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The EU Response to COVID-19: From Reactive Policies to Strategic Decision-Making

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Introduction

Like every region in the world, the EU struggled in its response to COVID-19 – particularly in 2020 when much was still unknown about the disease. The Global Health Security Index ranked several European Union (EU) countries – the Netherlands, Sweden, Denmark, Finland, France, Germany and Spain – among the 15 countries with the highest health security capabilities to respond to infectious disease outbreaks (Nuclear Threat Initiative and Johns Hopkins Bloomberg School of Public Health, 2019). Similarly, much of Western Europe received the best scores on the Epidemic Preparedness Index published early in 2019 (Oppenheim *et al*., 2019). But just a few months into 2020 it was clear these index predictions were wrong.

COVID-19 policy making has involved significant uncertainties – about the nature of the disease, its transmission, and behavioural responses – and our understanding of the current and past trajectory of the pandemic has been limited by this (Manski, 2020). Thus, the EU was not alone in facing challenging choices.

Even before COVID-19 hit, it was widely acknowledged that the world was underprepared. But many assumed that given the resources at its disposal, the EU would be better equipped to fight infectious outbreaks. After all, it is home to some of the highest performing health systems and scientific institutions in the world. Additionally, several institutions designed to support collective European response to communicable diseases were well established before COVID-19.

However, there was limited consideration of globalization, geography and governance in the abovementioned measures – including gaps in analysis of regional and international organizations and the need to coordinate efforts between sub-national, national and global entities (Baum *et al*., 2021). Additionally, predictions about Europe's health security capabilities made the flawed assumption that just because European intergovernmental institutions were established, they had decision-making power, authority and adequate financing, they served the entire European region, and they had strong coordination with national and local-level efforts within countries.

This was a significant oversight for the EU, where countries are highly interdependent and where healthcare systems and associated decision-making power lies with national governments rather than international policy bodies. As of 2017, 19 of the 25 most connected countries in the world and five of the world's 20 busiest airports were in Europe (Pan-European Commission on Health and Sustainable Development, 2021). Thus, an infectious agent emerging anywhere in the world can quickly pass into Europe and become

a threat, and vice versa. Additionally, while Europe's global connectivity is a strength in many ways, disruptions in global trade and supply chains can prove catastrophic because of its interdependent nature.

In this paper, instead of focusing on the individual national strategies that were so often split across Europe (Dergiades *et al*., 2020), we examine how the EU responded to the COVID-19 crisis and the interplay between the EU and its member states. Throughout, we consider the legal, institutional and political restrictions that may have influenced the boundaries of EU policy decisions.

We begin with a background on the constraints on EU health (care) policy and then describe how these led to a series of knee-jerk reactions in initial COVID-19 management efforts which were exacerbated by the rise of nationalism among and lack of coordination between Member States. We then discuss how this was followed by elements of more strategic decision-making with the refinement of vaccination policies, the announcement of a new European health emergencies response agency and considerations on how to expand and strengthen infectious disease control at the European level. Finally, we conclude with suggestions on how the EU can continue taking strategic approaches towards pandemic planning and response, including through globally collaborative mechanisms and efforts.

I. Background on EU Health (Care) Policy

Health policy in the EU has a fundamental contradiction at its core (Mossialos and McKee, 2002). On the one hand, the Treaty on the Functioning of the EU (TFEU), as the definitive statement on the scope of EU law, states explicitly that healthcare is the responsibility of the Member States (Official Journal of the European Union, 2012.[†]). On the other hand, Member State health systems involve interactions with people (patients and staff), goods (pharmaceuticals and devices) and services, which are all granted freedom of movement across borders by the same Treaty. Furthermore, many national health activities are in fact subject to EU law and policy.

