European Commission

# ESI Funds for Health

## Investing for a healthy and inclusive EU

Final Report

ESI Funds for health | Funded by the Health Programme of the European Union

milieu Law & Policy Consulting

Written by: Jennifer McGuinn, Mariya Gancheva, Rosa Castro, Matthew Jones, Sarah O'Brien and Agnieszka Markowska (Milieu Consulting) with inputs from Andrew Barnfield and Dorota Sienkiewicz (EuroHealthNet) for the themes "access to healthcare", "health system reform" and "healthy ageing and health promotion", and from Health ClusterNET for the theme "research and innovation in health". EuroHealthNet also contributed to drafting the sub-sections and conclusions and recommendations related to the impact of ESI Funds on health inequalities.

Health and Food Safety

**EUROPEAN COMMISSION**

Consumers, Health, Agriculture and Food Executive Agency
Health and Food Safety Unit

*Contact:* Anne-Marie Yazbeck
*E-mail:* anne-marie.yazbeck@ec.europa.eu

Directorate-General for Health and Food Safety,
Directorate B — Health systems, medical products and innovation

*E-mail:* SANTE-CONSULT-B1@ec.europa.eu

*European Commission*
*B-1049 Brussels*

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## Investing for a healthy and inclusive EU

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Directorate-General for Health and Food Safety
EU Health Programme (2014-2020)

2018

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This report was prepared as part of the EU-funded project: '*ESIF Support in the area of health: building knowledge and capacities for monitoring and implementation, supporting innovation and effectiveness*'. Study Contract No. 2015 73 01.

This report was produced under the EU's third Health Programme (2014-2020) in the framework of a service contract with the Consumers, Agriculture, Health and Food Executive Agency (Chafea) acting under the mandate from the European Commission. The content of this report represents the views of the contractor and is its sole responsibly; it can in no way be taken to reflect the views of the European Commission and/or Chafea or any other body of the European Union. The European Commission and/or Chafea do not guarantee the accuracy of the data included in this report, nor do they accept responsibility for any use made by third parties thereof.

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Luxembourg: Publications Office of the European Union, 2019

EN PDF PDF/Volume_01 EB-04-19-283-EN-N ISBN: 978-92-9478-096-6 Doi: 10.2818/42446



*Printed in Belgium*

PRINTED ON ELEMENTAL CHLORINE-FREE BLEACHED PAPER (ECF)

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# LIST OF ACRONYMS, ABBREVIATIONS AND COUNTRY CODES

| | |
|---|---|
| **AGS** | Annual Growth Survey |
| **AMR** | Antimicrobial resistance |
| **CSR** | Country-Specific Recommendation |
| **EIP** | European Innovation Partnership |
| **EPSR** | European Pillar of Social Rights |
| **ERDF** | European Regional Development Fund |
| **ESF** | European Social Fund |
| **ESF+** | European Social Fund Plus |
| **ESI Funds** | European Structural and Investment Funds |
| **ETC** | European Territorial Cooperation (also known as Interreg) |
| **H2020** | Horizon 2020 |
| **ICT** | Information and communication technology |
| **IT** | Information technology |
| **JAHWF** | Joint Action on Health Workforce Planning and Forecasting |
| **MA** | Managing Authority |
| **MFF** | Multiannual Financial Framework |
| **NGO** | Non-governmental organisation |
| **OP** | Operational Programme |
| **OSH** | Occupational safety and health |
| **R&I** | Research and innovation |
| **RIS3** | Research and Innovation Strategy for Smart Specialisation |
| **RSP** | Reform Support Programme |
| **S3** | Smart Specialisation Strategy |
| **SEPEN** | Support for the health workforce planning and forecasting expert network |
| **SMEs** | Small and medium-sized enterprises |
| **TRL** | Technology readiness level |
| **WHO** | World Health Organization |

**EU-28 country codes:**

| | | | |
|---|---|---|---|
| **AT** | Austria | **IE** | Ireland |
| **BE** | Belgium | **IT** | Italy |
| **BG** | Bulgaria | **LT** | Lithuania |
| **CY** | Cyprus | **LU** | Luxembourg |
| **CZ** | Czech Republic | **LV** | Latvia |
| **DE** | Germany | **MT** | Malta |
| **DK** | Denmark | **NL** | Netherlands |
| **EE** | Estonia | **PL** | Poland |
| **EL** | Greece | **PT** | Portugal |
| **ES** | Spain | **RO** | Romania |
| **FI** | Finland | **SE** | Sweden |
| **FR** | France | **SI** | Slovenia |
| **HR** | Croatia | **SK** | Slovakia |
| **HU** | Hungary | **UK** | United Kingdom |

## ABSTRACT

The ESI Funds for Health project mapped and assessed more than 7,000 health-related projects supported by the European Structural and Investment (ESI) Funds during the first four years of the 2014-2020 spending period. To date, projects have targeted key EU health policy objectives: access to healthcare; the reform of health systems; the uptake of e-health and digital solutions; research and innovation in health; health promotion and healthy ageing; and support for the health workforce. The project also contributed to building the capacities of relevant actors for the effective use of the funds during 6 thematic workshops across the EU and a final conference in Brussels. This final report contains a summary of the key outcomes emerging from this 2-year project. These messages are based on desk research and analysis on the use of ESI Funds to support health investments complemented with input received from stakeholders across EU Member States. Key findings about the use of ESI funds to support each of the six health-related themes are presented along a set of identified success factors and challenges, cross-thematic and country specific conclusions and recommendations, and recommendations looking ahead to the next programming period.

**Key words:** access to healthcare, Cohesion Policy, disease prevention, EEA grants, EIB, ESIF, ESF, European Semester, European Structural and Investment Funds, ERDF, EU Funds, e-health, healthy ageing, health inequalities, health promotion, health system reform, health workforce, Norway grants, research and innovation, synergies.

# EXECUTIVE SUMMARY

**More than 7,000 projects addressing health issues have been supported by the European Structural and Investment (ESI) Funds during the first four years of the 2014-2020 spending period.** To date, projects have targeted key EU health policy objectives: access to healthcare; the reform of health systems; the uptake of e-health and digital solutions; research and innovation in health; health promotion and healthy ageing; and support for the health workforce.

This report summarises the results of a two-year study into the extent and outcomes of health investments supported by the ESI Funds in the 2014-2020 period (particularly the European Social Fund (ESF) and the European Regional Development Fund (ERDF)). Using desk research, interviews and stakeholder workshops, the study highlights the successes and good practices observed, and also identifies challenges that remain and prospects for the future.

