

## I. The unfolding Covid-19 pandemic

FILIPPA LENTZOS

### Milestones of the pandemic in 2021

In January 2021, the director-general of the World Health Organization (WHO) called for a collective worldwide commitment to ensure vaccination for health workers and those at high-risk in all countries in the first 100 days of 2021.<sup>1</sup> He urged all vaccine manufacturers from around the world to swiftly provide the necessary data to enable the WHO to consider vaccine candidates for emergency use listing. The Pfizer/BioNTech vaccine became the first vaccine against Covid-19 to receive emergency use validation, on 31 December 2020.<sup>2</sup> The Moderna mRNA-1273 vaccine followed suit on 25 January 2021, the AstraZeneca/Oxford vaccine on 15 February 2021, the Johnson & Johnson vaccine on 12 March 2021, and the Sinopharm vaccine on 7 May 2021.<sup>3</sup> By the end of 2021, the WHO had listed nine Covid-19 vaccines for emergency use.<sup>4</sup>

In his opening remarks to the Executive Board on 18 January 2021, the WHO director-general warned that the world was ‘on the brink of a catastrophic moral failure’, with equitable access to vaccines at serious risk as ‘some countries and companies continue to prioritize bilateral deals . . . driving up prices and attempting to jump to the front of the queue’.<sup>5</sup> The ambitious Covax initiative—jointly led by Gavi, the Vaccine Alliance, the Coalition for Epidemic Preparedness Innovations (CEPI) and the WHO, and aimed at ensuring vaccine access for all countries—began its global roll-out on 24 February 2021 with Ghana receiving the first vaccine doses.<sup>6</sup> Over 100 countries had received more than 38 million vaccine doses from Covax within 42 days.<sup>7</sup> Yet Covax’s first few months were plagued with insufficient

<sup>1</sup> World Health Organization (WHO) Director-General, ‘WHO Director-General’s opening remarks at the media briefing on COVID-19—11 January 2021’, 11 Jan. 2021.

<sup>2</sup> WHO, ‘WHO issues its first emergency use validation for a COVID-19 vaccine and emphasizes need for equitable global access’, News release, 31 Dec. 2020.

<sup>3</sup> WHO, ‘Interim recommendations for use of the Moderna mRNA-1273 vaccine against COVID-19’, Interim guidance, 25 Jan. 2021; WHO, ‘WHO lists two additional COVID-19 vaccines for emergency use and COVAX roll-out’, News release, 15 Feb. 2021; WHO, ‘WHO adds Janssen vaccine to list of safe and effective emergency tools against COVID-19’, News release, 12 Mar. 2021; and WHO, ‘WHO lists additional COVID-19 vaccine for emergency use and issues interim policy recommendations’, News release, 7 May 2021.

<sup>4</sup> WHO, ‘WHO lists 9th COVID-19 vaccine for emergency use with aim to increase access to vaccination in lower-income countries’, News release, 17 Dec. 2021.

<sup>5</sup> WHO Director-General, ‘WHO Director-General’s opening remarks at 148th session of the Executive Board’, 18 Jan. 2021.

<sup>6</sup> WHO, ‘COVID-19 vaccine doses shipped by the COVAX Facility head to Ghana, marking beginning of global rollout’, Joint news release, 24 Feb. 2021.

<sup>7</sup> WHO, ‘COVAX reaches over 100 economies, 42 days after first international delivery’, News release, 8 Apr. 2021.

funds, low vaccine supplies, a limited willingness from high-income countries to share vaccines, and logistics challenges. December 2021, however, saw a last-minute surge in deliveries, with about 300 million vaccine doses shipped to low- and middle-income countries, including Bangladesh, Indonesia, the Philippines and Pakistan.<sup>8</sup> By the end of 2021, Covax had delivered roughly 910 million doses worldwide, though this fell far short of the two billion doses the initiative originally aimed for.<sup>9</sup>

As of 31 December 2021, 4.56 billion people worldwide had been vaccinated against Covid-19.<sup>10</sup> China had vaccinated well over a billion inhabitants, India over 800 million, the United States over 240 million, and Brazil and Indonesia over 160 million each.<sup>11</sup>

