

Destination 4. Ensuring access to innovative, sustainable and high-quality health care

Calls for proposals under this destination are directed towards the Key Strategic Orientation KSO-D *'Creating a more resilient, inclusive and democratic European society'* of Horizon Europe's Strategic Plan 2021-2024. Research and innovation supported under this destination should contribute to the impact areas *'Good health and high-quality accessible health care'* and *'A resilient EU prepared for emerging threats'*, and in particular to the following expected impact, set out in the Strategic Plan for the health cluster: *'Health care systems provide equal access to innovative, sustainable and high-quality health care thanks to the development and uptake of safe, cost-effective and people-centred solutions, with a focus on population health, health systems resilience, as well as improved evidence-based health policies'*. In addition, research and innovation supported under this destination could also contribute to the following impact areas: *'Climate change mitigation and adaptation'*, *'High quality digital services for all'* and *'A Competitive and secure data economy'*.

Health systems are affected by limitations in sustainability and resilience, challenges which have been reinforced by the COVID-19 crisis that has also revealed inequalities in access to high-quality health care services. Our health systems need to become more effective, efficient, accessible, fiscally and environmentally sustainable, and resilient in order to cope with public health emergencies, to adapt to environmental challenges like climate change and to contribute to social justice and cohesion. Therefore, the transformation and modernisation of our health systems will be one of the biggest challenges in the economic recovery-bound future, but it will also be a time of opportunity for generating evidence, taking advantage of digital and data-driven innovation and developing more flexible and equitable health systems.

Under this destination, research and innovation aims at supporting health care systems in their transformation to ensure fair access to sustainable health care services of high quality for all citizens. Funded activities should support the development of innovative, feasible, implementable, financially sound and scalable solutions in the various dimensions of health care systems (e.g. governance, financing, human and physical resources, health service provision, and patient empowerment). Ultimately, these activities should improve governance and provide decision-makers with new evidence, methods, tools and technologies for uptake into their health care systems and supporting health care professionals and providers and allocating resources according to citizens' health needs and preferences, while ensuring fiscal and environmental sustainability to assure those needs can be met on the long-term. Funded activities should adopt a patient-centred approach that empowers patients, promotes a culture of dialogue and openness between citizens, patients, caregivers, health care providers and other relevant stakeholders, and unleashes the potential for social innovation.

In this work programme, destination 4 will focus on the following issues:

- Accelerating the development of personalised medicine in the EU and Associated Countries, especially through a public-public cofunded partnership on personalised medicine
- Increasing access to health and care services for patients and citizens, and especially for people in vulnerable situations and at risk of discrimination
- Improving the resilience and mental wellbeing of the health and care workforce, including informal carers
- Enhancing development and uptake of research and innovation in health and care systems, including environmental transformation of the systems and contributions to the European Green Deal.

In view of increasing the impact of EU investments under Horizon Europe, the European Commission welcomes and supports cooperation between EU-funded projects to enable cross-fertilisation and other synergies. This could range from networking to joint activities such as the participation in joint workshops, the exchange of knowledge, the development and adoption of best practices, or joint communication activities. Opportunities for potential synergies exist between projects funded under the same topic but also between other projects funded under another topic, cluster or pillar of Horizon Europe (but also with ongoing projects funded under Horizon 2020). In particular, this could involve projects related to European health research infrastructures (under pillar I of Horizon Europe), the EIC strategic challenges on health and EIT-KIC Health (under pillar III of Horizon Europe), or in areas cutting across the health and other clusters (under pillar II of Horizon Europe). For instance, with cluster 2 “*Culture, Creativity and Inclusive Society*” such as on health economics and economic models, on cost-effectiveness, fiscal sustainability and accessibility of health care, or on adaptation of public health systems to societal challenges (climate change, environmental degradation, migration, demographic change, emerging epidemics and One Health AMR) thereby contributing to building resilience; with cluster 3 “*Civil Security for Society*” such as on security of health care infrastructures, incl. digital health infrastructures, health systems preparedness and response to disasters and other emergencies, and quality and safety of medicine (counterfeit and substandard medicine, illicit drugs, One Health AMR); with cluster 4 “*Digital, Industry and Space*” such as on cybersecurity of (public) health systems, products and infrastructures of digitalised health and care, or on health impact assessment (e.g. related to consumer products, working place innovation); with cluster 5 “*Climate, Energy and Mobility*”; and cluster 6 “*Food, Bioeconomy, Natural Resources, Agriculture and Environment*”.

Expected impacts:

Proposals for topics under this destination should set out a credible pathway to contributing to ensuring access to innovative, sustainable and high-quality health care, and more specifically to one or several of the following impacts:

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- Health and social care services and systems have improved governance mechanisms and are more effective, efficient, accessible, resilient, trusted and sustainable, both fiscally and environmentally. Health promotion and disease prevention will be at their heart, by shifting from hospital-centred to community-based, people-centred and integrated health care structures and successfully embedding technological innovations that meet public health needs, while patient safety and quality of services are increased.
- Health care providers are trained and equipped with the skills and competences suited for the future needs of health care systems that are modernised, digitally transformed and equipped with innovative tools, technologies and digital solutions for health care. They save time and resources by integrating and applying innovative technologies, which better involve patients in their own care, by reorganising workflows and redistributing tasks and responsibilities throughout the health care system, and by monitoring and analysing corresponding health care activities.
- Citizens are supported to play a key role in managing their own health care, informal carers (including unpaid carers) are fully supported (e.g. by preventing overburdening and economic stress) and specific needs of more vulnerable groups are recognised and addressed. They benefit from improved access to health care services, including financial risk protection, timely access to quality essential health care services, including safe, effective, and affordable essential medicines and vaccines.
- Health policy and systems adopt a holistic approach (individuals, communities, organisations, society) for the evaluation of health outcomes and value of public health interventions, the organisation of health care, and decision-making.

The actions resulting from the calls under this destination will also create strong opportunities for synergies with the EU4Health programme and in particular to contribute to the goals under the general objective “protecting people in the Union from serious cross-border threats to health and specific objective 4 “to strengthen health systems, their resilience and resource efficiency”.

The following call(s) in this work programme contribute to this destination:

Call	Budgets (EUR million)		Deadline(s)
	2023	2024	
HORIZON-HLTH-2023-CARE-04	60.00		13 Apr 2023
HORIZON-HLTH-2023-CARE-08	100.00		13 Apr 2023
HORIZON-HLTH-2024-CARE-04-two-stage		30.00	19 Sep 2023 (First Stage) 11 Apr 2024

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			(Second Stage)
Overall indicative budget	160.00	30.00	

Call - Ensuring access to innovative, sustainable and high-quality health care (Single stage - 2023)

HORIZON-HLTH-2023-CARE-04

Conditions for the Call

Indicative budget(s)¹⁹³

Topics	Type of Action	Budgets (EUR million)	Expected EU contribution per project (EUR million) ¹⁹⁴	Indicative number of projects expected to be funded
		2023		
Opening: 12 Jan 2023 Deadline(s): 13 Apr 2023				
HORIZON-HLTH-2023-CARE-04-01	RIA	20.00 ¹⁹⁵	4.00 to 6.00	4
HORIZON-HLTH-2023-CARE-04-02	RIA	20.00 ¹⁹⁶	4.00 to 6.00	4
HORIZON-HLTH-2023-CARE-04-03	RIA	20.00 ¹⁹⁷	4.00 to 6.00	4
Overall indicative budget		60.00		

General conditions relating to this call

<i>Admissibility conditions</i>	The conditions are described in General Annex A.
<i>Eligibility conditions</i>	The conditions are described in General Annex B.

