavourable interaction between US policy choices and local economic and political institutions. By contrast, Saiya et al. (2017) find that the promotion of women's rights enhances US national security. Similarly, Meierrieks and Gries (2020) do not find evidence that US political support for Israel generates terrorism against US targets.

While providing interesting insights on the correlation between US interventionism and anti-US terrorism, none of these studies includes causal estimates. This is different from the findings we present in the next section.

4 US MILITARY AID AND ANTI-AMERICAN TERRORISM

Between 1968 and 2018, the United States gave approximately $600 billion (inflation-adjusted) in foreign military assistance; in 2018 alone, it spent about $12 billion on military aid (USAID 2019). The United States Agency for International Development defines military aid as assistance that subsidises or substantially enhances the military capability of the recipient country (USAID 2019). For instance, the United States gives financial aid to facilitate the training of military personnel or the purchase of weapons

12 Sexton (2016) shows that the provision of US counterinsurgency aid leads to an increase in insurgent violence when allocated to contested districts in Afghanistan.

and military supply. That is, the provision of military aid is ultimately intended be in the service of nation building by contributing to the internal military and political stability of the recipient country.

At the same time, the provision of military aid is also expected to serve US political, commercial and security interests. For instance, US policymakers emphasise that aid-receiving countries are less likely to produce anti-American terrorism. Between 1968 and 2018, the world saw over 3,600 transnational terrorist attacks against American interests, most notably the 9/11 attacks on New York City and Washington, DC (Mickolus et al. 2019). These attacks were associated with noticeable socioeconomic costs, such as the destruction of property and human life as well as adverse macroeconomic effects (Meierrieks and Gries 2013, Gaibulloev and Sandler 2019). Consequently, for the United States, there is a clear utility associated with providing military aid if this type of aid curtails anti-American extremism. From a theoretical perspective, bolstering state capacity in aid-receiving countries is expected to make it costlier for terrorist organizations to operate – for example, by increasing the likelihood of government punishment (Schneider et al. 2015). *Ceteris paribus*, higher costs of carrying out terrorism are expected to reduce the production of terrorism.[13]

For a sample of 174 countries between 1968 and 2018, we study how US military aid affects (1) anti-American terrorism and (2) military and economic-political conditions in aid-receiving countries (Dimant et al. 2022). Due to endogeneity concerns, we employ an instrumental-variable (IV) strategy to estimate associated effects. For instance, military aid may also *respond* to terrorist activity (Bapat 2011, Boutton and Carter 2014, Bezerra and Braithwaite 2016). That is, the United States may increase its military aid to a country after the country has become prominently associated with anti-American extremism (e.g. Afghanistan and Pakistan after the 9/11 terrorist attacks).

For our IV strategy, we instrument the local receipt of US military aid by US military aid provided to other parts of the world, exploiting variation in global levels of US military aid.[14] Our instrument is *relevant* because recipient countries will be affected by an increase or decrease in US military aid associated with programmes to other parts of the world. It is *exogenous* because aid recipient countries have no leverage to influence the distribution of US military aid associated in other parts of the world. Rather, the global level of military aid is dependent on economic, political and geo-strategic considerations *within the United States* (e.g. Irwin 2000, Newhouse 2009). For instance, it may be affected by budgetary considerations in the United States and the relative political power of isolationist/interventionist US policymakers.

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13 This argument follows from a rational economic perspective on terrorism, where the (opportunity) costs and benefits of terrorism determine the utility-maximising choice between violence (terrorism) and non-violence. Rational economic models of terrorism are discussed, for example, in Caplan (2006) and Schneider et al. (2015).
14 Our IV approach follows, for example, Dube and Naidu (2015) and Auer and Meierrieks (2021).

We show that higher levels of military aid result in *more* anti-American terrorism in recipient countries. This finding survives a battery of robustness checks such as alternative measurements of military aid and anti-American terrorism, as well as the use of alternative and placebo instruments.

This finding obviously contradicts US intentions. To better understand why US military aid makes the United States less safe, we empirically investigate how US military aid affects state capacity (e.g. with respect to the strength of the military) as well as institutional conditions (e.g. with respect to corruption) in recipient countries. We find no evidence that US military aid contributes to increased local state capacity. In contrast to the stated intentions of the United States, there is no evidence that military aid substantially enhances the military capability of the recipient country. Furthermore, we show that more US military aid leads to more corruption and exclusionary policies in recipient countries. The latter effects may explain how US military aid translates into stronger anti-American resentment. US military aid allows the recipient country's politicians and bureaucrats to act as gatekeepers and create 'winners and losers', with the winners disproportionately benefiting by sharing in the rents from aid.[15] At the same time, anti-American resentment develops among the losers, i.e. those parts of the population that do not have access to political and economic benefits arising from aid. For these population groups, US military aid constrains the means of economic and political participation, which encourages anti-American terrorism.[16]

5 CONCLUDING REMARKS

Discussing the role of military interventionism and aid in nation-building, we have emphasised that the intervention strategies of foreign actors like the United States often unfavourably interact with local institutional settings, which produces undesired outcomes not only for the target country of foreign intervention but also the intervening power.

In line with these main findings, our empirical work (Dimant et al. 2022) shows that US military aid has not been successful in enhancing military capacity in the recipient countries of military aid, but has rather contributed to exclusion and corruption. These unfavourable effects are, in turn, likely to produce anti-American resentment. For instance, in the case of Afghanistan, Weigand (2022) argues that ordinary people often did not perceive local governments that received support from the United States as working in their interest but as being extractive and corrupt. Consequently, the local population could have considered US military aid as exacerbating and prolonging this

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15 Note that this presumes a certain degree of aid fungibility, i.e. the ability of the recipient country to spend targeted aid on non-targeted programs. Deger and Sen (1991) and Khilji and Zampelli (1994) show that military aid is indeed as fungible as economic aid, implying that military assistance may also be used to benefit the local government outside of the military sphere.

16 This argument taps into the broader literature on the role of grievances in political violence (e.g. Fearon and Laitin 2003, Collier and Hoeffler 2004, Blattman and Miguel, 2010; Djankov et al. 2008).

problem, which may have given rise to anti-American sentiment. Our empirical analysis for a global sample indicates that this argument generalises: more US military aid leads to more rather than less anti-American terrorism, while at the same time not adequately supporting local nation-building efforts.

REFERENCES

Auer, D and D Meierrieks (2021), "Merchants of Death: Arms Imports and Terrorism", *European Economic Review* 137, 103813.

Bapat, N A (2011), "Transnational Terrorism, US Military Aid, and the Incentive to Misrepresent", *Journal of Peace Research* 48(3): 303–318.

Berman, E, J N Shapiro and J H Felter (2011), "Can Hearts and Minds be Bought? The Economics of Counterinsurgency in Iraq", *Journal of Political Economy* 119(4): 766–819.

Bezerra, P and A Braithwaite (2016), "Locating Foreign Aid Commitments in Response to Political Violence", *Public Choice* 169(3): 333–355.

Blattman, C and E Miguel (2010), "Civil War", *Journal of Economic Literature* 48(1): 3–57.

Boutton, A and D B Carter (2014), "Fair-weather Allies? Terrorism and the Allocation of US Foreign Aid", *Journal of Conflict Resolution* 58(7): 1144– 1173.

Caplan, B (2006), "Terrorism: The Relevance of the Rational Choice Model", *Public Choice* 128(1): 91–107.

Choi, S-W (2011), "Re-evaluating Capitalist and Democratic Peace Models", *International Studies Quarterly* 55(3): 759-769.

Collier, P and A Hoeffler (2002), "Aid, Policy and Peace: Reducing the Risks of Civil Conflict", *Defence and Peace Economics* 13(6): 435–450.

Collier, P and A Hoeffler (2004), "Greed and Grievance in Civil War", *Oxford Economic Papers* 56(4): 563–595.

Crawford, N C (2021), *The US Budgetary Costs of the Post-9/11 Wars*, Watson Institute for International and Public Affairs, Brown University.

Crost, B, J Felter and P Johnston (2014), "Aid under Fire: Development Projects and Civil Conflict", *American Economic Review* 104(6): 1833–56.

De Ree, J and E Nillesen (2009), "Aiding Violence or Peace? The Impact of Foreign Aid on the Risk of Civil Conflict in Sub-Saharan Africa", *Journal of Development Economics* 88(2): 301–313.

Deger, S and S Sen (1991), "Military Expenditure, Aid, and Economic Development", *World Bank Economic Review* 5(Suppl. 1): 159–186.

Dell, M and P Querubin (2018), "Nation Building through Foreign Intervention: Evidence from Discontinuities in Military Strategies", *Quarterly Journal of Economics* 133(2): 701–764.

Dimant, E, T Krieger and D Meierrieks (2022), "Paying Them to Hate US: The Effect of U.S. Military Aid on Anti-American Terrorism, 1968-2018", SSRN Working Paper.

Djankov, S, J G Montalvo and M Reynal-Querol (2008), "The Curse of Aid", *Journal of Economic Growth* 13(3): 169–194.

Dobbins, J, S G Jones, K Crane and B C DeGrasse (2007), *The Beginner's Guide to Nation-building*, Rand Corporation.

Dobbins, J, M A Poole, A Long and B Runkle (2008), *After the War: Nation-Building from FDR to George W. Bush*, RAND Corporation.

Dube, O and S Naidu (2015), "Bases, Bullets, and Ballots: The Effect of US Military Aid on Political Conflict in Colombia", *Journal of Politics* 77(1): 249–267.

Fearon, J D and D D Laitin (2003), "Ethnicity, Insurgency, and Civil War", *American Political Science Review* 97(1): 75–90.

Fleck, R K and C Kilby (2010), "Changing Aid Regimes? U.S. Foreign Aid from the Cold War to the War on Terror", *Journal of Development Economics* 91(2): 185–197.

Fukuyama, F (1989), "The End of History?", *The National Interest* 16: 3–18.

Gaibulloev, K and T Sandler (2019), "What we Have Learned about Terrorism since 9/11", *Journal of Economic Literature* 57(2): 275–328.

Gries, T, D Meierrieks and M Redlin (2015), "Oppressive Governments, Dependence on the USA, and Anti-American Terrorism", *Oxford Economic Papers* 67(1): 83–103.

Grossman, H I (1992), "Foreign Aid and Insurrection", *Defence and Peace Economics* 3(4): 275–288.

Irwin, L G (2000), "Dancing the Foreign Aid Appropriations Dance: Recurring Themes in the Modern Congresses", *Public Budgeting and Finance* 20(2): 30–48.

Khilji, N M and E M Zampelli (1994), "The Fungibility of US Military and Non-military Assistance and the Impacts on Expenditures of Major Aid Recipients", *Journal of Development Economics* 43(2): 345–362.

King, A (2022), "Why Did the Taliban Win?", *Armed Forces and Society*, OnlineFirst.

Kocher, M A, T B Pepinsky and S N Kalyvas (2011), "Aerial Bombing and Counterinsurgency in the Vietnam War", *American Journal of Political Science* 55(2): 201–218.

Krieger, T and D Meierrieks (2015), "The Rise of Capitalism and the Roots of Anti-American Terrorism", *Journal of Peace Research* 52(1): 46–61.

Lake, A (1993), "From Containment to Enlargement", *US Department of State Dispatch* 4 (39): 658–664

Linantud, J L (2008), "Pressure and Protection: Cold War Geopolitics and Nation-building in South Korea, South Vietnam, Philippines, and Thailand", *Geopolitics* 13(4): 635–656.

Meierrieks, D and T Gries (2013), "Causality between Terrorism and Economic Growth", *Journal of Peace Research* 50(1): 91–104.

Meierrieks, D and T Gries (2020), "'Pay for it heavily': Does US Support for Israel Lead to Anti-American Terrorism?", *Defence and Peace Economics* 31(2): 160–176.

Mickolus, E F, T Sandler, J M Murdock and P Flemming (2019), "International Terrorism: Attributes of Terrorist Events (ITERATE), 1968-2018", International Terrorism Data Center (accessed 6 September 2022).

Miller, P D (2011), "The Case For Nation-Building: Why and How to Fix Failed States", *Prism* 3(1): 63–74.

Miller, P D (2013), *Armed State Building: Confronting State Failure, 1898-2012*, Cornell University Press.

Neumayer, E and T Plümper (2011), "Foreign Terror on Americans", *Journal of Peace Research* 48(1): 3–17.

Mylonas, H (2013), *The Politics of Nation-Building: Making Co-Nationals, Refugees, and Minorities*, Cambridge University Press.

Newhouse, J (2009), "Diplomacy, Inc.: The Influence of Lobbies on US Foreign Policy", *Foreign Affairs* 88(3): 73–92.

Nunn, N and N Qian (2014), "US Food Aid and Civil Conflict", *American Economic Review* 104(6): 1630–66.

Ottaway, M (2002), "Nation Building", *Foreign Policy* 132: 16–24.

Rohner, D (forthcoming), "Mediation, Military, and Money: The Promises and Pitfalls of Outside Interventions to End Armed Conflicts", *Journal of Economic Literature*.

Sambanis, N, S Skaperdas and W C Wohlforth (2015), "Nation- building through War", *American Political Science Review* 109(2): 279–296.

Saiya, N, T Zaihra and J Fidler (2017), "Testing the Hillary Doctrine: Womens Rights and Anti-American Terrorism", *Political Research Quarterly* 70(2): 421–432.

Schmidt, E (2013), *Foreign Intervention in Africa: From the Cold War to the War on Terror*, Cambridge University Press.

Schmitz, D F (2006), *The United States and Right-wing Dictatorships, 1965- 1989*, Cambridge University Press.

Schneider, F, T Brck and D Meierrieks (2015), "The Economics of Counterterrorism: A Survey", *Journal of Economic Surveys* 29(1): 131–157.

Sexton, R (2016), "Aid as a Tool Against Insurgency: Evidence from Contested and Controlled Territory in Afghanistan", *American Political Science Review* 110(4): 731–749.

Strange, A M, A Dreher, A Fuchs, B Parks and MichMael Tierney (2017), "Tracking Underreported Financial Flows: China's Development Finance and the Aidconflict Nexus Revisited", *Journal of Conflict Resolution* 61(5): 935–963.

USAID (2019), "U.S. Overseas Loans and Grants: Obligations and Loan Authorizations, July 1, 1945-September 30, 2019" (accessed 6 September 2022).

Von Hippel, K (2000), *Democracy by Force: US Military Intervention in the Post-Cold War World*, Cambridge University Press.

Weigand, F (2022), "Why Did the Taliban Win (Again) in Afghanistan?", *LSE Public Policy Review* 2(3): 1–10.

Wunische, A (2022), "A Warning to Statebuilders", *Political Violence at a Glance*, 28 January.

ABOUT THE AUTHORS

Eugen Dimant is an Associate Professor of Practice in Behavioral and Decision Sciences at the University of Pennsylvania. His research interests center on experimental behavioral economics with a particular focus on social norms, behavior change, political polarization, and ethical decision-making. As a secondary interest, he is also involved in empirical research examining the relationships between corruption, terrorism, and migration.

Tim Krieger is a Professor of Economics at the University of Freiburg, Germany. His research interests focus on institutions, development and conflict as well as international factor mobility (esp. migration).

Daniel Meierrieks is a Senior Research at the WZB Berlin Social Science Center. He previously held positions at the University of Freiburg and at the University of Kiel. His current research interests include the causes and consequences of terrorism as well as the determinants of international migration with a special emphasis on the role of climate change.

CHAPTER 22
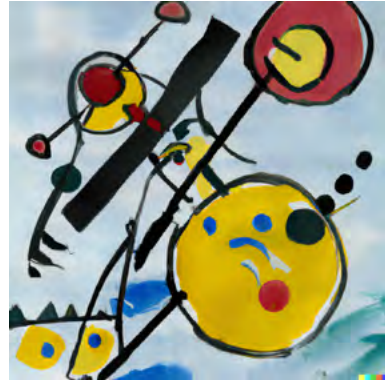
Nation building through foreign military intervention? Evidence from the Vietnam War

Melissa Dell[a] and Pablo Querubin[b]
[a]Harvard University; [b]New York University

Throughout the post-World War II era, interventions in weakly institutionalised societies have been central to US foreign policy. These interventions have employed strategies ranging from the use of overwhelming firepower to bottom-up initiatives to win 'hearts and minds' through development aid and civic engagement. Debates about whether and how such interventions should be pursued remain central to US public discourse, most recently in the context of discussions around the failure of state-building in Afghanistan following the US withdrawal from that country in August 2021.

