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Chapter 3 - II

THE BATTLE BETWEEN STATES AND PLATFORMS OVER PUBLIC HEALTH

Haluna Kawashima*

COVID-19 and "Another Battle"

The COVID-19 pandemic that has raged since the end of 2019 has been described as a "war against the virus"[1] around the world. Modern states, still bearing the historical memory of the devastating impact of infectious diseases, have armed themselves with a new "weapon": digital tools. These technologies have been strategically employed to combat the spread of viruses and to mitigate their effects.

However, this battle is not limited to viruses alone. During the pandemic, states have also found themselves contending with digital platform (DPFs) operators, the providers of powerful technological tools. While these platforms have facilitated critical public health initiatives, they have simultaneously introduced challenges and become central actors in the broader struggle to manage both the pandemic and the information environment.

Infectious disease control is achieved by implementing quarantine measures at borders to prevent pathogens from entering the country, isolating patients for infection route control to block transmission, and conducting vaccinations to strengthen the immunity of potential patients (hosts). In Japan, infection route control is expected to be carried out through individual responses based on reports by doctors, such as the regional public health center investigating the behavioral history of each patient and identifying the route of infection and clusters, so that the prefectural governor can publish the information to the general public and transport the patient to a specialized hospital. This method requires public health personnel and specialized knowledge from regional public health centers, both of which were in short supply during the COVID-19 pandemic. Furthermore, the original infection control measures have the drawback of placing significant restrictions on privacy, as government agencies collect the behavior and history of patients and those in close contact with them and make patient information public to raise awareness.

This had led to increased optimism about digitalization of infectious disease control. For example, "COCOA" is a smartphone application (hereafter "the app") that encourages people suspected of close

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1 The then-President of Republic Emmanuel Macron's speech on March 16, 2020 (https://www.elysee.fr/emmanuel-macron/2020/03/16/adresse-aux-francais-covid19). (last visited 20 August 2024. Hereinafter the same applies)

Table1: 1. Digital tools for COVID-19 response in Japan

Name of digital tools	Adopted DPF service	Usage
COVID-19 Contact-Confirming Application (COCOA)	Google/Apple API	Total downloads: 41,287,054 (as of November 16, 2022)
HER-SYS: Health Center Real-time Information-sharing System on COVID-19	Microsoft Cloud	(Use by the public health authorities)
COVID-19 vaccination certificate app	AWS	Total downloads: 15.66 million (as of February 20, 2024)
VRS: Vaccination Record System	AWS	(Use by public health authorities)

contact with an infected person to get tested without the intervention of public health centers. Vaccination certificates, which were previously issued only on paper, have been digitized, and the Vaccination Record System (VRS) has made it possible for municipalities to cross-reference vaccination data, allowing vaccinations to be carried out at workplaces and large-scale vaccination sites, even outside the municipality where a person is registered. The systems offered and supported by DPFs were largely used in the digitalized COVID-19 countermeasures, as described in Table 1. It is no exaggeration to say that DPF was a driving force behind the digitalization of infectious disease control.

According to the theme of this book, the state Leviathan is "angry" because it is "clearly [in] fear of something"[2] about the rise of DPFs through digitalization. To analyze relationships between states and DPFs, it would be essential to examine how the states expressed their "fear" regarding DPFs. Did France's insistence on "digital sovereignty" in its response to COVID-19 and its refusal to use the multinational DPFs system also reflect its "fear" of DPFs?[3] What did France fear the DPF when it began digitizing its COVID-19 control? Should a state like Japan, which has not asserted digital sovereignty, not fear the DPF? What kind of public health relationship can a state build with the DPF? Taking the contact confirmation and tracing apps (hereinafter, "contact apps") that many states introduced during the COVID-19 pandemic as an example, we delve into the variations in state attitudes and consider the relationship that states and the DPF should build for public health.[4]

2 Tatsuhiko Yamamoto, "Thomas Hobbes and the Digital Behemoth: Chaos in Information Space and the 'State of Nature'," *in* Tatsuhiko Yamamoto, Pauline Türk and Haluna Kawashima (eds.), *Platforms and States: How to settle the battle of Monsters* (Keio University Global Research Institute, 2025), p. 13 (Chapter 1, I of this book).