¹⁹³ The Director-General responsible for the call may decide to open the call up to one month prior to or after the envisaged date(s) of opening.
The Director-General responsible may delay the deadline(s) by up to two months.
All deadlines are at 17.00.00 Brussels local time.
The budget amounts are subject to the availability of the appropriations provided for in the general budget of the Union for years 2023 and 2024.

¹⁹⁴ Nonetheless, this does not preclude submission and selection of a proposal requesting different amounts.

¹⁹⁵ Of which EUR 11.00 million from the 'NGEU' Fund Source.

¹⁹⁶ Of which EUR 11.00 million from the 'NGEU' Fund Source.

¹⁹⁷ Of which EUR 11.00 million from the 'NGEU' Fund Source.

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<i>Financial and operational capacity and exclusion</i>	The criteria are described in General Annex C.
<i>Award criteria</i>	The criteria are described in General Annex D.
<i>Documents</i>	The documents are described in General Annex E.
<i>Procedure</i>	The procedure is described in General Annex F.
<i>Legal and financial set-up of the Grant Agreements</i>	The rules are described in General Annex G.

Proposals are invited against the following topic(s):

HORIZON-HLTH-2023-CARE-04-01: Maintaining access to regular health and care services in case of cross-border emergencies

Specific conditions	
<i>Expected EU contribution per project</i>	The Commission estimates that an EU contribution of between EUR 4.00 and 6.00 million would allow these outcomes to be addressed appropriately. Nonetheless, this does not preclude submission and selection of a proposal requesting different amounts.
<i>Indicative budget</i>	The total indicative budget for the topic is EUR 20.00 million.
<i>Type of Action</i>	Research and Innovation Actions
<i>Eligibility conditions</i>	The conditions are described in General Annex B. The following exceptions apply: In recognition of the opening of the US National Institutes of Health's programmes to European researchers, any legal entity established in the United States of America is eligible to receive Union funding.
<i>Award criteria</i>	The criteria are described in General Annex D. The following exceptions apply: The thresholds for each criterion will be 4 (Excellence), 4 (Impact) and 3 (Implementation). The cumulative threshold will be 12.

Expected Outcome: This topic aims at supporting activities that are enabling or contributing to one or several expected impacts of destination 4 "Ensuring access to innovative, sustainable and high-quality health care". To that end, proposals under this topic should aim for delivering results that are directed, tailored towards and contributing to several of the following expected outcomes:

- Decision- and policymakers have access to modelling tools and foresight studies (including cost studies on the non-access to health and care services) on health and care systems¹⁹⁸ for anticipating regular¹⁹⁹ and unplanned health and care demand during large-scale cross-border emergencies²⁰⁰.
- Decision- and policymakers and health and care providers can better facilitate and manage access to regular health and care delivery during cross-border emergencies.
- Decision- and policymakers and health and care providers avail of management frameworks including organisational models for handling unplanned health and care demand linked to cross-border emergencies, while maintaining necessary regular health and care provision.
- Health and care professionals have access to training on how to deliver regular health and care services (including by means such as telemedicine) during cross-border health emergencies.
- Health and care professionals, citizens and patients access advanced digital tools enabling managed access to regular health and care services, complemented by other modes of health and care delivery (e.g., telemedicine, self-care, prioritised care).
- Patients can be involved in the co-design and co-production of health and care delivery models during cross-border emergencies and can benefit from better access to regular health and care services during such periods.
- Health and care providers and health and care professionals have access to knowledge and data on, and innovative solutions to combat, decreasing demand for regular health and care services resulting from an ongoing emergency (e.g. patients are avoiding visits to hospitals because they are worried about additional infections or do not want to add extra burden on the health and care systems).

Scope: Since the outbreak of the COVID-19 pandemic, health and care systems have been facing unprecedented challenges. Many systems were overwhelmed and fell short on available supplies, staff, and critical infrastructure. Beyond the initial challenges posed by the pandemic, its prolonged duration has strained health and care facilities and providers, and had a negative impact on regular health and care provision. Disruptions in routine and non-

¹⁹⁸ “Health and care systems” implies a broader notion than “health systems” or “healthcare systems” notably encompassing all parts of health systems and health related parts of social care systems.

¹⁹⁹ Regular care refers to the care that would be expected to be needed and delivered under normal circumstances. This includes all types of morbidities (chronic diseases, mental health disorders, trauma care etc.) and also all parts of the health and care systems (prevention, follow-up, long-term care, primary care, both in- and out hospital care etc.), as well as related support services such as laboratories.

²⁰⁰ Cross-border emergency refers to an emergent situation that spreads or entails a significant risk of spreading across the national borders of Member States and Associated Countries, and which may necessitate coordination at Union level in order to ensure a high level of human health protection (Art. 2(1) Regulation on serious cross-border threats to health). In this topic, only emergency situations with a high impact on health systems are included.

emergency medical care access and delivery have been observed. It is hence timely to take stock and identify lessons for maintaining care delivery.

Another recent emergency situation that has had a great impact on health and care systems is the war in Ukraine and the resulting migration to bordering countries. Also under these circumstances, it is important to have the right tools for maintaining access to regular health and care services, while also accommodating the more urgent needs of migrants, for example.

The goal is to be better prepared for the multiple challenges faced by health and care systems during emergencies, and ensure that necessary access to regular health and care services can be maintained.

Proposals for research and innovation should focus on health and care systems, and actions are expected to address several of the following:

- Analysis and evaluation of different epidemics or other emergencies response measures in Member States and Associated Countries aimed at maintaining access to regular health and care services. Cost studies on not maintaining access to health and care services during cross-border emergencies.
- Development of innovative tools and models for maintaining access to regular health and care services during cross-border emergencies – for example developing modelling and foresight tools to assess and anticipate impact of cross-border emergencies on regular health and care delivery; developing novel technical solutions or organisational management models, including training, for regular care delivery in future cross-border emergencies; demonstrating applicability of novel modelling tools, management frameworks and organisational models in selected areas of regular health and care services (e.g. chronic diseases, mental health disorders, trauma care).
- Development and implementation of digital tools and of effective communication strategies based on digital health literacy studies – for example developing, implementing and generating evidence of benefit of novel digital systems connecting health and care professionals, citizens and patients at-scale, helping maintain access to health and care services during emergencies (including but not limited to smart appointment management, chronic disease self-management applications, primary care and/or referral caseload prioritisation and management incl. triage, increasing clinical practice efficiency, management of health care professionals' caseload, integrated telecare suites complemented by new computational methods such as AI/machine learning, etc.).

