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Values in times of crisis:

Strategic crisis management in the EU

European Group
on Ethics in Science and
New Technologies



Research and
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European Group on Ethics in Science and New Technologies Values in times of crisis: Strategic crisis management in the EU

European Commission
Directorate-General for Research and Innovation
Unit 03

Contact Jim DRATWA
Email EC-ETHICS-GROUP@ec.europa.eu
RTD-PUBLICATIONS@ec.europa.eu

European Commission
B-1049 Brussels

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This is an EGE Statement, written and adopted by the members of the EGE: Nikola Biller-Andorno, Maria do Céu Patrão Neves (Vice-Chair), Migle Laukyte, Paweł Łuków, Pierre Mallia, Fruzsina Molnár-Gábor, Thérèse Murphy, Herman Nys, Laura Palazzani, Barbara Prainsack (Chair), Nils-Eric Sahlin (Vice-Chair), Tamar Sharon, Jeroen van den Hoven, Renata Veselská, Takis Vidalis.

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EUROPEAN COMMISSION

*European Group on Ethics
in Science and New Technologies*

Values in times of crisis: Strategic crisis management in the EU

Brussels, October 2022

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EXECUTIVE SUMMARY

Values play an important role in how we understand, make sense of, and tackle crises. In its Statement, the EGE points to the importance of solidarity being at the core of crisis management; it shows how individual and collective rights and interests are intertwined; it outlines how values should direct the prioritisation of scarce resources; and it highlights the importance of good data as well as good communication.

Values influence how we frame the problems that strategic crisis management is supposed to address, and how we choose the instruments for that.

What is important and why?
Who needs (special) protection and help?
Who is included? Who is left out? Etc.

AMONG OTHER VALUES, **SOLIDARITY** IS AT THE CORE OF GOOD CRISIS MANAGEMENT.

emphasises human interdependences across borders, social groups, and other boundaries

bridges individual and collective needs

means that those in advantaged positions accept costs to alleviate the suffering of others

helps us critically reflect on whom our policies and practices prioritise and whom they exclude

can strengthen resilience



But when leaders appeal to solidarity during a crisis, too often they do so in a tokenistic way, for instance, to demand from people that they comply with measures or accept hardship. This can do more harm than good, especially when governments themselves are seen to act in ways that are detrimental to solidarity.

RECOMMENDATIONS

- Solidarity should be a guiding principle for strategic crisis management and solidaristic institutions should be strengthened at all levels.
- Human dignity and solidarity should guide the allocation of scarce resources, also to avoid undue discrimination and to ensure special consideration of disadvantaged people.
- Governments have a duty to combat poverty and inequities, multipliers of the impact of crises.
- Policy makers and the media should apply resilience thinking at the systemic (and not at the individual) level, as problems need structural solutions.
- Policy makers and funders should strengthen the infrastructure for data sharing for crisis management and containment, with adequate protections in place.
- The effectiveness of measures depends significantly on good communication, which is also critical to building trust.
- The values upon which the decisions and recommendations of government agencies are based must be made clear and be open to public scrutiny and appeal.

Introduction

In a crisis, the fundamental values or, in other words, the functioning of a society is under threat (SAPEA, 2022, p. 38). A difficulty in strategic crisis management is that responses to the situation need to be developed quickly, yet under circumstances of uncertainty. Time pressure and social pressure in decision-making often go hand in hand with a lack of a solid evidence base and experience that can be drawn on. Another key difficulty is that crisis management measures need to be implemented at the same time as current affairs continue to be managed.

In this statement, the European Group on Ethics in Science and New Technologies (EGE) addresses how ethical values can contribute to strategic crisis management. Values play an important role in how we understand and make sense of crises. They influence how we frame the problems that strategic crisis management is supposed to address and how we choose the instruments to do so. Very often, however, values remain implicit and invisible. Foregrounding the values that are inherent in, and should guide, strategic crisis management is an important task to which this statement seeks to contribute.

Of particular relevance in the context of crises is solidarity (see also EGE, 2020), which is a value that is frequently appealed to in crises, but often in a merely symbolic or tokenistic manner. When solidarity is mobilised by politicians merely to demand of people that they comply with measures, support each other or are resilient in the face of hardship, then it can do more harm than good – especially when governments themselves are seen to act in ways that are detrimental to solidarity. When solidarity is used as an analytic lens on whom we prioritise and whom we exclude, however, or on the ways in which we establish the boundaries between ‘us’ and ‘the other’, it can help to make better, more ethical and (socially and politically) more sustainable decisions. Similarly, as a value, solidarity can be a guiding principle for overcoming crises and strengthening societal resilience. This is because it bridges individual and collective needs and interests in the deep awareness of human interdependence across borders, social groups, and other boundaries.

Values play an important role in how we understand and make sense of crises. They influence how we frame the problems that strategic crisis management is supposed to address and how we choose the instruments to do so.

Given that many people and groups are negatively affected by crises, while others benefit from them, a key challenge within strategic crisis management is to assess how societies should equitably distribute the burdens and benefits arising in a crisis. How can democratic societies protect the economically, socially, or medically most vulnerable ⁽¹⁾? How do we, as people in Europe,

⁽¹⁾ Vulnerability can refer to specific vulnerabilities – such as having diminished autonomy due to illness or injury, or other conditions, or belonging to a marginalised or otherwise disadvantaged group – or to the common human vulnerability towards war, disease, oppression, etc. (e.g. Ten Have, 2006). The principle of vulnerability expresses two obligations: the first is a positive one (a claim), an obligation to provide assistance, to

decide whose needs to prioritise when resources are scarce and how financial and other support is provided to those in need? These are just a few questions that previous crises have raised and that need to be considered in the present for the future.

In this statement we frequently draw upon one of the ongoing crises, namely the COVID-19 pandemic, to highlight lessons to be learned and illustrate the role that solidarity and other values play – and should play – in strategic crisis management. Where some of our examples focus on public health and healthcare, our broader arguments pertain to all crises.

Our argument proceeds by means of the following steps. In Section 1, we lay out the key challenges of policymaking in crisis situations. We draw attention to the performative effects of framing, and of language more broadly: how we describe a problem influences how we think about solving it, and what ethical strategies and policy instruments we choose for this purpose. Calling something a crisis, rather than an emergency or a disaster, opens different policymaking toolboxes. In Section 2, we turn to a notion that is frequently mobilised in strategic crisis management, namely public interest. Contrary to much of the political discourse at present, we note that individual rights and the public interest (understood as a legal enshrinement of common goods) are not binary opposites. They are complementary and often cannot be realised without each other. In Section 3, we argue that the notion of solidarity, because it reflects the close connection between individual interests and the common good, is particularly helpful for strategic crisis management. Solidarity acknowledges that the interests and identities of human beings are shaped by their relationships to others. It draws our attention to concrete questions of how all groups in society can be adequately supported and how such attention to the needs of everyone can help to strengthen societal resilience in crisis situations, which is the focus of Section 4. Section 5 sketches the role of solidarity in EU and international law. Section 6 uses the example of healthcare and public health to outline the role of values in the prioritisation of scarce resources in crisis contexts. Section 7 then underscores the importance of data, good communication and public trust in strategic crisis management. We end with a set of recommendations directed at policymakers at all levels, and at a range of stakeholders.

positively act (action), i.e. the obligation to provide special protection; the second is a negative one (a prohibition), an obligation to refrain from any kind of interference (omission), i.e. the obligation to show respect, to acknowledge or to take into consideration human vulnerability within human relationships. The most vulnerable people are those who are most susceptible to being negatively affected by a specific situation.

