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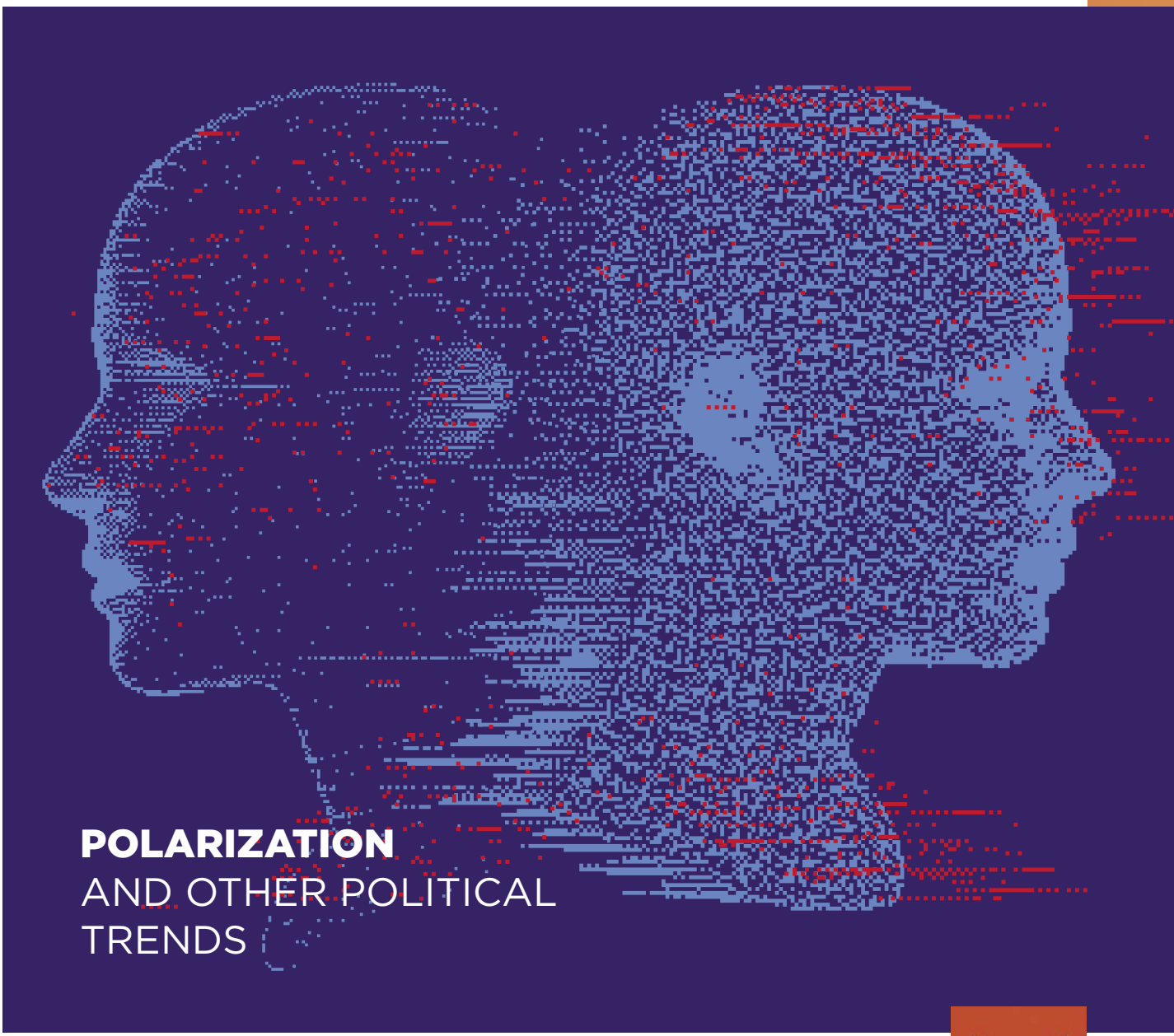

POLARIZATION
AND OTHER POLITICAL
TRENDS

JORGE PENA
ON HIS WORK ON
COOPERATION
ALGORITHMS

ZACHARY GARFIELD
LEADERSHIP OF
ZELENSKY AND PUTIN

JEFFREY FRIEDMAN
THE RELATIONSHIPS
BETWEEN NATO AND
RUSSIA

NATALIIA SHAPOVAL
THE SITUATION IN
UKRAINE

In this ISSUE

Biannual magazine of the Institute for Advanced Study in Toulouse

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OUR SCIENTIFIC VISION

The Institute for Advanced Study in Toulouse is a unified scientific project that aims to study human behavior.

Our ambition is to break down artificial disciplinary boundaries to unlock new ideas and address the challenges of the 21st century. We have a team of resident full-time researchers in Toulouse, meeting several times a week across all social-science disciplines.

IAST researchers also work in partnership with economists and mathematicians at Toulouse School of Economics, Toulouse 1 Capitole University, INRA and CNRS. Our methods focus on analytical and quantitative methods, including case-study evidence. We believe our work needs to spread across the oceans and therefore, year after year, we welcome some of the world's best researchers, including a network of visitors from 27 countries.

IAST MAG #19 CONTENTS

IAST in the news | 4
Events & press

Podcasts | 5
Crossing Channels

We are on the good side of history | 6
Views from Kyiv, Cambridge and IAST

IAST members on war in Ukraine | 8
Zachary Garfield, Jeffrey Friedman

POLARIZATION

How much do voters care about policies? | 12
Charlotte Cavaillé, Daniel Chen and Karine Van der Straeten

Are patriots more obedient citizens? | 14
Jane Conway and Sylvie Borau

Why do we believe fake news? | 16
Bence Bago

Can Facebook help to keep politicians in check? | 18
Horacio Larreguy

How do Muslim elites cope with French hostility? | 20
Margot Dazey

From equations to cooperation | 22
Jorge Peña

Editorial

Social science in the shadow of war

INGELA ALGER

IAST Director

As IAST Magazine goes to press, the upcoming French presidential election has been overshadowed by the invasion of Ukraine. "All war is a symptom of man's failure as a thinking animal," wrote John Steinbeck. The scientific community can seek to prevent such terrible failures, by enhancing our understanding of how we got here, and by informing society with neutral, evidence-based analysis following the highest scientific standards. Truth must not be added to the list of casualties.

Tightly enmeshed with other disturbing trends such as resurgent nationalism and misinformation, our focus in this issue is on political polarization. Jeffrey Friedman offers his perspective on the debate over Nato expansion. We also feature highlights from a special episode on Ukraine in our new Crossing Channels podcast, in which Horacio Larreguy stresses the importance of the information war. While the Kremlin has demonstrated a fearsome ability to resort to misinformation at home and abroad, the Ukrainian President's digital communications strategy has been highly effective in recent weeks. Emphasizing the power of such tools to both strengthen and weaken democracy, Horacio also presents his research in Mexico showing the potential for social media platforms to improve electoral accountability.

Misinformation is a central concern for Bence Bago, who has conducted extensive research on the cognitive mechanisms that make us susceptible to untruths. Here, he discusses his analysis of the role of emotions and political ideology in the spread of fake news. Fellow psychologist Jane Conway demonstrates that nationalism is another double-edged sword. Xenophobic authoritarians may have given nationalism a bad name, but her research reminds us that group solidarity can be a powerful prosocial force. In particular, she shows that national identity is positively associated with compliance with Covid-19 health restrictions.