This topic requires the effective contribution of social sciences and humanities (SSH) disciplines and the involvement of SSH experts, institutions as well as the inclusion of relevant SSH expertise, in order to produce meaningful and significant effects enhancing the societal impact of the related research activities. Interdisciplinary research is thus encouraged, including the involvement of SSH disciplines considered essential for health and care

planning and delivery in different social contexts and for the evaluation of health economical aspects.

All projects funded under this topic are strongly encouraged to participate in networking and joint activities, as appropriate. Therefore, proposals should include a budget for the attendance to regular joint meetings and may consider covering the costs of any other potential joint activities without the prerequisite to detail concrete joint activities at this stage. The details of these joint activities will be defined during the grant agreement preparation phase.

Synergies should be sought with potentially complementary research initiatives, data stewards, custodians and research infrastructures such as the European Observatory on Health Systems and Policies, the Population Health Information Research Infrastructure, the future European co-funded partnerships²⁰¹, such as the partnership on Transforming Health and Care Systems (THCS), and relevant EU health policy initiatives such as the European Health Data Space (EHDS)²⁰² and the nascent Health Emergency Response Authority (HERA)²⁰³.

Applicants envisaging to include clinical studies should provide details of their clinical studies in the dedicated annex using the template provided in the submission system. See definition of clinical studies in the introduction to this work programme part.

HORIZON-HLTH-2023-CARE-04-02: Resilience and mental wellbeing of the health and care workforce

Specific conditions	
<i>Expected EU contribution per project</i>	The Commission estimates that an EU contribution of between EUR 4.00 and 6.00 million would allow these outcomes to be addressed appropriately. Nonetheless, this does not preclude submission and selection of a proposal requesting different amounts.
<i>Indicative budget</i>	The total indicative budget for the topic is EUR 20.00 million.
<i>Type of Action</i>	Research and Innovation Actions
<i>Eligibility conditions</i>	The conditions are described in General Annex B. The following exceptions apply: In recognition of the opening of the US National Institutes of Health’s programmes to European researchers, any legal entity established in the United States of America is eligible to receive Union funding.
<i>Award criteria</i>	The criteria are described in General Annex D. The following exceptions apply:

²⁰¹ https://ec.europa.eu/info/research-and-innovation/funding/funding-opportunities/funding-programmes-and-open-calls/horizon-europe/european-partnerships-horizon-europe/candidates-european-partnerships-health_en

²⁰² https://ec.europa.eu/health/ehealth-digital-health-and-care/european-health-data-space_en

²⁰³ COM(2021) 576 final

	The thresholds for each criterion will be 4 (Excellence), 4 (Impact) and 3 (Implementation). The cumulative threshold will be 12.
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Expected Outcome: This topic aims at supporting activities that are enabling or contributing to one or several expected impacts of destination 4 “Ensuring access to innovative, sustainable and high-quality health care”. To that end, proposals under this topic should aim for delivering results that are directed, tailored towards and contributing to several of the following expected outcomes:

- Health and care workers receive support (including mental health support), access to tools and guidance that enhances their wellbeing and ability to adapt to changing working conditions, as a result of new technologies, new work models or unexpected adverse events, including during public health emergencies and when under ethical stress.
- Decision- and policymakers, employers and social partners in the health and care sectors²⁰⁴ have knowledge of the specific risks for the resilience, mental health and well-being of health and care professionals and informal carers. They have access to solutions (regulatory, organisational, technological, educational, HR, health services) to prevent and manage them, based on the integrated development of work processes and wellbeing at work and on the study of effects of clustered work stressors on work ability and recovery from work.
- Funders of health and care provision have access to evidence, novel approaches and cost-effective recommendations for interventions supporting the mental health and well-being of health and care workers at individual, organisation and sector levels.
- Policymakers cooperate with relevant stakeholders, including health and care professionals associations and social partners to foster specific solutions to improve resilience and well-being of health workers and carers including informal carers²⁰⁵, and fight the accumulation of stressors.

Scope: A resilient workforce in the health and care sectors is essential for the sustainability and prosperity of our societies. However, careers in the health and care sector can be physically and mentally taxing by submitting health professionals and carers to psychosocial risks (for example heavy workload, stressful working conditions, risk of exposure to infectious agents, precariousness, ethical stress etc.). Many health professionals and carers also commute to work or have migrated to work in a new country. This adds to the struggle of health and care systems to attract new people to their workforce, but also to maintain the ones already working. A combination of factors such as changes in work organisation, budgetary and administrative pressures faced by health and care systems, systemic shortages of health

²⁰⁴ “Health and care systems” implies a broader notion than “health systems” or “healthcare systems” notably encompassing all parts of health systems and health related parts of social care systems.

²⁰⁵ OECD definition: “Informal carers are defined as people providing any help to older family members, friends and people in their social network, living inside or outside of their household, who require help with everyday tasks.”

professionals, precarious working conditions, structural inequalities and leaps in technological innovation may leave health and care workers with feelings of helplessness, physical or mental vulnerability or moral injury.

Technological innovations (including digitisation, big data and artificial intelligence applications) provide opportunities for a more efficient provision of health and care services, and for lightening the workload of health and care workers. However, they also create new risks, potentially affecting the mental wellbeing of the workforce. For example, new skills, requirements, new organisational models, performance monitoring by algorithms, lack of control or accountability in workplace decisions, ethical questions, are elements that can increase stress and hamper the ability of health and care workers to function in their jobs on a daily basis.

The COVID-19 pandemic has put a strain on health and care workers' resilience and exacerbated mental health issues that were already a problem pre-pandemic, ranging from anxiety due to increased workload to burnout and post-traumatic stress disorder. Informal carers suffer from similar stress, potentially caused by different factors, such as the need to provide care which keeps them away from employment and puts them at an increased risk of poverty. Lack of acknowledgement that one's mental health is deteriorating, barriers to seeking help or the stigma that still surrounds mental illness may impede people from addressing such problems early enough. Different socio-economic groups are affected to different extents: in emerging virus outbreaks prior to the COVID-19 pandemic lower educational level among other things was associated with higher risk for adverse psychological outcomes among health workers²⁰⁶.