ESI Funds are currently being used to support a wide variety of interventions in different health-related themes and countries. Further opportunities exist to use the funds to address issues identified within the European Semester cycle, including health inequalities, and also to address priorities at the national, regional and local levels. Below are some of the key messages and conclusions emerging from the project about the use of ESI Funds within the current programming period:

- The ESI funds are supporting many opportunities to pilot, scale-up and support cross-country and cross-sectoral collaborations of promising interventions in different health areas;
- ESI Funds are also complementing national funds in a context of fiscal pressures on national budgets and within the increasing need for healthcare and rising health inequalities;
- The participation of the health and local communities is a key success factor of many ESI Funded projects. However, more could be done to facilitate a systematic and transparent system for involving stakeholders;
- Measuring the outcomes of projects is a key aspect for the effective use of ESI Funds. However, for many types of interventions this requires the development of good and specific indicators for ESI Funded projects. Good indicators can also potentially facilitate synergies between ESI Funds and other funding sources;
- It is essential that Member States ensure a coordinated and coherent approach to investment and not only a project-by-project approach. Investments that are linked to local needs, a strategic national health policy, broader national policy goals and EU-level policy and structural reform are likely to be successful. A broader planning strategy might encourage involvement from other sectors and Ministries and help build political support for reforms;
- A balance is needed between infrastructure or 'hard' investments and 'soft' investments such as direct service provision and staff training. This could be supported by coordinating investments from the ESF, often associated with soft investments, and the ERDF, associated with hard investments;
- Many projects need several conditions to succeed. For instance, many e-health and research and innovation projects need an innovation-friendly environment, a digitally-skilled workforce, and the necessary policies to balance the needs of health systems, health-technology developers, care providers and patients;
- More clarity around the different funds and what sorts of projects can be funded is needed. Funding Coordinators across the different streams could be appointed so that projects working in a similar field can connect with each other across Europe. Currently, information about ESI Funded projects is fragmented (only available in the national language and in separate websites for each Operational Programme);
- Most ESI Funded projects have built upon established inter-sectoral cooperation and competences. The involvement of networks of relevant stakeholders in the project planning is essential to building a successful project;

- There is an urgent need for more international or cross-border cooperation to enhance synergies and overcome 'silo' thinking. This requires bringing together a whole range of different stakeholders to share experiences, build capacity, and support public institutions in carrying out the work;
- More links to other EU and national programmes (e.g. EU Joint Actions programmes) could foster further synergies with ESI Funds.

Looking ahead to the next MFF, the following challenges and opportunities were identified through the mapping, assessment and discussion with stakeholders about the use of ESI Funds for health.

**Cross-sectoral cooperation is key to developing integrated solutions that tackle the challenges faced by the health sector**

Health is by nature a cross-sectoral policy area, with important links to social services, employment, education, research and other policy sectors, as well as local and regional levels. The investment priorities and programmes supported by the ESI Funds are typically organised by sector, which can lead to a 'silo' mentality whereby funds and activities are dedicated to a single sector or dominated by an individual institution (e.g. Labour Ministry, social service provider). Bridging the gap that separates health from non-health sectors is important for meaningful health outcomes from the ESI Funds. For example, efforts to decrease health-related harm from alcohol consumption can be combined with increasing levels of active employment. However, it can be a challenge to communicate health policy goals, needs and benefits in terms that can be understood by other Ministries and actors outside of the health sector.

Good practice projects have demonstrated that cutting across sectoral boundaries typically involves networks that are often developed at local and regional level where institutions are closer-knit and fewer in number. Looking ahead, the new Cohesion Policy for 2021-2027 will focus its resources on five policy objectives (compared to 11 Thematic Objectives in the 2014 – 2020 period). This, together with the inclusion of the EU Health Programme within an expanded ESF+ programme targeting implementation of the European Pillar of Social Rights (EPSR), should foster increased cross-sectoral collaboration at the strategic level. Ideally, this will be accompanied by smoother cooperation between the ESF+ and other funds such as the ERDF/Cohesion Fund, Horizon Europe and InvestEU.

**Strong institutions must have the capacity to implement health reform, with accompanying clear programming objectives and successful projects**

Institutional capacity is a critical pre-condition for successful ESI-funded projects and overall health outcomes. Many Member States are implementing critical reforms in the health sector, e.g. shifting from institutionalised to community-based healthcare, improving cost-effectiveness, or tackling inequalities. These actions are in line with strategic EU health policy objectives as well as the European Semester cycle of broader structural reform. Ideally, ESI-funded projects should contribute to these reforms, making it crucial for strong institutions across different key sectors to work together to create a climate of reform that can underpin the development of ESI Funds Operational Programmes (OPs) and projects.

Strategic tasks relating to policy reform are not always conducive to project-based funding. For example, health workforce planning requires capacity to collect and analyse data on health workers, but this is the long-term work of public institutions and thus presents challenges for project development. Limitations in policy reform activities can weaken implementation efforts, such as projects supporting the education, training and placement of healthcare workers without sufficient understanding or planning for future demands.

Proposals for the next Multiannual Financial Framework (MFF) 2021-2027 include stronger links between ESI Funds and the European Semester, together with a dedicated

tool aimed at capacity-building for structural reform. The proposed Reform Support Programme (RSP) will work to create incentives and develop capacity for priority reforms. This is important in view of the fact that many of the gaps identified through the ESI Funds for Health project are linked to structural reform issues that are difficult to address through project-based funding. Stronger capacity and technical expertise to implement and design reforms can complement the capacity to develop high-quality programmes and projects. Skills such as communicating health priorities to other policy areas, developing programme objectives and indicators, and project development and management are also important for health stakeholders and should be specifically addressed in future EU funding programmes.

**Investment in people (services, networks, learning, awareness) is crucial for the health sector and must not be overlooked in favour of high-profile infrastructure projects**

Health policy advocates a shift away from hospital- and institution-based care, which should, in theory, reduce the need for infrastructure investment. There is a similar shift in ESI Funds for 2014-2020 away from capital expenditure for infrastructure towards the social aspects of health services. The ESI Funds for Health project identified many projects tackling human resources, links between health and social services, awareness, training and other 'softer' types of investment that support integrated care approaches. Nevertheless, stakeholders noted that Member State authorities charged with programming and project approval continue to express a preference for capital expenditure projects, due to their higher political profile. While large infrastructure investment remains necessary to address regional development needs, population changes and ageing infrastructure, it is important that it does not crowd out 'soft' investment, such as staff training, community-based services or health promotion and disease prevention. A focus on infrastructure investment also risks undermining the transition from institution-based to community-based care.

The ESI Funds should lead the way in prioritising investment in such 'soft' solutions. These projects clearly demonstrate links to specific objectives in relevant strategic health policy documents and their championing by ESI Funds will help to convince national central agencies (i.e. Finance Ministries) of their merits. In addition, the ability to blend or combine finance from across the different funding streams is important for project success, as it helps to achieve a balance between infrastructure and soft investment.

**Health stakeholders need more coordination across the EU to fully understand existing projects and initiatives and identify opportunities for funding and collaboration. The European Commission has a role in fostering this**

The events organised by the ESI Funds for Health project were well-received by participants as a chance for peer-to-peer networking. In their workshop evaluations, participants most often noted their appreciation for the opportunity to learn and be inspired by projects and people addressing similar challenges across the EU. They also stated their interest in similar sharing events in the future.

There is also an opportunity for better dissemination of EU-level initiatives among stakeholders in the Member States, particularly those funded by the EU Health programme. The ESI Funds for Health events identified new possibilities for synergies between individual ESI-funded projects and other initiatives. For example, Ministries of Health managing projects targeting the supply and distribution of healthcare workers learned about the Joint Action on Health Workforce Planning and Forecasting (JAHWF) and the option to receive a toolkit, training and technical assistance through a follow-on network (SEPEN). Stakeholders' positive experiences of the ESI Funds for Health project indicates that further networking dedicated to health could help to overcome many of the existing challenges, as well as building confidence and capacity among the

authorities and institutions responsible for driving reform and maximising the health outcomes of these funds.

