Episode: Ethics Talk Videocast Transcript – Immunity Status, Social Privilege, and the Novel Coronavirus

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[bright theme music]

TIM HOFF: Welcome to another special edition of *Ethics Talk*, the *American Medical Association Journal of Ethics* podcast on ethics in health and health care. I'm your host, Tim Hoff. This episode is an audio version of a video interview conducted by the Journal's editor in chief, Dr Audiey Kao, with Dr Kathryn Olivarius. Dr Olivarius is an Assistant Professor of History at Stanford University. She joined us to talk about how yellow fever epidemics during the antebellum South provide a historical lens to examine power asymmetries and health inequities in the COVID-19 era. To watch the full video interview, head to our site, JournalofEthics.org, or visit our YouTube channel.

DR AUDIEY KAO: Good afternoon, Kathryn, and thank you for being a guest on E*thics Talk* today. [music fades out]

DR KATHRYN OLIVARIUS: Hi there. It's great to be here.

KAO: So, your work as a historian has focused on the antebellum South, slavery, and infectious disease. But before we explore how this past informs our present, can you tell our audience why this time in history grabbed your attention as a scholar?

OLIVARIUS: So, when I was beginning my PhD about a decade ago now, I was actually, I was going to be writing about something different. I wanted to study how the institution of slavery shifted from the French and Spanish colonial periods into the American period in the 19th century. But when I actually got into the archives in New Orleans and Tulane's archives for the first time, what impressed me most, what sort of left this sort of lasting impression, was how much people talked about their health and sickness and epidemics. And so, you would read these five-page letters, three pages of which would be about symptoms or about anxiety or fear for the future. And what they were scared of was one disease in particular, yellow fever.

And so, I left the archives, and when I did more research into this, I came to discover that yellow fever was a major, major problem in the American Deep South. Basically, it reached epidemic levels every second or third summer, and it killed many thousands of people, in fact, about 150,000 people in the six decades between the Louisiana Purchase in 1803 and the Civil War in 1861 in New Orleans alone. And that number gets even larger if you include cities sort of close to New Orleans like Biloxi or Pensacola or Natchez, cities upriver, up the Mississippi River or along the Gulf Coast. So, I came to sort of see this—I think it's easy to sort of write off all this discussion of health. People were sick in the past, and of course, they talked about it—but I came to see these discussions about sickness and anxieties about epidemics and disease to be less sort of background noise, but more like dark matter. That this was an essential part of life for people in the antebellum South and a key aspect for the kind of society with slavery and commodities and capitalism that came about.

KAO: So, as you just noted, yellow fever was a plague that routinely wreaked havoc in the 1800s, especially across the South and in cities such as New Orleans. In fact, about 50 percent of those who got infected died. That meant that during yellow fever outbreaks, about 8 percent of the population in New Orleans died. But for those who survived, they acquired lifetime immunity. How did this epidemiology drive the behavior of individuals and institutions in the antebellum South?

OLIVARIUS: So first, I think it's important to sort of understand what it's like to have yellow fever and die from it and the sort of long shadow this cast beyond people just sickening and dying from it. So, yellow fever is a mosquito-borne flavivirus. They did not know that it was mosquito-borne. But victims generally experienced sort of the sudden onset of chills and nausea. And many people in the most serious cases, they would have organ failure, and eventually they would vomit up this sort of partly-coagulated blood that looked a lot like coffee grounds. That's sort of the telltale symptom of yellow fever. And many people lapsed into a coma and then died. And this all happened very fast, and it was a very violent and painful way to die. So, this is petrifying in itself. But beyond that, there was no cure. There was no vaccination. There was no conclusive evidence of disease transmission. There was no evidence for why it affected some people more than others. They did not know, in fact, until the end of the 19th century that it was spread by mosquitoes.

KAO: Mm.