Successful proposals should address several of the following activities:

- Collect and analyse new evidence and data generation – on occupation-specific factors building the resilience, mental health well-being of health and care workers, or informal carers. Where appropriate, evidence should be gathered and analysed on the interplay of such factors with non-occupation specific factors (e.g. genetic, social etc.). Where relevant, such evidence should be target-group specific, considering variation of challenges for professionals working in various settings (primary care, hospitals, residential care institutions, disadvantaged geographic locations).
- Develop action-oriented recommendations to policymakers, employers, social partners and relevant civil society organisations at the appropriate levels (EU, national, regional, local) based on evidence generated by the proposed action. Such recommendations should suggest (cost-)effective policy interventions or elements for further research aiming to promote the resilience, mental health and well-being of health and care workers. They should be based on cost-benefit studies and ex-ante evaluations of proposed interventions.

²⁰⁶

https://ec.europa.eu/health/system/files/2021-10/028_mental-health_workforce_en_0.pdf

- Develop, or identify, innovative solutions (including digitally enabled ones), organisational models and management approaches to support health policymakers, employers and formal or informal health and care workers in promoting resilience, mental health and well-being in the workplace.
- Develop financing and resource allocation models to ensure access to support and mental health services for health and care workers and informal carers.
- Carry out testing and validation activities for new or improved solutions²⁰⁷ improving conditions for health and care workers or informal carers according to specific factors influencing their mental well-being.

Proposals can identify one or more worker groups or informal carers as target of R&I activities, based on credible scientific criteria.

This topic requires the effective contribution of social sciences and humanities (SSH) disciplines and the involvement of SSH experts, institutions as well as the inclusion of relevant SSH expertise, health and care professionals associations and (informal) carers associations, in order to produce meaningful and significant effects enhancing the societal impact of the related research activities.

All projects funded under this topic are strongly encouraged to participate in networking and joint activities, as appropriate. Therefore, proposals should include a budget for the attendance to regular joint meetings and may consider covering the costs of any other potential joint activities without the prerequisite to detail concrete joint activities at this stage. The details of these joint activities will be defined during the grant agreement preparation phase.

With women making up over 70% of EU health care professionals and employees in the care sector and a great part of informal carers, an appropriate gender approach is essential in research and policy interventions, to prevent or mitigate workplace inequalities and imbalances. Researchers and policymakers should also take into account the inclusion dimension, as a significant share of health professionals or care workers typically come from minority groups, whether through declared or undeclared work.

Proposals should consider potential synergies and avoid overlaps with ongoing calls or actions funded under EU or national programmes for example the future cofunded partnership on Transforming Health and Care Systems (THCS).

Proposals are encouraged to take into account, when relevant, the EU Strategic Framework on Health and Safety at Work (2021-2027)²⁰⁸, the report on mental health²⁰⁹ and most importantly, the recommendations and analysis presented in the Expert Panel on effective

²⁰⁷ Practices can be shared via the Best Practice Portal ([pb-portal \(europa.eu\)](https://pb-portal.europa.eu)). Examples of interventions that were initiated to tackle the mental health impact of the pandemic are also available on the pages of the dedicated web space on that topic on the Health Policy Platform <https://webgate.ec.europa.eu/hpf/>
²⁰⁸ <https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:52021DC0323&from=EN>
²⁰⁹ https://health.ec.europa.eu/system/files/2021-05/ev_20210510_mi_en_0.pdf

ways of investing in health (EXPH) opinion on supporting the mental health of the health workforce and of other essential workers.

Applicants envisaging to include clinical studies should provide details of their clinical studies in the dedicated annex using the template provided in the submission system. See definition of clinical studies in the introduction to this work programme part.

HORIZON-HLTH-2023-CARE-04-03: Environmentally sustainable and climate neutral health and care systems

Specific conditions	
<i>Expected EU contribution per project</i>	The Commission estimates that an EU contribution of between EUR 4.00 and 6.00 million would allow these outcomes to be addressed appropriately. Nonetheless, this does not preclude submission and selection of a proposal requesting different amounts.
<i>Indicative budget</i>	The total indicative budget for the topic is EUR 20.00 million.
<i>Type of Action</i>	Research and Innovation Actions
<i>Eligibility conditions</i>	The conditions are described in General Annex B. The following exceptions apply: In recognition of the opening of the US National Institutes of Health’s programmes to European researchers, any legal entity established in the United States of America is eligible to receive Union funding.
<i>Award criteria</i>	The criteria are described in General Annex D. The following exceptions apply: The thresholds for each criterion will be 4 (Excellence), 4 (Impact) and 3 (Implementation). The cumulative threshold will be 12.

Expected Outcome: This topic aims at supporting activities that are enabling or contributing to one or several expected impacts of destination 4 “Ensuring access to innovative, sustainable and high-quality health care”. To that end, proposals under this topic should aim for delivering results that are directed, tailored towards and contributing to all of the following expected outcomes:

- Policy and decision makers, providers of health and care, health and care workers and citizens have increased knowledge on how today’s health and care systems²¹⁰ are not environmentally sustainable, what the possible costs of that are (today and future) and where improvements are possible with maintained or improved quality of care (optimal patient safety not being jeopardised) and possible investments needed.

²¹⁰ “Health and care systems” implies a broader notion than “health systems” or “healthcare systems” notably encompassing all parts of health systems and health related parts of social care systems.

- Policy and decision makers and providers of health and care services have access to innovative solutions, organisational models (including financing models), and guidelines and recommendations that reduce the pollution and carbon emissions stemming from health and care systems, so that health and care provision can become more sustainable and cost-effective while maintaining or improving quality of care thanks to the reduction of energy and materials use, decreased carbon emissions, reduced waste and discharges, and efficient resource management.
- Monitoring and reporting of carbon emissions and pollution is mainstreamed through a life-cycle approach and with standard methods in the health and care systems.

Scope: The health care sector is responsible for 4-5% of global total carbon emissions²¹¹, and generates significant demands for energy and materials, as well as dangerous waste streams that may cause air, soil and water pollution. At the same time, health and care provision generally experiences less pressure to decarbonise and improve its circularity than other sectors of the economy. With the European Green Deal, the EU commits to reducing net greenhouse gas emission by at least 55% by 2030, and to reach no net emissions by 2050, and the health and care systems are not exempt. Research and innovation can support by ensuring a smooth transformation while maintaining or improving quality of health and care services.

Health and care systems are undergoing structural changes, for example by strengthening primary care and community-based care, strengthening digitalisation and making sure patients are treated or cared for at the most efficient level. This offers the possibility to connect structural changes with an environmental transformation.

During COP26, 18 countries (including two EU Member States) have committed to cutting all carbon emissions from their health systems over the next 10 to 30 years and during the same period in total fifty countries (including six EU Member States) have committed to creating climate resilient, low carbon, sustainable health systems.

In February 2022, the WHO published a report on the waste that had been generated as a result of the COVID-19 pandemic, even more emphasising the need to improve waste management systems of the health and care systems²¹². The report states that 30% of healthcare facilities world-wide, and 60% in the least developed countries, are not fit to handle the waste generated even when not taking the extra waste generated by the pandemic into account. Not only does this pose environmental risks such as water and air pollution, but it also poses a risk to health workers' safety by increasing the risk of being exposed to stick injuries, burns and pathogenic microorganisms.

