Alternative Risk: A Diagnostic and Canadian Anti-Vaccine Case Study

by

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Author's Declaration

I hereby declare that I am the sole author of this thesis. This is a true copy of the thesis, including any required final revisions, as accepted by my examiners.

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Abstract

This thesis builds on a growing body of interdisciplinary risk scholarship that is taking place across the humanities and sciences. It combines Ulrich Beck's sociological concept of "risk society", legal scholar Dayna Nadine Scott's "risk frame" as a Foucauldian "governmentality" and the techniques of the professional writing discipline of "risk communication" with multi-modal rhetorical analysis to show that "risk" is more than a deliberative discussion of statistics and probabilities: it is a multi-dimensional form of argument that has become a *topos*, or persuasive "place," in our social discourse, one where we find arguments about preventing catastrophe … or where we find arguments for all kinds of other purposes. I argue that this complex rhetorical practice is vulnerable to capture by "alternative risk": risk communications that adopt the conceptual and formal features of risk discourse to exploit their audience's risk anxieties. In a context of increasing concern about the volume and impact of disinformation, the concept of "alternative risk" offers a framework for diagnosing patterns and structures of disinformation, which I apply in a Canadian anti-vaccine case study, *Stop the Shots in Kids*. Mapping this anti-COVID vaccine campaign to the "alternative risk" framework reveals (1) how it uses the stylistic and conceptual features of risk communication alongside rhetorical strategies characteristic of the "alt-right" to advance conspiracy theories and other forms of mis- and dis-information in a manner that makes them difficult to distinguish from legitimate COVID-19 risk communications, and (2) how it uses the risk of vaccination as a "place" to argue about COVID-19 restrictions, mitigation practices such as masking, and the trustworthiness of government and other institutions. The case study, and the other examples included in

this thesis highlight that alternative risk is not a “fringe minority” issue, but something of mainstream and ongoing importance in our daily lives.

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Introduction

Risk is everywhere.

Every day we are surrounded by risks from our surroundings, our foods, our choices, and even our thoughts. At any given moment, we might suffer a life-altering accident, lose our life savings in a stock market "correction," or ingest, inhale or apply a carcinogen. Some of these risks are things we face unwittingly; but we also spend a significant amount of energy trying to comprehend and manage them. Writing and scholarship on risk is prolific: a Google search for the phrase "risk of" returns nearly 9 billion results, and a Google Scholar search for the term "risk" returns 6,720,000 results.[1] Looking on the bright side, one might argue that this reflects a healthy, if slightly fixated, interest in survival on the part of the human species. But looking at the issue from a critical perspective has led scholars to ask, When did life get so risky? Sociologist Ulrich Beck observes that this proliferation of risk is a condition of the modern world, and that we are living in a "risk society." Whereas in the past risks were caused mainly by natural events (ice storms, snake bites, etc.), modern risks result from the success of modern technology (nuclear waste, car accidents, etc.). Further, because risks "are not synonymous with catastrophe" but instead are the "*anticipation* of the catastrophe", they are given presence indexically or symbolically, through *"staging"* (Beck, p. 10). Natural events "stage" their own risks to a certain extent: we can easily see dark clouds in the

[1] I provide these numbers to roughly indicate the scope of risk talk; "Google Search Result" numbers are neither static nor precise.

sky and feel the changes in wind and temperature that signal a potential storm. But Beck argues that modern risks cannot be perceived by our senses, which requires us to stage, or symbolically create, "the presence of future catastrophes" (Ibid.). Staging is accomplished by means of rhetoric: government and scientific communications are delivered via media to the general public. For example, in *World at Risk*, he explains how the risk of terrorism is staged by "global media event[s]" (p. 72) providing coverage of attacks, analysis, and stories of attacks that did not happen because they were prevented by law enforcement (p. 1). He also explains how the risk of climate change is staged through activism, scientific scholarship, and politics, specifically noting Al Gore's *An Inconvenient Truth* (p. 72).

Like all communicative acts, staging is mediated by power relations that dictate who has the authority to decide the parameters of the risks and the means through which they might be managed. This creates a *sub-politics* wherein the dominant definitions of a risk are contested and negotiated, sometimes through counter-stagings. In Beck's view, sub-politics is inevitable in a risk society because the notion of authority and expertise are complicated by the fact that many modern risks are the result of actions by "experts." For example, the risks of nuclear disaster result from the success of nuclear science, and the management of those risks is then handled by nuclear scientists. Beck calls this a state of "reflexive modernization" (*World at Risk*, p. 55).

This reflexive implication partly helps us understand why contested definitions of risk have proliferated worldwide in recent years. In Canada, as in the rest of the world, these discourses have been complicated by social media that affords rapid, widespread circulation of communication and simultaneous algorithmic curation or "siloing" (Kakutani, 117). As noted by Kinsella, and extended by Endres, public

expertise can make important epistemological and argumentative contributions to risk discourses, though, as Scott notes, citizens and advocates often engage in a "politics of counter-expertise" that perpetuates the dominant risk narrative by matching its discursive practices.

I propose that while the counter-stagings in contested risk discourses in Canada exhibit the features noted in previous scholarship, there is a sub-type of counter-staging that lacks any real participatory or argumentative intent, one that uses the features of risk discourse to construct things that look, sound, and feel truthful and technically sound but are, as "alternative facts" before them, really alternative stagings of risk: non-factual and unscientific campaigns that reject dominant or scientific stagings of risk. They employ rhetorical strategies of the alt-right "community of discourse" that turn to the oldest rhetorical trick in the book: making the false argument appear true[2].

For example, Figure 1, taken from the Canadian anti-COVID-19 vaccine campaign, *Stop the Shots in Kids*, illustrates how the campaign appeals to traditional medical rhetoric, such as the Hippocratic oath, medical regulatory practices, and medical ethics. However, the campaign does not pursue a rigorous evaluation of the regulations. Rather, it uses these appeals to medical tradition imply that, in approving the new, non-traditional COVID-19 vaccines for children, the Canadian government and Health Canada are "deviating from those practices, causing harm, and [… are] negligent at best" (*Stop the Shots,* p. 5). This framing of "traditional" as less risky than "innovative" continues throughout the campaign and creates confusion as to what "risk" means when it comes to COVID-19 and the COVID-19 vaccines.

[2] See Aristophanes' *Clouds* for a cautionary tale about following "Wrong Logic", and Aristotle's *Rhetoric*, where he states that "we must not make people believe what is wrong" (pp. 180-181).

Figure 1 It's Time to Stop the Shots in Kids (PDF) p. 5

In this thesis, I diagnose the vulnerability of risk communication to "alternative takeover" and identify the staging it produces as *alternative risk.* First, I identify and define the concept of alternative risk within the context of existing scholarship on the rhetoric of risk. Then, I explore the vulnerabilities of risk discourse and discuss how the rhetoric of the alt-right operates in risk stagings to prey on people's worry and frustration. Next, I develop a case study, using *Stop the Shots in Kids*, to ground my theoretical work in a real-world example. The case study identifies a broad range of consider how alternative risk fails to provide the information and decision-making solutions people need. And finally, I conclude with some thoughts on how this failure presents an opportunity (and an exigency) for good-faith actors to shore up risk discourse to defend against alternative risk.

Risk and Alternative Risk

Risk Society

Beck was one of the first scholars to argue that we live in a new era of modernity called the *risk society*. This era is characterised by a new set of hazards unlike those encountered before in human history. Whereas in pre-modern eras hazards were forces of nature such as storms, forest fires, and earthquakes, or contiguous with sensory experience, like war, smoke inhalation, and mouldy food, modern risks are human-generated, globalized, and can't be predicted by our senses. We can't see a furnace leaking natural gas, a failed reactor pumping out nuclear radiation, or the temperature of the Earth rising, we only feel the consequences and effects. Thankfully, through technical instruments and monitoring programmes we are able to "sense" these new hazards through measurements. These measurements are taken by technical experts, government scientists, and research organisations who then must communicate with the rest of us to explain their data and the risks we need to understand. This communication is a rhetorical act that turns invisible modern hazards into visible modern risks. Sometimes, risk is made visible through sensory rhetoric, as in the case of natural gas, which is colourless and odourless. The chemical *mercaptan*, which smells like rotten eggs, is added to natural gas at distribution (Manitoba Hydro) in the hope that we will smell leaking gas before it becomes a catastrophe – before an explosion or poisoning occurs. But more often, risks must be made visible discursively, through information campaigns and other media communications. Beck refers to this process of making risks real through rhetoric as "staging risk" (*World at Risk*, p.10).

Risk must be staged because it is not a tangible thing, but a potential, a possible, a not-yet-*real* thing. Beck calls this the "anticipation of catastrophe" (p.9) that makes predictions about what might occur in the future and describes the probability of it coming to pass. You'll notice the hedging even as I explain risk in terms of anticipation, prediction, might, probability—risk deals almost exclusively with what Aristotle called "the class of the 'contingent'" (p. 183), or things we can't know for certain. The future-oriented and often "open-ended" (Lupton, p. 81) nature of "risk" makes it a particularly challenging puzzle to solve because it is always a potential we are considering rather than an existing reality that we can deal with.

Modern risk is also *reflexive*, which is to say it is the consequence of the success of technological development (Lupton, p. 85). As Deborah Lupton explains, Beck argued that humanity's collective success at producing "goods" is the reason we have a new set of "bads" to manage (pp. 78-79). Climate change, for instance, is the result of successful industrialization and capitalism around the world. The COVID-19 pandemic is another example: without a successful civil aviation industry to enable the rapid and widespread movement of people across the globe for work, education, and life, the "epidemic" would not have been at risk of becoming a "pandemic" so rapidly or thoroughly.

Indeed, the global nature of the COVID-19 pandemic is characteristic of modern hazards. In *World at Risk,* Beck writes that modern hazards cannot be restricted by geopolitical borders and that, when it comes to risks such as air pollution, terrorism, or even financial downturns, the individual nation-state is only one small part of a *global* risk society (p. 62-63). This means that risk is no longer something that happens to *other people* in *other places,* but something ubiquitous, happening to *all people* in *any place,* at

any time. In this context, "[w]hen risk is omnipresent," Beck writes, "[only] three reactions are possible: *denial*, *apathy* or *transformation*" (p. 48). By transformation, he means "that the taken-for-granted can no longer be taken for granted" (p. 49) and that we will have to come together to manage risks collectively because "[g]lobal risks open up a moral and political space that can give rise to a civil culture of responsibility that transcends borders and conflicts" (p. 57). Global protest movements such as the youth-driven "Climate Strike" protests in 2019 (Neuman and Chappell), and 2020 Black Lives Matter movement (Westerman et al.) reflect some of the ways this cosmopolitan shift (see Beck, *World at Risk,* ch. 3) has come about. Global citizen support for Ukraine in its fight to resist the recent Russian invasion is yet another[3]. At the same time, Beck doesn't suggest that risk will miraculously unite humanity, but instead that it creates "enforced cosmopolitanism" wherein "global risks activate and connect actors across borders who otherwise don't want to have anything to do with one another" (Beck, *World at Risk,* p. 61). Because global risks cannot be contained, we are essentially all in the same boat and will need to work together

Though the rise of nationalist and populist governments across the world in the mid-to-late 2010's suggests that nationalist tendencies have not been replaced by Beck's vision of a global civil society (see Grzymala-Busse 2017; Lakoff 2017; Budd 2020), a nationalist approach to risk is not confined to one political style. For example, in February, 2021, the Canadian government, led by the decidedly *not* populist Prime Minister Trudeau and the Liberal party, requested an "early allocation" of vaccines from Covax, a branch of the World Health Organization's "Vaccine Equity" initiative

[3] From online social media badges, filters and posts, to off line flags, posters and ribbons, citizens around the world have displayed Ukrainian colours in solidarity. See CBC News (2022) for coverage from Canadian demonstrations just days after the 2022 invasion began.

created to help moderate the global risk of COVID-19 by pooling vaccine donations from wealthy Western nations to share with countries that could not afford to purchase enough vaccines for their population ("Vaccine Equity"). This made Canada "the only member of the G7 group of rich countries [to be] listed as a Covax beneficiary" at the time ("Covax"). When interviewed about the decision, International Development Minister Karina Gould said: "Our top priority is to ensure that Canadians have access to vaccines [...] We're focused on getting Canadians vaccinated while making sure the rest of the world is vaccinated too" (qtd. in CBC News 2021). This episode is emblematic of the current tension between cosmopolitanism and nationalism: because leaders are still in charge of protecting their citizenry and wealthy nations are able to take care of their own problems, many countries are still "nation-first" in practice and philosophy.

Thus, the dissolution of borders presaged by Beck (p. 61) is slightly more nuanced. The actual risks are clearly global in nature, but the cooperation of "global civil society" has yet to supersede the action of nation-states. Further, the effects of risk anticipation and risk management are felt on the personal and local level, sometimes putting the "cosmopolitan" and the "local" in tension with one another. Concern and worry about risk is something people feel in their local communities and personally as individuals. As Wilkinson writes,

> "So long as the development of 'civilization' is bound to the dynamics of global capitalism, there appears to be little doubting the fact that more profound social inequalities, inevitable economic instability, and a burgeoning ecological crisis are liable to leave large numbers of people anxiously distressed by the condition of their lives." (p. 79)

We experience risk locally when we consider our particular community, group or region to be susceptible to particular harms. Athletes are at risk of concussion, businesses were at risk during COVID-19 lockdowns, and online banking users are always at risk of identity theft. Or consider the 2022 Monkeypox outbreak that saw higher risk for gay men in the regions of Montréal, Ottawa and Toronto (PHAC 21 July 2022). Local community risk can also be built into local governance. In Calgary, Alberta, for example, flood hazard maps provided by the city not only help residents identify their property's risk of flooding and signal where flood-mitigating changes to the building code apply ("Flood Maps"), they also allow insurance companies to target which properties are eligible for flood insurance coverage, and which properties are not (McClure, par. 12). Each of these communities must not only manage risk but live with the concern and worry created by their awareness and understanding of the risks. Further, these local risks are also personal risks that must be managed through the actions of individuals, such as using concussion-prevention equipment and rules of play, accessing business cash reserves or emergency funding, strong online passwords, safe sex practices, and flood-mitigating home improvements. Risk simultaneously alerts us to the reality that we are not safe and aims to alleviate this worry with preventive measures[4].

[4] For more on risk and anxiety, see Ian Wilkinson's *Anxiety in a Risk Society*.

Subpolitics and The Risk Frame

Despite the ability of science to measure and learn about risks, the contribution of science and technology to the creation of modern risks has, according to Beck, also resulted in the decrease of scientific authority. As Lupton writes, "Lay people have become skeptical about science, because they are aware that science has produced many of the risks about which they are concerned and that scientific knowledge about risk is incomplete and often contradictory, failing to solve the problems it has created. People must deal, therefore, with constant insecurity and uncertainty: conventional social order seems to be breaking down in the face of the undermining of old certainties" (p. 87). We can see this loss of authority when experts who deliver incomplete or contradictory messages find themselves facing accusations by the public that they are withholding information or "flip-flopping", as in the case of Health Canada's advice about mask-wearing during the first months of the COVID-19 pandemic (PHAC 2020). This happens despite the fact that we, as Ashley Rose Mehlenbacher writes, need "experts [who] can operate in uncertainty" (p. 17). We must rely on expertise, not just as "mere technical competency, but [as] a form of knowledge that [we] require to make informed decisions" (Mehlenbacher, p. 19). Not only do we rely on experts, but "There is an insatiable demand for expert knowledge of risks. Yet expert knowledge is never definitive, never final, always incomplete, imperfect and fluid. This makes it difficult for people to have trust in experts" (Doyle, p. 10) Technical knowledge is how we learn about risk. It is vital to our ability to make decisions about risk as individuals and as a society. We debate and discuss risk so that we can get a full picture of the hazards we face and to decide what to do about them. These decisions are layered; political and

social decisions overlay the decisions we make as individuals. For example, when we decided as a society that we wanted to reduce risk of fatalities in car accidents (social level), we enacted laws making seatbelts mandatory to include in car manufacturing and mandatory to wear (political level). In addition to the legal mandate, drivers and passengers must still choose to put on their seatbelt each time they get in the car (personal level). These levels of risk decision-making enable us to work together to mitigate risk, but they also enable what Beck refers to as *subpolitics:* input by non-traditional political actors such as laypersons, lobby groups, advocacy groups, and individuals (Beck, *World at Risk,* p. 95). At its core, subpolitics, like all politics, is a mode of argument—one in which the data and evidence provided by a risk staging are marshalled by non-expert rhetors in the service of advancing their claims and persuading their audience.[5]

Of course, risk also features centrally in traditional politics. Michel Foucault's work on "Governmentality", or government rationality, has been taken up by scholars such as Dayna Nadine Scott, who argues that risk has become a central organizing principle of government, and claims it is used as a conceptual frame for political argument (p. 26). This "risk frame," as defined by Scott, is a cognitive structure that shapes both how we classify and organize our experiences and shapes the systems we use to make decisions about risk (p. 49, n.2). Risk has become the lens through which we organize and understand the world, and because of this, we see a world filled with risk. The risk frame is compelling because it simplifies the complexity of risk by organizing it

[5] The combination of discursive staging and argumentative sub-politics emphasizes how the management of risk is as much about persuasion as it is about facts.

into three tidy steps: assess, predict, manage. These steps reconceptualize the uncertainty of risk as a known quantity: a set of technoscientific probabilities that can be addressed or "managed" through appropriate actions (Scott, p. 23). This is a successful paradigm for data-gathering, as it helps us pin down the parameters of risk to arrive at a "best understanding" of a situation despite the fact that it can only ever be an estimation. But as a social paradigm, risk is problematic precisely because it shrinks the potential content of risk deliberation to one of these three phases, and collapses the parameters in consideration to those that can be apprehended by technological or scientific modes of measurement.

Governing a society depends not solely on measurements and probabilities, but on deliberative decision making. It relies on understanding technological parameters as well as social parameters, and its goal is to manage a territory and its people, not just a singular risk topic. The risk frame narrows the perspective of the government, limiting its attention to things that can be fit into the steps of assess, predict, manage, and constraining the contents of risk debate. It also limits how the governed citizenry can engage with risks. The roles of "expert", "politician" and "lay person" affect a citizen's ability to participate in the politics of risk, largely because the risk frame's emphasis on technoscientific data increases the importance of expert participants while minimizing the importance of general citizens (see Doyle, Kinsella et al., and Scott). According to Scott, this results in a subpolitics of "counter-expertise" (Scott, p. 43) wherein non-expert groups who have been denied access to the risk debate hire and deploy their own experts to gain admission to the debate. For example, Scott's discussion of the genetically modified organism (GMO) food debate in Canada finds that advocates who oppose GMO foods tend to "reproduce and normalize an objectivist risk discourse",

particularly when they "enroll experts to legitimate their claims about GMOs" (Scott, p. 43). Thus the success of the risk frame in setting and restricting the terms of debate makes it another point of *reflexive risk:* by excluding the voices and concerns of laypeople, the risk frame is (1) alienated from the population it is designed to protect[6], and (2) captured by experts for hire who have technical proficiency but lack ethical intentions (Mehlenbacher, p. 17-19).

Rhetoric of risk

Though Beck's theory distinguishes modern risks from earlier risks, the political and subpolitical deliberations that helps us make decisions about risk dates back to the earliest ages of rhetoric and Aristotle's *topoi*, the topics or "places". As Michael MacDonald explains, the *topoi* were patterns or schemes of argumentation (definition, division, comparison, and others) that speakers could use in their speeches and arguments. The *koinoi topoi*, or "common" topics/places, were a generalized kind of argument that could be applied to any subject matter, where the *idioi topoi* were more restrictive and used for very specific subjects (p. 791). Aristotle considered rhetoric to be the most appropriate method for deliberation because rhetoric specifically deals with making decisions that have no absolute answer or correct path. Instead, they involve debate about the uncertain, the contingent, and the probable (Aristotle, p. 183) – all features that make modern risk challenging and worrisome.

[6] The rhetorical effect of telling good-faith laypersons that they must hire an "expert" to say the things they already know well enough is likely a source of anti-government, anti-expert sentiments.

Like risk, Aristotle's rhetoric is anticipatory in its focus on deliberation, or choosing a future course of action. In order to make a decision, people don't just need to understand or believe the pertinent facts, they also must be persuaded that they have enough of those facts to make their decision, and understand which decision they should take. The *topoi* give speakers tools to shape their subject matter into a structure that will enhance the persuasive force of their argument. The rhetorician's job, in Aristotle's view, was to be an expert in persuasion who also had expert-level knowledge of their subject matter (p. 182). Part of this required enough technical knowledge or skill, but, as Mehlenbacher explains, this also included *ethos*, or the character of the rhetorician. Ethos had three components: *phronesis*, or the "practical wisdom" acquired through an understanding of context, audience, and the potential actions the audience will find reasonable or preferable (p. 34), *eunoia,* or "goodwill toward the audience" (p.46), and *arête,* which means virtue or "good moral values" (p. 46). In short, a good expert in persuasion combines technical knowledge with a strong grasp of context and good-faith intent.

According to Robin Jensen, modern scholarship in the "rhetoric of risk" often divides its interest among risk as "constructed" by discourse (this aligns with Beck's notion of "staging"); the degree to which risk is "deliberative", or negotiated with the public, rather than handed down to us by technocratic experts; and the degree to which risk is simply rhetorical, another form of human persuasion (pp. 88-93). To this arrangement, I add the suggestion that risk is also a *topos*, one that works as both an *idion topos* and a *koinon topos*. Risk communication and risk scholarship often treat risk as an *idion topos*, a specific set of arguments used for discussing risk, uncertainty and hazards. For example, the flood risk maps from Calgary mentioned earlier explicitly use

risk as a rhetorical move to encourage citizens to adequately protect their homes. But in the risk society, the ubiquity of risk staging and the role of risk as a social paradigm habituates us to thinking in terms of risk. Thus, risk is a way of arguing about various types of uncertainty, but it has also become a way to argue about other subjects. Imagine, for example, that my family and I are deciding where to eat dinner tonight. Opportunities to use a risk-based argument abound: the risk of choosing a restaurant that's too busy, the risk of spending too much money on a meal, or the risk of the high-fat and high-salt content of restaurant food. If I don't want to go out for dinner, risk is a *koinon topos*, a perfect "place" to find an argument that will persuade my family to eat at home tonight.

By considering risk not just as a specialized set of technical and scientific probabilities but as a common place where we can find arguments for a wide range of subjects, we broaden our understanding of how it operates in the real world and expand our scholarly examination of its rhetorical effect and vulnerabilities.

Risk Communication

Risk staging is the main output of the professional writing genre of *risk communication,* a field that has been growing since the 1980s as society "increasingly looked on communication as a desirable feature and important element determining the efficacy of risk decision-making processes" (Cho, p. 1). The goals of risk communication are clear: awareness, understanding and action (Rowan, p. 300). Risk communicators want their audience to learn about risks, to understand risk material, develop a "risk perception" or perspective on the risk (see Bodemer and Gaissmaier), and finally to make decisions about how to deal with the risk and how to carry out those decisions.

These simple aims belie the difficulty of achieving them, which requires more than simply boxing up information that the audience can unpack and understand with full clarity. Risk is complex and technical, and risk communicators have developed general practices that aim to make their communication effective and persuasive. Their strategies must address both textual features, such as graphical formats and verbal descriptions of statistics, and content features, such as how much risk information to disclose or how much to simplify for the intended audience (see Timmermans, p. 1; Cleaveland et al.). A comprehensive and flexible set of rhetorical strategies is a critical part of risk communication because the risk audience is frequently the general population, and thus risk staging must be accommodated to a full spectrum of skills and needs. But, as Hess et al. note, "[h]ow risks can be successfully communicated is still an open question," and "research has shown that people have substantial difficulties in understanding probability information" (pp. 47-48). Literacy and numeracy have a significant impact on risk perception and comprehension (see Stallings and Paling 2001; Keller and Siegrist 2009). Audience reception also seems to be an important feature, as demonstrated by Henneman et al., who found that women receiving breast cancer risk counselling who were "given risk estimates in their *preferred format* had a slightly better understanding of risk" (Abstract, par. 3, italics added). Yet, within the field there is also conflicting evidence as to the effectiveness of particular communication tools. For example, Hess et al. found that "graphical risk communication, which some scholars explicitly recommend for persons with lower numeracy" (p. 59) was still difficult to comprehend for a low-numeracy audience (pp. 57-58). Further, they questioned "whether people would [take] time and effort to look at a risk communication graph" long enough to understand it "in the absence of external

motivation" or requirement (p. 58). As the field of risk communication continues to evolve, it also seems committed to refining its rhetorical strategies to improve effectiveness.

