COVID-19 and the Information Space
Boosting the Democratic Response

EDITED BY
Dean Jackson

FEATURING ESSAYS BY
Dean Jackson
Dapo Olorunyomi
Vladimir Rouvinski
Andrea Kendall-Taylor
Will Moy
Joan Donovan
Renée DiResta
Mallory Knodel

National Endowment for Democracy
Supporting freedom around the world

forum
International Forum for Democratic Studies

Table of Contents

KEY INSIGHTS

The essays in this collection of global insights are the product of six workshops held by the International Forum for Democratic Studies during the spring and summer of 2020. These workshops—which gathered civil society representatives, journalists, academics, researchers, donor organizations, and policymakers—aimed to assess the likely challenges that the COVID-19 pandemic would pose to the democratic nature of the "information space," or the broad public square in which societies exchange information and debate ideas. Key insights include:

COVID-19 and the Future of Media Sustainability:

- The COVID-19 pandemic compounded trends adversely affecting media revenue worldwide. Even leading media outlets announced layoffs and are struggling to sustain themselves.
- Many news outlets are finding new audiences and revenue through business-to-business services, nonprofit vehicles for receiving philanthropic funding, joint production and distribution efforts, and new means of digital distribution such as publishing directly to popular messaging applications.

Authoritarian Disinformation and Media Influence:

- Outlets funded by Moscow, Beijing, Tehran, and other authoritarian regimes with international reach are using biased and inaccurate reporting alongside "COVID diplomacy" to undermine the reputation of democracy.
- The best solution for these challenges is not to prohibit media from authoritarian states, but instead to increase support for fact-based, high-quality media outlets.
- The Russian and Chinese governments increasingly deploy similar tactics and narratives in their information operations. This is happening at a time of broader strategic engagement between the two authoritarian regimes.
- Democracies can respond to this challenge by better understanding where authoritarian disinformation efforts overlap, then focusing on efforts to encourage greater societal resilience in those areas.

Fact-checking Innovations and the Pandemic:

- Fact-checking during a pandemic touches on issues of life or death, even as fact-checkers struggle to keep pace with the speed and scale of disinformation in digital environments.
- Fact-checkers are adapting to this challenge through new methods such as automation and crowdsourcing, as well as through new partnerships between fact-checkers, researchers, and policymakers.

COVID-19 and the Weaknesses of the Digital Information Space:

- The COVID-19 pandemic reinforced the notion that, in the social media age, the most useful news, reporting, and insights often cannot outpace misleading or sensational content.
- This development only compounds the need for researchers to ask questions that reveal how average citizens reckon with mis- and disinformation, what role platforms play, and what can be done to protect the information space.
- Researchers and civil society should seek ways to improve communication from public interest actors and new models for curating knowledge and information online.
- Nascent efforts allow actors from a wide array of sectors to specialize and could provide valuable, shared access to essential resources such as platform data. These efforts should be encouraged.

Governing the Intersection of Public Health, Big Tech, and Privacy:

- As democratic and authoritarian governments alike turned to technology to respond to COVID-19, a chorus of actors raised relevant questions about privacy and other implications for citizens.
- If tech-enabled COVID-19 interventions are incompatible with key principles of human rights and democracy, transparent joint governance by government, rights watchdogs, and the private sector is the best way to resolve tensions between measures to protect public health, oversight of technology, and respect for citizens' rights and freedoms.

Sickness and Health in the Information Space

Reflections from the First 10 Months of COVID-19

By Dean Jackson

A robust information space is a crucial part of democracy's immune system. When high-quality, fact-based journalism thrives and informed citizens can freely deliberate, democracy can flourish. When the information space weakens, however, opportunistic infections set in.

Beginning in June 2020, the International Forum for Democratic Studies at the National Endowment for Democracy convened a series of virtual workshops on how the COVID-19 pandemic is affecting the integrity of this crucial democratic organ. The essays in this inaugural collection of Global Insights are the result of those workshops. Select experts from civil society, media, government, and donor sectors around the world discussed the health of the information space and its post-COVID future. They were asked to describe how civil society and independent media could weather the pandemic and also rise to the challenge of restoring a vibrant public square despite adverse political, economic, and technological trends.

Where to start? One place is the diminished revenue for fact-based, independent, high-quality, public interest journalism. After years of declining revenue, the COVID-19 pandemic sent the media industry into worldwide freefall. One international study found that 40 percent of media outlets planned to cut jobs after the new coronavirus spread globally.[1]

Dapo Olorunyomi, the publisher and editor-in-chief of the Nigerian newspaper *Premium Times*, points out in his essay that public interest journalism has never been a quick path to wealth, but was at one time a sustainable business. Now it struggles to merely survive. As the COVID-19 pandemic brings news of closures and layoffs across the industry, independent media must seek innovative paths to sustainability, including creative means of garnering philanthropic support for investigative reporting, original delivery mechanisms such as newspapers published entirely on WhatsApp, or new means of leveraging journalistic expertise into business-to-business services. Olorunyomi lays out an impressive list of experimental approaches to newsroom funding across the African continent.

Globally, independent media's retreat is ceding space to profit-driven sensationalism and politically motivated efforts to manipulate and mislead publics.

Globally, independent media's retreat is ceding space to profit-driven sensationalism and politically motivated efforts to manipulate and mislead publics. Writing from Latin America, **Vladimir Rouvinski**, a professor at ICESI University in Colombia, describes the way that the space vacated by independent media has been taken up by state-subsidized broadcast outlets sponsored by authoritarian regimes from beyond that region. This trend is especially acute with regards to reporting on international affairs. Over the course of the pandemic, media outlets owned by the Russian, Chinese, and Iranian governments have used conspiracy theories, bad faith arguments, half-truths, and coverage out of context—what might, taken together, broadly be called disinformation—to play up their domestic responses to the new coronavirus and their contributions to international relief efforts, while arguing that liberal democracies are unsuited to meet the challenge (or may even have created the virus in the first place).[2]

The authoritarian media outlets Rouvinski describes existed long before the COVID-19 pandemic. More novel is evidence of their growing coordination.[3] **Andrea Kendall-Taylor**, director of the Transatlantic Security Program at the Center for a New American Security, describes signs that Moscow and Beijing may be coordinating their information operations—or, at least, that their operations complement one another in ways that are mutually beneficial and more corrosive than either country could accomplish alone. Both Rouvinski and Kendall-Taylor's suggestions for responding to coordinated cross-border disinformation include expanded resources for local media outlets, researchers, and other information professionals who are struggling against the twin headwinds of diminished finances and authoritarian alternatives. This support could come, for example, in the form of subsidized newswire subscriptions or funding for research into the narrative overlap between information operations, so policymakers might better identify the areas where corrective information is most sorely needed.

Of course, not all—or even most of—the mendacious actors in the COVID-era information space are authoritarian powers reaching across borders. Some are commonplace digital grifters, and others are domestic political actors looking for advantage. On the front line against these challenges are fact-checking organizations. Demand for their work has never been higher: at the time of this writing, the International Fact-Checking Coalition, working across seventy countries in forty languages, has published nearly ten-thousand fact-checks since the start of the pandemic.[4] Yet fact-checking still struggles to keep pace with digital disinformation—and speed is not the only challenge. Another concern is the way in which human beings seek out and respond to novel information, often welcoming that which is politically convenient and discarding the rest.[5] And there is always the challenge of making sure, when publishing a fact-check, that the people who were exposed to the untruth also see the correction.

In the simplest terms, support for public interest journalism and fact-checking are ways of amplifying "good" content while minimizing the impact of "bad" content. But the "good-to-bad" ratio is not the only change ailing the information space.

What can fact-checkers do to continue upping their game? **Will Moy**, chief executive of the UK fact-checker Full Fact, offers some suggestions based on recent experience. One method is attempting to gain scale through automation.[6] Another is experimenting with crowd-sourced fact-checking.[7] Yet another is what some fact-checkers are calling "next-generation" fact-checking, moving from "publish and pray"—putting out corrective information and hoping it sticks—to "publish and act," advocating to policymakers for improvements to the media ecosystem.[8] By working across borders, fact-checkers can learn from each other's experiences and prepare for shared emergencies. They also possess an asset of great interest to researchers and policymakers: a tremendous trove of data about falsehoods and where they appear online.

In the simplest terms, support for public interest journalism and fact-checking are ways of amplifying "good" content while minimizing the impact of "bad" content. But the "good-to-bad" ratio is not the only change ailing the information space. The *systems* which curate content have also changed, from print and broadcast media to a disparately connected internet to, most recently, social media platforms and the tech companies that own them.

Joan Donovan, research director at Harvard's Shorenstein Center, describes what has gone wrong with the curation of knowledge on the internet today. During a global pandemic, the public found itself frantically searching for guidance in an information ecosystem "where conspiracy and medical misinformation thrive." Insights from medical experts often failed to rise above the muck of scam products, scientifically unfounded claims, and political polemic. This is a tragic outcome: the internet was supposed to exponentially expand humanity's access to knowledge, not lethal pseudoscience.

The frustrations with the distortions promoted by social media companies and the algorithmic amplification of mis- and disinformation have been thoroughly documented. It is essential that observers in this field offer more than mere criticism of the current state of affairs.

The frustrations with the distortions promoted by social media companies and the algorithmic amplification of mis- and disinformation have been thoroughly documented.[9] It is essential that observers in this field offer more than mere criticism of the current state of affairs. Donovan's essay suggests that too much research today focuses on monitoring and detection, essentially amounting to "glorified content moderation" for a trillion-dollar sector populated by behemoth corporations. She would rather see academic and civil society researchers think more about mechanisms to protect vulnerable communities and accountability for platforms and the bad actors who abuse them, calling for researchers to rise to the occasion and "come up with forms of research that rely less on platform data and suss out how people truly reckon with misinformation daily." (She also suggests platforms hire an army of librarians to assist with content curation.)

Renée DiResta, technical research manager at the Stanford Internet Observatory, also recognizes the challenge that lack of data poses to researchers attempting to understand the full societal impact of information traveling across social media.[10] Most of the platform data that researchers receive relates primarily to how many people engaged with a piece of content, not whether that content changed minds or contributed to social polarization. DiResta suggests data relevant to those more complex questions could be shared through a "multistakeholder" model in which platforms provide select data to independent researchers. In the case of foreign information operations, governments may also be involved. More formalized approaches to partnerships between these groups might "turn the process of detection and investigation into a multidisciplinary effort."

Both Donovan and DiResta also highlight public communication as a crucial area of improvement. How can civil society and public interest initiatives better connect with audiences in the cacophonous modern public square? These actors are perhaps best *suited* to pushing back against mis- and disinformation narratives, but they are not (at present) the best *equipped* to have their voices heard. Support for ambitious, civil-society-led communications and outreach efforts, undergirded by research, is an underutilized response that can go beyond exposing disinformation in order to challenge false narratives.

Finally, joint partnerships between private industry, civil society, and government can serve as a vehicle to govern another troubling aspect of the post-COVID information space: the threat that pandemic-era technological tools for tracing and containing the spread of the virus will accelerate trends toward pervasive state surveillance. **Mallory Knodel**, chief technology officer of the Center for Democracy and Technology, outlines the many challenges

to protecting user rights while implementing new tools for contact tracing and exposure notification. Even when such efforts are jointly led by governments, the private sector, and civil society, there is little agreement on first principles or benchmarks for success. A crucial challenge for open societies, then, is a vision for technological governance that starts from a clearly articulated democratic framework.

A crucial challenge for open societies is a vision for technological governance that starts from a clearly articulated democratic framework.

The COVID-19 pandemic has worsened and accelerated the many afflictions ailing the public square. By the time the pandemic subsides, what look like differences of degree may add up to differences in kind. Some have called these trends a "wicked problem"—a term for problems "so complex their boundaries and interdependencies become too difficult to define, rendering them inherently unsolvable."[11] If true, this suggests a grim prognosis.

But what these essays (and the workshops that preceded them) suggest is that it is possible to break "wicked problems" into discrete pieces, offering well-wishers of democracy a way out of a defeatist mindset. Many of these require greater coordination within sectors—as with multiregional fact-checkers working jointly on a global problem—or greater cooperation across sectors, as with researchers and civil society assisting public officials with how to better communicate with citizens about issues vulnerable to false narratives.

There are innovations and adaptations out there for those willing to look. Journalists are blazing new trails to sustainability; entire research agendas are waiting to be taken up; bold visions for technology's democratic future are waiting to be articulated. In the fight for the health and integrity of the information space, resolve and creativity may be the best medicines.

Endnotes

1 Alan Soon, "The Splice Lights On Survey Shows That Over 40% of Media Orgs Expect to Start Cutting Jobs in the Next 12 Months", Splice Media, 17 April 2020, *www.splicemedia.com/splice-lights-survey-cutting-jobs-in-the-next-12-months*.