1. Policymaking in times of crisis

A crisis is always disruptive. The fact that it breaks with the routines of everyday life is part of what makes a crisis so threatening. Crises can be local, regional, or global. They can be triggered by an environmental emergency (e.g. floods, droughts, fires), a pandemic, an economic situation or a war, and can be compounded by other developments, such as climate change. At the same time, crises can also be opportunities for positive transformation. They can be catalysts for a new reality that benefits from the knowledge of the past, and from successful solutions in the present, strengthening societies for the future. Ideally, all crises should convert difficulties into opportunities for improvement. Values could and should play an important role in this dynamic, with solidarity being the bond that helps us move in the same direction.

As the United Nations Sustainable Development Goals (SDGs) and the work in complexity science on social systems has made clear, many issues relating to, for example, energy, food, water, health, education, security or the rule of law are interconnected and cannot be dealt with in isolation. The long series of crises that we have experienced since 2008 – including economic, health-related, social, and environmental crises – have all added to our awareness of the connections between different domains of practice and policymaking, and also our interdependencies as humans and with other species and forms of life. Current crises are ‘transboundary’ (Boin, 2019), in the sense that they cut across geographical borders, fields of practice and policy, and fields of expertise. They demand assessment and responses, not in isolation but with due regard to the different spatial and temporal scales of (often nested) crises – and of the cascading impacts, different expressions of uncertainty and intractability, and often also the unintended consequences of the policy responses themselves. One of the main challenges of responding adequately to a crisis is to be mindful of the many ways in which issues, domains, problems, and solutions are related, and of the fact that the fates of groups and individuals are often intimately connected to each other.

A crisis often favours utilitarian policy responses that count lives or aggregate units of well-being, while larger values such as equity, dignity and respect for people temporarily recede into the background. Strategic crisis management should resist these forms of reduction or tapering. In this respect, making explicit the values that give rise to particular framings and solutions can also improve the transparency and quality of decision-making.

What is required is a systems perspective that considers the well-being not only of those immediately and obviously affected, but also of those whose lives will be affected further downstream, in distant places or in a distant future. In this context, a ‘crisis framing’ can be helpful – but it can also invite the opposite. A crisis is not merely ‘raw reality out there’. How we represent it and intervene in it always results from a choice of what is foregrounded, what is connected, what is part of the picture – and what is left out. For example, if flooding is framed as a weather-induced crisis, this renders invisible the larger process of climate change that has made such extreme weather events more likely, along with the economic, political, and social practices that have contributed to it.

A crisis often favours utilitarian policy responses that count lives or aggregate units of well-being, while larger values such as equity, dignity and respect for people temporarily recede into the background. Strategic crisis management should resist these forms of reduction or tapering. In this respect, making explicit the values that give rise to particular framings and solutions can also improve the transparency and quality of decision-making (see also EGE, 2021). It is here that matters of trust and legitimacy, of public participation and communication, of co-construction and coordination come in. The best answer will not always come from the highest international level: with due regard to subsidiarity, different levels (from the local to the international) can all contribute. Here, cooperation and coordination are of key importance. This is where a reinforced European governance for strategic crisis management can bring the most added value (see also GCSA et al., 2020a).

Individual rights and common goods: not a trade-off

A common characteristic of all crises is the unequal effects they produce on various population groups. Some groups suffer more than others either because of their economic status or for other reasons that shape vulnerabilities, which can be specific to specific crises. In times of crisis especially, care for others is a requirement for the functioning of a society. Individual rights and freedoms, on the one hand, and care for others (expressed in moral and sometimes legal duties), on the other, are not zero-sum games, where one needs to give for the other one to gain. Often, the protection of individual rights and freedoms requires the protection of common goods, and vice versa ⁽²⁾. In a society where people need to worry about getting killed in the street, they may formally be able to exercise their full set of individual rights, yet in reality they cannot meaningfully exercise them. Similarly, when inadequate protections are in place to prevent the spread of viruses in public places during a public health emergency, people who are afraid of leaving their homes due to high infection risks cannot exercise their individual rights. In the domain of health, Mallia (2015) argued that the 'health-of-the-public' (HoP) approach is a good complement to the concept of public health, with the latter focusing on the health of people as a collective and the HoP approach directing our gaze towards the health of all individual people in our societies. The HoP approach thus draws attention to the importance of primary care, along with services that support individual people and families. Strengthening the health of the public in this way will support public health and solidarity in crisis situations, and vice versa.

In these examples, social peace and public health, respectively, are common goods that enable the enjoyment of individual rights and freedoms and increase

(2) We use the term 'common goods' as a generic term to refer to those goods or facilities that serve the basic needs of all members of a community or provide benefits to all. In Hussain's (2018) words, "[t]he facilities that make up the common good serve a special class of interests that all citizens have in common, i.e., the interests that are the object of the civic relationship."

individual well-being. In other words, to respect individual rights in times of crisis we need to be aware of the complementarity of individual rights and common goods ⁽³⁾. This makes it imperative to fulfil our duties towards others and towards society as a whole. Strategic crisis management should be an opportunity to complement the dominant logic of rights with a corresponding logic of duties. In crisis circumstances, an 'atomistic' exercise of individual rights may not only deprive others of their rights, but also eventually limit every individual's ability to exercise them.

Balancing competing rights and interests and translating the outcome of this balancing into practices, policies and technical measures is a complicated normative task at the best of times. It becomes even more complex under crisis conditions. Traditionally, when balancing individual interests in the protection and promotion of rights, their relative relationship to the rights and freedoms of others is analysed in the context of the broad societal interest in promoting values and achieving a high standard of participation and welfare. Crisis situations, however, are characterised by the fact that the relevant interests at stake are multiple and fragmented, meaning that their reconciliation often cannot be achieved solely through opposing and balancing legal positions based on a condensation of singular dependencies. Moreover, in crises, public interest is often appealed to when public bodies justify limitations of individual rights and freedoms, suggesting that public interest is of a higher order than individual rights and freedoms as such. The latter view, however, is mistaken. Instead of public interest or individual rights taking priority over the other, each one requires the other. The notion of solidarity, as we argue, is a useful concept, especially for strategic crisis management, because it acknowledges and accommodates this interdependence of the individual and the collective level. While, as we will argue, there are situations in which individual rights and interests can be in opposition to public interest and the broader common good, they are not in opposition to each other *in principle*. Recognising this fact moves some of the goalposts of strategic crisis management: rather than asking how we should ideally 'balance' individual rights and the public interest, it makes us ask how we can make sure that everyone's basic needs are met also in a crisis, and how everyone receives the best support possible. Before we fully unpack this argument, we will take a closer look at the role of the public interest.

Instead of public interest or individual rights taking priority over the other, each one requires the other.

⁽³⁾ This intertwining of individual and common interest is rooted in the foundational works of social contract theory, as exemplified by Jean-Jacques Rousseau's call to "[f]ind a form of association that defends and protects the person and goods of each associate with all the common force" (Rousseau, 1949).

2. The public interest

The interest of a group of people is more than just the sum of the individual interests or their common denominator; it elevates the interests to be assigned to a group. These interests can then be enshrined in law and become legal goods in which the respective society is deemed to have an interest strong enough to be manifested through law. In this sense, the formulation of a public interest aims at the accomplishment and the protection of common goods ⁽⁴⁾ and the underlying common values.