Indeed, successful risk communication must be able to command attention, convey information effectively, and motivate its audience to take action, all without causing mass panic[7]. One of risk communication's most important roles is to recommend a particular course of action. And it is here, in the act of recommendation, that risk communication must move beyond the technical to take on a social or political dimension. Risk communicators must combine considerations such as expense, quality of outcome, tolerance for side effects, and social values and concerns with the technical data and triage options for action based on this combined information. The options presented by a risk communication are a *selection* of a total set of possible options, and thus are also a *deflection* of other possibilities (Burke, "Language", p. 45). The choice of which options to offer depends not only on the technical data but on who is providing the recommendation, expectations of audience reception, or on the audience's ability to take the recommended course of action. This means that recommendations for risk management are not simply based in technical facts, but determined by the perspective of those responsible for the risk communication. For instance, a physician recommending treatment options to a patient might offer more non-surgical or "bloodless medicine and surgery programs" (Scharman, p. 1370) if their patient is a Jehovah's Witness who do not accept blood transfusions. The risk of blood loss is no

[7] The March 2023 run on Silicon Valley Bank (which led to its collapse) perfectly illustrates the balance risk communication needs to strike between providing information and inducing panic. See commentary from Edward Segal in *Forbes*, 14 March 2023.

greater for a Jehovah's Witness than for anyone else, but the options for managing blood loss are fewer and more specialized when blood transfusions are off the table.

Alternative Risk

The core notion of *risk society* is that we live in an era in which reductions in some forms of precarity and vulnerability have resulted in new forms of precarity and vulnerability. Our technologically advanced societies have reflexively introduced new vulnerabilities (nuclear radiation, pandemic viruses) and intensified old ones (social anxiety and distrust, economic chaos and wealth concentration)[8].

I argue that this reflexive implication also holds true for risk communication. The effectiveness of the risk frame as a way modern society rhetorically constructs the world has led to widespread and ongoing risk stagings of global security, economic downturns, climate change, sugar, caffeine, alcohol, too much sitting, too much standing, sun exposure, air pollution, inadequate sleep, not having enough grit, having too much grit[9], eating too much ice cream, not eating enough ice cream[10]. The endless stream of stagings coupled with the "inherently technocratic" (Scott, p. 27) nature of risk discourse that "underplays – if not denigrates – everyday moral vocabularies" (Fisher, p. 16) makes risk stagings vulnerable to "chronic message fatigue" (Lu, p. 475), loss of trust with their intended audiences (Seo et al., p. 517), and disinformation campaigns that better resonate "with the lives and struggles of one's audience" (Cloud,

[8] A McLuhanesque reading of Beck could prove interesting for future study, both for the concept of modern hazards as well as the communication of hazards.
[9] See Aysha Imtiaz (BBC), who observes that "too much grit" can lead to people "toughing it out" in unhealthy situations when they might be better off quitting or leaving.
[10] See David Merritt Johns's reporting in *The Atlantic*, which really takes the (ice cream) cake.

p. x). While some communication scholars have called these "the unintended effects of communication" (Seo et al. 2021, Cho & Salmon 2007), Beck's notion of reflexive risk suggests that these risks of risk communication stem partly from the success of risk as a social paradigm (Scott, p.49 n.2), and reflect the dual nature of the risk *topos* as both general and particular.

These "risks" of risk communication expand the scope of subpolitics beyond concerned citizens who want to debate the specifics of a risk staging (see Kinsella et al. 2013) to include competition from *counter-stagings*. As a sub-type of counter-argument, a counter-staging exists in an oppositional relationship to an original, or dominant, staging. It rhetorically reconstructs a risk using different parameters, claims or goals, which argue against, or *counter* to, the original staging (though the two stagings may overlap significantly). To illustrate with a very basic example, consider a parent and her teenage daughter discussing the risk of staying out past curfew on a Sunday night. The parent's understanding of the risk involved will relate to sleep deprivation and a lack of time to prepare for school on Monday morning. The teen's understanding of the risk will likely revolve around a lack of social time, "missing out", and being able to make her own choices. These two different stagings conceptualize the same risk scenario using very different frames, and, as parents and teens have done since the dawn of the teenager, they will argue over which "staging" should be used to make a decision or find compromises where their different stagings overlap.

Counter-staging integrates Beck's concepts of risk staging and subpolitics within Scott's "risk frame"[11], providing a name for the way counter arguments within a risk

[11] I should point out that Scott sees the risk frame as self-reinforcing and mostly unproductive for subpolitical action, and argues that moving discourse out of the risk frame is critical for the success of any challenge to the dominant staging.

discourse must adopt the discursive practices of risk communication in order to participate in the debate. For instance, when Kinsella et al. analyzed public participation in a nuclear project hearing, they found that "despite the rhetorical boundaries they faced, public witnesses at this hearing were able to link environmental, health, and safety implications of the [Fukushima reactor disaster] in Japan with questions of economic rationality and prudence. They further invoked powerful themes of social justice, technological progress, and moral obligation, while establishing varying degrees of credibility as technically-informed commentators. These witnesses were not digressing, or failing to understand the hearing's institutional boundaries; they were instead invoking matters of practical wisdom (*phronesis*) that the hearing's formal structure had obscured" (p. 292). These types of counter-stagings embody the positive dimension of Beck's idea of subpolitics: "In the world risk society, politics is made in various realms of subpolitics, whether it is in the firm, the laboratory, at the gas station, or in the supermarket. New types of conflict emerge and new coalitions become thinkable" (1997, p. 52). But the positive outcome of the erosion of a "tidy" political sphere is predicated on counter-stagings that want to argue – that offer good-faith arguments and consider rebuttals and counter points.

When a counter-staging precludes or rejects other arguments without consideration—when it appears to "argue" but instead isolates itself from counter-argument—it becomes something else, something I call "alternative risk[12]." An alternative risk is a risk-staging that operates in an oppositional and hostile orientation to other stagings. Alternative risks are not open to debate (this is labelled "silencing"),

[12] The basis of this idea is "alternative health" and "alternative facts", both of which present themselves as opposed to "mainstream" health/facts, and which also include the alt-right rhetorical features that characterize "alternative risk."

not available for logical argument (the "facts" are largely "beliefs"), and their arguments activate and validate audience frustration, using it to make their claims "feel" true. Examples of this include:

- The People's Party of Canada platform statement "Canadian Identity: Ending Official Multiculturalism and Preserving Canadian Values and Culture," which counter-stages Canada's official multiculturalism policy as "extreme multiculturalism" that "is based on the idea that [...] we are just a collection of ethnic and religious tribes living side by side. But if we want to keep our country united, and ensure social cohesion, we must focus on what unites us as Canadians, not what divides us." ("Canadian Identity").
- Pierre Poilievre's "Everything Feels Broken" video, which counter-stages the Safe Supply drugs program as a "deliberate policy by woke Liberal and NDP governments to provide taxpayer funded drugs, flood our streets with easy access to these poisons" that has increased overdose deaths in Canada (@PierrePoilievre, [01:32]).
- Rebel Media's documentary *Church Under Fire: Canada's War on Christianity*, which counter-stages the COVID-19 restrictions that prevented church gatherings as "abuses against churches and pastors under the guise of public health" (The Gunn Show).

Like "alternative facts" before them, these anti-factual and anti-scientific campaigns reject other stagings of risk, while employing the textual features and content that is characteristic of risk communication. Alternative risk constructs something that looks, sounds, and feels truthful and technically accurate, but is inaccurate, untruthful, and fails to meaningfully address the risk it stages. Often, alternative risks are ideologically

loaded arguments about something else entirely. They can run the spectrum from hostile state propaganda to anti-vaccine misinformation to subtler "populist rhetoric." Yet, despite differences in content, they share a common structural feature: the argument relies on a "kernel of truth" to supply most of the support for their claims. This is the understandable concern, the shared frustration, or the history of problems that appeals to common sense and provides cover for the mis- and dis-information that forms the bulk of their content.

These "kernels of truth" give alternative risk the power of a dog-whistle or Barthesian myth[13]: they are "double-order" signs that operate both as direct symbols of concern, frustration, etc., and as secondary signs/signifiers that do ideological work. In the example of Pierre Poilievre and safe supply, Poilievre's argument relies on two shared concerns: first, the belief that Prime Minister Trudeau is misguided and untrustworthy and, second, the conviction that the government shouldn't provide hard drugs to drug users. As discussed by Brown and Krishnan, regardless of whether or not I agree with these claims, they are legitimate opinions to hold. And, in a good-faith counter-staging, they could contribute to an honest and productive risk debate. But in Poilievre's counter-staging, they are instead used as proof that safe supply drug pilot programs are doing more harm than good in Canada – a claim not supported by the current evidence (see Brown and Krishnan, 18 May 2023). In fact, this staging doesn't meaningfully address drug overdose risk or risks of a safe supply at all. Instead, this staging uses risk to mount conspiracy arguments against the Trudeau government, while amplifying the concerns and frustrations of Canadians who care about the

[13] Barthes' notion of "the turnstile" is prescient here, too, since alternative stagings use the risk frame to create an ideologically neutral presentation of 'facts' that is, in reality, an alibi for a heavy dose of ideology.

problem of addiction. This type of misinformation thrives in alternative risk because it simultaneously hails audiences with compelling narratives of conspiracy and revelations of suppressed truth that *reinforce the concerns people already have*. Where risk is ambiguous, uncertain and shared, *alternative risk* is clear, direct and, most importantly, knows who to blame.

Vulnerability of Risk

There are five main features of risk that make it susceptible to "alternative" takeover, and they are rhetorically synergistic when exploited by alternative risk: the more an alternative risk looks and sounds and feels like a legitimate risk staging, the more persuasive it becomes.

The main and most salient vulnerability is the ambiguity of risk. Because it anticipates a catastrophe that has not and may never occur, it is an abstraction that is rhetorically malleable. In the *Church Under Fire* example above (p. 20), for example, the ambiguity of "risk" is exploited by rhetorically adjusting the meaning of the COVID-19 restrictions that asked church-goers to refrain from in-person services and singing. Rather than a public health *protection*, Rebel Media defines it as a public health *abuse*. Although the risk frame can simplify the complexity of risk, it cannot resolve the ambiguity of risk. This is partly because of the anticipation, but also partly because the outcome of "prevention of a risk from occurring" is as intangible as the original uncertainty.

A second vulnerability lies in how risk is discovered and disseminated by experts. This constrains participation and ensures that discussions of risk are conducted by people who are knowledgeable and fluent in the technical details of the risk, and conducted in specialized terms and jargon that "privilege those who possess technical knowledge" (Scott, p. 44). Thus, vaccine discussions are conducted by immunologists and physicians, earthquake risks are reviewed by seismologists and engineers, and inflation risks are discussed by monetary policy experts and central bankers. This arrangement makes risk discussions *efficient*, since everyone participating has a similar

level of understanding of the issue, but it also makes them *technocratic*: controlled and conducted by experts in such a way as to exclude citizen participation. As Scott writes,

> "policy debates are almost invariably carried out in terms that privilege those who possess technical knowledge[.] This means that other interest groups, or individual citizens, regardless of their political strength, cannot be effective in influencing policy unless they also acquire access to experts. The ordinary citizen is denied meaningful involvement in the political process." (p. 44)

The dangers here are multiple. The first is the danger that citizens are excluded from full participation in discussions that affect their lives in a meaningful way (Doyle, p. 8-9). The second has to do with the "acquiring access to experts" Scott mentions, and an increasingly complicated relationship between experts and the rest of us (see Mehlenbacher). Doyle writes that, "paradoxically, risk society is characterized both by increasing dependence on experts and, at the same time, declining trust in those same experts and, consequently, declining trust in our major social institutions," which is precipitated by "[a]n unprecedented level of higher education and access to knowledge through the Internet." (p. 10). If experts are seen as "performative," or "for sale," their testimony distorts the credibility of risk discourse. Further, a kind of "mercenary expert" scenario can occur, in which risk deliberations could be derailed by bad-faith participants. In general, this leaves the door wide open for "alternative" agendas.

A third vulnerability lies in the way risk decision-making often happens in the context of "rationality" and data rather than values and political decisions about how we want to live. This is partly due to a disconnection between the empirical data and "the meaning of risk in people's lives" (Doyle, p. 8), which is "rooted in the difference

between experts' quantitative language and the qualitative terminology ordinarily employed by citizens in everyday life" (Leiss and Powell, p. 27). The language of risk, and the things that matter to risk experts, can bypass citizen's needs. If the choices we make about risk are based solely on data collected and controlled by experts, the lay public may feel the choices do not reflect their needs, values, or beliefs. This scenario creates an audience primed for an *alternative* risk that privileges their needs, values and beliefs over data.

A fourth vulnerability is that risk discourse relies on trust. Although a full treatment of this topic is not possible in this thesis, trust is clearly entangled with alternative risk. For the purposes of diagnosing vulnerabilities of risk discourse, the most important factor is the history of political or economic expediency winning out over a full commitment to public safety or risk disclosure. From the water crisis in First Nations communities, to the tragic derailment and explosion at Lac-Mégantic, to the ongoing Oxycontin-born opioid epidemic, there is no shortage of examples of experts betraying public trust through deliberate withholding of information or self-interested choices. Public cynicism rooted in this history of broken trust may contribute to a general receptivity to alternative risk, or to a belief that all risk discourse is untrustworthy.

The fifth vulnerability is the risk audience—us. Because risk is such a difficult thing for most of us to understand, we rely on the formal features of risk communication to guide us through the information. This means that the genre conventions and style are two more features that can be exploited by alternative agendas. Alternative risk employs both the structure of a risk frame (assess, predict, manage) and the conventions and multimodal rhetorical features of risk staging:

informational videos, writing and research provided by “experts”, professional-level content (presentation “decks”, well-formatted text and graphics), as well as an organizational “brand”.

Like legitimate risk communications, alternative risk offers “clear” information, but rather than attempting to enlighten an audience, alternative risk adopts these features of risk communication as a *style*. Because risk communication typically conveys complex information and the level of technical expertise required to parse and understand the information presented is quite high, most of the general public is not able to evaluate the technical data. Even when we have some understanding of a topic, the level of detail required to evaluate a risk staging (accuracy of statistics, appropriateness of graphics) is beyond most of us, unless we have a particular interest in the topic or a lot of spare time. Because data analysis is so challenging for non-experts, alternative risk is able to bury otherwise obvious emotional appeals within technical-*style* data and make them difficult to distinguish from legitimate stagings. Furthermore, the “tight messaging” of legitimate constructions of risk make it easier for alternative stagings to flourish. Because the public has been conditioned to a risk frame that projects certainty through consistency of messaging, the consistency produced in alternative risk makes it seem more credible.

Alternative Rhetoric

Understanding alternative risk also requires an understanding of the “alternative" rhetorical strategies it employs. The following strategies are not exclusive to alternative, or “alt-right” use, but they characterise what Philippe-Joseph Salazar refers to as the alt-right “community of discourse.” I follow Salazar’s definition of ‘alt-right’ as

"an all-inclusive signifier for a variety of new far-right movements in the US public sphere…" (p. 136), extending it to include Canada's active far-right movements as identified by Bessma Momani and Ryan Deschamps's mapping of alt-right activity in Canada, and illustrated in Andy Campbell's *We are Proud Boys*, which profiles the Canadian founder of a well-known alt-right group[14].

As demonstrated in Hartzell (2018, 2020), Finlayson, Salazar, and others, the alt-right employs a characteristic set of rhetorical strategies that are all involved in a general programme of opposition to "progressivism and social reform" (Finlayson, p. 172). In alternative risk, the alt-right rhetorical strategies can be grouped into three types: those that build *ethos*, those that destabilize discourse with ambiguity and obfuscation, and those that validate the audience's existing feelings or beliefs.

Strategies of Ethos-Building

Strategies of ethos-building are not unique to the alt-right, but they are a central and even exaggerated part of alternative risk. Indeed, the rhetorical effort an alternative risk staging puts into building their authority and credibility can seem like overkill until it is considered in relation to the dominant staging usually provided by a government or well-known institution. Alt-right rhetoric hard-sells its own credibility because it is up against ethos juggernauts with decades (even centuries) of reputation-building under their belts, and because claiming authority and credibility is sometimes a short-cut to building trust with an audience. But the alt-right version of this strategy also emphasizes its own ethos in an attempt to unseat the reputation of the establishment.

[14] Gavin McInnes, who was also a co-founder of Vice media and whose "Western Chauvinist" YouTube channel was banned by the platform in 2018.

Strategies of ethos-building used in alternative risk include reflexive iconoclasm, appeals to tradition, and persecution.

Reflexive Iconoclasm

Reflexive iconoclasm is a move identified by Alan Finlayson, by which alt-right rhetors argue that the institutions in which they achieved their authority (the academy, medical boards, government) have since become vehicles of "conformist liberalism [that put] ideology above science" (Finlayson, p. 172). As Finlayson notes, "[t]hese writers speak from traditional, pre-digital bases of authority (commercial media and university professorships) but have found significant audiences and counter-cultural cache through podcasts, YouTube and other social media" (p. 172), and they argue that institutions that were once trustworthy have become corrupted. For instance,

> "Jordan Peterson [claims] that 'Departments like Women's Studies have trained between three-hundred thousand and three-million radical left-wing activists' (Palkinm, 2016) and that 'the post-modernist types have infiltrated bureaucratic organizations at the mid to upper level and that's actually what they're trained to do by their activist professors in university.' (*Epoch Times,* 2017)" (Finlayson, p. 176)

This move defines alt-right rhetors and experts as "true" experts, separating them from the "corrupt" and "conformist" rhetors and experts of the mainstream[15]. And it allows the alt-right to have it both ways: the credentials and experience of alt-right members builds ethos, while the credentials and experience of others is evidence of a lack of ethos.

[15] This also equates "conforming" with "corruption", which is another effective tactic.

Appeals to Tradition

The institutional nostalgia that contributes to reflexive iconoclasm often rides shotgun with a larger appeal to tradition that manifests within the alt-right arguments (Finlayson) and as a mode or style within their discourse. The general and expected conservative appeals to tradition, order, family, and religion manifest as traditional styles of communication. For example, some violent alt-right groups, such as the Proud Boys, model their internal structure and communications on traditional military styles (see Campbell), borrowing the ethos of the Armed Forces. In alternative risk, this tends to mean emphasizing traditional technical or research styles. Citations, references and data modelling are used to mount an appeal to "traditional research" despite their contents not meeting academic or research standards.

Persecution

Persecution adopts the language of activism and advocacy and lays claim to victim status. It often rhetorically constructs the author as part of a larger group of martyrs who are being "muzzled" or otherwise prevented from sharing their opinions or beliefs. Of course, this is somewhat contradictory as the silencing doesn't seem to prevent them from repeatedly claiming to have been silenced[16]. By constructing themselves this way, alt-right rhetors extend an invitation to audience members to see themselves as part of this persecuted group, and simultaneously re-construct themselves as saviour figures in the role of "whistleblowers."

[16] If an eye-rolling emoji was ever appropriate in a thesis, I'd be putting it here.

Strategies of Destabilisation

Strategies of destabilisation exploit and exaggerate ambiguity to confuse and disorient their audience, leaving them more receptive to the persuasiveness of ethotic appeals and pathotic validation. They are also the main rhetorical force of opposition and hostility to a dominant staging. By changing the focus, introducing multiple new considerations, or obfuscating the truth, these techniques make the whole risk discourse slippery and relative, leaving audiences uncertain where they stand within an already uncertain risk scenario. Strategies of destabilisation also work to ratchet up the emotion of risk discourse, preying on people's worries, and use this pathos to encourage audiences to adopt their viewpoint. These strategies include red-pill rhetoric, the "firehose of falsehood" (Paul and Matthews, p. 1) and mis-to-dis-information.

Red-pill Rhetoric

This is a two-part strategy named for a famous scene in *The Matrix* film (Wachowski and Wachowski, 1999) that has been adopted by many online communities, but particularly by various alt-right communities (Finlayson, p. 178). Those who "take the red pill" awaken to a new understanding of previously suppressed realities and 'unpalatable truths' (Ibid., p. 174). Though the term "red-pill" is not always explicitly used, the key elements are an appeal to political or ideological conspiracy, accusations of purposeful secrecy or suppression on the part of the 'mainstream' or 'government' and the awakening to, or revelation of the hidden knowledge (Finlayson, p. 179). By revealing conspiracy within the "institutions of education, and systems of communication controlled by cynical and elitist 'universal' intellectuals, [who are] ready to deploy the weapons of censure and censorship" (Finlayson, p. 174), red-pill

rhetoric brings uncertainty under control and refocuses the anxiety of uncertainty into blame. As Tanner and Campaña found during the early days of the COVID-19 pandemic, conspiracy theories on Twitter promote an

> "alternative view that highlights the dangers to liberty posed by the [COVID-19] restrictions as well as their conspiratorial nature (as part of the master plan of a few individuals who are part of the Global World elite) [and] insists on the corrupted nature of the 'traditional' sources of information, thus justifying the need to use alternative sources such as Twitter" (p. 173)

The "control" red-pill rhetoric offers to audiences is the knowledge that they must take back control from the corrupt institutions. The problem, of course, is that red-pill rhetoric only offers an illusion of revelation and control, while preventing audiences from learning the truth about the risks they face.

Firehose of Falsehood

This volume-move is a tactic of modern Russian propaganda described in a 2016 Rand Corporation report: the "firehose of falsehood" (Paul, p. 1), which is comprised of "an unremitting, high-intensity stream of lies, partial truths, and complete fictions spewed forth with tireless aggression to obfuscate the truth and overwhelm and confuse anyone trying to pay attention" (Kakutani, p. 141). In alternative risk, this manifests in a rhetorical piling up of "evidence" on top of "evidence" on top of "evidence" that builds a sense of critical mass for the audience – who could deny so much evidence? – creates confusion, and overwhelms audience attempts to parse the details of what is being said. Fact-checking point after point of these materials is an impossible task for laypersons, and the confidence of the assertions makes it easy for the audience to accept as truthful.

Those that do attempt to fact-check are not directed to specific pages and sections of cited materials, but instead are presented with entire reports, lengthy articles, and uninterpretable scientific data sets. Thus, even if the citations are "real" and "authentic" and legitimately "peer-reviewed", they are presented in a manner that precludes actual consultation by laypersons, leading to potentially greater confusion.

Mis- to Dis-Information

Whereas alt-right communications are frequently identified as "bullshit", or claims made without concern for or attention to their truth value (Frankfurt) in alternative risk, there is a more specific manipulation occurring: using misinformation as raw materials for creating disinformation. I follow the definitions compiled by Cooke that classify *misinformation* as "information that is incomplete [...] uncertain, vague, or ambiguous" (Cooke p. 6) but not necessarily *false,* and *disinformation* as false information that is purposefully created (Ibid., pp.6-7). This is a three-part rhetorical strategy that (1) begins with legitimate source data, then (2) misrepresents that source data through omission or misinterpretation and then (3) creates disinformation by drawing conclusions from its misrepresented data. The source material or evidence for alternative risk is often legitimate, peer reviewed, published, or disseminated from trustworthy institutions, but the campaign will misrepresent the source through omission or misinterpretation. Then the alternative risk will draw new conclusions or make new accusations, creating and circulating what has become entirely false information.

The mis-to-dis strategy is rhetorically effective for a few reasons. First, it provides a seemingly logical pattern of reasoning for the disinformation claims. At first glance, or

without further research, the argument feels sound. Second, the disinformation borrows ethos from its source, taking on the credibility of a well-recognized authority, such as a university, government organisation, or well-known policy/advocacy group. Third, "mis-to-dis" increases the appearance of the author's credibility while simultaneously providing an alibi by which the author can claim an error of interpretation led to a faulty conclusion. This alibi also applies to the source data itself. Just because an alt-right source links to a UN or WHO document, doesn't mean they have provided a way for readers to find the section or claim being referenced.