Also in these pages, Margot Dazey's ethnographic analysis highlights the role of class in polarizing the responses of French Muslims to stigma and exclusion. Karine van der Straeten, Daniel Chen, and Charlotte Cavaillé urges political scientists to use more accurate tools to measure not just what voters want, but how strongly they want it. And Jorge Peña offers a timely reminder of the better angels of our nature, discussing his fascination with eusocial species in which individuals make sacrifices for the common good.

We wish you an enjoyable read but, above all, our thoughts are with the people of Ukraine and of Russia who suffer enormously from the consequences of the invasion, and our hopes are for a just and quick resolution to this catastrophic war.

IAST IN THE NEWS

IAST IN THE PRESS

IAST IN THE PRESS

Daniel Chen's work on the judiciary system and its biases has once again been covered in the press, this time in *Jacobin* magazine. Manvir Singh replied to *USA Today* on whether Bill Gates could be considered a modern witch in the context of conspiracy theories regarding Covid-19 vaccines.

EVENT

INGELA ALGER AT THE QUAI DES SAVOIRS AND BRAIN WEEK

The IAST Director joined an outreach event dedicated to mathematics at the Quai des Savoirs where scientists held quick, one-on-one chats to explain their work. Together with Affiliated Faculty Chlöé Farrer, she also spoke about how neuroscientists and economists collaborate to better understand how we make decision at a Toulouse event organized by Société des Neurosciences.

BOOKS

NEW BOOKS BY IAST ALUMNI

In March of 2022, former IAST Fellow and current Sciences Po Paris sociologist Jen Schradie, has published her book in French, L'illusion de la démocratie numérique : Internet est-il de droite ? Her book uses empirical data and compelling stories to show how the internet has become another weapon in the arsenal of the powerful, especially far-right groups that are part of an eco-system of conservative media, political organizations, and electoral candidates. She conducted the research in the U.S., but this edition provides a French context to explain how someone like Zemmour or Le Pen has gained such prominence.

Former IAST economist Arnaud Philippe, now at the University of Bristol, has released a new book in French, La fabrique des jugements. Using unexploited databases, including the French national criminal records, Arnaud explores the mechanics of judicial decision-making: "How does the avalanche of laws and measures taken by the executive branch influence the work of judges? Is justice delivered uniformly? Is it influenced by current events or the characteristics of the parties? What biases are likely to affect it? Do judges' criteria differ from those of citizens?"

PODCASTS CROSSING CHANNELS

Continuing their interdisciplinary podcast series, researchers from IAST and the Bennett Institute for Public Policy at Cambridge University exchanged ideas and research results on key societal issues. Following the success of the first episode on how hard it has become to govern, featuring Dennis Grube (Cambridge), Catherine Haddon (Institute for Government) and Mohamed Saleh (IAST-TSE), six other episodes have been released:

NOVEMBER Episode 2

What does it mean to bring nature into the economy?
with Matthew Agarwala (Bennett Institute), Cristina Peñasco (Cambridge) and Nicolas Treich (TSE-IAST-INRAe)

DECEMBER Episode 3

Can artificial intelligence be ethical?
with Jean-François Bonnefon (IAST-TSE-CNRS), Daniel Chen (TSE-IAST), and Diane Coyle (Bennett Institute)

JANUARY Episode 4

Broadband before bridges: Can digital technologies leapfrog the obstacles to development?
With Stéphane Straub (TSE-IAST), Stephanie Diepeveen and Rehema Msulwa (Bennett Institute)

FEBRUARY Episode 5

Will levelling up work?
With Sylvain Chabé-Ferret (IAST-TSE), Michael Kenny (Bennett Institute) and Fiona Reynolds (Cambridge)

MARCH Episode 6

Ukraine invasion: Context, consequences and the information war
With Horacio Larreguy (IAST-ITAM), Nataliia Shapoval (Kyiv School of Economics) and Ayse Zarakol (Cambridge)

For highlights of this episode, see pages 6-7

Listen to the Crossing Channels podcast series on Spotify, Apple Podcast, Google Podcast or Youtube

HORACIO LARREGUY,
NATALIIA SHAPOVAL, AYSE ZARAKOL

CROSSING CHANNELS

‘We are on the good side of history’

On March 4, as part of its Crossing Channels series with the Bennett Institute, IAST recorded a special podcast on the invasion of Ukraine. Hosted by Rory Cellan-Jones, this episode featured Nataliia Shapoval (Kyiv School of Economics), Horacio Larreguy (IAST), and Ayse Zarakol (University of Cambridge).

As a Ukrainian economist in situ, Nataliia Shapoval gave her first-hand experience of the war. “In regions where there is active military action - like Kyiv, Kharkiv, Donetsk, Odessa or Sumy - there are water supply problems and they are mostly disconnected from electricity, heating, and gas. Some cities have been completely destroyed and the system can no longer cope with the exodus. Then there is western and central Ukraine where businesses are working and there aren't huge economic issues.”

She also detailed how her 50-strong team of researchers has joined the war effort. “Our work as analysts is to contribute to winning the war: for example, monitoring the damages and estimating the costs in order to make Russia pay the bill. We assess international sanctions, propose new ideas to push Russia to give up the fight, and look into how supply chains can be disrupted and replaced. And we try to participate in conferences and events to share the perspective of Ukrainian people.”

Nataliia complained that this perspective has been largely absent from international media coverage. Adding salt to the wound, Putin has often been portrayed as a chess player rather than a tyrant and war criminal. “I really hate when people start discussing Putin’s ‘strategy’, because killing people is a very easy thing to do and there is not much strategy involved. He's just a murderer. And he spent the last 20 years enslaving his people and building this autocratic regime. People should not call it a strategy; it’s a crime.”

International relations expert Ayse Zarakol agreed that media coverage has failed to consider Ukrainian agency, especially in neorealist narratives that emphasize the role of EU and Nato expansion in provoking the Russian bear. “Ukrainians genuinely expressed their desire to make their own choices about which community they wanted to belong to. So people blaming the West or Nato for the war are overlooking that agency. If anything, what seems to have precipitated this invasion is a perception of Western weakness.”

> “Ukrainians genuinely expressed their desire to make their own choices and people blaming the West or Nato for the war are overlooking that agency”

Nataliia praised the handling of the war by her government. “My teammates are sometimes quite critical but we all are impressed with how well the government is responding. The President hasn’t left Kyiv despite intelligence reports of assassination attempts. His office and the Ministry of Foreign Affairs work 24/7 to talk to international partners, propose sanctions, and request all kinds of support. The Central Bank is supporting macro-financial stability. The exchange rate is fine; the reserves of the bank are OK. They have created military bonds and a special account to collect donations.”

Ukraine has been successful in countering Russian propaganda, said Horacio Larreguy, an expert on misinformation. “When it comes to the information war, and especially the Russian narrative that they are trying to ‘denazify’ the country, it’s clear the Kremlin has lost. But it is unclear how effective the massive Russian propaganda has been at home, where there is another misinformation war going on. Russian people nowadays don’t receive any other narrative than the state-enforced one.”