A central goal in US interventions has been to create a state monopoly on violence that will persist after US withdrawal. Achieving this goal requires both a capable state and citizen compliance. While it may be "relatively easy to disperse insurgent forces by purely military action", writes the military scholar David Galula (1964), "it is impossible to prevent the return... unless the population cooperates". Top-down approaches to foreign intervention emphasise raising the costs of opposition to the state as a means of obtaining citizen compliance, whereas bottom-up approaches aim to increase the benefits of supporting the state by providing public goods, economic aid and political opportunities.

TOP-DOWN VERSUS BOTTOM-UP

The top-down overwhelming firepower approach was famously advocated by Vietnam War General William DePuy, who argued that "the solution in Vietnam is more bombs, more shells, more napalm" (Sheehan 1988). A crasser adage of the era held that one must "get the people by the balls and their hearts and minds will follow" (Kodosky 2007). This view has also been advanced as an effective way to promote a monopoly on violence by prominent social scientists. Huntington (1968) posited that air strikes could be used to establish social control, and that modernisation would organically follow. Economist and National Security Adviser Walt Rostow argued that countering a communist insurgency required "a ruthless projection to the peasantry that the central government intends to be the wave of the future" (Milne 2008).

Other social scientists have emphasised the downside risks of attempting to gain citizens' cooperation with the state through the use of force. James Scott (1985, 2009) cautions that such an approach is likely to backfire, as citizens have a variety of means to undermine a state they do not genuinely support – even without going so far as to join an armed rebellion. When states try to impose a simplified order from above, their failure to understand local realities, and tendencies to disrupt them, can cause the campaign to fail (Scott 1998). These concerns suggest the value of an alternative approach focused on building bottom-up support, as embraced by the US Marine Corps (USMC) counterinsurgency doctrine: "a positive program of civil assistance must be conducted to eliminate the original cause of the resistance movement" (USMC 1962).

Adjudicating between these competing views of intervention strategies presents clear inferential difficulties. First among these challenges is the fact that researchers generally cannot know the exact process by which military decision makers select their targets for top-down versus bottom-up strategies. On the one hand, we might suppose that military planners are more likely to use overwhelming firepower in areas where the population is more strongly predisposed to resist the intervention. A naïve analysis under such conditions would uncover a positive relationship between bombing and resistance, for example, but we would be mistaken to infer that the bombing caused the backlash. Alternatively, we might expect that military planners direct their overwhelming firepower in precisely those areas where they believe it will be least likely to spur civilian resistance. Then, an observed negative relationship between bombing and resistance would be similarly misleading, in the opposite direction.

Randomised control trials – that is, randomly assigning an experimental treatment in a manner that is independent of these sorts of confounding factors – are clearly infeasible and unethical when the 'treatment' of interest is a bombing campaign or other deployment of military force. In this context, the best a researcher can hope to do is to examine military strategies that were deployed in some places but not others, for reasons unrelated to any characteristics of the locations which would also play a role in shaping

the intervention outcomes we wish to study. Any differences across locations following the deployment of different military strategies could then be attributed to the military actions themselves, and not to other underlying distinctions.

The Vietnam War provides a particularly rich setting in which to apply this approach. Quantitative metrics for resource allocation were used to an unprecedented extent during the war, spearheaded by Secretary of Defense Robert McNamara and the systems-analysis perspective that he brought to the Department of Defense (DoD). McNamara pioneered the use of operations research in the private sector during his previous tenure as president of Ford Motor Company. Upon his appointment as Secretary of Defense at the start of the Kennedy administration, McNamara surrounded himself with 'whiz kid' analysts from the Rand Corporation, aiming to bring economics and operations research into the DoD. This produced policies and data that offer unique opportunities for estimating causal impacts.

BOMBING CIVILIAN POPULATION CENTRES IN VIETNAM

Aerial bombing was central to the US military campaign in Vietnam: the Air Force received over half of Vietnam wartime appropriations, and twice as many tonnes of explosives were dropped during the war as during World War II (Thayer 1975). Our study exploits a newly discovered algorithmic component of the US bombing strategy in Vietnam that includes discontinuities useful for identifying causal effects (Dell and Querubin 2018).

In selecting its bombing targets, the US Air Force relied on quantitative scoring of the security of Vietnamese population centres. An assessment of 169 questions on security, political and economic characteristics of each hamlet (a geographical unit smaller than a village) was conducted periodically, and fed into a Bayesian algorithm to produce a single hamlet security rating. The output ranged continuously from 1 to 5 (where 1 meant 'very insecure' and 5 meant 'very secure') but was rounded to the nearest whole number. Due to computational constraints, the continuous scores were not saved or printed from the mainframe computer, and Air Force planners only saw the rounded scores.

Our study identifies the causal impacts of bombing by comparing places just below and just above the rounding thresholds. To do so, we recovered both the question responses and the algorithm used to compute the security scores, recomputed the continuous scores (which have not been preserved), and confirmed that these continuous scores rounded to the same discrete values used by the Air Force planners (which have been preserved). Hamlets with continuous scores of 4.499 and 4.501, for instance, are extremely similar in all ways prior to the bombing, but those just below the 4.5 rounding threshold were substantially more likely to be bombed than those above it. A comparison of outcomes across these groups of hamlets provides a close approximation to the experimental ideal, holding equal the background conditions which might also affect intervention outcomes.

Estimates reveal that the bombing of South Vietnamese population centres backfired. An increased intensity of bombing caused an increase in participation in Viet Cong (VC) military and political activities, and increased the volume of VC attacks on troops and civilians. An increase in bombing instigated a vicious cycle, as the initial deterioration in security then entered the next quarter's security score, increasing the probability of future bombing and hence leading to sustained increases in VC activity. Moreover, bombing reduced tax collection by local governments, decreased access to primary education and reduced participation in civic organisations – undermining the stated US intervention objectives of building a strong state and an engaged civic society that would provide a bulwark against communism after US withdrawal. To the extent that bombings had spillover effects on nearby geographic areas, the impacts tend to go in the same direction as the effects on the locations that were bombed.

Interviews of VC prisoners and defectors point to citizen grievances against the government as a prominent factor explaining the backlash to the US bombing campaign (Denton 1968). These grievances were especially acute among those who had a civilian family member killed in US or South Vietnamese attacks – providing strong motivation to join the VC in resistance. Civilian casualties and property damage seem to be particularly detrimental to the efforts to establish the trust between government and citizens that underlies an effective social contract.

COMPARING STRATEGIES OF THE ARMY AND THE MARINES

While the analyses discussed above examine the impact of varying intensities of 'overwhelming firepower', a separate piece of our study also sheds light on how this top-down approach compares to a qualitatively different bottom-up strategy. The study exploits another natural experiment: the division of South Vietnamese territory into areas commanded by two branches of the US military with divergent counterinsurgency doctrines. From 1965 to 1970, the USMC commanded Military Region I, the northernmost military region of South Vietnam, while the US Army commanded the adjacent Military Region II.

The Marines emphasised winning hearts and minds among the populace, providing development programmes and enhancing security by embedding soldiers in local communities (USMC 2009). Their approach was motivated by the view that "in small wars the goal is to gain decisive results with the least application of force… the end aim is the social, economic, and political development of the people" (USMC 1940). In contrast, the Army relied on overwhelming firepower deployed through search-and-destroy raids (Krepinevich 1986, Long 2016). Evidence points to this difference in counterinsurgency strategies as a central distinction between the Army and Marines.

The boundaries of the military regions followed pre-existing province boundaries, and hamlets on either side of the boundary between the Army- and Marine-controlled regions were similar across all observable measures prior to 1965. This similarity allows us to attribute any post-invasion differences across the boundary to differences in counterinsurgency strategies by the two US military branches.

The analysis reveals a pattern consistent with the effects of the bombing campaign discussed above: hamlets just to the USMC side of the boundary were less likely to have a VC presence than those just to the Army side. Public opinion data further document that citizens in the USMC region reported less anti-American sentiment and more positive attitudes towards all levels of South Vietnamese government than did citizens in the Army region.

Altogether, the evidence from the algorithmic discontinuities in bombing intensity, along with the geographic discontinuities in counterinsurgency strategies, provides empirical support for the merits of the bottom-up, 'hearts and minds'-oriented approach, relative to the top-down, overwhelming firepower approach. However, it cannot similarly speak to the broader question of whether a bottom-up approach is more effective at achieving US objectives than refraining from intervention – a question for which empirical evidence remains sparse.

EVIDENCE FROM OTHER BOMBING CAMPAIGNS

While the Vietnam War and its historical record of quantitative inputs to military decision making provide a particularly rich setting for empirical investigation, recent research has yielded insights into the impacts of military intervention strategies from a range of other historical contexts as well.

In an analysis of the second-largest bombing campaign in history – the Allied bombing offensive against Germany in World War II – Adena et al. (2021) find the bombing campaign was effective in undermining both the combat motivation of German soldiers and popular support for the Nazi regime. However, there are many differences between great power conflicts and asymmetric insurgent wars, which make it difficult to pinpoint why similar strategies may lead to very different outcomes.

Studying the more recent US military campaign in the 'War on Terror', Mahmood and Jetter (2022) find that drone strikes in Pakistan increase support for terrorist groups among the general Pakistani populace. This backlash manifests in a number of ways, from negative media coverage to public protests, to increased incidence of terror attacks. The authors estimate that 16% of all terror attacks in Pakistan from 2006 to 2016 are attributable to the backlash against US drone strikes. Despite technological improvements over the last half-century which were designed to enable better-targeted bombing campaigns with less collateral damage, it appears that modern-day airstrikes can be as counterproductive as they were in the Vietnam era.

Looking beyond the immediate objectives of the military campaign, Riano and Valencia-Caicedo (2022) find evidence of a long-run detrimental impact of the US 'secret war' in Laos from 1964–1973 on contemporary economic development. This finding contrasts with a similar analysis in Vietnam, where heavier-bombed areas exhibited lower growth for two decades after the conflict but faster growth after that (Miguel and Roland 2011). The authors attribute this difference to the far greater presence of unexploded ordnance remaining in Laos after the conflict as compared to Vietnam – highlighting the importance of differences not only in high-level military strategies but also in the particular technologies of conflict and efforts at post-conflict reconstruction as well.

MIXED EFFECTIVENESS OF 'HEARTS AND MINDS' CAMPAIGNS

As in the Vietnam War, US military interventions in the post-9/11 era have employed a combination of top-down and bottom-up approaches in their efforts to enhance the security and stability of their allied governments in the face of domestic insurgencies. The bottom-up approaches in these contemporary contexts likewise show a stronger – though by no means unblemished – record of success.

Examining US-led postwar reconstruction efforts in Iraq from 2004 to 2008, Berman et al. (2011) find that increased reconstruction spending led to a decrease in insurgent violence against coalition and government forces. The authors highlight citizens' willingness to support the government through information-sharing as a key mechanism explaining the effectiveness of these expenditures for US counterinsurgency objectives. In the context of the Taliban insurgency in 2011, Lyall et al. (2013) show that harm mitigation efforts by US-led forces in Afghanistan – in the form of condolence payments to victims of violence or their families – improved citizens' relative support for US-led forces vis-à-vis the Taliban. (The aggregate effect of being victimised, even with a condolence payment, was still a reduction in support for the US-led coalition in absolute terms.)

The effectiveness of these bottom-up approaches, however, proves highly contingent on the particular circumstances in which they are applied. Sexton (2016) finds that US counterinsurgency aid in Afghanistan had its intended effect of reducing insurgent violence only in areas already firmly controlled by government forces; the same aid delivered in contested areas actually increased insurgent violence. The reason for this finding, the author suggests, is that rebels are incentivised to use violence to undermine the implementation of aid projects precisely when those projects would be politically beneficial to the government in projecting an image of stability and winning over the hearts and minds of the population. A similar pattern has been shown in the Philippines (Crost et al. 2014), where development aid provided by the World Bank likewise caused an increase in insurgent violence aimed at sabotaging the projects' implementation.

LESSONS LEARNED?

This evidence from Afghanistan and Iraq following the September 11th attacks suggests that the lessons from previous failings in Vietnam were not fully internalised by the United States. With the US withdrawal from Afghanistan in August 2021 leading to the immediate collapse of the US-backed government and takeover by the Taliban insurgents, the question remains open as to whether – or when – the United States will fall into the same pattern again.

The research discussed here provides evidence of the consequences of different forms and intensities of military interventions aimed at undermining insurgencies and strengthening foreign-backed governments. The broader counterfactual – whether it is better to intervene at all, or to refrain from doing so in any manner – is a far more challenging one to assess. At the very least, social-scientific evidence may provide policymakers with a more realistic and empirically grounded understanding of the actual policy options they face, and how those options might advance or undermine the objectives they hope to achieve.

REFERENCES

Adena, M, R Enikolopov, M Petrova and H-J Voth (2021), "Bombs, Broadcasts and Resistance: Allied Intervention and Domestic Opposition to the Nazi Regime during World War II", unpublished manuscript.

Berman, E, J N Shapiro and J H Felter (2011), "Can Hearts and Minds Be Bought? The Economics of Counterinsurgency in Iraq", *Journal of Political Economy* 119(4): 766–819.

Crost, B, J Felter and P Johnston (2014), "Aid under Fire: Development Projects and Civil Conflict", *American Economic Review* 104(6): 1833–56.

Dell M and P Querubin (2018), "Nation Building Through Foreign Intervention: Evidence from Discontinuities in Military Strategies", *Quarterly Journal of Economics* 133(2): 701–764.

Denton, F (1968), *Volunteers for the Viet Cong*, RAND Corporation.

Galula, D (1964), *Counterinsurgency Warfare: Theory and Practice*, Praeger.

Huntington, S P (1968), "The Bases of Accommodation", *Foreign Affairs* 46: 642–656.

Kodosky, R J, (2007), *Psychological Operations American Style: The Joint United States Public Affairs Office, Vietnam and Beyond*, Lexington Books.

Krepinevich, A F (1986), *The Army and Vietnam*, Johns Hopkins University Press.

Long, A (2016), *The Soul of Armies: Counterinsurgency Doctrine and Military Culture in the US and UK*, Cornell University Press.

Lyall, J, G Blair and K Imai (2013), "Explaining Support for Combatants during Wartime: A Survey Experiment in Afghanistan", *American Political Science Review* 107(4): 679–705.

Mahmood, R and M Jetter (2022), "Gone with the Wind: The Consequences of US Drone Strikes in Pakistan", *The Economic Journal*.

Miguel, E and G Roland (2011), "The Long-Run Impact of Bombing Vietnam", *Journal of Development Economics* 96: 1–15.

Milne, D (2008), *America's Rasputin: Walt Rostow and the Vietnam War*, Macmillan.

Riano J F and F Valencia-Caicedo (2022), "Collateral Damage: The Legacy of the Secret War in Laos", unpublished manuscript.

Scott, J C (1985), *Weapons of the Weak: Everyday Forms of Peasant Resistance*, Yale University Press.

Scott, J C (1998), *Seeing Like a State: How Certain Schemes to Improve the Human Condition have Failed*, Yale University Press.

Scott, J C (2009), *The Art of Not Being Governed: An Anarchist History of Upland Southeast Asia*, Yale University Press.

Sexton, R (2016) "Aid as a Tool against Insurgency: Evidence from Contested and Controlled Territory in Afghanistan", *American Political Science Review* 110(4): 731–749.

Sheehan, N (1988), *A Bright Shining Lie: John Paul Vann and America in Vietnam*, Vintage.

Thayer, T C (1975), *A Systems Analysis View of the Vietnam War: 1965-1972*, Defense Technical Information Center.

USMC – United States Marines Corps (1940), *Marine Corps Manual*.

USMC (1962), "Operations against Guerrilla Forces, FMFM-21".