Strategies of Validation

Strategies of *validation* work to acknowledge existing feelings and beliefs of the audience while also encouraging the audience to believe they are already doing, thinking, or believing the right and truthful thing, and that the discomfort of making changes to conform with a dominant risk staging is not only unnecessary but an infringement of personal autonomy. They are designed to encourage audiences to believe they are right and, paradoxically, that there is nothing wrong, so they are also strategies of comfort and reassurance. Here, the anxieties inflamed by destabilisation are soothed with what Burke would call identification – bringing the audience into "consubstantiation" with that of the alt-right rhetor (Burke, "A Rhetoric", pp. 20-23). Validation strategies include political arguments presented as scientific truth, alternative influence networks, and rhetorical bridging.

Political Arguments presented as Scientific Truths (Finlayson, Hawley)

As Finlayson notes, a feature of alt-right rhetoric is presenting "political arguments [...] as scientific truths which others are too weak or scared to articulate." (p. 170). This move uses the style of scientific facts to articulate non-factual information, or uses language that projects characterizations onto factual information. For example, the Canadian Institute for Health Information reports there were 87,485 "induced abortions" reported in 2021 (CIHI, Setting). "Induced" is a fairly neutral, technical term. But if, instead, the CIHI reported there were 87,485 "allowed foetal murders" reported in 2021, it would be presenting the political argument "abortion is equal to murder" as a scientific truth. Despite its emphasis on a rational mode of facts and data, this move is another appeal to the emotions of the audience. It inflames its audience with highly charged word choices, validates their opinions as empirical truths through quantified data and statistics, and makes its authors seem like "brave, honest, subversive, thinkers unafraid to challenge established power" (Finlayson p. 174).

Alternative Influence Networks

As Salazar notes, "[t]he Alt-Right has succeeded not only in assembling a community of actors and a collective of authors, on the dual territory of digital communication and grass-roots activism, but in shaping a potent and forward-looking fellowship of discourse" (p. 142). This is partly the result of "[s]ubscription and peer-to-peer payment systems [that] enable those lacking institutionalised political or journalistic platforms to earn a living as a grassroots political [influencer]" (Finlayson, p. 168). But as mainstream platforms have started identifying and removing mis- and dis-information content, the alt-right has also developed an alternative ecosystem of digital

communications. For instance, *Rumble* is an alt-right video platform similar to *YouTube.* Rumble's website states, "We are on a mission to protect a free and open internet" ("Our Story"). The company claims that the "recent rise of 'cancel culture' and subjective control over information flow has created an accelerated need for platforms like Rumble who support diverse opinions, authentic expression, and the need for open dialogue" (Ibid.). Indeed, a visit to Rumble's home page indicates it puts few restrictions on its users: amongst the homemade mayonnaise recipes, positive flute music and Minecraft play tips are alt-right propaganda videos such as "DEBATING Ukraine N*zi Supporter - Jackson Hinkle VS Drew Pavlou", "Deep State Treasonous Prostitutes and Other Reasons We Fight w/ Patrick Byrne", and "The Shocking Vaccine Study That Obliterates The COVID Narrative" (Rumble).

The shift to alternative platforms not only provides alt-right content a home on the internet but is one way "the Alt-Right plays with prohibition" (Salazar p. 138), using its status as "rejected" to support the alt-right claim that the mainstream (media, politics and technology) does not fairly represent alt-right actors.

Rhetorical Bridging

As explained by Stephanie Hartzell ("Alt-White"), this rhetorical strategy takes an abstract concept, such as "freedom" or "diversity", that is both idealized and contested: idealized, in that it is held up by society as an important "good", and contested, in that the term has multiple and sometimes conflicting definitions and representations. Freedom, for instance, is easy to approve of, but difficult to pin down, as we see in conflicts over gun control, where gun owners want *freedom to use* guns for sport or wildlife control and gun control advocates want *freedom from gun violence* (McClurg).

Next, the abstract term is defined in a narrow way that serves a specific perspective or ideology. Hartzell's work shows how white nationalist groups do this with the decidedly-not-white-nationalist term "diversity." "Diversity" usually refers to a multi-ethnic and multicultural, heterogeneous society, but Hartzell explains how it is redefined to mean "different homogeneous groups living independently from one another" and deployed in a typical white nationalist message of segregation. At the same time, "these formations of pro-white rhetoric attempt to reason that open affirmations of white pride and pro-white political positions are not necessarily white supremacist but, rather, are justifiable expressions of white racial consciousness for a sociopolitical context in which the argument that *race does not matter* has become an increasingly unjustifiable position" (p. 24) and this alleviates the discomfort mainstream audiences feel with typical pro-white messages. This move is what Hartzell calls a "rhetorical bridge" (p. 24), and it works by substituting the audience's uncomfortable ambivalence about the original abstract concept with a more comfortable ideological version. This method has become a feature of alt-right rhetoric, particularly when targeting mainstream audiences (Hartzell, "Alt-White", p. 23-25)

Alt-right rhetorical strategies are so effective when deployed in risk because they share the same goals: simplifying complex information and communicating it to an audience in a way that motivates the audience to act.

Danger of Alternative Risk

Because it intends to be taken as, and is easily mistaken for, legitimate risk communication, alternative risk is potentially dangerous to our health, economy, security, democracy, and civil society. This potential is increased by social media that make possible rapid, widespread circulation of communication and simultaneous algorithmic curation or "siloing" (Kakutani, p. 117). In this context, alternative risk—like mis- and dis-information in general (e.g. Valenzuela et al., p. 803)—can be difficult to detect because risk is already difficult for laypersons to understand. Alternative risk can be more persuasive than a dominant risk staging because it packs so many 'facts' into its material that it becomes unfalsifiable, because no-one can check all the claims, and because these first two factors make it appear to have amassed a lot of evidence to back up its claims. And it can be more compelling than a dominant risk staging because it validates what people already believe and feel about a risk.

The danger of alternative risk is not simply that people are led to believe things that are false, but that the real, true, and understandable concerns that are seemingly alleviated by alternative risk are not addressed at all. As Cloud explains, this is compounded when counter arguments to alternative risks fixate on fact-checking and debunking lies, which distract from our ability to take up the "kernels of truth" with the honesty and care they deserve: "What a critic would seek in a truth claim is not correspondence to a universally experienced reality. Instead, we might ask whether a claim or set of claims represents the interests of the group being asked to believe in it" (p. 33).

In the following case study of anti-vaccine rhetoric, I show how alt-right rhetorical strategies are deployed within a risk communication structure to create an 'alternative risk' that preys on real risk anxiety but offers no meaningful solution, except membership in a frustrated and motivated group of 'believers.'

Alternative Risk in Canada: An Anti-Vaccine Case Study

Introduction

The constant uncertainty and risk communication that were a feature of life during the developing COVID-19 pandemic brought the concept of "risk" from a background rhythm in our daily lives to a driving drumbeat that couldn't be ignored. What was safe? What was the risk of catching COVID? What was the risk of spreading COVID? And what were all the other risks: of losing our livelihoods, our loved ones, our long-term health or our lives? At my house, we called it COVID-math—dryly joking about the daily "calculus" that had become a fixture of our existence. When vaccines arrived, I couldn't wait to get my "jab" and end the math marathon.

Of course, not everyone felt this way. Where I was worried about transmitting virus to my favourite seniors and anxious about protecting my children from the risk of "long COVID", others were worried about the speed with which the mRNA vaccines had been developed and anxious about the long-term effects of what they saw as a new technology for immunizations. At the time, I remember thinking that those "other people" were doing their COVID-math with the wrong numbers, and that they just needed more information. But when viewed through the lens of Beck's risk society thesis, I see that instead we had accepted different risk-stagings. Where I had accepted a staging in which the central risk was the virus and the (minimal) risks of vaccination

were a welcome trade-off, others had accepted a staging that centred the vaccines as risky and viewed the risk of COVID-19 as minimal. The set of assumptions and parameters in the one staging was not only different, but mostly incompatible with the other set of assumptions and parameters. We weren't just working with different numbers; we were doing different kinds of math.

Accepting and accommodating different stagings of a risk is important because making decisions about risk is a social, political, and collective act – and the collective is comprised of a diverse set of needs, experiences, and challenges. Good stakeholder representation within a risk debate not only ensures that we have a comprehensive understanding of a situation, but also safeguards against economic expediency or systemic biases driving the results (see Scott, Doyle, Kinsella et al., and Mehlenbacher). But this only works when participants, and the stagings they bring to the table, arrive with the good-faith intention of working together. As Gilbert writes, "If you go into a situation believing that you have the truth and can't be wrong, your ability to listen will be greatly diminished. But if you are open, and can include aspects of your dispute partner's position into yours, then you can make much more progress" (Gilbert, p. 86).

In this case study, I examine an online campaign titled *Stop the Shots in Kids,* which does not come to the risk table with good-faith arguments but instead stages the risk of COVID-19 for children as a conspiracy invented by a global elite and enabled by the Government of Canada. First, I identify the campaign materials and a timeline that helps to contextualize its messaging. Then, I analyze the campaign within the framework of alternative risk. My analysis finds that, rather than participating in the risk debate, *Stop the Shots in Kids* rhetorically isolates itself from argument by using alt-right strategies of *ethos*-building, destabilisation and validation to persuade its audience

to reject both COVID-19 vaccinations for their children and vaccine information from Government sources. *Stop the Shots in Kids* is an example of alternative risk that preys on the anxieties of parents and caregivers, exacerbating their fears rather than providing information that helps them make positive decisions for their families.

Context

Risk Communication and COVID-19

In the early days of the pandemic, risk communication scholars emphasized the need for "proper and effective risk communication", arguing that "using social media channels and ensuring an ongoing consistent media presence" (Abrams, p. 1791) was a key tool for effectiveness. But by the summer of 2022, when most provincial public health organisations had significantly scaled back their COVID-19 mitigation efforts, Canadian news broadcasters were focused on the topics of "COVID Fatigue" and "getting back to normal"[17], and the "consistent media presence" Abrams had called for was contributing to "maladaptive coping" (Lewis and Sznitman, p. 207). Indeed, "normal" was the watchword, but communication was a confusing mix of governments reducing mitigation efforts (ending vaccine passport systems and vaccine mandates) while new waves of virus activity grabbed headlines (Nasser and Powers) and various educational institutions outlined their Fall 2022 plans (Ho). In a review of early pandemic risk communications worldwide, Khan et al. found that "[d]iversified and excessive communication of risk and response by multiple stakeholders" contributed to

[17] See, for example, coverage in the Vancouver Sun (Chan and Ruttle).

outcomes of "undue fear, anger, frustration, misinformation, harassment, hatred, violence, and suicides," and labelled this situation an "infodemic." (p. 5). Lowe et al.'s study of Alberta, Nova Scotia and Ontario public health communications in the January 2020 to October 2021 period found that

> "a lack of transparency surrounding evidence and public health decision-making, delays in public health communications, unclear and inconsistent terminology and activities within and across jurisdictions, and communications that did not consider or engage diverse communities' perspectives may have decreased the effectiveness of public health communications and adherence to public health measures" (p. 34)

So it is perhaps not a surprise that by 2022, three years into the pandemic, Canadian news broadcasters were including the questionably effective topics of "pandemic fatigue" and "vaccination fatigue" in their ongoing media coverage. For example, the *National Post* published "Pandemic fatigue makes the case for boosters a hard sell" (Steenhuysen and Lubell), *Global News* asked "Will COVID vaccine fatigue lead to low flu shot uptake?" (Wright), and the CBC ran an article titled "Vaccine fatigue is real. These experts say messaging on COVID boosters should be clear" (Dubois).

It is in this context of low community engagement, high communication volume, frustration and "chronic message fatigue" (Lu, p. 475) that the Canadian Covid Care Alliance launched its *Stop the Shots in Kids* campaign.

Staging a Pandemic in Canada

Across Canada, staging the risk of COVID-19 was a collective effort by federal and provincial governments, public health officials and media. In British Columbia, Dr.

Bonnie Henry became the "the face" of the official staging, making her a public lightning rod for both admiration and ire. Ontario's slickly-branded "Science Table" not only acted as an advisory board to the provincial government but also gave media interviews explaining their recommendations to the public. Scenes of the Canadian Armed Forces assisting Long Term Care homes in Québec made the "emergency" real for viewers across the country. Safety, too, was staged, as news reports and press releases highlighted the relative isolation of the northern territories and the "Maritime bubble" as having protective effects for their citizens. And the staging of COVID-19 was not static, it changed as the pandemic progressed. For example, when Canada's federal public health guidance changed to include mask-wearing by the general public in April 2020, it was a shift to keeping up with the quickly evolving science (PHAC 2020). And when then-Premier Jason Kenny promised Alberta would be "Open for Summer [... and…] open for good" (Bratt p. 73) in 2021, it marked the beginning of a more individualized (Beck, p. 95) approach to the pandemic that would be eventually followed across the country[18].

As vaccines became available, risk staging evolved further to include measures of vaccine "safety and efficacy", side-effects, and risks (both individual and social) of not receiving the vaccine. The risk of not receiving the vaccine became a central staging in Canada, as immunization status became a literal "access card" to many businesses and services during the various "vaccine passport" and "restriction exemption" schemes, and became a condition of employment, not just in the expected workplaces

[18] As rates of COVID-19 declined, or were tracked and reported less, mitigation efforts have become largely the responsibility of individuals: mask-wearing is optional on mass transit, infrastructure-wide improvements in ventilation and air purification have yet to materialize, and programs ensuring access to mitigation tools, such as free rapid antigen test kits, are being wound down by provincial governments. For instance, Ontario decided to end distribution of free COVID-19 test kits on 30 June 2023.

such as hospitals and long term care homes, but across-the-board in the Federal Public Service ("Policy") and at public and private businesses across the country. Thus, immunization status was used to rhetorically construct a group of "the vaccinated", who posed a lower risk to society and were allowed to, for instance, eat in restaurants, and a group of "the unvaccinated", who posed a greater risk to society and could not. The merits and drawbacks of vaccine mandates were debated around the world, but in Canada they were found to be both legal and ethical to impose, and were used by governments at all levels. Vocal opposition to these mandates was central to the infamous Ottawa "Freedom Convoy" protests in February 2022[19], but statistics show that the majority of Canadians were participating in the vaccine program: by 17 July 2022, roughly 80% of the total population had completed the "primary series" of vaccination, and nearly 50% had also received a booster dose ("Vaccination Coverage").

As the "emergency" phase of the pandemic gave way to our current stage of "living with" COVID-19 ("Nunavut's Path"), the vaccine passport systems were retired and the vaccine mandates were dropped. By October 1, 2022, there were no longer vaccination requirements in place at the federal, provincial or territorial level, though some businesses and institutions, particularly those with residential components, continued to include the COVID-19 vaccine on their list of required immunizations.

The 'dominant staging' of the risks outlined in *Stop the Shots in Kids*, is provided by the Government of Canada. On 14 July 2022, Health Canada authorised the Moderna mRNA vaccine (now Spikevax) for use in children from 6 months old to 5 years old. In a

[19] Which blockaded the Parliament district for a month with horn-blaring tractor-trailers and inspired similar blockades at the Windsor, Ontario and Coutts, Alberta border crossings. See "Timeline of the Canada convoy protest" on *Wikipedia* for events and Catharine Tunney's reporting for the CBC on the inquiry into the Emergencies Act that followed the protest.

statement released the next day—around the time *Stop the Shots in Kids* is starting to get going—the Chief Public Health Officer of Canada, Theresa Tam, wrote that "COVID-19 vaccination is now expanded to include all people in Canada over the age of 6 months and without contraindication" (PHAC 15 July 2022). The statement is also careful to note that the Public Health Agency of Canada (PHAC) intends to "continue to support children and caregivers in making informed decisions" about the COVID-19 vaccine (Ibid.). At this time, 2nd booster doses for adults were beginning to be available to the general population. Data from PHAC on vaccine coverage as of 17 July 2022 indicated that 83.89% of Canadian children aged 12-17 had completed the two-dose series of vaccines, as had 42.44% of 5 to 11-year-olds (PHAC 22 July 2022).

The government's staging of the vaccines emphasized the risks of COVID-19 and protective benefits of vaccination. It also responded to common misinformation with additional materials. For instance, one common concern was that mRNA vaccinations could alter a recipient's DNA. The image in Figure 2 from the Government of Canada website was deployed as part of the social media messaging:

Figure 2 "COVID-19: Social Media", Government of Canada

These materials contain information that was shared directly online, broadcast on television and radio, and posted to Canada's various social media channels. The materials in this campaign reflect the "dominant" staging of the pandemic, not just because they came from a government source, but because the campaign dominated the range of information access points.

Alternative Risk: *Stop the Shots in Kids*

Anti-Vaccine Canada

The anti-vaccine stance has existed for as long as vaccines have existed. As Lachman recounts, when the first smallpox vaccination (using the cowpox virus) became widespread in the early eighteenth century,

> "it gave rise to considerable opposition, which persisted throughout the nineteenth and first half of the twentieth century. A contemporary cartoon by Gilray [see Figure 3] shows vaccinated subjects sprouting bovine parts, a sort of opposition that has strong overtones of the reaction in our own time against genetically modified food. However, smallpox was a much feared disease, and in spite of opposition, the use of vaccination became standard practice throughout the world" (p. 91-92)

Figure 3 "The Cow-Pock", Gilray, 1802

No vaccine has ever had 100% uptake – there has always been skepticism, hesitancy, apathy, and straight-up distrust. But in spite of consistent opposition, vaccines have also had enough uptake to result in drastic population-level reductions or eradication of the diseases they target (Lachman, p. 93). Many of these diseases, such as polio, whooping cough (pertussis), measles, and mumps, were particularly dangerous for infants and children (Lachman, p. 94-95). The childhood vaccination protocols that allowed children to develop immune responses to diseases they had yet to encounter led to "substantial improvements in child mortality rates" (McGovern and Canning, p. 791) and the overall health of Canada's children. School immunization policies in Ontario and New Brunswick are credited with making vaccines a normative part of children's medical care in those provinces, but it became a routine practice nation-wide,

despite the lack of a federal mandate (Ogrodnik, 2013)[20]. When the COVID-19 vaccines were approved for use in children, there was talk of requiring them for school attendance[21], but this did not happen anywhere in Canada (Wong), which may have been at least partly due to the vocal conflict over the COVID-19 vaccines in general[22].

Modern anti-vaccine activism in Canada stems from organizations such as the Committee Against Compulsory Vaccination, which began in 1980s Ontario in response to the introduction of mandatory school vaccinations with the *Immunization of School Pupils Act* of 1982. This group successfully lobbied the government to allow religious or conscience exemptions. Today's anti-vaccine activism includes groups like Vaccine Choice Canada and CLEAR, who respectively claim to be "protecting informed consent" and revealing the "COVID-19 Communist takeover scam".

Canadian Covid Care Alliance

This has somewhat murky origins, but it seems that doctors and scientists in Ontario and British Columbia, came together mid-2021 and found support from pre-existing groups such as Canadian Frontline Nurses and the Freedom Convoy here in Canada, as well as from Front-Line Covid-19 Critical Care Alliance (FLCCCA) out of the United States. Dr. Byram Bridle, an associate professor at the University of Guelph, was the first to appear on the CCCA website, followed by Dr. Bonnie Mallard (also University of Guelph, veterinary immunology), Dr. Steven Pelech (University of British Columbia,

[20] This is based on the fact that the public health websites for each province and territory provide information on their immunization "schedules" or provide a list of 'routine immunizations'. *cite
[21] This was mostly in Ontario, where there is both a long list of childhood vaccines, an in-school vaccination programme, as well as a history of contested vaccine exemption rules..
[22] I did find a report of a private school in Winnipeg that made vaccination mandatory for children aged 12 and up in 2022, but this was not mandated by government at any level. See Sarah Petz' on CBC News.

neurology), Dr. Eric Payne (former paediatric doctor with Alberta Health Services), Dr. Julie Ponesse (an ethicist formerly based at Western University), and data analyst Deana McLeod.

Timeline

To determine a timeline for the *Stop the Shots in Kids* campaign, I used archived web crawls from Internet Archive's *Wayback Machine.* The CCCA's main website page is first saved to the Internet Archive on 21 May 2021, and it redirects to a newsletter subscription landing page with a "coming soon" message. By 03 June 2021, a CCCA website has launched. At first, the only content is a "Parent info guide" PDF about the COVID-19 vaccines, attributed to Dr. Byram W. Bridle. Although it purports to inform parents about the COVID-19 vaccines, the guide is less about "information" than it is about persuasion: the document is essentially a list of reasons to avoid the vaccines. Fast-forward to June 2022, and CCCA is hosting a web-event called "The Citizen's Hearing", which is designed to discuss and protest government-implemented COVID-19 mitigation protocols.

By the time the *Stop the Shots in Kids* campaign gets going, there have been many blog posts and videos regarding children, COVID-19 and the mRNA vaccines. The campaign is first archived as appearing on the CCCA website on 15 July 2022. At this stage it only contained the core items: Introductory video, Parent's Brochure, and an "Ask the Expert" video featuring Dr. Eric Payne. Later, the CCCA added more "Ask the Expert" videos and links to other vlogs and podcasts where they have been featured or interviewed. By 29 September 2022, the main PDF presentation has also been posted in French and Spanish translations. On 25 October 2022, the archive shows the CCCA has

updated its home page to feature a new resource rather than the *Stop the Shots in Kids* campaign, which is now "below the fold", such that users must scroll down to view it. However, the "Letter to Healthcare Professionals" is not added until 27 October 2022, so at this point we can still consider the campaign as "active."

As of writing (June 2023), the *Stop the Shots in Kids* campaign is still accessible on the CCCA website. It is what marketers call an "evergreen" campaign, in that all of the content remains accessible to curious website visitors and newer related content is linked in at the bottom of the page using generic blog tools and plugins.

On social channels, the CCCA has been active on Twitter since June 2021 (@CCCAlliance), and at one point had an Instagram account that now returns an error message[23]. The CCCA's Twitter feed promoted the *Stop the Shots in Kids* campaign, but not with additional content, rather it repurposed the slides, images, and content from the main campaign materials. However, the frequency of *Stop the Shots in Kids* tweets and re-tweets can be combined with the website data from Internet Archive to define a campaign period from mid-July to early November, 2022[24] (See Figure 4, Twitter posts by topic, and Appendix C for the data). While the web archives suggest *Stop the Shots in Kids* was a lower priority as of mid-October, Twitter data shows the CCCA was still actively tweeting about it until early November.

[23] There is also a Facebook page attributed to the group, but it looks to be a "troll" account run by a user with the handle "VP Colbourne" that mostly contains pro-vaccine content and a lot of arguing in the comments of each post. See https://www.facebook.com/groups/canadiancovidcarealliance/ (Accessed: 20 May 2023).

[24] At this point, the CCCA begins to tweet increasingly about vaccine injury and Canada's COVID-19 response and tapers off tweeting about the *Stop the Shots in Kids* campaign. For my analysis, I have identified the campaign as running between 13 July and 07 November.

