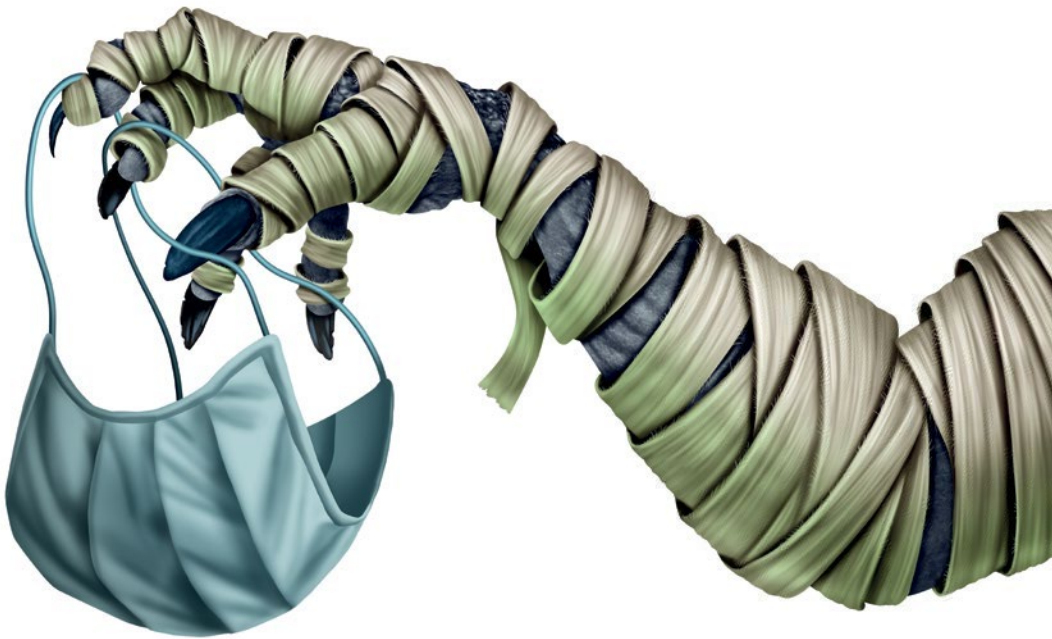
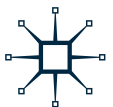


Metaphors of Coronavirus

Invisible Enemy or
Zombie Apocalypse?



Jonathan Charteris-Black



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*This book is dedicated to my mother, Pauline, who did not survive
the pandemic, and all those who suffered bereavement
during the time of Coronavirus.*

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1

Moral Frames and Coronavirus

Introduction

From the beginning of the year 2020 the black swan was rapidly approaching. For years western scientists had warned about the possibility of a serious pandemic, but biased thinking led politicians to believe that any novel, viral infection would probably be restricted to South-East Asia, China or Africa. After all, this had been the case with previous infectious pathogens such as Ebola, bird flu, SARS or swine flu and so, it was assumed, it would continue to be the case with future pathogens. In spite of endless global movements of products and of people, in spite of deforestation and disruption of animal habitats few believed that the transmission of a virus from animals to humans could threaten *all* of humanity. But then nobody believed that in spite of the theoretical possibility of a black swan, there actually was one, until, that is, one was discovered. With the benefit of hindsight, the reality of a global pandemic was a question of when, not if, and the black swan spread its wings across the globe.¹

The 2020 pandemic disrupted our sense of normality, and by ‘our’ I mean, for the first time in history, nearly everyone. Just as trade had

flowed with increasing velocity under the mediating influence of technology, and global wealth had risen year on year, with gaping divergences in its distribution both between nations and among peoples within those nations, so had the assumption of human invulnerability. We might be playing Russian roulette with the climate, but it was a gamble that was worth taking for the advances that technology could bring in terms of human wealth and happiness. Ultimately, reason was in control and threats could be met with a swift, scientific response—until, that is, Covid-19. Suddenly, there was an inversion of the normal order: the more people lived in proximity with strangers in the advanced urban economies, the more they were exposed to the virus. Dispersed people living in remote places, on hillsides or on the margin of forests were now safer than populations teeming in infected cities, inside city apartments or crowded multi-generational houses. The world was turned upside down: the black swan disrupted every expectation.