USMC (2009), *Vietnam War: U.S. Marine Corps Official History Volumes*, USMC History and Museums Division.

ABOUT THE AUTHORS

Melissa Dell is the Andrew E. Furer Professor of Economics at Harvard University. She is the 2020 recipient of the John Bates Clark Medal. Her research focuses on economic growth and political economy. She has examined the factors leading to the persistence of poverty and prosperity in the long run, the effects of trade-induced job loss on crime, the impacts of US foreign intervention, and the effects of weather on economic growth.

She has also developed deep learning methods for curating social science data at scale. She received an AB in Economics from Harvard in 2005, an MPhil in Economics from Oxford in 2007, and a PhD in Economics from MIT in 2012.

Pablo Querubin is an Associate Professor of Politics and Economics at New York University (NYU). His research focuses on the political economy of development, with an emphasis on understanding the challenges to state building, and the role of political and economic elites in subverting democracy through the use of violence and clientelism. He holds a Ph.D in Economics from the Massachusetts Institute of Technology (2010) and completed his undergraduate and master's studies at Universidad de los Andes in Bogotá, Colombia. He is a Research Associate at the National Bureau of Economic Research (NBER) and a member of Evidence in Governance and Politics (EGAP).

CHAPTER 23

Identity formation under occupation and external threats: Evidence from Alsace-Lorraine and the annexation of Crimea

Kai Gehring
University of Zurich

1 INTRODUCTION

In the words of Anderson (2006), modern nation-states are 'imagined communities'. They are comprised of heterogenous lower-level units that differ in language, religion or history, and are bound together by a sense of common identity. Of course, there are common interests and institutions formalising and organising collective action, but group identities shape how much we trust in and are willing to cooperate with members of other groups even within established political units.

An overwhelming number of political events have reminded us of the importance of group identities. Both the support among the Russian population for the invasion of Ukraine in 2022, as well as the fierce resistance of Ukrainians, cannot be understood solely as an isolated individual optimisation. Brexit highlighted how wrong most economists were in overestimating the importance of an economic calculus over group-based identity and cultural questions. The success of secessionist movements in Catalonia and Scotland demonstrates that strong lower-level group identities still exist and can be used by political entrepreneurs and parties.

Group identity is a two-edged sword. Identity can be framed as 'nationalism' and has the power to unite people behind aggressive policies of leaders such as Hitler, Stalin or Putin. However, a sense of joint identity also enables the rise and resistance against such forces of evil. Or moving to more familiar terrain for most economists, a joint identity is also a prerequisite for social insurance and the modern welfare state. To channel taxpayer money to cushioning other members of society against various shocks, there must be enough compassion to identify with the destiny of those less lucky ones. Moreover, perceiving others to be an integral part of one's own group increases the trust that they will not misuse and exploit their privileges. The discussions about Greece during the European debt crisis ('reckless', 'irresponsible' Greeks, etc.) and the challenges to implementing any common EU insurance systems have highlighted that EU identity is not (yet) strong enough for this step.

This chapter summarises some of the insights of resent research about the origin of group identities and factors that shape those identities and associated voting patterns. I focus on the role of group identities associated with political and territorial units such as cities, regions, member states or the European Union. We all belong to many such groups that shape our social and political life. The degree to which we identify with those groups influences political and economic preferences and shapes our institutions and collective actions. People have preferences not just about policies, but also about institutions and the allocation of power. In addition to the allocation of power between different actors at the same level, the vertical distribution of power across different levels of government is key. The preferences about how much power to delegate to what level correlates strongly with the strength of group identity at that respective level. Hence, the crucial question arises: which aspects and factors shape the strength of common identities? To illustrate this systematically, I begin by sketching a simple but transparent way how to think about identity conceptually, distinguish it from established concepts like culture, and apply it empirically.

2 HOW TO CONCEPTUALISE IDENTITY

In economics, the concept of group identity was first explored in behavioural lab experiments (for a review, see Kranton 2016). An increasing number of studies examine the origins and impact of identity in real-world settings. A coherent definition is required to systematically think about how identity is shaped and how it influences individual and collective choices. Preferences are shaped not only by people's individual situations and characters but also by their group membership. People also have a preference for the role of 'their' group in the larger political entity that they belong to. The strength of the respective group identities determines the extent to which preferences are shaped by such group-specific considerations. If someone identifies a lot with their region but little with the nation-state, this favours moving decision-making power from the national to the lower regional level or splitting the region from the overarching state.

The concept of preference heterogeneity is discussed in the literature on the size of nations (e.g. Alesina and Spolaore 1997). This literature takes preference heterogeneity as an exogenous, fixed factor. However, Desmet et al. (2017) show that the variation in values and preferences is actually larger within most political units than across units. Accordingly, the fact that strong group identities and preferences (e.g. regional or ethnic) nevertheless exist means that it is the perception of differences that matters. One can think of identity as reflecting the perceived heterogeneity or distance of an individual from other members of a group. The common identity of an individual as part of a group (e.g. a region, nation, or the European Union) then depends on the perceived distance to the average group member. The intuition is very simple: an individual differs from other group members in fixed attributes, such as shared history, language or traditions. The degree to which this affects an individual's identity depends on how much they emphasise the attributes that differ relative to the traits they share with other group members. This approach allows for identity to be distinguished from culture. Similar to culture, the attributes – that identity is based upon – can often be thought of as deep-rooted. However, as Sen (2007) argues, identity is highly adaptive to context. The psychologists Turner et al. (1994: 458) explain that context dependence "is not a sign that the true identity of the person is being distorted by external circumstances". To the contrary, identity must be adaptive to be "accurate and useful".

Using such a definition allows for adaptability. It also makes it easy to think about people as being part of multiple groups. Group identities can be in opposition to each other ('oppositional identities') but this is not always the case, as survey evidence demonstrates. This definition also helps to understand how historical or contemporary shocks can shape group identities in the short and long run. In the short run, identity is malleable by changing the importance that people assign to different attributes – also opening the path to political manipulation and propaganda. In the long run, larger shocks can also become part of a group's shared history and it can itself become an attribute used to distinguish the group from others.

2.1 Regional identity as a precondition for secessionist movements

Within-country regions differ in their resources and wealth. The most common economic source of regional discontent is redistribution across regions, usually moving resources from richer to poorer regions. Such redistribution could increase the vote shares of regionalist or secessionist parties. However, looking simply at their actual electoral success in a cross-section poses a puzzle. States that feature strong wealth differences across regions and a system of horizontal redistribution across regions are extremely common. Regional wealth differences do not always trigger support for secessionist parties. In Gehring and Schneider (2020), we develop a simple theory to show that both group identity and economic reasons need to be considered to fully understand electoral support for secession. We show that horizontal redistribution of a region's wealth across lower-level units has the potential to trigger secession. However, this only holds if regional identity is strong enough relative to national identity. Hence, horizontal redistribution

schemes trigger not only a public outcry but also actual support for regionalist parties in Catalonia, Belgium and Scotland. In Germany and Austria, instead, they might be a subject of discussion but usually not a sufficient reason to influence voters' decisions.

We show that once controlling for the underlying strength of identity (through fixed effects) there is a strong correlation between changes in a region's wealth and the vote share of secessionist parties in a global sample. We then use Scotland and Wales as exemplary cases of heterogeneous regions with a differing history and culture but being part of a political union – the United Kingdom. As both regions initially had a comparably strong level of regional identities, we can study the success of secessionist parties in Wales as a suitable comparison group to those in Scotland. We then use oil discoveries and exogenous price changes to show that increases in Scotland's wealth explain a significant part of the dramatic increase in the success of the Scottish National Party (SNP).

This research highlights how economic and identity reasons interact in shaping people's preferences about the vertical allocation of power. Economic reasons matter, but their effect is contingent on identity differences.

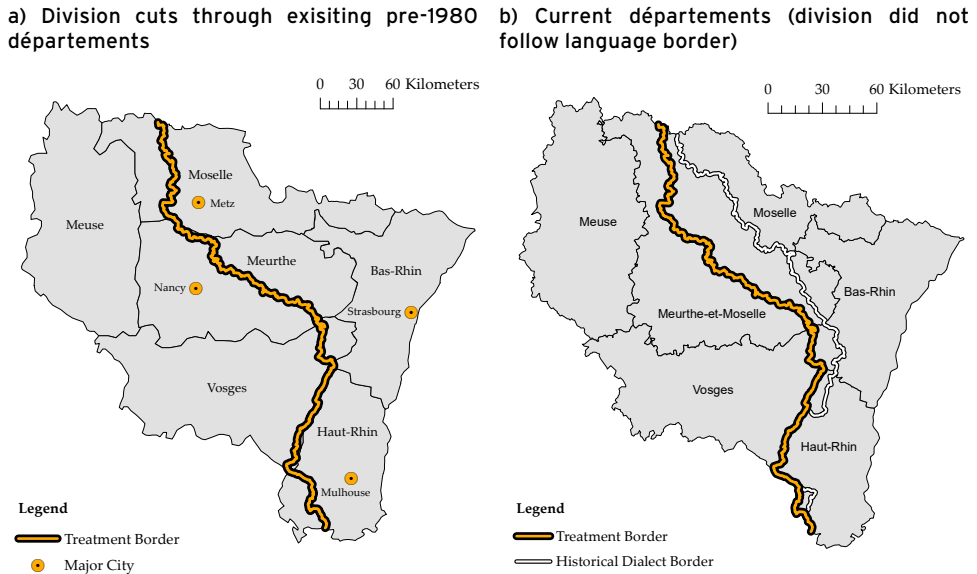## 3 GROUP IDENTITY AT DIFFERENT POLITICAL LEVELS: EVIDENCE FROM ALSACE-LORRAINE

Two important questions are: what explains identity differences? And how do they relate to political preferences about the vertical allocation of power?

Given that the formation of nation-states out of heterogeneous regions is usually not a process without tensions, it seems plausible to look at the history between the central nation-state and a region as a crucial factor in shaping both national and regional identities. However, trying to identify the causal effect of such tensions turns out to be challenging. While laboratory experiments are confined to smaller-scale or short-term interventions, observational studies are able to compare regions with real historical differences in experiences with the nation-state. However, these regions often differ in many dimensions other than those experiences.

In two related papers, we exploit a unique historical natural experiment to estimate the causal effect of being exposed to adverse actions and policies by the higher-level nation-states, such as war, occupation, changing national affiliation and repressive top-down nation-building policies. The historically homogeneous French regions of Alsace and Lorraine were divided up between France and Germany after the Franco-Prussian war in 1870-71. For more than half a century the eastern part – which became German and then returned to France after World War II – was more exposed to repressive policies by both central states and to the wars between them. The crucial advantage is that we can observe both parts in the same institutional environment again after this historical episode.

Due to disagreements in the German leadership, the final border dividing the region ignored local circumstances such as languages, prior political divisions or geographical features like rivers (see Figure 1). This allows us to use a geographic regression discontinuity design. Given that the exact location of the border was as good as random, our most conservative comparison is between previously identical municipalities that turned out to be just to the left of the historical border and just to the right of it.

**FIGURE 1   ALSACE AND LORRAINE: DÉPARTEMENTS BEFORE AND AFTER DIVISION IN 1870/71**

a) Division cuts through exisiting pre-1980 départements

b) Current départements (division did not follow language border)

Notes: Author's depictions using ArcGIS and official administrative shapefiles. Linguistic border georeferenced from Harp (1998).

3.1 The origins of regional identity

In Dehdari and Gehring (2022), we examine the effect of being under occupation, which we consider as an adverse (negative) experience with the higher-level nation-state, on regional identity. We do this using both measures of revealed and self-reported preferences. Using surveys, for example, to elicit self-reported preference has the advantage of being able to ask directly about the outcome of interest – in our case, identity. However, simply giving an answer is not a costly choice for participants, which poses a potential issue regarding the reliability of such measures. Revealed preferences have the advantage that they measure not a statement but a real-life decision by an individual.

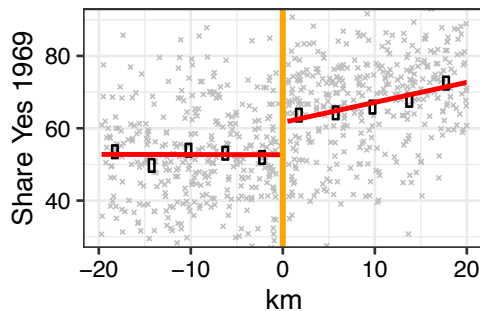**FIGURE 2   MAPS AND RD PLOTS FOR 1969 REFERENDUM ON MORE REGIONAL AUTONOMY**

a) Treated and control area within Lorraine
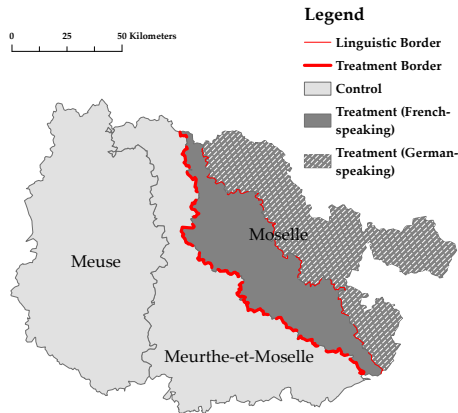
b) Outcome map: Share 'Yes' in 1969 referendum on more regional autonomy
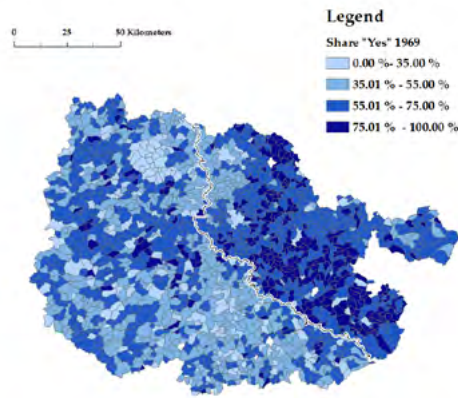
c) RD plot: Share 'Yes' in 1969 referendum on more regional autonomy

Notes: Panel (a) shows the division of the treated and the control areas that we focus on in Dehdari and Gehring (2022); panel (b) presents municipal-level shares of yes votes in the 1969 referendum on more regional autonomy; panel (c) shows an RD plot for the 1969 referendum results at the treatment border. The vertical orange line indicates the treatment border, the red lines depict distance to the border as the running variable, and each grey cross represents one municipality. The effect in a regression is around 10 percentage points, depending on the specification.

Our main results use a revealed preference measure to show stronger regional identity in the treated part with more negative historical experiences (see Figure 2). The proxy for stronger regional identity is higher support in a referendum on increasing regional autonomy from the central state. This was in 1969, only about 15 years after the historical tensions ended, which minimises the risk that the difference was caused by other factors. We then show that this difference persists in the long run, using subscription rates to regional newspapers and the success of regionalist parties as further revealed preference measures. These results show that negative experiences with the nation-state indeed cause significantly stronger regional identity.

Does this identity translate into different preferences about the vertical allocation of power? The relative strength of regional compared to national identity can proxy for perceived preference heterogeneity in a 'size of nation'-type model, and thus help to explain preferences about the vertical allocation of power. We use various large-scale surveys to demonstrate that this is indeed the case. First, we can see that regional identity is persistently stronger in the more negatively affected part, using direct survey questions as self-reported preference measures. Second, we show that regional identity is also stronger relative to national identity. Finally, we use various survey questions to capture preferences about the vertical allocation of power within France. All measures indicate that stronger regional identity causes preferences to shift towards more regional political autonomy and decision making.

3.2 The relationship between regional, national and EU-level identities

The European Union adds another layer of complexity to the analysis, by adding an additional level above the member nation-state. When thinking about the vertical allocation of power, citizens can now consider allocating power to the regional, national, or EU level. This decision is based on the strength of the respective group identities and considers also the role and function of the respective higher-level governments.

Minority regions are a particularly interesting case to study the relationship between identity and preferences across these levels. One interesting example is Scotland. While we have seen a dramatic rise in the support for the secessionist SNP (Gehring and Schneider 2020), Scottish public support for European integration also increased by 25% from 1979 to 1997. While the UK as a whole voted in favour of leaving the European Union, the Scots voted overwhelmingly for 'Remain'.

