



**Article title:** Reflections on Trust and Covid 19: Do Politics, Medicine and the Environment need each other?

**Authors:** Alistair Cole[1], Frederic Dutheil[2], Julien S. Baker[3]

**Affiliations:** Professor of Political Science and Head of the Department of Government and International Studies, Hong Kong Baptist University, Hong Kong[1], Professor in Medicine and Head of “Preventive and Occupational Medicine” at the University Hospital of Clermont-Ferrand (CHU), France[2], Professor and Head of the Department of Sport, Physical Education and Health, Hong Kong Baptist University, Kowloon Tong, Hong Kong.[3]

**Orcid ids:** 0000-0002-9222-0523[1], 0000-0002-1468-6029[2], 0000-0001-7550-8616[3]

**Contact e-mail:** alistaircole@hkbu.edu.hk

**License information:** This is an open access article distributed under the terms of the Creative Commons Attribution License (CC BY) 4.0 <https://creativecommons.org/licenses/by/4.0/>, which permits unrestricted use, distribution and reproduction in any medium, provided the original author and source are credited.

**Preprint statement:** This article is a preprint and has not been peer-reviewed, under consideration and submitted to UCL Open: Environment Preprint for open peer review.

**DOI:** 10.14324/111.444/000046.v1

**Preprint first posted online:** 24 June 2020

**Keywords:** Trust , environment, medical and social science, international comparison , transdisciplinarity, Covid 19 , political science, Policy and law

## **Reflections on Trust and Covid 19: Do Politics, Medicine and the Environment need each other?**

### *Cover Letter*

*This short article stems from an original collaboration between a comparative political scientist (Prof A. Cole, Head of the Government and International Studies department at Hong Kong Baptist University), a Professor in Medicine and Head of “Preventive and Occupational Medicine” at the University Hospital of Clermont-Ferrand, France (Prof F. Dutheil) and a colleague specialising in physiology and psychophysiology (Prof J. Baker, Head of the Department of Sport, Physical Education and Health, Hong Kong Baptist University).*

*The article is centred on the question of whether Covid 19 represents a crisis of trust. Common understandings of trust are mapped out across disciplinary boundaries and we discuss how these might be applied to cognate fields in the medical and social sciences. Comparison across academic disciplines and experiences drawn from country experiences allows general propositions to be formulated for further exploration. International health crises require efforts to rebuild trust, understood in a multi-disciplinary sense as a relationship based on trusteeship, in the sense of mutual obligations in a global commons, where trust is a key public good.*

*The added value of this short article is that it engages in a trans-national and trans-disciplinary exercise in reflexivity around the Covid 19 pandemic. In the spirit of Science Open, it combines*

*reflexive comparison and pathways for a better understanding between the medical and social sciences.*

Scientists and Politicians sometimes seem to inhabit very different worlds. The Covid 19 Pandemic provides numerous examples of this. There is, at the least, a Politics-Science temporal misfit: the true value of science, requiring rigorous testing, makes the search for a vaccine predictably a slow process, one not in the same time-frame as that required by the political management of the crisis, requiring 'fast' solutions. This special issue is concerned more generally with the social implications of the pandemic and the environmental changes connected to it. Continuing the analysis, the environmental temporality might be interpreted as a long-term tragedy, in the Shakespearian sense of a visible, impending and relentless movement. Or, alternatively, as a more heroic enterprise of rising collective consciousness of the necessity to act in time to avoid catastrophe and preserve the global commons. The evidence provided by the Covid pandemic is ambivalent, however, open to dual readings, so much so that it is unwise to edict clear causal relationships.

There are overwhelming common interests in agreeing on the terms of reference. From a comparative politics perspective, Covid 19 provides a vast living dataset to engage in multi-level comparisons and real-time experiments. In the medical research field, the pandemic has provided advances in medical science that would not have been possible without access to a living laboratory. Science has occupied centre stage and forms part of the struggle of narratives between countries and regions. From liberal democratic countries such as the UK and France to semi-authoritarian regimes such as Singapore, governments have justified decisions on the basis of the 'scientific evidence'. True, politicians might have been selective in their treatment of the science,

or have sought principally to avoid blame by co-opting scientists. The Covid 19 pandemic also demonstrates the contested nature of medical knowledge: as testified by the controversies over hydroxychloroquine or contrasting containment strategies (herd immunity against lockdown). In the absence of an effective global commons, moreover, the crisis reveals the barriers to the functioning of a global medical epistemic community, free to exchange in the interests of scientific discovery. Health professionals have been in the forefront of the fight against Covid 19, but as the case of China in particular suggests, they are not always free to tell the truth (Cabestan, 2020).