However, 2021 still ended with great uncertainty, as a burgeoning wave of the Omicron variant of SARS-CoV-2 rapidly swept across countries. First identified in South Africa and designated a ‘variant of concern’ by the WHO on 26 November 2021, Omicron was rapidly replacing the Delta variant.<sup>12</sup> The Delta variant was first identified in India and was the dominant strain globally for much of 2021; it was thought partly responsible for India’s deadly second wave that began in February 2021. *The Economist* labelled these recurring waves of infection ‘the era of predictable unpredictability’.<sup>13</sup>

### *Health and mortality impacts*

According to the WHO *World Health Statistics 2021* report, the Covid-19 pandemic wrought ‘unprecedented devastation on global population health’.<sup>14</sup> By the end of 2021, the WHO had received reports of over 286 million cases of Covid-19 worldwide. The actual number of infections is likely to be considerably higher from undiagnosed cases and generally poor Covid-19-related data. As of 31 December 2021, the WHO reported over 103 million cases in the Americas, over 102 million in Europe, nearly 45 million in South East Asia, over 17 million in the Eastern Mediterranean, over 7 million in Africa, and over 11 million in the Western Pacific. The five countries with the highest cumulative number of reported cases by the end of 2021 were, in descending order, the USA, India, Brazil, France and the United Kingdom.<sup>15</sup>

<sup>8</sup> Taylor, A., ‘Covax vaccine deliveries surge in final stretch of 2021, with a record 300 million doses sent out in December’, *Washington Post*, 1 Jan. 2022.

<sup>9</sup> Taylor (note 8).

<sup>10</sup> Ritchie, H. et al., ‘Coronavirus (COVID-19) vaccinations’, *Coronavirus Pandemic (COVID-19)* (Our World in Data, 2020).

<sup>11</sup> Richie et al. (note 10).

<sup>12</sup> WHO, ‘Classification of Omicron (B.1.1.529): SARS-CoV-2 variant of concern’, Statement, 26 Nov. 2021.

<sup>13</sup> ‘The new normal is already here. Get used to it’, *The Economist*, 18 Dec. 2021.

<sup>14</sup> WHO, *World Health Statistics 2021: Monitoring Health for the SDGs, Sustainable Development Goals* (WHO: Geneva, 2021), p. 1.

<sup>15</sup> WHO, ‘WHO coronavirus (COVID-19) dashboard’, [n.d.].

As of 31 December 2021, Covid-19 had caused over 5.4 million recorded deaths, with several million likely to have gone unrecorded. Reasons for unrecorded Covid-19 deaths include lack of pre-death testing and reliable tracking systems in most counties. In addition, the pandemic disrupted essential health services through ‘widespread shortages’ of medicines, staff and diagnostics, as well as ‘hesitancy to seek medical treatment’ for fear of infection, which may have indirectly caused an increase in fatalities from diseases other than Covid-19.<sup>16</sup> *The Economist’s* ‘excess death tracker’ attempted to provide a more accurate death toll from the pandemic by taking the number of people who die from any cause in a given region and period, and comparing it with a historical baseline from recent years. It assessed the number of global deaths as closer to 19 million, three times higher than the WHO figure.<sup>17</sup> Deaths reported to the WHO in the Americas numbered over 1.6 million, in Europe over 2.4 million, in South East Asia over 720 000, in the Eastern Mediterranean over 315 000, in Africa over 155 000 and in the Western Pacific over 155 000.<sup>18</sup> *The Economist’s* excess death tracker assessed that numbers in North America and in Latin America and the Caribbean should be increased by 20 per cent and 50 per cent, respectively. The WHO figures for Europe should be increased by 80 per cent, Asia by 700 per cent and Africa by 900 per cent. For the Western Pacific, the excess death tracker assessed a 300 per cent decrease on official estimates ‘because Covid-19 claimed relatively few victims, while lifestyle changes lowered the toll from other causes such as flu’.<sup>19</sup>