Research and innovation activities under this topic should be specific to health and care sectors. They should include cost studies when relevant (environmental impacts and benefits to be quantified through the life cycle thinking approach (e.g. LCA/SLCA), to be effectively implemented in line with the European Green Deal and the Zero Pollution Action Plan) and

²¹¹ <https://www.thelancet.com/action/showPdf?pii=S2542-5196%2820%2930271-0>

²¹² <https://www.who.int/news/item/01-02-2022-tonnes-of-covid-19-health-care-waste-expose-urgent-need-to-improve-waste-management-systems>

piloting research results onsite in hospitals or other care settings while generating accessible knowledge could be included. Apart from that, successful proposals should address several of the following:

- Research and innovative solutions for decarbonisation of hospitals and other care providers: improvements in new and existing building stock, decarbonisation of energy supply to premises, reduction in energy demand of hospital sites and other care facilities (for example heating and cooling, hot water, laundry, cooking, transport systems).
- Research and innovative solutions for increased circularity of hospitals or other care providers that integrate the zero-pollution ambition: such as solutions to reduce waste, improved waste management practices (with a possible focus on water effluents and Antimicrobial Resistance (AMR)), increased circularity (for example sustainable use of linen).
- Research and innovative solutions for decarbonisation and greening of supply chains and material inflows: reduction of single-use plastics, substitution of anaesthetic gases and inhalers with high global warming potentials (GWPs), substitution of conventional pharmaceuticals with green(er) alternatives, low-carbon supply chains of food, waste reduction, management models on for example prescription of pharmaceuticals.
- Development of a framework to measure and benchmark the environmental footprint of the health and care sectors or improving infrastructures for relevant collecting, sharing, accessing and processing of data.

Projects with interdisciplinary teams representing the health and care sectors, and the environmental sector or other relevant sectors are welcome.

This topic requires the effective contribution of social sciences and humanities (SSH) disciplines and the involvement of SSH experts, institutions as well as the inclusion of relevant SSH expertise, in order to produce meaningful and significant effects enhancing the societal impact of the related research activities.

All projects funded under this topic are strongly encouraged to participate in networking and joint activities, as appropriate. Therefore, proposals should include a budget for the attendance to regular joint meetings and may consider covering the costs of any other potential joint activities without the prerequisite to detail concrete joint activities at this stage. The details of these joint activities will be defined during the grant agreement preparation phase.

Applicants are encouraged to consider how their proposals can contribute in the context of the European Green Deal²¹³, and to take into account the principles of the Circular Economy Action Plan²¹⁴, the Zero Pollution Action Plan²¹⁵ as well as the Technical guidance on the climate proofing of infrastructure in the period 2021-2027.

²¹³ https://ec.europa.eu/info/strategy/priorities-2019-2024/european-green-deal_en

²¹⁴ https://ec.europa.eu/environment/strategy/circular-economy-action-plan_en

²¹⁵ https://ec.europa.eu/environment/strategy/zero-pollution-action-plan_en

Applicants envisaging to include clinical studies should provide details of their clinical studies in the dedicated annex using the template provided in the submission system. See definition of clinical studies in the introduction to this work programme part.

Call - Partnerships in Health (2023)

HORIZON-HLTH-2023-CARE-08

Conditions for the Call

Indicative budget(s)²¹⁶

Topics	Type of Action	Budgets (EUR million)	Expected EU contribution per project (EUR million) ²¹⁷	Indicative number of projects expected to be funded
		2023		
Opening: 12 Jan 2023 Deadline(s): 13 Apr 2023				
HORIZON-HLTH-2023-CARE-08-01	COFUND	100.00 ²¹⁸	Around 100.00	1
Overall indicative budget		100.00		

General conditions relating to this call	
<i>Admissibility conditions</i>	The conditions are described in General Annex A.
<i>Eligibility conditions</i>	The conditions are described in General Annex B.
<i>Financial and operational capacity and exclusion</i>	The criteria are described in General Annex C.

²¹⁶ The Director-General responsible for the call may decide to open the call up to one month prior to or after the envisaged date(s) of opening.
The Director-General responsible may delay the deadline(s) by up to two months.
All deadlines are at 17.00.00 Brussels local time.
The budget amounts are subject to the availability of the appropriations provided for in the general budget of the Union for years 2023 and 2024.

²¹⁷ Nonetheless, this does not preclude submission and selection of a proposal requesting different amounts.

²¹⁸ Of which EUR 50.00 million from the 'NGEU' Fund Source.

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<i>Award criteria</i>	The criteria are described in General Annex D.
<i>Documents</i>	The documents are described in General Annex E.
<i>Procedure</i>	The procedure is described in General Annex F.
<i>Legal and financial set-up of the Grant Agreements</i>	The rules are described in General Annex G.

Proposals are invited against the following topic(s):

HORIZON-HLTH-2023-CARE-08-01: European Partnership on Personalised Medicine

Specific conditions	
<i>Expected EU contribution per project</i>	The Commission estimates that an EU contribution of around EUR 100.00 million would allow these outcomes to be addressed appropriately. Nonetheless, this does not preclude submission and selection of a proposal requesting different amounts.
<i>Indicative budget</i>	The total indicative budget for the topic is EUR 100.00 million.
<i>Type of Action</i>	Programme Co-fund Action
<i>Eligibility conditions</i>	The conditions are described in General Annex B. The following exceptions apply: In recognition of the opening of the US National Institutes of Health's programmes to European researchers, any legal entity established in the United States of America is eligible to receive Union funding. Because the US contribution will be considered for the calculation of the EU contribution to the partnership, the concerned consortium of research funders from eligible EU Members States and Associated Countries must expressly agree to this participation.
<i>Award criteria</i>	The criteria are described in General Annex D. The following exceptions apply: The thresholds for each criterion will be 4 (Excellence), 4 (Impact) and 3 (Implementation). The cumulative threshold will be 12.
<i>Legal and financial set-up of the Grant Agreements</i>	The rules are described in General Annex G. The following exceptions apply: The funding rate is 30% of the eligible costs. Beneficiaries may provide financial support to third parties. The support

	to third parties can only be provided in the form of grants. Financial support provided by the participants to third parties is one of the primary activities of the action in order to be able to achieve its objectives. Given the type of action and its level of ambition, the maximum amount to be granted to each third party is EUR 10.00 million.
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Expected Outcome: This topic aims at supporting activities that are enabling or contributing to one or several expected impacts of destination 4, notably “Ensuring access to innovative, sustainable and high-quality healthcare”. To that end, proposals under this topic should aim for delivering results that are directed, tailored towards and contributing to all of the following expected outcomes:

- European countries and regions, along with international partners, are engaged in enhanced collaborative research efforts for the development of innovative personalised medicine approaches regarding prevention, diagnosis and treatment;
- Healthcare authorities, policymakers and other stakeholders develop evidence-based strategies and policies for the uptake of personalised medicine in national or regional healthcare systems;
- Health industries, policymakers and other stakeholders have access to efficient measures and investments to allow swift transfer of research and innovation into market;
- Health industries and other stakeholders can accelerate the uptake of personalised medicine through the adoption of innovative business models;
- Healthcare authorities, policymakers and other stakeholders use improved knowledge and understanding of the health and costs benefits of personalised medicine to optimise healthcare and make healthcare systems more sustainable;
- Healthcare providers and professionals improve health outcomes, prevent diseases and maintain population health through the implementation of personalised medicine;
- Stronger and highly connected local/regional ecosystems of stakeholders, including innovators, are in place and facilitate the uptake of successful innovations in personalised medicine, thus improving healthcare outcomes and strengthening European competitiveness;
- Citizens, patients and healthcare professionals have a better knowledge of personalised medicine and are better involved in its implementation;
- Stakeholders cooperate better and establish a network of national and regional knowledge hubs for personalised medicine.