This might seem paradoxical at first glance. Are voters being 'irrational' when they both support decentralisation and a centralisation of power at the same time? In Gehring (2021), I show that this is not necessarily the case. I sketch a theoretical framework of exit and integration that can explain such preferences. It explains under what conditions negative historical experiences with higher-level governments cause individuals in minority regions to support integration – for instance, with a supra-national level or international organisation – as a means to prevent history from repeating itself. After World War I highlighted the risk of conflict between nation-states and created new

national minorities, this idea of integration emerged and culminated in the foundation of the League of Nations. Integration is a relevant alternative or complementary strategy when exit strategies are costly, when integration is perceived as helping minority regions, and when the salience of historical tensions and the role of integration as a remedy is high enough. This is evident in a cross-section beyond the case of Scotland. Other regions in the European Union such as South Tyrol, Corsica and Catalonia exhibit a similar positive correlation between support for regionalist parties and support for EU integration. To test for a causal relationship, I rely again on the case of Alsace-Lorraine, comparing municipalities in the treated part with more negative central state experiences to those in the control area.

Figure 3a shows that in a 1972 referendum on enlargement of the European Communities, the average support of about 85% in the treated area is considerably higher than the 72% in the control area. EU support is higher in each individual treated département (equivalent to a US state) than in any of the control départements. This level of observation is of course too aggregate to draw causal implications, but it allows us to track the persistence of differences over time and rule out that events after 1972 are the root cause of potential differences in the 1990s.

The first set of causal results considers the referenda in 1992 and 2005. Figure 3b shows a map with the average municipality-level share of 'yes' votes in two referenda on the European Union in 1992 and 2005 on the left-hand side, revealing that support for further EU integration remains considerably higher in the treated area. The regression discontinuity (RD) plot shows a clear jump upwards in support at the border, indicating that this difference is causal. Figure 3c shows a similar pattern using the vote shares of Eurosceptic parties in EU parliamentary elections. In the paper, I verify that these results are robust: there is a consistently higher support for more EU competencies and less support for Eurosceptic parties in the treated area.

As above, I find the same relationship for self-reported preferences using various survey questions about identity and political preferences. It turns out that the historical negative effects led to both a stronger regional and European identity. Moreover, extending the result from above, people express a preference to move political power from the nation-state to either the region or the European level. Both studies demonstrate the importance of nested identities. Those identities are not necessarily substitutes at the expense of each other, and translate into preferences about the vertical allocation of power in multi-level systems.
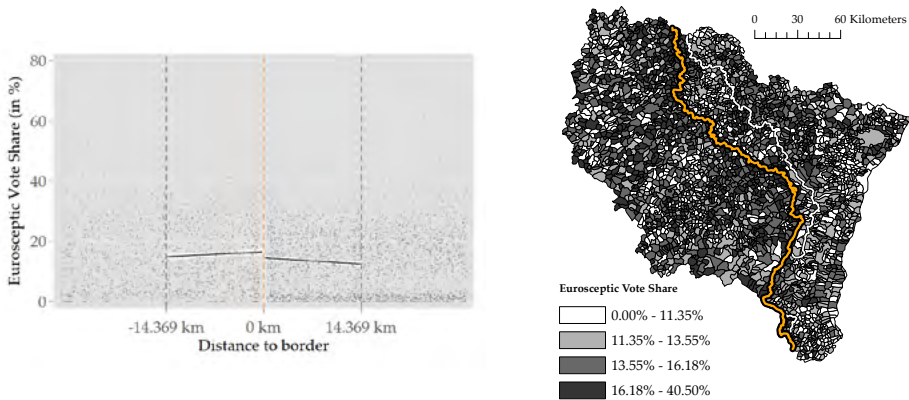
Figure 3 EU support and Euroscepticism

a) Average support for enlargement in EU referendum, 1972 (%)
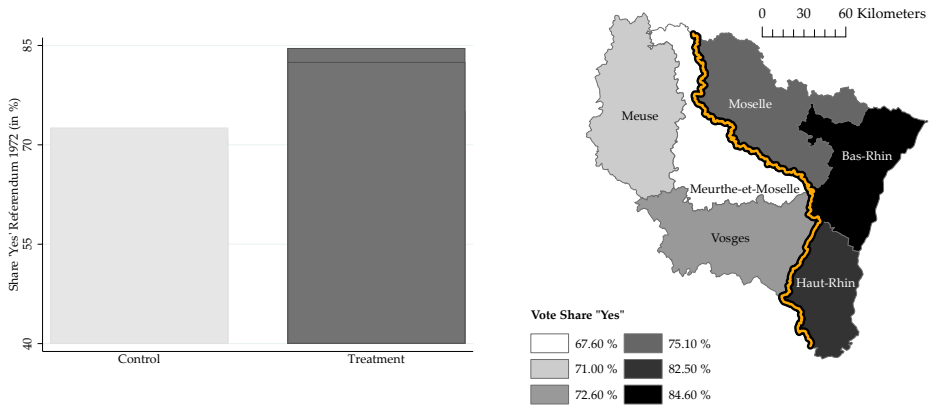
b) Average support in EU referenda, 1992 and 2005 (%)
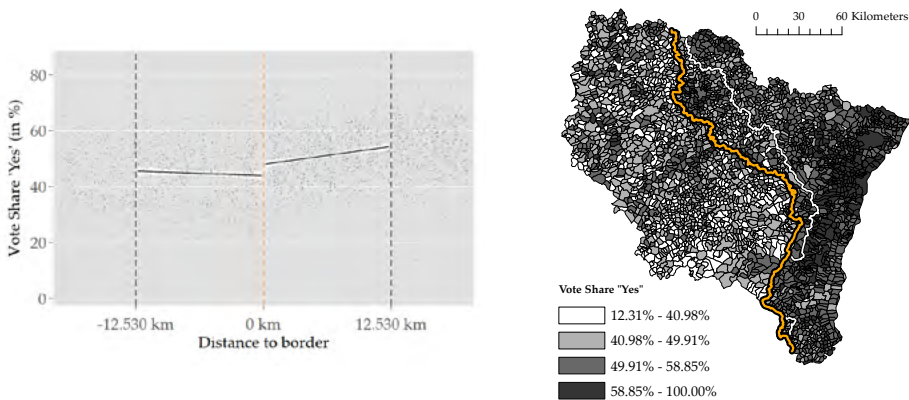
c) Average vote share for Eurosceptic parties in EU parliamentary elections, 1994-2004 (%)

Notes: Panel (a) shows on the left the average agreement in the treatment and control area, and one the right at the French département (state) level; panel (b) presents an RD plot at the municipal level on the left of shares of yes votes in two EU referenda, and a map depicting those on the right; panel (c) shows an RD plot for the average vote short of Eurosceptic parties on the left, and a map depicting those on the right. On the maps, the orange line indicates the treatment border, the white line the linguistic border. The respective effects in a regression are +4.7 for agreement and 1.7 for the party share.

4 THREATS AND GROUP IDENTITY: EVIDENCE FROM RUSSIA'S ANNEXATION OF CRIMEA

Contemporary events also can influence identity. For example, Depetris-Chauvin et al. (2020), featured in Chapter 20 of this eBook, show that the success of national football teams fosters joint identities and lowers internal conflict. Fouka (2019, 2020), described in Chapter 13, finds that experience of discrimination has an important effect on group identity. Anecdotally, the foundation of many nations was fostered by an outside threat. Think of the American War of Independence against the British Empire or the foundation of a united Germany after a war against France. The European Union itself and its predecessors were at least partly a response to the military threat posed by Russia and the Soviet Union, and the Cold War is supposed to have had a unifying effect (e.g. Bordalo et al. 2020). The 2014 and the 2022 Russian invasions of Ukraine reinforced a sentiment that Russian military invasion is a real threat even for European Union member states. In Gehring (2022), I use the 2014 invasion as a natural experiment to study whether there is empirical support for the hypothesis that identity is affected by external threats.
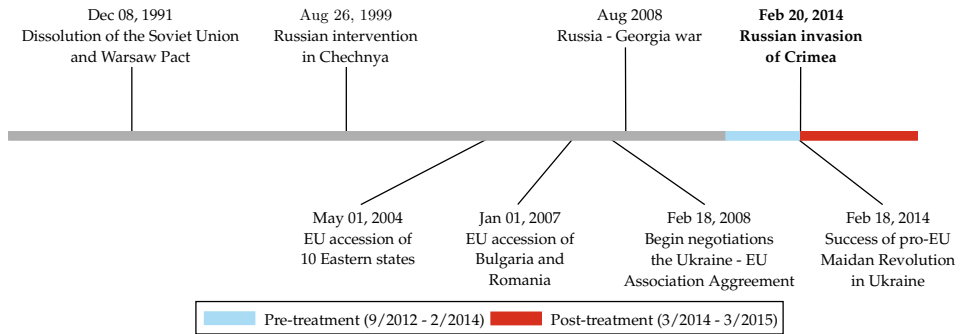
There are two main challenges to answering this question causally. First, distinguishing the effect of an increased threat from other shocks is difficult as increased threats are, in most cases, accompanied by direct conflict, destruction or actual military cooperation, making it hard to know whether any effect on identity is due to the threat or another factor. Second, relying purely on before-and-after comparisons runs into the risk of identifying a spurious correlation.

Three features allow me to use the Russian annexation of Crimea and invasion of parts of the Donbas region in 2014 as a natural experiment to provide such evidence. First, while the invasion was in Ukraine, it clearly affected the perceived threat posed by Russia to European Union member states as well. Second, the invasion itself and even more so its timing were unexpected, and it thus be considered as an exogenous shock. Third, there were clear differences in the intensity of the threat across EU member states, adding cross-sectional differences in the intensity of that shock. I argue that the shock was largest for Estonia and Latvia, as the two states with both a direct land border with Russia and a sizable Russian minority population (see Figure 4). Using both qualitative and quantitative evidence based on a text analysis of newspaper articles and internet searches, I validate that changes in threat intensity vary accordingly.
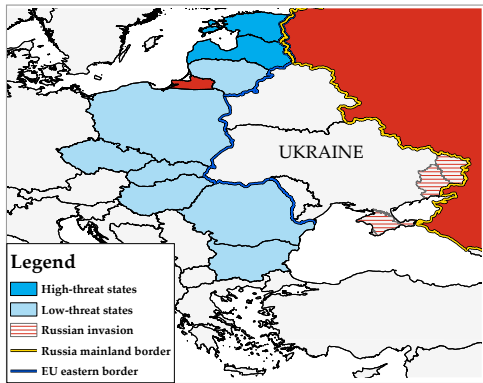
With data from the bi-yearly Eurobarometer survey, I examine empirically whether there is a causal effect of the increased threat on EU identity, in-group trust and willingness to cooperate. The outcomes are based on a representative sample of EU citizens for each member state.

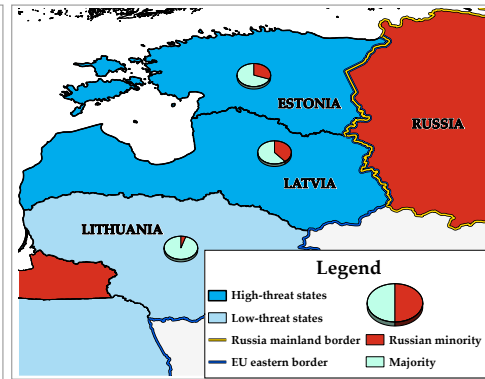**FIGURE 4   DIFFERENTIAL EFFECTS OF THE INCREASED RUSSIAN THREAT ON EU IDENTITY**

a) Short main event window to reduce impact of other potentially biasing events

Dec 08, 1991
Dissolution of the Soviet Union
and Warsaw Pact

Aug 26, 1999
Russian intervention
in Chechnya

Aug 2008
Russia - Georgia war

**Feb 20, 2014
Russian invasion
of Crimea**

May 01, 2004
EU accession of
10 Eastern states

Jan 01, 2007
EU accession of
Bulgaria and
Romania

Feb 18, 2008
Begin negotiations
the Ukraine - EU
Association Aggreement

Feb 18, 2014
Success of pro-EU
Maidan Revolution
in Ukraine

Pre-treatment (9/2012 - 2/2014)   Post-treatment (3/2014 - 3/2015)

b) Classification in high-threat and low-threat EU member states

UKRAINE

Legend
High-threat states
Low-threat states
Russian invasion
Russia mainland border
EU eastern border

c) Higher threat intensity with large Russian minorities and mainland-Russia border

ESTONIA
RUSSIA
LATVIA
LITHUANIA

Legend
High-threat states   Russia mainland border   Russian minority
Low-threat states   EU eastern border   Majority

c) Raw change in EU identity for high- versus low-threat states based on Eurobarometer



Low-threat   High-threat
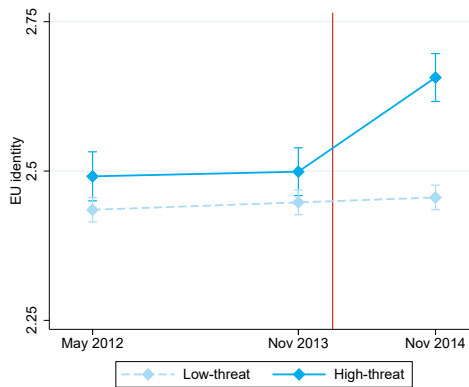
Notes: Panel (a) reports a timeline for our analysis. Panel (b) shows the treatment and control groups. Maps are based on Eurostat. Minority shares in panel (c) are identified based on language. Panel (d) shows a simple average difference in our main variable; figures show 95% confidence intervals of averages.

Figure 4d reveals a sharp increase in EU identity in the raw data. I find a positive effect on identity of a considerable magnitude. The increase due to the increased Russian threat is of equal size to the initial difference between Poland (strong EU identity before) and Hungary (weaker EU identity), and is more than twice the initial difference between Germany (strong initial identity) and France (weaker initial identity).

The effect is persistent over time. It is stronger for age cohorts that had personal experiences with the Soviet Union, and for those who have personal or indirect experiences of state persecution during Soviet Times. As predicted by social psychology theories, the increased identity translates into higher trust in EU institutions and higher support for cooperation at the EU level. This willingness to cooperate is not limited to defence policy, rather it extends to areas like a common foreign policy, taxes and regulation.

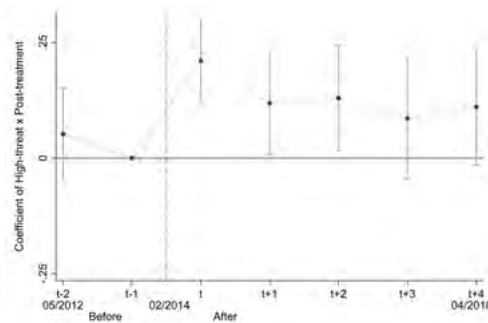**FIGURE 5   PERSISTENCE WITH LEADS AND LAGS: MAIN IDENTITY MEASURES**

a) EU identity, 2012–2018
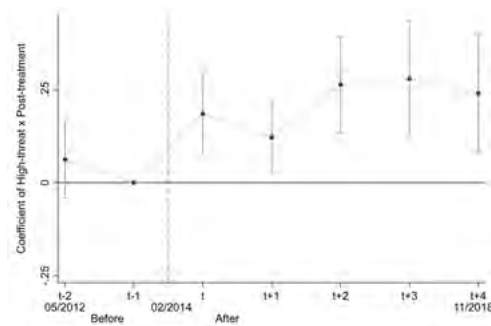
b) Sense of EU citizenship, 2010–2018
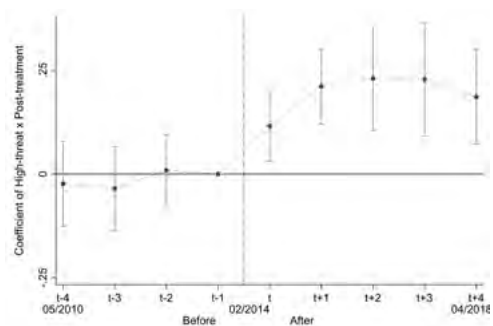
c) EU versus identity, 2012–2018

Notes: Panel (a) displays coefficients and 95% confidence intervals from regressions of EU identity on leads and lags (wave 1 in each year) of the interaction of the dummy variable for being after the invasion with a dummy variable for being in a High-threat member state. Year 2013 (wave 1) is taken as the reference period; standard errors are clustered at the regional level. I use the same controls employed in the main specifications of our analysis. I also added a set of macro controls: real GDP, inflation rate, youth unemployment and a variable that indicates whether legislative elections have been held. Panels (b) and (c) display the same for Sense of EU Citizenship and European versus National Identity, respectively. Data are available from 2012 to 2018 for EU identity and EU versus national identity, and from 2010 to 2018 for sense of EU citizenship.