By mid December 2021, more than 800 000 Americans were reported to have died from Covid-19, the highest recorded national death toll from the pandemic. The figure exceeds the populations of cities like Boston and Washington DC, and means nearly twice as many Americans have died during the pandemic than in World War II.<sup>20</sup>

According to mortality reports received by the WHO, the five countries with the highest cumulative number of total deaths by the end of 2021 were, in descending order, the USA, Brazil, India, Russia and Mexico.<sup>21</sup> *The Economist’s* excess death tracker reassessed that order to be India, Russia, the USA, Brazil and Mexico.<sup>22</sup> When the figures are adjusted for population size, the highest death rates were estimated by the excess death tracker to be, in descending order, in Bulgaria, North Macedonia, Russia, Lithuania and Peru.

<sup>16</sup> WHO, *World Health Statistics 2021* (note 14), p. 1.

<sup>17</sup> ‘The pandemic’s true death toll’, *The Economist*, [n.d.].

<sup>18</sup> WHO, ‘WHO coronavirus (COVID-19) dashboard’ (note 15).

<sup>19</sup> ‘The pandemic’s true death toll’ (note 17).

<sup>20</sup> ‘Covid-19: US surpasses 800,000 pandemic deaths’, BBC News, 15 Dec. 2021.

<sup>21</sup> WHO, ‘WHO coronavirus (COVID-19) dashboard’ (note 15).

<sup>22</sup> ‘The pandemic’s true death toll’ (note 17).

At the end of 2021, the WHO report declared that Covid-19 had ‘sharply shortened life expectancy’ in many countries ‘to a degree that has not been seen in decades’.<sup>23</sup> Health systems continued to be overwhelmed. Millions of people missed out on essential life-saving health services for non-communicable diseases and mental health. Progress against HIV, tuberculosis, malaria and other diseases stalled or went backwards, and millions of children missed out on vaccinations for other life-threatening diseases.

*Economic, social and political impacts*

Covid-19 also continued to generate significant economic, social and political impacts worldwide, including economic recession, millions of job losses, extreme inequity, political divisions and lost educational opportunities.

Spending and borrowing to build field hospitals, buy vaccines and provide emergency aid to business and the unemployed caused unprecedented levels of global debt in 2021, particularly in emerging markets, and further widened the gap between richer and poorer nations.<sup>24</sup> A broadening gap was also seen between richer and poorer people.<sup>25</sup> According to Oxfam’s annual report on global inequality, the world’s 10 richest individuals more than doubled their collective fortunes from \$700 billion to \$1.5 trillion between March 2020 and November 2021, and a new billionaire has been created every 26 hours since the pandemic began.<sup>26</sup> Meanwhile, 99 per cent of the world’s population were worse off because of lockdowns, lower levels of international trade and less international tourism, and 160 million more people were pushed into poverty than would have been without the impact of the pandemic.<sup>27</sup> Deepening inequalities have weakened the economic, financial and social fabric of almost every nation, regardless of development status, and the International Labour Organization assessed the damage would likely ‘take years to repair . . . with long-term consequences for labour force participation, household incomes, and social—and possibly political—cohesion’.<sup>28</sup>

The pandemic continued to expose and exacerbate long-standing gender and racial divides. Gender equality went backwards—an estimated 13 million fewer women in work in 2021 than in 2019, and over 20 million girls at risk of never returning to school—but the pandemic hit ethnic minority groups the hardest. The Oxfam inequality report, for example, assessed that, during the

<sup>23</sup> WHO, *World Health Statistics 2021* (note 14), p. 1.

<sup>24</sup> Institute of International Finance, Global Debt Monitor, ‘Reassessing the pandemic impact’, 14 Sep. 2021.

<sup>25</sup> Chancel, L. et al., *World Inequality Report 2022* (World Inequality Lab: Paris, Dec. 2021).

<sup>26</sup> Ahmed, N. et al., *Inequality Kills: The Unparalleled Action Needed to Combat Unprecedented Inequality in the Wake of COVID-19* (Oxfam International, Jan. 2022), p. 7.

<sup>27</sup> ‘Wealth of world’s 10 richest men doubled in pandemic, Oxfam says’, BBC News, 17 Jan. 2022.