The public interest also guides the balancing of competing rights and interests. In that sense, it is used to legitimise and justify relevant decisions. The public interest can also be expressed through the law itself. For example, human rights – including the right to the highest attainable standard of health and the right to share and receive information, including via a free press – can be seen as expressions of public interest. This is the case because a strong and effective healthcare system and structures that facilitate free and open information sharing and deliberation benefit both individuals and society as a whole. Relatedly, human rights spell out the circumstances in which it may be legitimate for their scope to be restricted (i.e. in the public interest). Occasionally, the exercise of certain rights, such as the right to movement or the right to private life, may be restricted in proportionate and lawful ways to protect the rights and freedoms of others, to ensure public health or national security.

Free, democratic states governed by the rule of law are characterised by a multiplicity of common concerns that must be weighed against each other. In a crisis, conflicts between different common concerns and between individual interests and the public interest regularly intensify. The instruments and methods for balancing them are often unclear, and the pursuit of an appropriate balance can become a time-consuming endeavour that hinders a quick response or any response at all. Often the emphasis is on 'acting first and assessing later', with an assumption that courts and tribunals of inquiry will adjudicate and rectify harms after the fact.

Prioritisation among different aspects of public interest presupposes an integrated approach to all of them and is subject to specific justification by government authorities following transparent criteria. Citizens have the right to know why, in urgent situations, some aspects of the overall public interest (in the economy, public health, education, public security, environment, etc.) are not prioritised, and governments are accountable for providing relevant reasons. Precautionary measures to prevent crises, and post-crisis resolution measures, also involve a challenging balance of different aspects of the public

⁽⁴⁾ The 'common good' refers to the facilities – whether material, cultural or institutional – that the members of a community provide to all members in order to fulfil a relational obligation they all have to care for certain interests that they have in common. It hence includes a range of facilities, from the road system to human rights to clean air and water. (<https://plato.stanford.edu/entries/common-good/>)

interest, for example in the context of risk-friendly innovation and technology development. Involving new technology in crisis-preventive policies presupposes that we are aware not only of predictable risks for common goods (such as the environment or privacy) but even of risk uncertainty, in terms of the extent of potential risks and their possibility of occurring. Both the likelihood and the extent of possible harm determine the intensity of the potential interference with the rights and freedoms of those affected. The risk of interference with rights must be included in the assessment of proportionality of the measure causing that risk. Under this view, the precautionary principle (a notion developed in the context of international environmental law, referring to the duty to refrain from acting whenever the potential – serious and irreversible – consequences are not yet known; see also Schröder, 2014) needs to be taken seriously by governmental authorities in decision-making procedures. When associated with risk uncertainty, innovative technologies may be implemented on the necessary condition that reasonable measures for preventing potential risks are in place. In this approach, the precautionary principle (to the extent that it is applicable in a crisis when urgent action is needed) and the risk-based approach must go hand in hand; they influence, condition, and complement each other.

It is necessary to add to these considerations that we understand humans as relational beings, whose interests are shaped by their relationships to others. An approach guided by this understanding and by the principle of solidarity (see Sections 1 and 3) can help to overcome false dichotomies between the individual interest and the collective and the public interest.

A further challenge is that, in a crisis, the interpretation of the public interest can be thwarted by actors without any democratic legitimation, but that are, nevertheless, very powerful. We must bear in mind that, in a democratic society, the content of the public interest is necessarily a subject of public debate and deliberation. Even if there are general interests that are very widely (or even universally) accepted, there is always room for diverging opinions and interpretations when we attempt to determine their specific meaning and implications for action in concrete situations, particularly in times of crisis. Nowadays, with the development of new, often online-based technological applications (social media, etc.), this public debate could ideally be facilitated. Instead, however, they are often abused, and regularly hinder public deliberations rather than promoting them.

At the same time, there is no guarantee or evidence that these networks provide valid information to determine the actual content of the public interest. On the contrary, the informal nature of exchanges on social media, where no specific requirements of democratic deliberation, legitimacy and accountability exist (other than the fact of their popularity), allows the dissemination of subjective opinions presented as 'news' or 'facts', and even of fabricated 'facts' (fake news). In crisis situations, when valid information could help to engage the public in urgent policies and regulatory measures, this uncertain situation occurring between the freedom of expression, on the one hand, and the right to information, on the other, becomes highly problematic: again, striking a

balance regarding the exercise of these two competing individual rights requires special attention by any democratic society.

Moreover, although we generally see the law's procedural and substantive requirements as a safeguard, where there is a rush to create new legal measures in response to a crisis, the crucial task of filtering public values into the legally protected public interest can be incomplete or bypassed altogether. Any such disruption between the legally protected public interest and public values is risky; it can cause instant and lasting damage to society, including to trust and even to democracy itself. Thus, even in times of crisis, any attempt to use the law to secure public interest must be based on the social validity of that interest that represents the common good and corresponds to the central goals of a state, including welfare obligations securing equality, justice, and fairness.

An equally important issue refers to the extent of public interest when it comes to cross-border or even global crises. The question here is whether national governments may determine the public interest and the measures to be taken in relation to the crisis effects by focusing on national considerations exclusively, leaving aside the cross-border effects of a crisis that may occur when adopting national-oriented policies. The COVID-19 experience, for instance, has demonstrated poor coordination of national policies, and even highly diverging approaches and measures in relevance (including formal requirements for travelling, compulsory vaccination adopted in some EU Member States or patient prioritisation in access to essential healthcare services). This indicates the need to foster international debates on shared values and introduce a more comprehensive concept of public interest that is broader in terms of geographical scope but also actionable within that scope. Here too, due to its focus on what people have in common across borders and other boundaries, solidarity can be helpful.

3. From atomistic rights to well-being for all: the value of solidarity

Ethics scholarship is not unanimous as to the nature, content, and scope of solidarity. Solidarity has been considered a virtue, a moral duty, a value, an ideal to be achieved or a characteristic of institutions. What virtually all conceptualisations of solidarity have in common is that they signify pro-social phenomena that express or increase the cohesiveness of groups or entire societies. Most conceptualisations of solidarity have three features, as follows. First, they refer to some kind of support, to people standing up with, besides or for each other (e.g. Dawson and Jennings, 2012; Brunkhorst, 2005). Second, the people who provide support have something in common with those who receive the support: a shared goal, a common characteristic, a common threat or – in the most general sense – the recognition of our shared humanity. Despite the many ways in which actors may be different, in the case of solidarity it is the similarities, and not the differences, that give rise to action (Prainsack and Buyx, 2011, 2017). Third, solidarity is not an isolated, one-off interaction, but is part of a social or political fabric. It can be the basis of social or political institutions. As such, it requires some level of (indirect) reciprocity (e.g. Sternø, 2005; Molm et al., 2007; Ewuoso et al. 2022); it is stronger when the people who contribute to solidaristic arrangements in the present know that someone will have their back when they need support in the future. This is one of the features that sets solidarity apart from other values and practices such as altruism or charity: solidarity does not demand selfless sacrifice or devotion to the interests of others. It links self-regarding practice with the interests of others within a collaborative undertaking, which presupposes recognition of vulnerability and the mutuality of collaborators.