There was disruption too, as political systems became inverted: those that had been liberal democracies previously now imposed the type of restrictions on personal liberty that is normally associated with authoritarian states, while some previously authoritarian states now opposed placing too rigid restrictions on individual rights. The definition of liberty changed: was freedom wearing a mask and staying in, or not wearing one and going out? Time also inverted and went back to the 1950s, when overseas travel was beyond the dreams of most, when people stayed within their localities and life was centred on the home. It was back to the simple pleasures of darning, and baking, gardening and watching the sunset. Time was something that we had assumed was forwards into a technologically driven future. Now online meetings and Webinars, online birthday parties and dinners bore a faded sepia look, like people crowding around a wireless to listen to the latest news from the frontline, and the landscape took on a slightly surreal glow. Many spoke of a disrupted sense of time: was it passing slowly or rapidly? As diaries emptied, the days took on a slower rhythm based around shopping for food, cooking and exercise and people wrote journals instead. There were household tasks and catching up with the emails, followed by perusal of the latest Netflix offerings. I have even found a diary entry: ‘polish the furniture’, and this regularity made us more aware of time passing. But then a month

or two or three would pass so that time appeared to be accelerating. There was less to *talk about*, but more to *say*: nobody could really be doing much because nothing much was ‘allowed’, but they could be thinking and reflecting more deeply about what, if anything, it all meant.

Usually, we imagine children as being the most vulnerable to viruses, and yet coronavirus again upset the barrel: children’s immune systems seemed to be barely affected while older people were most at risk. Normally the desire to protect others is most intensely evoked in relation to children: it is stressful to see any child suffer and terrible to see our own children in pain. The concept of cuteness triggers an emotional response of care and protection so that we want to comfort by cuddling. Yet this virus affected those who were already most physically distant—the elderly whose clear eyes had been replaced with rheumy ones and whose wrinkled skin replaced soft skin, and whose tired old limbs replaced bouncy zestful bodies. Often there are physical barriers to bodily proximity with the elderly, surrounded by frames, commodes, wheelchairs and a whole apparatus of mobility making it hazardous to approach them. Yet, it was these already distanced people who were suddenly coerced into isolation, who had to be contacted remotely or viewed through screens like aging carp in a fishpond. Enforcing the morality of care often entailed, inadvertently, enforcing a psychology of loneliness and estrangement. It was not only coronavirus that killed, but it was also the regime of separation that accompanied it.

All my mother had talked about since August 2020 was the prospect of Christmas together with family in her own home; would we have turkey or maybe a goose this year? Which bedrooms would we use? Would the girls be able to come? Would we buy a new tree or dig up the one in the garden? In the absence of other things to look forward to everything became focused on Christmas. So it came as shock when just 5 days before Christmas, with the food already bought and plans already laid, we were instructed by the Prime Minister not to travel and I was obliged to stay in a city 100 miles away from her and she would now be spending it alone. On Christmas morning she fell and broke her leg. She had an operation two days later but did not recover from the anesthetic. Though she was not as lonely as many 90-year-olds, the decision to cancel Christmas was devastating for her and presented me with a moral

dilemma: should I break the rules and travel anyway, or should I leave her to Christmas alone? I was surely not alone in having to face such moral dilemmas. My mother may have died anyway irrespective of the pandemic, but the uncertainty surrounding it surely affected her zest for life. When I asked her how it compared with the Second World War, she said the pandemic was far worse because the war had brought people closer together whereas the pandemic forced them further apart.

Life and death risks are confusing: think of Orpheus and Eurydice. Orpheus was in love with a wood nymph called Eurydice, but she died after being bitten by a snake and departed to Hades' realm: The Underworld. Unable to give up the possibility of seeing her again, Orpheus struck a deal with Hades that Eurydice could return to the world of the living as long as he, Orpheus, waited until she got into daylight before looking back. Determined to follow the rules, just as he was approaching the gates out of the Underworld, Orpheus could not stop himself from turning around just to check that she was there, but he had broken the rules and Eurydice was forced back into the Underworld for eternity.