OLIVARIUS: And moreover, for people on the ground, this problem was worsening with each decade. And so, epidemics are growing worse and worse and worse. Generally, we can say that they're worsened because of mass migration, immigration to the city. As more people come in, crowd diseases are worsening. The worst epidemic was in 1853, with about 12,000 people dead, making this actually one of the worst natural disasters in American history. And more than that too, everybody had a personal experience with this disease, whether you might've had it. But you definitely knew somebody who had it. You certainly knew many people who had died of it. But it kind of came to be accepted that the yellow fever situation in New Orleans could not be fixed. It wasn't going away. And yet New Orleans was also geographically and geopolitically and economically so important to the United States that they couldn't give it up. Because you need to have a city here at the base of the Mississippi River, and you need a lot of people here to sort of grease the wheels of the cotton, sugar, and slave industries.

KAO: Right, right.

OLIVARIUS: So, the good news, as you mentioned, is that—if you could call it good news—is that survivors of yellow fever gained lifetime immunity, or they became what was known as acclimated in the parlance of the time. About 50 percent of people became acclimated; the other 50 percent died. So, with this knowledge of immunity, Orleanians adapted to their fatal environment by generating this kind of invisible epidemiological hierarchy, which commingled with and exacerbated the racial hierarchy of Whites, free Blacks, and slaves. Here, acclimated citizens, these survivors of yellow fever, were at the top of the structure. And these people were followed by unacclimated strangers: those people in this kind of limbo awaiting their brush with this disease. And they were followed by the dead: those, in the logic of the time, without sufficient bravery or morality to survive.

Now, the problem was that acclimation was definitionally quite vague. Yellow fever does not leave physical scars. Not everyone had the telltale symptom of black vomit. And yellow fever was also quite symptomatically similar to other diseases in this region, endemic to this region, in the 19th century South, especially malaria. So, it was assumed that children, if they survived to the age of five, were immune to yellow fever. And this is generally true because they would get yellow fever around the same time that they would get other childhood diseases like measles, for example. And so, it was assumed likewise, that Creoles—back then, that meant people who were born and raised in Louisiana or the tropics—were immune as a kind of birth right. But these are a lot of assumptions. And essentially, this immunity is impossible to verify without diagnostic blood testing, which didn't happen until the 20th century. So, immunity was kind of invisible and performative, and people performed the heck out of it because it really, really mattered.

Unacclimated White people in New Orleans faced all sorts of impediments. You could not get a job, you could not get safe housing, you could not get a life insurance policy, and you couldn't really advance in society writ large. There's examples of people, fathers who will not let their daughters talk to unacclimated men because they're scared that he's going to die, and she'll be left heartbroken. So, when you see job interviews, if you go for a job interview, one of the first things you talk about is your acclimation status.

KAO: Mm.

OLIVARIUS: So, for White people in this society, acclimation was called the baptism of citizenship. It was sort of treated as a credential, a kind of springboard to further social and economic power.

But the kicker also is that surviving yellow fever also became a kind of moral or patriotic stamp: that a newcomer had rolled the epidemiological dice and had chosen to survive, and they were now considered worthy investment. But in a society of such values, it's no wonder that people actively sought sickness.

KAO: Right.

OLIVARIUS: This is a disease that kills half of all people. But you see people quite literally eating black vomit. You see people injecting into their blood veins. You see people crowding into cramped dwellings, essentially in the sort of antebellum forerunner to these chicken pox parties.

KAO: Yeah.

OLIVARIUS: So, people actively, you know, this is so valuable, that people are willing to risk a very high chance of death.

KAO: So, if I can interrupt: you talked quite a bit about its effect on White inhabitants and Creoles in the antebellum South. But the logic, as you put it, of yellow fever and acclimation must have shaped and infused the market for enslaved people.

OLIVARIUS: Yeah. Yeah. So, yellow fever was at the core of the justifications for slavery writ large across the Cotton Kingdom. So, pro-slavery theorists and doctors and ministers and politicians, they all argued this theory that all Black people were naturally resistant to yellow fever. This is not true. There is zero epidemiological basis for hereditary resistance to yellow fever. But with this claim of Black immunity, slavery could be justified on this sort

of massive scale. And in fact, you have people in the past who said that slavery, racial slavery, was literally humanitarian because it protected White people from spaces and forms of labor that would otherwise kill them. So, yellow fever was basically used then as a sort of scientific justification for expanding the slave system.