This report is structured as follows. The first part introduces the methodological approach. The next six chapters provide an overview of the state of the art in terms of the use of ESI Funds to support each health-related theme in the current programming period. An additional chapter provides country specific analysis about the use of ESI Funds to support health investments during the current programming period. The chapter on conclusions and recommendations elaborate on key success factors for ESI-funded projects, challenges ahead for the use of ESI Funds to support health-related investments and cross-thematic conclusions and recommendations. A final chapter provides recommendations looking ahead to the next MFF.

**The ESI Funds for Health project**

The ESI Funds for Health project (2016-2018) was supported by the Health Programme of the European Union and implemented by a consortium of experts led by Milieu Ltd.

Through wide-reaching desk research, consultation and a series of workshops, the ESI Funds for Health project:

- **Mapped and classified over 7,000 health-related projects** co-financed by the ESI Funds in all Member States;
- Set out the concrete **contributions made by these investments to health policy goals** through the assessment of a range of exemplary projects;
- Provided hundreds of programme managers, project beneficiaries, experts and other stakeholders with **the opportunity to contribute and learn from the project findings, as well as to further their networks** through a series of workshops;
- Developed a set of **findings and recommendations** that can help health stakeholders and the wider policy community to maximise the results from ESI Funds in both the current and future programming periods.

The dedicated project website (www.esifundsforhealth.eu) provides further information on the research carried out. It includes reports by country and health theme, as well as a database of 60 exemplary projects. More details and links to each of the deliverables of this project are included in Annex I of this report

# SOMMAIRE EXÉCUTIF

**Durant la période 2014-2020, les Fonds structurels et d'investissement européens (les « Fonds ESI ») a soutenu plus de 7,000 projets qui ont un rapport avec la santé.** Jusqu'à présent, ces projets ont ciblé les objectifs clés des politiques de santé européens : l'accès aux soins de santé, la réforme des systèmes de santé, la croissance du « eHealth » et la santé numérique, la recherche et l'innovation dans le domaine de la santé, la promotion de la bonne santé et le vieillissement en bonne santé, et le soutien aux travailleurs dans le domaine de la santé.

Ce rapport compile les informations ramassées de cette étude repartie sur deux ans sur la mesure et les résultats finaux des investissements financiers dans la santé des Fonds ESI durant la période 2014-2020 (en particulier les Fonds sociaux européens (FSE) et le Fonds européen de développement régional (FEDER)). Via la recherche, des entretiens, et des ateliers visés aux acteurs, cette étude souligne les succès et les bonnes pratiques observés, et elle identifie également les défis restants et les possibilités à l'horizon.

Les Fonds ESI sont actuellement utilisés pour soutenir un large éventail d'interventions dans différents thèmes et pays liés à la santé. Il existe d'autres possibilités d'utiliser les fonds pour traiter les problèmes identifiés dans le cycle du semestre européen, y compris les inégalités en matière de santé, ainsi que pour traiter les priorités aux niveaux national, régional et local. Ci-dessous se trouvent quelques messages et conclusions importants qui sont ont apparus au cours de ce projet par rapport à l'usage des Fonds ESI durant la période de programmation actuelle.

- Les fonds ESI offrent de nombreuses possibilités de mener des activités pilotes, d'intensifier et de soutenir des collaborations transnationales et intersectorielles d'interventions prometteuses dans différents domaines de la santé ;
- Les Fonds ESI complètent également les fonds nationaux dans un contexte de pressions budgétaires sur les budgets nationaux et de besoins croissants en soins de santé et d'inégalités croissantes en matière de santé ;
- La participation des communautés de la santé et locales est un facteur clé de la réussite de nombreux projets financés par ESI. Cependant, davantage pourrait être fait pour faciliter un système systématique et transparent pour impliquer les parties prenantes.
- Mesurer les résultats des projets est un aspect essentiel pour une utilisation efficace des fonds ESI. Cependant, pour de nombreux types d'interventions, cela nécessite l'élaboration d'indicateurs fiables et spécifiques pour les projets financés par ESI. De bons indicateurs peuvent également potentiellement faciliter les synergies entre les Fonds ESI et d'autres sources de financement ;
- Il est essentiel que les États membres garantissent une approche coordonnée et cohérente de l'investissement et pas seulement une approche projet par projet. Les investissements liés aux besoins locaux, à une politique de santé nationale stratégique, à des objectifs de politique nationale plus vastes, à une politique et à une réforme structurelle au niveau de l'UE ont de bonnes chances de réussir. Une stratégie de planification plus large pourrait encourager la participation d'autres secteurs et ministères et aider à renforcer le soutien politique en faveur des réformes ;
- Un équilibre doit être trouvé entre l'infrastructure ou les investissements « durs » et les investissements « légers » tels que la fourniture directe de services et la formation du personnel. Cela pourrait être soutenu par la coordination des investissements du FSE, souvent associés à des investissements non-contractuels, et du FEDER, associés à des investissements plus importants ;
- De nombreux projets nécessitent un certain nombre de conditions pour réussir. Par exemple, de nombreux projets liés à la cyber-santé et à la recherche et l'innovation ont besoin d'un environnement propice à l'innovation, d'une main-d'œuvre qualifiée en numérique et des politiques nécessaires pour équilibrer les besoins des systèmes de

santé, des développeurs de technologies de la santé, des prestataires de soins et des patients ;
- Il est nécessaire de clarifier les différents fonds et le type de projets pouvant être financés. Des coordinateurs de financement des différents volets pourraient être nommés afin que les projets travaillant dans un domaine similaire puissent être connectés les uns aux autres à travers l'Europe. Actuellement, les informations sur les projets financés par ESI sont fragmentées (uniquement disponibles dans la langue nationale et sur des sites Web distincts pour chaque programme opérationnel) ;
- La plupart des projets financés par ESI ont mis à profit la coopération et les compétences intersectorielles établies. L'implication de réseaux d'acteurs concernés dans la planification du projet est essentielle pour la réussite du projet ;
- Il est urgent d'intensifier la coopération internationale ou transfrontalière afin de renforcer les synergies et de dépasser la pensée de « silo ». Cela nécessite de réunir tout un éventail de parties prenantes pour partager des expériences, renforcer les capacités et aider les institutions publiques à mener à bien les travaux ;
- Davantage de liens vers d'autres programmes européens et nationaux (par exemple, des programmes d'actions communes de l'UE) pourraient favoriser encore plus de synergies avec les Fonds ESI.

En vue du prochain Cadre financier pluriannuel (CFP), les défis et opportunités suivants ont été identifiés via l'identification, l'évaluation et la discussion avec les acteurs concernés de l'utilisation des Fonds ESI pour la santé.