Consider for a moment three things about this allegory: why had this condition been set? Why could Orpheus not stop himself? And thirdly what does this tell us about moral decision-making in the pandemic? There would have been no point in setting the condition about not looking back unless Hades knew that it could be broken. Second, many of our actions are instinctive and beyond our rational control: Orpheus just could not stop himself from looking back to check if she was there because his love for Eurydice was so great. We sometimes do things that we know that we shouldn't because our actions are beyond the control of our conscious thought. Third: how is this myth relevant to the pandemic? Well, it tells us that many of the Lockdown rules were set precisely because they could, or might, be broken. I suspect at least half the population at some point broke one or more of the rules, sometimes unconsciously, sometimes knowingly and sometimes with willful ignorance. And when they did break the rules, very few of them were prepared to admit to that afterwards. Moral decision making during the pandemic can be understood with reference to the allegories and metaphors that form the moral frames for these choices. The aim of this book is to

examine the metaphors and allegories of the Coronavirus pandemic that give insight into the moral frames of our decision making.

Metaphor allows us to frame a moral dilemma in such a way that explains the psychological basis for the decisions we take. If we thought of the NHS staff who cared for our loved ones as ‘guardian angels’, we would more readily agree to their hospitalization. If we were ‘fighting a war’ against a virus, we might evoke appropriate emotions, and so it became acceptable to speak of activating society’s resources—people, knowledge, kindness—as a ‘mobilization’. Scarborough football club has a motto with a Latin origin which translates as ‘No battle, no victory’. This does not mean that every time they play, they are encouraged to kick the legs off the opposition, it is intended to motivate through a commitment to winning and to argue that the attainment of success requires the maximum effort of every player. As Daniel Defoe wrote when describing the Great Plague of London in 1665: “Certainly the circumstances of the deliverance, as well as *the terrible enemy we were delivered from*, called upon the whole nation for it”.² By framing the plague as ‘the terrible enemy’ Defoe was not commenting on an intention to harm people but on an appropriate emotional state for undertaking the necessary actions to protect them, so the moral foundation of Care and Harm justifies the choice of metaphor and provides insight into its moral basis. Going a stage further: if a virus is referred to as a ‘zombie’, because we know that zombies threaten humans, we might find a higher level of commitment towards whatever actions eliminate zombies than if we referred to it just as a virus. It is easier to imagine killing a zombie as compared with suppressing an infection and so if a pandemic is framed as a ‘zombie apocalypse’, then we might already know some of the strategies for staying alive. Metaphors contribute to the moral framing of a situation in such a way that we become biased towards one form of action over another, and they provide insight into the moral framing of our actions.

Moral Frames and the Pandemic

In this chapter I consider how responses to coronavirus were construed in terms of moral decision-making: decisions such as whether to visit an elderly relative, or when and how to wear a mask, whether or not to stay in the city, or—should the option be available—flee to a second home in the countryside. The chapter will be structured using the framework of Jonathan Haidt in his book *The Righteous Mind* where he argues for a ‘social intuitionist model of moral judgment’ in which there is no dichotomy between emotion and cognition. He proposes that emotional intuitions are themselves a form of cognition, so taking a contemporary example, continually hearing the sound of ambulance sirens is likely to trigger those parts of the brain that both arouse attention and create emotional alarm. There is no fundamental split between having our attention alerted as to an emergency vehicle and the types of emotions, fears etc. that derive from our experience of emergencies that it brings to mind.

To explain the power of moral intuitions he employs a metaphor that is part of a fable: the elephant and the rider. The ‘rider’ is a metaphor for the rational mind in which control derives from language-based reasoning and the ‘elephant’ is a metaphor for the emotions and the intuitions that accompany such reasoning. When people face a moral dilemma, Haidt claims that they rely more on the elephant than on the rider, and the rider’s role is to provide some post hoc justification of a decision that is made based on an emotionally motivated moral intuition. The role of the rider is to provide an account of *why* the elephant did what it did and to justify what it wants to do next. The metaphor serves as a heuristic for a position on moral decision making that gives importance to gut instincts rather than rational reflections and seems well attuned to times when populist leaders are appealing to the instinctive emotions of ‘the people’. In this book I explore the evidence from metaphor and language as to how, in the transformed world of the pandemic, journalists and politicians drew on moral frames and the nature of those moral frames on which they relied.