EU health policies are influenced by what Scharpf terms the 'constitutional asymmetry' between EU policies to promote market efficiency and those to promote social protection (Scharpf, 2002; Permanand and Mossialos, 2005). The EU has a strong regulatory role in respect of the former, but weak redistributive powers as requisite for the latter. The asymmetry can be ascribed to the Member States' interest in developing a common market while seeking to retain social policy at the national level. However, while welfare and solidarity remain national-level prerogatives, many issues affecting the daily life and collective prosperity of individuals are dependent on EU-level actions (Tsoukalis, 2005).

In the health arena, we see that the asymmetry is exacerbated by a dissonance between the Commission's policy-initiating role in respect of single market free movement concerns and the Member States' right to set their own social priorities. As a result, health policy in the EU has, in large part, evolved within the context of the economic aims of the single market programme (McKee *et al*., 1996; Wismar *et al*., 2002). This has led to a situation in which the Member States have conceded the need for the EU to play a role in health, even if only a limited one, and in ill-defined circumstances.

[†]https://eur-lex.europa.eu/legal-content/EN/TXT/HTML/?uri=CELEX:12012E/TXT

Furthermore, since the 1992 Maastricht Treaty, the EU has been required to 'contribute to the attainment of a high level of health protection' for its citizens. This is an understandable and important objective in its own right, and there is compelling evidence that access to timely and effective healthcare makes an important contribution to overall population health. But, notwithstanding the EU's commitment to various important public health programmes and initiatives, how are EU policymakers to pursue this goal of a high level of health attainment when they lack Treaty-based competences to ensure that national health systems are providing effective care to their populations?

This is in stark contrast to environmental protection, an area of EU policy where the EU is given explicit competence over measures affecting water resources, land use (with the exception of waste management) and energy choices and supplies under Title XX of the TFEU (Consolidated versions of the Treaty on European Union and the Treaty on the Functioning of the European Union, 2012). This is not to equate health and social policy with environmental policy; rather, it simply highlights that a greater policy mandate for areas outside (though related to) the single market could be accorded to the EU via the Treaties if desired, and that the asymmetry need not be as clear or as limiting as it appears to be for health. This suggests a redefinition or, at least, a reorganization and re-prioritization of health at the EU level is needed.

Before considering the initial COVID-19 response, we must take stock of the legal framework in which these institutions were situated, and the governance challenges posed by transboundary health threats. While health policy in the EU is dominated by national policies, some transboundary emergency response capabilities have increasingly been delegated to EU bodies in the last decade (Schomaker *et al*., 2021). Article 168 of the TFEU, referring to 'normal' non-emergency situations, stipulates that a 'high level of human health protection shall be ensured in the definition and implementation of all Union policies and activities' (Consolidated versions of the Treaty on European Union and the Treaty on the Functioning of the European Union, 2012). EU actions could include 'monitoring, early warning of and combating serious cross-border threats to health'.

The European Commission (EC) was responsible for the initial COVID-19 responses mainly through the Directorate-General for Health and Food Safety (DG-SANTE) which has a broad scope to protect public health and build a strong European Health Union and the Directorate-General for Research and Innovation (DG-RTD) which coordinates and allocates funding towards health research and innovation – including preparedness for pandemics through the research and development (R&D) of medical countermeasures and diagnostics.

EU agencies involved in the management of the crisis included the European Centre for Disease Control (ECDC) (Regulation (EC) No *851/2004,* 2004) which aims to strengthen the European defence to infectious diseases through the identification, assessment, and communication of current and emerging infectious threats to human health and the European Medicines Agency (EMA), which works to 'foster scientific excellence in the evaluation and supervision of medicines, for the benefit of public and animal health in the EU' (European Medicines Agency, 2020). The EU Civil Protection Mechanism which was established to boost cooperation on civil protection matters and improve prevention, preparedness and response efforts for environmental emergencies and disasters also played an important role in managing COVID-19. The mechanism includes the Emergency Response Coordination Centre (ERCC) responsible for coordinating

assistance to countries (both inside and outside the EU) affected by disasters as well as rescEU, responsible for enhancing the protection of EU citizens from disasters and managing emerging risks, mainly through reserves of resources and stockpiles of medical equipment.