As noted, in a legal sense, solidarity generally denotes a sense of community in a group or society, from which a mutual identification arises (Federico, 2018, p. 506). This mutual identification is based on the interconnectedness and interdependencies between the goals of the actors involved in solidaristic relations, and on the interdependencies between their individual goals and the fulfilment of common goals, especially common-good-oriented goals, which can only be meaningfully achieved in cooperation with the other members of a community (Koroma, 2012, p. 103). Between the individual members of a community, this dependence establishes a bond and can form the normative legal dimension of solidarity, which also describes related duties of conduct (Calliess, 2022a, Recital 2). In this sense, solidarity is not only an individual virtue, but a structural and structuring principle and practice. It can also manifest itself in legal obligations or in the formulation of legal obligations, in both a positive and a negative sense. This is especially true for the solidaristic relations of formal groups, such as states and supranational and international communities (Lahusen and Federico, 2018, pp. 11, 15; Durkheim, 1984). Furthermore, this means that an analysis of existing laws and regulations is decisive in identifying the extent to which – and how – solidarity is introduced and implemented in these communities (see Section 5). It also means that in addition to recognising solidarity as a structural principle, it also needs to be introduced and realised through implementation tools, through policy and regulation, and through jurisprudence (Federico, 2018, p. 535). As far as the

institutionalisation of solidarity is concerned, law itself can be seen as one of the most important media for it.

Jürgen Habermas' famous description of solidarity as 'the other side of justice' refers to the nature of solidarity as the 'glue' between the bricks that make up the architecture of our political and social institutions (Habermas, 1984, 1986; see also Scholz 2008). Within this architecture, solidarity cannot be prescribed; it is what people do on their own initiative and will. Solidarity does, however, ground obligations that can bind individuals involved in the activities and institutions that deliver goods or services. Such obligations of solidarity include the obligation to provide, or contribute to the procurement of, a good or service that is to be made available to others who need it; the obligation to share the good or service according to a standard that does not require maximisation of compensation for the costs or burdens of its production; the obligation of support to provide for those in need of the good or service despite an absence of prospects for reciprocation; and the obligation of loyalty to sustain the cooperative relationship between providers and recipients of the good or service (Tranow, 2021).

Solidarity, from both an ethical and a legal perspective, can manifest itself at various levels: at the interpersonal level, at the group level and at the level of formal institutions and norms. When solidarity is enacted at the individual level, from person to person, we can speak of tier 1 solidarity. When actions of mutual support become so common that they turn into 'normal', expected behaviour in some groups (organisations and states), we see an instance of tier 2 solidarity. When solidarity expresses itself at the institutional level in legal, administrative, and bureaucratic norms, regulations, and designs, we call it tier 3 solidarity. Tier 3 solidarity typically happens when individual and group-level practices have solidified into 'harder', more structural forms of solidarity (Prainsack and Buyx, 2017; Lahusen and Federico, 2018, p. 17). The potency of solidarity as a concept manifests itself in different ways in each of these tiers, with the tiers being highly interdependent.

Contrary to popular misconception, the idea of solidarity does not imply that the needs of the public should be put above individual rights and freedoms (Prainsack, 2022). It instead bridges the two. Solidarity views people as relational beings whose relationships with others influence their interests and identities. People are autonomous because of their relationships with their human, natural and artificial environments, not in spite of them (see e.g. Mackenzie and Stoljar, 2010). The degree of an individual's autonomy is also determined by these relationships. Although some of these linkages and ties have the potential to be exploitative or harmful and put the interests of individuals at odds with those of the group, such conflicts are not the default state of human existence. Individual and collective rights and interests are not a zero-sum game in which one must always give for the other one to gain. Our relationships with our social and natural contexts are crucial in shaping our identities and interests. The concept of solidarity effectively expresses this important aspect of human nature.

While solidarity between individual people may be inherently anchored in mutual respect for individual autonomy and freedom as its very virtual condition, solidarity at the group level operates in a bidirectional manner between groups and – depending on the degree of formalisation of a group – between a formalised group and its members. Such a focus on institutionalisation of solidarity is immediately relevant to policymaking during crises. People have been better protected from some of the harshest effects of crises in societies with robust public infrastructures, especially those with well-funded and inclusive healthcare. When people lose their employment or income, social support services can help them avoid losing their homes and livelihoods. The importance of solidaristic institutions – such as policies that support people according to their needs and require contributions according to economic ability – is highlighted again in these ongoing crises. What we can take from this is a different way of thinking about crisis preparedness, one that understands the creation and strengthening of solidaristic institutions as one of its core tasks, next to – and closely related to – the abolishment of poverty and the reduction of inequalities. Poverty and grave inequalities are the root causes of much of human suffering during any crisis, ranging from health crises to war or climate change (see also GCSA et al., 2020a).

Normative frameworks that are effective in times of crisis require a review of horizontal and vertical solidarity relations and of the various tiers and their interdependencies to distinguish levels of cooperation and contribution and to achieve coherence and consistency of policies. In both vertical and horizontal solidarity relations, the procedural aspects of solidarity measures are crucial in crisis situations. They need to be further concretised in specific policies and linked to implementation and enforcement measures. Accordingly, solidarity as a structural principle should be brought to the political level to become a practised value that creates concrete and enforceable shared responsibilities that contribute to a better operationalisation of human rights in crisis and to the further levelling of solidarity as a human right.

What we can take from this is a different way of thinking about crisis preparedness, one that understands the creation and strengthening of solidaristic institutions as one of its core tasks, next to – and closely related to – the abolishment of poverty and the reduction of inequalities.

Furthermore, it is important not only to identify and deal with obstacles to solidarity in crises, but also to identify which other principles can help to manage those obstacles. Other goals and values that decision-making during a crisis should aim at include preparedness and response (requiring resources and training), prevention, accountability, auditing and public trust. Their relation to solidarity and the connection between them in the procedure of their operationalisation need to be further clarified. When the focus is on the operationalisation of human rights through public policy, the monitoring and review of past (identified) crises becomes crucial. Making the results of such audits publicly available, understandable, and part of public debate can help to repair and strengthen public trust, which in times of crisis can become a source of doubts and insecurities and needs to re-establish its role as a basis for stability, reliance and hope. Furthermore, the repair and strengthening of public

trust emerge from contingency plans based on these audits: such plans such plans must build upon – and enable – learning from past errors.

4. Poverty and social inequalities

Solidarity, as noted, is different from other pro-social practices in that it is based on what people have in common, and not what sets them apart. Despite all of the differences that inevitably exist between people and groups, solidarity is based on what people have in common – in the most general sense, our shared humanity. This is evident when one sees people rise to the occasion to help and comfort each other, as evidenced during COVID-19. Conversely, it may not be so evident between countries, where we witnessed competition for resources. In such a context, a merely symbolic reference to solidarity can do more harm than good (West-Oram, 2021).

Political discourse that emphasises differences between people and groups – for example that ‘immigrants’ take resources from ‘us’, or that ‘we’ must accept restrictions of our freedoms to support ‘those’ at risk during a pandemic – makes it harder for people to see what they have in common with others. It makes it harder to see, and act upon, the fact that everyone is vulnerable in certain respects and contexts, and that we all have in common that we want to be safe from poverty, disease, violence, and oppression. It is in this sense that solidarity draws attention to the ways in which poverty and inequalities are problems for all of us and that we have a collective responsibility to address them.