Care and Harm

In his Moral Foundations Theory, Haidt uses the term ‘foundation’ to refer to ‘universal cognitive modules’, since these ‘cognitive modules’ are now more commonly referred to as ‘frames’, I will use this term interchangeably with ‘foundations’. The first of the six moral frames that Haidt proposes underlie people’s moral intuition is Care/Harm (all the moral frames come in such pairs of opposites): this is the desire to protect others—especially vulnerable groups, such as children or the elderly, cute animals or endangered species. I recall a time when a girl I knew well sought to end a relationship with her 18-year-old boyfriend. He could not accept this decision and came to her house in the early hours of the morning after getting very drunk, threw some bricks through the bay windows of the living room and pulled off a car wing mirror and threw it through her first-floor bedroom window. It shattered the glass over her bed that was adjacent to that window. Her father was on the point of rushing out into the street to confront the source of the aggression as he felt that Harm could have come to his daughter from the broken glass in the middle of the night. But she stopped him, knowing that he had an impetuous nature and pleaded with him not to go out: he was motivated by fear of harm for her, and she showed her care for him by protecting him from making matters worse in a street brawl with a drunken young man. The law took due process and this man who had turned 18 that day was taken for a night in the police cell. Maybe he is reading this book now, so the rest remains secret.

Care and Harm provided a very salient moral foundation for Coronavirus because all the resources of society had to be directed towards care and preventing harm. Nightingale hospitals were built in various locations in the United Kingdom to ensure that some form of care would be available even if the hospitals became full. Early on during the pandemic the focus was on obtaining personal protection equipment (‘PPE’) for those dealing with the health needs of Covid-19 patients. Societies sought to minimize the suffering of the afflicted and to prevent infection of those who weren’t. Care motivated the wearing of masks, and they became a symbol of concern to protect others whereas **not** wearing masks

represented concern for the loss of the personal freedoms associated with a different moral foundation—Liberty. Opposite actions gave different priorities to different moral frames: wearing a mask placed Care above Liberty, whereas not wearing one placed Liberty above Care.

Considerations of Care and Harm were sometimes therefore in conflict with those of Liberty and Oppression. When a political leader caught the virus, it sometimes came to symbolize their incompetence in responding to the pandemic. Boris Johnson and Donald Trump contracted coronavirus having not followed guidelines on social distancing and mask-wearing. President Magufuli of Tanzania said “Coronavirus, which is a devil, cannot survive in the body of Christ... It will *burn* instantly”, but in spite of his metaphors, he died after refusing to wear a mask or implementing effective measures for the control of the virus. Societies that were most successful in dealing with the pandemic were those that paid most attention to the moral foundation of Care and Harm: they pulled no punches in prioritizing Care over Liberty.

Fairness and Cheating

The second of the moral frame is Fairness and Cheating; this is grounded in altruistic feelings towards unknown others, for example insisting on people’s right to benefits such as free education and free healthcare. There are expectations of reciprocal altruism: if you act well then others will act in an equally altruistic fashion towards you and your group in the future. This moral foundation derives from experience of kindness from unknown others. At the age of 18, along with many others of my generation, I hitchhiked across France and Italy and took a boat to Greece. I had a backpack and a sleeping bag and slept wherever fortune found me a bed for the night. But I had to place trust in unknown strangers: why would anyone stop to pick up a scruffy and possibly slightly rank teenager? Yet they did and I got there with no mishaps, except one driver who seemed a bit unsure of the exact location of the gearstick. In those days I regularly hitchhiked around England and Ireland as well and had lifts from people in sports cars, from a famous singer, Frankie Vaughan, and from a funeral director who explained to me how to run a successful undertaking

business (a skill I could have put to good use in 2020). In Ireland it was hard to find a car that would not stop for you. On another trip to South America I met a kind and intelligent hippie on an aeroplane flying from La Paz to Lima; he had made a fortune setting up a ‘hole in the wall’ pizza business in Capetown; he didn’t speak Spanish and I had spent the last of my money on the air ticket, so he suggested I spend a few days in Lima where I assisted by translating in restaurants and showing him around the museums and he paid the expenses. He also often bought me a gift, a leather belt with Inca designs stamped on it—there were no ‘special favours’. Why did he do this? And why, subsequently, did I often stop for hitchhikers? It was because helping complete strangers brings gratification and makes you feel better about yourself too. Fairness is not something that is owned by an individual it is a social value and it is based on the moral foundation of Fairness and Cheating. In the context of hitchhiking, it is like any contract, it assumes that the driver will take the hitchhiker to the intended destination without any fee or other services, and all this is based on trust. At the broader level it is because we know that Fairness will rebound to us—somewhere, somehow, and, even if it doesn’t, we have greater peace of mind from believing the possibility that it might. The unspoken assumption of altruistic behaviours is that if you were in my position, you would do the same thing for me as I am now doing for you: this is reciprocal altruism.