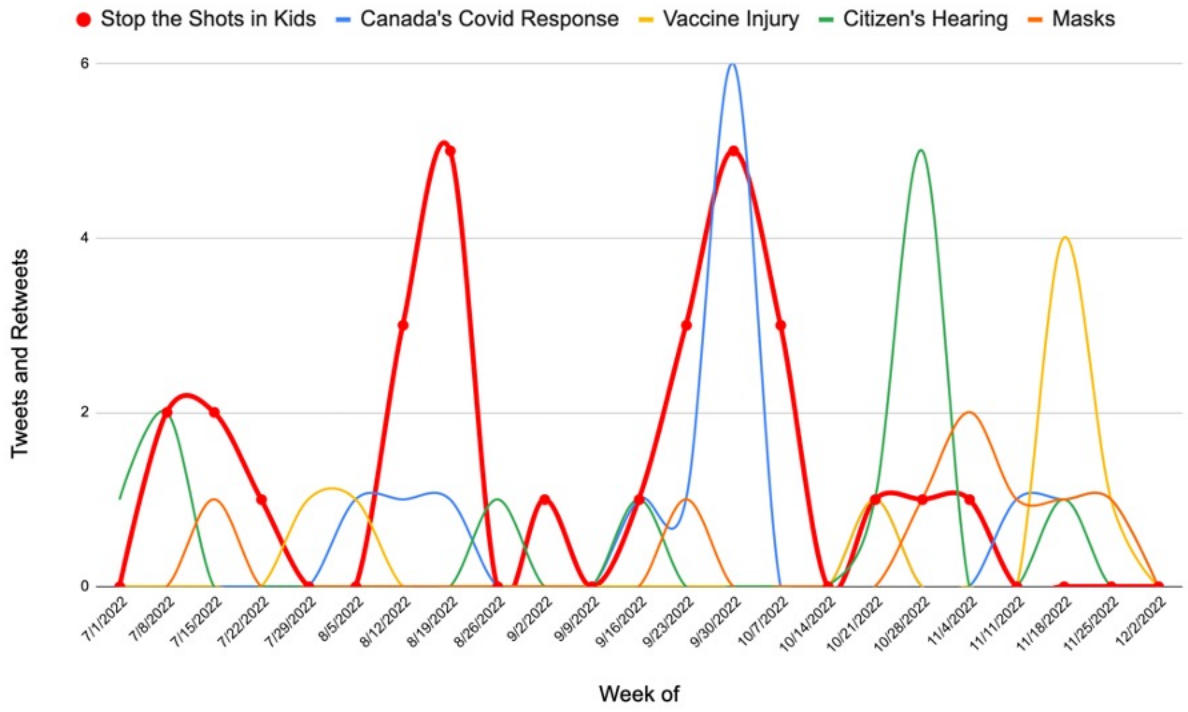

Figure 4 Twitter posts by topic

While an analysis of audience uptake and circulation is beyond the scope of this thesis, the following analytic statistics provide a basic understanding of the size of the CCCA's audience, potential influence, and help us situate them within the landscape of Canadian anti-vaccine arguments. The CCCA hosts many of its videos on the video platform Rumble[25]. As of May 30th 2023 the main campaign video, "It's Time To Stop the Shots" (see Appendix B), has been viewed 160,000 times, and the CCCA Rumble account has 9.42 thousand Followers. On Twitter, the CCCA account has 17.6 thousand followers. Although viral marketing research has shown that follower counts is not a reliable proxy for the real influence of a social media account (Cho et al., p. 8 of 8), it does indicate the potential audience size. For the purposes of this research, I use

[25] See more on Rumble in the "Alternative Influence Networks" section starting on page 36.

follower and video view data to provide a relative measure of potential influence. Thus, we can determine that (as of June 2023) the CCCA's Twitter account is nowhere near Health Canada's nearly 450,000 followers or alt-right media company Rebel Media's roughly 520,000 followers. However, the CCCA has more followers than either the Freedom Convoy 2022 (13,000) or Canadian Frontline Nurses (12,500), groups that mobilized the large Ottawa "Freedom Convoy" protests in February 2022, several months ahead of the *Stop the Shots in Kids* campaign. And the CCCA has nearly the same number of followers as Vaccine Choice Canada (@VaccineChoiceCA), a long-established anti-vaccine group that has roughly 18, 200 followers as of June 2023, but has been around for over 40 years. These data suggest that the CCCA website audience is participating in the broader anti-COVID discourse surrounding the COVID-19 vaccines. Although it cannot be credited with the same kind of influence as Rebel Media, it is in line with other anti-vaccine and anti-COVID groups in Canada.

Campaign Summary: *Stop the Shots in Kids*

Assets

Stop the Shots in Kids has its home on the CCCA website, but it was also supported by social media marketing on Twitter. Since the social media posts simply repurpose the content from the website and documents, I have limited my analysis to the web materials. See Appendix B for reproductions of the PDF slideshow, Parent's Brochure, the letters, and a table of "Other Campaign Assets" to which I refer in my discussion. In the interest of space, assets hosted on external platforms (e.x., Rumble) have not been reproduced in the Appendix.

Table 1 Core Campaign Assets[26]	
Video	"It's Time to Stop the Shots"
This video is a PowerPoint presentation with voiceover that reads the text of the slides but does not say anything other than what is written in the visible text. It has a nearly 15-minute runtime, and is hosted on Rumble, but embedded on the CCCA website. See Appendix B for a screenshot and the video descriptions from Rumble and the CCCA website.	
PDF	"It's Time to Stop the Shots"
This document is a PDF copy of the slides in the above video. For easier reference, I will cite the text of the CCCA material from this document rather than the video in my analysis.	
PDF	"Parent's Brochure"
A one-page, letter-sized flyer with basic campaign information, lots of pictures and graphical elements. It is very slick and professional, except that it is full of information and looks a little crowded and chaotic.	
PDF	"Letter to Health Officials"
An open letter to "Health Officials" requesting that COVID vaccines be stopped, and providing "evidence" of the harms they cause to children.	

[26] All the CCCA-branded materials (except the Q&A videos) are available in English, French and Spanish. All versions look the same, but translation is beyond the scope of this project so I only analysed the English versions, though I am still curious to know if the content is the same or different.

PDF	"Letter to Healthcare Professionals
This is a form letter for patients to give to their doctors/nurse practitioners asking them to be skeptical of the dominant staging of the COVID 19 vaccines.	

Many of these assets were linked to by on the CCCA Twitter feed during the campaign period and circulated across the CCCA network. In this study, I will use the core campaign assets as my main texts for analysis, as they contain most of the campaign's key messages and rhetorical moves. However, I will refer to other content where needed to explain how the campaign operates as alternative risk.

Diagnosis: *Stop the Shots in Kids* is Alternative Risk

Stop the Shots in Kids effectively deploys the stylistic features of risk communication to create a campaign that persuades through authoritative authorship and professional polish. This is accomplished through successful use of text, graphics, and video, as well as conforming to genre expectations.

Figure 5 CCCA Logo

Their organizational "brand" is professional and consistent, just like a legitimate healthcare organization. The name, "Canadian Covid Care Alliance" sounds like other healthcare advocacy and policy groups. Their logo (see Figure 5) echoes the classic

medical symbol (the caduceus) with staff surrounded by two twisting snakes, and the line drawing of the maple leaf reinforces the "Canadian" in the name and echoes the government of Canada's symbol. Their brand uses a simple blue, white and red colour scheme and their graphics are high quality, without graphic noise or pixelation. They establish authority with references to their members[27], using size, "over 600 healthcare professionals", and status, listing specialist credentials, to build their ethos and construct themselves as a group to take seriously.

Risk Frame

The campaign follows the risk frame structure and conventions of risk communication. It *predicts* by identifying the risks of COVID-19 and the mRNA vaccines and well as implying other risks, such as threats to the doctor-patient relationship and a government curtailment of "free and open scientific discourse" ("It's Time", p.3). It *assesses* by judging that the COVID-19 vaccines are "[r]eally gene therapy that has been inadequately tested and is unnecessary, as well as ineffective, unsafe, and potentially fatal" (Ibid., p. 29), that vaccines are a money-grab by "Big Pharma" that targets healthy people (Ibid., p. 31), that the government is colluding with media and pharmaceutical companies to "generate fear" that will sell more vaccines (Ibid., p. 31), and that this is in fact part of a larger global conspiracy involving the World Health Organization and the Gates Foundation (Ibid., p. 31) that has led to the silencing of doctors who "have sworn to protect us from harm" (Ibid., p. 38). Finally, the campaign asks us to *manage* these risks through collective action against the government. This "action" is couched in

[27] As of June 2023, the CCCA lists their "Science and Medical Advisory Committee (SMAC)" members on their main website, but in July 2022, they only provided a list of the credentials their members held.

lightly militaristic terms like “stand together” and “we are our children’s last line of defense” (Ibid., p. 38).

Counter-Staging

The CCCA casts themselves as a group of ‘experts’ participating in the risk discourse. There is an emphasis on phrases like “evidence based” and “following the science”. They tend to use medical and science jargon, with a reliance on immunology terms and data. They provide copious citations and links to published studies and official government and industry documents. However, many of the references the CCCA cites do not support their claims, or the citation fails to indicate how or where to find the relevant information.

The CCCA-developed materials are either attributed to a group of specific CCCA “experts” or not attributed to any author at all. These experts come from different backgrounds: some are medical scientists and physicians. Two of the most prominently featured experts, Dr. Bonnie Mallard and Dr. Byram Bridle, are professors at the University of Guelph *Veterinary* College. Still others are in health data analysis and marketing. While they certainly have expertise in their areas, that expertise is not domain-specific for childhood vaccines.

At first glance, the main claims in *Stop the Shots in Kids* seem suspect, such as the notion that children do not benefit from immunization. And indeed, fact-checking *Stop the Shots in Kids* reveals it to be full of mis- and dis-information. In “It’s Time to Stop the Shots [PDF]”, they wrongly suggest that mRNA vaccines are “actually gene therapy” (p. 10), that they used “lipid nanoparticles that weren’t properly purified for use in humans” (p. 11 and p. 20), that “The majority of kids have already conquered COVID-

19" (p. 14), that "use was supported by unreliable science" (p. 15), that "COVID-19 injections are of little to no benefit in children" (p. 17), that "these vaccines cannot stop the spread of disease" because "transmission was never studied in any of the clinical trials" (p. 19), and that the mRNA vaccines "caused more sickness with each dose" (p. 24). On page 35 of this same document, they liken the government procurement of COVID-19 vaccines to the approval of OxyContin, suggesting that PHAC has fallen for the same hard-selling and data-hiding tactics that precipitated North America's opioid crisis.

The alternative "covid treatment protocols", which the CCCA suggests as better options to vaccination, include Ivermectin, which has been shown to be ineffective (see Popp et al.), or prevention with antioxidant supplements like quercetin, which scientists think have the potential to help prevent viral infections but have not yet studied for this application and also have the potential to interfere with antiviral medications (Imran et al., p. 1). At best, these are useless recommendations, but at worst they are potentially harmful.

Because it reconceptualizes the risk of COVID-19 and the mRNA vaccines, *Stop the Shots in Kids* can be classified as a risk staging that engages in a sub-politics of counter-expertise, setting its group of "independent Canadian doctors, scientists, and health care practitioners" ("It's Time", p. 2) against the experts of PHAC and provincial/territorial public health authorities. This campaign takes an explicitly hostile position in relation to the dominant staging from the Government of Canada. It rejects the data and communication provided by PHAC and the Government of Canada as incomplete and inaccurate. But rather than working to improve and update the dominant staging, the CCCA holds these accusations up as "proof" of government

incompetence and corruption, implicating PHAC in a global COVID-19 conspiracy driven by "Big Pharma" profiteering ("It's Time", p. 31-34), in a move that violates the basic argumentative "standards of reasonableness" (van Eemeren, p. 669).

Stop the Shots in Kids is a comprehensive risk staging with a clear opposition and overt hostility to the dominant COVID-19 risk staging from the Canadian Government. Yet the substance of this opposition does not match the clarity of its claim. A minimal amount of fact-checking reveals that *Stop the Shots in Kids* is not an "evidence-based" campaign, but a confusion-based campaign that overwhelms concerned parents with worry-inducing mis-information that distorts the truth and prey on the uncertainty parents had (and still have) about COVID-19 vaccinations for their children. The timing of this campaign, just as the 6 months to 5 years old group was approved for COVID-19 vaccines, can only have intensified its effect. Indeed, *Stop the Shots in Kids* is a clear case of "alternative risk" in that it engages the form and style of risk communication, and the conceptual form of the risk frame to reject dominant staging and preclude debate.

Alt-right Rhetorical Strategies in *Stop the Shots in Kids*

In this section, I explain how this campaign makes use of alt-right rhetorical strategies to persuade audiences to accept this mis- and dis-information-riddled campaign as valid risk communication. Strategies of *ethos building* help the CCCA build itself as a vaccine "authority". Strategies of *destabilisation* help the CCCA distance itself from the truth without appearing to be lying directly. And strategies of *validation* help the CCCA pathotically connect with their audience by enabling and empowering their fears and anxiety.

Strategies of ethos-building

Reflexive Iconoclasm

As Finlayson explains, reflexive iconoclasm is a contradictory move in which a rhetor establishes authority with traditional credentials and past institutional affiliations while at the same time rejecting these institution(s) as no longer authoritative. The CCCA makes subtle use of this rhetorical strategy by constructing a set of "*independent* Canadian doctors, scientists, and health care practitioners" ("It's Time", p. 2; italics mine). This identity statement establishes the CCCA's authority as conventionally respected professionals with relevant expertise and implies a history of traditional education. At the same time, the statement sets their group apart from the established medical and scientific community with the adjective "independent".

The kind of independence – intellectual, monetary, or otherwise – is not specified. Are these simply physicians and researchers at private clinics and corporations? The most prominently featured "experts" in *Stop the Shots in Kids* are part of the Canadian medical and scientific establishment[28]. Regardless, "independent" seems to connote a positive effect that enhances the CCCA. But by invoking this group identity, the CCCA also constructs a group of "non-independent" medical and scientific professionals who lack this positive quality, and may not be "committed to providing top-quality and balanced evidence-based information to the Canadian public about COVID-19" (Canadian Covid Care Alliance). Indeed this identity statement doesn't just separate the CCCA from established medical and scientific community, but it

[28]See "Canadian Covid Care Alliance" p. 49.

characterizes it, suggesting the conflicts of interest and failures of objectivity are typical of a professional or institutional dependence.

This separation features repeatedly in *Stop the Shots in Kids*. In "Letter to Health Care Professionals" (see Appendix B), the CCCA calls themselves "The Specialists at the CCCA" and claims to have "conducted a clinical risk benefit analysis on use of COVID-19 vaccines in children". They invite readers to "take the time to engage more deeply with the data prior to recommending use of these vaccines in healthy children" and join "a growing number of health care practitioners seeking to independently evaluate this data". Like the identity statement on their website, this letter both invokes authority of the medical establishment that has credentialed the CCCA's "specialists" and also rejects the actions of the non-independent health officials who follow the dominant staging.

Other appeals to the authority of the medical system are sprinkled throughout the campaign (see Appendix B). These include specifying the disciplines of letter signatories, such as "immunologist", "vaccinologist", and "evidence-based methodologists"; referencing research from established scientific authorities, such as the US-based Centre for Disease Control[29]; and using medical jargon without explanation, in terms like "antigenic imprinting", "antibody-dependent enhanced disease".

Rejections of the establishment are found in repeated references to the CCCA as an "independent" group that exists outside of the system and in the rejection of Health Canada's approval of the mRNA vaccines for use in children 6-months and older as unnecessary and potentially harmful (see Appendix B, "Letter to Health Officials").

[29] But, as an alternative risk publication, the CCCA predictably misinterprets this guidance. Far from recommending a pause on vaccinations, the CDC guidance they reference suggests "Public health efforts need to continue to promote up-to-date vaccination for everyone." (Massetti et al., para 2.)

Their claim of having "conducted an independent review" implies that Health Canada's systems for ensuring vaccine safety are no longer effective, and, indeed, the entire *Stop the Shots in Kids* campaign indicts Health Canada's decision to approve the mRNA vaccines in the first place.

Appeal to tradition

The CCCA is careful to emphasize that they are a group of medical professionals and established experts. The caption under the main *Stop the Shots in Kids* video reads: "This 15-minute video is prepared by the medical experts at the CCCA, which includes pediatricians, immunologists, and vaccinologists. It summarizes the evidence in everyday language to help parents make an informed choice on whether or not to give their children a COVID-19 genetic vaccine" ("Stop the" 2022). This mounts appeals to a traditional scenario in which expert scientists relay information to an accepting public, and to a medical tradition of tightly defined specializations of expertise, such as "vaccinologists". "It's Time to Stop the Shots [PDF]" mounts several further appeals to what the CCCA seems to see as a "medical tradition", referring to the Hippocratic oath (p. 5), "doctor-patient relationship" (p. 3), and "routine vaccinations" (p. 6). Repeated appeals to the goodness and safety of the medical *tradition* suggests that medical *innovation* (read: the mRNA vaccines) is unsafe and reckless.

"Tradition" here takes a few forms. The ancient history of western medicine is invoked by the Hippocratic oath. The emphasis on "established" interventions suggests that the best medicine is the medicine that has been around longest, extending the "ancient" idea. And the appeals to "precautionary" and "individualized" connote a

nostalgia for old technology that was "built right" that opposes today's "move fast and break things" approach.

Persecution

The CCCA assigns themselves a role as "advocates" who have been "silenced for speaking out" ("It's Time", p. 37). They claim that "many health professionals have been forbidden by their colleges to speak out against covid-19 policy" but that "many brave doctors have defied these orders and attempted to alert parents to the dangers associated with these shots" (Ibid.). This move enhances the ethos of the CCCA by aligning them with the 'brave doctors' and by assigning themselves to the role of saviour: the CCCA is rescuing Canadians from the ignorance purposefully created by corrupt public health officials and governments and from the unfair treatment created by vaccine mandates.

It also continues what became an alt-right rhetorical theme: "the unvaccinated" were being persecuted by the government. Invoking this theme in *Stop the Shots in Kids* constructs the CCCA as a proxy for an audience of everyday people who are part of the group who is being silenced. It works with red-pill rhetoric to induct audiences into membership in a group who knows a truth that the establishment doesn't want revealed.

Strategies of destabilisation

Red-Pill Rhetoric

Red-pill rhetoric is a move that combines the reveal of suppressed knowledge with blaming an institution or other entity for concealing that knowledge (Finlayson, p. 178-180). This is the primary rhetorical move in *Stop the Shots in Kids* – the campaign is entirely devoted to revealing "the facts" about COVID-19 and mRNA vaccines that they claim have been suppressed by the Government of Canada, the Pfizer biomedical company and other global authorities. The "Q&A" videos each tackle a separate vaccine issue and provide a condemnation of the dominant staging. Take, for example, the description accompanying the video "Are the COVID-19 vaccines safe and effective in children?" which reads:

> "In our "Ask the Experts" video series, Deanna McLeod provides an analysis of the clinical trial data Pfizer used to determine the safety and efficacy of the COVID-19 genetic vaccines in children. The data shows these products cause more harm than good. Her conclusion is that it is time to Stop the Shots.
>
> Deanna McLeod is the principal and founder of Kaleidoscope Strategic, an independent medical research firm that supports Canadian clinicians in preparing world-class evidence-based reviews that advance patient care nationally and internationally. She is also Chair of the Strategic Advisory Committee at Canadian COVID Care Alliance, an independent association of 650 doctors, scientists, and other healthcare professionals dedicated to educating and

empowering Canadians with quality, balanced, science-based information about Covid-19."

This description constructs Deanna McLeod as a member of the "independent experts" who are were educated in the "establishment" but now consider it suspicious; it reveals new knowledge about the Pfizer mRNA vaccine clinical trials; it blames Pfizer for corrupt data practices; and it blames the government for being either too incompetent to understand the data or corrupt enough to purposefully keep information from the public. It also invites the audience to simultaneously identify with the role of *victim*, having been duped by the government, and to take up the mantle of *whistleblower*, sharing the truth and condemning the global forces suppressing said truth.

In "It's Time to Stop the Shots" (video and PDF), the CCCA repeats this same information, but with a different structure. Here it takes the form of a call-and-answer style series of rhetorical questions that are immediately answered with the new "facts" that reveal the vaccines as both ineffective and harmful for children. The first question, "But what if these vaccines weren't like other pediatric vaccines? What if…" is answered by the titles of the next eighteen pages of the document: "They are effectively gene therapy"; "They weren't properly made and tested"; "Your child didn't need them"; "Use was supported by unreliable science"; and on it goes. Each page provides charts and numbers to illustrate the "real" data and accompanying commentary, building to a "final reveal" that COVID-19 vaccines are a global conspiracy to boost profits for Pfizer and its board members.

Firehose of Falsehood

Stop the Shots in Kids makes rhetorical use of volume, piling "evidence" on top of "evidence" on top of "evidence". This does two things. First, it builds a sense of critical mass for the audience, making it seem like the claims have widespread support. And second, it confuses the audience and overwhelms attempts to parse the details of what is being said. It is difficult to disagree in the face of so much data. Fact-checking point after point in such dense material is an impossible task for most people, and the confidence with which the CCCA presents its assertions makes them even more persuasive. But even those who do attempt to fact-check the evidence in the campaign may be overwhelmed by the task. Unlike an established scientific or medical document, the CCCA doesn't follow the rigorous and ethical citation and credit-giving standards expected of an expert contribution, standards designed to help readers find the relevant phrase, line, or topic within the cited source. Instead, readers find themselves presented with full reports, lengthy articles, uninterpretable data sets, and no way to find what they are looking for. Thus, even if the citations are legitimate, they are presented in a manner that prevents meaningful consultation by anyone, leading to potentially greater confusion.

The confusion, as Kakutani explains, is the point. The "firehose of falsehood" (Paul and Matthews, p. 1) is a tactic designed "to obfuscate the truth and overwhelm and confuse anyone trying to pay attention" (Kakutani, p. 141). The firehose is overwhelming, but that is what makes it so effective at creating fatigue, and wearing down disagreement. It also takes advantage of what linguists call the "iconic principle of quantity", which is "our tendency to equate more form with more meaning" (Dirven

and Verspoor, p. 11)– the more we say something, the more important or meaningful we perceive it to be.

Mis- to Dis-Information

Alternative risk further destabilizes truth by using misinformation as a basis for disinformation. This strategy starts with legitimate source data, which is then misrepresented through omission or misinterpretation, and then used to manufacture and justify disinformation.

The mis-to-dis strategy provides a seemingly logical pattern of reasoning for the disinformation claims, increases the authority of the disinformation, and boosts the credibility of the disinformation's author while at the same time providing an alibi by which the author can claim an error of interpretation led to a faulty conclusion. For example, *Stop the Shots in Kids* frequently cites materials from the US Centres for Disease Control and Prevention (CDC) and from articles published by the National Institute of Health (NIH) on the topic of the mRNA vaccines. These well-respected sources lend their significant authority to the claims of the campaign when they are invoked by the CCCA. Next, the authors misinterpret the "genetic" aspect of mRNA vaccines to mean that Pfizer BioNtech and Moderna's vaccines are in fact a type of "gene therapy" (see Figure 6, "It's Time", p. 10). Although the vaccines do contain genetic information (in the form of mRNA), they do not affect the recipient's DNA, which is what gene therapy does (Reuters, pars. 1-6).

Finally, the CCCA manufactures and circulates false information based on their misrepresentation of "gene therapy". They conclude that the mRNA vaccines were not

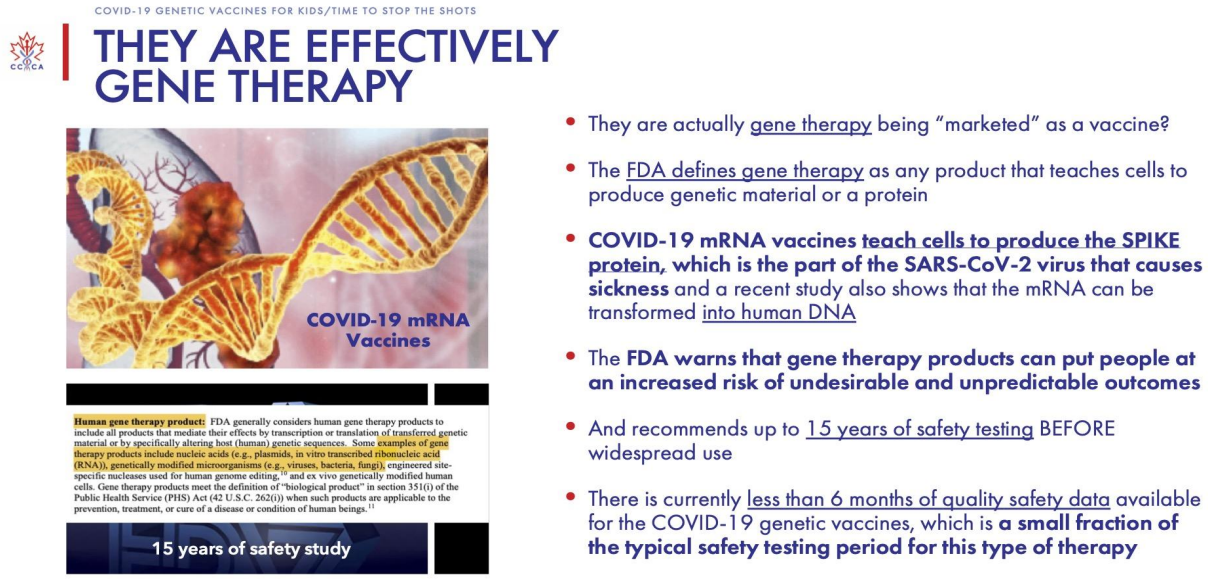

Figure 6 It's Time to Stop the Shots in Kids (PDF) p. 10

adequately tested, because "[t]he FDA warns that gene therapy products can put people at an increased risk of undesirable and unpredictable outcomes [and] recommends up to 15 years of safety testing BEFORE widespread use" ("It's Time", p. 10, caps in original).