3 Pauline Türk (translated by Haluna Kawashima), "Resisting Leviathan and Digital Sovereignty", *ibid* 2, p. 48 (Chapter 1, II of this book).

4 The following description is an extension of the ideas already presented in my paper, therefore some similarities are found. Haluna Kawashima, " デジタル主権 (Digital Sovereignty)," Japan Institute of Constitutional Law, *Law Journal*, Vol. 30 & 31 (combined issue), pp. 187-198.

2 Leviathan's choices regarding contact apps

(1) The case of Japan and most of EU member states

The contact app is a smartphone app that was first put into practical use in Singapore in March 2020 and has been developed by various countries under the "one country, one app" policy. As it is known that COVID-19 clusters occur in closely packed situations, it is expected that by notifying each user that they have come into contact with a positive case using proximity information between smartphones, users who receive the notification will undergo behavioral changes, such as monitoring their own health or visiting a medical institution. From the public health perspective, such digital tools enable governments to detect and respond to infection clusters swiftly by leveraging user-generated data. In Japan, this corresponds to an app called "COCOA" which was released in June 2020. In European countries (the EU, the EEA, Switzerland, and the UK), 27 contact apps were released in 25 countries between March and October 2020.[5]

Japan adopted the Google/Apple Exposure Notification (GAEN) framework as a contact detection system for COCOA. In Europe, most countries except France and Hungary have developed contact apps using GAEN.[6]

The GAEN uses Bluetooth to record the proximity information between the smartphone on which the app is installed and other smartphones. When a smartphone user who has tested positive enters an ID issued by a public health authority, such as a health center, into the application, the notification server managed by the government grasps this information and sends the positive person ID to all smartphones. If the ID is compared with the contact information stored on each smartphone and a contact with a positive case is detected, a notification is displayed on the app. Thus, GAEN uses a so-called "decentralized architecture" in which the contact history is recorded only on each device and is not stored on a central server managed by the government.

(2) The case of France

Unlike Japan and many other European countries, France deliberately did not adopt GAEN. Instead of receiving technology from Google and Apple, France commissioned French and EU companies such as Orange France and Dasault to design and develop its own system and released the French contact app "STOPCOVID" (called "TousAntiCovid" from October 2020). The French contact app also uses Bluetooth. When a user diagnosed with a positive case voluntarily enters their ID into the app, a notification is sent to the apps of other users who may have had close contact with the patient. The difference from the GAEN is that the contact history of the patient user is sent to a central server, where the contact information is also queried from the apps of other users. As this French app was a system in which public authorities obtained users' contact histories, the government enacted a decree before releasing the app to establish measures for

5 Bulgaria, Greece, Luxembourg, Romania, Slovakia and Sweden did not develop government-led contact tracing apps, while the UK released versions for England and Wales, Northern Ireland and Scotland (European Commission, *Digital Contact Tracing Study,* 2022, p. 21).

6 European Commission, *Ibid* 5, p. 7.

balancing it with the protection of personal data.[7]

3 Reasons for the choice

(1) Japan: Reasons to cooperate with Behemoth

According to the considerations of the members of the expert team involved in the development of COCOA[8], the app system not only met the requirements of the Personal Information Protection Act, but also exceeded its legal standards, aiming not to violate the privacy of users. As mentioned earlier, the original purpose of contact tracing was for the government (a regional public health center) to comprehend the behavioral history of each patient, which contains a large amount of detailed, sensitive, and chronological personal information to identify close contacts and clusters. However, COCOA's function was to simply confirm contact with a patient and notify it, and the government did not obtain the contact history between users. COCOA "respects privacy protection to the maximum extent" by going beyond the requirements of the Personal Information Protection Act.[9]

