

White Paper on European Critical Health Infrastructure

by a Group of Concerned People

The SARS-CoV-2 pandemic has highlighted the economic, social, political and structural weaknesses of the European Union. It has resulted not only in human tragedy, but also in political conflict, loss of trust, uncertainty in the future on the part of citizens dealing with lackluster MS and European responses and, ultimately, in an economic crisis whose severity, length and secondary impacts are yet unknown. The likelihood of kneejerk policy reactions in the direction of restricted travel, protectionism and “beggar thy neighbor” policies should concern the leadership of the European Union. The answer to these issues is to begin laying a foundation for a more resilient European Union when it comes to public health crises, one in which good policy mixes with operational capability and strategic communication to ensure both the predictability and the efficacy of responses to future outbreaks. This will require not only the efforts of individual nations and cooperation between them, but also the coordinating capacity of the European Union. This white paper argues that the existing European Programme for Critical Infrastructure Protection is one of the most important building blocks for future safety from pandemics. It offers, in its European and national iterations (where health is already present in the critical infrastructure taxonomy), a conceptual toolbox for understanding the systemic impact of crises such as the pandemic, including beyond the sphere of health, and the means for planning, organizing and implementing measures to increase the resilience of European societies to such crises.

Before we begin, we should add that the wider European efforts in this area should respect the following principles:

- **Inter-disciplinarity** – where medical expertise is combined with logistics, strategic communication, economics and diplomacy to ensure effectiveness of efforts; this is fitting because of the multidimensional nature of these crises, transcending health concerns;
- **Non-discrimination** – European health efforts when it comes to collective challenges should not be subject to “multi-speed Europe” or “variable geometry Europe” rhetoric and planning. All European countries have to work together in this regard and all initiatives, even if they start from a smaller group of nations, should eventually encompass the whole of the EU. Ultimately, any discriminatory or exclusionary practices will result in new vulnerabilities with regards to health crises;
- **Promoting resilience** – all European efforts should be geared towards promoting societal resilience, which is not only a measure of the ability to deal with crises, but also to mitigate the impacts and recover as soon or as smoothly as possible to the level of normal economic, social and political functioning in society. Otherwise, we may find that more human tragedy will result from overzealous but politically appealing policies than from the health crisis itself;
- **Long-term perspectives** – the EU should not be preparing for the next coronavirus or the next pandemic, but for the next health crises, also in interconnection with other crises such as food, water, energy, a.o., which may involve different scenarios and the admission that full prevention, while it must be attempted, is not feasible; the EU must “expect the unexpected”.

The European Programme for Critical Infrastructure Protection (EPCIP), while based on a series of

documents of reference describing a wide variety of critical infrastructures of interest, is currently focused on energy and transport infrastructures, with designated infrastructure lists, while the EU also acknowledges ITC and space as European critical infrastructures through other initiatives. Health infrastructure is included, in theory, but not in practice.

Our main recommendation is for the EU to begin applying EPCIP to the health infrastructure sector and to increase the European Commission's involvement in supporting critical health infrastructure protection in Member States. The European Union defines critical infrastructures as an “asset, system or part thereof located in Member States which is essential for the maintenance of vital societal functions, health, safety, security, economic or social well-being of people, and the disruption or destruction of which would have a significant impact in a Member State as a result of the failure to maintain those functions”. European Critical Infrastructures respect that definition but their disruption is felt across two or more Member States.

Through the active and rapid inclusion of health into EPCIP, the National and European authorities would begin identifying and designating European Critical Health Infrastructures (ECHI) and including them in the National and European systems for Critical Infrastructure Protection. Whether these infrastructures are hospitals, laboratories, production facilities and others, their owner / operator would be obliged to file and update an Operator's Security Plan, to adjust the organizational hierarchy in order to include a Security Liaison Officer within a Department of Security and to aid the competent authorities in establishing lines of communication that reach to European levels.

The research process through which ECHIs would be designated will surely bring up unexpected results in terms of European dependencies, but also awareness of the natural interdependencies which European integration, division of labor and mobilities have fostered. The European Union must work together with the Member States to not only protect the ECHIs, but also to plan and fund increased resilience in the future ECHI system, a process which goes beyond the remit of EPCIP.