One of the most important lessons that previous crises have taught us is that the improvement of social determinants is an essential game changer. Marginalised groups become even more disadvantaged in crises, both within a country and between countries. To give an example from the COVID-19 pandemic, research across the globe has shown that those who live in poor economic and social conditions have been particularly strongly affected by both the direct and the indirect consequences of the pandemic (e.g. Abedi et al., 2021; Agrawal, 2021; Bambra et al., 2021; Delaporte et al., 2021). Poverty has been both a social and a medical risk factor. People in poor social

Marginalised groups become even more disadvantaged in crises, both within a country and between countries.

and economic conditions have had fewer opportunities and means to protect themselves from infection. They live in smaller homes, are more likely to hold jobs with higher risk exposure (and no possibility to work from home), use public transportation more frequently, and have less money to buy necessities such as disinfectants and masks. Poverty has also been a medical risk factor, in that the average health status of people in lower social and economic strata is worse than that of more economically advantaged groups. Similarly, in connection with the climate crisis, so-called frontline communities – that is, groups where several types of disadvantage intersect along social, economic, racialised and gendered lines – are the ‘first and worst’ affected. They often live in the poorest areas of a city or region and are particularly exposed to the fallout from climate change, such as fires, flooding, or heat. In other words, disadvantaged groups enter any crisis in worse health than other groups, and therefore their risk of suffering a serious disease or complications or being subject to long-term effects is higher. If no measures are undertaken to support people in difficult social and economic circumstances, their social and economic

disadvantage can become compounded by crisis management: any crisis-related measure that prioritises people with better health or better prognosis exacerbates discrimination against those who are already disadvantaged (Schmidt et al., 2022).

Also in this context, solidarity is of immediate relevance. As the next section (Section 5) will show, solidarity is not merely a lofty ideal, but is enshrined in EU and international law. It is both a structural principle and an emerging human right, one that increasingly places positive duties on governments to ensure that rights and freedoms can be fully exercised. Equality and non-discrimination lie at its core. It is also in this sense that solidarity has a strong connection to the reduction of poverty and social inequalities. Not only because a life in poverty makes it practically impossible for people to exercise their rights and freedoms, but also because grave inequalities cannot be justified by factors that affected people can control; they are thus inequities, i.e. unfair injustices. From the status of solidarity as a human right, it follows that governments have a positive duty to reduce poverty and inequalities (e.g. Wester, 2018).

Specific to strategic crisis management, given the considerable effects of poverty and of stark social inequalities on the well-being of societies (e.g. Wilkinson and Pickett, 2011; Stiglitz, 2012; Dorling, 2019), and in particular during crises (e.g. Mendoza, 2011), the abolishment of poverty and the reduction of inequalities needs to be part of any crisis preparedness and management plan. These goals require stable and affordable housing, good education for all, and strong and accessible healthcare (Wagenaar and Prainsack, 2021). We have a collective responsibility to make this happen (see also GCSA et al., 2020a).

It should be emphasised here that poverty and social inequalities are not inevitable facts of nature. They are part of a political and economic order that is, itself, the outcome of decisions of political, business, and financial decision-makers. From an ethical perspective, it is of the utmost importance not only to try to improve policymaking within existing institutional arrangements, but also to submit these very arrangements to ethical scrutiny. Great social inequalities make some social groups more vulnerable during crises and make it more difficult for disadvantaged populations to recover once the worst of the crisis is over. Grave social inequalities may also weaken the system in other ways, for example by reducing the number of essential workers.

In this context, resilience is a concept that is often mobilised. Resilience is an important concept at the systemic and policymaking levels, where it refers to the way that societies adapt to and recover from crises due to latent vulnerabilities and neglected threats. It “needs to be understood within the constantly changing dynamics of complex adaptive systems” (SAPEA, 2022, p. 41). Societal resilience is closely linked to solidarity in several ways. First, solidarity can strengthen societal resilience in the sense that where people trust and support each other, societies are stronger in crises. This applies both to person-to-person solidarity and to institutionalised solidarity. Second, some of the same measures that arise from the normative principle of solidarity –

namely that governments need to make sure that everyone's basic needs are met, and that vulnerable people receive special support – also support societal resilience.

Resilience is also an established concept in psychology, where it denotes the capacity of individuals to constructively deal with, and overcome, adversity. The American Psychological Association, for example, defines it as “the process and outcome of successfully adapting to difficult or challenging life experiences, especially through mental, emotional, and behavioural flexibility and adjustment to external and internal demands” (APA, 2022). From an ethical perspective, the frame of resilience, applied to individuals, is problematic as it can lend itself to social control, or even victim blaming (Joseph, 2013, p. 40): When individuals who struggle in a crisis are seen as not resilient enough, this draws attention away from structural and collective solutions that are the preconditions for the ability of individual people to get through a crisis. In the words of the sociologist Jonathan Joseph (2013, p. 40), resilience:

From an ethical perspective, the frame of resilience, applied to individuals, is problematic as it can lend itself to social control, or even victim blaming.

fits with a social ontology that urges us to turn from a concern with the outside world to a concern with our own subjectivity, our adaptability, our reflexive understanding, our own risk assessments, our knowledge acquisition and, above all else, our responsible decision-making. ... [T]he way resilience works ... is to move fairly swiftly from thinking about the dynamics of systems to emphasising individual responsibility, adaptability and preparedness.

Resilience thinking applied to individuals should be avoided. When used at the societal level, and especially when it is understood as a call to build ‘redundancies’ into the system by strengthening public infrastructures and systems of economic and social support, it can strengthen solidarity, and vice versa. Understood in this sense, resilience thinking can play an important role in strategic crisis management.

5. Solidarity in law and policy in the EU and beyond

Solidarity is an important value that is also enshrined in the EU treaties and within the framework of international law. In this context it describes interdependence within the European constitutional network in a broad sense, on which both the EU and the Member States rely, and which thus forms the basis for both internal integration and external cooperation (Terhechte, 2017, Recital 28, 29). In this sense, it focuses strongly on solidarity between Member States and can be seen as a system-relevant guiding value within the EU's alliance of states, laws, and values (Lenaerts and Gerard, 2014, p. 316). In this alliance, solidarity becomes the central prerequisite for the transition to cooperation between states in law-making for a European common good. The importance of solidarity is underlined by the treaties themselves, which explicitly refer to the concept a total of 15 times. Even where solidarity is not explicitly mentioned in the treaties, it is often a guiding value in a variety of provisions and mechanisms (Calliess, 2022a, Recital 6). Horizontal solidarity is established both as a general principle for internal cooperation to achieve the overall objective of the EU and as a specific provision in strategic policy areas (e.g. asylum, immigration, energy, foreign policy, and natural or human-made disasters). A number of provisions standardise solidarity between EU Member States (e.g. Articles 80, 122, 194 and 222 of the Treaty on the Functioning of the European Union).

The vertical dimension of solidarity focuses on the relationship between the EU and its Member States, on the one hand, and between the EU and individual people, on the other. In the supranational construct of cooperation, the cornerstones are legally manifested in the distribution of competences between the EU and its Member States (di Napoli and Russo, 2015, p. 207). Procedural aspects of solidarity obligations (Wellens, 2005, p. 13; Calliess, 2022b, Recital 5, 6) in the form of rules addressing mutual information and coordination measures are also typical of solidaristic relations in a supranational community.

The realisation of solidarity in its vertical dimension by the state and its institutions vis-à-vis individuals ties in with the understanding of constitutional and fundamental rights as guarantees of the state for its citizens and for all people. The Charter of Fundamental Rights of the European Union (the Charter) refers to this guarantee in its preamble. Moreover, the entirety of Title IV of the Charter (Articles 27–38) is devoted to solidarity (as the title suggests) ⁽⁵⁾.