This claim turns a misrepresentation of the truth into disinformation, moving from the ambiguous difference between an mRNA vaccine and gene therapy to claim specific regulatory infractions have been committed, permitted, and suppressed by authorities. It is effective in part because it triggers an emotional response in its audience and immediately provides a scapegoat. But it is also effective because of its impression of logical conclusions. This rhetorical move provides a satisfying resolution to the ambiguity it introduces.

Strategies of validation

Political Arguments Presented as Scientific Truths

The main argument in this campaign joins in the political debate about finding the balance between personal freedom and protecting society. This is a fundamental question in a democracy–What do we owe one another? –one that was reanimated around the world during the pandemic.

Across their different content topics, the CCCA advocates the position that personal freedom is paramount, and so COVID-19 vaccinations should not be mandatory[30]. In *Stop the Shots in Kids,* this argument is taken to its next step with a call to end the vaccination program in children. But this next step undermines the personal freedom the CCCA claims to advocate for by calling to end all paediatric COVID-19 vaccines rather than supporting parent choice. This irony notwithstanding, engagement with this important political issue by groups like the CCCA has the potential to invite participation in political risk deliberations from Canadians who worry about vaccines. Participation and engagement matter because this issue cannot be decided by science alone. From a purely scientific perspective, the only allowable exemption to a vaccine would be a medical contraindication. But from a democratic perspective, allowable exemptions must also consider religious, cultural and personal beliefs and balance these against the responsibility or duty of parents to ensure their children are reasonably protected from dangerous illnesses.

[30] Vaccine mandates were a significant topic on the CCCA website and Twitter feed in the July - November 2022 period I investigated. See Figure 4 and Appendix C, Twitter Data; The mandates fall under the category "Canadian Covid Response".

To reiterate, the CCCA's group of "independents" *could* be engaging in this debate and helping their audience more fully understand the situation. In fact, this is what they claim to offer. But the key terms here are "debate" and "decide" and "balance", all concepts that rely on parties who come to the table to argue in good faith: to hear others, to consider evidence and to maybe be persuaded into a different point of view. Sadly, the CCCA fails their audience on this front. Instead of engaging in good-faith debate about a policy that strikes the right balance between personal choice and public safety, the CCCA's materials obfuscate and confuse with misrepresented statistics and disinformation that bury their political arguments under a veil of "science-y" rhetoric. Table 3, lists the underlying political arguments and pairs with the "scientific truths" stated in *Stop the Shots in Kids*. Not only are these political arguments misrepresented as facts, but these "truths" are further misinformation. For instance, the claim that "natural immunity is the gold standard" in the "Letter to Health Officials" (See Appendix B) is directly contradicted by the CDC guidance they cite in their "Letter to Healthcare Professionals" (Appendix B), which that states the "emerging evidence suggests that vaccination before infection also provides some protection against post-COVID-19 conditions, and that vaccination among persons with post-COVID-19 conditions might help reduce their symptoms" (Massetti et al.). Instead, this argument about "natural immunity" is political: it is a preference and argument that "natural" is better and safer than "medical." By folding this argument into a scientific claim of "gold standard", the CCCA rhetorically equates preferences with facts and leaves their audience without the crucial risk info they actually need.

Table 2 Political arguments presented as scientific truth

Political Argument	**Presentation as Scientific Truth**
Natural is better and safer than medical or technological interventions.	"What is even more concerning is that the benefits of the COVID-19 genetic vaccines are short-lived, while children's naturally acquired immunity is robust and long-lasting." ("It's Time", p. 20)
Parents should have the last word on medical care for their children.	Children have "very low risk of severe outcomes from COVID-19" ("Letter to Healthcare Professionals", p. 1)
	"What if your child didn't even need these injections because: Healthy children are not easily infected by SARS-CoV-2 as they have low levels of viral receptors in their airways. And strong innate immune systems that are capable of stopping the virus in its tracks. As a result they experience only mild symptoms or no symptoms at all. And are at a very low risk of experiencing severe illness. And because they clear the virus so efficiently,

	they are much less contagious than adults." ("It's Time" p. 12)
Vaccination should be voluntary and not mandated.	There is a "lack of effectiveness data for the BA.1 and BA.4/5 bivalent vaccines on currently circulating BA.4/5 variants and lack of safety data on use of these boosters in children 18 years of age or younger." ("Letter to Healthcare Professionals", p. 1)
	The mRNA vaccines "weren't properly made and tested [...] they just skipped yeast of extensive safety testing in animals that is usually completed to ensure safety before use in humans. And then used a lesser manufacturing process that knowingly produced a lower quality product." ("It's Time", p. 11)

Alternative Influence Networks

The CCCA is part of an "alternative influence network" within the alt-right (see Finlayson, who follows Lewis). Both their videos and featured podcasts can be found on the content platform Rumble, a well-known alt-right platform. Rumble facilitates the

CCCA's alternative influence network even as they continue to have a presence on mainstream platforms such as Twitter. It shares a list of "affiliates" on its home page, displaying a rotating list of logos that represent global alternative-treatment groups British Ivermectin Recommendation Development (operating in the UK), IppocrateOrg (domain registered in to an address in Mauritius), and Alliance for Natural Health International, policy-focused groups such as covexit.com, Doctors for Covid Ethics and Coalition for Informed Consent. Other affiliates, such as the Mama Bears Project and Mounties for Freedom are offshoots of the alt-right group Police On Guard for Thee[31].

The deeper into the CCCA website one travels, the more nodes of this alternative network are revealed. As part of the *Stop the Shots in Kids* campaign, the CCCA features episodes of the podcasts "Open Mike with Michael Thiessen" and "Trish Wood is Critical" that include interviews with CCCA member Deanna McLeod. Ads during "Open Mike" promote ads Redballoon, an alternative job service that claims to help workers "Find a job that respects your values." On its website, Redballoon mentions a new "parallel economy" and "alternative economy" being built by "a new kind of American hero" where "a new kind of workplace is emerging. Employees are rediscovering the joy of work. Employers are pioneering new businesses that prioritize freedom."(cite Redballoon) Like the CCCA, Redballoon features its own icon-list of "affiliates"; following this list could further illuminate the network.

Aside from enhancing the echo chamber or silo effect of looking for information within this network, the alternative influence network also functions as a kind of "social proof" for the CCCA. Like the "evidence" piled up by the "firehose of falsehood"

[31] Often referred to simply as "Police on Guard."

strategy, the appearance of a wide-ranging network[32] lends the CCCA's message a kind of in-group credibility.

Rhetorical Bridging

Stop the Shots in Kids engages in the rhetorical bridging that characterizes the alt-right. Beginning with the abstract ideals of "protecting children" and "natural growth and development", the campaign targets two concepts that are top of mind for their audience of parents and caregivers. Then the CCCA redefines the concept of "protecting children" by reframing the COVID-19 vaccines as "gene therapy that has been inadequately tested and is unnecessary as well as ineffective, unsafe, and potentially fatal…" ("It's Time", p. 29). The CCCA suggests that vaccines will interfere with children's "natural growth and development" through "Severe" and "Serious adverse events [that require] in-patient hospitalization, [are] life-threatening [and result] in death or persistent disability" ("It's Time", p. 22). These devastating adverse events are juxtaposed with a claim that COVID-19 poses minimal risk to children: "The vast majority of children are not susceptible to severe outcomes from COVID-19" ("It's Time", p. 13). Here, the ideal of "protecting children" is given a new meaning of "vaccine refusal", and the equally idealised concept of "natural growth and development" becomes the acquiring of "natural immunity" through intentional or laissez-faire exposure to the COVID-19 virus. Further, this reframing implies a change in the conceptualization of the COVID-19 illness itself, reducing it to the same type as other common circulating illnesses that are more *inconvenient* than dangerous, unless

[32] It would be interesting to study how large this network actually is. When I reviewed the CCCA "affiliate" websites and social channels I saw the same "experts" popping up again and again.

one is very old or already ill[33]. These two conceptual reframings alleviate the discomfort that concerned parents, caregivers and other audience members may feel when trying to decide about vaccinations for their children. In part, this is because it rhetorically relieves them of concern about the pandemic by elevating a "nothing to see here" approach to COVID-19 to equal status with "protecting children."

By shifting the meaning of "COVID-19", "natural growth and development", and "protecting children", the CCCA builds a rhetorical bridge (Hartzell, "Alt-White") between the audience member's worry about vaccines to alt-right misinformation about the entire COVID-19 pandemic. This allows them to move concerned parents and caregivers from personal ambivalence about immunization to acceptance of vaccine, COVID-19 and global government conspiracy theories.

Conclusions: *Stop the Shots in Kids*

In *Stop the Shots in Kids,* the CCCA creates confusion about COVID-19 science and policy-making to support their claims and undermine the risk staging by the Canadian and provincial/territorial governments. Thus, even if the campaign fails to persuade audiences to *agree* with its claims about natural immunity, experimental gene therapy, and COVID-19 as a low-risk illness, the sheer volume of claims and evidence provided still compromises dominant stagings from public health officials. By suggesting that there is so much more to the story, this alternative risk campaign accuses the government of, at best, incompetent analysis and, at worst, withholding or misrepresenting information (Cleaveland et al., par. 6).

[33] The callousness of this implication seems to be lost on the CCCA. They seem to wonder why healthy people should bother about the health challenges of others.

It could perhaps be argued that the CCCA is simply inviting its audience to question the dominant risk staging, and advocating for and assisting its audience with critical thinking. But confusion cannot be mistaken for critical questioning. Rather, by flooding the zone with false information, the CCCA makes it more difficult for its audience to be critical of the dominant stagings. By constructing the COVID-19 vaccines as an experiment that has "NOT been proven safe" and increases children's risk from COVID-19 ("Parent's Brochure") and the Canadian Government as a pawn in a global conspiracy ("It's Time", p. 34), it fails to provide its audience with effective places from which to engage in disagreement or debate with the dominant staging, and fails to provide them with the information that would help them make a truly informed choice.

Conclusions

In this thesis, I have shown that risk is more than a deliberative discussion of statistics and probabilities: it is a multi-dimensional form of argument that has become a *topos*, or persuasive "place," in our social discourse where we might be deciding how to keep one another safe… or we might be arguing about something else entirely. This complex rhetorical practice is vulnerable to "alternative" capture that adopts the conceptual and formal features of risk discourse to exploit their audience's risk anxieties. In a context of increasing concern about the volume and impact of disinformation, the concept of "alternative risk" gives us – scholars, experts and laypersons alike – a framework for diagnosing patterns and structures of disinformation that frequently co-locate, but without needing to fact-check materials point-by-point. Alternative risk is not a "fringe minority" phenomenon, but one that is mainstream and on-going.

When I began this project, my supervisor, Professor Michael MacDonald, wisely advised me not to try to save the world with my Master's thesis and to focus on one case study (while developing a critical framework that could be applied to other cases in the future). He can obviously spot unearned confidence a mile away. In my future research I hope to connect this work to the context of "Infowars" and global misinformation that also stem from the "world risk society" Beck has so thoroughly articulated, in order to consider the ways and means by which we might defend our collective psyches against these compelling but hollow campaigns, and to explore the big "Why?" that motivates alternative risk and its adherents. I also wish to follow up a few threads of inquiry that might one day lead me to the world-saving side of this scholarly business. I look forward to continuing to consider Dayna Nadine Scott's

suggestion that moving *out* of the risk frame and the technoscientific language of risk allows us to "move debate from scientific questions of health and environmental risk to questions of culture, autonomy, ethics, and fairness" (Scott, pp. 48-49) and asks us to reimagine our relationship to the risk society and to our rhetorical practices within it. I want to better understand Ashley Rose Mehlenbacher's call for a "more rhetorically sophisticated account of experts [that] centers the key form of practical, moral knowledge alongside knowing-that and knowing-how to emphasize knowing-why" (p. 44), which calls for a renewed attention to the role of values within expertise and thus the role of values within risk deliberations. And I see the makings of a path forward in the concept of "rhetorical realism" proposed by Dana L. Cloud, which highlights the reality that "neither fact-checking nor truthiness can meaningfully respond to" (p. 15) the problem of social polarization and disinformation, but also that "we can recognize the partial perspective different groups have on the truth and argue that the theorist or critic should hold rhetoric accountable to realities that are not universally shared but rather mutually debated" (p. 22). Each of these scholars suggests that risk deliberations need to move away from an exclusive empiricism toward an overt political debate. I think that this approach, combined with a continued exploration of the ways risk discourse reflexively creates its own problems, holds potential to help move us away from the glossy obfuscation of alternative risk to a messy reality of *human risk.*

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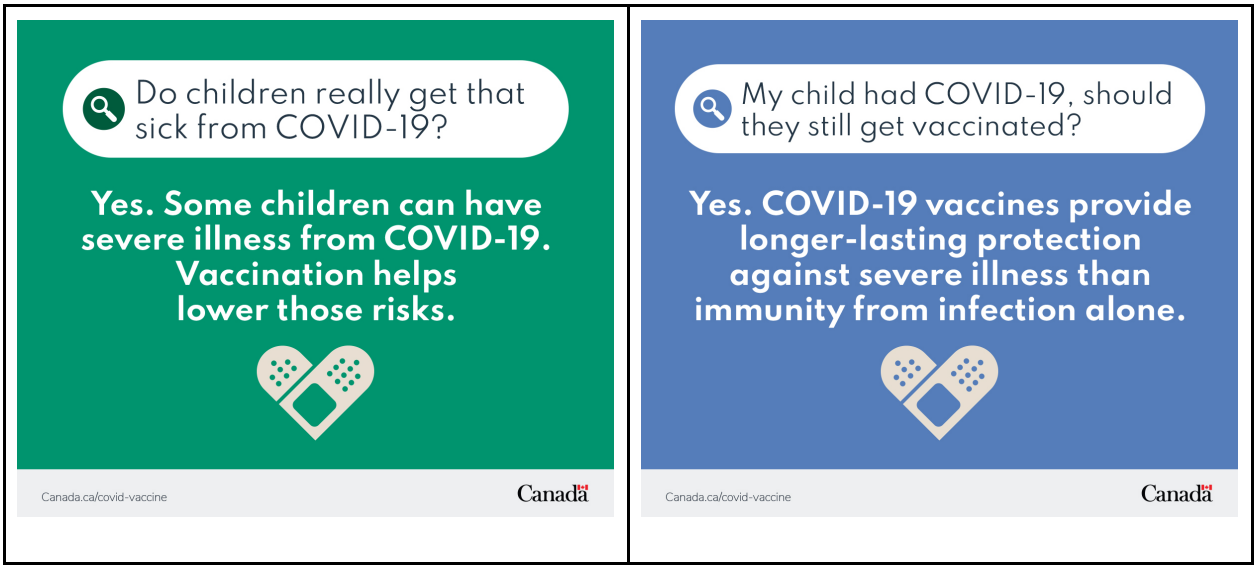
Appendix A: Dominant Staging

Though it is beyond the scope of this project to document the entire COVID-19 vaccine staging by the Canadian Government, the materials in this appendix provide a representative collection of the message on the paediatric vaccination programme. These graphic materials from the Government of Canada are available for download in 17 languages and image sizes that suit a variety of social media platforms: Facebook, Instagram, digital messaging (texting, WhatsApp, etc.), Twitter, and LinkedIn. The six images reproduced here focus on "Vaccination for children", but visitors to the site also find shareable graphics on like these on the topics of "Vaccination for adults", "Testing", "Individual public health measures," and "About COVID-19," as well as links to long-form information pages from the Government of Canada website.



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Appendix B: *Stop the Shots in Kids* Core Campaign Assets

All assets were accessed via link or download from the main campaign page:

https://www.canadiancovidcarealliance.org/all/stop-the-shots/

1. "It's Time to Stop the Shots" [Video] Accessed 23 June 2023 at https://rumble.com/v1cc9ud-stop-the-shots.html

2. “It’s Time to Stop the Shots” [PDF]: Accessed 23 June 2023 from https://www.canadiancovidcarealliance.org/wp-content/uploads/2022/07/CCCA-Stop-the-Shot-Video-Presentation-July-15-2022.pdf

WHO WE ARE

We are the Canadian Covid Care Alliance, an association that includes over **600 independent Canadian doctors, scientists, and health care practitioners** who are committed to providing **quality, balanced, evidence-based information** to the Canadian public about COVID-19 so that hospitalizations can be reduced, lives saved, and our country safely restored to normal.

WE SUPPORT

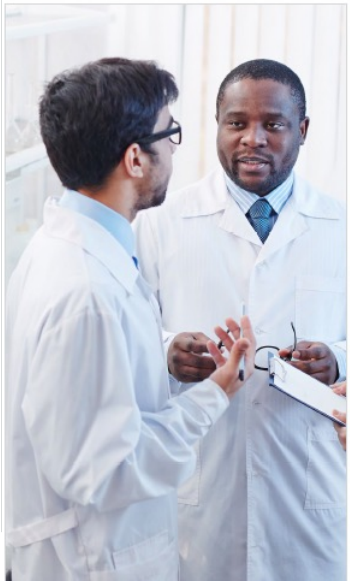
The doctor/patient relationship and personalized care

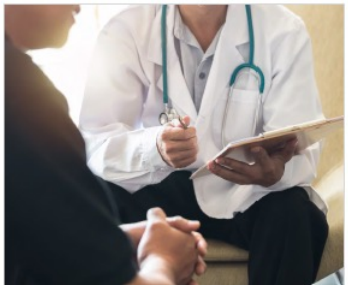
Informed consent and treatment options for patients

Free and open **scientific discourse**

Policy that is based on the **highest levels of evidence**

Safe and effective vaccines





OVERVIEW

IT'S TIME TO STOP THE SHOTS

FIRST, DO NO HARM

The federal, provincial and municipal governments in Canada have a **responsibility to protect the health of Canadians as well as respect our Charters Rights and Freedoms. Any medical intervention approved by Health Canada must FIRST be PROVEN SAFE.**

Due diligence in research, **as well as adherence to established protocols of the doctor/patient relationship, informed consent and scientific inquiry** are essential to carrying out that responsibility.

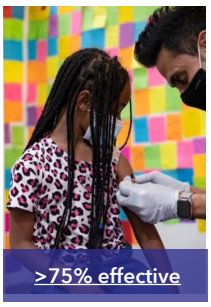
Deviating from those practices, causing harm, and failing to disclose risks of harm related to an intervention is negligent at best.

PEDIATRIC VACCINES
A DESIRE TO PROTECT

- Pediatric vaccines are routinely given to children
- Most vaccines use viruses or viral particles that have been altered so they **no longer cause sickness**
- They are intended to stimulate the immune system to produce a **long-lasting defense against specific diseases**
- And use a standard technology that has been around for decades

COVID-19 VACCINES
KEY MESSAGING

- Health Canada has approved the Pfizer and Moderna COVID-19 mRNA vaccines for children 12 to 15 years of age and 5 to11 years of age
- And the FDA has now approved these same vaccines for children aged 6 months to 4 years
- These vaccines have been described as "safe and effective"
- And an important means of both stopping the spread of COVID-19 and preventing serious illness

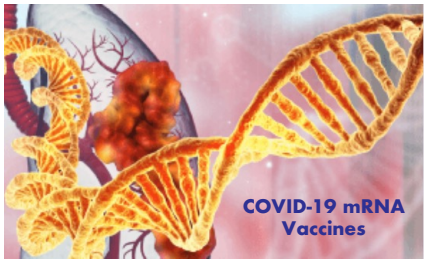


As of May13, 2022, 84% of Canadian children aged 12-17 years and 42% of children aged 5-11years have received at least 2 doses of these vaccines.

But what if these vaccines weren't like other pediatric vaccines?

What if ....

THEY ARE EFFECTIVELY GENE THERAPY



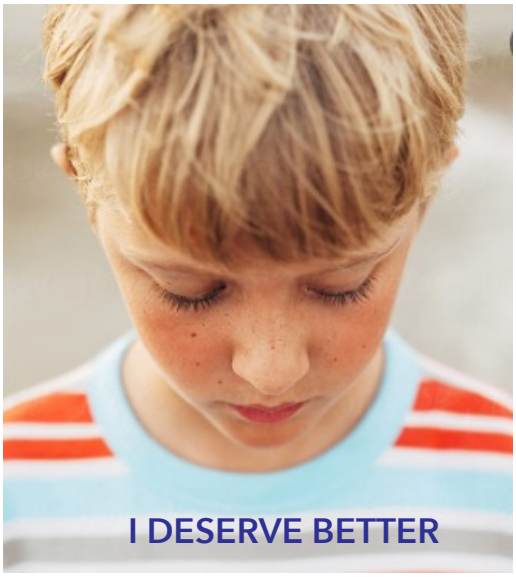
Human gene therapy product FDA generally considers human gene therapy products to include all products that mediate their effects by transcription or translation of transferred genetic material or by specifically altering host (human) genetic sequences. Some examples of gene therapy products include nucleic acids (e.g., plasmids, in vitro transcribed ribonucleic acid (RNA)), genetically modified microorganisms (e.g., viruses, bacteria, fungi), engineered site-specific nucleases used for human genome editing,[10] and ex vivo genetically modified human cells. Gene therapy products meet the definition of "biological product" in section 351(i) of the Public Health Service (PHS) Act (42 U.S.C. 262(i)) when such products are applicable to the prevention, treatment, or cure of a disease or condition of human beings.[11]

15 years of safety study

- They are actually gene therapy being "marketed" as a vaccine?
- The FDA defines gene therapy as any product that teaches cells to produce genetic material or a protein
- **COVID-19 mRNA vaccines teach cells to produce the SPIKE protein, which is the part of the SARS-CoV-2 virus that causes sickness** and a recent study also shows that the mRNA can be transformed into human DNA
- The **FDA warns that gene therapy products can put people at an increased risk of undesirable and unpredictable outcomes**
- And recommends up to 15 years of safety testing BEFORE widespread use
- There is currently less than 6 months of quality safety data available for the COVID-19 genetic vaccines, which is **a small fraction of the typical safety testing period for this type of therapy**

THEY WEREN'T PROPERLY MADE AND TESTED

- And what if these injections delivered mRNA in lipid nanoparticles that weren't properly purified for use in humans
- And that the mRNA used was altered with modifications not found in humans and that no one really knows how this might change the proteins they produce?
- What if they just skipped years of extensive safety testing in animals that is usually completed to ensure safety before use in humans
- And then used a lesser manufacturing process that knowingly produced a lower quality product?