What follows are some suggestions for European initiatives in this regard, some of which may be overlapping or contradictory. They are meant to highlight the wealth of possibilities., not to provide a coherent roadmap to European pandemic resilience:

1. **The creation, within the EU, of a European Anti Epidemic Force (EAEF) in interoperability with NATO's similar structures,** taking advantage of the current civil-military cooperation experience. This may be militarized, or rather a military structure can provide the logistics backbone for operationalizing a plan or a strategy for intervention in an epidemiological crisis affecting one or more Member States, or even the European Union in its totality. In accordance with democratic principles, the planning and strategy would be provided and approved by the political authorities, but an initiative such as this would provide the standardizations necessary for a key factor in collective action, which is interoperability, which both NATO and EU always stress. To avoid bureaucratic complications, legislative issues, and to shorten the time necessary for its creation, we believe we could initially start from the Permanent Structured Cooperation initiative, which took nine years to bring to fruition and which already counts among its projects a Multinational Medical Coordination Center (MMCC)

and a European Medical Command (EMC). Initial funding may be sourced partly from the European Defence Fund. Cooperation with NATO is key, as well as with the emergency situation response organizations from the different Member States. NATO already has internal structures dealing with NBC issues, in which all NATO MS are represented. Either starting from those, or creating similar military structures at EU levels, could provide an initial basis for planning specific measures.

2. **The European Union may consider funding and developing a European network of research centers in public health and infectious disease** to support, in an academic, R&D and logistics capacity the EAEF and other initiatives of its type. This would generate cooperation between the centers of excellence in Western Europe but may also involve the creation of new centers on a geographic, regional and economic basis (in order to avoid concentration in Western Europe), as well as targeted development of existing institutions such as the Cantacuzino Institute in Romania. With professional management, competitive hiring open to all European experts, multi-annual funding and clear lines of cooperation and communication, just as in the model being used for basic research in Physics, it would be possible to create a robust European infrastructure for inclusion in ERNCIP (European Reference Network for Critical Infrastructure Protection). These centers would be National and regional focal points for cooperation with Universities, public and commercial labs, private companies and health authorities.
3. Regardless of the structures and initiatives being implemented, **cooperation with NATO is key to ameliorate collective vulnerability and prepare for crises**. There are already success stories for NATO-EU operational cooperation in cybersecurity. The common Declaration of 2016 had 42 recommendations for its implementation in 7 different areas and with 32 concrete actions. Yearly reports are released on the state of the cooperation and the 74 proposals currently under implementation. Public health issues and resilience in the face of pandemics can easily be included in an expanded set of priority cooperation areas that already includes countering hybrid threats, maritime cooperation, cyber defense and security, common exercises, increased defense capacity and strengthening political cooperation and dialogue.
4. **It is vital for the European Commission to be involved and, alongside other European institutions, to take a central role in coordinating common efforts**. For instance, there is already an Emergency Response Coordination Centre (ERCC) and a European Crisis Management Laboratory responding to the EU Commissioner for Crisis Management. **Its role and authority should be expanded, as well as its resources**, in order to make possible more timely action than has been registered during the current crisis.
5. **The improvement of National and European responses to health crises**, including those related to infectious diseases, must rely on the existence and use of **capabilities in modelling and simulation** for training, scenario building and planning.
6. **The European Union may formulate recommendations regarding best practices** for avoiding supply shocks of basic and specialty goods (masks, medical equipment, drugs etc.) to be implemented by states or by subnational administrative units. It may even be possible and

desirable for the EU to invest in the creation of strategic stockpiles of important categories of goods under its control for disbursement in case of necessity. There are several examples of such constructs in the wider region and they can become the topic of cooperation and exchange. These models provide for bases which stock and control warehouses within a given region for emergency use by remote activation in the initial phase of a disaster occurring.