Referring to the global commons provides the best entry point for linking analysis of Covid 19 with the environment. Of course, the deep concern about the future of the planet precedes Covid 19. The Paris climate treaty (COP 21) of 2015 represented a highlight of international collective action to fight global warming. But the decision by the US administration to withdraw from the Paris agreement (along with a host of other international organisation and agreements) was a harbinger of future trends in the troubled Trump presidency. The Covid 19 crisis – or the Wuhan epidemic described by Trump- demonstrates the deep mistrust between the key global actors whose cooperation is needed to fight the battle to preserve the planet. Hence the difficulty of imputing clear causal effects to the Covid 19 and its impact on the environment. Rather paradoxically, the short-term impact of Covid 19 would appear rather beneficial to the environment: Co2 emissions were down in all the major urban centres as a result of industrial shutdowns and the lack of travel mobility (whether individual or collective) (Lombrana & Warren, 2020; Zambrano-Monserrate *et al.*, 2020). But the longer-term implications of de-coupling, one probable consequence of Covid 19, are potentially extremely damaging, even existential.

Responding to existential dilemmas, the Covid 19 pandemic calls for a major transdisciplinary research effort that necessarily combines several levels of empirical analysis and bridges distinct academic and scientific traditions. This short article is centered around the question of whether Covid 19 represents, *inter alia*, a crisis of trust, one theme that successfully travels between the social and medical sciences. Health scandals, such as mad cow disease in the UK or the tainted blood scandal in France, have a particular place in the interface between citizens and their trust in politics and the health and related professions (Lanska, 1998). Politicians and medical scientists also share common interests, not least in correctly diagnosing health crises and conceptualizing the role of trust therein.

Literature from political science, especially relating to the three levels of trust of Zmerli and Hooghe (2011), allows a fairly precise operationalisation. Trust needs to be understood as a generic term to describe dynamics taking place at different levels of analysis: interpersonal, social and collective. Medical and social science rely on theorising at three main levels of analysis: individual, intermediate and institutional. Each type of analysis carries a distinctive contribution and the stakes of each are high; psychological wellbeing, civil society and trust in government. In medical and political circles, there is an enormous leap from individual-level analysis, through socially mediated forms of trust and onto the headline events such as the crisis of trust in the US health system identified by Sisk and Baker (2019). In terms of comprehension, trust does not necessarily gain from moving between these levels of analysis in an indiscriminate manner, but substantive distinctions are important.

*Inter-personal trust* provides the first level of analysis. In their ‘Trust, Confidence and Cooperation’ model, Earle and Siegrist (2008) distinguish between trust and confidence. Trust is defined as the willingness to make oneself vulnerable to another based on a judgement of similarity of intentions or values. It involves an inter-personal relationship, with at least two players, as in a clinical-patient relationship. Confidence is defined as the belief based on past experience or evidence that certain events will occur as expected. Both trust and confidence influence people’s willingness to cooperate. In terms of both trust and confidence, the individual level is key, because individual perceptions of risk are germane to the adoption of preventive measures (Khosravi, 2020).

In another close formulation ‘particular social trust’ involves those known to us personally, such as family, friends or work colleagues. A breakdown of trust shatters this psychological equilibrium. Cross-national evidence from lockdowns and confinements illuminates the challenged state of psychological well-being of individuals, especially in terms of their primary networks (friends, family) and practices (as a result of social distancing). Even within these tight personal networks, evidence from scholars working on psychological indicators points to an increase in indicators of social tension, such as divorce, gender violence and isolation as a result of the Covid 19 crisis (Boserup et al., 2020). Increases in social violence and violation by communities in relation to social distancing measures are major concerns in relation to public perceptions and information provided by respective governments and their representatives.

There is an environmental dimension to this. Social capital is literally excluded as a result of lockdown and travel restrictions (creating a lasting impact on the travel industry and on individual mobility patterns, all contributory factors to broader environmental effects). But society has not collapsed. Even where confinement was harsh, as in Italy, Spain and France, the strength of civil ties allowed the crisis to be weathered. The short-term impact of Covid 19 is one of lessening consumption, the counterpart of restraints on freedom and mobility, and a calling into question of the legitimacy of individual-level preferences in terms of mobility. How long such mechanisms can last in market economies remains to be seen. The trust dimensions intervene at two main levels: trust in government and governmental advice and trust in scientific expertise. Effectively confronting a pandemic requires the active collaboration of individuals and civil society.