<sup>28</sup> International Labour Organization (ILO), *World Employment and Social Outlook: Trends 2022*, ILO Flagship Report (ILO: Geneva, 17 Jan. 2022), p. 3.

second wave of the pandemic in England, people of Bangladeshi origin were five times more likely to die of Covid-19 compared with the White British population.<sup>29</sup>

School closures continued in 2021, with exceptionally long closures in Latin America and South Asia. Affecting more than 1.6 billion learners, the global disruption to education caused by the pandemic is ‘without parallel’ and ‘its effects on learning have been severe’, according to a global education report.<sup>30</sup>

### **Studies into the origins of SARS-CoV-2**

The origins of the pandemic continued to be a politically divisive subject in 2021. Very late in its tenure, on 15 January 2021, the outgoing Trump administration issued a fact sheet on the pandemic’s origins.<sup>31</sup> It said the novel coronavirus causing Covid-19, SARS-CoV-2, could have first entered the human population through human contact with infected animals. Alternatively, it could have spilled over into the human population as a result of a lab accident, where ‘initial exposure included only a few individuals and was compounded by asymptomatic infection’. The fact sheet noted that ‘scientists in China have researched animal-derived coronaviruses under conditions that increased the risk for accidental and potentially unwitting exposure’, and listed three elements deserving ‘greater scrutiny’. All associated with the Wuhan Institute of Virology (the premier laboratory in China working on coronaviruses), these three elements were genetic experiments with coronaviruses, Covid-19-like illnesses in the autumn of 2019 and secret military activity at the institute. The US fact sheet said that ‘any credible investigation into the origin of Covid-19 demands complete, transparent access to the research labs in Wuhan, including their facilities, samples, personnel, and records’.

The joint WHO–China mission, mandated by the World Health Assembly in May 2020 and plagued by delays, finally began its field visit to China in January 2021. After four weeks of work, including two weeks of quarantine imposed on the international experts by the Chinese government, it reported its highly anticipated findings at a press conference on 9 February 2021 in Wuhan, where the outbreak was first identified.<sup>32</sup> The co-heads of the mission, Peter Ben Embarek and Liang Wannian, laid out four origin hypotheses

<sup>29</sup> Ahmed et al. (note 26), p. 7.

<sup>30</sup> World Bank, UNESCO and UNICEF, *The State of the Global Education Crisis: A Path to Recovery* (World Bank: Washington, DC, 2021), p. 5.

<sup>31</sup> US Department of State, Office of the spokesperson, ‘Activity at the Wuhan Institute of Virology’, Fact sheet, 15 Jan. 2021.

<sup>32</sup> WHO, ‘WHO media briefing from Wuhan on COVID-19 mission—9 February 2021’, Press briefing (video), 9 Feb. 2021.

that had formed the basis of the mission's investigation. First, the virus could have jumped directly from an animal species to humans. Alternatively, and second, the virus could have leapt from one animal species to an intermediary animal host in which the virus further adapted before jumping to people. A third, and surprising, hypothesis, which had not featured in prior origin discussions, was that the virus could have been introduced to Wuhan via the food chain, for example from imported frozen products. A final hypothesis was that the virus could have been accidentally released through a lab-related incident. The joint mission, made up of Chinese scientists selected by China and an equal number of international experts selected by the WHO, concluded that the second hypothesis, where the virus jumped from one species to another before infecting people, was the 'most likely' pathway. While the mission reported that the direct spillover and food-chain ideas needed more investigation, Ben Embarek said the team dismissed the lab-leak hypothesis as 'extremely unlikely' and that it would not inform future studies into the origin of the virus.<sup>33</sup>

Although the findings of the joint mission were widely reported in the press as representing the findings of the WHO itself, they did not represent the official position of the WHO. This was made clear two days after the press conference briefing, when WHO Director-General Tedros Adhanom Ghebreyesus undercut the remarks by Ben Embarek and the team, by specifically stating that 'all hypotheses remain open and require further study'.<sup>34</sup>