Europe has also been stirred into action, Ayse insisted. “We've got used to the EU responding to various crises around the world saying, ‘We're very concerned.’ But this time, they're doing significantly more. It might not be enough in the short term but it’s quite a massive response. If the West keeps the pressure up, other countries will have to follow their lead.”

Can the war be stopped? “Whatever happens, Putin is going to spin it as a victory at home,” said Ayse. “The question is: Which terms could both parties agree to? The Ukrainian government has expressed some willingness to discuss neutrality and other guarantees. A peace agreement would be the best case scenario.”

Nataliia envisaged three possible outcomes: “One is that after the next threat to a nuclear plant, foreign leaders will get much more aggressive and this will end Putin's leadership. A second scenario is that the situation will continue as it is, essentially forming a huge frozen conflict like there was in Donbas but on a much larger territory. Third scenario would be an uprising in Russia, because the whole idea of sanctions is not only to isolate Russia or reduce resources for Putin, but also to signal and inform Russian citizens. It's all quite futuristic but we’ve been living in a fantasy book these last weeks.“

Regarding a potential Russian uprising, Horacio again emphasized the importance of information strategies: “It’s fascinating that Ukrainians are allowing captured Russian soldiers to call back home. Essentially, if information can go back to Russia, then a change of perception might be possible and that might be an important angle in the misinformation war.”

Lauding Ukraine’s fighting spirit, Nataliia signed off with a call to arms: “We feel very true to ourselves by fighting against evil. We feel united, and we feel the support from other countries and communities around the world. We are on the good side of history.”

Listen to this Crossing Channels episode on your favorite podcast platforms.

> “When it comes to the information war, it’s clear the Kremlin has lost. But it is unclear how effective the massive Russian propaganda has been at home”

ZACHARY GARFIELD

LEADERSHIP MATTERS

Putin vs Zelensky

What explains the different leadership styles of Vladimir Putin and Volodymyr Zelensky? Drawing on his extensive cross-cultural research, IAST anthropologist Zachary Garfield suggests that the leader–follower dynamics in the war in Ukraine are at least as old as the human species and that the Russian and Ukrainian presidents sit on the opposite sides of the leadership scale.

IS PUTIN'S AUTHORITARIANISM AT ODDS WITH TYPICAL HUMAN LEADERSHIP?

Social scientists have often categorized leadership as based on either dominance (using force, strength, and coercion) or prestige (using respect, expertise, and prosociality). More recently, dominance-based leadership has been linked to our deep evolutionary history and primate heritage. In contrast, prestige-based leadership is associated with cultural evolution and human uniqueness.

In a study of 59 mostly non-industrial societies, my colleagues and I have analyzed leadership qualities and patterns. We found evidence for coercive leaders in 60% of societies. Such leaders commonly enforce punishments, are aggressive and feared, facilitate political appointments, and work to control economic systems. Putin's ruthless leadership style clearly fits this model of political dominance. In response to internal dissent, the Kremlin has enacted martial law, closed borders, enforced punitive military service, and arrested more than 4,300 Russians for anti-war demonstrations. State propaganda has emphasized his physical prowess, depicting him as a bare-chested hero conquering "the wild".

Across cultures, individuals and societies seem to disfavor overly dominant leaders. But autocrats like Putin can benefit from an important exception to this trend: our preference for dominant leaders increases when we face external threats. Surveys of Poles and Ukrainians during the Crimea crisis in 2014 suggest that dominant leaders are perceived as better equipped to execute beneficial aggressive responses during times of conflict. By portraying Ukrainian leaders as "neo-Nazis", Kremlin propaganda plays on Russian fears of a familiar enemy.

HOW DOES ZELENSKY MEASURE UP?

On the other side of the conflict, Zelensky's style strikes familiar chords with various cultural, philosophical, and political models of leadership. With his background in the arts, comedy, and law, he embodies many of the characteristics of Plato's "philosopher king" who possesses deep knowledge of the human condition. Similarly, his oratorical flair matches Max Weber's depiction of the charismatic leader who inspires others through expressive communication of emotions, values, and "calls to arms".

> "Across cultures, societies tend to disfavor dominant leaders, with an important exception: preference for dominant leaders increases when facing external threats"

In our cross-cultural data, we found that non-coercive leaders are often described as having humility, oratorical skill, and charisma. These traits cluster together with other prosocial talents, such as good decision-making, being culturally progressive, fairness, and interpersonal skills. These qualities seem likely to increase the power of Zelensky's calls for international assistance given that, across cultures, people generally want to support this type of leader.

WHAT CAN WE LEARN FROM THESE COMPARISONS?

Given their extreme differences, it's tempting to situate Putin and Zelensky on either end of the dominance-prestige continuum and categorize their leadership styles as qualitatively distinct. However, ethnography teaches us to be wary of binary perspectives. Across cultures, traits associated with dominance or prestige often overlap. Physical, economic, and coalitional strength is not just useful for coercing the weak, it can also be used to generate and distribute economic benefits, gaining loyalty and respect. Bravery is linked to aggressiveness, coercion, and dominance, particularly in military contexts, but it is also associated with defense, moral values, and prosocial investment. Prestigious leaders often serve as cultural role models and Zelensky has quickly become a symbol of Ukrainian resilience, awarding "bravery medals" to wounded soldiers, medical workers, and other national heroes.

This conflict is a great example of the importance of leadership. Even in our large-scale, multifaceted societies with governments and administrative procedures, the decisions of a single individual can have global ramifications, particularly when that individual sits at the top of an authoritarian government. But leaders can also inspire, evoke empathy, spark emotional connections, and influence generosity at scale. My hope, and much of my inspiration as an evolutionary social scientist, is that improved understanding of our evolved psychology and rich cultural diversity can guide our societies to better leadership.

JEFFREY FRIEDMAN

Associate Professor of Government
at Dartmouth College, in residence at IAST

War in Ukraine and Nato's expansion

Russian President Vladimir Putin has tried to justify his invasion of Ukraine through the threat posed by Nato. This has launched a fierce debate about Nato's decision to expand eastward after the Cold War and whether that policy has ultimately served the interests of Alliance members. Associate Professor of Government at Dartmouth College and currently visiting IAST, Jeffrey Friedman attempts to decipher the questions at the heart of this debate.

DOES PUTIN GENUINELY PERCEIVE NATO ENLARGEMENT AS A THREAT?

This question is basically unanswerable, as leaders have strong incentives to conceal their true intentions. However, Putin's stated fears of Nato enlargement are not less plausible than the United States' concern about keeping the Soviet military out of Central America and the Caribbean during the Cold War. Nor is Russia's concern about this matter new: Russian President Boris Yeltsin vociferously objected to the launch of Nato enlargement in the 1990s. It thus seems that Nato enlargement predictably provoked Russian hostility against the West, though we of course have no way to estimate just how much this hostility raised the chances of today's war.

WHAT IS THE BALANCE OF POWER BETWEEN NATO AND RUSSIA?

In Ukraine, we can observe that Putin is willing to fight a war that Nato will not join. Meanwhile, many observers have been surprised at Nato members' willingness to incur economic losses in order to sanction Russian aggression in Ukraine. It is thus hard to say how, if at all, the current crisis should shift perceptions of Nato's joint resolve.