2 For more on the definition of disinformation, as opposed to propaganda or misinformation, see: "Issue Brief: Distinguishing Disinformation from Propaganda, Misinformation, and 'Fake News,'" National Endowment for Democracy, 17 October 2017, *www.ned.org/issue-brief-distinguishing-disinformation-from-propaganda-misinformation-and-fake-news*.

3 See Daniel Kliman, Andrea Kendall-Taylor, Kristine Lee, Joshua Fitt, and Carisa Nietsche, "Dangerous Synergies: Countering Chinese and Russian Digital Influence Operations," Center for a New American Security, 7 May 2020, *www.cnas.org/publications/reports/dangerous-synergies*; Andrea Kendall-Taylor and David Shullman, "Converging Chinese and Russian Disinformation Compounds Threat To Democracy," Power 3.0 blog, 26 May 2020, *www.power3point0.org/2020/05/26/converging-chinese-and-russian-disinformation-compounds-threat-to-democracy*.

4 "The CoronaVirusFacts/DatosCoronaVirus Alliance Database," Poynter, n.d., *www.poynter.org/ifcn-covid-19-misinformation*.

5 Samuel Woolley and Katie Joseff, *Demand for Deceit: How the Way We Think Drives Disinformation*, National Endowment for Democracy, January 2020, *www.ned.org/demand-for-deceit-how-way-we-think-drives-disinformation-samuel-woolley-katie-joseff*.

6 "Automated Fact Checking," Full Fact, n.d., *https://fullfact.org/automated*.

7 Şükrü Oktay Kılıç, "This Fact-Checking Site Tried Crowdsourcing a Story. Here's What It Learned," Poynter, 26 April 2019, *www.poynter.org/fact-checking/2019/this-fact-checking-site-tried-crowdsourcing-a-story-heres-what-it-learned*.

8 Laura Hazard Owen, "'First-generation fact-checking' is no longer good enough. Here's what comes next," NiemanLab, 21 June 2019, *www.niemanlab.org/2019/06/first-generation-fact-checking-is-no-longer-good-enough-heres-what-comes-next*.

9 For a well-done example, consider: "It's the Business Model: How Big Tech's Profit Machine is Distorting the Public Sphere and Threatening Democracy," Ranking Digital Rights, n.d., *https://rankingdigitalrights.org/its-the-business-model*.

10 For more on the history of data-sharing between platforms and researchers and the obstacles that have hindered it, see: "Forum Q&A: Kelly Born on the Evolving Field of Disinformation Research," National Endowment for Democracy, 24 August 2020, *www.ned.org/forum-qa-kelly-born-evolving-field-disinformation-research*.

11 Millie Tran, "Wicked," NiemanLab, December 2019, *www.niemanlab.org/2019/12/wicked*.

Surviving the Pandemic

The Struggle for Media Sustainability in Africa

By Dapo Olorunyomi

At the end of May 2020, about 23 media organizations in Nigeria announced that their staff would face layoffs, significant pay cuts, or both. One especially disturbing facet of this dire statement was that the biggest and apparently strongest newsrooms in the country were at the forefront of this announcement.

The precipitating event was the COVID-19 pandemic, which ravaged the revenue base of the media and for which there was no end in sight. The three principal legs of most Nigerian media organizations' business model—advertisements, sales, and events—went into freefall. To make matters worse, there was no serious support from anywhere else in the country. In the 1970s, Nigeria had had a blossoming, government-funded media ecosystem (radio, print, and television) at the subnational level, supporting national and international news reporting with information for local listeners, readers, and viewers, but today these sources are almost all dead. The range of business models that had supported the media in Nigeria has atrophied and is now badly in need of innovation.

Yet to call this dispiriting turn of events a solely Nigerian situation is to ignore the pain that many media institutions in Africa have felt. In all four corners of the continent—but particularly in sub-Saharan Africa—journalists are experiencing growing anxiety about the future of their profession. These anxieties are all the more pronounced in the COVID era, when the need for accurate, up-to-the-minute information has become most necessary. When sources of fact-based information in the public interest struggle, more space is available for self-interested and malign actors to influence and manipulate civic discourse for their own ends—not only for the pursuit of commercial profit, but also for political power and escape from democratic accountability.

The imperative of the moment is how to produce media that is independent and professional in the face of dim economic realities, constraining political realities, and the worst public health crisis of our time.

The imperative of the moment, therefore, is how to produce media that is independent and professional in the face of dim economic realities, constraining political realities, and the worst public health crisis of our time. It calls for radical insights and fresh innovation that can build on some promising foundations already manifest in many markets across the continent.

Central to this conversation is how to build an enduring, financially sustainable media system for the region. Of note is the urgent need to identify which of the broad array of content producers qualify as serving the public good: not all media define their core mission as holding accountable a country's institutions of power or acting as auditors to promote democratic ideas. Therefore, it is important to focus on the narrow but prized segment of the media that refers to itself as journalism, which Bill Kovach and Tom Rosenstiel write is "defined by primary loyalty to citizens," holds as "its essence a discipline in verification," whose "practitioners maintain an independence from those they cover," and the "first principle" of which is "truth and accuracy."[1]

To be sure, this is not the type of journalism which, if it discharges its mission faithfully, will have its promoters smiling all the way to the bank, even during the best of times. This is especially true on a continent where the political culture is still largely illiberal, intolerant, and famously autocratic. The implicit question has always been how to transform these constraints into advantages and build a pathway to financial sustainability.

Sustainability is the foundation for independence. If the African media is to contribute to democratic development, market growth, and a tradition of liberty and human rights, it must solve this important question of financial independence.

Sustainability is the foundation for independence. If the African media is to contribute to democratic development, market growth, and a tradition of liberty and human rights, it must solve this important question of financial independence. Audience growth and monetization, as well as innovation around multiple digital platforms, will play a big role in this vision.

In response to this challenge, *Premium Times* (a Nigerian newspaper of which this author is publisher and editor-in-chief) is broadly diversifying its sustainability efforts to accommodate donations, a membership model, book publishing, a data project, philanthropic support, ambitious partnerships, due diligence operations, commercial advertising, events convening, and training. This mixed model rests on the principle that news consumers and a loyal audience will gravitate only to platforms that reflect their basic aspirations; offer depth, context, and interpretative layers; and serve as courageous watchdogs of a social and political system.

In September 2020, *Premium Times* signed a major partnership deal with a Silicon Valley digital media company, Voices of the African Continent (VOTAC).[2] VOTAC's content includes popular news and entertainment programs, films, and documentaries. It is delivered through mobile apps and U.S. cable television networks and is available in over 33 million television households. As part of their agreement, *Premium Times* and VOTAC will produce a financial news program called "ACM Today" out of studios in San Francisco and Abuja, focusing on the African capital market.

Another regional trailblazer is the *Daily Maverick* in Cape Town, South Africa. *Daily Maverick* is using readership growth and engagement as key drivers of revenue and investment growth. By far, the *Daily Maverick* is the gold standard in generating reader revenue through a membership model centered on engaging content driven by impactful investigative reporting. The paper employs myriad models: for example, a nonprofit vehicle funds its investigative unit and social endeavors like climate change journalism through grants, while partnerships and impact investment funds provide resources for other content. Its approach to converting readers into revenue includes subscriptions, paywalls, and membership models which, as the *Maverick*'s chief executive officer, Styli Charalambous, puts it, helps the paper maintain its "duty to public service by keeping all content accessible even to those who cannot afford to pay."[3]

The South African market provides other models that might be adaptable beyond South Africa, from donations from supporters (as used by the investigative journalism newsroom *amaBhungane*) to a range of audience growth and distribution methods pursuing advertising revenue via messaging platforms like WhatsApp. Although the innovative Zimbabwean platform 263chat pioneered this model, it blossomed in South Africa with notable experiments like *The Continent*—a pan-African weekly newspaper founded by Simon Allison

and Sipho Kings, produced in partnership with the *Mail & Guardian*. The most successful variant of this approach is HealthAlert, the COVID-19 helpline created by Gustav Praekelt, which now has more than twenty million users and is used by the World Health Organization and many national governments. It publishes on the premium WhatsApp Business API—setting it apart from the poor-quality content featured on What's Crap on WhatsApp, a five-minute voice fact-checking note developed by AfricaCheck.[4]

The Mauritius academic Roukaya Kasenally makes the case for a public media fund, a proposal similar to the state grant in Francophone African countries.[5] A version of this model can be found in Cote d'Ivoire, where media are supported by a 4 percent low interest loan guaranteed by the government. Similarly, the Nigerian government and the Nigerian Press Organization are collaborating on an effort to introduce an 8 percent interest loan to be managed by the central bank. Unfortunately, initiatives like these can become surreptitious mechanisms for censorship; but two years ago, the South African *Mail & Guardian* followed the innovative efforts of *The Namibian* to wean itself off of donor funding and achieve self-sufficiency by investing in a trust designed to receive philanthropic funding, an international trend which shows that dependency can be avoided.

Content paywalls have not been a loud success for media in many African countries, but *Business Day* in Nigeria has implemented one with some modest success after other papers failed. This apparent contradiction suggests that the Nigerian market may not necessarily be rejecting paywalls entirely, but rather refuses to work with those that are not well administered. Today, *Business Day* complements its subscription paywall with philanthropic funding, along with other products like advertising, events, specialized publications, and investment in migrating its "commercially viable" content into new value propositions. These new initiatives include "a full research and data analytics company" which publishes as many as 20 annual reports on banking, technology, finance, trade, and other economic sectors.[6] *Business Day*'s complete range of offerings includes publishing commentary from two expert economists, a paid subscription that includes content from the *Financial Times* and *The Economist*, as well as access to its metered paywall where readers are able to view five articles each month at no charge, with monthly rates from N835 to N1,500 (US$2 to US$4).

The debate around paywalls is embedded in a broader conversation about reader revenue. The relatively new Nigerian online platform *Stears* provides an interesting model, offering a cocktail of data, membership, philanthropy, and subscription plans to grow audience digital engagement and market edge. Its profitability is still unclear, but with the interest of savvy philanthropists coupled with investments from local tech companies, *Stears* has managed to carve out an interesting niche that promises to grow. These new investments have already enabled its data and membership projects to build a significant and loyal audience of nearly ten thousand readers who provide it with what an insider recently described as a handsome income.

The Swiss online platform, *Pulse*, also deserves attention for its growth strategy. Present in three African markets (Nigeria, Ghana, and Kenya), *Pulse* is built on strong investments in digital media and technology. With this foundation, *Pulse* built an early engagement strategy around entertainment and sports culture which locked in a significant youth audience. Most recently, Google has supported *Pulse*'s efforts to expand to other areas, including political and business news. These strides help differentiate *Pulse* from other foreign digital publishers which rely solely on kitsch, entertainment, and sports to attract African audiences.

This handful of relatively successful African news platforms is clarifying the status of media platforms in the digital era. Are they media organizations using technology to enable their operations, or are they technology platforms in the business of news? The truth is that the overlap between the two is in perfect alignment for digital-era news platforms, and that this is an area African media must explore if it is to escape its current predicament.

It is time for African media to face the challenge of innovation—in its storytelling, distribution, organization, the security of its staff, and above all how it finances its journalism.

In Kenya and South Africa, for instance, the rising popularity of streaming media has badly dented the revenue of digital satellite television companies. Multichoice, an erstwhile leader in that market, has lost an alarming one-hundred thousand subscribers to streaming companies such as Netflix and Hulu.[7] Multichoice is asking for regulation of these streaming competitors despite the fact that it is itself among the most transnational companies in Africa. Rather than take this route, it is time for African media to face the challenge of innovation—in its storytelling, distribution, organization, the security of its staff, and above all how it finances its journalism.

The Standard of Kenya, following the path of its rival *The Nation*, is seeking paths to sustainability through investment in data, philanthropy, and partnerships. *The Standard* in particular has ventured into collaborations with agricultural institutions and small and medium-sized enterprises to recruit them into multimedia advertising. Both the Kenyan media giants pivoted to innovation for sustainability a little late, coming from a once comfortable but now unsteady tradition of reliance on advertising and sales. As Joseph Odindo told a conference on entrepreneurial journalism organized by the Konrad-Adenauer-Stiftung in 2018 in Accra, Ghana, "We must be ready to abandon the traditional and venture into the unknown. Doing business as usual cannot save news publishing from the twin pressures of hostile governments and the digital revolution."[8]

The recent flourishing of data journalism on the African continent, both as complement to existing news operations and as standalone enterprises, is one of the pleasant developments in the region today. Institutions like Budgit and Dataphyte in Nigeria remind us that however dim the sustainability landscape may be, these innovations demonstrate that there are paths forward for media outlets willing to embrace change. New services like bespoke reports drawing on journalistic expertise, nonprofit vehicles to collect funds for public interest journalism, and experimentation with new distribution channels are all examples of an African media space that is striving for long-term sustainability. Adaptations like these show a way for media outlets to grow beyond reliance on advertising for survival. These opportunities are waiting to be seized.