During the pandemic there was also an outbreak of fairness: shops and supermarkets marked lines on the pavement outside their stores at 2M intervals so customers could take their turn in a queue while maintaining physical distance. But there was cheating too by those who stockpiled essential commodities such as toilet paper flour, pasta and eggs. Their actions potentially deprived others more needy than them of the chance of obtaining these goods. Some of those who were financially affected by the pandemic because their businesses had closed, or because they had been laid off by employers had to use food banks to avoid hunger. Some hotels offered their rooms to the homeless out of considerations of fairness. Some thought rich countries were cheating by buying up all the supplies of the vaccine before poor countries could get their share. Some framed their views on Fairness and Cheating with a metaphor—*We are the Virus*—that argued that coronavirus was nature’s way of punishing

humanity for the environmental destruction it had inflicted. This perspective on moral reciprocity frames the virus as a form of punishment. Some religious versions of this frame have deep cultural roots in fundamentalist views of the Old Testament that God would eventually punish mankind for his disobedience. Jehovah's Witnesses saw the virus, following the floods and the locust outbreaks in Africa, as heralding the long-awaited End of Times—and the Second Coming. Some Hindus thought that this was karma. Whether secular or religious, considerations of the moral foundation of Fairness and Cheating dominated and was evident in allegories and metaphors.

While fairness and cheating is quite easy to identify in relation to panic buying and looking after those who were not able to look after themselves because of their financial circumstances, it was sometimes a more complex concept than is allowed by the social intuitionist model. This is particularly the case in relation to decisions about whether to vaccinate because they rely on interpretations as to whether the body that is being protected by vaccination is the individual's body or the body politic: the social body which concepts such as 'herd immunity' assume. Sometimes an individual who may not need a vaccine, because they are healthy and have an effective immune system, may still choose to be vaccinated because they don't want to be one of a group among whom the virus can continue to circulate. Conversely, sometimes an individual with a weak immune system who really should get a vaccine may resist getting one because as a matter of conscience they feel unable to taint the sanctity of their own body, the only one they have full control over, with something that tricks it into believing that it has been infected. The decision becomes a matter of private conscience in which the individual makes a personal decision influenced by metaphoric ideas around protection and purity.

Loyalty and Betrayal

The third moral foundation according to the social intuitionist model is Loyalty and Betrayal and concerns the evolutionary advantage conferred by tribal loyalties. In William Golding's *Lord of the Flies* a group of boys are stranded on a deserted island. Without the moral codes of adults to

guide them, they split into two groups around the leaders Ralph and Jack. Their nascent moral sentiments gradually disintegrate under the pressure of fear of an imagined monster and the boys divide into tribes that become entwined in a ruthless life and death struggle for domination. The boys' fears derive from ignorance: they don't know how to start a fire other than with the glasses of a fat boy called Piggy, but this boy who is less protected by tribal loyalties becomes isolated and is hunted down and sacrificed. Evolutionary advantage comes not from knowledge but from the protection offered by membership of a stronger group.

The world suffered a similar challenge to its morality during the Covid-19 pandemic, some people responded tribally by identifying with those who shared their attitude to the level of restriction they were prepared to accept. Some did not wish to sacrifice liberty because they did not believe it was a genuine crisis: it was a 'plandemic' designed by the global technological elite to attain world domination. Others were angry with those less conscientious than themselves who ignored the rules and felt that the only moral action was to report them. There was an outbreak of accusations of treachery and betrayal. Were those who reported on neighbours for breaking Lockdown rules showing Loyalty to the larger social group or themselves betraying their neighbours?

But there were also stories of great personal sacrifice for the needs of the larger group, in the United Kingdom 100,000s of people became NHS volunteers because they wished to display loyalty to those more vulnerable than themselves. People went out of their way to show loyalty and support for their pre-existing groups who were often their families or work colleagues. Health staff, care workers, personal carers, teachers and even academics went out of their way to show solidarity with colleagues by covering for them at work if they were struck down by Covid-19 or needed to isolate. People in shared accommodation, many of them young, showed loyalty to their housemates by all staying in because one of them was vulnerable. They would not be the one to betray the household, even if not a family. I will discuss how the 'social bubble' metaphor evoked the moral foundation of Loyalty.