Scope: Personalised medicine is a medical model using characterisation of individuals' phenotypes and genotypes (e.g. molecular profiling, medical imaging and lifestyle data) for tailoring the right health strategy. Personalised medicine shows great promise and has already

led to ground-breaking developments in treatment of many diseases. Through this approach, better health outcomes can be achieved by preventing disease and providing patient-centred care tailored to the needs of citizens. There have been important investments in personalised medicine over the last decades. However, producing knowledge, translating it into clinical applications and accelerating innovation uptake are complex, time-consuming and involve multiple stakeholders. There is a need to facilitate the uptake of health technology innovations and ensure a rapid and effective implementation of personalised medicine on a larger scale in Europe. To this end, the creation of a research and innovation (R&I) partnership with a focus on personalised medicine represents a unique strategic opportunity to bring together stakeholders, create synergies, coordinate R&I actions and leverage the efforts to accelerate the evolution of healthcare toward personalised medicine.

The partnership should build on knowledge gained from supportive initiatives like the International Consortium of Personalised Medicine (ICPerMed), the European Research Area Network for Personalised Medicine (ERA-PerMed), several Coordination and Support Actions (CSAs) funded by the EC under Horizon 2020, the one million genomes initiative as well as with an increasing number of associated and related initiatives, research infrastructures and capacities in Europe and beyond.

The partnership should facilitate exchange of information and good practices among countries, provide robust guidance and tools, will network institutional stakeholders and involve regional ecosystems. It should stimulate service, policy and organisational innovations, as well as the integration of biomedical and technological innovations for the benefit of the European citizens and the European industry. The partnership should bring together a broad range of actors with a common vision of future personalised medicine. Through the objectives of Horizon Europe, the partnership should contribute to achieving the following European Commission priorities:

- Promoting our European way of life
- An economy that works for people
- A Europe fit for the digital age
- A European green deal

The partnership will also contribute to priorities of the “*Communication on effective, accessible and resilient health systems*” (COM(2014) 215 final), the “*Communication on enabling the digital transformation of health and care in the Digital Single Market; empowering citizens and building a healthier society*” (COM(2018) 233 final) and the Europe's Beating Cancer Plan.

Thanks to its capacity to bring together different stakeholders (e.g. research funders, health authorities, healthcare institutions, innovators, policymakers), to create a critical mass of resources and to implement a long-term Strategic Research and Innovation Agenda (SRIA), the partnership should address the following objectives:

- Putting Europe at the forefront of research and innovation through the support of multidisciplinary actions open to international cooperation;
- Establishing a European national and regional network of research and innovation systems dedicated to personalised medicine;
- Translating basic research into clinical applications that make a difference for patients, their families and healthcare professionals;
- Filling scientific knowledge gaps, producing evidence and developing guidance and tools in priority areas for the development and the deployment of personalised medicine;
- Integrating big data and digital health solutions in research and personalised healthcare;
- Strengthening the European healthcare industry and accelerating the uptake of personalised medicine solutions;
- Developing appropriate ecosystems for the implementation of successful personalised medicine approaches and a swift uptake of relevant innovations by healthcare systems;
- Providing socio-economic evidence of the feasibility of personalised medicine approaches for its uptake by sustainable healthcare systems;
- Improving health outcomes for citizen and patients and ensuring a wide access to advanced personalised medicine intervention approaches to all.

The European Partnership for Personalised Medicine²¹⁹ is to be implemented through a joint programme of activities ranging from research to coordination and networking activities, including training, demonstration, piloting and dissemination activities, to be structured along the following main building blocks:

- Joint implementation of the SRIA;
- Joint annual calls for R&I activities, applied R&I, pilots;
- Capacity building activities;
- Activities to enhance the skills of the relevant personalised medicine workforce, and improve citizen relevant awareness and literacy;
- Deployment activities through pilots, innovation procurement and financial support mechanisms,
- Flanking measures.

²¹⁹ More information on the planned European Partnerships is available on the Horizon Europe Webpage.

The Partnership is open to all EU Member States, as well as to countries associated to Horizon Europe and will remain open to third countries wanting to join. It should include the following actors:

- Ministries in charge of R&I policy, as well as national and regional R&I and technology funding agencies and foundations;
- Ministries in charge of health and care policy, as well as national and regional healthcare authorities, organisations and providers.

The Partnership may also encourage engagement with other relevant Ministries and will involve other key actors from civil society and end-users, research and innovation community, innovation owners, healthcare systems owners/organisers and healthcare agencies.

The Partnership's governance structure should enable an upfront strategic steering, effective management and coordination, daily implementation of activities and ensure the use and uptake of the results. The governance should leave sufficient space for involving the key stakeholders, including but not limited to R&I community, patients and citizens, healthcare professionals, formal and informal care organisations, and innovation owners.

Financial commitments and in-kind contributions are expected to be provided for the governance structure, the joint calls and other dedicated implementation actions and efforts for national coordination.

To encourage national coordination and avoid an excess of grant signatories it is recommended to limit their number to two per country. However, in duly justified cases this number could differ, including for countries with decentralised administration to allow for participation of regional authorities in charge of R&I policy and health and care policy.

To ensure coherence and complementarity of activities and leverage knowledge and investment possibilities, the Partnership is expected to establish relevant collaborations with other European partnerships and missions as set out in the working document on 'Coherence and Synergies of candidate European Partnerships under Horizon Europe'²²⁰ as well as to explore collaborations with other relevant activities at EU and international level. On top of this, the proposal should consider synergies with EU programmes, including but not limited to EU4Health, DEP, ESF+, ERDF²²¹, InvestEU, RRF and TSI.

The Partnership should align with EU-wide initiatives on open access and FAIR data²²².