Endnotes

1 "The Elements of Journalism," American Press Institute, n.d., *www.americanpressinstitute.org/journalism-essentials/what-is-journalism/elements-journalism*.

2 "Premium Times, VOTAC Agree Strategic Alliance to Aid Innovation, FDI, Economic Mobility in Africa," Premium Times, 23 September 2020, *www.premiumtimesng.com/news/headlines/416464-premium-times-votac-agree-strategic-alliance-to-aid-innovation-fdi-economic-mobility-in-africa.html*.

3 Francis Mdlongwa, ed., *Entrepreneurial Journalism in Africa: Opportunities, Challenges and Risks for Media in the Digital Age* (Johannesburg: Konrad Adenauer Stiftung, 2019), *www.kas.de/documents/285576/285628/Entrepreneurial+Journalism+in+Africa.pdf/1a371c3e-38c9-afd1-239c-3b1c9db35c3e?version=1.0&t=1553523656523*.

4 Cristina Tardáguila, "'What's Crap on WhatsApp?' Has Debunked 25 Hoaxes in 6 Episodes. What Is the Challenge Now?," Poynter, 14 January 2020, *www.poynter.org/fact-checking/2020/whats-crap-on-whatsapp-has-debunked-25-hoaxes-in-6-episodes-what-is-the-challenge*.

5 Roukaya Kasenally, "The Dilemma of Africa's Media," in *Entrepreneurial Journalism in Africa: Opportunities, Challenges and Risks for Media in the Digital Age*.

6 "Letter From the Publisher," *BusinessDay*, 8 May 2018, *https://businessday.ng/life-arts/article/letter-from-the-publisher*.

7 Carolyne Tanui, "Rising Popularity of Streaming Services Led to A Decline In Digital TV Subscriptions – CAK," *WeeTracker.com*, 30 September 2019, *https://weetracker.com/2019/09/30/decline-in-digital-tv-subscriptions*.

8 Mdlongwa, *Entrepreneurial Journalism in Africa: Opportunities, Challenges and Risks for Media in the Digital Age*.

Authoritarian Disinformation

A COVID Test for Latin America's Information Space

By Vladimir Rouvinski

When a Spanish-speaking Latin American television consumer wants to see news from trusted North American or European media, they are likely to look to several television channels, for example, CNN en Español. However, the channels that were in the recent past a familiar source of news for viewers in this part of the world today have greatly reduced the amount of live broadcasting they provide. Instead, they often repeat programs recorded a day or even several days before. In many cases, these programs are not even about politics, but about music, culture, and consumer goods. The overall quality of the programs offered by trusted sources remains high, but they are leaving an important part of the information space—international news—empty.

Because of the generous support [government-sponsored media from Russia, China, and Iran] receive from state budgets, these outlets are able to offer extensive coverage of political events in spite of the high production costs that limit trusted independent media.

In the past several years, government-sponsored media from Russia, China, and Iran have rushed to take advantage of this abandoned space. Because of the generous support they receive from state budgets, these outlets are able to offer extensive coverage of political events in spite of the high production costs that limit trusted independent media. They are rapidly becoming key sources of information on international developments for Latin American audiences.[1] Moreover, programs originally made by Russia, China, and Iran are often broadcast by other channels and appear on social media, where news consumers are not always aware that they have been exposed to biased interpretations of events.

During the COVID-19 pandemic, the investments that Russia, China, Iran, and some other authoritarian governments made in Latin America's media space bore fruit. Taking advantage of a great deal of uncertainty and confusion in Latin America and the Caribbean, these authoritarian-sponsored media outlets began disseminating propaganda about the pandemic, a global crisis which had a severe impact on national and global economies. For these authoritarian governments, the new coronavirus presented them with a two-fold opportunity to define their strategies in the information space of the Western Hemisphere.

On the one hand, Russia, China, and Iran's narratives downplay the efforts of other governments to provide relief to the population and effectively manage the risks associated with COVID-19. For example, since the global pandemic began, RT en Español—the Spanish-language branch of RT, Russia's state-controlled international television network—has aired numerous programs showing how the United States and Europe have failed to meet the challenges caused by the virus.[2] Although many (but not all) of the facts reported by RT were accurate, their interpretation can be rightly called disinformation: the Moscow-funded media outlet provided viewers with partial context, and only opinions from a carefully pre-selected segment of the expert community and common people were featured. Chinese and Iranian

media coverage of Western democracies' pandemic response demonstrates similar strategic disinformation. From this perspective, it is evident that these authoritarian countries' media platforms have used the health crisis to reinforce their already familiar anti-American, anti-Western discourse.

The spread of the virus started with little early warning and required a swift response by governments around the world, including from developed democracies. However, the central pillar of the narrative promoted in Latin America and the Caribbean by Russian, Chinese, and Iranian state-sponsored media is the idea that illiberal governments are better fit to meet the challenges of the pandemic than liberal democracies.

Moscow, Beijing, and Tehran have been pushing three key messages about the worldwide response to the new coronavirus. The first message is about the presumed effectiveness of the measures taken by authoritarian governments to control the movements of people while providing adequate testing and treatment. The second emphasizes unequal provision of assistance to different strata of the population in democratic countries, in contrast with universal coverage provided by illiberal governments. The final and perhaps most important idea is that Western governments are failing to meet their obligations as leaders of the established liberal world order while resisting the attempts by other actors like Russia and China to fill the gap.

Over the course of the pandemic, "COVID diplomacy" and the vaccine race have emerged as key elements of Russia and China's expanded disinformation operations in Latin America. The first refers to the Russian and Chinese governments' donations of face masks and high-tech medical equipment to several countries in the region. Despite the relatively small (in practical terms) size of the donations, state media outlets in both Moscow and Beijing provided wide coverage of public events where the donations were presented to Latin American nations.[3] Even though the United States and many other Western nations have also been making donations linked to the pandemic, these gestures have not received similar attention in regional media. Consequently, the Latin American audience may easily receive the impression that Russia and China are the only nations that care about them.

In the case of the vaccine race, the Russian government's messaging in Latin America's media space has been aggressive. Moscow has essentially mandated to its health and international agencies that Russia will be the first nation to produce a vaccine, despite international concern over its safety protocols. It presents the Russian government health agency's premature approval of the "Sputnik V" vaccine (before it completed clinical trials) as evidence that Russia is one of the most technologically advanced nations—and implies that poor coverage of its achievements in Western mass media has denied Russian science the status it deserves.[4] In addition, Russian media alleges that pro-Western Latin American governments are not willing to acquire the Russian vaccine because of their political ties with Washington, rather than because the proposed vaccine has not yet undergone all the necessary tests and safety procedures.[5] This strategy has already contributed to noticeable tensions between local and national political actors in the region.[6] There is little doubt that

Moscow will continue to exploit a topic as politically sensitive as COVID-19 vaccines, using media manipulation as one of its tools for sowing discord and confusion.

Despite the advances made by authoritarian media in Latin America and the Caribbean, there are plenty of opportunities to offer Latin Americans high-quality information from trusted sources.

Despite the advances made by authoritarian media in Latin America and the Caribbean, there are plenty of opportunities to offer Latin Americans high-quality information from trusted sources. One way to do so is to encourage local media to collaborate more closely with U.S. and European media outlets. Based on the interviews conducted by this author with a number of Latin American journalists, they are aware of the nature of Russian, Chinese, and Iranian interest in the region. However, they believe the best solution would not be to prohibit authoritarian media, but instead to promote alternative democratic narratives. Support for fact-checking efforts on social networks has become sounder in recent months, and is also helpful. Other stakeholders like universities and locally based think tanks, which are more familiar with the local context than research institutions outside of Latin America, might also carry out research projects allowing scholars and experts to identify the particular characteristics of Russian, Chinese, and Iranian engagement of the Latin American information space and draw appropriate policy recommendations.

What ties all of these responses together is a renewed commitment to the space for news and information, left vacant by retreating independent media, and now contested by authoritarian powers from outside the region. Reinvestment in this space is critical to the future health of Latin American democracy.

Endnotes

1 It is difficult to estimate the exact audience numbers for Russian, Chinese, and Iranian government-sponsored media in Latin America and the Caribbean. However, it is evident that Russia's media outlets (RT en Español, Sputink Mundo) in particular have managed to acquire wide audiences everywhere in Latin America. More than 350 different cable television providers (based on the author's own data) have been offering RT in Spanish to its subscribers as part of the basic package and, as of November 2020, RT's Spanish-language YouTube channel has 4.2 million subscribers.

2 See, for example, "Los motivos por los que la vacuna contra el coronavirus puede fracasar en EE.UU," RT en Español, 9 July 2020, *https://actualidad.rt.com/actualidad/359368-medica-asegurar-vacuna-coronavirus-fracasar-eeuu*; "EE.UU.: La crisis generada por la pandemia castiga más a las comunidades latina y afroamericana," RT en Español, 4 August 2020, *https://actualidad.rt.com/video/362149-eeuu-crisis-generada-pandemia-comunidades*; "Analista: 'La pandemia del covid-19 demostró que la alianza entre EE.UU. y la UE no vale nada'," RT en Español, 30 June 2020, *https://actualidad.rt.com/video/358317-pandemia-covid19-alianza-eeuu-ue*; Luis Gonzalo Seguro, "Europa, a diferencia de China, fracasa en el control del coronavirus," RT en Español, 24 March 2020, *https://actualidad.rt.com/opinion/luis-gonzalo-segura/347383-europa-fracaso-china-exito-control-coronavirus*; "EE.UU. desperdicia 'el tiempo valioso que China ha ganado!': Pekín arremete contra Washington por su retórica 'racista' del coronavirus!," RT en Español, 21 March 2020, *https://actualidad.rt.com/actualidad/347038-china-arremeter-eeuu-retorica-racista-coronavirus*.

3 According to the U.S. State Department, the United States provided more than $73 million in medical supplies and capacity building support to help mitigate the spread of COVID-19 in Central and South American countries—including more than $12 million to Venezuela. (See: "U.S. sends coronavirus aid to Central and South America," Bureau of Global Public Affairs, U.S. Department of State, 8 May 2020, *https://share.america.gov/u-s-sends-coronavirus-aid-to-central-and-south-america*.) However, few Latin Americans are aware of these efforts since the U.S. aid did not receive sufficient coverage by mass media in the region. On the contrary, when China sent just a single plane with medical supplies to Venezuela, the arrival of aid was widely covered by many TV channels throughout Latin America. See: "Venezuela recibe ayuda de China para luchar contra el COVID-19," TeleSur TV, 28 March 2020, *https://youtu.be/ad4k7BtdHJk* ; "Venezuela recibe de China insumos médicos para hacer pruebas de Covid-19," *France24* Español, 29 March 2020, *https://youtu.be/pWpVRBA3G3A*; "Venezuela recibe ayuda de China para combatir virus," Associated Press, 30 March 2020, *https://youtu.be/9s_VwTuSGGQ*. In the case of Russia, the delivery of small amounts of Russia's "Sputnik V" vaccine to Venezuela received extensive coverage by media in Latin America. See, for example, "Llega a Venezuela la vacuna rusa contra el covid-19 Sputnik V," RT en Español, 2 October 2020, *https://youtu.be/FWiy-VQwMHE*; "Venezuela recibe cargamento de vacunas de Rusia contra covid-19," *AFP Español*, 2 October 2020, *https://youtu.be/OesfPuDibmM*.

4 Isabelle Khurshudyan, "In Race for Coronavirus Vaccine, Russia Ramps Up Rhetoric to Defend Sputnik V," *Washington Post*, 4 October 2020, *www.washingtonpost.com/world/europe/coronavirus-vaccine-russia-sputnik/2020/10/03/83075a10-f380-11ea-8025-5d3489768ac8_story.html*.

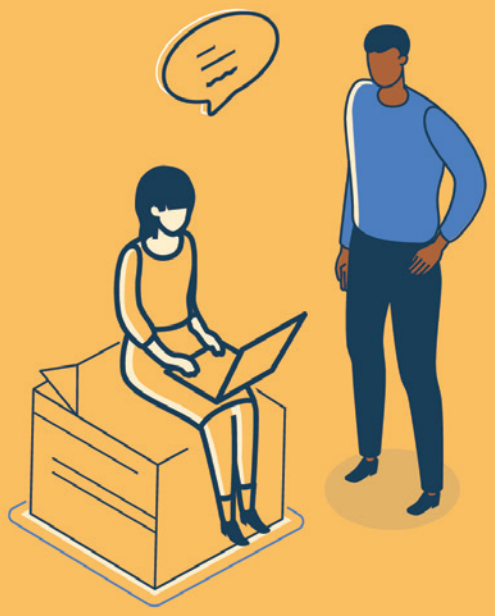
5 See, for example, "La carrera por la vacuna: ¿Cabe la política en medio de la pandemia?," RT en Español, 13 August 2020, *https://actualidad.rt.com/video/363090-experto-criticas-vacuna-rusa-eeuu*.