⁽⁵⁾ This section of the Charter contains provisions on the fundamental rights of workers such as the right to information and consultation within the undertaking (Article 27), access to placement services (Article 29), protection in the event of unjustified dismissal (Article 30), the prohibition of child labour and the protection of young people at work (Article 32), and the right to a family and professional life (Article 33), to name but a few. Social security and social assistance (Article 34), environmental protection (Article 37), and consumer protection (Article 38) are also fundamental rights defined in this section.

By opening up public space to citizens' engagement in the realisation of fundamental rights two insights emerge. On the one hand, it becomes clear that the duty to participate and social cohesion are of key importance for the implementation of solidarity. On the other hand, the close connection between the vertical and horizontal dimensions of solidarity becomes clear (Federico, 2018, p. 514). In addition to solidarity, which is presupposed as a value in the second sentence of Article 2 of the Treaty on European Union (TEU), and solidarity between its members, which is guaranteed by Articles 27 *et seq.* of the Charter, Article 3(5) TEU recognises mutual respect among peoples and Article 21(1) TEU recognises external solidarity.

As a principle at the international level, solidarity itself is less a concrete obligation than a foundational structural principle from which concrete rights and obligations can arise (Wolfrum, 2010, pp. 227 *et seq.*; Wellens, 2005). It is the cornerstone of the responsibility to protect people and defend their rights (Slaughter, 2005) ⁽⁶⁾. In this sense, solidarity is a basic prerequisite for human dignity (Human Rights Council, A/HRC/12/27, p. 16) and the realisation or fulfilment of human rights (Beyer, 2010, p. 102), being a key instrument for the implementation and interpretation of human rights (for references in the context of sustainable development and humanitarian aid, refugee law, the responsibility to protect and the international law of disaster relief, to name but a few, see Koroma, 2012, pp. 104 *et seq.*). The related rights of solidarity and the right to international solidarity ⁽⁷⁾ ('third generation human rights', see Sanders, 1981) serve to maintain order and the survival of an international society, which should be based on mutual assistance, especially when a country is faced with a natural disaster, poverty and/or terrorism, or is in a post-conflict situation. In particular, the similarities between the concept of solidarity and that of the responsibility to protect have led to the view that the responsibility to protect can be seen as an institutionalised form of international solidarity (Campanelli, 2011, Recital 22).

The United Nations (UN) General Assembly has explicitly referred to the concept of solidarity on multiple occasions (e.g. Resolutions 55/2 and 56/151). It has also been referenced in the context of the UN's commitment to 'unconditional solidarity that sets disaster aid provision apart' in times of acute crisis. The individuals and institutions that engage in endeavours of solidarity in such times

⁽⁶⁾ Cf. UN Resolution A/RES/59/193 of 18 March 2005 on the promotion of a democratic and equitable international order, paragraph 4(f) which states that such an order requires the realisation also of "[s]olidarity, as a fundamental value, by virtue of which global challenges must be managed in a way that distributes costs and burdens fairly, in accordance with basic principles of equity and social justice, and ensures that those who suffer or benefit the least receive help from those who benefit the most". Furthermore, paragraph 4(o) states "[t]he shared responsibility of the nations of the world for managing worldwide economic and social development as well as threats to international peace and security that should be exercised multilaterally". The resolution was adopted on 20 December 2004.

⁽⁷⁾ Draft declaration on the right to international solidarity, annex to report A/HRC/35/35 of the Independent Expert on Human Rights and International Solidarity, Virginia Dandan.

are considered donors, who work 'on the basis of needs, without any regard to political or other situations' (Moonen, 2021. p. 5). Solidarity encourages that – especially during an acute crisis – difference and disagreement be put aside so that people, communities, and countries can work together and help each other. Current crises underscore the need to develop public policies grounded on solidarity, while promoting and strengthening it at the same time.

As an emerging human right, solidarity is based on equality and non-discrimination to meaningfully participate in, contribute to, and enjoy a social and international order in which all human rights and fundamental freedoms can be fully realised (Scholz, 2014, p. 54). It triggers strong procedural rights that compel governments to share information with civil society, thereby reducing the likelihood of human rights violations (with regard to procedural rights generally, see Minnerop et al., 2018, Recital 26).

In the following section, we will turn again to the tangible role of solidarity as a moral principle. To demonstrate this, we take the example of prioritisation of scarce resources in healthcare, which has been of particular importance in the current COVID-19 pandemic. Our argument about how prioritisation should take place in light of scarce resources is applicable to all crisis contexts.

6. Prioritisation of healthcare resources: ethical requirements

The allocation of scarce healthcare resources has been at the centre of bioethical debate during COVID-19. At the macro level, it has focused on health services and their organisation and availability; at the micro level, it has focused on patients and their prioritisation in access to medical care.

The need for an efficient and ethical macro and micro allocation is not limited to the current pandemic or to other crises. In crisis contexts, however, it becomes most urgent and challenging, as the chronic shortage of health resources deepens and the pressure on the healthcare system increases. The best way to prevent these situations or to minimise their impact is by implementing preparedness measures, including by strengthening societal resilience (Section 4). These measures should include contingency plans (i.e. plans that are designed to take account of possible future events or circumstances) relating to the reorganisation of space and the redistribution of resources. Preparedness plans – along with resource allocations in healthcare – and public policies in general should be based on scientific evidence, also acknowledging when there is no available or robust science (see also GCSA et al., 2020b; GCSA, 2019). They should also comply with core ethical principles, those that structure the organisation of our societies and identify our common morality, also corresponding to an ‘ethics of minima’, i.e. the minimum set of obligations and duties with which everyone should comply. This obligation also emerges from the principle of solidarity, which implies a collective responsibility for everyone’s basic needs being met. Next to solidarity, preparedness measures should also refer to fundamental values within the EU, namely respect for human rights and the dignity of every human being; commitment to social justice and the promotion of equity, as specifications of the principle of justice, acknowledging the moral duty to act for the common good; and transparency of criteria as basis for decision-making and of procedures concerning public policies.

When confronted with scarce resources in the healthcare sector, two different strategies can be employed: rationing and rationalisation (Patrão Neves, 2020). Rationing broadly refers to restrictions on accessing goods or services, either in principle or in a certain quantity or time frame. Rationing either occurs in a (formally) egalitarian way or limited resources are distributed to people following specific criteria (e.g. profession, age, gender, nationality, severity of health condition, treatment alternatives, or prognosis). People can be included or excluded based on these characteristics. Depending on the criteria, non-egalitarian rationing might lead to an equitable distribution based on needs, but it can also interfere with respect for human dignity, justice, equality, and equity, and e.g. lead to undue discrimination.

Rationalising, in contrast, broadly refers to the most efficient use of limited resources; i.e. to the optimisation of the limited resources available under the single criterion of efficiency. Instead of selecting people to be prioritised according to specific characteristics, it seeks to contribute to the health and well-being of as many people as possible with the resources available, giving these resources to those who are likely to benefit the most, regardless of social

or demographic characteristics (Patrão Neves, 2020). Because of this, rationalisation – i.e. the prudent, efficient use of scarce (public) resources – is a moral (and often legal) requirement. If rationalisation goes wrong it can lead to implicit rationing, which is to be avoided.