> "Major foreign policy decisions are surrounded by extreme degrees of uncertainty, and these uncertainties were much greater in 1994 when Nato announced its intention to expand"

HOW SHOULD THIS DEBATE AFFECT OUR VIEWS OF POLICIES LIKE NATO ENLARGEMENT?

Major foreign policy decisions are surrounded by extreme degrees of uncertainty. And we must remember that these uncertainties were paramount when NATO announced its intention to expand eastward 1994.

In 1994, Vladimir Putin was not a well-known figure, Russia was historically weak, there was tremendous optimism throughout the West about replacing the Cold War with a "new world order" of global cooperation; and it was hard to foresee that the United States would devote twenty years of its foreign policy to armed nation-building in a manner that would sap domestic enthusiasm for military interventions overseas.

We must recognize that there is no way to confidently assess the costs and benefits of foreign policy decisions that are so bold and complex. Perhaps that means we should be skeptical of NATO enlargement's critics, on the grounds that their arguments rely on a host of claims that are all but impossible to prove.

Another reasonable view is that powerful states should generally avoid these kinds of bold and complex endeavors, on the grounds that it is always difficult to know whether these ventures' liabilities will end up outweighing their costs.

Polarization and other political trends

How much do voters care about policies? | 12
Charlotte Cavaillé, Daniel Chen and Karine Van der Straeten

Are patriots more obedient citizens? | 14
Jane Conway

Why do we believe fake news? | 16
Bence Bago

Can Facebook help to keep politicians in check? | 18
Horacio Larreguy

How do Muslim elites cope with French hostility? | 20
Margot Dazey

CHARLOTTE CAVAILLÉ, DANIEL CHEN AND KARINE VAN DER STRAETEN

PREFERENCE INTENSITY

How much do voters care about policies?

'Politics is the art of the possible,' proclaimed Bismarck, but our leaders are not alone in this great balancing act. Voters often face difficult tradeoffs when forming their preferences. Understanding this process, and evaluating policymakers' success in responding to these preferences, is central to political science. In a new study, IAST researchers Daniel Chen and Karine Van der Straeten teamed up with Charlotte Cavaillé (Ford School, University of Michigan, former IAST fellow) to assess two methods for measuring preference intensity. They argue that it is not enough to know what voters want, we must also establish how much they want it.

WHY DO WE NEED BETTER TOOLS FOR MEASURING HOW STRONGLY VOTERS FEEL?

Many questions in political science require understanding the intensity of voters' preferences but this is rarely explicitly measured in surveys. Respondents are often asked about policies using a Likert scale ranging from 'strongly agree' to 'strongly disagree'. But the Likert method suffers from the 'abundance problem', giving respondents only limited incentives to consider tradeoffs across issues, such as immigration control at the expense of access to the European single market. As a result, their answers convey little information about their priorities and the issues they are willing to compromise on.

Another concern, particularly relevant in the US context, is the 'bunching problem'. Partisan polarization may lead to respondents who care intensely about a politicized issue being lumped together with respondents who feel pressure to pay lip service to party norms. This bunching can make results more sensitive to underlying modeling assumptions, as well as favoring predictors tied to partisan identity.

> "Partisan polarization may lead to respondents who care intensely about a politicized issue being lumped together with respondents who feel pressure to pay lip service to party norms"

WHICH METHODS DOES YOUR PAPER INVESTIGATE?

We examine, both theoretically and empirically, two easy-to-implement methods. The Likert+ method combines a Likert item with one that asks respondents whether an issue is personally important to them. The Likert+ and Likert methods should theoretically face some of the same limits, as both suffer from the abundance problem and do not penalize partisan motives.

We also study Quadratic Voting for Survey Research (QVSR), a new method in which respondents have only a limited budget to 'pay' for votes on a bundle of issues. They may express intense preferences by voting repeatedly for the same issue, but each additional vote is increasingly costly. This compels respondents to arbitrate between the issues, mimicking real-world tradeoffs. Unlike the Likert method, in which respondents face no tradeoffs and can pick end-of-scale responses (e.g. strongly favor/oppose) at no cost, QVSR respondents are expected to de-bunch and prioritize issues they care about the most.

HOW EFFECTIVE ARE THESE TOOLS?

To compare these methods, we randomly assign individuals to take the same survey varying only the measurement method. We then give respondents the option to perform tasks – such as donating to a gun-control advocacy group, or writing a letter to a senator – that involve a tradeoff between two policy issues. Higher values on this behavioral outcome imply more resources allocated to this issue, whether in dollars (e.g. amount donated) or effort (e.g. length of the letter). We then compare each tool's ability to discriminate between respondents according to the preference intensity suggested by their behavior.

Our results indicate that asking about issue importance with Likert+ does not convey much more information. In contrast, QVSR more consistently discriminates between intense and weak preferences. Assuming researchers can afford the time to explain it to respondents, QSVR appears to provide a significant improvement over Likert.

We also find that, while Likert items convey little information regarding the likelihood of personally benefiting from a policy, preferences measured using QVSR do. This suggests that people directly affected by a policy, such as a minimum wage increase, have more intense preferences towards it than unaffected individuals.

HOW CAN POLITICAL SCIENCE BENEFIT FROM THIS RESEARCH?

Revisiting debates on the determinants of policy preferences, or the congruence between mass opinions and policy outcomes, we show that conclusions reached using Likert items can change once differences in preference intensity are better accounted for. In particular, we show that, using Likert, large majorities of Republicans and Democrats express support for fiscal discipline. Using QVSR, however, we find Republicans care more about fiscal discipline than Democrats. This suggests that demand-side factors may have played an important role in failed negotiations over the Build Back Better Bill.

Our model lays the foundations for evaluating how the abundance and bunching problems affect the data generation process and, ultimately, hypothesis testing. Our results show the benefits of grounding survey data in a theory of choice. But many methodological issues remain uninvestigated. To facilitate follow-up studies, we have made available a web application enabling researchers to vary key features of the survey method. We hope this will help generate additional evidence on QVSR and other innovative survey methods and spur new research on the measurement strategies that underpin reliable empirical findings.

JANE CONWAY AND SYLVIE BORAU

HEALTH OF THE NATIONS

Are patriots more obedient citizens?

From physical hygiene to acceptance of lockdown restrictions and vaccines, encouraging mass changes in behavior has been central to efforts against Covid-19. What makes us likely to support public health measures? In a new study, IAST psychologist Jane Conway and Toulouse Business School professor Sylvie Borau joined a large international collaboration to investigate whether national identity encourages compliance with pandemic policies.

WHY MIGHT A STRONG NATIONAL IDENTITY PROVE USEFUL DURING A PANDEMIC?

Following World War II, social psychology tended to focus on the negative side of nationalism, such as destructive obedience to authority and group conformity to incorrect beliefs. Subsequently, research on social identity and mental health has revealed the prosocial side to group identity. Recent evidence suggests that a shared sense of solidarity can increase compliance with recommended health behaviors. Identifying with a group (such as a nation) is associated with mutual cooperation and adherence to its norms, motivation to help other members of the group, and collectively oriented actions aimed at improving the group's welfare.