²²⁰ Directorate-General for Research and Innovation, A4 Partnership Sector, October 2020: https://ec.europa.eu/info/sites/default/files/research_and_innovation/funding/documents/ec_rtd_coherence-synergies-of-ep-under-he_annex.pdf

²²¹ "Synergies between Horizon Europe and ERDF programmes (Draft Commission Notice)" https://research-and-innovation.ec.europa.eu/news/all-research-and-innovation-news/synergies-guidance-out-2022-07-06_en

²²² See definition of FAIR data in the introduction to this work programme part.

Cooperation with international organisations, and non-European institutions and experts should be considered. Applicants should describe in their proposal the methodology for their collaboration and the aims they want to achieve with this kind of collaboration.

Proposals should pool the necessary financial resources from the participating national (or regional) research programmes with a view to implementing joint calls for transnational proposals resulting in grants to third parties.

Call - Ensuring access to innovative, sustainable and high-quality health care (Two stage - 2024)

HORIZON-HLTH-2024-CARE-04-two-stage

Conditions for the Call

Indicative budget(s)²²³

Topics	Type of Action	Budgets (EUR million)	Expected EU contribution per project (EUR million) ²²⁴	Indicative number of projects expected to be funded
		2024		
Opening: 30 Mar 2023 Deadline(s): 19 Sep 2023 (First Stage), 11 Apr 2024 (Second Stage)				
HORIZON-HLTH-2024-CARE-04-04-two-stage	RIA	30.00	4.00 to 6.00	5
Overall indicative budget		30.00		

General conditions relating to this call

<i>Admissibility conditions</i>	The conditions are described in General Annex A.
<i>Eligibility conditions</i>	The conditions are described in General

²²³ The Director-General responsible for the call may decide to open the call up to one month prior to or after the envisaged date(s) of opening.
The Director-General responsible may delay the deadline(s) by up to two months.
All deadlines are at 17.00.00 Brussels local time.
The budget amounts are subject to the availability of the appropriations provided for in the general budget of the Union for years 2023 and 2024.

²²⁴ Nonetheless, this does not preclude submission and selection of a proposal requesting different amounts.

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	Annex B.
<i>Financial and operational capacity and exclusion</i>	The criteria are described in General Annex C.
<i>Award criteria</i>	The criteria are described in General Annex D.
<i>Documents</i>	The documents are described in General Annex E.
<i>Procedure</i>	The procedure is described in General Annex F.
<i>Legal and financial set-up of the Grant Agreements</i>	The rules are described in General Annex G.

Proposals are invited against the following topic(s):

HORIZON-HLTH-2024-CARE-04-04-two-stage: Access to health and care services for people in vulnerable situations

Specific conditions	
<i>Expected EU contribution per project</i>	The Commission estimates that an EU contribution of between EUR 4.00 and 6.00 million would allow these outcomes to be addressed appropriately. Nonetheless, this does not preclude submission and selection of a proposal requesting different amounts.
<i>Indicative budget</i>	The total indicative budget for the topic is EUR 30.00 million.
<i>Type of Action</i>	Research and Innovation Actions
<i>Admissibility conditions</i>	The conditions are described in General Annex A. The following exceptions apply: Applicants submitting a proposal under the blind evaluation pilot (see General Annex F) must not disclose their organisation names, acronyms, logos, nor names of personnel in Part B of their first stage application (see General Annex E).
<i>Eligibility conditions</i>	The conditions are described in General Annex B. The following exceptions apply: In recognition of the opening of the US National Institutes of Health's programmes to European researchers, any legal entity established in the United States of America is eligible to receive Union funding.
<i>Award criteria</i>	The criteria are described in General Annex D. The following

	<p>exceptions apply:</p> <p>For the second stage, the thresholds for each criterion will be 4 (Excellence), 4 (Impact) and 3 (Implementation). The cumulative threshold will be 12.</p>
<i>Procedure</i>	<p>The procedure is described in General Annex F. The following exceptions apply:</p> <p>This topic is part of the blind evaluation pilot under which first stage proposals will be evaluated blindly.</p>
<i>Legal and financial set-up of the Grant Agreements</i>	<p>The rules are described in General Annex G. The following exceptions apply:</p> <p>Eligible costs will take the form of a lump sum as defined in the Decision of 7 July 2021 authorising the use of lump sum contributions under the Horizon Europe Programme – the Framework Programme for Research and Innovation (2021-2027) – and in actions under the Research and Training Programme of the European Atomic Energy Community (2021-2025).²²⁵.</p>

Expected Outcome: This topic aims at supporting activities that are enabling or contributing to one or several expected impacts of destination 4 “Ensuring access to innovative, sustainable and high-quality health care”. To that end, proposals under this topic should aim for delivering results that are directed, tailored towards and contributing to several of the following expected outcomes:

- Decision- and policymakers, service providers, and health and care workers have better availability to and make use of knowledge on barriers to access to health and care services²²⁶ experienced by people in vulnerable situations and at risk of stigma or discrimination (from now on referred to as people in vulnerable situations)²²⁷.
- Decision- and policymakers, providers and health and care workers have access to innovative solutions to promote and improve access to health and care services for people in vulnerable situations.

²²⁵ This [decision](https://ec.europa.eu/info/funding-tenders/opportunities/docs/2021-2027/horizon/guidance/ls-decision_he_en.pdf) is available on the Funding and Tenders Portal, in the reference documents section for Horizon Europe, under ‘Simplified costs decisions’ or through this link: https://ec.europa.eu/info/funding-tenders/opportunities/docs/2021-2027/horizon/guidance/ls-decision_he_en.pdf

²²⁶ “Health and care systems” implies a broader notion than “health systems” or “healthcare systems” notably encompassing all parts of health systems and health related parts of social care systems.

²²⁷ Groups of people and/or patients vulnerable from a social, financial, or health perspective, or at risk of discrimination, such as migrants, Roma people, trans and intersex people, specific age and gender groups (that intersects with other aspects of vulnerability, such as elderly women), indigenous people, homeless people, people in poverty or at risk of poverty, people with disabilities or patients with complex conditions.

- Decision- and policymakers and providers have access to reliable quantitative data on health inequalities in access to health and care services for people in vulnerable situations.
- People in vulnerable situations are better equipped in terms of health and digital literacy, knowledge about their rights etc. when it comes to access to health and care services.
- People in vulnerable situations are involved in the design and implementation of research and innovation activities concerning access to health and care services.

Scope: Equal and needs-based access to health and care services are important values of the EU, as well as central principles within the Member States (for example 2006 Council Conclusions on Common values and principles in European Union Health Systems, European Pillar of social rights). At the same time, plenty of evidence indicates that there is unmet need for health and care services. Although financial barriers are an important part of the explanation²²⁸, it is also evident that even in countries where co-payment is low or even zero, access to health and care services differs between groups. Certain groups are more at risk of not accessing all the health and care services they need, depending among other factors, on their socio-economic and legal status, age, sex and gender identity, (dis)ability, ethnicity and geographical location.