GAEN also seems to have had great advantages for EU countries that chose to cooperate with the DPF system.[10] First, GAEN was a system that did not violate the General Data Protection Regulation, which requires strict protection of personal data. It can be said that the privacy-friendly system proposed by Google and Apple offered distinct advantages from a legal perspective. Second, because Google and Apple hold the majority of the smartphone OS market share in the EU, GAEN has the advantage of being an effective and efficient public health measure, as it can anticipate the rapid development of apps and a large number of users. Third, GAEN is a globally common system, and because apps work properly in other EU countries that have also adopted GAEN, they have the economic advantage of being compatible with free movement within the EU. Many EU countries decided to adopt GAEN because Google and Apple proposed a system designed to protect user privacy from state surveillance and they hold a significant economic power, similar to large multinational DPFs.

(2) France: Reasons to resist the Behemoth

Why did France reject GAEN, which has many advantages, and resist the two giants of the DPF behemoths,

7 Décret n° 2020-650 du 29 mai 2020 relatif au traitement de données dénommé « StopCovid ».

8 Tatsuhiko Yamamoto, "新型コロナウイルス感染症対策とプライバシー：日本版接触確認アプリから考える (COVID-19 Countermeasures and Privacy: Thinking from the Perspective of the Japanese Contact-Confirming App)," *Constitutional Issues,* No. 32 (2021), pp. 105-116.

9 Masahiro Sogabe, "日本における基本権保障――個人情報およびプライバシーの保護を例として (Guarantee of fundamental rights in Japan: Taking the protection of personal information and privacy as an example)," *in* Tetsu Isobe, Haluna Kawashima, Guillaume Rousset, and Philippe Pédro (eds.), 公衆衛生と人権 (*Public Health and Human Rights: Legal Considerations Based on the Experiences of France and Japan*), Shogakusha, 2024, p. 58 (this book is also published in French. Guillaume Rousset *et al.* (eds.), *Concilier santé et droits fondamentaux en période de pandémie: Une analyse juridique des expériences de la France et du Japon*, Larcier, 2024).

10 European Commission, *Ibid* 5, p. 9.

Apple and Google? This was revealed in a public announcement by the French government.

The National Digital Council (CNNum: *Conseil national du numérique*), a public advisory body under the government on public and private digitalization policies, stated in its report on contact apps that "digital sovereignty remains a key issue, even in the midst of a crisis." The report explained the reasons for being cautious about adopting GAEN as follows:

> While the factors that define contact should be determined at the national level by committees of experts, the systems proposed by the two major companies (i.e., Google and Apple) limit the possibilities for states to adjust the characterization of contact. Their technological solutions affect the control that governments have because the decision on the algorithms that these solutions will employ forms part of public policy and the choice of app architecture (centralized or decentralized). Suppliers of mobile operating systems *must respect the sovereign choices of states* and not impose or favor particular architectures or algorithms[11] (italics added).

Defining what constitutes close contact and reflecting it in the system is not just a matter of designing digital technology but is a "sovereign choice" that is at the core of a state's decision-making power regarding infectious disease control. However, in GAEN, key parameters, such as determining close contact as proximity for 15 minutes were predetermined by Google and Apple. Those two companies gave states little room to negotiate about customizing the system or how it would run on the OS. France was unable to cooperate with the DPF over the app because the DPF Behemoth took a provocative stance toward the Leviathan state by refusing to negotiate.

Google and Apple have taken hardline stances. After being denied customization of GAEN by both companies, France had no choice but to develop its own contact-tracing application. However, the DPF's provocations did not end there, as Apple refused the French government's request to remove Bluetooth restrictions so that their app could run in the background of iPhones. The background contact confirmation function was at the heart of the app. The French app, which had this function, was restricted by Apple and was constantly criticized for its low effectiveness. However, France chose not to adopt the DPF system to safeguard its digital sovereignty and maintain national control.