But on the one hand, you have this claim that all Black people are immune to yellow fever, but slavers contradicted themselves on this point, showing that they did not really believe what they were saying. So, no slaveholder would purchase a person in the slave market who did not come with a guarantee of acclimation. So, acclimated slaves sold for between 25 and 50 percent more. And I should also mention here, too, that if acclimation could lead to bigger and better things for White people, that this was a way to enter into the higher rungs of the social and economic hierarchy. This did not happen for Black people. It was sort of engineered socially so that Black people could not benefit personally from their acclimation. And the term “acclimation” even came to essentially reduce a person’s past suffering with this disease into a marketable asset.

KAO: Right. Yeah. You also mentioned that people used to consume the black vomit, inject what they would consider to be infected materials to get acclimated. And so, desperately seeking disease so as to acquire the so-called immunocapital, as you put it, was even promoted by some in the medical community.

OLIVARIUS: Mmhmm.

KAO: Dr Edward Hall Barton, President of New Orleans’ 1841 Board of Health, suggested that the value of acclimation was actually worth the risk of contracting the disease. Of course, this way of accruing immunocapital, as you just mentioned, was denied to millions who were enslaved.

OLIVARIUS: Yeah.

KAO: What, if anything, does this history speak to the status of persons we’ve been calling essential workers for months in this COVID-19 pandemic, many of whom are people of color who are driving buses, working in warehouses, processing meat products, or delivering our packages?

OLIVARIUS: So, disease have this sort of uncanny ability to lay bare who belongs in our societies and even which lives matter the most. In antebellum New Orleans many people remarked that cotton was expensive, but life was cheap; sort of an admission that those in charge valued the Cotton Kingdom’s economic growth more than certain individuals’ lives. Or even that mass death was profitable for the most powerful actors in antebellum New Orleans. Now, COVID, of course, is a lot less fatal than yellow fever, but many of the lessons from history, I think, still apply. We don’t have a vaccine yet—we probably won’t for many years—nor do we have any effective treatments. So, we’re going to be in this for the long haul. But as the economy craters and we start to see the sort of ancillary aspects of this global public health crisis play out, we are already seeing the kind of the stitching of our society show more and more: how essential all sorts of people are to our economy that would normally be written off. So, these are undocumented laborers who are picking food and keeping our food and supply chains afloat. These are postal workers who are delivering packages. These are the meat processors at these large factories. These are the bus and cab drivers and the nursing home workers.

There has been, and there will be, I think, increasing pressure on many cities and states and even countries to open up, even though 75,000 Americans have died, and that number is still going up in certain places quite quickly, particularly among those at-risk populations you mentioned. Moreover, we are reopening without a sober strategy of widespread testing, both for antibodies and for the virus itself. So, this worries me not just at the macro level, the sort of social macro level, but at the micro level, as I fear it will lead to people having to make choices about their health that they should never really have to make. History has shown just how much epidemiological risk people are willing to take on for economic security. So, I think we can all agree that rich and poor people are already experiencing this pandemic quite differently.

Rich people can socially distance, they can sit at home, they can work remotely on Zoom while still getting paid and retaining health insurance. Many, many, many poor people, wage workers who are disproportionately people of color, do not have the option to stay home. Nor do they necessarily have other employment options or recourse with their employers. So, many people will essentially, I fear, be forced to risk their health to get and keep these essential jobs to support their families, pay rent, and of course, feed themselves and their families, too. So, the essential workers you mentioned already are already at extraordinary risk, not just for themselves, but for others in their families and communities. And there are already very large disparities in exposure, testing, and treatment to COVID-19. And this pandemic has the potential to exacerbate all sorts of our preexisting social inequalities and punish the most vulnerable people in our societies twice over: first for their circumstances and then by the disease itself.