**La coopération multisectorielle est nécessaire afin de développer des solutions intégrées aux défis posés par le secteur de la santé**

Le domaine de la santé est un thème multisectoriel d'office, comprenant des liens avec les services sociaux, l'emploi, la formation, la recherche, et d'autres secteurs politiques, ainsi que des autorités locales et régionales. Les priorités d'investissement et les programmes soutenus par les Fonds ESI sont souvent organisés par leur secteur, qui crée une mentalité « d'isolement » où ces fonds et les activités qui y sont liées sont dédiés à un seul secteur, ou sont dominés par un seul acteur (p. ex. Ministre de l'Emploi, service social). L'acte de fermer le clivage entre les secteurs liés à la santé et non est nécessaire afin d'obtenir des résultats significatifs des Fonds ESI. Par exemple, les efforts faits afin de diminuer les problèmes de santé causés par la consommation d'alcool peuvent être combinés avec d'autres envers l'emploi actif. Cependant, des problèmes existent toujours par rapport à la communication des objectifs politiques aux Ministères et acteurs également concernés hors le secteur de la santé.

Plusieurs projets antérieurs nous ont montré que l'acte de passer entre les frontières sectorielles implique l'usage des réseaux souvent crées aux niveaux local et régional où existent moins d'institutions et une coopération meilleure entre les institutions existantes. Dans le futur proche, la nouvelle Politique de cohésion pour la période 2021-2027 se focalisera sur cinq objectifs politiques (comparé aux 11 Objectifs Thématiques de la période 2014-2020). Ces objectifs politiques, combinés avec le programme UE Santé dans le cadre du programme élargi ESF+ qui cible l'implémentation du Socle européen des droits sociaux, devrait encourager la collaboration multisectorielle au niveau stratégique. Idéalement, ceci devrait également être accompagné par une coopération améliorée entre le programme ESF+ et d'autres fonds, tels que le Fonds européen de développement régional (FEDER)/Fonds de cohésion, Horizon Europe, et InvestEU.

**Les institutions devraient avoir la capacité d'introduire des réformes dans le domaine de la santé, comprenant des objectifs clairs et des projets ayant succès**

Le fait d'avoir des capacités institutionnelles est un prérequis indispensable pour non seulement les projets soutenus par le Fonds ESI, mais aussi les résultats en matière de santé pour ces projets. Plusieurs États Membres introduisent des réformes importantes

dans le secteur de la santé, e.g. la transition des soins médicaux des institutions envers les organisations communautaires, l'amélioration de la rentabilité, ou encore la réduction des inégalités dans le secteur. Ces efforts conforment aux objectifs politiques européens de la santé, ainsi que le cycle « Semestre Européen » qui compris des réformes plus larges. Tout projet soutenu par les Fonds ESI devrait contribuer, idéalement, à ces réformes, à l'effet que toute institution à travers les secteurs clés collabore afin de créer un esprit de réforme qui soutiendra à son tour le développement des Programmes opérationnels des Fonds ESI (les « PO ») et des projets.

Les tâches stratégiques liées à la réforme des politiques ne sont pas toujours propices au financement par projet. Par exemple, la planification des effectifs de la santé exige la capacité de recueillir et d'analyser des données sur les travailleurs de la santé, mais il s'agit là du travail à long terme des institutions publiques et cela présente donc des défis pour le développement de projets. Les limites des activités de réforme des politiques peuvent affaiblir les efforts de mise en œuvre, tels que les projets soutenant l'éducation, la formation et le placement des travailleurs de la santé sans une compréhension ou une planification suffisante pour les demandes futures.

Les propositions pour le prochain cadre financier pluriannuel (CFP) 2021-2027 comprennent le renforcement des liens entre les fonds ESI et le semestre européen, ainsi qu'un outil spécifique visant à renforcer les capacités en matière de réformes structurelles. Le programme d'appui aux réformes (PSR) proposé visera à créer des incitations et à développer les capacités nécessaires aux réformes prioritaires. Cela est important étant donné que de nombreuses lacunes identifiées dans le cadre du projet ESI Funds for Health sont liées à des problèmes de réforme structurelle qui sont difficiles à résoudre grâce à un financement par projet. Le renforcement des capacités et de l'expertise technique pour mettre en œuvre et concevoir des réformes peut compléter la capacité d'élaborer des programmes et des projets de qualité. Des compétences telles que la communication des priorités en matière de santé à d'autres domaines politiques, l'élaboration d'objectifs et d'indicateurs de programme, ainsi que l'élaboration et la gestion de projets sont également importantes pour les acteurs de la santé et devraient être spécifiquement abordées dans les futurs programmes de financement communautaires.

**L'investissement dans les ressources humaines (services, réseaux, apprentissage, sensibilisation) est crucial pour le secteur de la santé et ne doit pas être négligé au profit de projets d'infrastructure de haut niveau**

La politique de santé encourage un abandon des soins dispensés dans les hôpitaux et les institutions, ce qui devrait, en théorie, réduire la nécessité d'investir dans l'infrastructure. On observe une évolution similaire dans les Fonds ESI pour 2014-2020 : les dépenses d'investissement dans les infrastructures sont désormais consacrées aux aspects sociaux des services de santé. Le projet ESI Funds for Health a identifié de nombreux projets portant sur les ressources humaines, les liens entre la santé et les services sociaux, la sensibilisation, la formation et d'autres types d'investissements « plus souples » qui soutiennent les approches de soins intégrés. Néanmoins, les parties prenantes ont noté que les autorités des États Membres chargées de la programmation et de l'approbation des projets continuent d'exprimer une préférence pour les projets d'investissement, en raison de leur plus grande visibilité politique. Bien que d'importants investissements dans l'infrastructure demeurent nécessaires pour répondre aux besoins de développement régional, à l'évolution démographique et au vieillissement de l'infrastructure, il est important qu'ils n'évincent pas les investissements « souples », tels que la formation du personnel, les services communautaires ou la promotion de la santé et la prévention des maladies. L'accent mis sur l'investissement dans l'infrastructure risque également de miner la transition des soins en établissement vers les soins communautaires.

Les Fonds ESI devraient montrer la voie en donnant la priorité à l'investissement dans ces solutions « douces ». Ces projets démontrent clairement les liens avec des objectifs spécifiques dans les documents de politique stratégique de santé pertinents et leur promotion par ESI Funds aidera à convaincre les agences centrales nationales (c'est-à-dire les ministères des finances) de leurs mérites. En outre, la capacité de combiner ou de combiner les financements provenant des différentes sources de financement est importante pour la réussite des projets, car elle permet d'atteindre un équilibre entre l'infrastructure et les investissements non contraignants.

**Les acteurs du secteur de la santé ont besoin d'une plus grande coordination à travers l'UE pour bien comprendre les projets et initiatives existants et identifier les possibilités de financement et de collaboration. La Commission européenne a un rôle à jouer dans ce domaine.**

Les événements organisés par le projet ESI Funds for Health ont été bien accueillis par les participants comme une occasion de réseautage entre pairs. Dans leurs évaluations des ateliers, les participants ont le plus souvent indiqué qu'ils appréciaient l'opportunité d'apprendre et d'être inspirés par des projets et des personnes affrontant des défis similaires dans l'UE. Ils ont également fait part de leur intérêt pour des événements de partage similaires à l'avenir.