What exactly did "sovereign choice" mean for France? Upon receiving the CNNum report, the French government cited sovereignty and declared that it would not adopt GAEN.

> Protecting the health of the French people is a task that belongs exclusively to the state and not to private multinational companies. The power to define contact tracing methods (algorithms) and to collect and utilize epidemiological data to improve the effectiveness of state actions cannot be entrusted to non-state actors. This raises questions about health and technological sovereignty.[12]

11 *STOPCOVID : Avis du Conseil national du numérique*, 23 avril 2020, pp. 19-20.

12 Gouvernement, Dossier de presse, *Stop Covid*, 21 mai 2020, p. 13

For the French government, the choice of a contact app system was crucial and involved two dimentions of national sovereignties: health sovereignty and technological sovereignty. By placing technical restrictions on the app system, Google and Apple prevented the State from making autonomous decisions and managing public health issues. The French government believed that the state had exclusive jurisdiction over health protection and that this should not be compromised, even when using information and communication technology for public health measures. However, Google and Apple did not hesitate to act as gatekeepers of the digital infrastructure, even against the states, and instead favored their own system using their dominant technological position to restrict public health policies. In doing so, Google and Apple exposed the state's underlying vulnerability: the lack of own information and communications infrastructure, as well as the limited regulatory control over data businesses, even in crucial areas of public interest, such as health protection. When interpreting the French government's concerns in this regard, it can be said that the choice of the app system evolved from a mere technical issue to a more serious issue of digital sovereignty because it touched on the important area of governance. It seems that the French government made the difficult decision to develop its own system precisely because it was faced with a national challenge where "public health and digital" domains intersect.

4 Public health as a sovereignty issue

(1) What is sovereignty

French constitutional scholars have warned that allowing American DPFs, including Google and Apple, to freely use EU citizens' data would mean surrendering "our major assets and an important part of our decision-making power" and "abandoning our sovereignty."[13] If a State were to use the services of a foreign DPF and allow it to collect EU citizens' personal data, not only would privacy issues arise, but the DPF would violate sovereignty, which is "an important part of our decision-making power."

Sovereignty was first proposed by Jean Bodin in the late 16th century. He determined that a subject without "supreme, absolute, and perpetual" power cannot be called a state.[14] National sovereignty means that a state's power is free from other countries and that it can autonomously conduct its domestic affairs, except in compliance with international law. However, digital sovereignty is proposed out of concern that states will no longer be able to autonomously decide their domestic affairs because of interference, not by other states, but by the DPF, a private multinational corporation. In other words, the novelty of digital sovereignty lies in the fact that it recognizes the DPF, an actor not originally a subject under international law, as a *de facto* threat to national sovereignty in the same way as a state actor. From another perspective, "sovereignty" asserted against the DPF does not fit the classical concept of sovereignty; therefore, there are doubts about

13 Michel Vivant, « Souveraineté numérique », *Recueil Dalloz 2023*, p. 1513.

14 Jean Bodin, *De la République,* I, viii, p. 122.

the accuracy of the concept of "digital sovereignty." We should examine why the decision-making power regarding the contact app system became a sovereignty issue at the intersection of "public health and digital," rather than dismissing claims of digital sovereignty merely because the party asserting it was a private operator. It is also necessary to first examine the nature of the "sovereignty" of public health.

(2) Sovereignty Concerns Over Public Health

Bodin listed legislative power, judicial power, and national defense power as the state's decision-making powers that constitute national sovereignty; however, he did not present them comprehensively, and even Thomas Hobbes and Jean-Jacque Rousseau, who later discussed sovereignty, did not explicitly include public health in sovereignty. This raises the question of whether public health can be said to be a power that forms part of national sovereignty. Although this study does not intend to answer the monumental question of "what is sovereignty," two facts suggest that public health forms part of an essential authority of the state that should not be ceded to other entities through the opportunistic decisions of the rulers of the time.