The mission report was eventually released on 30 March 2021, seven weeks after the mission ended.<sup>35</sup> It showed that the joint team saw its priority as seeking a zoonotic origin, not as fully examining all possible sources of the pandemic. The published data supporting the report mostly presented reviews of Chinese studies that had not been published outside China, nor shared with or reviewed by the international scientific community. The report also showed that, well over a year after the initial outbreak, critical records and biological samples that could have provided essential insights into the pandemic's origin had not been accessed by the team and remained inaccessible. The international members of the joint team, by their own admission, relied on verbal assurances given to them by their Chinese counterparts rather than conducting an independent investigation. This was particularly the case when it came to the possibility of a research-related incident. The final process used by the joint team for assessing the likelihood of a natural spillover or a research-related incident—amounting to a show of hands by the

<sup>33</sup> WHO, 'COVID-19 Virtual Press conference transcript—9 February 2021', Press briefing (transcript), 9 Feb. 2021, 01:13:18.

<sup>34</sup> WHO Director-General, Opening remarks at the member states briefing on Covid-19, 11 Feb. 2021.

<sup>35</sup> Joint WHO–China Study Team, 'WHO-convened Global Study of Origins of SARS-CoV-2: China Part', Report, 30 Mar. 2021.

team members based on a superficial review—failed to reach basic standards of credible analysis and assessment. The report also showed that it was, at best, unclear whether the Chinese team members had the leeway to express their fair evaluation of the origin theories in the presence of their Chinese government minders. Finally, the report made clear that the team had used different evidentiary standards for the origin theories it assessed.

On the day the report came out, the WHO director-general further distanced himself and the WHO from the team's findings. In his closing remarks at the briefing where the team presented their report, the director-general stated that all origin hypotheses must still be examined, including the possibility of a lab-related incident; that China must be more forthright in sharing essential data and biological samples; and that the WHO was prepared to send additional missions and experts to China to thoroughly examine all origin hypotheses.<sup>36</sup>

A joint statement released on the same day by 14 countries, led by the USA, was also critical of the report.<sup>37</sup> It underscored the need for a transparent and independent analysis, 'free from interference and undue influence', and it voiced the countries' shared concern that the joint study 'lacked access to complete, original data and samples'. The European Union released a similar statement.<sup>38</sup> Independent experts also voiced concern about the joint mission's independence, investigation process and conclusions.<sup>39</sup>

On 13 May 2021, 18 leading scientists published a letter in the prestigious journal *Science* calling for a full investigation into all pandemic origin hypotheses, including a lab incident.<sup>40</sup> On 26 May 2021, US President Joe Biden issued a statement saying he had asked the US intelligence community to investigate the origin question and to report back to the White House in 90 days.<sup>41</sup> Over the course of May and June of 2021, the lab-leak theory was also given greater prominence in the media.<sup>42</sup>

<sup>36</sup> WHO Director-General, Remarks at the member state briefing on the report of the international team studying the origins of SARS-CoV-2, 30 Mar. 2021.

<sup>37</sup> US Department of State, Office of the spokesperson, 'Joint statement on the WHO-convened COVID-19 origins study', Press release, 30 Mar. 2021. The 13 other countries were Australia, Canada, Czechia, Denmark, Estonia, Israel, Japan, the Republic of Korea, Latvia, Lithuania, Norway, Slovenia and the UK.

<sup>38</sup> European External Action Service, 'EU Statement on the WHO-led COVID-19 origins study', 30 Mar. 2021.

<sup>39</sup> Butler, C. D. et al., 'Call for a full and unrestricted international forensic investigation into the origins of Covid-19', Open letter, 4 Mar. 2021; and Butler, C. D. et al., 'Call for a full investigation into the origins of Covid-19', Open letter, 7 Apr. 2021.

<sup>40</sup> Bloom, J. D. et al., 'Investigate the origins of COVID-19', Letter, *Science*, vol. 372, no. 6543 (14 May 2021).

<sup>41</sup> Biden, J., Statement on the investigation into the origins of COVID-19, White House Briefing Room, 26 May 2021.