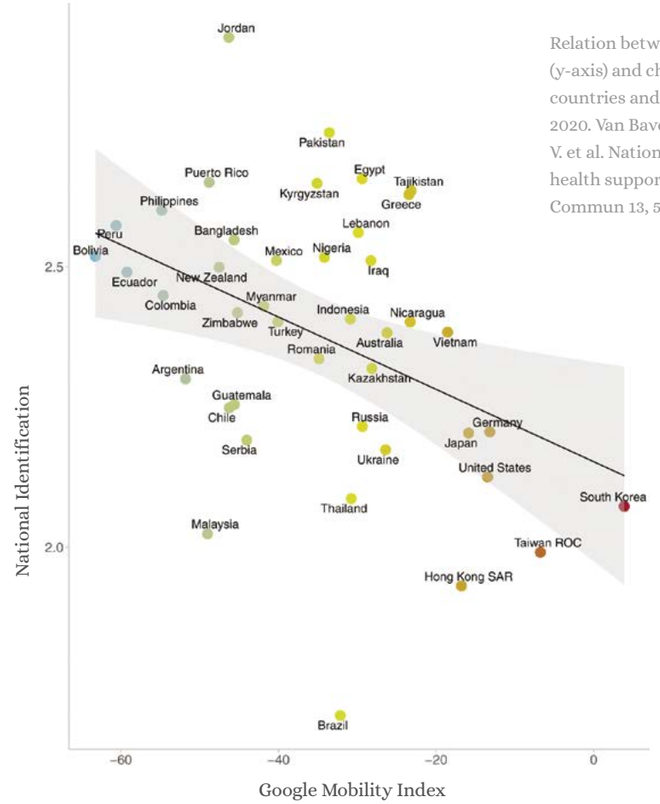
National identity can motivate civic involvement and costly behaviors that benefit other group members. Political leaders have often attempted to foster a sense that "we are in this together" to mobilize support for public health measures. This might be particularly important for counteracting polarization within countries, which can discourage healthy behavior and increase infections and mortality.

HOW DOES NATIONAL IDENTITY DIFFER FROM NATIONAL NARCISSISM?

National narcissism involves the belief that one's group (i.e., nation) is exceptional but unappreciated by others. It tends to correlate positively with national identity because both involve a positive evaluation of one's nation. However, they are linked to very different outcomes. For example, out-group prejudice is negatively associated with national identity but positively with national narcissism.

> "The strength of national identity robustly predicted public health support, operationalized as behavioral health intentions"

People high in collective narcissism are especially concerned with how their group reflects on them. For instance, national narcissism is associated with a greater preoccupation with maintaining a positive image of the nation than with the well-being of fellow citizens. Thus, in a crisis, national narcissists may prefer to invest in short-term image enhancement rather than long-term public health solutions. They may then be less inclined to act to prevent the spread of Covid-19, or even to acknowledge pandemic risks in their home country.



Relation between national identification (y-axis) and change in mobility (x-axis) in 42 countries and territories in April and May 2020. Van Bavel, J.J., Cichocka, A., Capraro, V. et al. National identity predicts public health support during a global pandemic. Nat Commun 13, 517 (2022).

April and May 2020 reduction of mobility depending on national identification

HOW DO YOU TEST THE IMPACT OF NATIONAL IDENTITY ON COMPLIANCE?

We conducted two large-scale global studies across 67 and 42 countries. We examined the associations between the strength of identification with one's nation and whether people adopted public health behaviors (such as limiting travel, spatial distancing, hand washing) and endorsed public policy interventions (such as the closure of bars and restaurants).

Study 1 relied on self-report measures. Study 2 sought to replicate our findings using publicly available indices of national identity as well as changes in people's physical movement in response to pandemic policies. We examined whether countries with higher average national identity prior to the pandemic predicted a stronger change in mobility in response to Covid-19 restrictions during April and May 2020.

WHAT ARE YOUR KEY RESULTS?

The strength of national identity robustly predicted public health support, operationalized as behavioral health intentions (i.e., physical distance and physical hygiene), support for Covid-19 policies, and reduced physical movement. We found this pattern with self-report measures at the person-level and using measures of actual mobility at the country level. In short, people who identified more strongly with their nation reported greater engagement with critical public health measures.

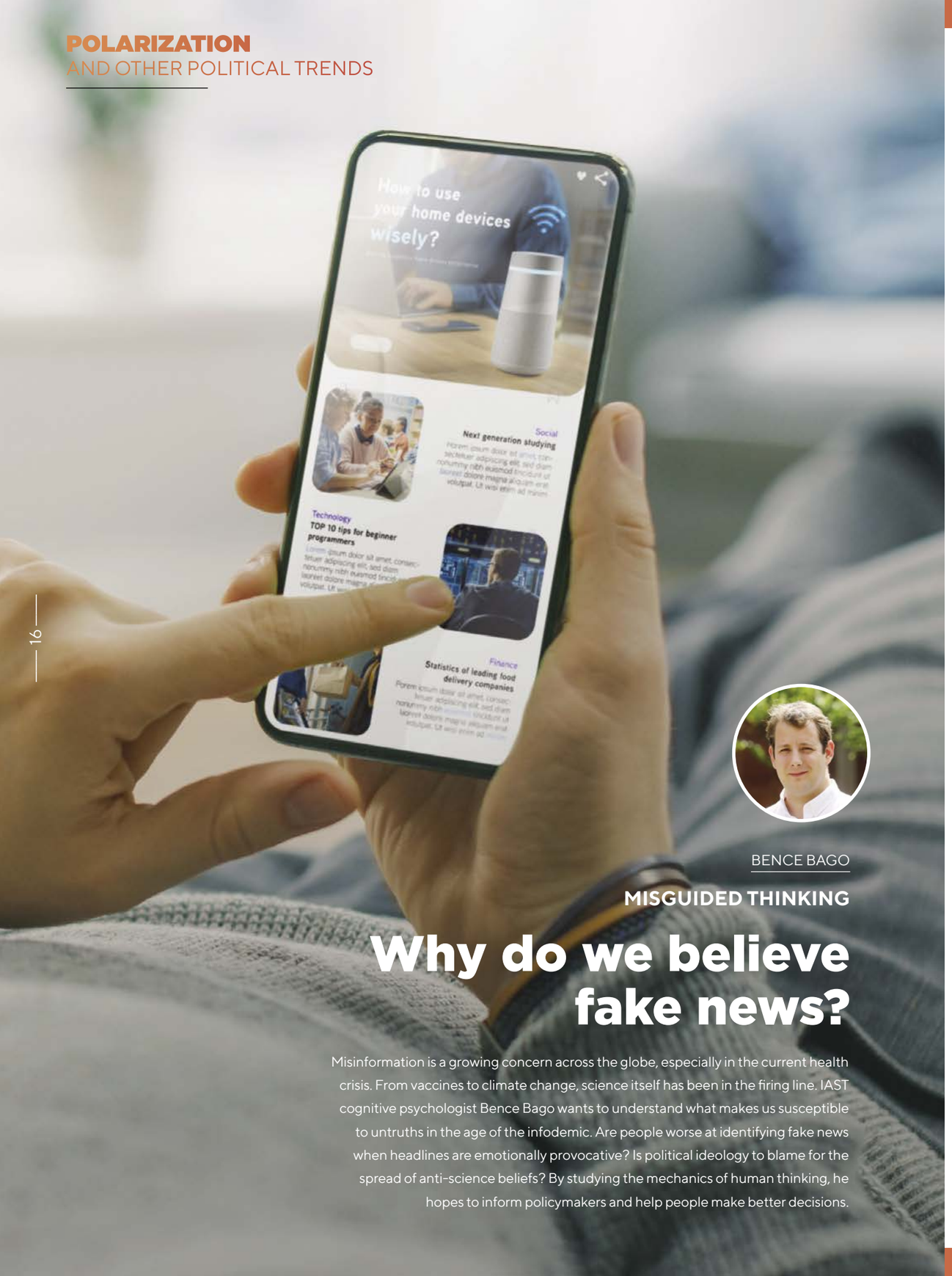
> "National identity and national narcissism were associated positively with support for public health measures, right-wing political ideology was negatively associated with these outcomes"

The relationship between national identity and public health support was distinct from national narcissism. In past research, national narcissism has been linked to problematic attitudes towards both out-group and in-group members. However, we found it to be positively associated with support for some public health measures, although these effects were much smaller than for national identity.