7. The European Union should **create a Macroeconomic Working Group for Crisis Response** involving the Commission, the European Central Bank and MS representatives in order to pre-plan and pre-negotiate measures for ensuring macroeconomic stability and recovery during crises that start outside of the economy, such as those caused by pandemics. It has been painfully obvious that even the best prepared nations have been caught unaware by the economic consequences of individual state action and pandemic management methods and they were forced to create ad-hoc toolboxes and experience long hours and several days negotiations for agreements to protect their economy, labor markets and capital markets.
8. The EU should consider extending the currently applicable exceptions to EU bidding and competitiveness rules from the area of national defense into that of national health as a determinant of national security. The current crisis was aggravated by fragile and inadequate supply chains for goods with centralized production, such as masks, personal protective equipment and others. It would be ideal for some of this production to be decentralized, but this is difficult in the context of market forces without state assistance. However, such a decentralization could improve pandemic limitation efforts, “curve flattening” efforts and the saving of human lives. In general, **we should identify those areas in which market processes and EU rules lead to outcomes which have a negative impact on European resilience** in various circumstances.
9. There are models in place and functioning well which sidestep the difficulties of achieving consensus at European level. For instance, the European Defence Agency started with a small number of Member States and then expanded to include almost all others after it had proven its merit. Alternatively, there is the example of the European Space Agency, an intergovernmental organization whose membership clearly overlaps with that of the EU, but is not part of the EU. However, it has established a long-term partnership with the EU as a main beneficiary of its largest collective projects. **A similar agency dedicated to fighting pandemics (like a European CDC) could conceivably fulfil this function for the EU without being a part of it, but indissolubly linked through funding and implementation.** Starting from a “coalition of the willing” may be politically difficult in a climate of political anxiety regarding “multiple speed Europe”, but it may be the right choice so long as all MS are allowed to join, should they wish to, once it has proven itself.
10. The EU may also consider **transforming the European Programme for Critical Infrastructure Protection into a European Critical Infrastructure Protection Agency** with a better-defined hierarchy, role, authority and toolbox to ensure pan-European resilience where two or more Member States are affected and coordinate European funding for resilience enhancing measures.

EU actions proposed for improving EU readiness for dealing with pandemics in the long-term:

- The EU may instruct the Joint Research Centers, mainly ISPRA, dedicated to the research of citizen security, to lead a Consortium to develop a European Epidemic Preparedness Index and offer every Member State the funding and capability to assess their EEPI and specialized funding to close gaps in the most cost-effective and immediate areas; also a future International Health Event Scale can use the experience existing in the nuclear domain (International Nuclear Event Scale). We can consider the transfer of EU expertise in sustainability, climate change, with a view towards developing a new "health agility" at local, national, and EU level. Also, the European Parliament could draw on existing legislation in other domains such as nuclear, oceans, outer space, and others, in order to draft a legal framework for health security.
- The EU should fund research into the macroeconomic consequences and responses of the pandemic and formulate resilience-enhancing guidelines for the Member States as well as better European policies, especially as regards the Eurozone Member States;
- The EU should direct a special focus on the development of a health security culture among European citizens, not just with knowledge on disease prevention and proper use of equipment such as masks, but also on the appropriate sources of information, social responsibility, their role inside their communities and modelling expectations regarding health measures and the citizens' role in their success, to increase the trust between citizens and authorities, and by promoting "resilience and perceptions" as a new construct;
- The EU could encourage transatlantic cooperation in this regard by introducing health and pandemics on the agenda of future summits and interactions. One possibility is to organize a Transatlantic Health Dialogue similar to the Transatlantic Business Dialogue and the Transatlantic Consumer Dialogue created during the institutionalization of stakeholder interaction for regulatory purposes in the early 2000s. Further efforts can be hosted under the High-Level Regulatory Cooperation Forum between the EU and US, which has not met in the last few years. The health dialogue is especially important since the current US pandemic was also caused by spread from the EU and the close economic, trade, culture, tourism and other bonds between the EU and the US favors the spread of future pandemics;
- The EU may also position itself as a key actor in the "coronadiplomacy" initiatives by cooperating with China, Russia, as well as the US, by institutionalizing dialogue on health issues, exchanges and aid at higher levels, rather than simply expressing anxiety at bilateral cooperation with countries such as Italy. The Health Silk Road within discussions already initiated by China and Italy can be operationalized at the level of the European Commission.
- These proposals and the interaction between the EU and the Member States or between the Member States themselves is part of a new multilateralism based not on asymmetry of interests and valuations, but on mutual dependence for health outcomes and eventual economic recovery;
- It would be interesting to see a High Level Consultation Forum and Public Health and Pandemic Response organized under DG HOME and bringing together stakeholders from EU institutions, MS Ministries of Health and Interior, private companies and academia in order to develop documents of reference for the European Commission and to formulate and select project ideas (infrastructure, research etc.) that would then be funded by the EU and the MS governments on a voluntary basis;