5 CONCLUSION

All relevant political units, such as modern nation-states or the European Union, are multi-level political systems composed of one central higher-level and heterogeneous lower-level units. This chapter focuses on the role of group identities associated with political and territorial units such as cities, regions, member states or the European Union. People belong to many such groups at the same time. The degree to which one identifies with those groups influences political and economic preferences and shapes our institutions and collective actions.

The importance of group identities in shaping collective actions cannot be overstated. It begins by shaping the vertical allocation of power in our multi-level systems and influences whether voters deem exit through secession or cooperation through further integration as more desirable. Identification with a higher-level political entity is decisive for voters to embrace common social insurance and redistribution across heterogeneous units. The strength of a common identity is what allows societies to develop trust and cooperate in larger groups consisting of strangers with potentially very different backgrounds and histories.

REFERENCES

Alesina, A and E Spolaore (1997), "On the number and size of nations", *The Quarterly Journal of Economics* 112(4): 1027–1056.

Anderson, B (2006), *Imagined communities: Reflections on the origin and spread of nationalism*, Verso books.

Bordalo, P, M Tabellini and D Y Yang (2020), "Issue salience and political stereotypes", NBER Working Paper 27194.

Dehdari, S H and K Gehring (2022), "The origins of common identity: Evidence from Alsace-Lorraine", *American Economic Journal: Applied Economics* 14(1): 261–92.

Depetris-Chauvin, E, R Durante and F R Campante (2020), "Building nations through shared experiences: Evidence from African football", *American Economic Review* 110(5): 1572–1602.

Desmet, K, I Ortuno-Ortin and R Wacziarg (2017), "Culture, ethnicity and diversity", *American Economic Review* 107(9): 2479-2513.

Fouka, V (2019), "How do immigrants respond to discrimination? The case of Germans in the US during World War I", *American Political Science Review* 113(2): 405–422.

Fouka, V (2020), "Backlash: The unintended effects of language prohibition in US schools after World War I", *Review of Economic Studies* 87(1): 204–239.

Gehring, K (2021), "Overcoming history through exit or integration: Deep-rooted sources of support for the European Union", *American Political Science Review* 115(1): 199–217.

Gehring, K (2022), "Can external threats foster a European Union identity? Evidence from Russia's invasion of Ukraine", *The Economic Journal* 132(644): 1489–1516.

Gehring, K and S Schneider (2020), "Regional resources and democratic secessionism", *Journal of Public Economics* 181.

Harp, S L (1998), *Learning to be loyal: Primary schooling as nation building in Alsace and Lorraine, 1850-1940*, Northern Illinois University Press.

Kranton, R E (2016), "Identity economics 2016: Where do social distinctions and norms come from?", *American Economic Review* 106(5): 405–09.

Sen, A (2007), *Identity and violence: The illusion of destiny*, Penguin Books India.

Turner, J C, P J Oakes, S A Haslam and C McGarty (1994), "Self and collective: Cognition and social context", *Personality and Social Psychology Bulletin* 20(5): 454–463.

ABOUT THE AUTHOR

Kai Gehring is Professor for Political Economy and Sustainable Development at the University of Bern. His PhD is from the University of Goettingen and he has taught at the University of Mannheim, Heidelberg University, the University of Applied Sciences in Kaiserslautern, and the University of Zurich, and conducted research stays at Harvard, Cambridge, CESifo, Deakin University and Stanford. His main main research interests are in political economy, development and public economics, with a recent focus on sustainable development and the environment. His work combines developing theories based on an interdisciplinary approach and test them rigorously using modern econometric methods, often with the help of novel administrative, text-based, geographical, or historical data.

SECTION V
INSTITUTIONS: REPRESENTATION AND REDISTRIBUTION

CHAPTER 24

Power sharing, conflict and state building

Hannes Mueller,[adf] Christopher Rauh[bef] and Dominic Rohner[cf]
[a]Institute for Economic Analysis; [b]University of Cambridge; [c]University of Lausanne;
[d]Barcelona School of Economics; [e]HCEO; [f]CEPR

Human history has been characterised by both shocking levels of political violence as well as by the quest to curb it.[1] The 20th century was a particularly salient example of these extremes. On the one hand, it was marked by two World Wars, several dozen episodes of mass killings of civilians, devastating purges carried out by a series of totalitarian regimes, as well as many recurrent ethnic civil wars. On the other hand, there was an important surge in democratisation and increased efforts in peacekeeping initiatives.

After an age of optimism about the ability of humanity to curb armed violence (Pinker 2012), we are currently facing a reversal, with previously peaceful areas of the world destabilising into intense levels of violence. The issue has become a central topic to most international organisations (United Nations, World Bank, IMF, OECD) and policy evaluations can be a crucial contribution of the academic community to this effort.

POWER SHARING

One promising idea has been the sharing power to prevent violence. We define power sharing as the specific divisions and amalgamations of power that ensure groups have some sort of equal 'participation' in a state's structures and/or shared 'ownership' of

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1   This chapter draws heavily on an earlier VoxEU column (Rohner and Mueller 2018), which we have extended and updated with recent references.

resources. This can take the form of a central government of national unity ('pooling'), a federation ('dispersion') or the introduction of independent, non-governmental institutions that act as a check on power in the executive ('constraining').

Power sharing between distinct religious or linguistic groups has been in place for many years in countries such as Switzerland, Belgium and Lebanon, and likewise in Northern Ireland since the 1998 Good Friday Agreement. It has also been tried less successfully in countries like Afghanistan, Iraq and Mali. The public debate is often heated, with proponents of power sharing stressing its potentially pacifying virtues, while sceptics point to the spectacular failures and to the risk of a lack of accountability and of political competition in grand coalition governments.

Much anecdotal evidence and many journalistic accounts suggest a potentially important role for power sharing in curbing conflict, and there is a clear tendency for some ethnically or religiously divided countries to adopt some form of power sharing. As shown in the qualitative work of Lijphart (1999) and Cheng et al. (2018), many successful and peaceful countries that are ethnically and religiously divided chose the so-called consensus model of democracy, characterised by power sharing and the decentralisation of power on all levels. These case studies complement a recent literature which points towards a strong role of democratic institutions in both its capacity to disperse and constrain political power (for theoretical arguments, see Acemoglu and Robinson 2001 and Besley and Persson 2011; for evidence on rent extraction along ethnic lines, see Burgess et al. 2015).[2]

Despite the renewed interest in understanding power-sharing better (for a recent review, see Francois et al. 2015), there is surprisingly little hard statistical evidence linking power sharing to peace. Exceptions include Cederman et al. (2013), Gates et al. (2015), and Strom et al. (2017), although identification problems remain important, as the introduction of power sharing may be endogenous and country-level controls provide an insufficient safeguard. The availability of quantitative data on power sharing is also a restricting factor, with most studies relying on broader institutional features.

Here, we review recent quantitative work starting from a quantitative micro study (Mueller and Rohner 2018), which we embed into the broader findings in a recent cross-country analysis (Mueller and Rauh 2022). We conclude by linking the findings of these studies to the literature on political institutions and state building.

THE CASE OF NORTHERN IRELAND

In Mueller and Rohner (2018), we study the impact of local-level power sharing on the risk of conflict in Northern Ireland. We link local power-sharing measures from administrative records to detailed data on violence, which was gathered in the context

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2   For a strand of the literature on conflict (see the recent survey by Rohner 2022) that focuses on the general role of democratic institution beyond power-sharing, see, for example, Hegre et al. (2001), Collier and Rohner (2008), Fergusson et al. (2021), Lacroix (2022), Marcucci et al. (2022) and Laurent-Lucchetti et al. (forthcoming).

of 'the Troubles'. This allows us to use quasi-random variation in election outcomes in a subset of politically balanced districts to study the effect of changes in political power on violence.

Our empirical analysis draws on panel data for Northern Ireland's 26 local district councils over the period 1973–2001, and we make use of two approaches. The first corresponds to simple panel regressions, where district fixed effects filter out time-invariant district characteristics and time effects to account for global shocks. The identification strategy relies on the time variation in power-sharing agreements at the district level to see whether violence decreases when power sharing is put in place, and whether it increases when it stops.

The second approach carries out a further refinement to the identification strategy by instrumenting the power sharing in a given district and year with the absence of a majority for sectarian parties – the logic being that in a hung parliament where no side in the conflict can govern alone, power sharing is more likely to emerge. To avoid comparing apples with oranges, we restrict the sample to districts with voting results close to the 50–50 threshold, where it is arguably close to random if a political block reaches a majority or not.

In both approaches, we find a statistically significant and quantitatively substantial impact of power sharing in curbing the scope for killings. In particular, comparing a situation of no power sharing with power sharing, fatalities per capita would increase in the absence of power sharing by roughly three times the baseline risk. Our estimates show that several hundreds of lives could have been saved if power sharing had been put in place in all districts and years. This result is robust to the use of alternative data on population, alternative sample compositions, alternative ways of measuring power sharing, alternative construction of the dependent variable, as well as the inclusion of various demographic or political control variables.

In terms of the underlying mechanisms in place, while we do not find robust heterogeneous effects of power sharing on peace with respect to the religious composition of a ward, we show that our findings apply to killings carried out by both Republican (Catholic) as well as Loyalist (Protestant) paramilitaries. The fact that the impact of power sharing is quite symmetrical, applying to various sub-groups of society, suggests that a dialogue between representatives of rival groups in local governments could create a common ground to sort out issues in a non-violent way. This is also in line with the recent findings of Saia (2018), who shows that random seat allocation in parliament can bring seat neighbours closer together in terms of political views.

A noticeable finding is that the positive virtues of power sharing only persist as long as it is in place. Once a group is disenfranchised from power, the old patterns of violent contestation re-emerge and violence returns to pre-power-sharing levels. This means

that power sharing in Northern Ireland did not establish local trust or change social norms once and for all, but that political cooperation and inclusion need to be maintained if the benefits of lower violence are to continue in the long run.

EVENT STUDY RESULT

In Mueller and Rauh (2022), we exploit the quantitative coding of peace agreement texts by the PA-X initiative[3] to identify power-sharing elements in these agreements. Together with the UCDP/GED dataset,[4] this gives the opportunity to study more than 440 power-sharing agreements worldwide. Over 70 of these agreements are coded as 'comprehensive' by PA-X, that is, they represent broader agreements that capture the conclusion of ongoing negotiations. A special feature of our study is that we combine these two datasets with the V-Dem dataset[5] to capture broader institutional trends and the risk estimates from Conflict Forecast,[6] which allows us to track the risk environment before and after the signature of peace agreements.

Using these data, we first show that selection bias is a severe problem. Power-sharing initiatives clearly select into risky situations. Without controlling for the context of a country, one would erroneously associate power sharing with high levels of violence. We get around this selection bias in two ways. First, we deploy an event study design which focuses on narrow time-windows around the signature of power-sharing agreements and studies monthly data to consider violence trends. Second, we exploit the fact that we have estimates for the risk of violence that incorporate all available information at a point in time to forecast future violence intensity and the likelihood of an outbreak. This allows us to track forecast errors before the signature of power-sharing agreements, i.e. at a time when there was no precise knowledge that an agreement would be signed.

We find that power-sharing agreements reduce political violence in the short term. The average effect of power-sharing agreements – of the 440 agreements surveyed – is an 8% decrease in the occurrence of violence and an 18% drop in intensity of armed violence. Political power-sharing provisions which are embedded in a comprehensive agreement with other power, judicial and resource-related provisions are most effective. These comprehensive agreements have an effect that is larger (a 10% and a 30% decrease in occurrence and intensity, respectively) and appears to strengthen with time.

3   www.peaceagreements.org
4   https://ucdp.uu.se/downloads/
5   www.v-dem.net/data/the-v-dem-dataset/
6   https://conflictforecast.org

BEATING PESSIMISM WITH POWER SHARING

Conflict Forecast uses millions of news articles and a complex way of capturing conflict dynamics using machine learning which is geared to get the best possible estimate of future violence using all possible information available. These forecasts provide the possibility to see whether the adoption of power-sharing agreements led to positive surprises after adoption. To this end, we study forecast errors in Mueller and Rauh (2022). The forecast error here is defined as the true realisation minus the forecast – both measured as averages in the consecutive 12 months. Positive errors mean that, at the time of the forecast, the forecast model was too optimistic and underestimated future violence. Negative forecast error values mean that the forecast model was too pessimistic. We then ask, given the information available at time t, was the forecast for the next 12 months too optimistic or too pessimistic?

We show two event studies in Figure 1. In the left panel, we display the results using a binary indicator capturing the occurrence of violence. The figure shows two important dates as vertical lines. First, the adoption of the power-sharing agreement is marked as a solid line, again at time 0. Note, we are showing forecast errors for a time horizon looking 12 months into the future so that the months before the adoption date 0 are already treated. For example, at -6 on the horizontal axis we are comparing the forecast made 6 months before the adoption of a power-sharing agreement with the realised incidences in the next 12 months. Second, we capture the forecast horizon with a second dashed line at -12, which indicates the moment the forecast horizon starts to include the power-sharing agreement. We see a striking pattern in which the forecast error starts to drop dramatically before the adoption of the power-sharing agreement for the occurrence of violence on the left. On the right, we show the results when looking at the intensity of violence in terms of log(battle deaths + 1).

It is clear from Figure 1 that power-sharing agreements target situations with vicious conflict dynamics, captured by an upward drift of the forecast error of our forecasting system to the left of the dashed line. Agreements are then associated with a dramatic and systematic trend reversal in the forecasting error. Even taking all possible information into account that is available at months -12 to 0, the forecasting framework is not able to predict that power sharing will bring violence down.[7]

FIGURE 1   FORECAST ERROR AROUND THE ADOPTION OF POWER SHARING
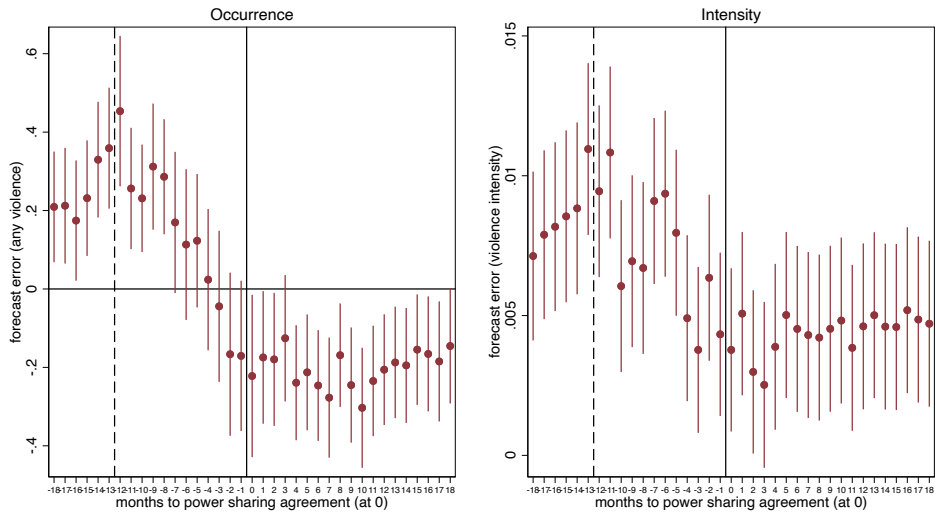
The findings reinforce the event studies in the sense that violence seems to fall significantly after the adoption of a power-sharing agreement. The novelty of the forecast-risk view is that it seems impossible to anticipate the effect of the power-sharing agreement from violence dynamics or news events even by a machine-learning algorithm explicitly targeting the best possible forecast of violence.