DOES POLITICAL POLARIZATION UNDERMINE THE 'RALLY AROUND THE FLAG' EFFECT?

Other forms of group identification may undercut public health. For instance, political partisanship within countries is associated with risky behavior. In a US study that used geo-tracking data from 15 million smartphones, counties that voted for a Republican (Donald Trump) over a Democrat (Hillary Clinton) exhibited 14% less spatial distancing during the early stages of the pandemic. These partisan gaps in distancing predicted subsequent increases in infections and mortality in counties that voted for Trump. Partisanship was also a stronger predictor of distancing than many other economic or social factors.

It is tempting to conclude that political beliefs might account for these relationships. However, we found that right-wing political ideology had a positive, moderate correlation with both national identity and national narcissism, but very weak correlations with support for public health measures. Specifically, right-wing beliefs were associated with less compliance, compared to left-wing beliefs. Similarly, while national identity and national narcissism were associated positively with support for public health measures, right-wing political ideology was negatively associated with these outcomes. This suggests that collective identity might encourage the protection of the entire group during a pandemic, in spite of ideological differences.



BENCE BAGO

MISGUIDED THINKING

Why do we believe fake news?

Misinformation is a growing concern across the globe, especially in the current health crisis. From vaccines to climate change, science itself has been in the firing line. IAST cognitive psychologist Bence Bago wants to understand what makes us susceptible to untruths in the age of the infodemic. Are people worse at identifying fake news when headlines are emotionally provocative? Is political ideology to blame for the spread of anti-science beliefs? By studying the mechanics of human thinking, he hopes to inform policymakers and help people make better decisions.

Popularized as a term by Donald Trump, fake news has found a potent vector in social media platforms. But what make us inclined to believe its false content? One common explanation in the media is that fake news gains traction by playing on our emotions. This idea logically follows from theoretical research identifying emotions as a potential cause for erroneous intuitive responses. Relatedly, Bence's 2020 study ('Fake news, fast and slow') found that deliberation – a thought process requiring working memory and cognitive control – reduces belief in false (but not true) news headlines. But this account lacks direct supporting evidence.

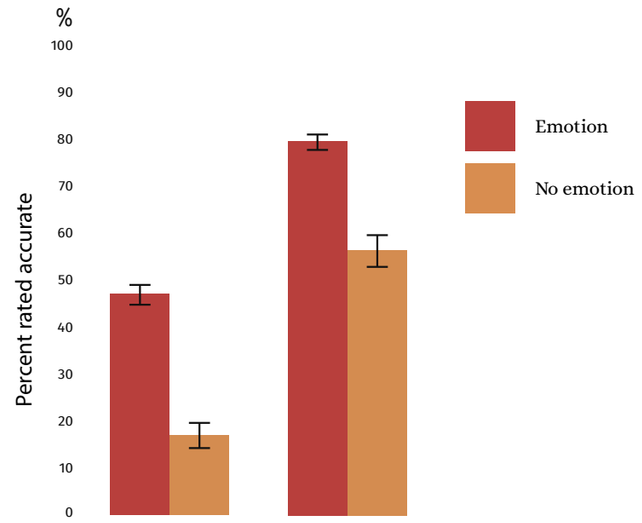
In a new working paper, Bence joined former IAST political scientist Leah Rosenzweig and MIT researchers to test whether emotions predict susceptibility to misinformation. Using correlational data, they found evidence that Americans who feel an emotion after reading a headline are more likely to believe false headlines. There was one surprising exception: anger appeared to increase readers' ability to discern the truth. This is broadly consistent with Leah's research among Nigerian social media users, although she found that anger to be negatively associated with overall belief in Covid-19 headlines.

In additional experiments, Bence's team found little credible evidence that emotion regulation techniques are an effective tool against misinformation. One potential reason is that in focusing on suppressing their emotions, readers were distracted from other cues that could help determine the veracity of headlines.

SCIENCE AND ITS DISCONTENTS

The proliferation of fake news has also prompted fears that the authority of the scientific method is under threat, with catastrophic consequences for responsible public policy. What explains the popularity of anti-science views? Why, for example, is disbelief in man-made climate change so common, despite broad scientific consensus to the contrary?

A common explanation for anti-science beliefs is that people use politically motivated, or "System 2", reasoning to reject beliefs that threaten their partisan identities. Ideology has often been linked to an anti-science stance. For example, in a 2021 paper ('Beliefs About COVID-19') Bence and his coauthors find US political conservatism to be strongly associated with weaker mitigation behaviors, lower Covid-19 risk perceptions, greater misperceptions, and stronger vaccination hesitancy. It has also been argued that political differences in scientific beliefs are exacerbated by reasoning capacity. For example, those with greater science literacy have been found to have more polarized beliefs about stem-cell research, the big bang, and evolution.



Perceived accuracy as a function of headline veracity and political concordance, when participants experienced any of the 6 basic emotions in a givenheadline, vs when they did not. Error bars are 95% confidence intervals.Bago, Bence, et al. "Emotion May Predict Susceptibility to Fake News but Emotion Regulation Does Not Seem to Help." PsyArXiv, 9 Nov. 2021. Web.

> "Americans who feel an emotion after reading a headline are more likely to believe false headlines"

Other explanations suggest that people reject complex scientific claims because they lack basic scientific knowledge – such as the fact that electrons are smaller than atoms – or the ability to think analytically. For example, studies have found that those who reason more analytically are more likely to endorse evolution. As with research on motivation and identity, however, it is unclear if these results are specific to particular science-related beliefs.

KNOWLEDGE IS POWER

For a new preprint, Bence and his coauthors tested these competing explanations across a wide range of controversial issues, using two samples of Americans. They found very little partisan disagreement to support the motivated reasoning and identity protection accounts. "Political ideology was not broadly predictive of science-related beliefs and cognitive sophistication – that is, the ability to think reflectively, openly, and skeptically – was not consistently related to anti-science beliefs for any politically contentious issue," they write. "Thus, it appears that previous work in this area has been overstated and overgeneralized."

In two follow-up experiments, when participants were asked to evaluate arguments about global warming in a politically motivated way, polarization decreased among cognitively sophisticated individuals. As Bence suggested in a previous paper ('Reasoning about climate change', 2020), the apparent association between polarization and cognitive sophistication may be due to people who are higher in sophistication being more engaged with the task, or perhaps having stronger prior beliefs.