Furthermore the Health Security Committee (HCS), based in DG-SANTE and the Early Warning and Response System (EWRS) hosted by the ECDC, granted the EU some additional capacity to coordinate policy responses (*Decision No 1082/2013/EU*, 2013).

Thus, going into the COVID-19 crisis there was an institutional and legal basis for the EU to operate; albeit other policy areas, such as humanitarian aid, had a much larger remit and more organizations supporting them in crisis responses (Schomaker *et al*., 2021).

II. Initial Management of the COVID-19 Response in Europe

In the first months of 2020, much of the bloc was conducting business as usual and failed to take threats of the virus seriously. From as early as January 2020, the Commission sounded the alarm on the novel coronavirus and called for coordinated responses. But without the buy-in of all member states, its influence was severely limited. By the time attention shifted towards the virus, it was far too late: at the end of the first quarter, COVID-19 had spread to most countries in Europe and forced decision-makers to take knee-jerk reactions in policy response.

On 9 January 2020, DG-SANTE opened an alert notification through the ECDC's EWRS and the ECDC released a Threat Assessment Brief which reported that a novel coronavirus had been the causative agent for 15 of 59 cases of pneumonia in Wuhan, China (European Centre for Disease Prevention and Control, 2020a). Soon after, the ECDC published a rapid risk assessment and the EU held its first coronavirus-related conference call on 17 January to discuss measures to prevent the virus from entering Europe. However, only 12 of the 27 member states (and the UK) attended the call (Boffey *et al*., 2020), and those who did disagreed about the main matter in question – recommendations for border measures in advance of Chinese New Year celebrations. Very little was known about the illness, its mode of transmission and infectiousness, and many leaders made the flawed assumption that this was like previous outbreaks and would mostly stay confined to Asian borders (as with the SARS outbreak in 2003).

On 22 January the ECDC updated its rapid risk assessment from low to moderate likelihood of case importation to EU/European Economic Area (EEA) countries (European Centre for Disease Prevention and Control, 2021). Days later, the first confirmed cases of COVID-19 appeared in France and Germany on 24 and 28 January respectively. The EU Civil Protection Mechanism was activated for the repatriation of EU citizens on 28 January (European Commission, 2020a) and by 30 January, the WHO declared the outbreak of what is now called SARS-CoV-2 a public health emergency of international concern (PHEIC). Efforts continued into February and on 7 February, the ECDC published a report on the need for personal protective equipment (PPE) in healthcare settings in preparation of an increase in infectious patients. Additionally, on 10 February, the ECDC released guidelines for non-pharmaceutical interventions (NPIs) to delay and mitigate the impacts of the illness (European Centre for Disease Prevention and Control, 2021).

Despite the above, many EU country leaders did not consider the threat of the virus to be serious enough to warrant event cancellations or shifts to teleworking and online

learning. These were unprecedented moves at the time, and likely to be considered wildly undemocratic by constituents who also did not understand the gravity of the COVID-19 situation.

But by late February, clusters of positive COVID-19 cases in four regions of Italy had emerged, and individual cases continued to pop up across European countries. On 2 March 2020, EC President Ursula von der Leyen established a Coronavirus response team at the political level, but the virus was already spreading rapidly throughout Europe (European Commission, 2020b). In Spring 2020, Italy replaced Wuhan as the epicentre of the pandemic.

COVID-19 Exposes the Limitations European Health Institutes Must Work with

Throughout the pandemic, DG SANTE has undertaken the negotiation of contracts for the procurement of medicines, vaccines and PPE via the EU Joint Procurement Agreement (JPA) (Anderson *et al*., 2021). DG-SANTE monitors national compliance with laws and policies, but it is the responsibility of national, regional, and local governments to apply the laws, recommendations, and policies that DG-SANTE adopts on public health (European Commission, n.d.).