6 For instance, the governor of one of the provinces in Peru sent a letter directly to Vladimir Putin asking to supply the vaccine despite the fact that the decision to allow the Russian vaccine into the country is the exclusive prerogative of the President; see Elmer Cáceres, "Embajada de Rusia responde sobre pedido de vacuna contra el COVID-19," TVPERU, 20 August 2020, *www.tvperu.gob.pe/noticias/nacionales/elmer-caceres-embajada-de-rusia-responde-sobre-pedido-de-vacuna-contra-el-covid-19*. Another example is when the Russian ambassador, after a major Colombian newspaper asked him about the matter, blamed the Colombian government for not being willing to reach out to Moscow to get the vaccine; Luisa Mercado, "'Colombia no está interesada en la vacuna rusa': embajador ruso," *El Tiempo*, 16 August 2020, *www.eltiempo.com/politica/vacuna-colombia-no-esta-interesado-en-la-vacuna-rusa-segun-embajador-528984*.

Mendacious Mixture

The Growing Convergence of Russian and Chinese Information Operations

By Andrea Kendall-Taylor



The COVID-19 pandemic has shined a light on a new challenge to the information ecosystem: the increasing convergence of Russian and Chinese information operations.[1] In the early days of the pandemic, Beijing assumed a more aggressive approach to its information operations than has historically been the case. In some instances, the Chinese Communist Party (CCP) even deployed tactics taken from Russia's intentionally disruptive playbook. This change in the CCP's tactics calls into question the predominant view of Russian and Chinese approaches.

According to this view, although Moscow and Beijing share some common goals—weakening U.S. influence and dividing U.S. alliances, for example—they pursue different approaches to advancing their objectives. The Kremlin has been confrontational and destructive, attacking its opponents by, for example, amplifying false narratives or using divisive rhetoric.[2] The CCP, by contrast, has typically relied on a more incremental and diffuse strategy, preferring to create positive perceptions of China and the CCP as a responsible global actor.[3] Russian and Chinese actions during the pandemic, however, underscore how these lines are being blurred and why it is increasingly important for observers to challenge some long held assumptions.

The convergence of Russian and Chinese tactics in the informational domain is taking place within the context of a broader trend toward increasing cooperation between the two countries. Russia and China, despite the longstanding distrust between them, are deepening ties and increasing coordination on a range of economic, defense, technological, and political issues.[4] These repeated interactions facilitate a sharing of best practices and create a foundation for sustained cooperation. The convergence of CCP and Kremlin tactics, therefore, is about more than "authoritarian learning," or the passive diffusion of such practices from one authoritarian regime to the next. Instead, Russia and China are likely working together more concertedly than previously assumed. Moreover, because their influence tactics are converging within the context of the two countries' broader geopolitical alignment, liberal democracies are liable to face enduring challenges from both countries in the information environment.[5]

Moscow and Beijing's alignment in the information space is amplifying the challenges that their individual tactics pose. For example, both governments are now advancing the same or overlapping narratives, increasing the dose of their toxic messaging on a range of issues from the origins of the novel coronavirus to the CCP's human rights violations in Xinjiang Province and the crackdown on democratic systems in Hong Kong.[6] Such alignment has even been evident in the traditional media space, where both are building news and information networks outside their borders. Chinese and Russian state media outlets

increasingly are working together and echoing each other's narratives, especially their criticism of the United States.[7] Even when their approaches are not aligned, their combined tactics have a corrosive effect. A loose tactical division of labor has emerged between Beijing's and Moscow's digital influence activities in which Russia weakens information spaces by sowing false narratives and flooding platforms with content critical of the United States and its institutions, making them more vulnerable to the CCP's affirmative messaging about China's ability to provide global leadership amid U.S. retrenchment. The sum of these two parts is more potent than either alone.

Detailed case studies of China-Russia coordination remain limited... rigorous research efforts to understand the effects of authoritarian digital influence campaigns on the perceptions of citizens in democracies—that is, what tactics actually succeed in shaping views—are similarly limited.

How can democracies respond to this troubling convergence?[8] Russian and Chinese efforts to distort and manipulate the information environment will be difficult to deter. Naturally, liberal democracies should seek to coordinate responses, thereby raising the collective costs that Moscow and Beijing face, but a mere pooling of efforts cannot be the only approach (and enduring coordination is far from easy to sustain). Initiatives designed to increase resilience (and thereby mitigate the effects of Chinese and Russian operations) also will be critical to safeguarding the information environment. As liberal democratic actors undertake efforts to increase the resilience of their societies, they must take care to uphold their liberal democratic values in the process. In particular, care must be taken to avoid distorting information or compromising the fundamental openness of societies. To increase resilience to Kremlin and CCP information operations, policymakers in affected countries must explore a number of potential responses.

Those who intend to oppose coordinated Sino-Russian information operations must better understand their mechanics in order to stay a step ahead of them. Detailed case studies of China-Russia coordination remain limited, even as evidence of growing synergies between the two mounts. Moreover, rigorous research efforts to understand the effects of authoritarian digital influence campaigns on the perceptions of citizens in democracies—that is, what tactics actually succeed in shaping views—are similarly limited. Addressing these analytic gaps is a prerequisite to helping policymakers expose the operations, prioritize the problem, and enact policy responses that bolster democratic resiliency to digital influence campaigns by both China and Russia. At the same time, coordination between Russia and China is likely to continue and evolve in ways that negatively affect the integrity of the information environment. It will not be enough to merely react to trends today. Think tanks, nongovernmental organizations (NGOs), and universities can all play a role in raising insight into the current and possible future landscapes.

To bolster the legitimate media space and reduce the public's vulnerability to disruptive information operations, democratic actors should also pursue a more proactive approach focused on education and innovation. Digital literacy is one such area that deserves greater attention. Several European countries (including Sweden, The Netherlands, Germany, and the Czech Republic) have media literacy programs. This is a best practice that should spread across democracies and focus on teaching students and older adults alike about disinformation campaigns and how to avoid manipulation when consuming news. In many cases, NGOs and other civil society actors will be the most credible conduits of such information.[9]

At the same time, as autocracies like China and Russia use technology to supercharge their efforts, democracies should identify opportunities to harness new technology to combat

influence operations. For example, can artificial intelligence help identify harmful narratives before they gain significant traction? Likewise, as Russian actors in particular turn to graphic and video formats that are more difficult to identify and analyze, what solutions exist to counter these efforts? Greater public-private partnerships will be needed to tackle these emerging challenges.

The war for information cannot be won without independent, fact-based, and accessible media, particularly aimed at those who have been neglected by traditional media outlets.

The war for information cannot be won without independent, fact-based, and accessible media, particularly aimed at those who have been neglected by traditional media outlets. Beijing and Moscow have sought to fill information vacuums by mobilizing Chinese- and Russian-language diasporas through a variety of instruments, including digital influence campaigns. Given the role these diasporas play within U.S. allies in Eastern Europe and Asia, ensuring that these populations have access to credible and independent information sources in their home languages should be a priority for the United States and other democratic allies.[10] Subsidies also may be needed to support fact-based content in regions where affordability matters most. In developing countries, pricing can play a critical role in determining what sources populations turn to for information; Beijing in particular has made a concerted effort to shape the information ecosystems of developing countries by offering free content to local providers and supporting on-the-ground activities by Chinese media companies, such as converting households from analog to digital television. The United States can do more to bring down the cost of fact-based content and invest in building the capacity of on-the-ground content providers in developing countries.

Awareness and activism also can help reclaim contested information spaces. In Europe, for example, the threat from Moscow is a proverbial clear and present danger. Views of China, in contrast, are less cohesive, though national governments and the European Union are more attuned to and concerned about the challenges stemming from China's growing influence.[11] Efforts to underscore the alignment and coordination between Russia and China could increase the urgency in Europe and elsewhere to address the China challenge. Think tanks and civil society organizations can shine a much-needed light on Russian and Chinese activities in local media environments, and push governments to take the threat seriously and address it.

As Russia and China work together to legitimize norm change, the United States and liberal democracies need to show up in multilateral organizations to counter this corrosive trend. The United States could build expertise and competence of foreign participation in multilateral organizations to help create greater headwinds. NGOs too play a role in the United Nations process and can create pressure for liberal democracies to collectively address the challenge.

Finally, democracies should think outside the information space. Media organizations, NGOs, and other civil society actors can play a role in addressing divisions and grievances in society that make populations more vulnerable to information operations. Russian and Chinese narratives are most successful when they are grounded in truth and exploit societal divisions. Organizations that address such divisions and sources of discontent and encourage a healthy public discourse around them will better inoculate societies from disinformation.

Endnotes

1 Daniel Kliman, Andrea Kendall-Taylor, Kristine Lee, Joshua Fitt, and Carisa Nietsche, *Dangerous Synergies: Countering Chinese and Russian Digital Influence Operations*, Center for a New American Security, May 2020, *www.cnas.org/publications/reports/dangerous-synergies*.

2 For examples, see Dean Jackson, "How Disinformation Impacts Politics and Publics," National Endowment for Democracy, 29 May 2018, *www.ned.org/issue-brief-how-disinformation-impacts-politics-and-publics*.

3 For illustrations of this trend, see Sarah Cook, *Beijing's Global Megaphone*, Freedom House, January 2020, *https://freedomhouse.org/report/special-report/2020/beijings-global-megaphone*.

4 Andrea Kendall-Taylor and David Shullman, "A Russian-Chinese Partnership Is a Threat to U.S. Interests," *Foreign Affairs*, 14 May 2019, *www.foreignaffairs.com/articles/china/2019-05-14/russian-chinese-partnership-threat-us-interests*.

5 Andrea Kendall-Taylor and David Shullman, "Converging Chinese and Russian Disinformation Compounds Threat to Democracy," Power 3.0 blog, 26 May 2020, *www.power3point0.org/2020/05/26/converging-chinese-and-russian-disinformation-compounds-threat-to-democracy*.

6 Stephanie Bodoni, "China, Russia Are Spreading Virus Misinformation, EU Says," Bloomberg, 10 June 2020, *www.bloomberg.com/news/articles/2020-06-10/eu-points-finger-at-china-russia-for-covid-19-disinformation*; Thomas Grove, "Russia Gives China a Leg Up in Foreign Broadcasting," *Wall Street Journal*, 14 January 2020, *www.wsj.com/articles/russia-gives-china-a-leg-up-in-foreign-broadcasting-11579003202*.

7 Laura Rosenberger, "Making Cyberspace Safe for Democracy," *Foreign Affairs*, 13 April 2020, *www.foreignaffairs.com/articles/china/2020-04-13/making-cyberspace-safe-democracy*.

8 For addition detail on these and other recommendations, see Kliman et al., *Dangerous Synergies*.

9 See also Jamie Fly, Laura Rosenberger, and David Salvo, "The ASD Policy Blueprint for Countering Authoritarian Interference in Democracies," German Marshall Fund, June 2018, *www.gmfus.org/publications/asd-policy-blueprint-countering-authoritarian-interference-democracies*.

10 Kliman et al., *Dangerous Synergies.*

11 Laura Silver, Kat Devlin, and Christine Huang, "Unfavorable Views of China Reach Historic Highs in Many Countries," Pew Research Center, 6 October 2020, *www.pewresearch.org/global/2020/10/06/unfavorable-views-of-china-reach-historic-highs-in-many-countries*.

Scaling Up the Truth
Fact-Checking Innovations and the Pandemic

By Will Moy

In a complex, rapidly changing information ecosystem, fact-checkers are a trusted source of information for millions of people around the world. Yet the COVID-19 pandemic has thrust fact-checkers into a new role: that of first responders to an information crisis. They may see aspects of the crisis before others do; they may have insight into the origins, patterns, and flows of untrustworthy information; and they may be the first to challenge particular kinds or sources of bad information. Fact-checkers have many reasons to be proud of their response to the new coronavirus. A global network of mostly small, nascent independent organizations produced four-thousand fact-checks that—for one indication of scale—have been shown on forty million Facebook posts.[1]

In a global pandemic, everybody's choices are important for public health, and so fact-checkers must take audiences as they are, trusting or not. In some cases, fact-checkers are a vital resource for people who are not willing to trust other sources of information. These wary audiences rely on fact-checkers for a number of potential reasons. Some might not trust official or traditional sources of information, such as government statements or major newspapers or television networks, because of their own beliefs and attitudes about the trustworthiness of these sources. Others are distrustful for the good reason that those same official or traditional sources have in fact issued statements that have proved untrustworthy in their context and experience. Regardless of the reason why fact-checkers are needed, they play an important role in the exchange of ideas and information, and depend on others to play theirs. Fact-checking is one way of providing good information that serves everybody.