The researchers found strong, consistent evidence linking cognitive sophistication to pro-science beliefs. Even more significantly, they found that basic scientific knowledge is the best predictor of pro-science beliefs. This research has important policy implications. Rather than fretting about political divisions, educators and policymakers should focus on improving basic science literacy and critical thinking to strengthen the role of science in the public debate.

HORACIO LARREGUY

INFORMING THE MASSES

Can Facebook help to keep politicians in check?

Are digital platforms always bad for democracy? Despite widespread concerns that their algorithms are spreading misinformation and political polarization, new research by IAST's Horacio Larreguy suggests they can also enhance electoral accountability. He tells IAST Magazine about the impact of non-partisan Facebook ads informing millions of citizens about government wrongdoing ahead of the 2018 Mexican elections.

HOW CAN SOCIAL MEDIA IMPROVE ELECTORAL ACCOUNTABILITY?

While the potential for partisan actors to weaponize misinformation and government propaganda pose critical challenges to democracy, the digital revolution has created low-cost opportunities for targeting information toward citizens en masse. By disseminating credible information about government performance, without needing to rely on under-resourced traditional media outlets that can be vulnerable to political capture, non-partisan actors can help to improve selection and control of elected representatives by voters. This potential is particularly important in the Global South, where the use of internet and social media grew by more than 50% between 2013 and 2018, and where political malfeasance and low-quality public goods are major challenges.

HOW DO YOU TEST THIS POTENTIAL IN MEXICO?

We use a field experiment to estimate the effects of a large-scale social media information campaign during the 2018 general elections. In particular, we evaluate the impact of a non-partisan campaign by Borde Político — a Mexican NGO seeking to promote government transparency using digital tools — that used Facebook ads to inform citizens of the extent of irregularities in municipal expenditures. This information was extracted from publicly available audits conducted by Mexico's independent government auditing body, and disseminated via 26-second paid-for video ads on Facebook in the week preceding the election. Corruption was a highly salient issue during the 2018 election, in which Andres Manuel López Obrador and his left-wing National Regeneration Movement party defeated traditional incumbents across the country.

In collaboration with Borde Político, we used a randomized 'saturation' design to identify the direct effect of being targeted by their Facebook ad campaign, and the indirect or 'spillover' effect on untreated areas, as well as how these effect vary with the share of the elctorate targeted by the information campaign, within our sample of 128 municipalities. By generating interactions between voters within treated municipalities, we expected the magnitude of any effects — which are likely to depend on the level of irregularities reported — to be greatest in the municipalities most heavily targeted by the information campaign.

WHAT DO YOUR RESULTS REVEAL ABOUT THE POWER OF SOCIAL MEDIA CAMPAIGNS?

According to Facebook's ad campaign data, the ads ultimately reached 2.7 million unique Facebook users (appearing three times per person, on average) and resulted in around 15% of targeted voting-age adults watching at least three seconds of the ad. Engagement with the campaign was broadly proportionate with the level of access prescribed by the campaign saturation level.

> "Our study shows far larger effects of non-partisan information on electoral accountability in Mexico"

Precinct-level electoral returns show that the campaign substantially affected voting behavior. Vote shares of the least malfeasant incumbent parties increased by 6-7 percentage points in directly targeted electoral precincts. This effect was greatest in directly and indirectly targeted precincts within municipalities where the campaign targeted 80% — rather than 20% — of the electorate. These results appear to reflect interactions between voters that spill through social networks, including to untargeted precincts, rather than responses by politicians or other media outlets.

Prior studies set in the Global North have found small, but cost-efficient, effects on party vote shares from partisan political ads on Facebook and Google. Our study shows far larger effects of non-partisan information on electoral accountability in Mexico. This buttresses studies showing that information on social media can increase turnout, political knowledge, and protest against autocratic regimes, while providing a counterbalance to studies showing that social media — often through misinformation — contributes to social harms, including political polarization, hate crime, and poor mental health.

Our findings also add to the literature emphasizing that the media's impact spills over beyond those directly exposed to its content. Professor David Yanagizawa-Drott, from the University of Zurich, for example found that indirect effects of exposure to "hate radio" in Rwanda on militia violence were at least as large as the direct effects. We further demonstrate that saturation—the share of a market targeted by an information campaign—may help explain why these effects are greater when information dissemination is conducted on a large scale.

WHAT'S NEXT FOR RESEARCH IN THIS AREA?

We need to understand whether the effects generalize to other contexts and how to maximize the impact of factual non-partisan campaigns in increasingly politically polarized environments. It is not obvious how the lessons from this study implemented in a context of relatively little political polarization apply to the current Mexican context, which has seen a significant increase in pollical polarization in the past three years. Further research is then urgently required given the growth of social media, increasing political polarization, and the need to enhance electoral accountability. Since our results show that online information campaigns can have substantial electoral impacts, they also inform the debate about whether regulation is required to ensure elections are not hijacked by misinformation.

MARGOT DAZEY

RESPECTABILITY POLITICS

How do Muslim elites cope with French hostility?

The run-up to the 2022 French presidential election has been marked by hostile political rhetoric towards Muslims, who are exposed to stigma, exclusion, and abuse in many contexts across Europe. How do they respond? In a new study, IAST sociologist Margot Dazey investigates the 'polite', non-confrontational strategies often adopted by highly educated, first-generation migrants.

From 2014 to 2018, Margot spent several months with members of one of France's largest Muslim organizations, the Union des organisations islamiques de France (UOIF). She attended spiritual evenings for adults, Quranic classes for children, Friday prayers in mosques, and annual gatherings. She conducted interviews with 42 activists and analyzed press articles mentioning the UOIF, as well as its own publications.

Rejecting the class-blind approach of existing research on anti-Islamophobia movements, Margot notes that UOIF members tend to be first-generation North African migrants, hailing from the urban middle classes of their home country. The majority now hold professional types of employment such as engineers, doctors or architects, while the majority of French Muslim populations remain lower-class despite growing social diversification.

In Margot's analysis, the antiracist strategies of UOIF activists are shaped by their social background and migratory trajectories. "The Muslim activists I worked with mobilize a middle-class set of values encompassing politeness, discretion, socio-economic uplift and good behavior in response to stigmatization – a distinctive set of values that I have conceptualized elsewhere as their respectability politics, borrowing this term from African-American studies. In doing so, these activists offer oppositional space to anti-Muslim hostility but also reinforce some of the hegemonic values of color-blind French republicanism."

MINIMIZING ISLAMOPHOBIA

Despite their concerns about rising Islamophobia, UOIF activists call for qualified assessments of the phenomenon and are keen to distance themselves from an understanding of racism as a systemic organization of inequality. For instance, Margot cites the way UOIF president Amar Lasfar (a Moroccan-born entrepreneur with a masters in economics) downplayed anti-Muslim hostility in 2016: "Muslims in France are not persecuted. Muslims in France are not ill-treated," he said. "They have a few problems at times, and they just try to solve them. And a problem solved is acquired experience. We tell the whole world that we are where we are, and that we are citizens, French and proud of it!"