While DG-SANTE, through the ECDC, began sounding the alarm on the novel coronavirus on 9 January 2020, COVID-19 quickly exposed the weaknesses of these institutions. Despite having 'European' in its title, the ECDC did not have remit beyond the EEA. Furthermore, the ECDC was severely limited by its human resource and financial capacity at the start of the pandemic (Anderson and Mossialos, 2020). Additionally, the institution could only issue scientific advice, which restricted its authority to implement prevention measures.

This is not to say that the ECDC did not provide useful contributions to early COVID-19 response efforts. After the establishment of a network of major CDCs in June 2019, the ECDC attended regular meetings (every 4–8 weeks) at the start of the pandemic to exchange information, expertise and best practices with the Chinese, US, Canadian, African Union, Caribbean, Korean, Israeli, and Singaporean CDCs (European Court of Auditors, 2021). It also established a COVID-19 network which met on a weekly basis, published a COVID-19 surveillance strategy, and collected COVID-19 data through the EWRS and European Surveillance System (TESSy) (European Centre for Disease Prevention and Control, 2020b). However, the heterogeneity between member states' data quality and methods of collection, and the limited remit and powers of the ECDC proved significant challenges in managing the start of the COVID-19 crisis.

In addition to the limits of the ECDC, the European response was significantly weakened by nationalistic decisions taken by Member States to secure scarce resources for their own populations, rather than distributing these around Europe based on need (Anderson *et al*., 2020). Despite a virtual European Council meeting on 10 March 2020 where members discussed solidarity and cooperation and identified four priorities (reducing transmission, promoting research, mitigating socioeconomic consequences, and providing medical equipment) for mitigating the impacts of COVID-19, several European countries quickly introduced export bans on PPE when severe shortages were occurring elsewhere (Anderson *et al*., 2020). When the pandemic first began, rescEU hosted a list of resources from member states that could be supplied in times of emergency (rather than controlling the

resources themselves), and was underprepared to handle a situation where multiple member states were dealing with the same emergency and in need of the same supplies (Brooks *et al*., 2021). This hindered countries' abilities to secure access to PPE for their medical workers and general populations. In attempt to fix these issues, in the first half of 2020 the Commission began to strengthen and reinforce the system by providing rescEU more funding and creating more stockpile locations across member states (European Commission, 2020c). At present, a strategic rescEU medical reserve (including ventilators and PPE) has been established with the stockpile hosted by nine EU member states.

Furthermore, the legal obstacles, especially regarding data sharing, of cross-border efforts to tackle infectious outbreaks were exposed. This was heightened by Brexit, which occurred just as the virus was beginning to circulate around the bloc. Additionally, there was not adequate investment for R&D at this stage in the pandemic – in March 2020, only €140 million had been committed to 17 R&D projects; whereas €25bn were committed to efforts to mitigate economic impacts of COVID-19 to health systems, enterprises and labour markets (Anderson *et al*., 2020).

Interplay between the European Commission, Member States and the Role of International Organizations

The early weaknesses in the pandemic response seemed to trigger a process of, what some experts termed, 'failing forward' whereby diverse member states which face problems participate in intergovernmental bargaining and agree to lowest common denominator solutions (Brooks *et al*., 2021).

Early in 2020, in response to the virus, the EU established a Crisis Coordination Committee. It sounded the alarm on COVID-19 on 29 January and in the same week issued calls to strengthen healthcare capacity in preparation of the virus' inevitable havoc. But media coverage and most public attention within Europe focused on the Brexit vote (Boffey *et al*., 2020). Similar disregard of and lack of urgency around other international advice was seen: on 25 January, the WHO Regional Office for Europe called for the region to prepare for the virus and 'act as one' (Kluge, 2020), but at this time, most member states failed to heed to these warnings and address their depleted stockpiles of PPE, to plan for an influx of infectious patients in health and long-term care facilities, and to begin implementing non-pharmaceutical interventions (NPIs) such as social distancing requirements and mask wearing. This led to the situation in March when infections spiralled and ICUs swelled beyond capacity, countries introduced export bans, border closures were imposed, economies were shut down, and education systems were (*de facto*) halted.