Public health includes fundamental governance decisions. Public health is carried out through border control in the form of quarantine, continuous collection of data on citizens' lives and lifestyles through medical examinations, declaration of birth through death, and intervention in citizens' bodies through vaccination and disinfection. As Michel Foucault pointed out, public health is a system and "power" that manages territory and citizens from the perspective of hygiene and health.[15] Looking back at history, ever since modern nation-states were established as entities with the three elements of sovereignty— people, and territory—public health has come to symbolizes the autonomy of the state and has formed a system of national control.[16]

In contrast, in imperialism, public health advanced as a civilization spread to the world through the occupiers, and implementing public health policies in occupied territories became a justification for developing the territory and intervening in people's bodies and lifestyles.[17] Even when a sovereign state temporarily cedes sovereignty to an occupier, public health governance is the first area that the occupier addressed. For example, in Japan after the World War II, the General Headquarters of the Allied Forces (GHQ) immediately ordered the forced vaccination of residents and the spraying of DDT to eradicate malaria.[18] These measures may at first glance seem to have been carried out to improve the health of the residents, but in fact they were the result of "prioritizing the protection of the country's own military forces in order to maintain military

15 Michel Foucault, 《La naissance de la médecine sociale», Dits et écrits, tome III, n°196, Gallimard, 1994 (1974).

16 As a useful reference, Shigeru Akita and Kohei Wakimura (editors), "人口と健康の世界史 (A World History of Population and Health)," Minerva Shobo, 2020.

17 For instance, in Taiwan under Japanese occupation, Shinpei Goto, who was the head of the Taiwan Governor-General's Civil Affairs Bureau, was the first to promote public health policies such as the development of water supply and sewerage systems, measures against malaria, and the training of doctors, and presented the improvement of sanitation as a justification for the management of land and people. See Masatoshi Miichi *et al.,* (eds.), 疾病・開発・帝国医療——アジアにおける病気と医療の歴史学 (*Disease, Development, and Imperial Medicine: The History of Disease and Medicine in Asia)*, University of Tokyo Press, 2001.

18 Yosuke Tezuka, 予防接種行政の構造とディレンマ (*The Structure and Dilemmas of Vaccination Administration)*, Fujiwara Shoten, 2010, pp. 63-71. C.F. Sams (author) and Eiji Takemae (edi.), DDT 革命：占領期の医療・福祉政策を回顧する *(The DDT Revolution: Reminiscing on Medical and Welfare Policies during the Occupation),* Iwanami Shoten, 1986.

strength over the health of the residents of the occupied territories."[19] It is believed that hygiene management was carried out not for the health of the residents of the occupied territories but for the health of the State's personnel stationed there, for the benefit of the occupiers. Thus, the loss of a state's governance of public health signified the subordination of the very nature of its governance, and it can be said as strong indicator of the loss of sovereignty itself.

Considering this background, it is easy to understand why France feared the DPF seizing control over digital resources for public health. The history of public health as a tool of imperialism or used for the occupier's own benefit[20] calls into question the purpose of the DPF's entry into the public health field. In other words, while DPF contributes to the digital transformation of health administration, attempts to manage users' health data under the pretext of "the 'civilizing' effects" of digital transformation may give rise to concerns over "digital colonialism."

In its report, Franch CNNum stated that "doubts about the pursuit of economic profit from app development should be dispelled[21]." This expression can be seen as a result of the state's wariness of "digital colonialism" and fears that the DPF will monopolize the design of app systems not for the people's health but for their own benefit. It is believed that France asserted "digital sovereignty" out of fear that the DPF, having become a technological and economic monster, would hinder the state's health governance and turn into a political monster, a great sanitary behemoth.