Although fact-checking is not the same everywhere, fact-checking organizations tend to be generalists: they actively monitor for all kinds of harmful false information, and engage with audiences who are concerned about trustworthiness. That said, fact-checkers usually depend on others for deep subject expertise and to reach wider audiences (academics, for instance, or social media platforms). The significant investment that Facebook has made in fact-checking around the world is one example of this continued engagment, as is the integration of fact-checks into Google and (in some countries) YouTube search results, although Google does not pay individual fact-checking organizations for their work in the way that Facebook does. What observers sometimes miss, however, is that traditional forms of media still have greater reach in many countries than online media. Television, radio, and newspapers are all powerful media formats that provide one shared experience to all their audiences. Information and newsgathering habits are changing rapidly, but for the foreseeable future it will be essential for fact-checkers and traditional media outlets to work together to tackle bad information.

What lessons for fact-checkers have emerged from the pandemic and the global political turmoil of the past few years? Many fall under two big themes: preparation and scale.

Fact-checkers Must Be Prepared for Fast-paced, Complex Challenges

In 2020, fact-checkers improvised; they had no choice but to do so. However, improvisation has its limits. Bad information is as old as humanity, but tackling it globally while lives are on the line and with due respect for free expression is a new and immature field. Fact-checkers need to take lessons in preparedness from emergency management experts. This year, they had to connect with partners on the fly, building vital collaborations with scientists and health bodies—but what if the connections and the plans had been there in advance? Mature disciplines have shared concepts and processes that amplify their efforts. Fact-checkers now have enough experience to develop such concepts and processes for themselves. If the pandemic is a "Level 1" information crisis, where every tool must come out of the toolbox, what is a Level 2 (or Level 3) situation, where the stakes may be less dire but the information is no less in need of fact-checking? What should we expect fact-checkers, internet companies, governments, and others to do in those situations? This foundational question presents great opportunities.

Prepared responses can only be effective if responders understand the environments and audiences for which they need to prepare. Right now, it is not clear that researchers are asking the right questions. The next big information crisis is likely to be vaccine skepticism: every individual will have to evaluate the extent to which they trust the efficacy of a vaccine for the new coronavirus. Their knowledge, beliefs, and feelings about that vaccine will matter tremendously, and it will be the job of fact-checkers to support accurate information to help individuals make informed choices.

It is important to distinguish between disinformation, its source, and its effect…However, such distinctions often cannot be made reliably in real time.

To be successful, fact-checkers rely on a sound understanding of both audiences for and sources of information. In terms of the latter, significant research funding and effort today is understandably applied to those areas involving novel technology or theoretical grounds, only for this research to yield interesting but instantly outdated descriptions of the flow of information online. Yet the former is no less complicated: as the media and information environment fragments, with people accessing more sources than ever before—and with more of those sources being personalized instead of shared experiences—it has become harder than ever to understand audiences. Practically, fact-checkers (and independent media more generally) need to approach the problem with a market research outlook that helps understand the impact of bad information from the audiences' points of view, and how to position good information to cut through the cacophony.

Finally, in preparing for future challenges, fact-checkers need to recognize their limitations. It is important to distinguish between disinformation, its source, and its effect, as well as between the deliberate actions of disinformation actors and the possibility of unintentional misinformation. Foreign and domestic actors also tend to act in different ways. However, such distinctions often cannot be made reliably in real time. It is especially difficult to positively identify coordinated inauthentic activity online, let alone to attribute it robustly. Fact-checkers should acknowledge the range of threats and then accept that prepared responses will work with imperfect information, leaving researchers and digital investigators to clarify some of these unknowns at a later date.

Fact-checkers Must Be Ready to Scale

The genuine novelty that should most concern fact-checkers and others who analyze the information ecosystem is the challenge of digital speed and scale. Around the world, innovative efforts are rising to this new challenge. No single organization is leading these initiatives, but there are some great examples, some open questions, and some organizations that have not received their due share of attention because many policymakers and researchers focus too narrowly on either the United States and Western Europe and their security interests. Four areas where fact-checkers have shown potential for scale are building communities, building technology, partnering to reach targeted audiences, and influencing policy.

In Spain, for instance, Maldita.es built a network of expert volunteer "superheroes" to help them respond to the pandemic with assistance from doctors and scientists.[2] Crude crowdsourced fact-checking is not a sufficient response (as previous experiments have shown), but depending on a small team of fact-checkers is limiting.[3] Maldita.es showed that it is possible (if not easy) to invest in building communities that can effectively mobilize and tackle bad information.

Fact-checkers should augment their work with technology, but even more crucially, they can help design systems to enhance accountability that is so often missing. In winning Google's AI for Social Good Impact Challenge for their work on automated fact-checking, Africa Check, Chequeado, and Full Fact beat more than two-thousand applicants from around the world.[4] Building this kind of technological expertise within public benefit organizations is crucial, especially when considering that the vast majority of decisions about misinformation are being made by artificial intelligence. Four thousand fact-checks do not turn into forty million posts without assistance from a computer. Nevertheless, these are systems designed by private companies under pressure and without scrutiny. The first part shows how machine learning can be a necessary innovation; the second shows a troubling democratic vulnerability in how it is often deployed.

Above all, though, if the rules of the game are broken, the best players and the best tactics will still fail. The people who most need that insight are policymakers, who are now trapped in a guessing game about the veracity of the information propagated through internet companies.

Collaboration between internet companies such as Facebook and Google and fact-checkers around the world has made it much easier to bring checked and corrected information to people at the point where they make decisions about what to read, share, or do. Other, more local collaborations help target good information to the right decision makers—for instance, forums for parents are good places to talk about vaccines. Partnerships require both time and focus to amplify the impact of their work.

Africa Check, Chequeado, and Full Fact joined forces to point out that fact-checkers possess a unique evidence base about the causes, content, and consequences of bad information. Above all, though, if the rules of the game are broken, the best players and the best tactics will still fail. The people who most need that insight are policymakers, who are now trapped in a guessing game about the veracity of the information propagated through internet companies. Fact-checkers need to ditch the "publish and pray" model and invest in the capacity to systematize their evidence and make their case to policymakers.[5]

The barriers to each of these changes is high. Overcoming them will involve developing skills and capabilities within fact-checking organizations as well as connections beyond them. They will require sustained investment, which is rare in this constantly changing space. But these innovations have demonstrated their benefits, even as continuous adaptation is needed. The diligent, day-to-day work of fact-checkers is unique. When done well, it is the most solid possible foundation for wider work.

Perhaps the most daunting barriers come from failure to think globally about these challenges. Two billion more people are expected to start using the internet over the coming decades. Their experience will be determined partly by the vision of those funding in this space today. Astute funders will make a pivotal difference if they push for support for a wide range of languages, whatever their profitability; if they support cross-border learning between fact-checking organizations so that needed innovations can be achieved more rapidly; and perhaps above all if they help to rebalance power in conversations among civil society, governments, and large companies. The next two billion users of the internet are just as worthy of investment as the first two billion have been.

Endnotes

1 Guy Rosen, "An Update on Our Work to Keep People Informed and Limit Misinformation About COVID-19," Facebook, 16 April 2020, *https://about.fb.com/news/2020/04/covid-19-misinfo-update*.

2 Josie Hollingsworth, "Is it a Marvel film or a fact-checking newsroom? How Malditas.es gives its readers 'superpowers.'" Poynter, 23 October 2020, *www.poynter.org/fact-checking/2019/is-it-a-marvel-film-or-a-fact-checking-newsroom-how-maldita-es-uses-its-readers-superpowers*.

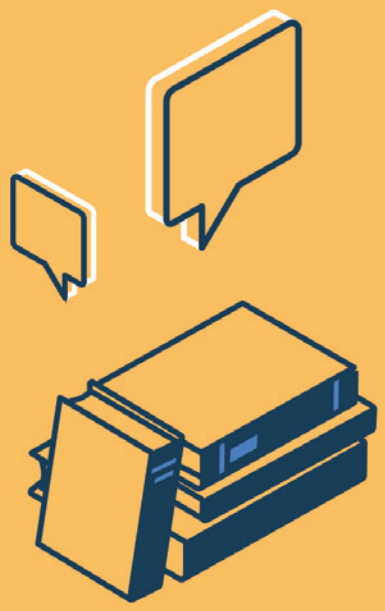
3 Şükrü Oktay Kılıç, "This fact-checking site tried crowdsources a story. Here's what it learned," 26 April 2020, Poynter, *www.poynter.org/fact-checking/2019/this-fact-checking-site-tried-crowdsourcing-a-story-heres-what-it-learned*.

4 "Full Fact and International Partners Win Google AI Impact Challenge," Full Fact, 7 May 2019, *https://fullfact.org/blog/2019/may/full-fact-and-international-partners-win-google-ai-impact-challenge*.

5 Laura Hazard Owen, "'First-generation fact-checking' is no longer good enough. Here's what comes next," NiemanLab, 21 June 2019, *www.niemanlab.org/2019/06/first-generation-fact-checking-is-no-longer-good-enough-heres-what-comes-next*.

Shhhh...
Combating the Cacophony of Content with Librarians

By Joan Donovan



Recent research about misinformation and the new coronavirus suggests that the news a person consumes is predictive of how they assess the risks of COVID-19 to their health and their community.[1] This statement may sound like common sense, but it has more serious implications when one starts to unpack the differences in available information about COVID-19.

Any concerted effort to fix this problem may well require a fundamental reappraisal of how users access information online and how platforms curate it, as well as bold improvements to how civil society and other public interest actors engage with citizens in digital spaces.

At Harvard Kennedy School's Shorenstein Center, the Technology and Social Change Research Project analyzes how media manipulation and disinformation affects particular communities and social institutions. Though the content put forward by any particular disinformation campaign is of course important, in order to analyze and understand the impact of misinformation, one must study the greater information ecosystem—the totality of news, entertainment, social media, and other sources available to a community and the infrastructure that supports it. As the confused and often contradictory responses to the COVID-19 pandemic in different areas of the world have shown, high levels of unchecked and unmitigated misinformation can affect individual and group behaviors with startling speed. Any concerted effort to fix this problem may well require a fundamental reappraisal of how users access information online and how platforms curate it, as well as bold improvements to how civil society and other public interest actors engage with citizens in digital spaces.

What happens when there is too much information on a given subject without strong oversight over what is verifiable and what is false? The World Health Organization has termed the overabundance of information an "infodemic," where it is increasingly difficult to find timely, relevant, and local information amid a torrent of content, some or much of it purposefully untrue.[2] Bad actors, from political propagandists to commercial operations selling harmful fake medical "cures" and counterfeit personal protective equipment, target unsuspecting information seekers looking for hand sanitizer, N95 masks, and immune-boosting supplements. Search and social companies continue to be unable to parse authoritative content, legitimate products, and real services from the predacious. The COVID-19 infodemic has overwhelmed the internet with new websites, posts, accounts, and ads, nearly all of which overpromise and underdeliver in their chosen areas. Online grift has long been a problem, but in the current pandemic the scale and audacity of this grift is truly enormous.

Goods and services aside, the infodemic has made it harder to find even basic information about the new coronavirus, COVID-19, and the steps individuals should take to protect themselves and others. Under normal circumstances, one might seek out information through peers or coworkers, but the need for social distancing has relegated most people to online forums and other areas of the internet, where conspiracy and medical misinformation thrive. Conspiracy-driven, click-bait content, with themes like those below, exists on all major social media platforms:

"COVID-19 IS A CHINESE PLOT TO DESTROY THE U.S. GOVERNMENT"

"COVID-19 IS A DEMOCRAT PLOT TO DESTROY TRUMP"

"COVID-19 IS A PHYSICAL REACTION TO 5G TOWERS"

"COVID-19 IS POPULATION CONTROL THROUGH MICROCHIPPED VACCINES"

It is difficult to prove a statement false when it is completely made up. What evidence can be cited to prove or disprove an event that never happened? Consequently, the impulse to debunk or set the record straight on medical misinformation has led to a cacophony of content, where truth and falsehoods are commingled in search queries that return articles, posts, and videos based on popularity and other behavioral signals. As tech companies grapple with the presence of misinformation, they have turned to monitoring signals of "coordinated inauthentic behavior" (a concept coined by Facebook) because assessing the truthfulness of content is a messy business, especially when it comes to politics and news.[3]

As it turns out, junk information is cheap to produce and profitable; knowledge, by contrast, is both expensive and not so interesting.