*Social or collective trust* is the second level of analysis. ‘General social trust’ is that placed in ‘unknown others’. This form of trust performs a key function in modern societies, as Newton (2007: 349) notes, because ‘much social interaction is between people who neither know one another nor share a common social background.’ In relation to Covid 19, the ability to empathize with members of an imagined community (region, nation, even continent) is a core element of community integration. How civil society has reacted to the pandemic is a matter of empirical investigation, but society has not collapsed. Even where confinement was harsh, as in Italy, Spain and France, the strength of civil ties allowed the crisis to be weathered. Public participation is central to the success of adopting preventive measures, including in respecting governmental advice in relation to social distancing, limiting travel, and so on. Insofar as Covid 19 limits social interaction and contact, it probably carries with it certain short-term benefits— such as lessening emissions, improved air and water quality. But does it also represent a long-term cognitive shift?

Such an analysis depends upon how citizens place their trust in government, our third dimension; this has performed a major role during the pandemic by affecting the public's judgements about risks and related benefits (Khosravi, 2020). From a psychological perspective, Bish and Mishie (2020) argue that trust in government is a key variable affecting individual behavior faced with pandemics; the more consistent the message, the more likely it is to influence behavior. Misinformation and lack of action in the early stages by governments has led to an apathetical approach by communities and a feeling of identity immunity. Citing studies of various countries, Siegrist and Zingg (2013: 25) suggest that 'trust had a positive impact on adopting precautionary behavior during a pandemic'. Trust in government is important; even more central is trust *and* confidence in experts. During pandemics, most people are not in a position to evaluate the information about the risks and benefits associated with vaccination. Therefore, they rely on experts, especially on those experts they trust, who are once removed from government. This finding was backed by van der Weerd et al. (2011) in their study of the H1N1 flu pandemic in the Netherlands. From these various studies, clear consistent ethical guidelines are called for by the medical community (Huxtable, 2020).

Governmental policy towards individual and collective mobility (transport) has included at least as much *fudge* as *nudge*. Governments have certainly attempted to persuade (nudge) their populations to exercise social control, sometimes using the threat of fines for transgression. But they have also fudged the issue, sending mixed messages, for instance in the case of air transport in the UK, where the border was open until June 2020 against most interpretations of sound logic, only to be closed when other countries began to open their own borders. Contrasting responses do not simply relate



to types of government. This issue is not a simple one of distinction between types of polity, for example federal versus unitary systems: while the US and Brazilian federations descended into partisan-based rivalries between states, federal Germany demonstrated one of the most joined-up responses to the pandemic.

*At the international level*, mistrust is one dimension of the ongoing great power rivalry between the United States and China, with Europe in the main a perplexed and wounded by-stander. Controversy over the provenance of the Pandemic- and the appropriate description of it – is an intervening variable of the increasingly bitter global contest between China and the US – and Xi Jinping and Trump in particular. Mistrust is inherent in Realist framings of the international system, but Covid 19 has acted as a step-change in the deterioration of Sino-American relations. The environment might well be one victim of the growing mistrust within global institutions. There is a real danger of ‘decoupling’, of Asia and America inhabiting different spheres of existence. The difficult governance of international organisations - such as the World Health Organisations, quit by the US in the midst of the Covid 19 pandemic – stems in part from suspicion of Chinese influence. There is, in this sense, a direct link between the pandemic and the weakening of multi-lateral institutions. However, there are also difficulties of interpretation: does Covid 19 symbolically represent a brutal stop to globalization? Or is it too early to tell?

The level only describes one part of the dynamic. Adapted to medical ethics, for example, practitioner and client relationships span elements of inter-personal and intermediate trust. The appropriate relationship is prescribed and described in medical ethics (with trust as a form of

confidential relationship, absolutely secretive, in no sense negotiated with a third party) and regulated by strict professional and ethical standards. Here, the medical relationship is stronger than even the tightest form of inter-personal political relationship. Nonetheless, Covid 19 challenges interpersonal trust in a novel manner; traditional consultative practices are changing (E.Medecine), while the competition for scarce resources has ensured that Covid 19 eclipses more traditional treatments (for example, the postponing of cancer operations).

The key analytical point is that, in the medical sphere as in the political one, discussion centres on the linkages between individual, intermediary and organisational levels of analysis. The Covid 19 pandemic has focused attention on the need to strengthen the links between patients, health care teams and organisations. From the relevant literature, we learn that the most effective responses in a pandemic are joined up ones, where individuals (responsible for following guidelines) trust intermediaries (health professionals) and are receptive to messages (nudges) from the relevant governmental authorities. Hence, the distinction between hard medical and soft social science blurs when patients/citizens are required to be active participants in combatting the virus.