5 Leviathan's principles of action: acceptability of outsourcing to DPF

(1) The legitimacy of Leviathan in public health

Since Bodin's time, there has been an argument that the meaning of sovereignty lies in the fact that a state governs itself in accordance with the constitution established by the sovereign.[22] In fact, there was a constitutional reason for France's resistance to the sanitation behemoth and its desperate defense of its authority to govern public health. The preamble to the Fourth Republic Constitution, which remains in force, stipulates the state's responsibility to protect its citizens' health, and it is interpreted that this guarantees the "right to health protection" of its citizens. A similar provision can be found in the Japanese Constitution. Its Article 25, paragraph 1 guarantees the "right to maintain the minimum standards of wholesome and cultured living" (the right to wholesome life), and paragraph 2 of the same article stipulates that "(I)n all spheres of life, the State shall use its endeavors for the promotion and extension of social welfare and security, and of public

19 General Headquarters of the Supreme Commander for the Allied Powers (compiled) and commentary by Akiko Sugiyama, GHQ 日本占領史 *(GHQ Occupation History of Japan)*, Volume 22, Japan Library Center, 1996, p. 26.

20 Masatoshi Miichi *et al*., (eds.), *op.cit.*.

21 CNNum, *op. cit.,* p.13.

22 See Shu Haruyama, " 主権と統治 (1) (2・完)(Sovereignty and Governance (1) (2))," *Waseda Law Review* 94-1, 2 (2018), pp. 61-101, 89-129.

health." To ensure the right to wholesome life, the state is obligated to improve and promote public health. In the constitutions of modern welfare states, such as those in France and Japan, the protection of people's health is the primary goal of the state in exercising its sovereignty, and the justification for managing its citizens' health as a Leviathan. The constitution stipulates that the state, not national charities or corporations, can exercise public health governance fairly for people's health and welfare.

However, the Constitution does not clarify how the state should improve public health. Specific means of achieving public health are left to systems created by law. Each country has different intentions regarding the extent to which public health should be handled by itself or outsourced, which is why the systems in France and Japan differ significantly.

(2) The case of France: State-Gardien model of public health

When comparing the infectious disease legislation in Japan and France, the most distinctive difference lies in the extent to which the state is permitted to impose legal obligations on individuals to protect the health of individuals and community. In France, the Constitution of the Fourth Republic states that "the state shall guarantee to all, especially children, mothers, and older workers, the protection of health, material security, rest, and leisure"; therefore, the state is particularly responsible for protecting vulnerable people. The obligation to vaccinate children can also be justified by protecting them from parents who refuse vaccinate them for religious or ideological reasons and by protecting their health from infectious diseases.[23] Just as a good guardian vaccinates his or her child, the state has established compulsory vaccination as a guardian of all its citizens. France is an 'interfering' sanitary Leviathan[24], very careful about the health of its citizens to the point that it imposes obligations to make its citizens healthy, so to speak, aiming for a "state-as-guardian model" of public health. Under this model, the state will be allowed to outsource to the DPF only to the extent that it does not lose control of its health governance. Therefore, entrusting the configuration of the contact confirmation system to Google and Apple, which challenges the state, amount to abandoning its role as the guardian by subordinating the handover of public health to the DPF, regardless of the quality of GAEN's privacy protection and efficiency.

(3) The Case of Japan: "A Soft Leviathan"

In contrast, in Japan, in the 1990s, reflecting on the history of infectious disease control measures that sacrificed individual rights and lives, such as the forced and inhumane isolation of leprosy patients and the health damage caused by serious side effects after vaccinations, lawmakers established the principle

23 Regarding France's vaccine legislation, see Haluna Kawashima, "France: From before Covid to after Covid", *Comparative Law Studies,* No. 84, pp. 40-55.