Il est également possible de mieux diffuser les initiatives prises au niveau de l'UE auprès des parties prenantes dans les États membres, en particulier celles financées par le programme communautaire dans le domaine de la santé. Les événements ESI Funds for Health ont identifié de nouvelles possibilités de synergies entre les différents projets financés par ESI et d'autres initiatives. Par exemple, les ministères de la Santé qui gèrent des projets ciblant l'offre et la distribution de travailleurs de la santé ont pris connaissance de l'Action conjointe sur la planification et la prévision des effectifs de santé (JAHWF) et de la possibilité de recevoir une trousse à outils, une formation et une assistance technique par le biais d'un réseau ultérieur (SEPEN). Les expériences positives des parties prenantes concernant le projet ESI Funds for Health montrent qu'une mise en réseau plus poussée consacrée à la santé pourrait aider à surmonter nombre des défis existants et à renforcer la confiance et les capacités des autorités et des institutions chargées de conduire la réforme et de maximiser les résultats sanitaires de ces fonds.

Le présent rapport est structuré comme suit. La première partie présente l'approche méthodologique. Les six chapitres suivants donnent un aperçu de l'état actuel de l'utilisation des Fonds ESI pour soutenir chaque thème lié à la santé au cours de la période de programmation actuelle. Un chapitre supplémentaire fournit une analyse spécifique par pays concernant l'utilisation des fonds ESI pour soutenir les investissements dans la santé au cours de la période de programmation actuelle. Le chapitre sur les conclusions et les recommandations portent sur les principaux facteurs de réussite des projets financés par l'ESI, les défis à relever pour l'utilisation des Fonds ESI afin de soutenir les investissements liés à la santé et les conclusions et recommandations multithématiques. Un dernier chapitre propose des recommandations finales pour le prochain CFP à venir.

## Le projet « ESI Funds for Health »

Le projet « ESI Funds for Health » (2016-2018) a été soutenu par le Programme Santé de l'Union européenne et mis en œuvre par un consortium d'experts dirigé par Milieu Ltd.

Le projet « ESI Funds for Health » est le fruit d'une vaste recherche documentaire, de consultations et d'une série d'ateliers :

- Cartographie et classement de plus de 7 000 projets liés à la santé cofinancés par les fonds ESI dans tous les États membres ;
- Présenter les contributions concrètes apportées par ces investissements aux objectifs de la politique de santé à travers l'évaluation d'une série de projets exemplaires ;
- Des centaines de directeurs de programmes, de bénéficiaires de projets, d'experts et d'autres parties prenantes ont eu l'occasion de contribuer aux conclusions du projet et d'en tirer des enseignements, ainsi que de développer leurs réseaux grâce à une série d'ateliers ;
- Élaboration d'un ensemble de conclusions et de recommandations susceptibles d'aider les acteurs de la santé et la communauté politique au sens large à maximiser les résultats des fonds ESI au cours de la période de programmation actuelle et future.

Le site web dédié au projet (www.esifundsforhealth.eu) fournit de plus amples informations sur les recherches effectuées. Il comprend des rapports par pays et par thème de santé, ainsi qu'une base de données de 60 projets exemplaires. De plus amples détails et des liens vers chacun des produits livrables de ce projet figurent à l'annexe I du présent rapport.

# INTRODUCTION

## Health as an investment priority

The European Structural and Investment (ESI) Funds have a broad mandate to invest in job creation and a sustainable European economy and environment. The total budget for regional and cohesion policy is almost EUR 352 billion[1]. Health has long been recognised as a vital sector for the well-being of EU populations[2], with health investments supported through numerous thematic funding objectives and types of funding programmes across the Member States.

By supporting health objectives, the ESI Funds contribute to the wider goals of the Europe 2020 strategy. Health is thus seen as valuable in itself, as well as being a 'growth-friendly' investment. The 2013 European Commission document 'Investing in health' recommends:

- Spending smarter (but not necessarily more) in sustainable health systems;
- Investing in people's health, particularly through health promotion programmes, thus viewing health as a human capital;
- Investing in health coverage as a means of reducing inequality and tackling social exclusion.

This extensive approach to investing in health as a key determinant of overall socio-economic well-being represents a move away from the tendency to focus on investments in health infrastructure, particularly hospital-based care. This shift has been documented in the research on the programming and spending since the early 2000s.

Another important element driving reform in the health sector and guiding the programming and spending of ESI Funds is the European Semester[3] process, the EU's cycle of economic policy guidance and surveillance. This process has seen the health sector gain prominence at EU level in recent years, given its important impacts on public spending and social protection.

Health is clearly a priority for ESI Funds spending. As a policy sector, however, it cuts across many different policy areas, with no single Thematic Objective devoted exclusively to health in the Regulations governing the use of the funds. Health is therefore integrated into many areas of spending, placing health-related investments under numerous investment programmes, priorities and objectives, managed and implemented by a diverse range of authorities and stakeholders. While the cross-cutting nature of health warrants a multi-sectoral approach, it nevertheless complicates efforts to obtain a full picture of precisely how and to what extent the ESI Funds support health in terms of number and type of investments and their contribution to relevant policy objectives. In 2016, the ESI Funds for Health project set out to do this, with the support of the European Commission.

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[1] This represents three of the five ESI Funds: ERDF, CF and ESF. The figure does not include funds for rural development and fisheries policies. Source: European Commission, European Structural and Investment Funds Data website, http://ec.europa.eu/regional_policy/en/funding/available-budget/.

[2] For a brief overview, see European Commission, Investments in Health: Policy Guide for the European Structural and Investment Funds (ESIF) 2014-2020, March 2014.

[3] The European Semester is the EU annual cycle of economic policy coordination. Each year, the Commission undertakes a detailed analysis of each country's plans for budget, macroeconomic and structural reforms. It then provides EU governments with country-specific recommendations for the next 12-18 months. https://ec.europa.eu/info/business-economy-euro/economic-and-fiscal-policy-coordination/eu-economic-governance-monitoring-prevention-correction/european-semester_en.

**More than 7,000 projects target a range of health policy areas**

This report sums up the results of a two-year research study into the extent and outcomes of health investments supported by the ESI Funds in the 2014-2020 period, particularly the European Regional Development Fund (ERDF) and the European Social Fund (ESF). Through wide-reaching desk study, consultation and a series of workshops, the ESI Funds for Health project has:

- **Mapped and classified over 7,000 health-related projects** co-financed by the ESI Funds in all Member States;
- Set out the concrete **contributions made by these investments towards health policy goals** through the assessment of a range of exemplary projects;
- Provided hundreds of programme managers, project beneficiaries, experts and other stakeholders with **the opportunity to contribute and learn from the project findings as well as further their networks** through a series of workshops;
- Developed a set of **findings and recommendations** that can help health stakeholders and the wider policy community to maximise the results from ESI Funds in both the current and future programming periods.