In all cases, guidelines for prioritisation, for example in intensive care triage, need to be developed based on scientific evidence and grounded in fundamental ethical principles, rejecting the use of social determinants (e.g. ethnicity and economic status) to discriminate against people, and with particular attention paid not only to direct but also to indirect discrimination (e.g. structural ageism and ableism) (e.g. Joebges and Biller-Andorno, 2020; Joebges et al., 2020; Vinay et al., 2021).

When faced with the choice of who is to be included and who is to be excluded from access to scarce healthcare resources, criteria that deepen inequities will not be ethically acceptable, such as prioritising (programmatically or practically) those who can pay for services over those who cannot, or giving preferable treatments to individuals who hold important social positions or who are seen to have contributed more to society, or to those with the highest likelihood of returning to productive life. In the spirit of solidarity, we are challenged to put forward prioritisation criteria that acknowledge the obligation to contribute to the good of society as a whole and, at the same time, to help the weakest or most vulnerable, while aiming to neglect no one. Any prioritisation needs to be preceded by a well-established indication for the treatment in question and a clearly stated will on the part of the patient (by the patient, an advance directive and/or a legal representative) that the patient in fact prefers this treatment (e.g. intensive care) over other options (such as palliative care).

Although the principles and criteria for priority setting are the subject of ongoing debate, decisions made on prioritisation of patients need to be grounded in explicit moral values and communicated transparently (Sahlin and Schwaag Serger, 2022). Clear and succinct information should be available to all citizens, and (time permitting) everyone should have the possibility to participate in priority setting through community consultation. Ideally, individuals should be enabled to understand why hard choices must be made, and what is expected of them. This is the only way to ensure trusted, shared practices, founded in an interdisciplinary dialogue involving science, ethics, politics, and society.

We expand on the importance of public trust, of transparent, dialogical, good communication, and of data in the next section.

7. Data, communication, and public trust

The accessibility of data to build evidence for crisis management interventions is of great importance in any crisis. In a pandemic, for example, it may be necessary to minimise the individual and social impact of crisis management measures, such as through a better understanding of the risk factors and the severity of illness (World Health Organization, 2020). To achieve this, it is often necessary to process people's data that are subject to data protection rules. In addition, responsible data sharing between different sectors, such as healthcare and research, and between different actors, such as the public and private sectors, can be crucial to provide the necessary insights for policymaking (Peek, 2020). Different sectors may have to comply with different data processing rules, which hinders the free flow of data between them. Furthermore, to obtain datasets that are large and detailed enough to provide the necessary evidence, data from different jurisdictions may need to be merged, which, in turn, too often leads to a confrontation with different conditions for data access and sharing (RDA, 2020). For example, the *GloPID-R Roadmap for Data Sharing in Public Health Emergencies* highlights the need to comply with national and international regulations, to use preapproved approaches and to use anonymisation (GloPID-R, 2019). Anonymisation of data is not always a solution, as it can lead to a decrease in the richness of data that can diminish its value and affect the quality of evidence, and thus the conclusions that can be meaningfully drawn. It is necessary to develop new technical and normative infrastructures for data sharing for the purpose of crisis management and containment that also allow the sharing of sensitive information where necessary and have adequate safeguards in place to avoid harm to individuals and groups. If anyone is harmed nevertheless, they need to have easy access to effective remedies.

Next to having good data and evidence, having suitable communication strategies and channels in place is key to crisis prevention, preparedness, response, and resilience (Wernli et al., 2021). When people are confronted with contradicting messages, then confusion, panic, and anger may result, and trust in public authorities and people's willingness to adhere to measures will typically decrease (see also GCSA et al., 2020b). In the context of the current COVID-19 pandemic, this phenomenon has been referred to as an 'infodemic', and its potential negative impact on public health can be significant (World Health Organization, n.d.). At the same time, it is important to note that good communication is not a replacement for good crisis management and good policy measures. Whether or not people 'comply' with measures to prevent, contain, and mitigate crises depends not only on their willingness to do so, but also on whether they have the financial, social, and psychological means to do so (see SAPEA, 2019; Fiske et al., 2022; Spahl et al. 2022). When measures for crisis management are fair, consistent and effective, however, good communication can help to convey the importance of supporting and adhering to these measures.

Risk and crisis communication in democratic societies seems to be facing an ethical dilemma: if communication is to happen effectively and fast, top-down approaches appear to be the method of choice – telling people what they need

to do, best done in three-word sentences that are easy to understand and to remember. Although this communicative strategy can be considered an imposition for some citizens, it works if there is societal consensus about the urgency and the content of the messages, along with public trust in the institutions sending them. However, in crises, particularly in protracted or even chronic ones, matters often become more complex. Assessments of the situation and of the appropriateness of chosen measures can be expected to differ, and societies concerned about democratic values and about civil and human rights will respect freedom of expression, and in fact encourage public discourse. Feedback from citizens – including those who belong to less-vocal or harder-to-reach groups – will be decisive for performing the difficult task of iteratively adjusting crisis management strategies and measures in a volatile situation and in the light of continuously emerging new information.

Individuals or groups that feel that their voice is not heard may be tempted to withdraw into closed circles, where content is not challenged but continuously repeated and confirmed by like-minded conversation partners. In social media, automated filters are known to enhance this effect, leading to 'filter bubbles' and 'echo chambers'. Mistrust of authorities and societal polarisation may result, as has been seen in the context of COVID-19 vaccination policies (e.g. Germani and Biller-Andorno, 2021). Another danger comes from 'fake news', including information generated by algorithms or by individuals that is misleading and deceitful, yet can appear as completely reliable and truthful information. In some contexts, it is very difficult to distinguish truthful information from algorithm-generated fakes. Moreover, human beings are often more likely to trust information that confirms their beliefs and opinions.

Feedback from citizens – including those who belong to less-vocal or harder-to-reach groups – will be decisive for performing the difficult task of iteratively adjusting crisis management strategies and measures in a volatile situation and in the light of continuously emerging new information.

Such developments can undermine public risk and crisis communication efforts and limit their effectiveness. There is a range of possible ways to address this. One is to respond in a top-down manner, employing methods such as the removal or sanctioning of problematic content, or the 'deplatforming' of individuals or organisations known to share misleading information. Another strategy is to use social engineering techniques, possibly including artificial-intelligence-based predictions, to nudge or manipulate people into compliance, adopting similar means to those who are spreading misinformation on social media and elsewhere. Finally, more participatory approaches would rely on engaging citizens, offering platforms that provide targeted, group-specific, needs-based information, while at the same time providing opportunities for citizens to give feedback to decision-makers and empowering especially those who find it difficult to make themselves heard to participate in public discourse (Spitale et al., 2021). Reaching out to all groups in society is of prime importance, not only to understand how information needs to be delivered to reliably reach all groups, but also to grasp how measures affect them and what is needed to ensure everyone is well supported. From an ethical point of view, those approaches to information and communication, which seek to manipulate

people into compliance, are clearly problematic. Whereas different situations may require a different mix of strategies, risk and crisis communication needs to be shaped in such a way that it strengthens rather than undermines not only people's physical health but also social cohesion and democratic values.

Given the key role of communication in crisis management and its potential for harm in case of failure, a systematic evaluation and review of communication strategies would seem appropriate. Principles such as openness, transparency, inclusivity, intelligibility, and privacy can be expected to be at the centre of such appraisals (Spitale et al., 2022). A solid normative framework can inform risk and crisis communication strategies that are both effective and fair, fostering trust, critical thinking, and constructive engagement.