POWER SHARING AS STATE BUILDING

While the identification strategy does not allow us to make causal claims, the findings in Mueller and Rauh (2022) suggest that power-sharing agreements can also contribute to long-term reductions in violence. Lasting power-sharing agreements are associated with a fall in the occurrence of violence (the baseline violence probability without a lasting agreement is 80%, while in countries with a lasting agreement the share that drift off into violence is only 30%). In Nicaragua, following the conclusion of two power-sharing agreements in 1990, violence intensity decreased by 30%, and this reduction was sustained over time.

The joint analysis of the V-Dem dataset clearly shows that political systems with egalitarian political features that respect civil and political rights and provide equal access to justice, public services and jobs are most strongly associated with reductions in violence. The same effect cannot be seen for provisions that strengthen deliberation and participation at the institutional level, such as holding elections. Our interpretation is that power-sharing agreements can provide a 'bridge' out of the conflict trap – by reducing political violence in the short term and by strengthening the institutional protection of rights in comprehensive agreements.

This is in line with the broader literature. Power sharing can shape the politics of a country profoundly beyond the attenuation of political violence (Hartzell and Hoddie 2020). One example of where power sharing has become part of the political identity is Switzerland (Kriesi 1998). The country is very diverse, both in terms of religious and linguistic cleavages, and during Medieval times a string of religious wars between Catholics and Protestants ensued. After the last civil war, the *Sonderbundskrieg* of 1847, the new Constitution of 1848 put in place various checks and balances, and in the following years Switzerland developed a culture of grand coalition governments with power sharing and of striving to achieve super majorities for key reforms. As stressed by Kriesi (1998), the Swiss national identity draws partially on pride in its inclusive institutions and sound governance. This illustrates that getting all major groups of the country on board has the potential of not 'just' reducing violence in the short run, but also building a multi-cultural state with a sense of belonging that can achieve peace and cooperation between groups for several centuries.

CONCLUDING REMARKS

In this chapter we have provided evidence from a local power-sharing agreement in Northern Ireland and cross-country evidence based on event studies and a new forecast error method. The fact that the literature finds violence-reducing effects across different methods and levels of aggregation points towards a fairly robust mechanism. This is an important finding, as it suggests that the process of reaching an agreement and signing it is itself a useful step towards peace. We have argued that in case studies that do not control for conflict risk, this might not be obvious.

However, the cross-country evidence also suggests considerable heterogeneity in the treatment effects. Agreements in Iraq or Afghanistan, for example, do not seem to have reduced violence at all. Further research into what drives this heterogeneity is strongly encouraged.

REFERENCES

Acemoglu, D and J A Robinson (2001), "A theory of political transitions", *American Economic Review* 91(4): 938-963.

Besley, T and T Persson (2011), "The logic of political violence", *Quarterly Journal of Economics* 126: 1411–1445.

Burgess, R, R Jedwab, E Miguel, A Morjaria and G Padró i Miquel (2015), "The value of democracy: Evidence from road building in Kenya", *American Economic Review* 105: 1817–1851.

Cederman, L-E, K Skrede Gleditsch and H Buhaug (2013), *Inequality, grievances and civil war*, Cambridge University Press.

Cheng, C, J Goodhand and P Meehan (2018), "Synthesis paper: Securing and sustaining elite bargains that reduce violent conflict", UK Government Stabilisation Unit.

Collier, P and D Rohner (2008), "Democracy, development, and conflict", *Journal of the European Economic Association* 6(2-3): 531–540.

Fergusson, L, P Querubin, N A Ruiz and J F Vargas (2021), "The real winner's curse", *American Journal of Political Science* 65(1): 52–68.

Francois, P, I Rainer and F Trebbi (2015), "How is power shared in Africa?", *Econometrica* 83: 465–503.

Gates, S, B A Graham, Y Lupu, H Strand and K W Strøm (2016), "Power sharing, protection, and peace", *The Journal of Politics* 78(2): 512–526.

Hartzell, C A and M Hoddie (2020), *Power Sharing and Democracy in Post-Civil War States: The Art of the Possible*, Cambridge University Press.

Hegre, H, T Ellingsen, S Gates and N P Gleditsch (2001), "Toward a Democratic civil peace? Democracy, political change, and civil war, 1816-1992", *The American Political Science Review* 95(1): 33.

Kriesi, H (1998), *Le système politique suisse*, Economica.

Lacroix, J (2022), "Ballots instead of Bullets? The effect of the Voting Rights Act on political violence", *Journal of the European Economic Association*, forthcoming.

Laurent-Lucchetti, J, D Rohner and M Thoenig (forthcoming), "Ethnic conflicts and the informational dividend of democracy", *Journal of the European Economic Association*.

Lijphart, A (1999), *Patterns of democracy*, Yale University.

Marcucci, A, D Rohner and A Saia (2022), "Ballot or Bullet: The Impact of UK's Representation of the People Act on Peace and Prosperity", working paper.

Mueller, H and C Rauh (2022), "Building Bridges to Peace: A Quantitative Evaluation of Power-Sharing Agreements", Janeway Institute Working Paper No 2227.

Mueller, H and D Rohner (2018), "Can power-sharing foster peace? Evidence from Northern Ireland", *Economic Policy* 33(95): 447–484.

Pinker, S (2012), *The better angels of our nature: Why violence has declined*, Penguin Books.

Rohner, D (2022), "Mediation, military and money: The promises and pitfalls of outside interventions to end armed conflicts", *Journal of Economic Literature*, forthcoming.

Rohner, D and H Mueller (2018), "Shared power as a way to reduce violence", VoxEU.org, 22 January.

Saia, A (2018), "Random interactions in the Chamber: Legislators' behavior and political distance", *Journal of Public Economics* 164: 225–240.

Strøm, K, S Gates, B Graham and H Strand (2017), "Inclusion, Dispersion, and Constraint: Power Sharing in the World's States, 1975–2010", *British Journal of Political Science* 47(1): 165–185.

ABOUT THE AUTHORS

Hannes Mueller is a tenured researcher at the Institute for Economic Analysis (IAE/CSIC) and an Associated Research Professor at the Barcelona School of Economics (BSE). He is affiliated to the CEPR Development Economics programme since 2015, the RPN on Preventing Conflict since 2019 and a Research Fellow since 2022. He publishes in leading journals in science, economics and political science such as the *American Economic Review*, the *American Political Science Review*, the *Journal of the European Economic Association* and the *Proceedings of the National Academy of Sciences*. In the last five years Hannes has specialised in the use of supervised and unsupervised machine learning methods in applications in economic and political science. He directs the Master's in Data Science for Decision Making at the BSE.

Christopher Rauh is a Professor at the University of Cambridge, a Fellow of Trinity College Cambridge, and a Research Affiliate at CEPR and HCEO. He completed his PhD in 2014 at the Universitat Autonoma de Barcelona. His fields are labour economics and political economy, which he studies by collecting survey data or using data-intensive methods and machine learning.

Dominic Rohner is a Professor of Economics at the Faculty of Business and Economics (HEC) of the University of Lausanne. He is a Research Fellow of CEPR, CESifo, OxCarre and HiCN. His research focuses on political and development economics and has won several prizes, such as for example the KfW Development Bank Excellence Award or the SNIS International Geneva Award. He has held a Starting Grant of the European Research Council (ERC) investigating "Policies for Peace" and is an Associate Editor at the *Economic Journal*. He is also the leader of the CEPR Research and Policy Network (RPN) on Preventing Conflict. He has published papers in various international journals, including, among others: *American Economic Review, Econometrica, Journal of Political Economy, Quarterly Journal of Economics* and *Review of Economic Studies*. He holds a PhD in Economics from the University of Cambridge.

CHAPTER 25

New patriots: How Roosevelt's New Deal made America great again

Bruno Caprettini[a] and Hans-Joachim Voth[bc]

[a]University of St. Gallen; [b]University of Zurich; [c]CEPR

Power, in the immortal words of Mao Tsetung, comes out of the barrel of a gun. This is one view of what state capacity means – the ability to coerce, if need be through the threat or actual use of violence. A long tradition in political thought going back to Thomas Hobbes sees naked power – guns, armed men and money – as the cornerstones of a capable state. An alternative view emphasises consensus and voluntary collaboration, as well as patriotic sentiment – the sense of belonging to a larger community. In Rousseau's view, governments get to exercise power because citizens delegate it to them; in exchange for ceding power, rulers owe protection and support to their subjects. Voluntary, costly participation as part of a large group became more common after the rise of nation-states in the 19th century. Shared myths, the emphasis of a common history, the enforcement of linguistic uniformity in school and collective remembrance can all enhance a sense of shared identity (Nora 1989, Anderson 2006, Colley 2009).

Much is already known about state-building in the Hobbesian tradition because it is easy to document and quantify. Taxes are raised, opponents suppressed and armies assembled. Most of the history of modern nation-states has been written from this vantage point (Tilly 1992). The social contract view is harder to explore; the 'contract' is rarely actually signed, and the construction of nations as 'imagined communities' (Anderson 2006) is difficult to trace. For example, while much tax compliance is de facto voluntary (Levi 1988), it is also enforced through punishments.

In a recent paper (Caprettini and Voth 2023), we show how government income support and social spending can increase state capacity, creating a shared sense of nationhood and patriotic support. We analyse the expansion of the US federal government's role as part of the New Deal after 1933. Where social spending expanded the most, patriotism – underwritten by costly actions – was greatest during World War II. The United States of the 1930s is an attractive setting to investigate the question of how government spending can affect national identity for a number of reasons.

First, its armed forces allowed volunteering for an extended period at the start of World War II. Just as in World War I, the US Army and Navy took volunteers for almost a year while conscription was implemented and came into force. This allows us to analyse one of the potentially most costly actions – war participation – as a voluntary action. The contrast with all other belligerents is striking: Germany, Japan, France, Britain and the USSR all had mandatory conscription at the time when hostilities broke out.

Second, prior to 1933, the federal government rarely touched the lives of ordinary Americans. With the coming of Roosevelt's 'New Deal', this changed dramatically. The federal government's share of GDP more than doubled from 4% in 1933 to over 9% by the end of the 1930s (Folsom 2009). Social security for the elderly, unemployment insurance, public works programmes, loan support for distressed businesses and homeowners, help for farmers – there was hardly a corner of life that was not affected by New Deal spending.

HANDOUTS FOR HEROES

To measure patriotism, we look at three outcomes: war bond purchases, volunteering and medal recipients. The US entered World War II when Japanese planes attacked and sank a good part of the Pacific Fleet in Pearl Harbor. Some 18 million men and women eventually served in the US armed forces. Public spending accounted for 47% of GDP in 1943, a large share of which was funded by borrowing. In 1944, the government deficit amounted to 25% of GDP, with bond issuance a key funding source. War bonds were issued in a range of denominations, and were on average costly propositions for the owner. The interest rate was low, not indexed to inflation and paid only at maturity. Moreover, the bonds were not transferrable, and repayment was postponed decades into the future. Panel A of Figure 1 illustrates the geographical distribution of war bond purchases. The US South saw fewer bond purchases, while the West and Northwest look particularly patriotic in this dimension. Importantly, war bonds were more widely bought in areas that benefitted from New Deal spending in the preceding decade. Panel D of Figure 1 presents the geographical variation of welfare spending during the New Deal. As the left panel of Figure 2 shows, counties that received high support saw a much more active uptake of war bonds than areas with limited welfare spending.

While most Americans who served in the armed forces after 1941 were conscripts, about 3.4 million volunteers were enlisted before this option was shut down at the end of 1942. Volunteers came from all over the country (see Figure B of Figure 1), but not to the same extent. The middle panel in Figure 2 shows that in areas benefitting from more welfare spending after 1933, the frequency of volunteering was markedly greater.

Our final indicator comes from medals. The US distributed a range of medals, and we focus on three of the highest awards for valour: the Congressional Medal of Honor, the Distinguished Service Cross, and the Silver Star. All were given out for outstanding acts of bravery involving physical courage in the face of the enemy; many were awarded posthumously. For example, Sergeant Sylvester Antolak received the Congressional Medal of Honor after he was killed when he single-handedly attacked and destroyed a German machine-gun team in Italy in 1944. Men like Sergeant Antolak came from all over the United States, but with a great deal of variation in frequency at the county level (see Figure 1, Panel C). The right-hand panel of Figure 2 shows how the likelihood of receiving a medal varied with the level of New Deal support prior to 1940: higher welfare spending spelled more heroism.

FIGURE 1   THE GEOGRAPHY OF PATRIOTISM AND GOVERNMENT SUPPORT IN WORLD WAR II

a) War bonds

b) Volunteers

c) Medals
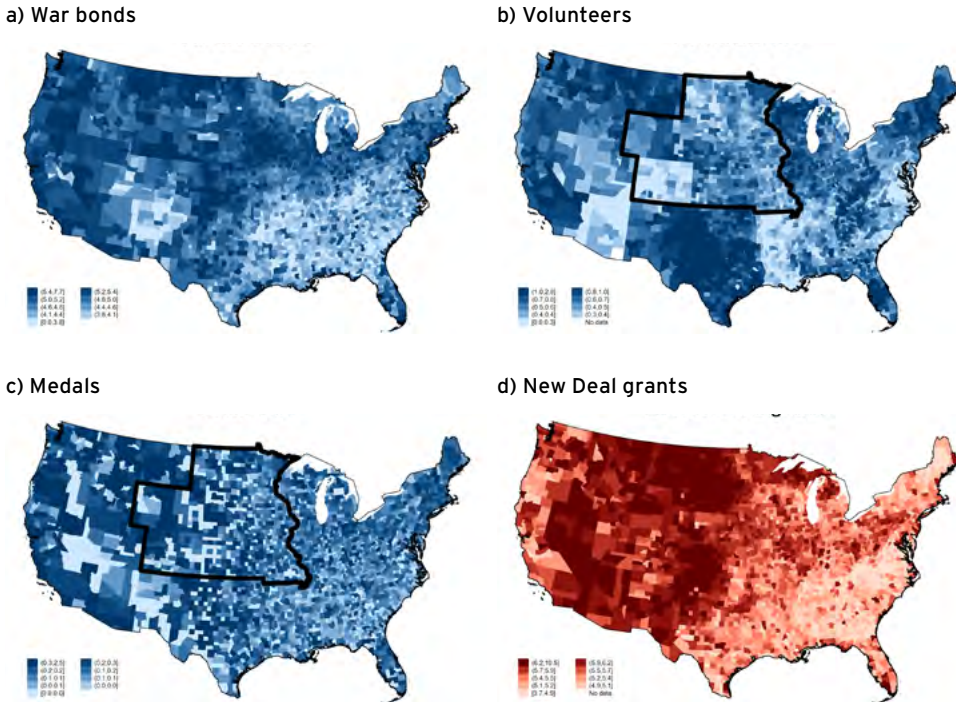
d) New Deal grants

Notes: Panel A: war bond purchases in 1944 per 1940 population (Inverse Hyperbolic Sine, IHS). Panel B: WWII volunteers per 100 people. Panel C: WWII medals per 1000 people (IHS). Panel D: New Deal grants per capita (IHS). Panel B and C show the border of 7th Service Command in black. Because we are not confident about quality of military data for these states, we exclude them in baseline volunteers and medals results.

Source: Caprettini and Voth (2023).