"The Muslim activists I worked with mobilize a middle-class set of values encompassing politeness, discretion, socio-economic uplift and good behavior in response to stigmatization"

This mitigation of anti-Muslim hostility may help to preserve individuals' sense of self-worth and agency, but also to accommodate French republican values that reject group-based claims. "In the context of over-scrutiny and daily micro-aggressions, underplaying may be a way to maintain positive self-concept," writes Margot. "At a more collective level, these expressions of minimized racism on the part of Muslim leaders make sense against the widespread accusations of victimization that they face; that is, the suspicions that Muslims publicize their allegedly dubious grievances to raise their moral status."

Euphemization of racism may be linked to the tendency of UOIF leaders to assign partial responsibility to Muslims for Islamophobia, and to call for irreproachable behavior in response. "The notion of responsibility is a leitmotiv for UOIF activists and is used to justify the prioritization of 'accommodationist' antiracist repertoire over more contentious responses," says Margot. "More broadly, UOIF members believe that French Muslims ought to use prudent responses against Islamophobia and avoid the pitfalls of two extreme positions: self-exclusion and victimization."

SELF-DISCIPLINE AND PIETY

Respectability politics is hard work, says Margot. "In advocating for individual responses to stigma, [UOIF leaders] are able to circumvent the demonization of group-based claim-making in the French public sphere, which labels minority group activists as dangerous communautaristes. Yet, this antiracist approach is costly as it forces French Muslims to keep representational considerations in mind when confronted with disparaging treatments, and to remain restrained and self-controlled in the face of stigma."

This emotional labor is also advocated as part of a general emphasis on pious self-discipline. "This broader project makes sense within the revivalist approach of the "Islam of the middle way" *(wasatiyya)*, which equates moderation with compassionate forbearance and aims at the accomplishment of virtuous acts. The Islamic notion of patience and perseverance (*sabr*) thus becomes a useful tool for accepting adversities and avoiding the desire to complain."

As well as exacting a psychological toll, smiling in the face of stigma may invite accusations of selling out Islam.The activists in Margot's study negotiate a delicate balance, caught between the color-blindness of French republicanism and criticism by Muslims from other social backgrounds, especially second-generation migrants who tend to be more vocal in rejecting injustice.

The limited existing research on Muslim advocacy movements in Europe focuses on their suffering and vocal struggle against Islamophobia, justifying the mobilization of legal resources and public demonstrations. By considering the respectability politics of community uplift and more discreet coping strategies, Margot's analysis sheds light on a broader and more nuanced spectrum of responses.

JORGE PEÑA

MODELING EVOLUTION

From equations to cooperation

Jorge Peña is an assistant professor at the University Toulouse 1 Capitole and a faculty member of IAST. His research focuses on social evolution and collective action problems, using mathematical modeling.

WHAT LED YOU TO IAST?

Its commitment to interdisciplinary research. I first knew of the IAST thanks to the series of Economics and Biology Workshops organized by Ingela Alger and Jörgen Weibull. I've been attending these workshops since the second one back in 2014. Back then, I was a postdoc in an evolutionary biology institute (the Max Planck Institute for Evolutionary Biology in Plön, Germany) mainly writing papers with my previous postdoc advisor and microeconomist Georg Nöldeke (University of Basel). At the workshop, Georg gave a talk on a common project on group-size uncertainty in collective action problems, and I presented a poster on a project about social evolution in spatially structured populations.

I immediately fell in love with the institute and, well, the city: There was this place where both biologists and economists would naturally gather to discuss and work together on interdisciplinary questions, and all of this by the Garonne? When a faculty position opened in 2015, I immediately applied even if I was not "in the market" and wasn't planning to apply for a faculty job.

Luckily for me, love was requited.

WHAT IS THE GOAL OF YOUR RESEARCH?

The overall goal of my research is to better understand how (human or non-human) individuals cooperate in different situations, how they navigate situations of conflict, and how this cooperation and conflict resolution might evolve. I do this by devising mathematical models drawing from population genetics and game theory, and by analyzing them using pencil and paper (and, OK, Mathematica's FullSimplify function).

Within this research program, my research can be more or less divided into two different kinds of questions. The first are methodological, and often consist in importing knowledge from one field to better represent or analyze models in another field. One example is using the properties of Bézier curves from computer-aided geometric design to simplify the analysis of binary-action participation games in economics, political science, and biology. Another one is making use of stochastic orders (well-known in economics but relatively underappreciated in theoretical biology) to answer questions having to do with evolution under uncertainty.

The second kind of questions zoom in on a particular mechanism for the evolution of cooperation or a particular system to shed light on how social evolution might work (or not). How does a couple of hamlets (a species characterized by simultaneous hermaphroditism) coordinate to mate one in the male role and the other one in the female role, even if it is more costly to do the latter? How do a mother and her offspring avoid conflict and agree to cooperate in an eusocial colony of ants, bees, termites, or naked-mole rats? Why do some microbial aggregations divide reproductive labor randomly, while others do so in a tightly coordinated manner? These are some of the questions I have explored in previous, more "applied" projects.

WHAT ARE YOUR UPCOMING PROJECTS?

At the moment I'm very interested in indirect reciprocity, or reciprocity via reputation, a phenomenon that both evolutionary biologists and social scientists consider a trademark of human cooperation. Indirect reciprocity happens when good actions are rewarded and bad actions punished by third parties, and relies on individuals making moral judgments about others and widely sharing this information via gossip.

I'm currently working on mathematical and computational models of indirect reciprocity with computer scientist Julian Garcia and philosopher Toby Handfield, both from Monash University (Melbourne, Australia). The plan is to extend existing models to allow for payoff interdependence in social interactions, and to extend the collaboration to include computer scientist Fernando P. Santos, and social psychologist and former IAST research fellow Catherine Molho, both from the University of Amsterdam, where I will be spending part of my sabbatical year during 2022-2023.

HOW HAS YOUR EXPERIENCE AT IAST BEEN SO FAR?

Excellent! For a researcher like me, who has always been moving across disciplines (I was trained as an electronics engineer, my PhD is in applied math, and my research is at the intersection of biology and the social sciences), it is easy to constantly suffer from impostor syndrome: you're never biologist enough for biologists, economist enough for economists, you're too little (or too much!) of this and that. So it is very nice to be in a place where interdisciplinarity is truly valued. Your field is purportedly biology but your job market paper is a model of voting you submitted to an econ journal? That's fine with IAST!

YOU ARE THE LEADER OF THE IAST SOCIAL EVOLUTION TEAM. WHAT CAN YOU TELL US ABOUT IT?

The Social Evolution team was created to give a home to the IAST Multidisciplinary Prize project. I was awarded together with Maxime Derex (psychology), Catherine Molho (psychology), and Manvir Singh (anthropology). Since its inception, the team has expanded to eight full members, one associate member, and three occasional members. At the moment the research team is mostly a place for discussion and exchanges for all the people at IAST interested in the evolution of social behavior, particularly large-scale human cooperation. We do so by holding bi-weekly meetings where we discuss our own work, papers, or we have informal discussions with visitors. The team is still an experiment, but the idea is that there will be common projects among members emerging from our interactions. I look forward to seeing what this research team and others will deliver in the coming months and years.

> "The overall goal of my research is to better understand how individuals cooperate in different situations, how they navigate situations of conflict, and how this cooperation and conflict resolution might evolve"

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