The data collection found over 7,000 health-related projects across the EU[4]. Six health policy areas or 'themes' were used to enable a more precise understanding of the extent to which ESI-funded investments support different aspects of health policy:

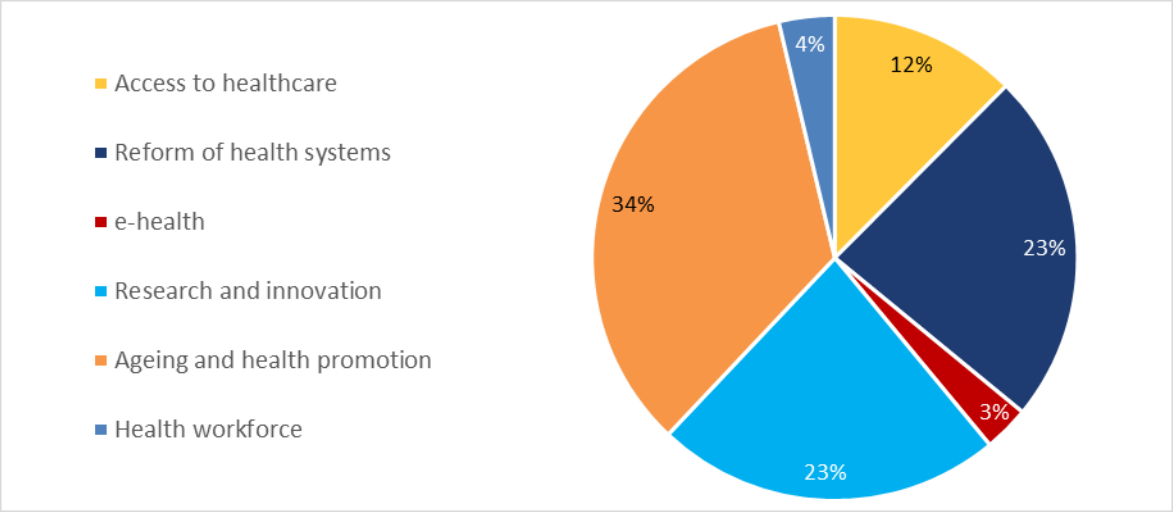
1. Improving **access to healthcare**;
2. **Reform of health systems**;
3. Uptake of **e-health** and digital solutions;
4. **Research and innovation** in health;
5. **Ageing and health promotion**, including disease prevention, the promotion of active and healthy ageing and a healthy workforce;
6. **Health workforce**.

**Figure 1: Overview of the six themes used to classify ESI-funded health investments**


The research identified and mapped a total of 7,404 projects according to the above themes. The greatest number of projects support health promotion, reform of health systems, and research and innovation (R&I). The following figures provide an overview.

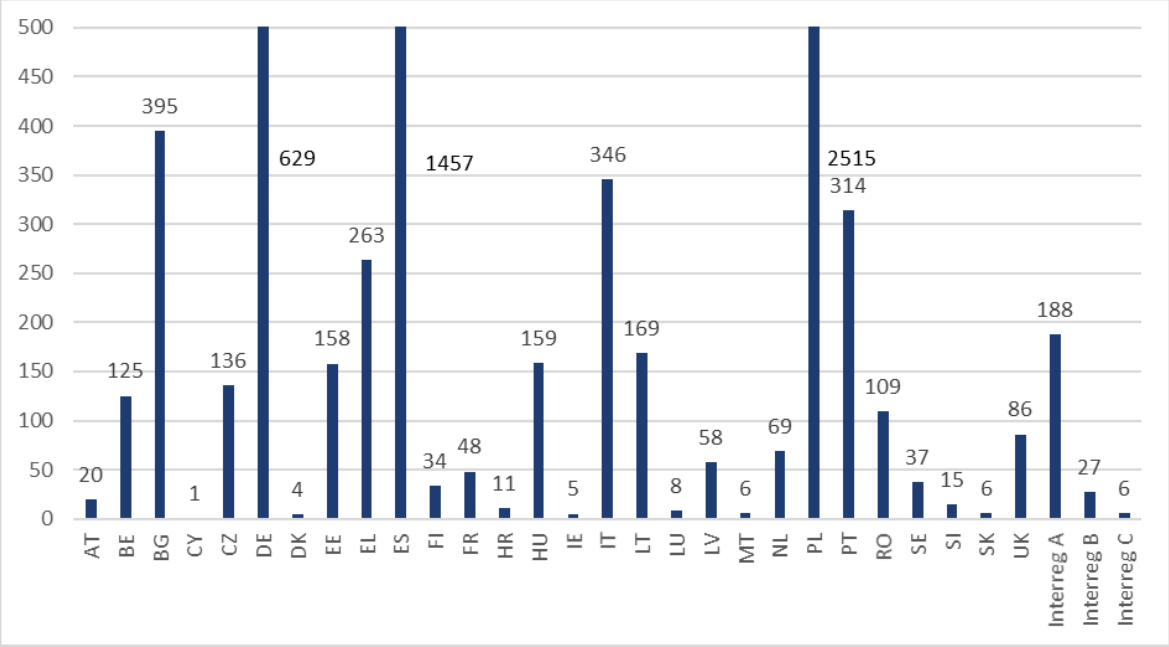
[4] Projects that had been approved for funding from the 2014-2020 programmes as of August 2017.

**Figure 2: Distribution of the number of ESI-funded health projects across the six themes**




The largest numbers of health-related projects are found in Poland, Spain, Germany, Bulgaria and Italy.

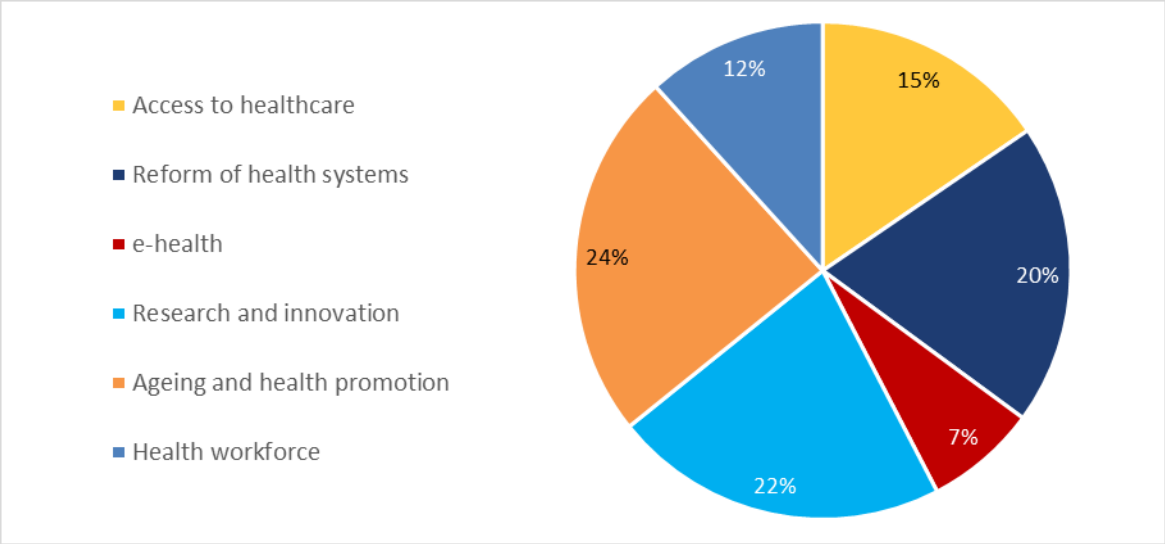
**Figure 3: Number of ESI-funded health investments in the Member States and European Territorial Cooperation (Interreg)**




Over EUR 8 billion are spent on the health projects identified[5]. This implies an average project budget of approximately EUR 1.2 million. For over half of the projects (57%) the main funding source is the ESF. Most of the ESI funding is invested in the same health themes as the largest number of projects. The following figure provides an overview.