Over the past few years, platforms did not consider medical misinformation as political. Some, like Pinterest, were willing to remove vaccine misinformation, but this was left up to the policies of a particular platform. Nevertheless, tech companies have discovered that population health is a deeply political subject. Almost any sociologist would agree that health is politics by other means, citing the severe inequalities in access to healthcare (coupled with politicians' mismanagement of resources) and the slow carefulness required by science when developing therapeutics. At this moment, though, unequal access to information has bogged down efforts to distinguish truth from falsehood online. Scientific findings are increasingly issued through press releases by major global pharmaceutical corporations, where the competition to rush a vaccine is exacerbated by political rhetoric downplaying the risks of COVID-19. Without transparency in data, journalists and researchers face significant barriers in fact-checking information that is already gaining popularity on social media, which leaves the public at a disadvantage when seeking knowledge. As it turns out, junk information is cheap to produce and profitable; knowledge, by contrast, is both expensive and not so interesting.

Medical misinformation online is a serious issue today, but this has not always been the case. In a 1999 issue of the *Journal of Public Health Medicine*, Dr. Vince Abbott warned, "The [internet] should not be considered as a reliable source of information on subjects about which one knows little. This is especially true for medical information, as... much of what a typical user may find will be inaccurate or biased."[4] Yet the authoritative voices of news or academic journals found it difficult to compete on the wide-open spaces of the internet, which allowed self-proclaimed experts to spread their ideas on a massive scale without gatekeepers, fact-checkers, or a need for credibility and authority. This slow cultural shift away from traditional media sources opened the way for junk information to flood the information ecosystem.

Even these worrying trends did not become a global problem until they reached critical mass. A confluence of factors led up to the present infodemic moment: antivaccination groups that began to use social media platforms to recruit new adherents, social media companies

that introduced recommendation algorithms which made medical misinformation easier to discover, influencers who began pushing anti-science viewpoints to their subscribers and followers, and politicians who saw an opportunity to increase their base and reach by appealing to anti-science rhetoric. The international effects of these trends were clear before the COVID-19 pandemic: disinformation also inhibited the response to the 2018 Ebola outbreak, and vaccine skepticism and other aspects of today's infodemic are challenging public health officials around the globe.[5]

The rollout of the HPV (human papillomavirus) vaccine during the growing popularity of social media showed one instance of the damaging effects of medical misinformation on a vulnerable audience.[6] In 2014, a small town in Colombia saw a wave of hospitalizations after videos of young girls having seizures were shared on social media, supposedly showing the side effects of the HPV immunization. An investigation concluded that the physical symptoms of those hospitalized were attributable not to the vaccine, but were psychogenic reactions linked to fear and anxiety about this vaccine misinformation. When Colombian President Juan Manuel Santos held a press conference to dispel the rumors, his denial of any connection between the vaccine and the supposed reactions to it angered local residents of the village, who became even more distrustful of the vaccine.[7] This episode suggests that medical misinformation can be felt deeply and does lasting damage to public trust in medicine and government.

As a result of the current pandemic, doctors and public health researchers are echoing the call of misinformation researchers to find a way to share privacy-protected social media data, in order to support ongoing research on misinformation and vaccine hesitancy.[8] Yet past collaborations between Facebook and social science researchers failed for myriad reasons: some technical, most political.[9] The major privacy hurdle still remains. Nonetheless, without enforceable policies for auditing social media platform companies and real penalties for distributing dangerous medical misinformation, there can be no resolution for unchecked misinformation, even when it can have life-or-death consequences for the public. Calls for transparency also are inadequate without enforcement; companies have every incentive to keep what they know, and what they choose to conceal, hidden from public scrutiny.

The fields of critical internet studies and public interest technology will have to rise to the occasion and come up with forms of research that rely less on platform data in order to determine how people truly reckon with misinformation daily.

Funding for research on misinformation also needs to focus on mechanisms that protect communities and create accountability. University researchers, especially, should not be using their limited funding to conduct glorified content moderation for companies valued in the billions. The misinformation research scene is beginning to replicate the same funding patterns that now surround universities in the pockets of pharmaceutical companies, where research is encumbered by corporations looking to protect their reputations.[10] The fields of critical internet studies and public interest technology will have to rise to the occasion and come up with forms of research that rely less on platform data in order to determine how people truly reckon with misinformation daily.

We also need a corpus of research investigating how civil society organizations, health professionals, and government (not politicians) can protect the integrity of online communities and develop bold communication strategies that rise above the cacophony of misinformation. What would it look like if these actors endeavored to correct misinformation within one hour

of it gaining traction online? What would a distributed debunking operation look like if, for instance, it were organized around specific locations, events, and issues? Would this approach open the way for tech companies to change and embrace public interest obligations?

Finally, there is no communication without misinformation. There will be a lag in confronting dangerous health misinformation, and some issues will persist even as every intervention is exhausted. And yet across every issue that routinely attracts disinformers, these companies can do more to curate content and systematically privilege credible and responsible voices over inflammatory, divisive, sensational content. Social media companies might step up to the challenge by hiring thousands of librarians to build a content curation model that does not rely so heavily on reactionary moderation.[11] This move would fundamentally rewire our information ecosystem, but it is perhaps the best fix for our digital ecosystem.

Endnotes

1 Margaret Sullivan, "The Data Is In: Fox News May Have Kept Millions from Taking the Coronavirus Threat Seriously," *Washington Post*, 28 June 2020, *www.washingtonpost.com/lifestyle/media/the-data-is-in-fox-news-may-have-kept-millions-from-taking-the-coronavirus-threat-seriously/2020/06/26/60d88aa2-b7c3-11ea-a8da-693df3d7674a_story.html*.

2 "Managing the COVID-19 Infodemic: Promoting Healthy Behaviours and Mitigating the Harm from Misinformation and Disinformation," World Health Organization, 23 September 2020, *www.who.int/news/item/23-09-2020-managing-the-covid-19-infodemic-promoting-healthy-behaviours-and-mitigating-the-harm-from-misinformation-and-disinformation*.

3 For more details on "coordinated inauthentic behavior," see Nathaniel Gleicher, "Removing Coordinated Inauthentic Activity," Facebook, 8 October 2020, *https://about.fb.com/news/2020/10/removing-coordinated-inauthentic-behavior-september-report*.

4 Vincent Abbot, "Web Page Quality: Can We Measure It and What Do We Find? A Report of Explanatory Findings." *Journal of Public Health Medicine* 22, no. 2 (1999): 191-197, *https://a-f-r.org/wp-content/uploads/sites/3/2016/01/2000-Public-Health-Med-Web-page-quality-can-we-measure-it-and-what-do-we-find-A-report-of-exploratory-findings.pdf*.

5 David P. Fidler, "Disinformation and Disease: Social Media and the Ebola Epidemic in the Democratic Republic of the Congo," Net Politics blog, Council on Foreign Relations, 20 August 2019, *www.cfr.org/blog/disinformation-and-disease-social-media-and-ebola-epidemic-democratic-republic-congo*.

6 Joan Donovan, Review of *Stuck: How Vaccine Rumors Start—and Why They Don't Go Away*, by Heidei J. Larson, *Nature*, 22 July 2020, *www.nature.com/articles/d41586-020-02192-w*.

7 Ibid.

8 Raina M. Merchant and Nicole Lurie, "Social Media and Emergency Preparedness in Response to Novel Coronavirus," *JAMA* 323, no. 30 (23 March 2020): 2011–12, *https://jamanetwork.com/journals/jama/fullarticle/2763596*.

9 Joan Donovan, "Redesigning Consent: Big Data, Bigger Risks," *Misinformation Review*, 14 January 2020, *https://misinforeview.hks.harvard.edu/article/big-data-bigger-risks*.

10 Ray Moynihan et al., "Pathways to Independence: Towards Producing and Using Trustworthy Evidence," *BMJ* 367 (2019), *www.bmj.com/content/367/bmj.l6576*.

11 Joan Donovan, "You Purged Racists From Your Website? Great, Now Get to Work," *Wired*, 1 July 2020, *www.wired.com/story/you-purged-racists-from-your-website-great-now-get-to-work*.

Dancing in the Dark

Disinformation Researchers Need More Robust Data and Partnerships

By Renée DiResta

Beginning in January 2020, researchers who study misinformation and disinformation were afforded the unique opportunity to scrutinize the truly global theme of the new coronavirus and its associated illness, COVID-19. As the disease spread, media began to cover—and social media communities began to discuss—a wide variety of narratives about the virus.

Although the COVID-19 pandemic is not the first major disease outbreak in the era of social media—Zika, Ebola, and measles outbreaks previously demonstrated the ease with which misinformation and conspiracies can spread among impacted communities—it revealed significant vulnerabilities in the global information ecosystem, and made clear the need to improve processes for rapidly detecting and mitigating misinformation. Addressing these vulnerabilities will require multistakeholder, interdisciplinary collaboration.

Slow and unclear communication from health authorities revealed gaps in how authoritative information reaches people in crisis situations, both over social as well as broadcast media; when people are searching for answers and there is no reputable content to return, bad information may fill the void.

The COVID-19 pandemic is distinct from prior epidemics in three ways:

1. **A global threat:** It is a pandemic, which means that the impacted community has come to encompass much of the world.
2. **Paucity of data:** It is a novel disease; health authorities are expected to educate and inform the public, though there is minimal verified information about the illness.
3. **Political accountability:** It is a geopolitical issue of significance for many countries, particularly China and the United States; governments are being called to account for their pandemic response by both their own citizens and other world powers.

The pandemic engendered a unique environment for the spread of misinformation and disinformation and reinforced the urgent need for better responses to counter such incidents. Sustained attention from a massive audience of affected people meant that a broad range of narratives—about the origin of the disease, for example, or about potential cures—spread globally as people shared them. Slow and unclear communication from health authorities revealed gaps in how authoritative information reaches people in crisis situations, both over social as well as broadcast media; when people are searching for answers and there is no reputable content to return, bad information may fill the void. Machinations by governments aiming to deflect blame for their handling of the disease, or to take advantage of the opportunity to weaken a geopolitical rival, reinforced the extent to which nation states can spread disinformation and propaganda across the full spectrum of communication technologies. State media broadcast properties, state-affiliated accounts on social platforms (such as diplomats, journalists, influencers), and covert bot and troll campaigns all helped propagate false or misleading information about the pandemic.

In summary: a combination of massive audiences seeking information, a scarcity of quality information to surface, institutional failures and politicization, geopolitical agendas, and determined activist and conspiracist communities leveraging the pandemic to push long-standing agendas to new audiences, created an environment in which researchers, journalists, fact-checkers, tech platforms, and civil society alike found themselves struggling to mitigate one misleading narrative after another.

To meet with any degree of success, all potential stakeholders—researchers, civil society organizations, journalists, social media tech companies, government, and other communicators who are responsible for connecting with the public—will have to collaborate on these solutions.

Without question, the COVID-19 pandemic brought many deep-rooted issues with the information ecosystem into stark relief. However, misinformation and disinformation narratives on myriad topics have become increasingly common over the past five years. Elections and political activities remain a focus of actors who execute deliberate disinformation campaigns. The stakes are high. Medical misinformation can significantly impact public health, and political disinformation can, at minimum, erode confidence in the legitimacy of democratic processes. Given the risks and the stakes, governments and targeted communities alike are searching for solutions to reduce the prevalence of malign and misleading narratives. To meet with any degree of success, all potential stakeholders—researchers, civil society organizations, journalists, social media tech companies, government, and other communicators who are responsible for connecting with the public—will have to collaborate on these solutions.

The issue of online disinformation reached mass public awareness with the Russian invasion of Ukraine and the discovery of Russian interference in the 2016 U.S. presidential election. At that time, cooperation between the various stakeholders was minimal. There was some collaboration among them, but efforts focused primarily on countering the threat of violent extremism, notably the readily attributable terrorist propaganda produced by ISIL. Health misinformation was still widely seen as an issue of free expression, and our understanding of the mechanics of online political influence operations was somewhat nascent. A small community of academic researchers were studying the people and organizations involved in these campaigns, but their work relied primarily on data from public Twitter conversations.

Access to data remains one of the overarching limitations on researchers' and policymakers' ability to understand and respond to influence operations, in terms of both proactive detection and forensic assessment. Efforts such as Social Science One and Facebook's recent decision to make its CrowdTangle analytics platform available to newsrooms and academic researchers have improved outside access, and yet much of the available data continues to provide insight primarily into engagement.[1] Engagement data can help researchers approximate how many people interacted with a particular piece of content or narrative, but it is not enough to answer important questions about what communities engaged with the content, whether a misinformation campaign changed the mind of a target, or whether or not a campaign increased polarization within a community or led people to believe or act on false information. That said, even though researchers might benefit from additional access, an offsetting factor is the significant privacy concerns associated with making certain types or quantities of user, community, or behavioral data available.