By contrast, other interpretations of Loyalty led to the shaming of 'out' groups, for example people with underlying morbidities. This rather unpleasant term carried with it the implication that they were somehow

responsible for their condition. This developed into a more general criticism of, for example, obesity: since the healthy did not get ill, the unhealthy were sacrificing the liberty of the rest of us. Betrayal is always a powerful moral intuition in times of danger; those who do not observe the rules could be viewed as betraying the rest of society. Interestingly, previous tribal loyalties that had emerged over Brexit between ‘Leavers’ and ‘Remainers’ soon evaporated. The fears of chaos at the borders in the lead up to the final departure of the UK from the EU were replaced by anxieties about what was arriving from across the borders. The debate soon dissipated as it appeared that national governments were faster and more efficient in vaccine procurement and in implementing vaccination programmes. At the time of writing the United Kingdom has administered 77.37 million vaccinations and 62.87% of the population have received at least one vaccination; this compares with EU countries such as Germany 65.74 million vaccinations (50.21% of population) or France—47.71 million vaccinations (47% of population).³ The European Commission was set up to regulate business not to do business in global vaccine markets. The President of the Commission, Ursula von der Leyen, prohibited exports of vaccine to the United Kingdom thereby engaging in what was sometimes described as ‘vaccine nationalism’. There may be nothing immoral about this position, but it derives its morality from the foundation of Loyalty which argues that the health needs of your own nation, or in this case group of nations, should be considered before those of other nations, and giving away vaccine betrays your group. Loyalty and Betrayal can be, like Janus, a two-faced God: if you are loyal to one group, you risk being disloyal to another.

There are cultural variations in how Loyalty and Betrayal are interpreted. In China moral concepts were based on awareness of the interdependence of citizens and their mutual obligations, if someone became ill, the rotten apple would spoil the barrel. The role of government was to suppress individualism and place emphasis on loyalty to the group by enforcing stringent Lockdown measures. There is ancient Chinese story: the Yellow Emperor was trying to find a friend and stopped to ask the boy for directions to the village where the friend lived, and the boy gave him directions. The Emperor found the boy a source of good advice on various other topics and valuing his responses asked him if he knew the best

way to govern a country. The boy, who had a background in herding horse, replied with a metaphor: *you just have to drive the wild horses out of the herd*. This reply shows that the way to protect society is to ostracize those who do not obey the laws—the traitors. The allegory of herding horses illustrates how metaphor can express moral perspectives, in this case Loyalty and Betrayal.

Authority and Subversion

The moral foundation of Authority and Subversion derives from the belief that a society requires structured hierarchies. To illustrate this consider the Royal Marsden hospital website that has a page for Nurses' roles and uniforms: Matron (blue uniforms with red piping); Sister and Charge Nurse (dark blue uniform with white dots); Senior staff nurses (blue and white striped uniforms with red piping and a red belt); Staff nurse (blue and white striped uniforms with dark blue piping and a dark blue belt); Healthcare support worker (white uniform with brown or yellow piping); Housekeeper/Ward clerk (dark blue top with white polka dots and black skirt or trousers); Research nurse (a royal blue uniform with dark blue piping); Advanced nurse practitioner (dark blue uniforms); Critical care outreach nurse (dark blue uniforms with green piping) and Clinical site practitioner (dark blue uniform with yellow piping).

These are only the nurses, and presumably there are other hierarchies for doctors and consultants. Evidently a health service is structured very clearly in terms of rank and authority on the basis of qualifications, training and years of experience etc. and attention to the health needs of patients requires a highly structured hierarchy. There is a clear line of command in hospitals so that those who do not follow the rules are reprimanded by those responsible for enforcing these rules.

In June 2016, the month of the UK's Referendum, Michael Gove, a staunch supporter of leaving the EU, famously said: "I think the people in this country have had enough of experts with organisations from acronyms saying that they know what is best and getting it consistently wrong".⁴ However, with the arrival of Covid-19 governments everywhere relied on the authority of experts in molecular evolution, epidemiology,

clinical science and practice, modelling infectious diseases, behavioural science, statistics, virology, microbiology, social science, social psychology, economics and other disciplines. The list was so long that in statements of policy the government justified decisions with the simple claim that they were based on ‘what science has advised’. Quite swiftly appeals to the desires and wishes of the ‘people’ were replaced by those based on the authority of ‘science’ which now formed the main argument for the legitimacy of their decisions. In the face of the pandemic governments sort to gain support for their policies from the health experts from whom they derived much of their authority. The enforcers of Covid-19 policies were institutions such as the police, army and civil service that gain their legitimacy from government. The moral foundation of scientific authority is discussed in Chap. 5—Epidemiology: Science, and Metaphor.