FIGURE 2   NEW DEAL SPENDING AND PATRIOTISM
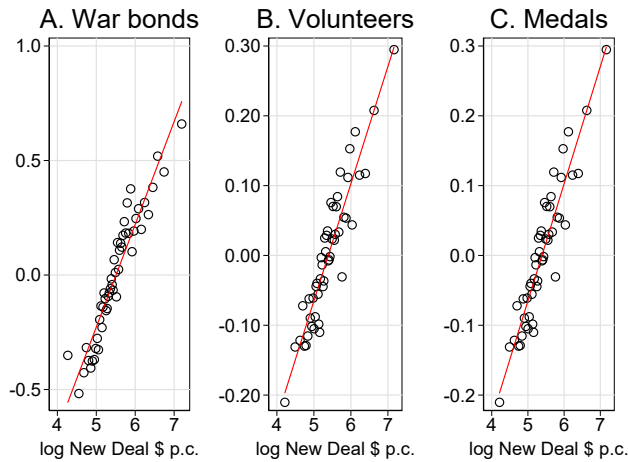
Notes: Graphs are bin-scatters of New Deal grants per capita (IHS, x-axes) and WWII patriotism (y-axes); red lines are linear fits. Panel A: patriotism measure is war bonds purchases per capita (IHS, y-axis). Panel B: patriotism is WWII volunteers per 100 people (y-axis). Panel C: patriotism is WWII medals per 1,000 people (IHS, y-axis). Each of the three WWII patriotism measures are residualized with respect to WWI volunteering and WWI medals. Sample excludes the 7th Service Command in Panel B and C.

Source: Caprettini and Voth (2023).

FROM DROUGHT TO SACRIFICE

Is it the social spending that drives patriotism or is there some other, hidden variable that simultaneously affects welfare support and patriotic actions? For example, it could theoretically be that in areas where the government stepped in to help farmers, often paying them to stop producing, laborers and share-croppers suffered from this intervention. If in 1941 they were still affected by such interventions, they may have turned to the Army as a more attractive employer than the (inactive) farms. While at the county level we would find a correlation of income support and volunteering, the causality would go in the opposite way: government intervention, in this case, would have led to more patriotic actions by hurting the incomes of the most vulnerable.

Two important pieces of information speak against such as reversed-causality interpretation. First, we show that the correlation between welfare and patriotism is strong when we take results to the individual level. We can link individuals who volunteered to their census returns in 1940. In this way, we know their profession and we know whether they were in occupational categories that directly benefitted from social spending, or were more likely to have been hurt by it.

First, we look at people directly employed by the Works Progress Administration (WPA), a gigantic employment programme instigated by the federal government. We find that those employed by this scheme volunteered with a much greater frequency. Second, we consider homeowners. In areas with massive support for homeowners, those who

reported owning their primary residence volunteered more. Finally, we show the same pattern for farmers: farm-owners in areas with more support to farmers joined the ranks in much greater numbers. In addition, we show that farmhands – those workers who were hurt by New Deal-induced unemployment – were significantly less inclined to fight. Individual-level records thus not only confirm a clear causal link from welfare to patriotism, they also reveal that the effect rans both ways. When war came, workers who had been neglected in their hour of need were less ready to sacrifice themselves for their country.

Second, we use weather variation to provide further evidence that the link between government support and patriotism is arguably causal. The New Deal paid a great deal of attention to the plight of farmers. In particular, the Agricultural Adjustment Act (AAA) paid farmers to take land out of production and compensated them for losses due to soil erosion. Some 12% of spending went to farmers, putting an average of $386 into their pockets (the median annual wage in 1939 was $880). Some of the agricultural support was allocated for reasons not reflecting economic conditions. In particular, a significant share of spending was driven by committee membership in the US Congress. Districts who had a long-serving congressman typically received more AAA funds than other, similarly blighted but less well-connected districts. We use the part of the variation in AAA spending that is driven by 'connections' rather than the underlying characteristics of the county population to explain the patriotic behaviour. We find a strong effect of such spending, which goes in the same direction as the baseline correlation: more spending drive by Congressional committee membership spelled more patriotism across rural America.

Similarly, we can use agricultural spending driven by idiosyncratic weather shocks. The 'Dust Bowl' (Hornbeck 2012) saw millions of farmers reduced to poverty and misery as a large part of the topsoil in the Mid-West was blown away in huge sandstorms. The federal government stepped in to help. Where it did so, patriotism in World War II was much higher (as illustrated in Figure 3). Droughts in the 1930s were unusually severe, and they often occurred in places where few droughts had broken out in earlier years. Where similar weather shocks happened before the New Deal – and without help from the government for those affected – we see no increase in patriotism, either in World War I or World War II. Figure 4 presents these placebo results. They strongly suggest that the patterns we document reflect a causal effect of social support on patriotic actions.

FIGURE 3   DROUGHTS AND PATRIOTISM
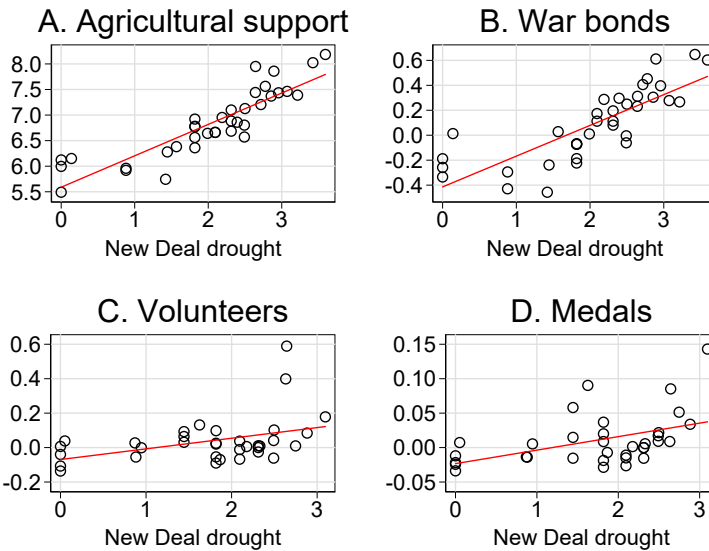
Notes: Graphs are bin-scatters of New Deal drought (x-axes) against agricultural support and patriotism (y-axes); red lines are linear fits. Panels A and E: first stage; agricultural support per farmer (IHS) on the y-axes. Agricultural support is AAA grants plus FCA loans per farmer. Panels B–D: reduced forms; measures of WWII patriotism on the y-axes. Panel B: patriotism is war bonds purchases per capita (IHS). Panel C: patriotism is volunteers per 100- people. Panel D: patriotism is medals per 1000 people (IHS). Each of the three WWII patriotism measures are residualised with respect to WWI volunteering and WWI medals. Sample excludes the 7th Service Command in Panel C–D.

Source: Caprettini and Voth (2023).

FIGURE 4   PRE-NEW DEAL DROUGHTS AND PATRIOTISM
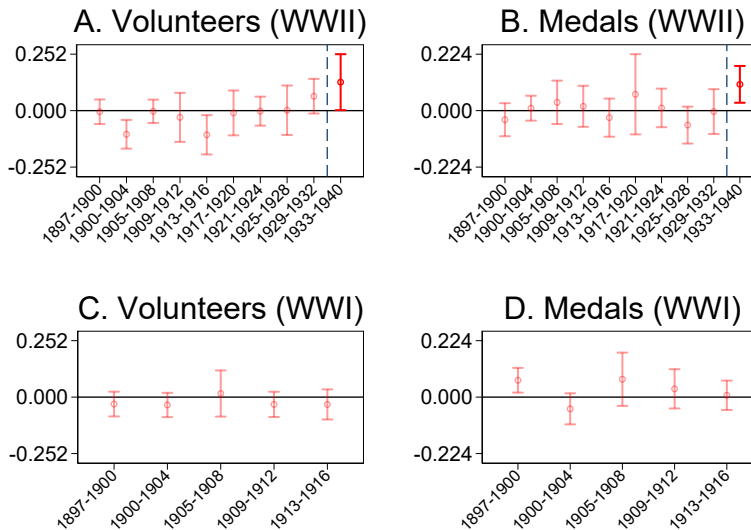
Notes: Coefficients and 95% confidence intervals of the effect of droughts on patriotism. Dependent variables are: Panel A: WWII volunteers per 100 people. Panel B: WWII medals per 1000 people (IHS). Panel C: WWI volunteers per 100 people. Panel D: WWI medals per 1000 people (IHS). Regressions include state fixed effects and controls from 1930 (Panels A–B) or 1910 (Panels C–D). Standard errors clustered at climatic division level. Panels A–B: dashed line marks Roosevelt's inauguration (4 March 1933).

Source: Caprettini and Voth (2023).

Interestingly, the New Deal created a new geographical pattern of patriotism in the United States. When we compile the same data for World War I, for which the information on volunteers and medal recipients is also available, we find no correlation with 1930s spending. This also puts to rest any concerns that more federal help went to areas that were more patriotic to start with.

We also examine whether patriotic actions simply reflected support for the US wartime president, Franklin D. Roosevelt. Using the 1940 election results, we show that the geography of patriotic actions cannot be explained by voting for the democratic candidate.

SOCIAL SPENDING AND SUCCESSFUL NATION BUILDING

In his best-selling book, *Sapiens*, Yuval Harari contends that the primary difference between humans and chimpanzees is the "mythical glue" that binds together large numbers of individuals and groups, which has enabled us to become "masters of creation". The source of this "mythical glue" has been widely debated in the literature, with many attributing it to shared language, schoolroom indoctrination, transport integration and common narratives (Weber 1976, Alesina et al. 2017, Aghion et al. 2018). In this chapter, we offer a complementary perspective: we argue that social spending can also create Harari's mythical glue. When the US federal government began to look out for its citizens' needs for the first time on a substantial scale, men and women who benefitted repaid the largesse by becoming more patriotic.

Powerful propaganda reminded Americans that the New Deal's main purpose was to look after America's 'forgotten men'. When ordinary Americans in times of need had less reason to feel forgotten, they repaid Uncle Sam in both cash and blood: areas that benefitted from New Deal programmes saw more war bond purchases, and they produced more volunteers and more soldiers who fought with outstanding courage and distinction. Thus, we find clear support for 'relational state capacity' (Müller-Crepon et al. 2021) – the notion that a rich web of mutual trust, reciprocal support and informational clarity underpins the rise of powerful states. Equally importantly, we demonstrate that tangible, important material advantages – especially, social support during hard times – can create and strengthen patriotic sentiment, making citizens feel that they are part of a larger national whole.

REFERENCES

Aghion, P, T Persson, D Rouzet and X Jaravel (2018), "Education and Military Rivalry", *Journal of the European Economic Association* 17(2): 376–412.

Alesina, A, B Reich and A Riboni (2017), "Nation-Building, Nationalism and Wars" NBER Working Paper No. 23435.

Anderson, B (2006), *Imagined Communities: Reflections on the Origin and Spread of Nationalism*, Verso Books.

Caprettini, B and H-J Voth (2023), "New Deal, New Patriots: How 1930s Government Spending Boosted Patriotism During World War II", *Quarterly Journal of Economics* 138(1): 465–413.

Colley, L (2009), *Britons: Forging the Nation, 1707-1837*, Yale University Press.

Folsom, B W (2009), *New Deal or Raw Deal? How FDR's Economic Legacy has Damaged America*, Simon and Schuster.

Hornbeck (2012), "The Enduring Impact of the American Dust Bowl: Short- and Long-Run Adjustments to Environmental Catastrophe", *American Economic Revivew* 102: 1477–1507.

Levi, M (1988), *Of rule and revenue*, University of California Press.

Müller-Crepon, C, P Hunziker and L-E Cederman (2021), "Roads to rule, roads to rebel: relational state capacity and conflict in Africa", *Journal of Conflict Resolution* 65: 563–590.

Nora, P (1989), "Between Memory and History: Les lieux de mémoire", *Representations* 26: 7–24.

Tilly, C (1992), *Coercion, Capital and European States: AD 990 - 1992*, Wiley-Blackwell.

Weber, E (1976), *Peasants into Frenchmen: the modernization of rural France, 1870-1914*, Stanford University Press.

ABOUT THE AUTHORS

Bruno Caprettini is Assistant Professor at the University of St Gallen, where he is affiliated with the Swiss Institute for International Economics and Applied Economic Research (SIAW). He holds a PhD from Universitat Pompeu Fabra (Barcelona) and before joining St Gallen he was SNSF Ambizione Fellow at the University of Zurich. He works on political economy, economic history, and economic development and has published articles in *American Economic Review, Quarterly Journal of Economics* and *AER-Insights*.

Hans-Joachim Voth is an economic historian who currently holds the UBS Foundation Professorship of Economics at the University of Zurich, where he also serves Scientific Director of the UBS Center for Economics in Society. He received his PhD from Nuffield College, Oxford, in 1996. Prof. Voth has published more than 50 articles including in the *American Economic Review*, *Quarterly Journal of Economics*, *Journal of Political Economy, The Review of Economic Studies, PNAS, The Review of Economics and Statistics, AEJ-Applied*, and *AER-Insights*, as well as three academic books. He has

served as Managing Editor of the *Economic Journal* and an Associate Editor of the *Quarterly Journal of Economics*; he is a Fellow of both the Econometric Society and the Royal Historical Society.

CHAPTER 26

What motivates leaders to invest in nation building?

Paola Giuliano,[a] **Bryony Reich**[b] **and Alessandro Riboni**[c]
[a]UCLA Anderson School of Management; [b]Kellogg School of Management;
[c]Ecole Polytechnique

1 INTRODUCTION

There is an abundance of evidence of significant investment in nation building by national leaders across time and space. From mass education and language policies to compulsory military service for all young men; from elites in 19th century France who aimed to "form French citizens" (Weber 1979, as well as Chapter 8 of this eBook by Blanc and Kubo) to recent education reforms in China designed to shape citizens' ideology (see Chapter 11 based on Cantoni et al. 2017).

Why do some leaders invest in significant nation-building policies while others do not? Why does nation building occur at certain junctures in time and not others? In our research, we investigate what motivates leaders to engage in nation building. We argue that threats to their regime motivate rulers to invest in significant nation building and that the type of threats that provoke nation building have largely materialised since the 19th century.

Both internal and external threats to regimes have induced nation building by leaders, and we examine both in our research. In Alesina et al. (2021), we study internal threats and argue that the threat of democratisation drives significant nation building by elites. Democratic transitions, which have occurred since the 19th century, have been associated with large investments in nation building. In particular, they have been associated with a

major nation-building policy – namely, the introduction of mass education of children. In Alesina et al. (2020), we examine external threats and argue that threats of war prompt nation building when warfare is large-scale. Improvements in war technologies since the 19th century changed warfare to require much larger armies. Nation building then became important as a tool of warfare to motivate large numbers of citizens to fight.

We define nation building as a process leading to a commonality of preferences, goals and identity of citizens within a country, such that they do not wish to separate. We model 'homogenisation' as a technology that can be used by the ruler (democratic or otherwise) to shift the preferences, ideology, language or culture of the population closer to the preferences, ideology, language or culture of the ruler. A predominant tool that rulers use to homogenise their populations is mass education. Education has been used to indoctrinate and teach citizens that the ruling regime is not so bad. Chapter 11, based on Cantoni et al. (2017), examines a Chinese education reform that aimed to shift the ideological position of students, in terms of their view of free markets and political systems, towards that of the government. Education has also been used to create national languages. In France and Italy, for example, the language of the elites became the national language via mass education. Mass education has also facilitated the creation of a national culture and shared identity (Weber 1979).

We first discuss the role of the democratic transition in driving homogenisation and nation building, and then the role of wars.

2 NATION BUILDING AND THE DEMOCRATIC TRANSITION

In Alesina et al. (2021), we argue that the type of leader, and how 'secure' that leader feels, determines how much she invests in nation building. We show that autocratic rulers or ruling elites who are threatened by democracy invest in significant nation building. In contrast, democratic leaders, as well as autocratic rulers who are at little risk of being overthrown, undertake less – if any – nation building.

We identify two motives for rulers to nation build when threatened by democratic overthrow. First, homogenisation helps to indoctrinate the population to better reflect the ruler's preferences, so that the population will be more likely to choose to maintain the ruler's preferred status quo under a future democracy. Second, to the extent that it reduces distaste towards the regime, homogenisation can lower the threat of overthrow and help a ruler hold onto power.

We will focus our empirical discussion on mass primary education, a predominant homogenisation tool used by rulers. Our argument suggests that leaders should implement mass education to homogenise their citizens before democratisation and in response to the rise of that very threat to power.

In Alesina et al. (2021), we delve into the timing of mass education reforms and examine whether they occur at the same time (or just after) an increased threat of overthrow. We show that when non-democratic regimes are threatened by protests and other uprisings, they are more likely to implement education reforms, such as introducing compulsory primary education, or to oversee large increases in primary enrollment.