Multistakeholder cooperation offers a way forward. In an ideal scenario, we might envision a system in which a civil society organization or journalist flags content or accounts that seem anomalous. That anomalous content could be shared with a tech platform integrity team representative who has deep visibility into account activity on their platform. It could be shared with a quantitative social science researcher who has tools to assess how the content is being disseminated across platforms. If there are indications of foreign involvement, it might be shared with a relevant government actor who has additional insight into financial flows or other dynamics that might help unravel complex networks. Attribution of the operation would also be a collaborative effort. These far-reaching connections turn the process of detection and investigation into a multidisciplinary effort.

Such partnerships also may be useful from the standpoint of mitigating harmful effects of malign narratives. The tech platforms have visibility into affected communities. Civil society and fact-checking organizations trusted by those communities can spearhead the process of countering or correcting the narrative, or empathetically communicating to people that they have been misled. Governments might be involved in discussions about future deterrence if a foreign actor was implicated.

Efforts focused on mitigating the effects of misinformation and disinformation in the information ecosystem exist in some semi-organized capacities. Many others are informal and ad hoc.

Collaborative, jointly-owned efforts focused on mitigating the effects of misinformation and disinformation in the information ecosystem exist in some semi-organized capacities. Many others are informal and ad hoc. All those who are involved in these efforts should be working to remove barriers that prevent them from delivering their full potential value. In a 2019 whitepaper, *Securing American Elections: Prescriptions for Enhancing the Integrity and Independence of the 2020 U.S. Presidential Election and Beyond*, the Stanford Cyber Policy Center noted that one such initiative was the signing of the U.S. Cybersecurity Information Sharing Act (CISA) of 2015, which reduced legal barriers to sharing cybersecurity threat indicators.[2] The paper's authors offered a parallel suggestion that has yet to be implemented, but which democracies worldwide should consider as a means of significantly increasing access to data: legislatures should "establish a legal framework within which the metadata of disinformation actors can be shared in real-time between social media platforms, and removed disinformation content can be shared with academic researchers under reasonable privacy protections."[3] Additionally, to facilitate public-private information sharing, tech platforms should establish a coordinating body that enables the sharing of threat information between industry companies and can interface with appropriate government actors. One such model, used in dozens of other industries, is an ISAO (information sharing and analysis organization) or ISAC (information sharing and analysis center).[4]

Although early policy papers advocated collaboration and cooperation between actors focused on securing democratic elections, the COVID-19 pandemic has made it clear that misinformation and disinformation are broader in scope and global in impact. Influence operations are not going to cease; adversaries will not only continue to evolve but also continue to evade the legal, policy, and technical barriers put in place to stop them. Addressing this challenge necessitates a whole-of-society effort—it is time we worked to enable one.

Endnotes

1 "Social Science One," Institute for Quantitative Social Science, Harvard University, *https://socialscience.one/*; Naomi Shiffman, "CrowdTangle for Academics and Researchers," CrowdTangle, n.d., *https://help.crowdtangle.com/en/articles/4302208-crowdtangle-for-academics-and-researchers*.

2 Alex Stamos, Sergey Sanovich, Andrew Grotto, and Allison Berke, "Combatting State-Sponsored Disinformation Campaigns from State-aligned Actors," in Michael McFaul, ed., *Securing American Elections: Prescriptions for Enhancing the Integrity and Independence of the 2020 U.S. Presidential Election and Beyond* (Stanford, CA: Stanford Cyber Policy Center, 2019), 48–49, *https://fsi.stanford.edu/publication/securing-american-elections-prescriptions-enhancing-integrity-and-independence-2020-us*. For more on the affiliated event, see "Securing Our Cyber Future: Innovative Approaches to Digital Threats," Freeman Spogli Institute, Stanford University, 6 June 2019, *https://cyber.fsi.stanford.edu/securing-our-cyber-future*.

3 Stamos et al., "Combatting State-Sponsored Disinformation Campaigns from State-aligned Actors," 49.

4 Jaikumar Vijayan, "What is an ISAC or ISAO? How these cyber threat information sharing organizations improve security," CSO, 9 July 2019, *www.csoonline.com/article/3406505/what-is-an-isac-or-isao-how-these-cyber-threat-information-sharing-organizations-improve-security.html*.

Public Health, Big Tech, and Privacy

Squaring the Contact-Tracing Circle

By Mallory Knodel

Multistakeholder governance—the idea that the state, private sector, and civil society should jointly manage key public goods—has for many years been the lodestar of efforts to secure the internet's democratic future. But is this model a viable mechanism to address the challenges of a global pandemic?

To ensure the best possible response to this worldwide public health crisis, democratic governments should follow an informed, principled approach that strengthens public health infrastructure, minimizes private data collection, and is narrowly designed for the COVID-19 pandemic. The private sector should assist strong government leadership and support a public health vision, and civil society, technology, and health experts should advocate for technology development in the public interest.

In March 2020 alone, civil society, the private sector, and governments launched several noteworthy, joint public-health initiatives to respond to the COVID-19 crisis. The MIT Media Lab created the Private Kit: Safe Paths app with help from Harvard, Facebook, and Uber. Privacy International analyzed an early joint effort between a German tech startup and the Hannover School of Medicine. MTX Group Inc. announced it was working with the New York State Department of Health on New York–specific measures for the company's donated COVID monitoring app.[1] MIT's Bluetooth effort (PACT) is a strong example of an early tech-led joint effort: leadership of the project is shared among MIT institutions, the MGH Center for Global Health, and Harvard Medical School,[2] leading to the design of the now well-known Google/Apple exposure notification platform for contact tracing apps that rely on Bluetooth to indicate proximity of exposure. However, there is no question that digital technology and data collection have been and are being used to expand illiberal and authoritarian regimes of mass surveillance and oppression. When the COVID-19 pandemic presented an unprecedented opportunity for those regimes to expand, groups like the American Civil Liberties Union and the Center for Democracy and Technology sprang into action to develop principles for tech-assisted contact tracing and a task force on coronavirus data, respectively, among other advocacy efforts to ensure responsible technology use and data collection.[3]

As of the end of July 2020, 48 countries confirmed that they had deployed contact tracing or other coronavirus-related tracking apps. This information came from government or developer announcements, verifiable news sources, or published research collected by MIT.[4]

Not all of these tech products, however, have altruistic public health goals at the forefront of their response. Some trackers have an explicitly political aim. For example, an up-to-date database specifically documents the privacy concerns of 154 COVID-related apps available on the Google Play Store.[5] A helpful visualization, accompanied by a formal report, tracks surveillance and civil rights infringements linked to COVID-19 responses.[6]

Reviewing the Implications for Democracy and Human Rights

These technological responses and criticisms demonstrate both the demand for and the concerns associated with public health data collection platforms. Yet as the COVID-19 pandemic continues to affect nations worldwide, one key question appears: what are the rights implications of these responses?

First, there are concerns that the novel coronavirus may never be contained with a vaccine and therefore will pose a persistent threat to public health—in which case society may need to draw lessons from other containment and contact tracing scenarios, such as that used for individuals with HIV/AIDS.[7] Second, even before the pandemic the use of biometric data brought to light the need to contain the unique risks to privacy and individual liberty associated with such personal information being handed over for corporate use.[8] Although advocates ensured that the Google/Apple exposure notification system (in which Bluetooth is used to detect proximity and exposure data is stored locally on a user's device) was narrowly designed for use in the COVID-19 pandemic, those tech giants now have the sole power over whether, if ever, they will decommission the platform and refrain from repurposing it.[9] Other persistent risks not directly related to surveillance include a general sense of public fear, uncertainty, and distrust toward information technology, governments, personal electronic devices, and the media. It seems the crisis has not been wasted by the many ill actors looking to exploit collectively vulnerable societies.

Other persistent risks not directly related to surveillance include a general sense of public fear, uncertainty, and distrust toward information technology, governments, personal electronic devices, and the media.

Although most technology-assisted contact tracing applications originated in the private sector, many have been implemented and executed by governments. Of course, different government agencies bring different mandates, perspectives, and expertise to policy problems, and so the specific agencies involved are also relevant to the discussion: in the case of South Korea's quarantine monitoring app, it was developed by the Ministry of the Interior, not the Ministry of Health and Welfare.[10] In fact, most well-documented joint efforts at tech-enabled responses have been led by central or local governments, not by national health agencies. In March, the British government sought help from tech companies including Google, Palantir, Uber, Deliveroo, Amazon, Faculty AI, Microsoft, and Apple.[11] In the European Union, the European Commission called for help from telecom providers in March, requesting mobile location data (an alternative to Bluetooth proximity) for the purposes of COVID-19 response.[12] The U.S. government also had early conversations with its powerhouse technology sector in an effort to strengthen joint responses.[13]

Despite this outreach, there were early derailments. In the United States, for instance, the decentralized state-by-state approach posed a particular challenge to joint health and tech efforts, which may explain why tech-assisted contact tracing did not become widespread there.[14] In China, the AliPay Health Code app raised privacy concerns for sharing data with local authorities, creating trust issues among users whose authoritarian government gives them no obvious means to challenge the app's use or design.[15] The ways in which different governments approach partnerships and select companies with which to partner also have implications for privacy, democracy, and human rights. Partially as a result of these factors, in some cases technical design choices made by private sector partners have superseded those made by governments. Citizens are left to ask themselves: is it appropriate for unelected private corporations to control this kind of politically sensitive infrastructure?

On the whole, many of these technology-assisted efforts to track, monitor, and contain the pandemic have failed in their professed goals, yet governments nonetheless continue to encourage their use. Unsurprisingly, watchdog organizations continue to sound the alarm about data privacy concerns. Privacy International describes civil society concerns about Colombia's coronavirus information and identification app, developed and launched by the Colombian National Health Institute. Local civil society groups like Fundacion Karisma expressed strong concerns about the app's surveillance potential and accessibility.[16] Before debating any of the governance tradeoffs involved in technological interventions during the pandemic, one first must ask: have there been any successes? And what are the measures of that success? If the strengthening of public health infrastructure is the measure, there have been notable failures, undermined by a tug-of-war between national governments and private sector market power.[17]

In some ways, privacy issues are interconnected with larger questions about the accountability and ownership of these systems. In the case of the Google/Apple exposure notification system, many countries did not use their sovereign and regulatory powers to limit tech companies; they took the companies' word at face value.[18] Independent researchers came to the same conclusion. Researchers at Trinity College in Dublin recommended that the Google/Apple system have more oversight: "A governance setup that imposes a similar level of scrutiny over both the client app component and the Google/Apple component of the [system] seems sensible and necessary" owing to the risk of inadequate privacy protections by companies, which are already subject to criticism over privacy implications.[19]

The key principles for tech-enabled COVID-19 interventions advocated by civil society organizations... may well be fundamentally at odds with a government-administered infrastructure that can fully control a crisis.

Some observers have argued that preventing undue private sector influence on jointly governed initiatives will require "creating a complex institutional architecture" capable of scrutinizing technological applications and improving public technical literacy.[20] Indeed, there are increasing calls for privacy and public health experts, such as the Pan-European Privacy-Preserving Proximity Tracing proposal, to work together to ensure proper rollout and continued oversight of public health technology.[21]

Toward a More Perfect MultiStakeholder Approach

The key principles for tech-enabled COVID-19 interventions advocated by civil society organizations—that they be, among other things, voluntary, nonpunitive, private, nondiscriminatory, and decentralized—may well be fundamentally at odds with a government-administered infrastructure that can fully control a crisis.[22] If this is the case, who should navigate the necessary tradeoffs? The answer cannot be one sector alone. The response must cooperative, collaborative, and jointly managed.

What are the obvious worst things to avoid when designing multistakeholder initiatives for technological challenges? Certainly, joint governance can complicate coordination and interoperability.[23] But the most serious issue to avoid is the potential to create a façade of accountability, one which gives the appearance of appropriate oversight while in effect allowing relatively free reign.[24] Many multistakeholder responses fail to demonstrate appropriate levels of transparency. No matter how useful these responses might be, they are

liable to undermine inclusivity, diminish the space for civil society consultation, exacerbate existing inequalities (such as gender discrimination), and potentially undermine public trust in the public health response.[25]

In sum, and for the longer term, better governed tech-assisted solutions to public health crises can improve the confidence of governments in their ability to respond and help check private sector motivations that are not aligned with the public interest. This essay has largely focused on countries with the best-case political climates, but further research is needed on outcomes and trends in nondemocratic countries and in the Global South. Another area for future research is the ways in which technological governance may have accelerated illiberal trends within democracies through a climate of digital inequality, disinformation, mass surveillance, and cybersecurity threats. These and other perspectives will require continued attention as the COVID-19 pandemic continues to have deleterious effects on individuals, communities, and nations around the world.