But not all accept that Authority is morally right. A very good example of Subversion is opposition to the vaccine. Some felt that loyalty to a particular faith prevented them accepting the control of a state over their body. Others did not believe that the state was necessarily governing in their interests and therefore they did not trust government and sought to subvert its authority. It is worth recalling that the idea of objecting to government on the grounds of conscience originated in *resistance to the legal requirement to be vaccinated*, not in refusing to fight a war. In Britain the Vaccination Act of 1853 ordered compulsory vaccination for infants up to 3 months old, and the Act of 1867 extended this age requirement to 14 years, adding penalties for vaccine refusal. After considerable political action by the Anti-Vaccine movement, the Vaccination Act of 1898 removed penalties and included a “conscientious objector” clause, so that parents who did not believe in vaccination’s safety or efficacy could obtain an exemption certificate. The right *not* to be vaccinated was one gained through Subversion of the authority of government in the second part of the nineteenth century: vaccine resisters saw their bodies “not as potentially contagious but as highly vulnerable to contamination and violation”.⁵ This outlook derived from the moral foundation of Sanctity and Degradation.

Sanctity and Degradation

The background to the coronavirus pandemic was a disruption of mankind's relationship with Nature. The increasing proximity of virus-carrying-animals to human beings caused by environmental degradation had created the conditions in which coronavirus could transfer, either directly or via an intermediary, from an animal source to a human target. The Environmentalist movement had often appealed to the idealization of the Sanctity of nature. For those who believed in this, coronavirus was a potential blessing and numerous accous of man's restored relations with nature abounded on social media. A movement grew around the hashtag #WeAreTheVirus:

Wow...Earth is recovering

-Air pollution is slowing down

-Water pollution is clearing up

-Natural wildlife is returning home

Coronavirus is Earth's vaccine

We're the virus⁶

The concept of the Earth as sacred was powerful and overwhelming and there were tributes everywhere to Nature. The meme "We are the virus" spread widely on social media—being retweeted 70,900 times and receiving 290,900 'likes'—and this reflected a moral disgust with humanity for not respecting the sanctity of the planet. Such viewpoints could be described as; 'Eco-fascist' since there was undeniably a streak of sanctity and disgust underlying the social intuitions of some of the environmentalist movement. I discuss their metaphors and corresponding allegories in Chap. 4.

The sanctity of nature is broadly in keeping with the social intuitionist approach to moral frames. Even the Duke of Sussex expressed these sentiments:

Prince Harry said: "Somebody said to me at the beginning of the pandemic, it's almost as though Mother Nature has sent us to our rooms for bad behaviour, to really take a moment and think about what we've done.

It's certainly reminded me about how interconnected we all are, not just as people but through nature. We take so much from her and we rarely give a lot back... At the end of the day, nature is our life source... But you can't uplift, educate and inspire unless there is a form of action that follows."⁷

In his book *Natural*, written before the pandemic, Levinovitz argues that a faith in Nature has replaced the feelings of Sanctity that were previously attributed to a divine presence, to a God. The main argument is summarised in its sub-title: "How faith in nature's goodness leads to harmful fads, unjust laws and flawed science". He explains the limitations of making a fetish out of Nature:

When the state of nature represents purity, then every fruit of modernity becomes a potential source of pollution. Food is toxic. Cribs are abusive. Unnatural lifestyles destroy our bodies. Technology destroys our souls. This mind-set conduces to deep existential anxiety which leads to the desperate piecemeal adoption of seemingly natural practices.⁸

The 'We are the virus' meme expressed a similar tendency to sanctify 'Nature' and this was clearly expressed in Prince Harry's 'Mother Nature' metaphor. Reference to 'Mother Nature' occurred in 247 news reports in the British press in the three months from 1st March 2020 as compared with only 157 times in the same period in 2019 (an increase of 57%). In this allegory, mankind was a self-seeking, greedy, voracious species that was creating the conditions for its own destruction because it was not in harmony with its environment. To some extent the pandemic appeared to be proving this to be true: the zombies were the armed forces of nature fighting back.