And so the cycle of failing forward began. After such a clear demonstration of lacking solidarity was seen in Europe in the spring of 2020, and as desperation to source equipment rose, Member States' attitudes shifted and support for an earlier idea to jointly procure equipment grew. But even this was slow: governments were delayed in sending necessary information about the equipment they needed, and by the time they did, global stocks were limited. Then in the scramble to secure supply, countries individually contacted Chinese manufacturers and created additional competition for PPE. Ultimately, it took until early June for the first shipment of masks to be delivered under the scheme (Boffey *et al*., 2020).

When it saw that the joint procurement scheme was inadequate, the European Commission introduced emergency legislation that allowed for a central stockpile through rescEU – once again creating positive changes in the aftermath of initial patchy responses (European Commission, 2020c). By this point, appetite for designating more decision-making power to European institutions in times of crisis was increasing.

III. Vaccination Efforts Get off to a Rough Start in the Bloc in the Latter Half of 2020

By the second half of 2020, incredible scientific progress had already been made in the development of COVID-19 vaccines. In summer 2020, there were several promising candidates, and ultimately, a few COVID-19 vaccines were developed, produced, authorized, distributed, and administered in parts of the world by the end of the year – in record time. Despite the lessons learned from experiences with COVID-19 in the first half of 2020, challenges continued with vaccines in the latter half of the year and into 2021.

In June 2020, Member States approved the European Commission Vaccine Plan (European Commission, 2020d) which included a joint procurement mechanism they hoped would avoid the competition and lack of solidarity in Europe that was seen with PPE early in the pandemic. While joint procurement may have been a sensible idea in theory, the EC was inexperienced with such a process, and rather than treating it as an emergency negotiation for essential products, it opted for lower prices over conditions for speedy deliveries. By 1 May, the UK had secured a contract to supply its entire population with one jab, and enough for half its adult population to receive a second. Similarly, on 20 May the US agreed a contract guaranteeing them 300 million doses of a COVID-19 vaccine (Ovaska and Kumar Dutta, 2021). The EU did not strike its first vaccine agreement until mid-August; by which point, the UK and the US had secured enough vaccines from multiple pharmaceutical companies to fully vaccinate their entire populations more than once over. So while the EU may have gotten a better financial deal on vaccine doses, there were unintended consequences: in early 2021, vaccine manufacturers faced severe delays and shortages, and while deliveries to Europe stalled, they continued in countries which had negotiated stricter delivery conditions in their contracts (Ovaska and Kumar Dutta, 2021). This quickly set the EU far behind countries such as the UK and the US in the beginning of its inoculation programme.

Lack of coordination and inconsistent communication also continued during early vaccination efforts. On 2 December 2020, the UK was the first country to approve a COVID-19 vaccine (Pfizer/BioNTech) (Mahase, 2020). The US and Canada followed suit shortly after. The EMA bluntly criticised the UK's regulatory agency – the MHRA – for being hasty in its authorization decision and claimed that the EMA approval procedure was more thorough (Guarascio, 2020). However, three weeks later, the EMA recommended emergency authorization for the same vaccine with similar guidelines to that of the MHRA. Of course, the EMA is not solely responsible for these divergent responses, and efforts to improve harmonization between these bodies is needed from all sides. The current lack of international coordination will only lead to more challenges and complexities as the pandemic response continues; for example, which proof of vaccine evidence is accepted as borders reopen for tourist travel.