KAO: Yeah. If I can just follow up, you mentioned a couple of things in your last response about antibody testing and the desire for countries to quote-unquote “return back to normal.” So, with anybody testing of COVID-19 or knowing the immunity status of individuals is seen as an important element of opening up the economy and returning to normal. And some countries like Chile and Germany are considering the use of so-called immunity passports. Putting aside for a moment the presumption that COVID-19 antibodies are protective has yet to be scientifically confirmed, how should we think about these immunity passports, given your work on immunocapital? And should we even be using the passport metaphor, since passports confer access, ease of entry, and mobility, all things that we associate with social privilege?

OLIVARIUS: So, I would stress caution before making any kind of policy out of antibodies, not just on scientific grounds, the ones that you mentioned, but also in social ones. So, much of the discussion about immunity passports, they liken a sort of immunity passport to a driver’s license, for example. So, you get licensed, you can drive a car, and the overall risk is reduced in society. And others have likened this to a kind of temporary rating system to allow people back into society until we can get to a vaccine. So, any impact would not be long-lasting. And others have said that this is essentially no different than a sort of vaccine stamp in a passport like you would get for yellow fever today if you were traveling to parts of West Africa, or this is no different maybe than the requirements for kids to get vaccinated for measles or other diseases before they go to school or university.

But the kind of immunity passports, this is different than all the things I just mentioned. We don’t have a vaccine. And of course, there’s, as you say, so much we don’t know about immunity to COVID. We’ve never had this kind of system of immunological licensing that would require people to actually get sick to get the passport and thus be afforded the privileges of immunity. So, even if we learn, for example, that people with antibodies are immune to COVID and this immunity is long-lasting and protective, this system would not

be a silver bullet as much as governors and mayors and even the President might want it to be. And though they may not be unethical, immunity passports per se, immunity passports have the potential to be sort of extremely divisive, even disastrous, not least because implementation would require overcoming a huge number of very, very significant and large obstacles. So, we need to take into account what our society actually looks like right now and make sure that we are not doubling down on all the other forms of bias and inequity that we have in our society to do with race and ethnicity and gender and employment or geography.

The scariest scenario that I can sort of foresee is this kind of dystopian Wild West where the haves with antibodies can participate in society: so, they can go back to work, they can go out to eat, they can travel, they can visit elderly grandparents. They can sort of approach what was normal not so long ago. And then on the other hand, you have the have nots without antibodies who are forced to remain indoors, who can't work, and who can't participate in society. And then it gets even scarier when you start to think down the road. So, what is to stop a small business or a school or a company like Walmart or Amazon or something to say that they will only employ those people with antibodies because they don't want the liability? And then individuals will then make the, I think, actually rational, potentially, decision that they have to get sick if they want to participate in normal society, if they want to financially support themselves, if they want to keep health insurance. And this isn't good policy. It's an invitation to introduce much more inequity and suffering into our system.

And Americans, of course, don't like things to be unfair. So, what if the system that arises seems to reward and privilege those people who were sick and have recovered, and discriminated against those people without antibodies because they have followed the rules of the lockdown, because they are immunosuppressed and can't risk their health, or because they have other risk factors and so, have really maintained social isolation. And will people lie about their immunity status? What happens if testing is not accurate? So, there are a lot of very complicated questions that we have to ask ourselves in balancing health, our economy, but also social equality.

KAO: Right. No, you make some excellent points. And I think along the way in your responses, you've mentioned that we need to look at epidemics beyond simply biological events with public health implications, where, in fact, epidemics and pandemics shine a bright, oftentimes unflattering, light on underlying social, economic, and political power asymmetries. So, what do you think the current pandemic says about the state of our union? And what can history teach us about how we can mitigate and eradicate some of these power asymmetries?

OLIVARIUS: So, as you say, I think epidemics and pandemics don't necessarily create new inequalities; they sort of lay bare the ones that we already have. And I think in terms of the state of our union, I think we've seen here how federalism is a sort of blunt instrument in the face of a global pandemic. We have 50 governors making decisions and mayors making even more vocal decisions. This is basically impossible to coordinate. And I think, sadly, people use disease and attribute human-like agency to viruses, even though, of course, viruses don't think. They aren't partisan. It's humans who use viruses as a vehicle to increase racism, increase discrimination and partisanship.