Endnotes

1 Will Douglas Heaven, "A New App Would Say If You've Crossed Paths with Someone Who Is Infected," *MIT Technology Review*, 17 March 2020, www.technologyreview.com/2020/03/17/905257/coronavirus-infection-tests-app-pandemic-location-privacy; "Germany: Geotracking Startup Working with the Hannover School of Medicine on a Data Analysis Platform," Privacy International, 11 March 2020, http://privacyinternational.org/examples/3437/germany-geotracking-startup-working-hannover-school-medicine-data-analysis-platform; Brandi Addison, "Frisco Technology Company Donates Its Disease-Monitoring App to all U.S. Public Schools," *Dallas News*, 13 March 2020, www.dallasnews.com/news/public-health/2020/03/11/frisco-technology-company-has-launched-a-disease-monitoring-app-for-coronavirus-cases.

2 For the leadership and mission statement of this project, see: R. L. Rivest et al., "PACT: Private Automated Contact Tracing Mission and Approach," Massachusetts Institute of Technology (MIT), 19 May 2020, https://pact.mit.edu/wp-content/uploads/2020/05/PACT-Mission-and-Approach-2020-05-19-.pdf.

3 Daniel Kahn Gillmor, *Principles for Technology-Assisted Contact-Tracing*, American Civil Liberties Union, 16 April 2020, www.aclu.org/report/aclu-white-paper-principles-technology-assisted-contact-tracing; Greg Nojeim, "CDT Statement and Announcement of Coronavirus: Data for Life and Liberty Task Force Formation," Center for Democracy & Technology, 30 April 2020, https://cdt.org/insights/cdt-statement-and-announcement-of-coronavirus-data-for-life-and-liberty-task-force-formation.

4 Patrick Howell O'Neill, Tate Ryan-Mosley, and Bobbie Johnson, "A flood of coronavirus apps are tracking us. Now it's time to keep track of them," *MIT Technology Review*, 7 May 2020, www.technologyreview.com/2020/05/07/1000961/launching-mittr-covid-tracing-tracker.

5 "COVID-19 App Tracker," retrieved 29 September 2020, https://covid19apptracker.org.

6 "Limitations on Digital Rights and Civic Freedoms in a Pandemic," Pandemic Big Brother, retrieved 30 September 2020, https://pandemicbigbrother.online/static/core/files/Report_Pandemic_Big_Brother.pdf.

7 Rose Saxe, "Contact Tracing and COVID-19: Lessons From HIV," American Civil Liberties Union, 15 May 2020, www.aclu.org/news/hiv/contact-tracing-and-covid-19-lessons-from-hiv.

8 Tanya O'Carroll, "The Pandemic Could Obliterate a Last Frontier in Our Privacy: Our Biological Selves," *Newsweek*, 14 July 2020, www.newsweek.com/biological-privacy-big-tech-tracing-coronavirus-1517576.

9 Andy Greenberg, "How Apple and Google Are Enabling Covid-19 Contact-Tracing," *Wired*, 10 April 2020, www.wired.com/story/apple-google-bluetooth-contact-tracing-covid-19.

10 Max S. Kim, "South Korea Is Watching Quarantined Citizens with a Smartphone App," *MIT Technology Review*, 6 March 2020, www.technologyreview.com/2020/03/06/905459/coronavirus-south-korea-smartphone-app-quarantine.

11 Jim Waterson, "Boris Johnson Urges Top UK Tech Firms to Join Coronavirus Fight," *The Guardian*, 13 March 2020, www.theguardian.com/business/2020/mar/13/johnson-urges-top-uk-tech-firms-to-join-coronavirus-fight.

12 Mark Scott, Laurens Cerulus, and Laura Kayali, "Commission Tells Carriers to Hand Over Mobile Data in Coronavirus Fight," *Politico*, 25 March 2020, www.politico.eu/article/european-commission-mobile-phone-data-thierry-breton-coronavirus-covid19.

13 Tony Romm, Elizabeth Dwoskin, and Craig Timberg, "U.S. Government, Tech Industry Discussing Ways to Use Smartphone Location Data to Combat Coronavirus," *Washington Post*, 18 March 2020, www.washingtonpost.com/technology/2020/03/17/white-house-location-data-coronavirus.

14 Gregory Barber and Will Knight, "Why Contact-Tracing Apps Haven't Slowed Covid-19 in the US," *Wired*, 8 September 2020, www.wired.com/story/why-contact-tracing-apps-not-slowed-covid-us.

15 Paul Mozur, Raymond Zhong, and Aaron Krolik, "In Coronavirus Fight, China Gives Citizens a Color Code, With Red Flags," *New York Times*, 7 August 2020, www.nytimes.com/2020/03/01/business/china-coronavirus-surveillance.htm.

16 "Colombia: Coronapp Fails at Public Information Purpose," Privacy International, 9 March 2020, http://privacyinternational.org/examples/3435/colombia-coronapp-fails-public-information-purpose.

17 Michael Veale, "Privacy Is Not the Problem with the Apple-Google Contact-Tracing Toolkit," *The Guardian*, 1 July 2020, www.theguardian.com/commentisfree/2020/jul/01/apple-google-contact-tracing-app-tech-giant-digital-rights.

18 Casey Newton, "Why Countries Keep Bowing to Apple and Google's Contact Tracing App Requirements," *The Verge*, 8 May 2020, www.theverge.com/interface/2020/5/8/21250744/apple-google-contact-tracing-england-germany-exposure-notification-india-privacy; Veale, "Privacy Is Not the Problem."

19 Douglas J. Leith and Stephen Farrell, "Contact Tracing App Privacy: What Data Is Shared By Europe's GAEN Contact Tracing Apps," Trinity College Dublin, 18 July 2020, www.scss.tcd.ie/Doug.Leith/pubs/contact_tracing_app_traffic.pdf.

20 Maria Savona, "The Saga of the Covid-19 Contact Tracing Apps: Lessons for Data Governance," SWPS 2020-10, 7 July 2020, https://doi.org/10.2139/ssrn.3645073.

21 Carrie DeCell, "Can Governments Track the Pandemic and Still Protect Privacy?," Just Security, 6 April 2020, www.justsecurity.org/69549/can-governments-track-the-pandemic-and-still-protect-privacy.

22 "ACLU Issues Governance Principles for COVID-19 Contact Tracing Technologies," American Civil Liberties Union, 18 May 2020, www.aclu.org/press-releases/aclu-issues-governance-principles-covid-19-contact-tracing-technologies.

23 Jens-Henrik Jeppesen and Pasquale Esposito, "COVID-19: European Data Collection and Contact Tracing Measures," Center for Democracy & Technology, 29 April 2020, https://cdt.org/insights/covid-19-european-data-collection-and-contact-tracing-measures.

24 "COVID-19 Rapid Evidence Review: Exit through the App Store?," Ada Lovelace Institute, 20 April 2020, www.adalovelaceinstitute.org/wp-content/uploads/2020/04/Ada-Lovelace-Institute-Rapid-Evidence-Review-Exit-through-the-App-Store-April-2020-2.pdf.

25 Dheepa Rajan et al., "Governance of the Covid-19 Response: A Call for More Inclusive and Transparent Decision-making," *BMJ Global Health* 5, no. 5 (5 May 2020), e002655, https://doi.org/10.1136/bmjgh-2020-002655.

About the Authors

Dapo Olorunyomi is the publisher, CEO, and co-founder of *Premium Times*, one of the most trusted newspapers in Nigeria. He has been called the "godfather" of online journalism in Nigeria. Olorunyomi's work during the years of military dictatorship in Nigeria earned him much recognition, including the 1995 International Editor of the Year Award of the *World Press Review* and the 1996 PEN Freedom to Write Award. Follow him on Twitter *@DapsyOly*.

Vladimir Rouvinski is an associate professor of Political Studies at Icesi University in Cali, Colombia. There, he also serves as Director of the Laboratory of Politics and International Relations (PoInt). He does research in international relations, political communication, and history. Rouvinski specializes in Latin American relations with Russia and Asian Countries. Follow him on Twitter *@rouvinski*.

Andrea Kendall-Taylor is a senior fellow and director of the Transatlantic Security Program at the Center for a New American Security (CNAS). She works on national security challenges facing the United States and Europe, focusing on Russia, authoritarianism and threats to democracy, and the state of the transatlantic alliance. Prior to joining CNAS, Kendall-Taylor served for eight years as a senior intelligence officer. From 2015 to 2018, she was deputy national intelligence officer for Russia and Eurasia at the National Intelligence Council in the Office of the Director of National Intelligence. Follow her on Twitter *@AKendallTaylor*.

Will Moy is founder and CEO of Full Fact, the UK's independent fact-checking charity. He has served on advisory groups for the UK's Economic and Social Research Council (ESRC), Ofcom, and the Pew Charitable Trusts, and regularly gives evidence to select committees and other inquiries. Follow him on Twitter *@puzzlesthewill*.

Joan Donovan is the research director of the Shorenstein Center on Media, Politics and Public Policy at the Harvard Kennedy School. She is also the director of the Technology and Social Change Research Project (TaSC)at the Shorenstein Center. She leads the field in examining internet and technology studies, online extremism, media manipulation, and disinformation campaigns. Prior to joining Harvard Kennedy School, Donovan was the research lead for Data & Society's Media Manipulation Initiative, where she led a large team of researchers studying efforts to manipulate sociotechnical systems for political gain. Follow her on Twitter *@BostonJoan*.

Renée DiResta is the research manager at the Stanford Internet Observatory, a cross-disciplinary program of research, teaching and policy engagement for the study of abuse in current information technologies. DiResta researches the dynamics of influence operations executed across social and media networks. She has advised Congress, the State Department, and other academic, civic, and business organizations, and has studied disinformation and computational propaganda in the context of pseudoscience conspiracies, terrorism, and state-sponsored information warfare. Follow her on twitter *@noupside*.

Mallory Knodel is the Center for Democracy and Technology's (CDT) chief technology officer. She is also the co-chair of the Human Rights and Protocol Considerations research group of the Internet Research Task Force and an advisor to the Freedom Online Coalition. Knodel takes a human rights, people-centered approach to technology implementation and cybersecurity policy advocacy. Follow her on Twitter *@MalloryKnodel*.

About the Editor

Dean Jackson is a program officer at the International Forum for Democratic Studies, a center for research and analysis at the National Endowment for Democracy. Since joining the Forum in 2013, he has specialized in disinformation and media manipulation as they affect democratic and media freedom around the world. Prior to his time at the Endowment, Jackson worked in external relations at the Atlantic Council. He holds an MA in international relations from the University of Chicago and a BA in political science from Wright State University in Dayton, OH. Follow him on Twitter *@DWJ88*.

Acknowledgements

The editor appreciates the contributions of the authors whose insights are featured in this collection, as well as the editorial support provided by Shannon Granville. Thanks are also owed to the many staff at the National Endowment for Democracy who recommended participants for the workshops which led to this collection.

The editor also appreciates the efforts of the International Forum's leadership and staff, including Shanthi Kalathil, Christopher Walker, Kevin Sheives, Melissa Aten, Jessica Ludwig, Rachelle Faust, Ryan Arick, Lily Sabol, Ariane Gottlieb, Agustina Palencia, and William Jernigan, all of whom played important roles in the workshops which led to these essays and the process of bringing them to publication.

About the International Forum for Democratic Studies

The International Forum for Democratic Studies at the National Endowment for Democracy (NED) is a leading center for analysis and discussion of the theory and practice of democracy around the world. The Forum complements NED's core mission—assisting civil society groups abroad in their efforts to foster and strengthen democracy—by linking the academic community with activists from across the globe. Through its multifaceted activities, the Forum responds to challenges facing countries around the world by analyzing opportunities for democratic transition, reform, and consolidation. The Forum pursues its goals through several interrelated initiatives: publishing the Journal of Democracy, the world's leading publication on the theory and practice of democracy; hosting fellowship programs for international democracy activists, journalists, and scholars; coordinating a global network of think tanks; and undertaking a diverse range of analytical initiatives to explore critical themes relating to democratic development.

About the National Endowment for Democracy

The National Endowment for Democracy (NED) is a private, nonprofit foundation dedicated to the growth and strengthening of democratic institutions around the world. Each year, NED makes more than 1,700 grants to support the projects of non-governmental groups abroad who are working for democratic goals in more than ninety countries. Since its founding in 1983, the Endowment has remained on the leading edge of democratic struggles everywhere, while evolving into a multifaceted institution that is a hub of activity, resources, and intellectual exchange for activists, practitioners, and scholars of democracy the world over.

NED
National Endowment for Democracy
Supporting freedom around the world

forum
International Forum for Democratic Studies