24 Compulsory vaccination is a classic modern state governance technique that subjugates people through regulations, however if the obligation is justified by "vaccinations are necessary for the sake of weaker compatriots who cannot protect their own health," it can also be seen as a welfare state operation. As in the latter case, a governance structure based on a technique that encourages citizens to take certain actions and make them follow by *interfering* people for the sake of their own and their neighbors' health was called "pastoral power" by M. Foucault. France uses a dual style of classical Leviathan technique and welfare state technique, but as will be described later, Japan seems to be somehow trying to govern health using only welfare state techniques without obligation.

of "respect for individual autonomy". Individuals should not sacrifice to defend society; rather, the goal is to improve the collective health index of the community by improving individual's health. Decision to improve health should be left to the individual as much as possible.[25] This principle is strict and thorough, as supported by judicial decisions that recognized the state's responsibility, even in cases of vaccination under one's consent[26] or in cases where discrimination against leprosy patients arose from society rather than directly by the state[27]. Currently, vaccination is not compulsory in Japan, even during the pandemic, in accordance with individual autonomy principles. Thus, Japan relies on voluntary behavioral changes by individuals and adhere to the principle of minimizing direct state intervention in public health. Japan, as a soft sanitary Leviathan that does not handle every detail of public health, is also amenable to outsourcing public health. GAEN supports users' voluntary behavioral changes and minimizes state intervention in personal health management, making it a privacy-friendly system that does not provide contact history data to the state. Public health under Japanese law seems to be compatible with GAEN.

6 Fears and hopes for the Sanitary Behemoth

(1) Fears for the Sanitary Behemoth

Should a soft leviathan like Japan not fear the possibility that, by outsourcing public health to the DPF, it may lose the authority to govern public health? Japan should learn two lessons from its experience with COVID-19 contact apps.

First, the issues of digital colonialism must be examined. The DPF was neither a public health expert nor a politician who understood the local situation. It is not appropriate for the DPF to determine the distance and period of contact that constitute close contact, which increases the risk of infection. In addition, there are many points that the state should keep a close eye on, such as whether the DPF, which is not subject to constitutional constraints, is using the health of the people as a tool for pursuing economic interests, and whether it is providing a system that does not cause human rights violations, such as discrimination. The French government released its own app with the help of cooperative domestic tech companies, while maintaining democratic and professional oversight. It obtained approval through a resolution from the National Assembly (Article 50-1 of the Constitution) and had the National Assembly periodically exercise its investigative power over the government (under the National Assembly Investigative Committee system based on Article 51-2 of the Constitution). This process involved consulting human rights observatories and medical experts, to check the app's effectiveness and appropriate use after its launch.[28] The DPF cannot replace the state's monitoring

25 Tetsu Isobe, "新型コロナウイルス感染症対策と法 (Countermeasures and Laws on COVID-19)," *Academic Trends*, Vol. 27, No. 3 (2022), p. 35. Haluna Kawashima "La Politique Vaccinale au Japon : vers un renouveau du respect de l'autonomie de la personne ?" Guillaume Rousset *et al*. (eds.), *Concilier santé et droits fondamentaux en période de pandémie : Une analyse juridique des expériences de la France et du Japon*, Larcier, 2024, p. 133-146.

26 Supreme Court, April 19, 1991, Minshu Vol. 45, No. 4, p. 367.

27 Kumamoto District Court, May 11, 2001, Hanrei Jiho No. 1748, p. 30.

28 For the democratic and professional control of the COVID-19 contact tracing app in France, see also Masahiro Sogabe, "COVID-19

systems, including democratic and professional investigation framework.