For example, the life expectancy for the Roma people – the largest ethnic minority in the EU – is on average ten years shorter than the general population. This is because, due to poor socio-economic conditions and ethnic segregation, many Roma people live in enclaves where equal opportunities to services including infrastructure are lacking. Due to these inequalities that are also rooted in antigypsism²²⁹, Roma people are facing much greater difficulties accessing and receiving standard health and care services including prevention compared to other citizens²³⁰.

There are significant health inequalities between the LGBTIQ community and the population as a whole. One part of the explanation is reluctance to seek health and care services because they have experienced or fear hostile reactions. Trans- and intersex people still struggle to access quality and affordable medication and care, both related to general health services and specific health care relating to transition, such as a lack of relevant medication or surgical procedures²³¹.

Compared to men, older women have a higher poverty risk also due to lower pay and lower pensions. They face a higher risk to live longer in poorer health, so their overall need for

²²⁸ See for example OECD Health at a glance 2021.

²²⁹ Antigypsism (a form of racism against Roma people) is a historically rooted structural phenomenon that appears at institutional, social and interpersonal levels.

²³⁰ The EU Roma strategic framework for equality, inclusion and participation sets up the ambitious goal to lessen the life expectancy gap and ensure that by 2030 Roma women and men live 5 years longer. https://ec.europa.eu/info/sites/default/files/eu_roma_strategic_framework_for_equality_inclusion_and_participation_for_2020_-_2030_0.pdf

²³¹ [stateofart_report_en.pdf](#) (europa.eu) The Commission's Health4LGBTI project concluded that trans and intersex-focused research is needed that addresses health inequalities and healthcare.

health and especially care services is therefore higher. People living in difficult socio-economic situations, such as homeless people or people at the risk of poverty may experience similar issues. For migrants and refugees, uncertain legal status, fear of public authorities, or language difficulties may cause additional barriers to seeking adequate health and care services.

Whilst factors outside the health and care sector also have an impact on people's access to health and care services, health and care systems can influence and facilitate access through accessibility, costs, referrals and attitudes.

Another aspect concerns access to data regarding certain groups. Whereas data on access to health and care when it comes to factors related to socio-economic characteristics, geographical barriers, sex, and age is more accessible, data on people in vulnerable situations (often due to the problem of sensitivity of data) is often less accessible, contributing to making the situation of these groups less visible.

Activities under this call should focus on groups that are in vulnerable situations from a social, financial or health perspective, or at risk of discrimination, such as migrants, Roma people, trans and intersex people, specific age and gender groups (that intersects with other aspects of vulnerability, such as elderly women), indigenous people, homeless people, people in poverty or at risk of poverty, people with disabilities or patients with complex conditions. Where relevant, activities should use intersectional approaches to consider, inter alia, socioeconomic factors, geography, citizenship, age, sex and gender identity, and ethnicity.

Next to the above-mentioned, research and innovation activities under this topic should address several of the following:

- Different types of barriers - different barriers to study could be financial, geographic, social, marginalisation and discrimination. When relevant, health and digital literacy aspects should be analysed. The selection of factors should be context specific as groups suffering from access barriers vary a lot across EU countries and at subnational level. The principle of needs-based health and care should be taken into account.
- Access to what? – for example: what part of the health and care system (from prevention, primary care and long-term care to tertiary care, any specific services, e.g. mental care) do different groups have access to? Is integrated care provided for these groups taking into account their particular needs? How much health and care services do different groups access?
- Solutions - What measures are needed to counter inequalities in health and care access and make sure that vulnerable groups access health and care services and that access is based on needs (measures to educate, support and empower vulnerable groups can be included here)? What are the costs, at different levels, to develop these solutions? Piloting of measures could be included. Community-based and/or co-created initiatives and peer-support approaches: what works and how can these be supported, sustained and/or integrated in the wider service landscape.

- Better data – improving access and quality of data will contribute to identify people in vulnerable situations' health needs and implement targeted measures corresponding to the challenges that each group experiences. The data could for example explore effectiveness of provided care (metrics helping to assess if provided care addresses the root causes of inequalities) or new valid methodologies to identify the unmet health related needs of people in vulnerable situations. Quantitative and qualitative data on inequalities in prevention, prevalence and treatment of different morbidities.
- Cost analyses - The cost of inequalities in access to health and care services: Quantitatively and/or qualitatively measure the negative impact on not taking measures for helping people in vulnerable situations have access to health and care services including prevention.

Proposals are expected to involve the people/groups studied in the design and implementation of the research and innovation activities and where relevant service providers and other stakeholders.

This topic requires the effective contribution of social sciences and humanities (SSH) disciplines and the involvement of SSH experts, institutions as well as the inclusion of relevant SSH expertise, in order to produce meaningful and significant effects enhancing the societal impact of the related research activities.

All projects funded under this topic are strongly encouraged to participate in networking and joint activities, as appropriate. Therefore, proposals should include a budget for the attendance to regular joint meetings and may consider covering the costs of any other potential joint activities without the prerequisite to detail concrete joint activities at this stage. The details of these joint activities will be defined during the grant agreement preparation phase.

When relevant, funded actions should build on the work done by the European Joint Action on Health Equity Europe (JAHEE) and the upcoming activities under the EU4Health Programme (Direct grants to international organisations (WHO): supporting Member States in improving access to healthcare and effectiveness of health coverage, taking into account vulnerabilities of specific groups and targeted intervention and access to mental health for people in vulnerable situations).

Also, when relevant, projects should build on, and are encouraged to consider how their proposals can contribute to, the Commission's LGBTIQ Equality Strategy 2020-2025, the EU Strategy for the rights of persons living with disabilities, EU strategy on the rights of the child the Child Guarantee, the Gender Equality Strategy, the EU Roma Strategic Framework and the EU Strategy for the Rights of Persons with Disabilities 2021-2030²³².

²³² (under the European Pillar of Social Rights) Delivering on the European Pillar of Social Rights - Employment, Social Affairs & Inclusion - European Commission (europa.eu) Union of equality: Strategy for the rights of persons with disabilities 2021-2030 - Employment, Social Affairs & Inclusion - European Commission (europa.eu) <https://ec.europa.eu/social/BlobServlet?docId=23598&langId=en>

Projects are encouraged to coordinate their activities with the planned European Partnership on Transforming Health and Care Systems, the Cancer Mission, the Cancer Inequalities Registry and the EU Non-Communicable Diseases Initiative.

Projects may explore the Health Systems Performance Assessment (HSPA) Report on more effective ways of measuring access to healthcare, published in 2021. The report provides a collection of tools used on the ground to better understand needs of people in vulnerable situations and adapt the health coverage to ensure more effective care.

2021 Country Profiles published in the framework of the State of Health in the EU can be used as a source of basic comparable data on health inequalities.

Applicants invited to the second stage and envisaging to include clinical studies should provide details of their clinical studies in the dedicated annex using the template provided in the submission system. See definition of clinical studies in the introduction to this work programme part.