COVID-19 GENETIC VACCINES FOR KIDS/TIME TO STOP THE SHOTS

YOUR CHILD DIDN'T NEED THEM

12 JUNE 15, 2022

What if your child didn't even need these injections because:

- **Healthy children are not easily infected by SARS-CoV-2** as they have low levels of viral receptors in their airways
- **And strong innate immune systems that** are capable of stopping the virus in its tracks
- As a result they experience only mild symptoms or no symptoms at all
- And are at a **very low risk of experiencing severe illness**
- And because they clear the virus so efficiently, they are much less contagious than adults

COVID-19 GENETIC VACCINES FOR KIDS/TIME TO STOP THE SHOTS

YOUR CHILD DIDN'T NEED THEM

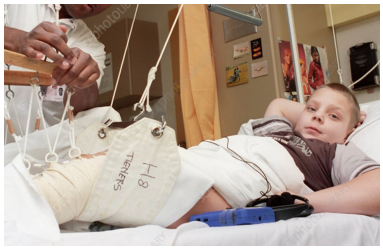
In fact, the vast majority of children are not susceptible to severe outcomes from COVID-19

13 JUNE 15, 2022

Among the few children that *were counted* as a COVID-19 hospitalization

In hospital due to COVID-19

most were children who had risk factors that made them more likely to get sick



In hospital with COVID-19

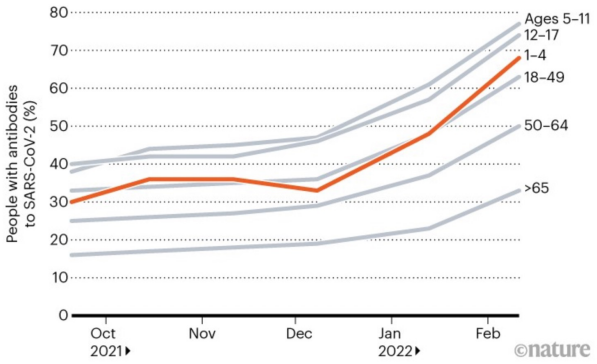
the rest were children who happened to test positive while in hospital for other reasons

YOUR CHILD DIDN'T NEED THEM

The majority of kids have already conquered COVID-19

OMICRON SURGE

CDC analysis of 52 US jurisdictions showing marked increase in SARS-CoV-2 infection during the Omicron wave across all age groups



Around 75% of children had antibodies to SARS-CoV-2 indicating that they had successfully recovered from an infection

Mallapaty Nature News 2022

USE WAS SUPPORTED BY UNRELIABLE SCIENCE

- **A randomized control trial is LEVEL 1 evidence,** the highest form of evidence there is. It is considered the Gold Standard and is the **only way to PROVE** something is better than a current standard of care
- The COVID-19 randomized trials in children **failed to compare the vaccines to naturally acquired immunity,** the current means by which most children fight the infection
- The **trials were conducted prior to Omicron and failed to evaluate the vaccines in kids who had recovered from COVID-19** making the results of these primarily obsolete
- Therefore there is a distinct **LACK of LEVEL 1 evidence to PROVE that these vaccines are beneficial** for the majority of children today

Levels of Scientific Evidence

HIGHER

LOWER

Level	Evidence
Level 1	Meta-a[illegible]of homogenous RCTs[illegible]control trial
Level 2	Meta-analysis of Level 2 or heterogenous Level 1 evidence prospective comparative study
Level 3	Review of Level 3 evidence case-control study retrospective cohort study
Level 4	Uncontrolled cohort studies case series
Level 5	Expert opinion case report personal observation
Foundation Evidence	Animal research, *in vitro* research ideas, speculation

NOT PROPERLY STUDIED

These flawed Pfizer trials conducted in adolescents and children were not even designed to ***prove that the COVID-19 injections could reduce severe disease, hospitalization, and death.***

They simply showed that children could produce blood-born antibodies to the SPIKE protein at comparable levels to young adults; **antibodies that do little to nothing to help fight infection in the upper airways.**

30 µg mRNA	Cohort 12 - 15 years	vs	Cohort 16- 25 years	30 µg mRNA
n=190				n=170
10 µg mRNA	Cohort 5 - 11 years	vs	Cohort 16- 25 years	30 µg mRNA
n=264				n=253

COULDN'T STOP SICKNESS

What these trials did show was **that COVID-19 injections are of little to no benefit in children**. None of the children in the trial actually got severe COVID-19 and the only help the injections were able to provide was to **reduce the risk of mild disease by a mere 2%.**

ONLY

2%

less likely to get mild disease

12 to 15 years

	Pfizer Injection 1005	Placebo 978	Relative Risk Change	Absolute Risk Change
Symptomatic Cases (Ongoing)	0	16	-100 %	-2 %
Severe Cases (Ongoing)	0	0	0 %	0 %

5 to 11 years

	Pfizer Injection 1,305	Placebo 663	Relative Risk Change	Absolute Risk Change
Symptomatic Cases (Ongoing)	3	16	-91%	-2 %
Severe Cases (Ongoing)	0	0	0 %	0 %

INCREASED RISK OF ILLNESS

In toddlers, although the COVID-19 genetic vaccines lowered mild disease only after the third dose, the randomized trial showed that after the first dose they **increased the number of severe cases of COVID-19 as well as the number of times the toddlers caught COVID-19.**

Toddlers (2 to 4 years-old)

Anytime after 1st Dose	Pfizer Injection 1,673	Placebo 834	Relative Risk Change	Absolute Risk Change
Symptomatic Cases	127	92	-33 %	-3 %
Multiple Cases	5	1	+149%	+0.2%
Severe Cases	6	1	+199%	+0.2%

>7 days after 3rd Dose	Pfizer Injection 481	Placebo 209	Relative Risk Change	Absolute Risk Change
Symptomatic Cases	2	5	-82 %	-2 %
Severe Cases	0	0	0 %	0 %

A severe case was defined as a departure from a normal respiratory and/or heart rate for a given age group

COULDN'T PROTECT OTHERS

Although claims were initially made that getting your shot could protect those you love, we now know that **these vaccines cannot stop the spread of disease.**

We know that transmission was never studied in any of the clinical trials meaning that there was never **any quality evidence to indicate that this was true.**

It is therefore not surprising to see that breakthrough infections are now common place proving beyond a doubt that **these injections do not control disease.**

BENEFITS ARE SHORT-LIVED

What is even more concerning is that the **benefits of the COVID-19 genetic vaccines are short-lived,** while children's **naturally acquired immunity is robust and long-lasting.**

The efficacy of the Pfizer COVID-19 injections peaks at 2 months and declines steadily thereafter. **Waning immunity means that ongoing boosters** will be required to maintain protection.

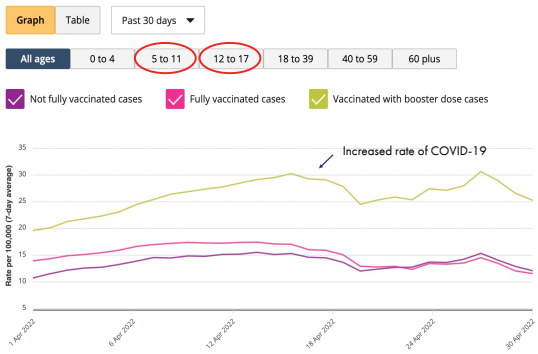
The **lipid nanoparticles used in these injections can be toxic to cells** and there is **no quality evidence showing their long-term safety**. This raises serious concerns regarding their continued use in children.

INCREASED RISK OF INFECTION

There are already concerning indicators that **boosters may be less beneficial than expected.**

Ontario data on COVID-19 cases by vaccination status shows a troubling trend toward higher rates of infection in people who have been fully vaccinated and boosted.

This means that the **COVID-19 injections may actually be increasing a person's chance of catching COVID-19.** A trend that is apparent overall as well as for kids 5 to 11 years of age and12 to 17 years of age.



Proportional of daily cases of COVID-19 occurring among Ontarians who were 'not fully vaccinated' (unvaccinated or a single dose ; purple line), 'fully vaccinated' (two doses; pink line), or 'vaccinated with booster dose' (three or more doses; green line). This graph was copied from Public Health Ontario website on April 14, 2022 (https://covid-19.ontario.ca/data). No data for this graph are available prior to March 17, 2022.

COVID-19 GENETIC VACCINES IN KIDS/TIME TO STOP THE SHOTS

PFIZER TRIALS ADVERSE EVENTS OF CONCERN

Serious adverse events required in-patient hospitalization, were life-threatening, resulted in death, or persistent disability

Severe adverse events interfered with daily activity, required medical care, an ER visit, or hospitalization

COVID-19 GENETIC VACCINES FOR KIDS/TIME TO STOP THE SHOTS

INCREASED RISK OF ILLNESS

In the Pfizer trial for adolescents, the injections showed **no benefit in reducing severe COVID-19** but did show an **increased relative risk of both severe and serious adverse event-related illness with these injections**.

12 to 15 years

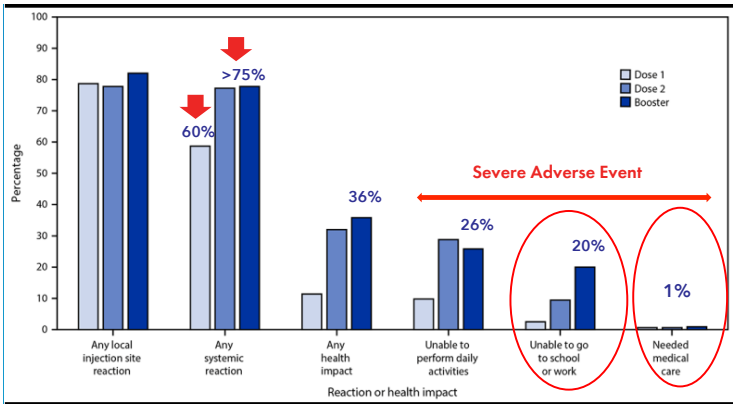
	Pfizer COVID-19 Injection 1005*	Placebo 978*	Relative Risk Change	Absolute Risk Change
Symptomatic Cases (Ongoing)	0	16	**-100 %**	-2 %
Severe Cases (Ongoing)	0	0	**0 %**	**0 %**
Treatment Related Adverse Effects (1 month post 2nd dose)	33	21	**+57%**	+1%
Any Severe Adverse Effects (1 month post 2nd dose)	7	2	**+249%**	**+0.4%**
Any Serious Adverse Effects (6 months post 2nd dose)	4	1	**+299%**	**+0.3%**

* Number of participants tested

COVID-19 GENETIC VACCINES FOR KIDS/TIME TO STOP THE SHOTS

CAUSED MORE SICKNESS WITH EACH DOSE

Adverse reactions and health impacts reported among persons aged 12-17 years (N = 3,274) who received the Pfizer COVID-19 vaccine booster, by vaccine dose – United States, December 9, 2021- February 20, 2022



Not only is the safety of the two dose series concerning **but adverse effects seem to increase with each injection**.

A US study assessing the health impacts of COVID-19 injections in children 12 to 17 years of age found that the risk of adverse **effects increased from 60% with the first dose to >75% with the second dose and booster**.

And of most concern was the discovery that a staggering **20% of youth were unable to to go to school or work following the booster, and that 1% required medical care**.

COVID-19 GENETIC VACCINES FOR KIDS/TIME TO STOP THE SHOTS

EVEN ONE CHILD

One child who was seriously injured by these injections was **Maddie de Garay, a perfectly healthy12 year old girl**. Maddie was enrolled in the Pfizer COVID-19 trial and experienced a serious adverse event following her second injection.

She developed gastric distress, erratic blood pressure, dizziness, fainting, seizures, menstrual cycle issues, loss of feeling from the waist down, and more. She was hospitalized many times and is now wheelchair bound and fed via feeding tube.

Pfizer trials showed that children aged 12 to 15 years are not at risk of severe COVID-19 but **are at a 0.3% increased risk of serious adverse event due to the injections**. This means that injecting the1.6 million Canadian children in in this age group could result in the injury of as many as 4,800 children.

MYOCARDITIS IS SERIOUS

MYOCARDITIS

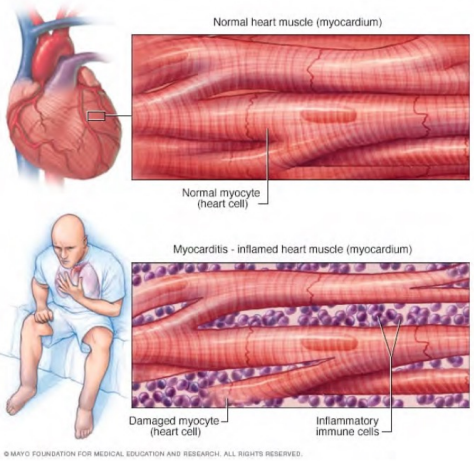
Myocarditis is a well recognized side effect of the COVID-19 mRNA injections affecting as many as 1:5000 males aged 12 to 24 after the second dose.

"Myocarditis is an inflammatory process of the myocardium (heart muscle). **Severe myocarditis weakens your heart** so that the rest of your body doesn´t get enough blood."

THE US NATIONAL CENTRE FOR BIOTECHNOLOGY INFORMATION

"The mortality rate is up to 20% at 6.5 years."

Https://jcmr-online.biomedcentral.com/articles/10.1186/1532-429X-13-S1-M7



INCREASED RISK OF DEATH

The most mature data on the safety of COVID-19 injections comes from the Pfizer six month trial in adults. This trial **shows a concerning trend toward increased death with these injections.**

Screen capture from Pfizer 6 Month Supplementary Appendix

Reported Cause of Death*	BNT162b2 (N=21,926) n	Placebo (N=21,921) n
Deaths	15	14
Acute respiratory failure	0	1
Aortic rupture	0	1
Arteriosclerosis	1	0
Biliary cancer metastatic	0	1
COVID-19	0	2
COVID-19 pneumonia	1	0
Cardiac arrest	4	1
Cardiac failure congestive	1	0
Cardiorespiratory arrest	1	1
Chronic obstructive pulmonary disease	1	0
Death	0	1
Dementia	0	1
Emphysematous cholecystitis	1	0
Hemorrhagic stroke	0	1
Hypertensive heart disease	1	0
Lung cancer metastatic	1	0
Metastases to liver	0	1
Missing	0	1
Multiple organ dysfunction syndrome	0	2
Myocardial infarction	0	2
Overdose	0	1
Pneumonia	0	2
Sepsis	1	0
Septic shock	1	0
Shigella sepsis	1	0
Unevaluable event	1	0

Table S4 | Causes of Death from Dose 1 to Unblinding (Safety Population, ≥16 Years Old). a. Multiple causes of death could be reported for each participant. There were no deaths among 12–15-year-old participants.

Safety and Efficacy of the BNT162b2 mRNA Covid-19 Vaccine through 6 Months - Supplementary Appendix

	Pfizer COVID-19 Injection	Placebo
Deaths before unblinding (In Table S4 of Supplementary Appendix)	15	14
Deaths after unblinding (Not in the table, but mentioned in the text of the 6 month report. See quote below)	5	
Total Deaths	20	14

"After unblinding" means that placebo participants were given the opportunity to "cross over" and take the BNT162b2 inoculation. *About 89% of participants crossed over to get subsequently vaccinated compromising this clinical study.

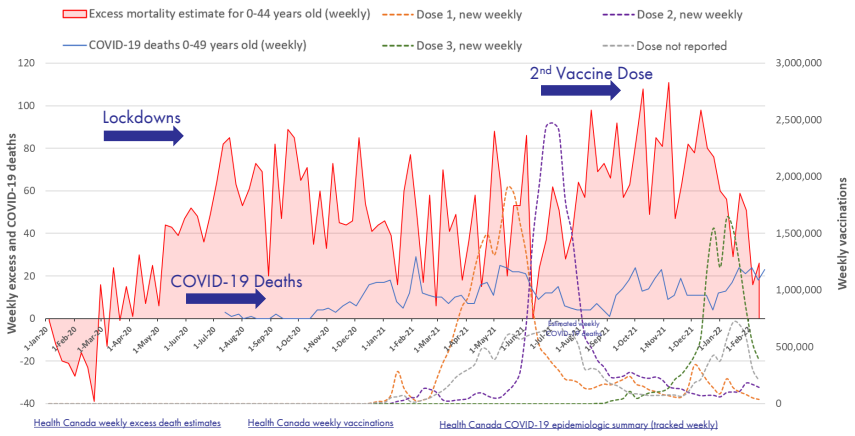
"3 participants in the BNT162b2 group and 2 in the original placebo group who received BNT162b2 after unblinding died."

Concerning Causes of Death

	Pfizer Injection	Placebo
Total COVID-19 Related Deaths	1	2
Deaths Related to Cardiovascular Events	9	5

COVID-19 GENETIC VACCINES FOR KIDS/TIME TO STOP THE SHOTS

ALL-CAUSE MORTALITY



Health Canada weekly excess death estimates | Health Canada weekly vaccinations | Health Canada COVID-19 epidemiologic summary (tracked weekly)

Concerns regarding increased death associated with these vaccines are becoming more widespread.

An analysis of all cause mortality among Canadians aged 0 to 44 years showed a jump in weekly excess deaths after both initiation of lockdowns and after administration of the second COVID-19 dose.

Deaths which could not be accounted for given the estimated weekly COVID-19 deaths in this age group.

If COVID-19 genetic vaccines are

really gene therapy that has been

inadequately tested

and is unnecessary

as well as ineffective,

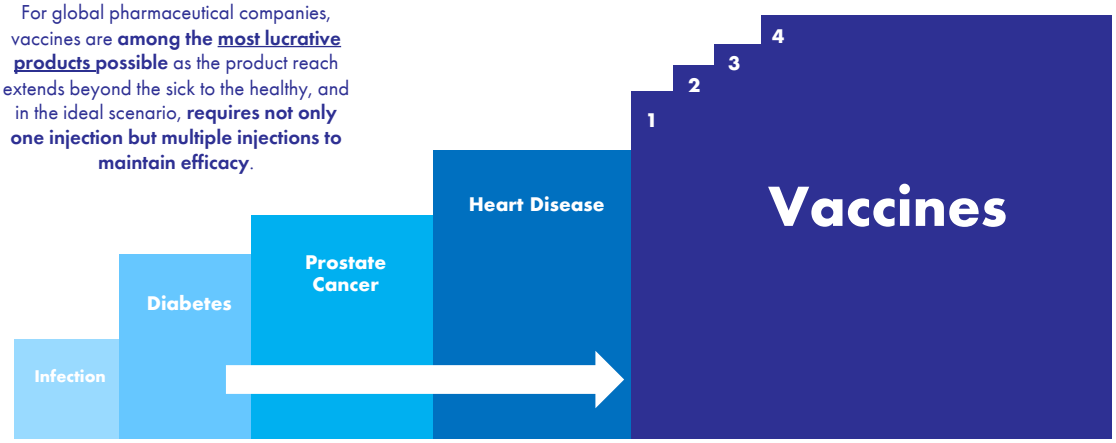
unsafe, and potentially fatal...

Why are they recommending them for our children?

CONFLICTS OF INTEREST

BIG PHARMA PROFITS

For global pharmaceutical companies, vaccines are **among the most lucrative products possible** as the product reach extends beyond the sick to the healthy, and in the ideal scenario, **requires not only one injection but multiple injections to maintain efficacy**.



BIG PHARMA PROFIT

What's of even greater interest to pharma is that **vaccines are easy to sell.**

As public health officials generally look to vaccines as a means of managing health care costs, **selling vaccines is as easy as generating a sufficient amount of fear.** In order to remain safe, people will petition government to purchase, promote, and administer these injections **at little to no cost to big pharma**.

Even more, generating fear is becoming increasingly **easy given pharma's ties to global media outlets as well as their extensive network of experts** who excel at telling stories with science.

CONFLICTED INTERESTS

The Pfizer 6 month report concluded that the COVID-19 mRNA vaccines were "safe and effective" despite showing an increased risk of severe adverse events and more death with the vaccines. **Most of the authors of this report had direct ties to pharma** and the stock of two of the authors **increased by $9 billion dollars in 2021 alone.**

6 MONTH REPORT AUTHORS

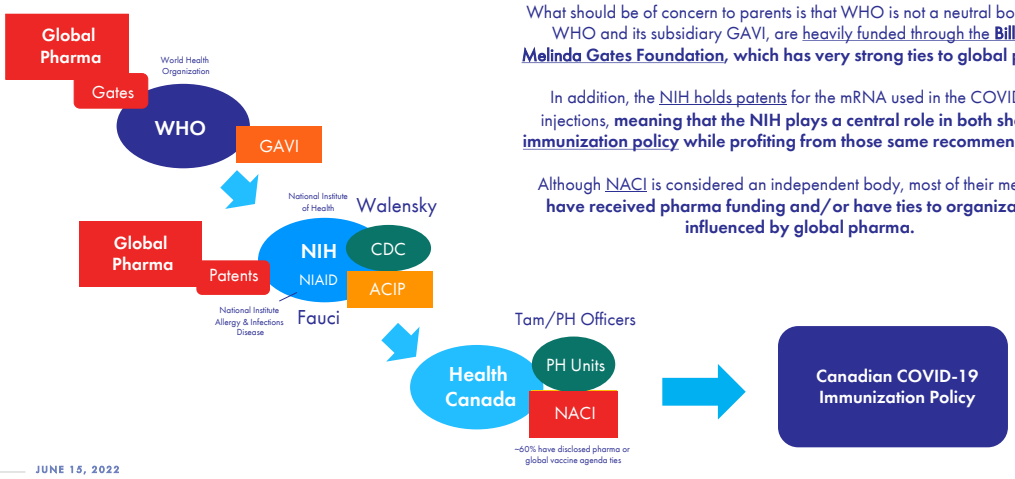
Employment + Stock
N. Kitchin
J. Absalon — Corresponding Author
S. Lockhart
R. Bailey
K.A. Swanson — Last Author
S. Roychoudhury
K. Koury
W.V. Kalina
D. Cooper,
D.B. Tresnan
S. Mather
P.R. Dormitzer
U. Şahin — BioNTech founders whose stock value increased by $9 billion
W.C. Gruber
K.U. Jansen
Ö. Türeci — BioNTech founders whose stock value increased by $9 billion

Employment
A. Gurtman
J.L. Perez
S. Bouguermouh
P. Liberator
X. Xu

Grant/Consultant/ Clinical Trial
R.W. Frenck, Jr.
L.L. Hammitt
S. Ünal
S.J. Thomas — Lead Author
G. Pérez Marc
F.P. Polack

No Conflict
E.D. Moreira, Jr
H. Nell
A. Schaefer
C. Zerbini
Q. Yang

CONFLICTED INTERESTS



Canadian immunization policy is shaped by public health officials under the advisement of NACI and is **heavily influenced by both American and global health policy.**

What should be of concern to parents is that WHO is not a neutral body. Both WHO and its subsidiary GAVI, are heavily funded through the **Bill and Melinda Gates Foundation, which has very strong ties to global pharma**.

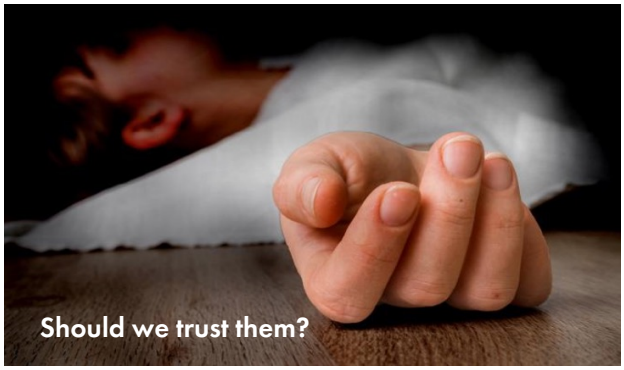
In addition, the NIH holds patents for the mRNA used in the COVID-19 injections, **meaning that the NIH plays a central role in both shaping immunization policy while profiting from those same recommendations.**

Although NACI is considered an independent body, most of their members **have received pharma funding and/or have ties to organizations influenced by global pharma.**

UNSUPPORTED SAFETY CLAIMS

- In the1980s, pharma funded scientists made safety claims regarding OxyContin that were not supported by quality evidence
- Health authorities approved the drug, health officials recommended it, and well intentioned doctors prescribed it for their patients
- With that, the opioid crisis was born. Purdue Frederick went on to make 30 billion in profit at the cost of hundreds of thousands of lives
- Today, pharma is once again making safety claims that are not supported by quality evidence, this time about the safety of COVID-19 injections for our children

It's "safe" they said



BIG PHARMA PROFIT

100 billion in profit in 2022

The COVID-19 pandemic is creating a $100 billion pharma goliath

ADVOCATES SILENCED

- What should be of even greater concern to parents is that many health professionals have been forbidden by their colleges to speak out against COVID-19 policy including these injections
- Although many brave doctors have defied these orders and attempted to alert parents to the dangers associated with these shots, many others remain unaware
- **If our health care advocates can't speak out on behalf of our children who will?**

IT'S TIME TO STOP THE SHOTS

- COVID-19 genetic vaccines are inadequately tested, unnecessary, ineffective, unsafe, and potentially fatal
- Global pharmaceutical interests have materially influenced our health care system and are profiting handsomely from their efforts
- Our governments have failed to protect us and have muzzled our doctors who have sworn to protect us from harm
- **We are our children's last line of defense**
- **It's time to stand together. It's time to #Stop the Shots**

COVID-19 GENETIC VACCINES FOR KIDS

IT'S TIME TO STOP THE SHOTS

Canadian Covid Care Alliance
Alliance canadienne pour la prévention et prise-en-charge de la covid

CONTACT US
INFO@CANADIANCOVIDCAREALLIANCE.ORG

3. “Letter to Healthcare Professionals”: Accessed 23 June 2023 from https://www.canadiancovidcarealliance.org/wp-content/uploads/2022/07/CCCA-Halt-vaccination-of-children-Officials-Letter-Jul-14-22.pdf

Date: October 27, 2022
To: Health Care Professionals (HCPs)
From: Canadian Covid Care Alliance (CCCA)
Re: The precautionary principle and mRNA vaccines in children

Dear Healthcare Professional,

Thank you for your faithful service over these last 2 and a half difficult years. The COVID-19 crisis has placed unprecedented pressure on our health system and on the many health care providers who have cared for their sick patients while navigating the unprecedented disruptions to their work and personal lives. Our Health Officials have sought to minimize the harms of SARS-CoV-2 by implementing numerous health care measures including masking, virtual work and learning, and use of COVID-19 vaccines, in the general population, and more recently in children as young as 6 months of age.