[5] These estimations are based on the available budget information, for 7,114 (96%) of the 7,404 health projects, and include ESI funding and any national co-financing.

**Figure 4: Distribution of the budget (EU and national co-financing) of ESI-funded health projects across the six themes**




Note: Budget information was available for 7,114 of the health projects.

### The ESI Funds for Health report

This report presents the results of the identification and mapping work in a concise, accessible format, with a focus on findings and recommendations. It demonstrates the important added value of health investments to economic, social and environmental EU policy objectives by highlighting real outcomes and assessing success factors. It serves as inspiration for the ongoing Operational Programmes (OPs) of the ESI Funds to maximise health investment and provides insight into ways to strengthen health in the next Multiannual Financial Framework (MFF). More detailed results can be found per health theme, country and project on the ESI Funds for Health project website (see the box below for details).

The report is structured as follows:

- A first section outlining the methodological approach used by the project;
- A chapter for each of the six thematic areas;
- A chapter providing country specific analysis about the use of ESI Funds to support health investments during the current programming period;
- Chapter 7: Country specific analysis

This section presents an overview of the main findings regarding the use of ESI Funds to support health and the main areas worthy of potential development per Member State. This overview aims to provide some conclusions regarding potential future investments in health, based on the analysis of the ESI Funded projects mapped per theme and also on potential complementarities and synergies with other funding sources and with other related programmes at the EU, National and regional levels, when such information was available.

However, there are some limitations to the elaboration of conclusions and recommendations about the use of ESI Funds to support health investments at the level of Member States. This section provides an overview of health-related projects that have been financed by each Member State during the current period and compares this with the health policy priorities of Member States as identified in the European Semester (CSRs 2015-2018 and country reports). However, the data about ESI Funded projects was gathered midway through the current programming period. Thus, we have identified the areas for which some Member States had not (yet) used ESI funds to address health priorities identified during the European Semester process. Yet, the reason for this could

be that such information was not available at the time of data collection for this project. In addition to this, while we have included a brief reference to whether a small or large amount of ESI Funds has been allocated by countries, such indication is also subject to the same caveat; it is based on the projects that were published at the time of the data collection for this project. Furthermore, at least 4% of the identified projects did not include information about their budgets.

The following table presents an overview of our findings at the level of Member States, which contains the following information:

- A summary of the health priorities at the national and EU level, as presented in the European Semester documents (mainly the country reports and Country Specific Recommendations, if any) per theme (theme 1: access to healthcare, theme 2: reform of health systems, theme 3: e-health, theme 5: health promotion, disease prevention, healthy ageing, theme 6: health workforce).
- A brief overview of whether there are relevant examples of ESI Funded projects identified during this study which tackle some of the CSRs or some of the issues identified throughout the country reports per each country.
- Relevant examples of projects funded by other funding sources that also address issues identified in the CSRs or country reports.
- An approximate indication of the overall amount of ESI Funds spending in health, based on data collected for this study (countries where such total is above EUR 100 million were marked as 'high' and those where the total was below EUR 100 million were marked as 'low'.

**Table 1:** Use of ESI Funds and other external funding sources to address health priorities per country

| Member State | Themes in CSRs | Themes supported by ESI Funds | Relevant ESI funded projects | Other external funding | Amount of ESI Funds invested in health (2014-2020)<br>High (over EUR 100 million); Low (under EUR 100 million) |
|---|---|---|---|---|---|
| **AT** | 2 | None | Projects related to occupational and social integration of people with disabilities, illnesses or impairments. | Vienna Hospitals PPP Programme to construct and refurbish outdated facilities. | Low |
| **BE** | | | The Proximity Labs project aims to improve the care of patients with chronic diseases, which involves the use of new technologies for diagnosis. Several projects tackle the care needs of elderly people and people living with disabilities and other vulnerable groups. | N/A | High |
| **BG** | 1, 2, 5, 6 | 2, 5, 6 | No projects found to address access to healthcare. Several projects address healthcare services, including integrated care, the modernisation of health infrastructure, and the training of the health workforce. A large project is supporting the development of a national e-health system as part of the National Health Strategy. | Several projects (EEA grants and Norway grants) address health inequalities, the needs of vulnerable groups and foster improvements in access to healthcare. Other projects support people living with disabilities and also the creation of electronic records for vaccines. | High |
| **CY** | 1, 2 | None | No health-related projects were identified in Cyprus. | Some EEA grants are supporting health interventions at a detention centre, a day care centre for children with disabilities, and a health promotion project addressing inequalities. | Low |
| **CZ** | 2 | 2 | The Mental Health project is supporting the Psychiatric Care reform with the aim of increasing high quality services and emphasizing community rather than institutional care. Other projects are supporting the implementation of the national strategy "Health 2020", and the modernisation of health infrastructure. | Other projects funded with Norway grants and EEA grants are addressing the reform of the psychiatric system, community care services, health promotion, and the health workforce. | High |
| **DK** | | | Large research projects such as the Copenhagen Health Innovation, are developing innovative healthcare solutions with the help of ESI Funds. | N/A | Low |
| **DE** | | | Several projects of different sizes are addressing e-health. | Some projects related to research and innovation are being financed by EEA and Norway grants. | Low |
| **EE** | | | Several projects are supporting the establishment of primary health centres and healthcare infrastructure in general. | Norway grants are also supporting projects related to primary care and health infrastructure. | High |
| **EL** | | | Large projects are supporting the establishment of primary healthcare units (TOMY), enhancing access through social pharmacies and other interventions on the healthcare system, including those placing emphasis on community care. | EEA grants are supporting healthcare interventions to enhanced prevention and treatment services, address the needs of vulnerable populations, and develop or improve health infrastructure. | High |