So, some of what we're seeing today is straight from a history textbook. Today, we've seen a lot of people looking to cast blame and scapegoat. Scapegoating is perhaps easier to do and far less rigorous than focusing on solutions or addressing how we can create a

more equal society after this pandemic. So, for example, in the 18th and 19th century in the Atlantic world, yellow fever was often called the African fever or African plague. This was a way to cast blame: to make the origin of this disease associated with Africa, with other people. And it was also billed as a “stranger’s disease.” This was the sort of most common moniker. And it was associated with immigrants primarily from Ireland, and this led to a lot of nativism and xenophobia. And it also, I would say, allowed the government to not develop robust solutions to the problem. If the problem is imported, if it’s a problem of other people that’s being caused by a racial outsider, then that’s not the problem of the New Orleans municipality. And that’s what they argued, at least.

And of course, we see this today with COVID-19, where we see intense, intense stigmatization encouraged by the president, I should say, against Asian people who are being blamed for spreading this virus. And, of course, the president’s calling this the “Chinese virus” or the “Wuhan virus,” this is all very deliberate sort of linguistic conditioning to make people cast blame rather than focus on the problems that are right before them. So, I think people scapegoat, of course, when they feel scared and when they feel like their lives have been upended. When we are stressed, we plan, but we can’t plan for anything right now. So, it is sort of immensely frustrating. It must be immensely frustrating to watch your small business collapse or your bank account dwindle with no apparent end in sight. So, I think this is an unprecedented crisis in all of our lives and that has made many, many of us sick. It’s made even more of us scared, and it has warped literally the passage of time to move like very stressful molasses or something.

And what we need now, I think, a way to counteract all of these sort of worst social effects, what we need now is very sober, consistent leadership to convince people who have quarantine fatigue or who want to liberate their governments or who want to cast blame on outsiders, that we need this leadership to convince these people that their actions matter and that they matter too, that they are playing a role in all of this. And we need to be able to connect the individual person to the sort of raging waves of this global pandemic.

And I would end this on a happier note, which I don’t often get to do in my kind of work. You know, historical epidemics have also been moments of, they’ve been moments of great pain and loss and mourning and sickness. But they are also moments when you see the greatest in humanity and human empathy.

KAO: Hmm.

OLIVARIUS: This happened in New Orleans repeatedly during epidemics in the 19th century when people would volunteer through a variety of charity organizations like the Howard Association or the Can’t Get Away Club. And people would stay in this town risking their lives to help others and to care for the sick and the bereaved, to collect food and to collect goods. And we’re seeing that now, too, in all of our communities. But we’re especially, I should say, seeing this with the doctors and the EMTs and the first responders and the nurses who are all on the front lines of this pandemic, who are risking their lives to help others.

KAO: Yeah. In reflecting about what you just said, Kathryn, I’m reminded of social commentators and historians who have called those who lived through the Great Depression and triumphed in World War II as the greatest generation.

OLIVARIUS: Mm.

KAO: Let's hope and pray and work to ensure that what will mark and define us in history will be echoes of, I am not a virus, and we are all in this together.

OLIVARIUS: Yeah. Yeah. Cross fingers. I hope that we can get to this place where we can all be proud of how we acted and the role that we played in this moment of unbelievable upheaval. And I think, I certainly hope to feel that way, and I hope that others feel that way, too.

KAO: Yeah. Well, Kathryn, thank you for sharing your expertise and perspectives with our audience today on *Ethics Talk*.

OLIVARIUS: My pleasure. Thank you for having me.

KAO: For more COVID ethics resources, please visit the *AMA Journal of Ethics* at JournalofEthics.org. And to our viewing audience out there, be safe and be mindful. We'll see you next time on *Ethics Talk*. [bright theme music plays]