We next illustrate some historical examples of threats of democracy and the mass education reforms that resulted from those threats. These historical examples allow us to provide insight into the nation-building motives of rulers to implement those reforms.

During the 19th century, European countries moved from little or no government intervention in schooling to centralised full-time primary schooling that was compulsory for all children within the nation. This change was all the more surprising because it was unpopular with the masses and it occurred decades before similar welfare interventions. In Germany, for example, most children were attending public primary schooling by 1870, whereas the first compulsory insurance system was not introduced until 1883. These education reforms during the 19th and early 20th centuries typically followed periods of unrest and were implemented with the stated aim of mitigating the effects of democratisation.

In 1860, French was still a foreign language to half of all French children. Outside the major cities, France was a country of different languages, dialects and diverse currencies. Travel far outside one's own village was rare, and indifference or hostility towards the French state common. Before the French Revolution, there was little homogenisation of the wider population (Weber 1979). The first serious attempt to implement mass schooling was made in 1833 following a period of major rebellion (the 'July Revolution' of 1839–32). What was perhaps the most intense period of schooling reform followed the establishment of the Third Republic in 1870. Hobsbawn (1990) describes this period as one in which the inevitability of a shift of power to the wider population became clear. Weber (1979) details how schooling during this period was regarded by the rulers of France as a key tool for moving the values and way of life of the population towards those of the rulers and making "the French people French" (p. 303).

Following the unification of Italy in 1861 – a process led by a Northern elite – Massimo d'Azeglio (one of the founders of unified Italy) famously remarked: "Italy has been made; now it remains to make Italians." This was a time of increasing pressure for more democracy, and the motive for introducing compulsory schooling as a result of the threat of democratisation can be observed directly in statements by Italian politicians of the time. Francesco Crispi, the Italian Prime Minister from 1887–1891 and 1893–1896, wrote: "I do not know if we should feel regret at having broadened the popular suffrage before having educated the masses" (Duggan 2002: 340). The politician Nicola Marselli claimed that Italy had introduced freedom before educating the masses, omitting to learn lessons from countries like Britain, which had educated first. Michele Coppino, the author of the 1877 Italian compulsory education reform, declared that primary schooling should

ensure the masses were "content to remain in the condition that nature had assigned to them" and that the aim of elementary education should be to "create a population ...devoted to the fatherland and the king" (Duggan 2007: 289–290). Enough education to homogenise, but not too much to create rebellious masses.

The French Revolution and recurring uprisings in France scared ruling elites that populations could and were willing to overthrow the existing order. They also sparked uprisings in other countries. The relationship between the perceived threat of democracy and mass education in Europe can be seen from Figure 1. We take the years of major uprisings in France – defined as major episodes of collective violence involving a large number of people engaging in "seizing or damaging persons or property" – between 1830 and 1875 from Tilly et al. (1975). Figure 1 shows that major education reforms across Europe (from Flora 1983) were largely concentrated in periods of insurrections in France, a proxy for democratic threats in Europe in this period. In Alesina et al. (2021), we provide consistent evidence on the relationship between fear of democracy and nation building in a large sample of 172 countries for the period between 1925 and 2014, finding that more unstable autocracies are likely to implement education reforms. We also show that nation-building policies helped leaders to stay in power.

FIGURE 1   INSURRECTIONS IN FRANCE AND EDUCATION REFORMS ACROSS EUROPE
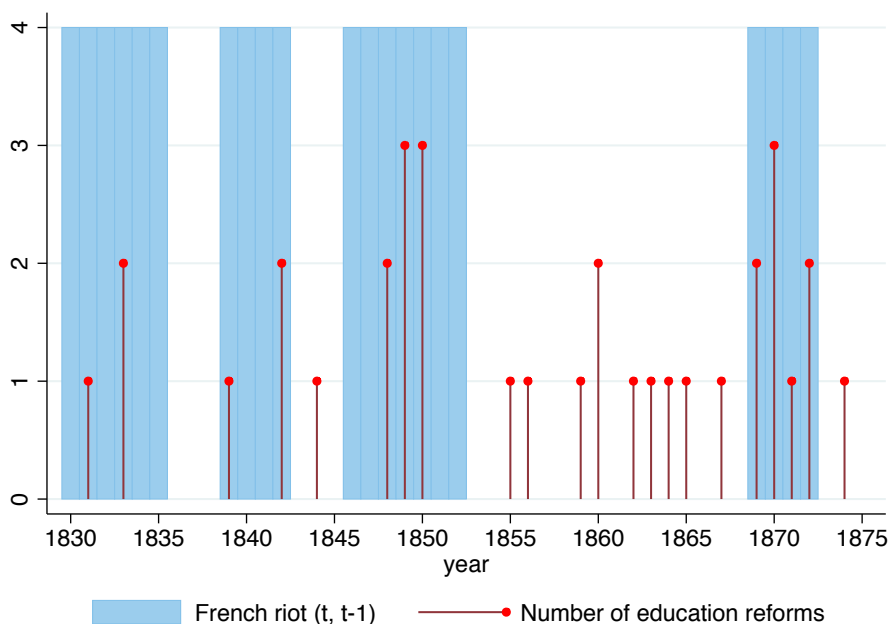
Paglayan (2021) also examines the introduction of compulsory primary schooling and primary enrollment rates across the world. Consistent with our argument, the author shows that states implemented mass education before democratisation and that mass education typically occurred in the decades immediately preceding democracy. Using a dataset of more than 30 countries in Europe and Latin America, she finds that compulsory primary schooling laws were introduced, on average, 52 years before democracy and 36 years before male suffrage. Analysing enrollment in more than 100 countries, she also finds that in 75% of countries that democratised, a majority of children were already enrolled in primary education before democratisation occurred. That is, rulers made sure to educate the bulk of their population on their own terms before democratisation.

In Alesina et al. (2021), we also provide historical evidence on educational policies by colonisers. Colonisers are different from domestic rulers; if overthrown, they can simply leave the country. Since their incentives to homogenise are lower, one would expect lower propensity to implement educational reforms. This is indeed what we find. In contrast to Britain, which introduced compulsory education in 1870, education in the Caribbean British territories came much later (in 1915 in Honduras and in 1921 in Trinidad). In African countries, education was mostly provided by missionaries. Colonisers did not make an effort to build cohesive nation-states, as building a national identity would be counter-productive to a coloniser if it served to increase support for nationalist movements and independence.

3 NATION BUILDING AND MASS ARMIES

In Alesina et al. (2020), we argue that whether the threat of war motivates leaders to nation build or not is determined by the conduct of war – i.e. whether it is small-scale or large-scale. Due to changes in weapons, communications and transport technologies, the size of armies increased gradually over time, with a sharp increase during the 19th century and reaching a peak in World War II (Scheve and Stasavage 2016, Finer 1975). As the size of armies increased, states switched from paying small armies of mercenaries using the spoils of war to instead using mass conscript armies. As Clausewitz (1832) put it, "[w]ar became the business of the people".

To motivate large, conscripted armies, as well as citizens, to comply with the heavy demands of war, leaders started to provide public goods and invested in nation building. We argue that nation-building policies and public good provision are complementary policies. Governments invest in public goods that match the population's preferences to provide soldiers and citizens with 'something to lose' should they be defeated by an external power. At the same time, governments complement public good provision by investing in what we call 'positive' nation building: they homogenise the population and convince citizens that their national public goods are worth fighting to preserve.

The historical evidence is consistent with the implications of our framework. With relatively small armies, the '*anciens régimes*' of Europe motivated soldiers by simply paying them (more) in victory, without investing in nation building and without providing public goods to the national population as a whole. With the advent of mass armies, to create strong incentives for so many soldiers the elites would have had to spend too many resources. The provision of public goods, which are (at least partially) non-rival, became a better 'technology' for motivating a large army than providing private goods. As a result, in the 19th century and early 20th century, elites increased spending on public services such as transport and infrastructure, and mass public goods such as education and health (Aidt et al. 2006). As argued by Titmuss (1958: 49) : "[wars] could not be won unless millions of ordinary people, in Britain and overseas, were convinced that we had something better to offer than had our enemies—not only during but after the war". In addition, governments complemented public good provision with nation-building policies. Besides mass public instruction, military conscription itself was a powerful instrument in unifying the population. Conscripts were purposefully sent to regions away from home, and regiments formed of soldiers from diverse parts of the country. In Italy, for instance, military service aimed to mould 'Italians' in the shape of those who established the new state in 1861. Giuseppe Guerzoni, a friend of Garibaldi, explained in 1879 that "having made Italy, the army is making Italians". Nicola Marselli expressed in 1871: "I know, too, that Italy has been reunited for only ten years and is not yet established [...] I have always said that even if it had no other purpose, the army would always be a great school of Italian-ness" (Duggan 2007: 274).

General evidence that external threats lead to investment in nation building has been found by Aghion et al. (2019), who investigate education policies in a historical panel data from 19th century Europe and a very broad set of countries in the 20th century. Their work shows empirically that military threats are associated with large enrolments in primary education. They also find that the positive relationship between military threat and primary enrolment is stronger in democracies than in autocratic regimes. One potential explanation is that in a democracy, citizens need to be persuaded to fight with more public goods and nation building, whereas in an autocracy, harsher methods can be used. In line with this interpretation, the paper by Caprettini and Voth (forthcoming) discussed in Chapter 25 of this eBook shows that areas that received more support under the New Deal during the 1930s were associated with a higher level of patriotism during World War II. These areas purchased more war bonds, had more military volunteering, and their soldiers performed more heroic actions recognised with citations and medals.

In Alesina et al. (2020), we also consider more negative forms of nation building. Besides instilling positive national sentiment, in the sense of fostering the value of a nation-state, we show that governments may sometimes instil negative sentiment through aggressive propaganda against an opponent. In this case, national identity is based on fear and stigmatisation of the opponent, not on the material or cultural benefits of one's own

nation. For instance, Tilly (1994) argues that "[a]nti-German sentiment reinforced the desirability of becoming very French, as anti-French, anti-Polish, or anti-Russian feeling reinforced the desirability of becoming very German".

The negative and positive forms of nation building have different implications in terms of public policies. When indoctrination takes the positive form, nation building accompanies public good provision. Conversely, public good provision and anti-foreign propaganda are substitutes and no longer complements. This suggests the possibility of two types of nation building: nations that invest in mass public goods and positive nationalism, and nations that do not provide public goods and invest in anti-foreign nationalism. In Alesina et al. (2020), we show that states with low fiscal capacity will motivate the population with anti-foreign propaganda rather than with positive nation building. This result is consistent with Wimmer (2013, 2019: 18), who argues that whether nationalism develops in a more inclusive or exclusive direction is related to a country's state capacity: "Inclusive ruling coalitions—and a correspondingly encompassing nationalism—have tended to arise in countries with a long history of centralized, bureaucratic statehood [...] Where state elites were weaker vis-a-vis other elites and the population at large, they were not able to offer sufficient public goods and political participation to make the nation an attractive enough category to identify with."

4 CONCLUSIONS

Our work contributes to the literature on nation building. While previous studies have investigated the extent to which specific nation-building policies are successful at homogenising the population, our work focus on motives of leaders to engage in nation building. Both of our papers establish theoretically and confirm empirically that threats to a regime motivate nation building.

In the early 1990s, many predicted the decline of nationalism (e.g. Hobsbawm 1990). Since then, however, nationalism has been on the rise. Our work suggests that the rise of autocracies worldwide and the intensification of interstate tensions are two factors that might contribute to this revival. The heyday of nationalism may be yet to come.

REFERENCES

Aghion, P, X Jaravel, T Persson and D Rouzet (2019), "Education and military rivalry", *Journal of the European Economic Association* 17(2): 376–412.

Aidt, T, J Dutta and E Loukoianova (2006), "Democracy comes to Europe: Franchise extension and fiscal outcomes 1830–1938", *European Economic Review* 50(2): 249–283.

Alesina, A, B Reich and A Riboni (2020), "Nation-building, nationalism, and wars", *Journal of Economic Growth* 25(4): 381–430.

Alesina, A, P Giuliano and B Reich, B. (2021), "Nation-building and education", *The Economic Journal* 131(638): 2273–2303.

Cantoni, D, Y Chen, D Y Yang, N Yuchtman and Y J Zhang (2017), "Curriculum and Ideology", *Journal of Political Economy* 125(2): 338–392.

Caprettini, B and J Voth (forthcoming), "New Deal, New Patriots: how 1930's Government Spending Boosted Patriotism during WW II", *Quarterly Journal of Economics*.

Clausewitz, C (1832), *Vom Kriege* [*On War*], Dümmlers Verlag.

Duggan, C (2002), *Francesco Crispi 1818-1901: From Nation to Nationalism*, Oxford University Press.

Duggan, C (2007), The Force of Destiny: A History of Italy since 1796, Penguin.

Hobsbawm, E J (1990), *Nations and nationalism since 1780: Programme, myth, reality. The Wiles lectures*, Cambridge University Press

Finer, S E (1975), "State and nation-building in Europe: the role of the military", in C Tilly (ed.), *The Formation of National States in Western Europe*, Princeton University Press, pp. 84–163.

Flora, P (1983), *State, Economy, and Society in Western Europe 1815-1975. A Data Handbook. Vol. 1. The Growth of Mass Democracies and Welfare States*, Campus Verlag.

Paglayan, A (2021), "The Non-Democratic Roots of Mass Education: Evidence from 200 Years", *American Political Science Review* 115(1): 179–198.

Scheve, K and D Stasavage (2016), *Taxing the Rich: A History of Fiscal Fairness in the United States and Europe*, Princeton University Press.

Tilly, C (1994), "States and Nationalism in Europe 1492-1992", *Theory and Society* 23(1): 131–146.

Tilly, C, L Tilly and R Tilly (1975), *The Rebellious Century 1830-1930*, Harvard University Press.

Titmuss, R M (1958), *Essays on the welfare state*, George Allen and Unwin.

Weber, E (1979), *Peasants into Frenchmen: Modernization of Rural France, 1870–1914*, Chatto & Windus.

Wimmer, A (2013), *Waves of war: Nationalism, state formation, and ethnic exclusion in the modern world*, Cambridge University Press.

Wimmer, A (2019), "Why nationalism Works and Why It Isn't Going Away", *Foreign Affairs,* March–April.

ABOUT THE AUTHORS

Paola Giuliano is a Professor of Economics at the UCLA Anderson School of Management and holds the Chauncey J. Medberry Chair in Management. She is also a Research Associate at NBER, Research Affiliate at CEPR and Research Fellow at the Institute for the Study of Labor. Giuliano's main areas of research are culture and economics, and political economy. She received the Young Economic Award from the European Economic Association in 2004 and was coeditor of the *Journal of the European Economic Association* from 2015 until 2021. Giuliano holds a BA from Bocconi University and a PhD in Economics from the University of California, Berkeley.

Bryony Reich is Assistant Professor at Kellogg School of Management at Northwestern University. Her work uses economic theory to explore social interactions and social capital and their impact on economic outcomes. A focus of this work examines diverse societies and the role of government policy on diversity and cohesion. She earned her PhD in Economics from the University of Cambridge.

Alessandro Riboni is a Professor of Economics at Ecole Polytechnique in France, a research member of CREST, and a research fellow at the CEPR. He specializes in political economy, law and economics, and macroeconomics. He holds a BA in economics from Bocconi University and a PhD in Economics from the University of Rochester.

CENTRE FOR ECONOMIC POLICY RESEARCH

This book presents a synthesis of key recent advances in political-economy research on the various approaches and strategies used in the process of building nations throughout modern history. It features chapters written by leading scholars who describe the findings of their quantitative analyses of the risks and benefits of different nation-building policies. The book is comprised of 26 chapters organised into six sections, each focusing on a different aspect of nation building. The first chapter presents a unified framework for assessing nation-building policies, highlights potential challenges that may arise, provides a summary of each of the other chapters, and draws out the main lessons from them. The following chapters delve into the importance of social interactions for national identification, the role of education, propaganda and leadership, external interventions and wars, and the effects of representation and redistribution. The book offers a nuanced understanding of effective nation-building policies.