Our association, which includes over 600 scientists and medical professionals in Canada, is dedicated to providing balanced, independent evidence-based information on COVID-19. Recently, a group of our specialists including paediatricians, immunologists, and vaccinologists conducted a clinical risk benefit analysis on use of COVID-19 vaccines in children. Our analysis, which we have sent to Canadian Health Officials, concluded that given:

1) children’s very low risk of severe outcomes from COVID-19

2) the high levels of population-wide immunity more than 2.5 years into this crisis

3) the fact that none of the randomized trials in adolescents, children 5-11 years-old, and younger children demonstrated a clinically or statistically significant reduction in either long-COVID or severe COVID-19 with the vaccine compared to placebo

4) the lack of effectiveness data for the BA.1 and BA.4/5 bivalent vaccines on currently circulating BA.4/5 variants and lack of safety data on use of these boosters in children 18 years of age or younger

5) the yet to be fully elucidated concerns regarding myocarditis as evidenced by the vaccine-associated increase in rates of myocarditis most notable in young males, concerning histopathological changes upon autopsy as well as lingering morphological changes in 54% of affected adolescents and young adults

6) the lack of overall long-term safety data

the precautionary principle should be exercised at this time and use of the COVID-19 vaccines in healthy children halted until further data is available.

Our analysis was heavily shaped by recent revisions to CDC guidance which state that the primary series of COVID-19 vaccines “provide minimal protection against infection and transmission” and that boosters “provide only a transient period of increased protection.” Our conclusions are in line with a growing number of countries which have adopted a risk-mitigated approach and limited use of these agents in healthy children including Denmark, Sweden, Norway, Finland, Australia and the UK.

We encourage you to take the time to engage more deeply with the data prior to recommending use of these vaccines in healthy children. Should you desire additional information, want to leave a comment or enter into a dialogue with a growing number of health care practitioners seeking to independently evaluate this data, please reach out to us at discourse@canadiancovidcarealliance.org.

Sincerely,

The Specialists at the CCCA

Canadian Covid Care Alliance
Alliance canadienne pour la prévention et prise-en-charge de la covid

4. “Letter to Health Officials”: Pp. 1-20 reproduced here. Accessed 23 June 2023 from https://www.canadiancovidcarealliance.org/wp-content/uploads/2022/07/CCCA-Halt-vaccination-of-children-Officials-Letter-Jul-14-22.pdf

Canadian Covid Care Alliance
Alliance canadienne pour la prévention et prise-en-charge de la covid
CCCA

Website: www.canadiancovidcarealliance.org
E-mail: info.canadiancovidcarealliance.org

Request to Halt COVID-19 Vaccinations of Children

July 14, 2022

Dear Health Official,

The COVID-19 crisis has been filled with uncertainty since early 2020 that resulted in unprecedented measures adopted by the federal and provincial health agencies and officials to mitigate the impacts of a novel respiratory pathogen on vulnerable groups in our country. A key part of this national effort was Health Canada’s approval of the first two-dose series of COVID-19 mRNA novel vaccines for use in children 12 to 15 years of age on May 5, 2021[1] followed by their approval for children 5 to 11 years of age on November 19, 2021,[2] and more recently recommendation of boosters by the National Advisory Committee on Immunization for use in high-risk children 12 to 17 years of age.[3] On June 15, 2022 the Food Drug Administration authorized these vaccines for children 6 months or older,[4] an indication that is currently under review by Health Canada and the National Advisory Committee on Immunization.[5,6]

We are a group of independent Canadian scientists consisting of pediatricians, immunologists, vaccinologists, health policy experts, and evidence-based methodologists from the Canadian Covid Care Alliance who share your concern for the well-being of Canadians. We understand the challenges inherent in ensuring that public health policy remains up-to-date in a field where the science is rapidly evolving. Given the decades of quality life years that our children have ahead of them,[7,8] we firmly believe it is our duty as adults to work together to ensure that our children are protected not only from sickness but also from unnecessary or harmful medical interventions. We are reaching out today, to share with you, *the most up-to-date evidence on COVID-19 mRNA vaccines used in children (aged < 18 years).* The data shows that, in the Omicron era, when population-based immunity is widespread, the risks associated with COVID-19 mRNA vaccines far outweigh the benefits in children. Please consider the following:

1. **In the Omicron era, there is widespread naturally acquired immunity. Therefore, there is no medical need for children to receive COVID-19 mRNA vaccines**
    a. In the Omicron era when there is widespread naturally-acquired immunity and where the virus produces a milder form of COVID-19 than earlier strains, healthy children are even less at risk of severe disease or death from COVID-19.
    b. In the Omicron era, there is widespread immunity and where the vaccines cannot halt transmission (*i.e.,* non-sterilizing) and likely require perpetual updates, children pose no significant risk to adults.
    c. The vast majority of severe illness and deaths from COVID-19 have impacted frail and older persons having multiple co-morbidities who can better benefit from more targeted protection.

2. **COVID-19 mRNA vaccines do not work well relative to other forms of protection**
    a. Naturally acquired immunity is the gold standard for immunity – it is robust, comprehensive, durable, and provides appropriate protection against a respiratory infection.
    b. There is mounting evidence that the real-world effectiveness of the COVID-19 vaccines is extremely poor and short lived in children under 12 years of age.
    c. There are now potential treatments to prevent severe COVID-19 including new anti-virals, corticosteroids, antiseptic nasal/oral rinses and re-purposed drugs that can be used selectively unlike a global mass vaccination campaign where to be 'fully immunized' is not achievable.

3. **The potential risks of COVID-19 mRNA vaccines outweigh their benefits in the Omicron era**
    a. Both non-inoculated and inoculated individuals with COVID-19 transmit SARS-CoV2 equally with little difference (less than a day) in sickness, eliminating the basis for the mass vaccination of children as a means of protecting society or ICU capacity.
    b. In the Omicron era, where there is widespread naturally acquired immunity, current data shows that COVID-19 vaccines are neither particularly effective nor acceptably safe for children.
    c. There is growing concern related to the adverse long-term impacts on immune function from repeated injections of now obsolete COVID-19 products that paradoxically increase susceptibility to infection and illness via antigenic imprinting, and antibody-dependent enhanced disease.

Kindly allow us to expand on the extensive evidence supporting our claims.

Children do not need COVID-19 mRNA vaccines

a. Healthy children are not at substantial risk of severe disease or death from COVID-19

A recent meta-analysis estimated that 60% of individuals <20 years-old with confirmed COVID-19 diagnosis are asymptomatic.[9] For healthy children ages 0 to 19, the risk of severe disease or death from COVID-19 is virtually zero.[10] This is likely due to fact that children have a lower concentration of the cell entry receptors for SARS-CoV-2 on the cells in their airways compared with adults[11] and that they have very robust natural innate immunity.[12–14] Although rare cases of multi-inflammatory syndrome (MSI, less than 1 out of 1,800 pediatric infections)[15,16] or long-COVID[17–21] in children were initially reported, these studies were not controlled and it is well established that severe COVID-19 outcomes are associated with known risk factors such as advanced age, obesity, and other comorbidities.[22–25] In Canada, the risk of death or hospitalization from identified cases of SARS-CoV-2 infection with the original strain in 0- to 19-years-old was 0.005% and 0.5%, respectively, by mid-May 2021, and given that most infections are not identified, the risk is likely considerably lower than reported.[26] Regardless of prior risk, with the advent of Omicron, the risk of COVID-19 hospitalization and death is considerably lower – by up to 65% relative to Delta according to Ontario data –[27,28] and cases of MSI as low as 1 in 26,000.[15] Even more, it has come to light that many jurisdictions including Ontario, have been over estimating the rate of COVID-19 pediatric hospitalizations and deaths by as much as 60%, which underscores that the true risk to children is substantially lower than originally estimated.[29] A recent seroprevalence study observed that about 75% of US children had infection-induced antibodies following Omicron, meaning that there is now widespread naturally-acquired immunity in this population (Figure 1).[30–32] Furthermore, in England, SARS-CoV-2 antibody testing of unvaccinated school pupils from January to February 2022, showed that 62.4% and 97% of primary and secondary students, respectively, were serologically positive for previous infection with the virus.[33] Similar high rates of SARS-CoV-2 specific antibodies have also been found in over 85% of tested Canadian children two and a half years into an ongoing clinical study led by Dr. Steven Pelech at Kinexus Bioinformatics (personal communication). Currently available data now clearly shows that the risk of severe disease due to COVID-19 in healthy children who are immune to COVID-19 is next to non-existent.

b. Children pose no significant risk to adults

Early in the pandemic, there were concerns that children might be at increased risk of transmitting the virus to adults who were at risk of severe disease. However, it is now recognized that children are less likely to transmit the infection to adults in the household, and very unlikely to transmit the infection to adults in schools.[34] This is due to their low susceptibility to infection from lower levels of the ACE2 receptor to which SARS-CoV-2 binds in the upper airways of children as well as their robust innate immunity, which allows them to quickly clear infections, thus limit transmission.[35,36] Also, in early 2021, prior to the rise of widespread naturally acquired immunity, another nationwide Swedish study showed that leaving schools open did not lead to higher rates of COVID-19 among teachers.[37] Similar findings were recorded by researchers at the University of BC, and the BC Children's Hospital Research Centre in a 2021 study that found that approximately only 40 of the nearly 1,700 teachers tested contracted COVID-19 and that contact tracing showed that these were largely identified as acquired outside of the schools.[38,39] Well into the third year of the COVID-19 pandemic, with widespread immunity from either infection[40] or vaccination,[41] along with less aggressive variants in circulation,[42–44] the risk of severe COVID-19 posed to adults does not justify vaccination of children. Given that neither adults nor children remain at high risk of severe disease from COVID-19, there is no longer a compelling reason to continue with COVID-19 vaccinations in children.

Current vaccinations do not work well relative to other forms of protection

a. Naturally-acquired immunity is the gold standard of immunity – it is strong, comprehensive and durable, and is demonstrably superior to immunity conferred by the current vaccines

At the outset of the pandemic, there were concerns that a deficiency in population-wide immunity against SARS-CoV-2 would result in high rates of COVID-19 deaths. In the Omicron era, immunity is now widespread and, as of February 2022, approximately 75% of US children and adolescents had already demonstrated serologic evidence of a previous infection with SARS-CoV-2.[30] We also now know that young healthy immune systems produce rapid and robust serological and cellular responses to a broad spectrum of SARS-CoV-2 proteins[45,46] and that these responses confer protection throughout the entire respiratory tract.[46–48] Emerging evidence also shows that naturally acquired immunity is long-lasting, with immune responses to the highly related SARS-CoV-1 coronavirus still evident decades after the initial infection back in 2002-2004.[49,50] The Kinexus SARS-CoV-2 clinical study has similarly shown persistence of antibodies against this virus in their participants more than two years after their initial infection (Dr. Steven Pelech, personal communication) Figure 2 shows the high maintenance of SARS-CoV-2 antibodies from the first COVID-19 wave through to after the second COVID-19 wave in the Kinexus serological

study). This durability of the natural immune response is in sharp contrast to vaccination-derived immunity, which is narrow, focusing exclusively on the spike protein,[51] short-lived, and according to the six-month results of the pivotal Pfizer phase III trial, peaking in less than two months after injection and diminishing by 6% every two months thereafter.[52] Additionally, vaccination against COVID-19 generates antibodies that are present at *low concentrations* in the upper airways, which is the primary site of infection.[48] In short, these vaccinations designed to target the original strain of SARS-CoV-2 offer waning and sometimes negative protective immunity against infection with variants such as Omicron, which have 32 or more mutations in the spike protein.[53] Importantly, naturally-acquired immunity bears *little to no risk in itself*, as healthy children usually experience infections that are either asymptomatic or develop into generally very mild forms of disease: with Omicron, no more than a common cold.[46] A randomized controlled trial comparing vaccination-derived immunity to naturally acquired immunity has yet to be conducted, thus claims regarding the superiority of vaccination-derived immunity relative to naturally-acquired immunity, especially in the *Omicron era and beyond are speculative at best*, unsupported by the evidence, and contrary to past experiences with viral and bacterial infections.[54–56] In sum, in contrast with vaccination-derived immunity, naturally-acquired immunity is strong, broad and durable with virtually no safety concerns,[55,57–62] and is therefore the best option for ensuring long-lasting protection for children from future SARS-CoV-2 infections.

b. <u>An increasing number of agents are available to treat those who continue to be at risk of severe COVID-19</u>

Nutraceutical and dietary supplement can aid an individual's immune system providing support against acute respiratory viral infections by assisting normal maintenance and function.[63,64] For the very few non-immune individuals who remain at risk of severe COVID-19 – for instance, those with comorbidities or immunosuppression[65] – Health Canada has approved a number of outpatient drugs for adults including anti-virals like nirmatrelvir/ritonavir (Paxlovid)[66] and remdesivir (Veklury),[67] and monoclonal antibodies.[68–71] Additionally, the Ontario Science Table has recommended fluvoxamine and budesonide for preventing severe disease in adults at low risk of hospitalization.[72] As more is now known about how to bolster the immune system and treat SARS-CoV-2 infections,[72] there is even less of a need for vaccinations that provide negligible incremental protection in a population that is already largely immune to a now treatable disease. Even vulnerable sub-groups of children, who are immunosuppressed, have poor respiratory function (i.e., cystic fibrosis) or are undergoing surgery may benefit from simple, safe and cost-effective

prophylactic alternatives, such as virucidal povidone-iodine nasal rinses[73,74] than increasingly obsolete COVID-19 vaccine products.

The potential benefits of COVID-19 vaccinations do not outweigh their risks

a. COVID-19 vaccinations do not stop acquisition or transmission of SARS-CoV-2

The promise of mass vaccinations to achieve herd immunity and protect those at risk of severe COVID-19 has not come to pass: *abundant evidence confirms that COVID-19 vaccinations neither prevent infection nor stop viral transmission, and that both inoculated and non-inoculated individuals carry equal viral loads, i.e., can equally transmit SARS-CoV-2.*[75–78] Large studies of community transmission have found *equal secondary attack rates among the inoculated as among the non-inoculated*. A large study in the United Kingdom found that 25% of household contacts of fully inoculated individuals who had experienced breakthrough infections contracted COVID-19 vs. 23% of household contacts of unvaccinated individuals who had experienced COVID-19.[76] As shown by a landmark Israeli study, vaccinations have also failed to stop transmission *even in medical institutions with fully vaccinated staff and patients*.[79]

It has been suggested that vaccinated individuals recover from COVID-19 sooner than unvaccinated individuals, and so they are transmissible for a shorter period of time. However, a recent scientific study reported by the US CDC with post-marketing release of the Pfizer/BioNTech vaccine conducted primarily in Denver found that vaccinated participants with Omicron infection spent an average of one half day less sick in bed than did unvaccinated participants with Omicron infection.[80]

It is noteworthy that no gold standard, placebo-controlled disease endpoint trials, large enough (n=800,000) to categorically establish the clinical safety and long-term efficacy of the Pfizer COVID-19 mRNA vaccinations in children 12- to 15-years-old, 5- to 11-years-old, 2- to 4-years-old, and 6-months-old to 23-months-old have been undertaken. Instead, Pfizer vaccination approvals for these age groups were based on the preliminary results of four very small *immuno-bridging trials*, enrolling fewer than 3,000 participants each. They were *not designed to establish the superiority of vaccination compared to naturally acquired immunity,* but only the non-inferiority of "neutralizing" antibody concentrations in the blood of a small number of 12- to 15-years-old (n=190), 5- to 11-years-old (n=264) children, 2- to 4-years-old (n=143), and

6-months-old to 23-months-old (n=82) compared to young adults.[4,81,82] Because antibody titers in the blood are not a clinically validated measure of efficacy for mucosal infections of the respiratory tract, *study claims regarding efficacy are speculative at best*. Moreover, in these studies, assessment of "neutralizing" antibodies only focused on those antibodies that block the binding of the original strain of SARS-CoV-2 to the ACE2 receptor and entry into test cells. Many of the mutations in Omicron occur within the receptor binding domain of the spike protein. Furthermore, over 95% of antibody responses to the SARS-CoV-2 spike protein in both vaccinated and SARS-CoV-2-infected individuals are directed toward other regions of the spike protein, and the vast majority of the immune protective response is not measured by "neutralizing" antibody tests.

Starting 7 days after the last dose and less than 3 months post-vaccination for those under 12 years, the aforementioned studies provided descriptive relative risk reductions (RRR) in symptomatic cases of COVID-19 of 100%, 91%, 82%, and 76% for children aged 12 to 15 years, 5 to 11 years, 2- to 4-years-old, and 6-months-old to 23-months-old, respectively. Moreover, when outcomes were analyzed to reflect the net benefit of the vaccinations in these groups, the absolute risk reduction (ARR) in mild symptomatic COVID-19 was a mere 2% or lower for all groups, results which lack clinical relevance for the 60% of children and adolescents (<20 years) who experienced asymptomatic infections.[9] In addition, the vaccines did not demonstrate an ability to reduce severe COVID-19 or halt transmission, rendering claims regarding protection in the vast majority of children speculative at best. Of great concern, however, were findings in the 2- to 4-years-old cohort that showed that following the first dose the vaccine was associated with a 199% relative risk increase in severe COVID-19 and a 149% relative risk increase in multiple COVID-19 infections compared to placebos.[4] Moreover, the 76% RRR noted for 6 to 23 month old infants was astonishingly based on just three participants in this age group (1 vaccinated and 2 placebo), and the 82% RRR on just seven participants in the older 2–4-year-olds (2 vaccinated and 5 placebo), and was only after triple vaccination of these children.

The pivotal child vaccination studies were too short to establish vaccinal efficacy and did not control for natural immunity. Natural immunity was only assessed by the detection of antibodies against the nucleocapsid protein of SARS-CoV-2, which often fails to be measurable in people that have recovered from COVID-19. The child vaccine trials were designed to test vaccines developed against the original strain of SARS-CoV-2, which is no longer in circulation. Not surprisingly, COVID-19 vaccinations have demonstrated a lack of effectiveness against Omicron, which has spread widely through mostly inoculated

– even boosted – populations.[83] Real world studies conducted during the Omicron surge in New York State and Denver found that the effectiveness of COVID-19 mRNA vaccination ranged from 51% to 59% for children 12 to 17 years of age and from 12% to 31% for children aged 5 to 11 years.[80,84–85] In the New York State study, efficacy decreased to negative values by 5-6 weeks post second vaccine dose.

Following Omicron, and despite having a very high rate of vaccination (87%) for eligible Ontarians aged five years and older,[41] the Government of Ontario reported ***a negative dose-response effect for the COVID-19 vaccinations***. In other words, the proportion of cases of COVID-19 were highest among those who had been 'boosted', lower among the 'fully inoculated' and least among the 'not fully inoculated' (which includes the 'uninoculated' (Figure 3 panel A). A similar pattern was observed in the 12 to 17 years-old and the 5 to 11 years-old age groups (Figure 3 panel B &C). Additionally, a greater proportion of "boosted" Ontarians have died, revealing that the vaccinations may be associated with serious secondary effects (Figure 4). A concern has been expressed by researchers in Denmark who conducted a meta-analysis of all COVID-19 vaccine randomized controlled trials and found that the mRNA vaccinations were associated *with a significant increase in all-cause and cardiac-related mortality compared to the adenovirus-vector vaccines*.[86] These findings indicate the potential for vaccination-induced adverse effects, including vaccination-enhanced COVID-19 disease,[87,88] development of T-cell[89–91] and vaccine exhaustion[92] especially in the context of multiple and frequent boosters.[93] This alarming data supports epidemiological evidence from Nordic countries of an elevated risk for myocarditis and pericarditis that is dose and mRNA vaccine product dependent, particularly for young males (16-24 years).[94]
Similarly, another recent report has confirmed no significant increase in the incidence of myocarditis or pericarditis in patients recovering from COVID-19 infection.[95] Importantly, there is now documented autopsy analysis from young adult fatalities that support an autoimmunological response to the COVID-19 vaccination among susceptible individuals as reflected by SARS-CoV-2 spike protein expression within the heart with extensive CD4+ lymphocytic infiltration.[96] In sum, there is a lack of quality evidence supporting COVID-19 vaccination efficacy in an Omicron era and a concerning signal of harm with mechanistic evidence supporting a causal link to COVID-19 vaccination as compared to natural infection and recovery among otherwise healthy young adults/adolescents.

The mechanisms by which vaccination may cause negative efficacy in boosted individuals remains unclear, although several hypotheses have been advanced based on prior vaccine prototypes developed for SARS-CoV-1 and MERS, including antibody-dependent enhancement (ADE) and original antigenic sin (or

antigenic imprinting).[97, 98] ADE occurs when antibodies may hasten the destruction of immune cells via the antibody-dependent binding of viruses to these cells and facilitates their entry. Original antigenic sin arises when an initial antibody response against an earlier version of the virus predominates over subsequent responses to mutated versions of the same virus. There is clear evidence that prior COVID-19 RNA vaccines apparently blunts the natural immune response following a COVID-19 infection. Moderna's 30,000-participant study of persons 18 years or older for its RNA vaccine has indicated that subsequent production of antibodies against the Nucleocapsid protein of SARS-CoV-2 was evident in only 40% of previously vaccinated individuals with COVID-19 compared to 93% of unvaccinated peoples that acquired COVID-19.[99] Even an unvaccinated person with a mild case of COVID-19 had a 71% chance of showing Nucleocapsid antibodies in their blood compared to a 15% chance with a vaccinated person that recovered from mild COVID-19.

b. COVID-19 vaccinations demonstrate a concerning increase in all-cause morbidity and absence of established long-term safety

The best available data for assessing the safety of the Pfizer COVID-19 vaccinations in children has come from the phase III trials. These trials provided *important preliminary descriptive data for the level of safety of COVID-19 vaccinations for children,* revealing *dramatic increases in dose-dependent all-cause morbidity.* While the trial demonstrated a 2% reduction in the absolute risk of acquiring a mild COVID-19 infection in both 12- to 15-year-old children and 5- to 11-year-old children, it was associated with a *dramatic net increase in all-cause morbidity relative to placebo which increased with each dose.*[81,82] In the older group, the vaccination was associated with net increases in injection site pain for the first and second dose (63% and 61%) as well as increases in fatigue (19% and 42%), headache (19% and 40%), chills (18% and 35%) and muscle pain (10% and 24%) despite a net increase in the use of anti-pyrectics (26% and 42%) compared to placebo (Figure 5).[81] As no cases of severe COVID-19 were reported in either study,[79,80] claims regarding protection against severe disease in children and adolescents *remain unsubstantiated*. In addition, the studies showed an *absolute risk increase for both severe* (0.4%) *and serious* (0.3%) *adverse events for the COVID-19 vaccinations* compared to placebo in adolescents. These findings were in line with the six-month results of the Pfizer COVID-19 mRNA vaccine trial in adults, which showed significantly more all-cause illness in the vaccinated compared with placebo arms (262 vs 150, $p<0.0001$, Table 1). The study, which has a protocol-specified plan to unblind the trial and offer crossover to the vaccine at six months, is unlikely to yield quality long-terms safety data.[81,82] Even more concerning were the rates of severe adverse

events associated with booster administration. A real world study conducted by the US Centers for Disease Control showed that 25.8% of the 3,418 adolescent booster vaccination recipients aged 12 to 17 years were unable to perform daily activities; 20.0% were unable to attend school or work; and ~0.9% required medical care (Figure 5).[100] The vaccinations were associated with dramatic increases in dose-dependent short-term all-cause morbidity with no current evidence of long-term safety.