Shortly before the onset of the pandemic I was in a sauna at the local lido when a woman started coughing, quite loudly and repeatedly. Though I realized this was (probably) unintentional on her part, I shrunk back and felt disgusted at her behaviour. In April 2020 *MailOnline* reported that in Australia:

Under new coronavirus rules, anyone who spits or coughs on health care workers or police will be slapped with a \$5000 fine.

The extreme measures were announced in response to the 'abhorrent' incidents in the last few weeks which saw nurses and police coughed or spat on during the coronavirus pandemic.

NSW Health Minister Brad Hazzard and Police Minister David Elliott said anyone found guilty of the disgusting act will cop the huge fine and possible six months in prison.⁹

An employee of London transport, Belly Mujinga, who worked at London's Victoria railway station, died two weeks after being spat at by a man who claimed he had coronavirus. The act of spitting in the presence of others is disgusting at any time, but when initiated by someone who believes themselves to be infected with Covid-19 it becomes deeply disgusting, irrespective of whether it is directed at a nurse, or anyone else.

The moral foundation of Sanctity/Degradation is based on emotions such as disgust towards dead or decaying matters or towards behaviours such as incest that challenge basic rules of morality. The feeling of disgust may have its very origin in resisting the spread of microbes, or genetic deformity and the psychologist Mark Schaller has described disgust as part of the "behavioral immune system".¹⁰ However, a more recent study argues that findings from the human pathogen-avoidance literature shows that disgust is not useful in the context of pandemics such as Covid-19. They argue that in pandemics infected individuals are contagious before any symptoms emerge and some never develop any symptoms. Disgust in traditional societies was based on the smell of putrid food and this did not apply in relation to Covid-19.¹¹ However, I think that the behavioural routes through which Covid-19 is transmitted **do** evoke disgust cues. I recall feeling disgusted at the woman coughing in the sauna because one of the first described symptoms of Covid-19 was a 'dry cough'. The purpose of pathogens is endless self-replication like the infinite reflections of mirrors facing each other. Their quiet seduction of the human immune system could happen either harmlessly, without the infected even knowing, or wreak havoc in the respiratory system. Behaviours labelled 'disgusting' by the British press included stockpiling essential goods, disposing of masks in public, and the booing of the Covid vaccine by the crowd at the Australian tennis Open in February 2021. The TV host Piers Morgan furiously attacked a man who recorded himself licking a row of toiletries in a shop during the coronavirus crisis.

Sanctity and Degradation influenced the intuition of anti-vaccine supporters. The human body was degraded by injecting it with

contaminants, among some Muslims there was concern that the vaccine contained pork, and in the case of Lockdown sceptics it contained a Bill Gates microchip as part of the strategy for global domination by the elite. But these beliefs based on Sanctity were themselves something of a luxury, as Kenan Malik comments:

In countries with robust health systems, people have the dispensation to opt for natural childbirth, or alternative medicines, or reject vaccines. In much of the world in which “natural” childbirth is an imposition on women, not a choice, both maternal and infant mortality rates are staggeringly high. It is poverty that condemns so many in the global south to rely on traditional medicine or to live without vaccines.... It is the poor, whether in rich countries or in the global south, who most suffer from industrial pollution, are most imperilled by climate change and most threatened by the consequences of the coronavirus. This is not because humans are violating nature, but because societies are structured in ways that ensure that innovation and development remain the privilege of the few, while depredation and ill health are the lot of the many.¹²

Liberty and Oppression

The final moral foundation in Haidt’s model, and a late addition, is Liberty/Oppression; this describes the attempts by one group to dominate another. During the Covid-19 pandemic this moral foundation was sometimes in outright conflict with other moral frames such as Care and Harm and Loyalty and Betrayal. There was an ongoing moral tension between claims for the economic freedom of the private sector and the need to prevent harm to others by allowing the spread of the virus. Then there was the question of enforced immunity by vaccination. Originally, ‘immunity’ referred to limits on state jurisdiction, as for example in the concept of ‘diplomatic immunity’ that puts limits on the scope of state authority, but in medical contexts, individuals also had the right *not* to have immunity from disease forced on them. In either case, judgements are based on notions of Liberty and Oppression.