Another lesson is that we should avoid the risk of gradually weakening a state's health governance capabilities. Since the summer of 2021, France has added features to its applications that provide local infection information and vaccination certificates. Because the France retained control over the app's development, it was able to upgrade the tool as a more effective public health strategy. In contrast, if a state outsources the design of public health systems to the provocative DPF, its ability to develop and modify public health management methods and related digital technologies may be limited. As for COCOA, Google and Apple made it a condition for offering GAEN that "health and sanitary authorities provide the app"; therefore, the Ministry of Health, Labour and Welfare (hereinafter "MHLW") was responsible for its development and operation. However, the MHLW lacked expertise in organizing information technology, which led to many problems with the app after its release and resulted in limited integration with other public health tools, such as the Health Center Real-time Information-sharing System on COVID-19 (HER-SYS). In response to the Board of Audit's request to the MHLW to correct the defects, the Digital Agency pointed out that the system headed by the MHLW "was insufficient in terms of the desirable way of developing and operating the app[29]." In exchange for GAEN, the Japanese government accepted the conditions presented by the DPFs, which limited the state's ability to establish an appropriate governance system and develop digital public health tools. Thus, outsourcing public health to the DPF may deprive the state of the opportunity to accumulate institutional knowledge, refine its digital infrastructure for public health and apply it in future crisis. Such dependency could ultimately lead to the loss of the state's ability as a sanitary leviathan.

However, despite these concerns, whether outsourcing to the DPF can be avoided depends on the state's technological and economic capacity. Even when the state can develop digital tools on its own or with the help of a cooperative DPF, its efforts may be obstructed by the dominent DPFs. An example is Apple's refusal to the French government's request for the background Bluetooth function. In the current digital geopolitical situation, states cannot escape the possibility of having its public health governance limited by the DPF, even if the Constitution shows a "state-as-guardian model." To dispel fear about the sanitation behemoth, Leviathan has no choice but to improve its technological capabilities, to gain friendly cooperation from the behemoth or to find way to domesticate it.

(2) Expectations for the Sanitation Behemoth

Although outsourcing to DPF entails risks, expectations also exist. First, the DPF, which is spreading its platform globally, may provide a health system free of charge, so that people in countries with fable resources can enjoy the latest health maintenance system. Google and Apple have open-source GAEN, making them available to states that accept the terms of use. Therefore, there was no need to worry about a global health resources disparity previously occurred with vaccines. Another expectation is that DPFs can monitor fun-

contact tracing apps in France and CNIL's supervision of them," in Ken Hasegawa *et al*. (eds.), Constitutional Studies from Provence: The Progress of Japanese-French Exchanges (Keibundo, 2023, p. 226).

29 Coordination Team for the Operation of the Contact-Confirming App COCOA, "Summary Report on the Initiatives of the Novel Coronavirus Contact-Confirming App (COCOA) (Supplementary Edition)" (March 2023), p. 12.

damental rights violations by states. Considering that Japanese infectious disease laws are based on the principles of individual autonomy and fundamental rights protection to avoid public health policies being advanced at the expense of individual lives and freedom. Accordingly, there is a strong need to monitor the state's public health administration. Google and Apple have provided systems in which the state cannot violate user privacy, making it impossible for the government to access personal data using GAEN. In other words, COCOA was privacy-friendly because the DPFs acted as a check on states[30], and it can be expected that the DPFs played a role in preventing states from violating their fundamental rights through digital public health systems.

7 New relationship between the state and DPF to protect public health

Based on the experiences of Japan and France regarding COVID-19 contact apps, the State Leviathan and the DPF behemoth should find a balance between public health and fundamental rights by committing to a relationship of mutual oversight. Ideally, the two parties should build a certain level of tension, while remaining autonomous under an agreement. Currently, the WHO has begun discussions on the conclusion of a "pandemic treaty" that includes provisions for the global sharing of public health resources, such as vaccines, in preparation for future pandemics. Regarding digital resources, the DPF could be invited to the table and publicly promised that in the event of the next pandemic. The DPF would provide states with statistical data that could be epidemiologically useful, such as users' location information, search information, and purchasing information, and cooperate in developing systems such as epidemiological information management and contact apps. In return, the states would not misuse the data or systems as a condition of the DPF's cooperation. The Leviathan-Behemoth compact on public health should be built based on cooperation and tension.

30 Regarding the small privacy impact of COCOA, it has been pointed out that in fact "there may have been aspects such as the constraints placed on Japan by global corporations and a lack of political will that forced Japan to make such a choice" (Sogabe, *op. cit*. p. 69).