While the EMA makes authorization recommendations to the EC, the ultimate decisions about use of vaccines lie with Member State governments. This led to divergences across the EU countries in which vaccines were made available, who was prioritized and advised to receive them, and the time-gap recommended between first and second jabs. Even before any vaccines were authorized, surveys indicated high levels of vaccine hesitancy in several countries in the bloc (Boyon, 2020). The mixed messaging and differences in vaccine policies around the EU and globally created further confusion and, for some, increased reservations about the safety and effectiveness of the jabs – particularly with regards to AstraZeneca's Vaxzevria vaccine (Forman *et al*., 2021).

IV. Future Direction and Conclusions

New Institutions to Tackle Future Health Emergencies: The Health Emergency Response Agency (HERA)

To address the gaps in fighting COVID-19 in 2020, and to prevent similar occurrences from arising in the future, in autumn 2020, the EC announced that a new EU Health Emergency Preparedness and Response Authority (HERA) (formerly referred to as EU-BARDA) would be established (European Parliament, n.d.). The exact scope of the agency has not yet been formally agreed or announced, but it is expected to be similar to the US Biomedical Advanced Research and Development Authority (BARDA) and its broad objectives will include scanning the horizon for major health threats, funding R&D for potential medical countermeasures, supporting manufacturing capacity, and stockpiling essential medical supplies and equipment (Anderson *et al*., 2021). Importantly, the establishment of HERA reflects the re-prioritization of health at the EU level and the willingness of the EC to transition to a more hands-on approach to its member states' health systems during times of emergency.

HERA will join a complex landscape for emergency preparedness planning and response in Europe. Thus, its success and legitimacy will not only hinge upon achieving its objectives, but also on how it operates within this space and cooperates with existing EC agencies and institutions to build EU capacity to prepare for, respond to, and recover from health threats, rather than simply reinventing the wheel (Anderson *et al*., 2021; FEAM and Wellcome, 2021). HERA could play a key coordination role: it has the potential to coordinate infrastructure development to support mid- to large-size clinical trials in collaboration with the EMA; to coordinate various funding programmes for health across the bloc – potentially collaborating with DG-RTD; to coordinate with DG-SANTE to support the maintenance of medical countermeasure stockpiles; to coordinate with the EU Civil Protection Mechanism to arrange the delivery of the goods in these stockpiles; and to coordinate with international partners and contribute to international initiatives such as the COVID-19 Vaccines Global Access (COVAX) scheme (Anderson *et al*., 2021). This may be easier said than done though, and its early outcomes will be largely dependent on clear definitions of its objectives, its relationships with existing agencies, and its allocated funding.

Expanding the Role of the ECDC

There is also an opportunity to strengthen European infectious disease control. The ECDC was established in 2005 in the wake of the 2003 SARS outbreak in 2003, with the mission to boost the European defence to infectious diseases through the identification, assessment and communication of current and emerging infectious threats to human health. It has several coordination mechanisms for disease response, collaborates closely with the WHO and additionally hosts an early warning and response system that connects countries and allows them to share data quickly and effectively. However, the ECDC has suffered historically from a number of issues including understaffing, under-resourcing, limited geographical scope and legislative barriers that have severely restrained its ability to achieve its objectives (Anderson and Mossialos, 2020). This was evident in the early stages of the pandemic when the ECDC's remit was mainly limited to offering advice and coordinating with national public health agencies on surveillance efforts.

Recent increases in funding to the EU4Health programme may represent a chance to invest additional funding into the ECDC and expand its role to collaborate and co-invest with countries to increase surveillance capacities (European Commission, 2021). It could also contribute to workforce planning efforts and capacity-building by coordinating and subsidising educational programmes to train infectious disease nurses, physicians and epidemiologists (Anderson and Mossialos, 2020). However, an expanded role of the ECDC would require changes to legislation and extension of its geographic scope. Current legislative barriers such as data protection/sharing rules and the voluntary nature of surveillance mechanisms may need to be amended. (Anderson and Mossialos, 2020).