Politics and Medicine can learn from each other. Levels of trust are most effective when combined. In terms of trust, individual responses and reactions, social mediation and governmental responses need to complement each other. In a pandemic, governments need to persuade individuals to adapt their behaviors, and such persuasion will be all the more convincing in that it is nested in social networks. Here, reverting to the advice of psychologists and medical scientists assumes its own coherence. Clear and consistent legitimizing discourses are, almost by definition, most difficult to

sustain in a crisis, the political equivalent of Schumpeter's creative destruction. However, trust in government requires consistent (benevolent, performative and joined-up) explanations. The evidence drawn from the medical and social science perspectives goes in the same direction.

The three-level analysis is equally appropriate in the field of the environment. Individual level behaviour lies at the very heart of environmental challenge, but this takes place within the bounds of social acceptability – at least in pluralistic, liberal democratic societies. Governments need to provide accessible information, not in terms of information overload, but clear consistent guidelines. Evidence – from Trump, Macron or Johnson, for example– suggests that contradictory information is associated with reduced public trust. Global governance is more than ever necessary to rise to the environmental challenge – but possibly the main victim of the geo-political consequences of the Covid 19 crisis.

## References

Bish, A., & Michie, S. (2010). Demographic and attitudinal determinants of protective behaviours during a pandemic: a review. *British Journal of Health Psychology*, 15 (4), 797-824. <https://doi.org/10.1348/135910710X485826>

Boserup, B., McKenney, M., & Elkbuli, A. (2020). Alarming trends in US domestic violence during the COVID-19 pandemic. *The American Journal of Emergency Medicine*, <https://doi.org/10.1016/j.ajem.2020.04.077> [Epub ahead of print].

Cabestan, J.-P. (2020, May 21). *The Chinese political landscape in the shadow of the Covid 19 crisis*. HKBU Research. <https://research.hkbu.edu.hk/event/the-covid-19-seminar-series-perspectives-from-government-and-international-studies>

Earle, T., & Siegrist, M. (2008). Trust, Confidence and Cooperation model: a framework for understanding the relation between trust and Risk Perception. *International Journal Global Environmental Issues*, 8(1/2), 17-29. <https://doi.org/10.1504/IJGENVI.2008.017257>

Huxtable, R. (2020). Covid-19: where is the national ethical guidance? *BMC Medical Ethics*, 21(32). <https://doi.org/10.1186/s12910-020-00478-2>

Khosravi, M. (2020). Perceived risk of Covid-19 Pandemic: the Role of Public Worry and Trust. *Electronic Journal of General Medicine*, 17(4), Article Number: em203. <https://doi.org/10.29333/ejgm/7856>

Lanska, J. D. (1998). The Mad Cow Problem in the UK: Risk Perceptions, Risk Management, and Health Policy Development. *Journal of Public Health Policy*, 19, 160-183. <https://doi.org/10.2307/3343296>

Lombrana, M. L., & Warren, H. (2020). A Pandemic That Cleared Skies and Halted Cities Isn't Slowing Global Warming. *Bloomberg Green*. May 8, 2020. <https://www.bloomberg.com/graphics/2020-how-coronavirus-impacts-climate-change/>

Newton, K. (2007). Social and Political Trust. In R. J. Dalton & H. Klingemann (Eds.), *The Oxford Handbook of Political Behaviour*. (pp. 342-361). Oxford University Press.

Siegrist M., & Zingg A. (2013). The role of public trust during pandemics. *European Psychologist*. 19(1), 23-32. <https://doi.org/10.1027/1016-9040/a000169>

Sisk, B., & Baker, J. N. (2019). A Model of Interpersonal Trust, Credibility, and Relationship Maintenance. *Pediatrics*, 144(6), e20191319. <https://doi.org/10.1542/peds.2019-1319>

Van der Weerd, W., Timmermans, D. R., Beaujean, D. J., Oudhoff, J., & van Steenbergen, J. E., (2011). Monitoring the level of government trust, risk perception and intention of the general public to adopt protective measures during the influenza A (H1N1) pandemic in the Netherlands. *BMC public health*, 11(575). <https://doi.org/10.1186/1471-2458-11-575>

Zambrano-Monserrate, A. M., Ruano, M. A., & Sanchez-Alcalde, L. (2020). Indirect effects of COVID-19 on the environment. *Science of the Total Environment*, 728, 138813. <https://doi.org/10.1016/j.scitotenv.2020.138813>

Zmerli S, Newton K. Three types of Trust and their association. *European Political Science Review*. 2011; 3 (2), 169-200.

**Acknowledgement:** This article acknowledges the financial and logistical support of Hong Kong Baptist University

**Conflict of Interest:** The authors report no conflicts of interest

**Funding:** The corresponding author acknowledges, and is grateful for the financial support of Hong Kong Baptist University, Research Committee, Initiation Grant - Faculty Niche Research Areas (IG-FNRA) 2019/20