Additionally, the phase III trials were insufficiently powered to detect less common safety signals in the study population and were not designed to assess safety in the COVID-19-recovered, those with multiple co-morbidities, or the immunocompromised.[81,82] As a result health officials primarily relied upon passive pharmacovigilance systems, which notoriously underreport vaccination-suspected adverse outcomes.[101] Despite their lack of sensitivity of such passive surveillance systems, a wide range of vaccination-suspected adverse events of a cardiovascular, neurological and immunological nature have been reported.[102] The most concerning of these adverse events has been myocarditis/pericarditis, along with cardiac emergencies, which have been observed in multiple recent population-based studies particularly in male adolescent and young adults.[103-107] The risk of symptomatic myocarditis and pericarditis arising after the second dose of COVID-19 mRNA vaccination in 18- to 24-years-old men in Ontario was originally estimated at 1 in 17,000 for Pfizer and 1 in 3,000 for Moderna from June 1 to Sep 4, 2021,[108, 109] but is now approaching 1 in 5,000 (19.8 events per 100,000 vaccine doses) for mRNA vaccines overall following the second vaccination.[110] These rates likely under-estimate overall heart damage as they do not account for asymptomatic myocarditis, which can be three-times higher than symptomatic[111] myocarditis, and both of which have been linked to long-term cardiovascular disease and premature death.[112, 113]

In addition, a recent Pfizer pharmacovigilance report released from the FDA showed that within the first two months of the worldwide COVID-19 vaccination rollout, 42,086 cases of vaccination-suspected adverse events were processed by Pfizer, of which 1,223 were fatal.[114] A total of 1,077 immune-mediated adverse effects including nerve pain, swelling in the brain and myocarditis and pericarditis were reported, of which 780 were serious and 12 were fatal. Moreover, a total of 34 adverse event cases were reported in children less than 12 years of age of which 24 were serious. Both clinical trial and real world findings point to a concerning increase in dose-dependent all-cause morbidity and concerning immune-mediated safety signals, which increase with each vaccine dose.

In conclusion, the COVID-19 vaccinations were developed to protect children from severe COVID-19 outcomes from the Wuhan strain of SARS-CoV-2 at a time when population-wide immunity was limited. Now that Omicron has displaced the original strain and that there is presently widespread naturally acquired immunity, it is abundantly clear that: children are at extremely low risk of severe COVID-19; further vaccinations do not stop transmission; vaccinations are demonstrating negative-effectiveness; each dose is associated with dramatic increases in all-cause illness including life-altering complications; and there is still no long-term safety data. Considering that children have decades of quality life years ahead of them and that the first principle in medicine is to "Do no harm," it is imperative that every public health official do whatever is in their power to immediately halt the vaccination of children until the long-term efficacy and safety of these vaccinations is either definitively established or disproved.

Finally, we note that the Children's Covid Vaccine Advisory Council of the Health Advisory and Recovery Team in the UK has recently made similar concerns to those provided here by the Canadian Covid Care Alliance regarding the vaccination of children in an open letter dated June 30, 2022 with over 60 Ph.D. and M.D. signatories.[115] Likewise, Søren Brostrom, the director of the Danish Health and Medicines Authority has concluded that it was a mistake to vaccinate children for COVID-19.[116] A safety report published in September 20, 2021 by the Federal Institute for Vaccines and Biomedicine at the Paul-Ehrlich-Institut in Germany already concluded that for children age from 12 to 17 years, the number of reported cases of mis-understood COVID-19 vaccine side effects exceeded the total number of COVID-19-related hospitalizations in this age group.[117]

Thank you for taking the time to review our findings. We trust that our research has provided you with evidence needed to adjust Canadian health policy to protect our children from undue harm. We would be happy to meet you to discuss findings documented in this letter in greater detail.

Respectfully,

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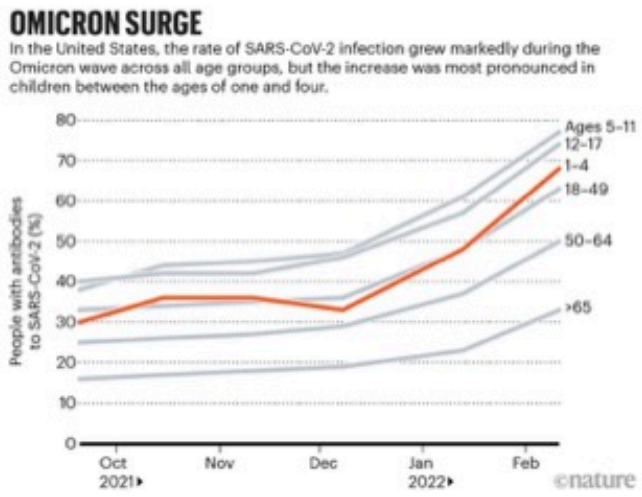
Figure 1: Seroprevalence of infection-induced SARS-CoV-2 antibodies, by age group — United States, September 2021–February 2022



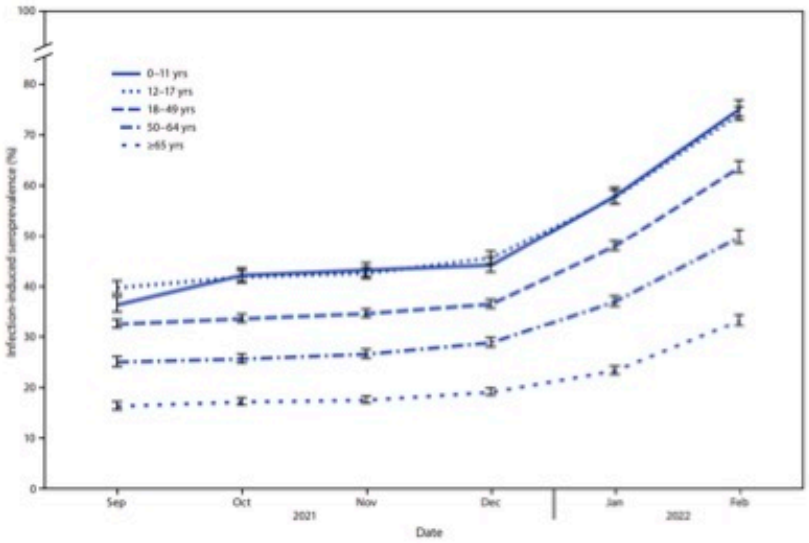


Figure 2: Stability of SARS-CoV-2 antibody patterns in serum samples of twelve COVID-19 recovered individuals tested with the Kinexus 110 marker SARS-CoV-2 antibody screen. The locations of peptides within the various SARS-CoV-2 proteins are indicated in the map shown immediately below. A detectable spot corresponds to the presence of antibodies in the serum that specifically recognize a portion of the target

SARS-CoV-2 proteins. Spot D26 corresponds to a positive control to ensure that the test was working properly. The same participant was tested approximately 10 months later with the results shown in the right panel as compared to when originally tested as shown in the corresponding left panel, and the columns of panels are from the different participants that were tested.

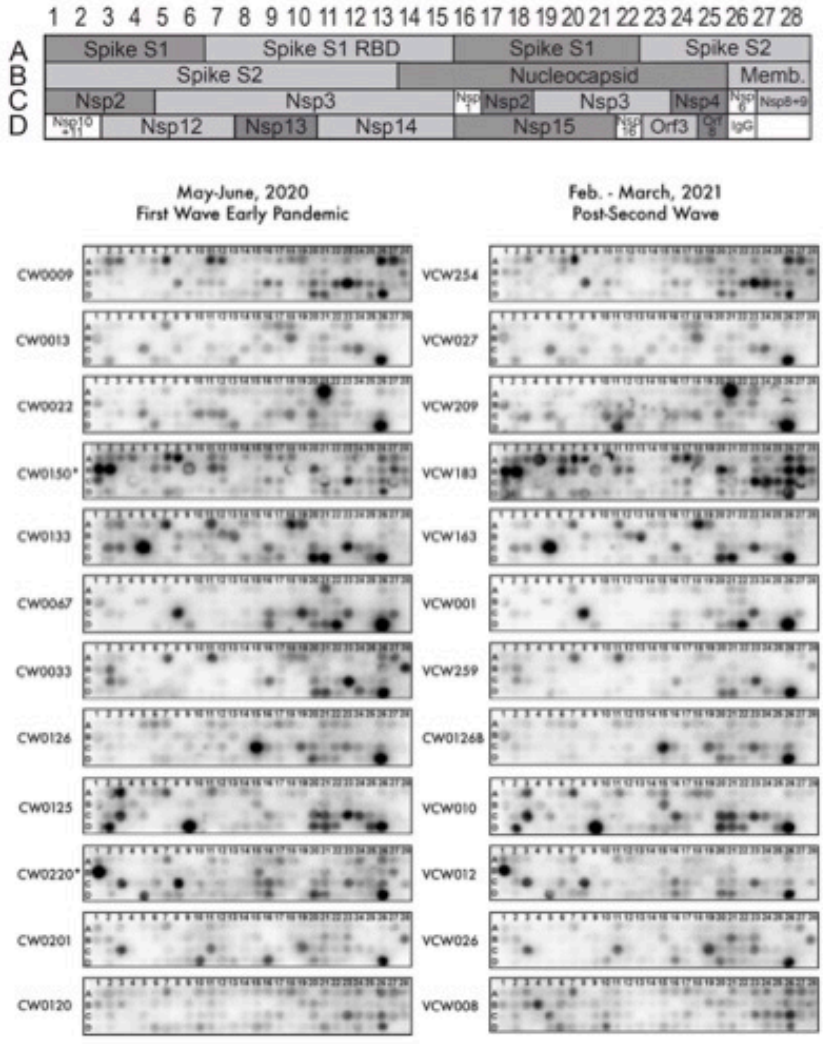


Figure 3: Proportional of daily cases of COVID-19 occurring among A) Ontarians of all ages B) those 12 to 17 years and C) those 5 to 11 years who were 'not fully vaccinated' (i.e., unvaccinated or a single dose; purple line), 'fully vaccinated' (i.e., two doses; pink line), or 'vaccinated with booster dose' (i.e. three or more doses; green line). This graph was copied from Public Health Ontario website on April 30, 2022 (https://covid-19.ontario.ca/data). No data for this graph are available prior to March 17, 2022.

Figure 4: Proportional of daily COVID-19 deaths occurring among Ontarians of all ages who were 'not fully vaccinated' (i.e., unvaccinated or a single dose; green line), 'fully vaccinated' (i.e., two doses; blue line), or 'vaccinated with booster dose' (i.e. three or more doses; pink line). This graph was copied from Public Health Ontario website on April 30, 2022 (https://covid-19.ontario.ca/data). No data for this graph are available prior to March 17, 2022.

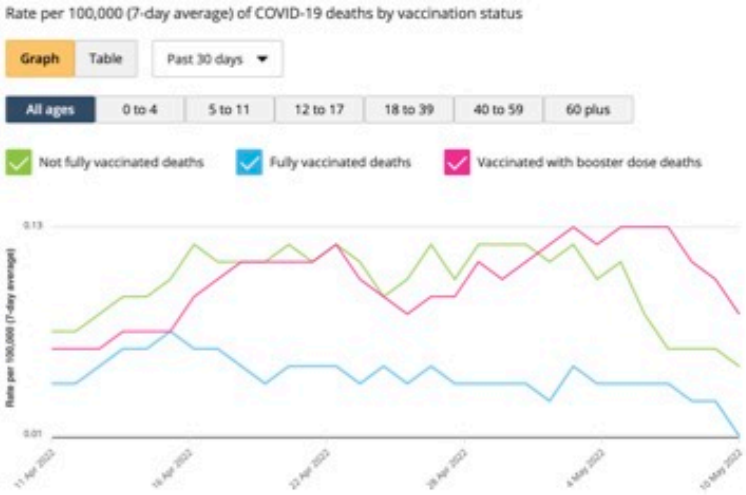


Figure 5 - Local reactions and systemic events reported in 12-to-15-year-olds

within 7 days after administration of dose 2 of BNT162b2 or placebo all participants[78] Symptom severity: Mild-green, Moderate-blue, Severe-orange.

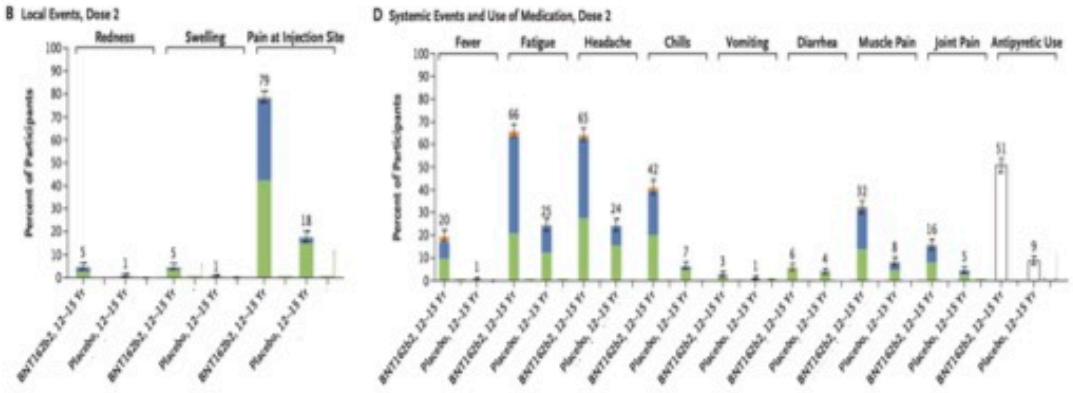


Figure 6 - Adverse reactions and health impacts reported* among persons aged 12–17 years (N = 3,274) who received a homologous Pfizer-BioNTech COVID-19 vaccine booster, by vaccine dose — United States, December 9, 2021–February 20, 2022.

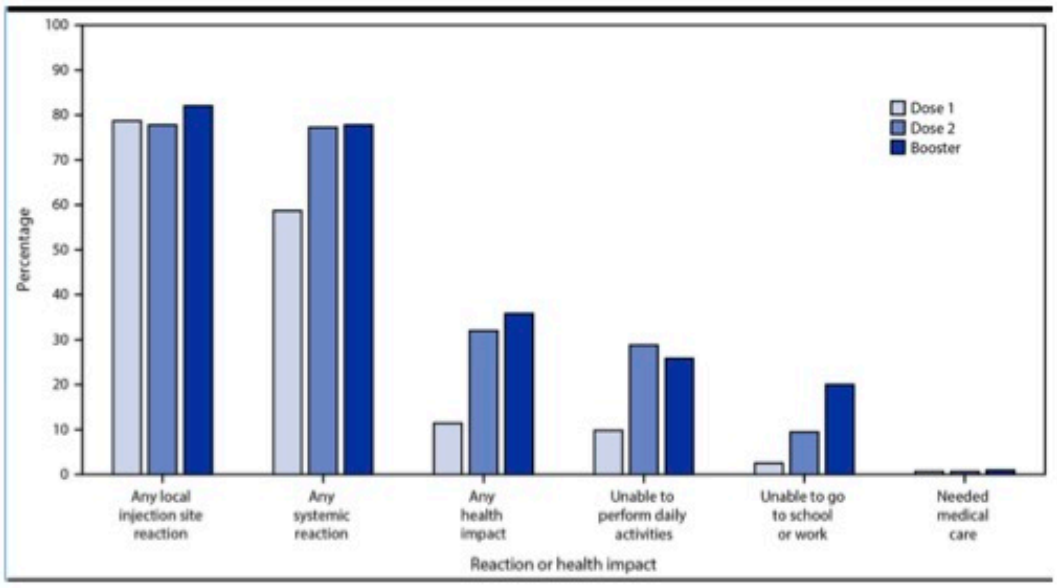


Table 1 - Differences in efficacy and safety events reported in the six-month update of the BNT162b2 mRNA COVID-19 vaccine.[52]

Table 1. Differences in the number of efficacy and safety events in eligible populations[a] reported in the 6-month update of the BNT162b2 mRNA Covid-19 vaccine

Event	BNT162b2 (n)	Placebo (n)	Absolute Difference (p-value)[r]	Absolute Risk Change* (%)	Relative Risk Change* (%)
Cases Adults and Adolescents 7 days after 2nd dose[s]	77	850	-773 (p<0.00001)	-3.7	-90.9
Any Unsolicited Treatment-Related Adverse Event Adults[e]	5,241	1,311	+3,930 (p<0.00001)	+17.9	+299.7
Any Severe Event Adults[f]	390	289	+101 (p=0.0001)	+0.5	+34.9
Severe Cases in Adults 7 days after 2nd dose[k]	1	23	-22 (p<0.00001)	-0.1	-95.7
Unsolicited Severe Adverse Events[w] Adults Prevents daily routine activity or requires intervention or worse	262	150	+112 (p<0.00001)	+0.5	+74.6
Serious Adverse Event Adults[g] Requires hospitalization or results in permanent injury or death	127	116	+11 (p=0.5)	+0.05	+9.5
Deaths during placebo-controlled period [additional deaths during open-label period in vaccine recipients or placebo-only][%]	15 [+5]	14 [NR]	+1 [+5] (p=0.9)	+0.005	+7.1
Deaths due to cardiovascular events[^]	9	5	+4		

a For the purpose of this table and in accordance with the terminology used in the study report, adult and adolescent populations are defined as ≥16 years old and 12-15 years old, respectively;

r Significance figures (p-values) estimated using chi-square calculator available at https://www.socscistatistics.com/tests/chisquare. P values are without the Yates correction. This procedure was applied following the framework used by Classen in his analysis of "All Cause Severe Morbidity" based on data from the initial reports of the vaccine Phase III trials;[107]

** Authors estimated vaccine efficacy using total surveillance time as denominator, however, as this value was unavailable for all the events analyzed, our calculations used the common statistical definition, i.e., number of events relative to total number of eligible patients for each event analysis reported[105] similar to previous analyses of this nature;[105,189]*

s ≥7 Days after dose 2 among participants without evidence of previous infection;

e Adverse events reported outside of the reactogenicity subgroup and assessed by the investigator as related to investigational product / In calculations combining efficacy and safety events, the number of patients randomized that received any dose of vaccine or placebo was used as the study population in the statistical calculations, following the framework used by Classen in his analysis of "All Cause Severe Morbidity".[107] Differences in the total (event-incident) population (randomized vs efficacy vs safety) used as denominator are relatively small and are expected to have minimal impact on the relative differences between groups. Without access to individual patient data, these calculations were performed under the assumption that efficacy and safety events were non-overlapping;

k ≥7 Days after dose 2; confirmed severe COVID-19 defined as PCR-positivity and "presence of at least one of the following: • Clinical signs at rest indicative of severe systemic illness (RR ≥30 breaths per minute, HR ≥125 beats per minute, SpO2 ≤93% on room air at sea level, or PaO2/FiO2 <300 mm Hg); • Respiratory failure (defined as needing high-flow oxygen, noninvasive ventilation, mechanical ventilation, or ECMO); • Evidence of shock (SBP <90 mm Hg, DBP <60 mm Hg, or requiring vasopressors); • Significant acute renal, hepatic, or neurologic dysfunction;• Admission to an ICU; • Death ";

– Severe (grade ≥3) adverse events were generally defined as those that interfere significantly with participant's usual function, those that affect daily living or require medical care; grade 4 events were generally defined as those that required emergency room visit or hospitalization;

g Serious adverse events were defined as any untoward medical occurrence that, at any dose: a. Results in death; b. Is life-threatening; c. Requires inpatient hospitalization or prolongation of existing hospitalization; d. Results in persistent disability/incapacity;

%Deaths during the open-label period were reported only in vaccine recipients, 3 participants in the BNT162b2 group and 2 in the original placebo group who received BNT162b2 after unblinding;

^Those with reported cause of death due to: aortic rupture, arteriosclerosis, cardiac arrest, cardiac failure congestive, cardiorespiratory arrest, hypertensive heart disease, or myocardial infarction

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6. Other Campaign Assets

These materials are all embedded on the CCCA website, but hosted on other platforms, such as Rumble.

Other Campaign Assets	
Video	"Eric Payne - Stop the Shots Expert Video"
[00:35:19] Its description on Rumble reads: "Eric Payne (Pediatric Neurologist), Bonnie Mallard (Immunogeneticist), Steven Pelech (Professor of Neurology), and Deanna McLeod (Evidence-based Medicine Analyst) answer commonly asked questions about natural immunity, myocarditis, vaccine-induced autoimmunity, informed consent, and more."	
Video	"Are the COVID-19 vaccines safe and effective in children?"
[00:29:22] runtime. Description on Rumble: "In our "Ask the Experts" video series, Deanna McLeod provides an analysis of the clinical trial data Pfizer used to determine the safety and efficacy of the COVID-19 genetic vaccines in children. The data shows these products cause more harm than good. Her conclusion is that it is time to Stop the Shots.	
Video	"How has the industry co-opted our healthcare system?"
[00:27:39] runtime. Description on Rumble reads: "In another episode of our "Ask the Experts" series, Deanna McLeod discusses the topics of informed consent, potential conflicts of interest in public health guidelines, and the need for transparency in	

guideline integrity."	
Video	"There is No Justification in Vaccinating Children"
[00:15:24] runtime. The description on Rumble reads: "In our "Ask the Experts" series, Dr. Byram Bridle reviews the role of COVID-19 genetic vaccination in children, the quality of the clinical trials in children, and the strength of a child's natural immunity."	
Video	"Why is naturally acquired immunity the gold standard?"
[00:22:03] runtime. Description on Rumble: "Professor of Immunogenetics, Dr. Bonnie Mallard provides a general overview of the strong protection offered by children's immune system and why the COVID-19 genetic vaccines are not needed to provide additional benefit. She explains how the COVID-19 genetic vaccines work in comparison to traditional vaccines. Dr. Mallard also discusses the role of immunoceuticals[34] and nutrition in strengthening our immunity."	
Video	"Why does the COVID-19 vaccine cause more harm than good in children?"
[00:11:49] runtime. Rumble listing reads: "Paediatric neurologist, Dr Eric Payne discusses the effectiveness and safety of the Covid-19 Vaccines, specifically in Children - Brought to you by The Canadian Covid Care Alliance"	
Video Podcast	"Deanna McLeod Pt.1"

[34] ?!?!!

[1:35:29] runtime. Episode of the podcast "Open Mike with Michael Thiessen", interviewing Deanna McLeod.	
Video Podcast	"Deanna McLeod Pt.2: Myocarditis and the Vaccines"
[01:40:09] runtime. Episode of the podcast "Open Mike with Michael Thiessen", interviewing Deanna McLeod.	
Video Podcast	"Deanna McLeod Pt. 3: Big Pharma and Vaccine Conflict of Interest"
[01:51:34] runtime. Episode of the podcast "Open Mike with Michael Thiessen", interviewing in Deanna McLeod.	
Video	"Should I Vaccinate my Child with the Covid-19 Vaccine?"
Runtime [00:15:06]. Description on Rumble: "As part of a collaboration with various organizations, this video provides and explains some of the untold or unknown facts, statistics, and information related to the Covid-19 vaccines. In this video we hear from experts, compare vaccine data, and reveal some stories of those affected by the Covid-19 vaccines."	
Podcast	"Deanna McLeod and Dr. Eric Payne"
[01:52:37] runtime. Episode of the podcast *Trish Wood is Critical*. Embedded on campaign page, on Spotify and on the *Trish Wood is Critical* website. Description on the CCCA page reads: "In their interview with Trish Wood, Dr. Eric Payne, a paediatric	

neurologist with a masters in public health, and Deanna McLeod, a clinical trial data expert, make the case to "stop the shots" – especially for children."

Appendix C: Twitter Posts by Topic (data)

Twitter Posts: Stop the Shots in Kids Campaign					
Week Of	Stop the Shots in Kids	Canada's Covid Response	Vaccine Injury	Citizen's Hearing	Masks
7/1/2022	0	0	0	1	0
7/8/2022	2	0	0	2	0
7/15/2022	2	0	0	0	1
7/22/2022	1	0	0	0	0
7/29/2022	0	0	1	0	0
8/5/2022	0	1	1	0	0
8/12/2022	3	1	0	0	0
8/19/2022	5	1	0	0	0
8/26/2022	0	0	0	1	0
9/2/2022	1	0	0	0	0
9/9/2022	0	0	0	0	0
9/16/2022	1	1	0	1	0
9/23/2022	3	1	0	0	1
9/30/2022	5	6	0	0	0
10/7/2022	3	0	0	0	0
10/14/2022	0	0	0	0	0
10/21/2022	1	1	1	1	0
10/28/2022	1	0	0	5	1
11/4/2022	1	0	0	0	2
11/11/2022	0	1	0	0	1
11/18/2022	0	1	4	1	1
11/25/2022	0	1	1	0	1
12/2/2022	0	0	0	0	0