Learning from the Early Management of the Pandemic

Beyond the introduction of HERA and the expanded role of the ECDC, there is still a lot of work to do and ground to recover in this pandemic, and in better preparing for the next one. The EU and member states must learn lessons from their experience with COVID-19 (Forman *et al*., 2020) and make efforts to strengthen the capacity of its institutions to prevent, respond to and recover from health threats.

In 2021, after a rough start to the EU vaccination campaign, Europe refined its vaccine procurement strategy and is predicted to catch up with, and even surpass, US and UK vaccination rates by the end of summer 2021 (McEvoy, 2021). Early in 2021, amidst supply shortages and unmet vaccine deliveries and pauses on the administration of Vaxzevria after rare cases of blood clots occurred, Europe fell behind on its rollout. But by May, Europe was regaining ground: EC president Ursula Von der Leyen agreed a contract with Pfizer and BioNTech for over 1.8 billion doses of their vaccine to the EU by 2023 (Cokelaere, 2021). And even while it struggled to sort its own vaccine campaign challenges, the EU exported vaccine doses and supported the COVAX initiative with billions of euros in late 2020 and early 2021.

This demonstrates progress, but there are still many important challenges which need to be addressed to improve pandemic preparedness and response in Europe. Investments in social and microbial epidemiology could enable better predictions of where, when and how infectious disease threats will (re-)emerge in the coming decades. The development of mechanisms to understand and exploit genomic 'big data' spanning entire viral families could transform future biomedical countermeasures and enable

quicker identification and response to future outbreaks. Social and behavioural changes could also be made to prevent the risk of spill-over and spread of zoonotic threats, to slow or stop outbreak/epidemic transmission at early stages and to mitigate the impacts of 'infodemics' on infectious disease response. Furthermore, challenges related to health and healthcare can be tackled, and broader definitions and policies of 'hygiene' and 'preventable healthcare measures' and better preparedness plans to identify and respond (and evaluate response) to the next pandemic may be created, tested and scaled.

Given these challenges and need for change, the EU should develop an integrated pandemic response strategy for Europe which considers the strategic plans of and the interactions between DGs, EU agencies, mechanisms, Member States, as well as international organizations such as the World Health Organization. The EU must also take a One Health approach (Anderson *et al*., 2019) in its strategy design in recognition of and preparation for the looming threats of climate change and antimicrobial resistance (Pan-European Commission on Health and Sustainable Development, 2021). Afterall, we know that European health is not just dependent on national health systems, but also relies on well-functioning education, environmental, economic and global governance systems (Pan-European Commission on Health and Sustainable Development, 2021).

It is crucial that the EU also works at the forefront of global planning efforts. Pandemics are global by definition, and thus they necessitate international responses which are well-prepared, coordinated and coherent. The EU should continue in its work towards and support of a Pandemic Treaty which creates legally binding norms and responsibilities for states to abide to under pandemic circumstances, taking stock of what has and has not worked with existing arrangements like COVAX and the International Health Regulations (Pan-European Commission on Health and Sustainable Development, 2021). Additionally, the EU should not only continue efforts to boost its own COVID-19 vaccination campaigns, but it can also play a central role in the development of a Global Vaccine Policy for Pandemics. This global policy should set out the rights and responsibilities of all those involved in the vaccine development, deployment and distribution processes, and it should reward innovation while also ensuring that high levels of vaccine protection are achieved rapidly under pandemic circumstances (Pan-European Commission on Health and Sustainable Development, 2021).

Conclusions

The constitutional asymmetry inherent in the EU healthcare policy system has exacerbated challenges in the first year of the COVID-19 crisis and going forward, the EU must learn from these experiences and take an increasingly central role in efforts to deal with cross-border threats to health. This will likely require amendments to the TFEU that grant the EU temporary competencies under extraordinary circumstances. While this may have been controversial among Member States in the past, the appetite for it has likely increased since the COVID-19 crisis has demonstrated the importance of European strategy, coordination and solidarity in cross-border emergency responses.

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