<sup>42</sup> See e.g. Wade, N., 'The origin of COVID: Did people or nature open Pandora's box at Wuhan?', *The Bulletin*, 5 May 2021; Jacobsen, R., 'Exclusive: How amateur sleuths broke the Wuhan lab story and embarrassed the media', *Newsweek Magazine*, 2 June 2021; and Eban, K., 'The lab-leak theory: Inside the fight to uncover COVID-19's origins', *Vanity Fair*, 3 June 2021.



A statement by leaders of the Group of Seven (G7) nations, issued on 13 June 2021 at a meeting in Cornwall, UK, stressed that the second phase of the WHO-convened origins study should take place in China and be ‘timely, transparent, expert-led, and science-based’.<sup>43</sup> At a press briefing on 15 July 2021, the WHO director-general told reporters that for the second phase of the origins study, the WHO was ‘asking China to be transparent, open and cooperate, especially on the information, raw data that we asked for at the early days of the pandemic’.<sup>44</sup> The director-general expressed the view that there had been a ‘premature push’ to rule out the lab incident theory, saying, ‘I was a lab technician myself, an immunologist, and I have worked in the lab, and lab accidents happen. It’s common.’ In opening remarks to the WHO member state information session on pandemic origins on 16 July 2021, the director-general made clear that operational plans and terms of reference for the second phase were still in development. He highlighted that the origins study ‘is a scientific exercise that must be kept free from politics’ and declared, ‘For that to happen, we expect China to support this next phase of the scientific process by sharing all relevant data in a spirit of transparency. Equally, we expect all Member States to support the scientific process by refraining from politicising it.’<sup>45</sup>

At the information session, the director-general also announced that the WHO was establishing a permanent international scientific advisory group for origins of novel pathogens (SAGO), which would ‘play a vital role in the next phase of studies into the origins of SARS-CoV-2’.<sup>46</sup> Five weeks later, on 20 August 2021, the call for experts to join SAGO came out along with the group’s terms of reference.<sup>47</sup> The group eventually selected comprised 27 individuals, including several scientists from the previous joint WHO–China study.<sup>48</sup> SAGO met for the first time on 24 November 2021.<sup>49</sup> These meetings are private, and no public reports about the studies the group might undertake had been produced by the end of 2021. However, it is expected that SAGO will focus on areas identified in earlier statements of the WHO, namely: further examination of the raw data from the earliest cases and potential cases in 2019; integrated studies of humans, wildlife, captive and farmed animals, and the environment; studies prioritizing geographic areas where

<sup>43</sup> White House, ‘Carbis Bay G7 summit communique’, Briefing Room statement, 13 June 2021.

<sup>44</sup> WHO, Covid-19 virtual press conference, Transcript, 15 July 2021, 00:19:15.

<sup>45</sup> WHO Director-General, Opening remarks at the member state information session on origins, 16 July 2021.

<sup>46</sup> WHO Director-General (note 45).

<sup>47</sup> WHO, ‘Call for experts to join Scientific Advisory Group for the Origins of Novel Pathogens’, News release, 20 Aug. 2021; and WHO, Scientific Advisory Group for the Origins of Novel Pathogens (SAGO), Terms of reference, 20 Aug. 2021.

<sup>48</sup> SAGO, ‘About us’, [n.d.].

<sup>49</sup> WHO, ‘First meeting of Scientific Advisory Group for the Origins of Novel Pathogens (SAGO)’, News release, 24 Nov. 2021.



the virus first started circulating and neighbouring areas where other SARS-related coronaviruses have been found in non-human reservoirs; studies of animal markets in and around Wuhan; studies related to ‘animal trace-back activities’; and audits of relevant laboratories and research institutions in Wuhan.<sup>50</sup>