Crisis management that values solidarity needs to ensure sufficient data are available on how a crisis and its management affects different populations, and it needs to provide an opportunity for individuals and social groups to participate in the constant re-evaluation and readjustment of crisis response by sharing experiences and arguments. Good crisis communication can therefore be considered a key procedural requisite of realising solidarity in crisis management.

Crisis communication involves different actors, among them policymakers, scientists, and the public. Data and evidence play a key role in developing, assessing, explaining, and justifying measures in response to a crisis. The science of science communication has taught us several important things (SAPEA, 2019; see also GCSA et al., 2020b; GCSA, 2019). First, for example, we know that there is no ready-made strategy for conveying information about science, risks, and uncertainty. Each communication strategy must be tailored to the purpose it serves (Fischhoff and Davis, 2014). These purposes need to be aligned with ethical and legal norms and, in the case of state action, subject to political legitimation. Second, communication needs to target groups based on their specific informational needs and background knowledge. A one-size-fits-all approach is of limited value. Third, science communication will be greatly facilitated by science literacy. If a society is prepared to process and engage with scientific information, more content can be conveyed, and misunderstandings avoided. Part of such educational efforts needs to be an understanding of how science works. We cannot 'follow the science' if there is no science to follow, or if the science that we have points in many directions or is unclear. Fourth, empirical studies have also taught us what kind of information people want and need during a crisis such as a pandemic. Research shows that people want facts, even if they make them anxious (Fischhoff et al., 2018). People also want science to be presented accurately. People expect 'facts, not spin' from trustworthy information sources (Pittsburgh Post-Gazette, 2020). Fifth, it is not enough to tell citizens what to do. Good information should be provided on why certain kinds of action are necessary. People need to have the opportunity to voice their dissent in an appropriate manner and to engage in a discourse on how crisis response could be improved. Finally, communication strategies can be dangerous tools. Our communication approaches must be tested and evaluated, and risks must be assessed and mitigated. We have a moral obligation to ensure that the chosen strategy is fit

for the (democratically legitimated and ethically justified) purpose we want to achieve. These insights should be heeded in the design and deployment of communication strategies.

RECOMMENDATIONS

All public policies are shaped by moral values. Even when these values remain implicit, they can frame how problems – such as managing a crisis – are described and which policies are designed to address them. Making the values that underlie public policy explicit is important for several reasons: to increase transparency, to improve deliberation and communication, and to build trust between parties. It also helps to enhance citizens' engagement and public support for policies.

The EGE emphasises the important role that the value of solidarity can and should play in the context of strategic crisis management and puts forward the following recommendations.

1. Solidarity is a key European value that should be a guiding principle for strategic crisis management. Insofar as it is grounded in an understanding of humans as relational beings, whose interests are shaped by their relationships to others, the value of solidarity overcomes false dichotomies between the individual and the collective, and between the individual and public interest, which often seem to be in conflict, especially in times of crisis. Above all, it shows and enhances our shared human identity and the bond that unites humanity across borders and boundaries. In light of the transnational, and often global, nature of crises, the saying that 'nobody is safe until everyone is safe' is empirically accurate, in the sense that problems and risks related to complex crises such as pandemics, climate change, and violent conflict cannot be addressed only at the national level. Solidarity means that those in more advantaged positions should be willing to accept some costs – in economic terms, or in terms of giving up some privilege, status of power, or comfort – to alleviate the suffering of others if needed, within and across countries.

(a) Solidaristic institutions at the national, supranational, and international levels should be strengthened. Solidaristic systems are those to which people contribute their abilities and from which they receive support as they need it. Taking solidarity seriously as a guiding principle for crisis management means directing financial and other resources to solidaristic systems of social and economic support. This is important for several reasons. First, in societies with strong public infrastructures, people are better insulated from some of the worst burdens of crises. Second, while interpersonal acts of solidarity can be expected at the onset of crises, these tend not to persist in the long run and should not be relied on as a crisis management strategy. Robust institutional support, including policies that help people who lose their homes or livelihoods in times of crisis or that facilitate access to childcare for

frontline workers, also bolster people's ability and willingness to enact solidarity with others. Importantly, this may also increase trust in governments.

(b) Policymakers at the national, supranational, and international levels should actively strengthen all aspects of solidarity, including horizontally through communication and coordination measures among themselves that lead to the implementation of coherent and consistent crisis management strategies, and vertically through the implementation and strengthening of people's procedural rights (such as the rights to access information and public participation). The latter requires that policymakers and stakeholders share information with civil society and provide opportunities for feedback. This contributes to strengthening human and fundamental rights and to strengthening public trust.

(c) Designing and deploying actions that express solidarity needs to rest on a solid understanding of how individuals and social groups are affected by crises. Harnessing participatory approaches that empower citizens, and particularly underprivileged groups, to articulate their experiences, concerns, and priorities helps provide the necessary information for this purpose. Public authorities and political decision-makers should establish suitable opportunities for individuals from as many social groups as possible to share their experiences and perceptions.

2. Human dignity and solidarity should also guide the macro and micro allocation of scarce resources. Policymakers at all levels should ensure that guidance for the prioritisation of access to healthcare and other resources respects the equal worth of all human beings. Attempts to maximise resource efficiency should take care to avoid undue discrimination and ensure that the needs of disadvantaged people receive special consideration.

3. Governments have a duty to combat poverty and inequities, to ensure that everyone receives the economic, social, health-related, and psychological support that they need. Numerous studies have shown that societies with lower levels of social and economic inequality are better prepared to respond to crises. When people are economically safe it is also easier for them to support others.

- 4. Policymakers and the media should apply resilience thinking at the systemic, societal level but not at the level of individuals.** When applied to individuals, the frame of resilience lends itself to victim blaming: Those who struggle in a crisis are seen as not resilient enough. This draws attention away from structural and collective solutions that are the preconditions for the ability of individual people to get through a crisis. More broadly, structural problems cannot be addressed solely by trying to change individual behaviour, but they require structural solutions. Changing individual behaviour can only ever be one element in a larger set of measures.

- 5. Policymakers and funders at all levels should strengthen the technical and normative infrastructure for data sharing for the purpose of crisis management and containment,** including sensitive data subject to legal protection, with adequate protections in place.

- 6. Strategic crisis management can require difficult measures. Their effectiveness depends significantly on good, dialogical communication.** During a crisis, when there are many uncertainties and considerable knowledge gaps, communicating policies and their underlying scientific evidence is particularly difficult. In addition to clear and transparent communication, honesty is critical to building trust. Also with regard to Recommendation 7, a European code of science communication, along with making science communication an integral part of research programmes, would contribute to this goal.

- 7. When government agencies take decisions or issue recommendations, the values upon which these decisions and recommendations are based must be made clear.** Public decision-making always involves a combination of evidence and values. Values need to be made explicit to be open to public scrutiny and appeal. Value transparency is a prerequisite for an ethically justified crisis management framework, based on solidarity, equality, trustworthiness, and participation.

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Values play an important role in how we understand, make sense of, and tackle crises. They influence how we frame the problems that crisis management is supposed to address, and how we choose the instruments for that.

The EGE points to the importance of human dignity and solidarity being at the core of crisis management, with processes of deliberation that make values explicit. It shows how public, common and individual interests are intertwined; it outlines how values should direct the prioritisation of scarce resources; and it highlights the importance of data, good communication, and public trust. From these considerations the EGE draws a set of recommendations for policy makers and other stakeholders.

Research and Innovation policy