- The EU may set up a European Critical Infrastructure Protection Agency to manage the interdependencies among the different critical infrastructures, starting with the health domain a.o. The EU may introduce and develop the idea of the critical health infrastructure dimension and health cooperation in the future iteration of the European Union Global Strategy, considering a European Health Governance approach as a necessity;
- Ultimately, the best policy and action mix is unknown at this time, so the EU must foster a debate at all levels of authority (political, administrative, social, expertise) to identify possibilities and how workable they are under real world conditions. We may be surprised to find that critical health infrastructure decentralization is more resilient and politically and financially more palatable, that regional integration has been anti-resilience to a certain extent and that new attitudes are necessary to overcome the negativity inherent in crisis periods.

The EU should also consider continuing a systematic approach to the development of health infrastructures and the systems they support, which has been steadily growing out of EU documents of reference, research and policy agendas. Among these, we include:

- The Public-Private Partnerships in the health sector during normal times, but also during crisis and emergency situations;
- The promotion of medical research and of the digitalization of the health sector;
- The improvement of the health and security culture of European citizens, through the provision of adequate information and education programs;
- Tackling the problem of counterfeit medicine and medical equipment;
- The hybrid threat perspective of critical health infrastructure protection, including cybersecurity, physical disruption and supply disruption;
- The actual structure for cooperation between existing center for excellence in all areas of medicine, including military medicine. For emergency situations, we could envision cooperation with the NATO Centre of Excellence for Military Medicine.

Drafted by a Group of Concerned People

Flavius Caba-Maria (*President, MEPEI Think-tank*), Septimiu Caceu (*Brig. Gen. (ret), PhD, Sec. Gen. ARPIC Assoc.*), Victor Cionga (*Senior Econ. Advisor*), Carmen Cirnu (*Vice-President, Scientific Council, ICI*), Radu Dop (*Senior Health Policy Advisor*), Alexandru Georgescu (*PhD, Senior Analyst, ICI*), Adrian Gheorghe (*PhD, Professor, Old Dominion University, Norfolk, VA, USA*), Răzvan Ionescu (*Former Chairman, Defense Commission, Romanian Parliament*), Viorel Isticioaia-Budura (*Amb., Former Head of Asia-Pacific Dep., EEAS*), Florin Luca (*Senior Financial Advisor*), Alexandru Mironov (*Senior Science journalist*), Liviu Mureșan (*PhD, President, EURISC Foundation, Frm Head of WG ESRIF*), Radu Mușetescu (*PhD, Professor, Bucharest University of Economic Studies*), Adelina Palade (*PhD, former HoD Romanian Intelligence Service*), Adrian Pârlog (*Maj. Gen. (ret), PhD, Professor, Frm Deputy Head Mil. Intel. Dep. MoD*), Florin Păsătoiu (*PhD, Professor, Director, Center for Foreign Pol. and Sec. Studies*), Cornel Pivariu (*Maj. Gen. (ret), Frm Director, Mil. Intel. Dep. MoD*), Dorin Dumitru Prunariu (*Cosmonaut, Lt. Gen. (ret), PhD, Frm Chairman, UN COPOS*), Vasile Pușcas (*Frm Negotiator for Romania's EU Accession, PhD, Professor, "Babeș-Bolyai" University*), Adrian Severin (*Frm MEP, Frm Minister of Foreign Affairs, PhD*), Victor Vevera (*President, International Forum Critical Infrastructure Protection*)