On 24 August 2021 the US intelligence community delivered its classified report on pandemic origins to President Biden, and released a short, two-page unclassified summary on 27 August 2021.<sup>51</sup> The several agencies making up the intelligence community were divided on the origin question. Four agencies and the National Intelligence Council assessed with low confidence that the pandemic was most likely caused by natural spillover. One agency assessed with moderate confidence that it was caused by a laboratory-associated incident. Three institutions were unable to make a judgement either way. These different assessments resulted from ‘how agencies weigh intelligence reporting and scientific publications, and intelligence and scientific gaps’.<sup>52</sup> The report said that, to reach a conclusive assessment, China’s cooperation would most likely be needed. There were two things the intelligence agencies could agree on: first, that the virus was not developed as a biological weapon; and second, that the Chinese government did not have foreknowledge of the virus before the outbreak began. Most agencies also assessed, with low confidence, that SARS-CoV-2 was probably not genetically engineered, though two agencies believed there was insufficient evidence to draw that conclusion. On release of the report, President Biden said that while the review had finished, US ‘efforts to understand the origins of this pandemic will not rest’.<sup>53</sup> He stressed that ‘critical information about the origins of this pandemic exists in the People’s Republic of China, yet from the beginning, government officials in China have worked to prevent international investigators and members of the global public health community from accessing it’.<sup>54</sup> He said the USA would continue to press China to fully share information and to cooperate with the WHO’s second phase of the origins study. He concluded, ‘We must have a full and transparent accounting of this global tragedy. Nothing less is acceptable.’<sup>55</sup>

The origin question remained unresolved at the end of 2021, amidst continuing debate politically, in the media and within the scientific community. Among scientists, opinions generally fall into four groups: those favouring the natural spillover theory, those favouring the research-related accident

<sup>50</sup> WHO Director-General (note 45); and WHO, ‘WHO statement on advancing the next series of studies to find the origins of SARS-CoV-2’, Statement, 12 Aug. 2021.

<sup>51</sup> US Office of the Director of National Intelligence, ‘Key takeaways’, 27 Aug. 2021.

<sup>52</sup> US Office of the Director of National Intelligence (note 51), p. 1.

<sup>53</sup> Biden, J., Statement on the investigation into the origins of COVID-19, White House Briefing Room, 27 Aug. 2021.

<sup>54</sup> Biden (note 53).

<sup>55</sup> Biden (note 53).

theory, those who remain open to both, and the majority who do not know and prefer, for various reasons, not to participate in the debate.

### **A pandemic treaty**

In March 2021, 25 heads of government and international agencies called on the international community to work together towards a new international treaty for pandemic preparedness and response. Drawing parallels to how political leaders came together following the devastation of two world wars to forge the multilateral treaty system, the joint statement expressed the hope of building ‘a more robust global health architecture to protect future generations’.<sup>56</sup> Published in several newspapers around the world, the statement envisioned a treaty ‘to foster an all-of-government and all-of-society approach, strengthening national, regional and global capacities and resilience to future pandemics’.<sup>57</sup>

Meeting in a special session on 1 December 2021, the second-ever since the WHO’s founding in 1948, the World Health Assembly agreed to start a global process on a treaty to strengthen pandemic prevention, preparedness and response.<sup>58</sup> The Assembly established an intergovernmental negotiating body to draft the treaty. This body’s first meeting (to be held by 1 March 2022) would agree on ways of working and timelines, and its second meeting (before 1 August 2022) would discuss progress on a working draft of the treaty. The body would also hold public hearings to inform its deliberations; deliver a progress report to the 76th World Health Assembly in 2023; and submit its outcome for consideration by the 77th World Health Assembly in 2024.

### **Conclusions**

At the end of 2021, there was still no end in sight to the Covid-19 pandemic. The new Omicron variant was rapidly spreading, and it was unclear whether the vaccines that had been developed would be effective against it—and future variants—and whether the exponential rise in infections would translate into severe disease, hospitalizations and deaths as for previous variants. Geopolitical tensions remained high, with investigations into the origins of the pandemic a particular point of contention. More encouragingly, there was agreement on initiating development of a new international treaty on preparing for and responding to pandemics.

<sup>56</sup> WHO, ‘Global leaders unite in urgent call for international pandemic treaty’, News release, 30 Mar. 2021.

<sup>57</sup> WHO (note 56).

<sup>58</sup> WHO, ‘World Health Assembly agrees to launch process to develop historic global accord on pandemic prevention, preparedness and response’, News release, 1 Dec. 2021.