| | | | | | |
|---|---|---|---|---|---|
| **ES** | 2 | 2 | Numerous projects with different budget are building and modernising health infrastructure and supporting access to healthcare. | Only a few short projects funded by EEA grants are supporting these needs. | High |
| **FI** | 1, 2 | 1, 2 | Several projects are addressing access to healthcare and the reform of health systems in Finland. For instance, the PoPSTer project is supporting a large reform to the social and health services of the Norther Ostrobotnia region. Other projects are supporting access to healthcare including for vulnerable groups (immigrants, people with disabilities). | N/A | Low |
| **FR** | 2 | 2 | A few projects are supporting the modernisation of health infrastructure. | A few large EIB projects are supporting research into innovative healthcare solutions. | Low |
| **HR** | 2 | None | A large national project is addressing health risk factors. Other projects such as the development of e-services (including e-health) are also implementing nation-wide interventions. No projects were found to support the CSR on health systems. | Projects from EEA grants are addressing access to healthcare and health promotion and disease prevention, but no project was identified to directly tackle the reform or modernisation of the healthcare system. | High |
| **HU** | | | Several projects are using ESI Funds to invest in health infrastructure, increase access to healthcare. A few large projects focus on health promotion and also a large national project is setting up the national e-health platform with ESI Funds. | EEA grants are supporting healthcare interventions to enhance prevention and treatment services and develop or improve health infrastructure. | High |
| **IE** | 1,2 | None | Projects are mostly supporting health promotion and disease prevention interventions | A large EIB project is supporting the development of primary health care centres. | Low |
| **IT** | 2 | 2 | Many ESI Funded projects were identified in Italy, including some that support access to healthcare, the reform of health systems and e-health services. | N/A | High |
| **LV** | 1, 2 | 2 | Several large projects are supporting the reform of health systems, health promotion and disease prevention, and the health workforce nationally and at the level of municipalities. However, no project was found to directly support access to healthcare. | Other projects funded with EEA grants are supporting access to healthcare, the reform of health systems, health promotion interventions and the health workforce. | High |
| **LT** | 1, 2, 5 | 1, 2, 5 | Several ESI Funded projects are supporting health infrastructure and integral care in different municipalities in Lithuania. | Various projects are supporting the healthcare system, including through Norway grants. | High |
| **LU** | | | ESI Funds are being used to support projects related to health promotion and the health workforce. | N/A | Low |
| **MT** | 2 | 2 | A few projects are supporting the modernisation of health infrastructure (2 projects) and primary care (1 project). | A few projects with EEA grants are support the health system and access to healthcare. | Low |
| **NL** | | | ESI Funds are being used mostly to support research and innovation in health and e-health. For instance, the COILED project is providing a platform to speed up the discovery of drug candidates by connecting academia and industry research. | One project funded by the EIB is supporting health infrastructure. | Low |
| **PL** | | | Many ESI Funded projects were identified in Poland, including those supporting access to healthcare, health system reform and support for the health workforce. Projects such as the "Green care farms", providing care and daily activities for elderly people and people living with disabilities, are | Other funds including EIB, EEA and Norway grants are being used to support health in Poland. | High |

| | | | | | |
|---|---|---|---|---|---|
| | | | also supporting interventions to improve health outcomes and promote health. | | |
| **PT** | 1, 2 | 1, 2 | Numerous projects with different budget are building and modernising health infrastructure and supporting access to healthcare, including to address the needs of rural populations and to strengthen primary care. For instance, in the Algarve region, a project is providing primary care services to rural populations. | A few projects with EEA grants are also supporting the health system and access to healthcare. | High |
| **RO** | 1, 2 | 2 | ESI Funds are being used to support health system reform, including a large project to improve the strategic planning and capacity of the national public health programs by the Ministry of Health. | Several projects funded with EEA and Norway grants are supporting interventions to improve access to healthcare and to support the health system in general. | High |
| **SE** | | | Sweden is using ESI Funds to support different health interventions, including on access to healthcare for immigrants and several interventions to promote health and care and to support e-health. For instance, the RUVeS project is supporting cooperation between healthcare services and SMEs to promote a more competitive market for e-health applications. | N/A | Low |
| **SI** | 1, 2 | 1, 2 | Slovenia is using ESI Funds to support its health system, increase access and develop health promotion interventions. For instance, the SOPA project is developing a comprehensive approach to identify and support people with risky alcohol consumption and another large project by the Ministry of Health is developing preventive programmes at primary health care and local communities with the aim of reducing health inequalities. | Norway and EEA grants are also being used to support the health system and access to healthcare in Slovenia | Low |
| **SK** | 2 | 2 | Slovakia is using ESI Funds to support its health system, develop health promotion interventions and support its health workforce. For instance, a large project implemented by the Ministry of Labour is supporting home-based nursing care to dependent person and another is supporting deinstitutionalisation of alternative care. | N/A | High |
| **UK** | | | ESI Funds are being used to support interventions related to health promotion and disease prevention, e-health and the health workforce. | A large EIB project is supporting health infrastructure. | High |

Based on the information gathered per each country and presented in the above table, the following table presents a summarised analysis per each Member State, addressing two main questions: (1) whether the country has any specific priority area as identified within the European Semester (CSRs 2015-2018 and country reports); and (2) whether there were any relevant projects tackling those issues either funded with ESI funds or through other funding sources. Where the analysis indicates shortcomings in a Member State's use of ESIF to address its identified health priorities, there may be room for future ESIF investment in health.

The same limitations mentioned above apply for this analysis. First, the results of the mapping of ESI funded projects reflect the information that was available through the list of operations published by each Member State at the time when this information was gathered. Secondly, this project undertook a mapping exercise to identify all health-related investments made possible by ESI Funds during the 2014-2020 programming period, and a more in-depth study of a group of 63 exemplary projects; however, the project did not aim at assessing or evaluating any particular project or programme.

**Table 2:** ESI Funds invested in health v. health priorities identified within the European Semester

| Member State | Analysis and comments |
|---|---|
| **AT** | No relevant project was found to directly tackle the CSR related to the sustainability of the health and long-term care system. |
| **BE** | Some projects have been identified in relation to access to healthcare with further impacts on the sustainability of health systems; however, these projects did not directly address high quality healthcare for vulnerable groups as suggested by the country report. |
| **BG** | Several projects are addressing the CSRs (related to health system reform, health promotion and the health workforce). |
| **CY** | No ESI Funds were identified in relation to the CSRs. However, it is important to note that the legislation establishing the National Health System was adopted in 2017 and that Cyprus was advised to work towards making its system fully functional in 2020. |
| **CZ** | Some projects with ESI Funds and other funds are addressing the issues identified in the CSRs (health system reform and health workforce). Other projects funded with Norway grants and EEA grants are also addressing the reform of the psychiatric system, community care services, health promotion, and the health workforce. |
| **DK** | No CSR or mention of health on the country report. DK is using ESI Funds to support e-health and research and innovation in health, health promotion and the health workforce. |
| **DE** | No CSR but the country reports identifies e-health as an area that should be strengthened, and Germany is using ESI Funds to support e-health |
| **EE** | Several ESI Funded projects and Norway grants are supporting the establishment of primary health centres and healthcare infrastructure in general as suggested in the country report. |
| **EL** | Large projects are supporting the establishment of primary healthcare units (TOMY), enhancing access through social pharmacies and other interventions on the healthcare system, including those placing emphasis on community care as suggested in the Enhanced Surveillance Report. EEA grants are also being used to support these types of interventions. |
| **ES** | Spain is using ESI funds (and a few EEA grants) to address problems identified both in the CSRs (health systems reform) and in the country report (access to healthcare). |
| **FI** | Finland is using the ESI Funds to address issues highlighted in the CSRs and country report (access to healthcare and health system reform). |
| **FR** | France is using the ESI Funds to support health infrastructure and access to healthcare as mentioned in the country report. |
| **HR** | ESI Funded projects are addressing access to primary healthcare, the development of e-health services, health promotion and disease prevention activities and projects addressing the health workforce. No project was found to directly address the reform of health systems as mentioned in the CSR. |
| **HU** | ESI Funds are being used to support access to healthcare and health promotion, other funds are also supporting healthcare system reforms |

| | |
|---|---|
| **IE** | Ireland is using a combination of ESI Funds and other funds (EIB) to support access to healthcare and health promotion interventions but no relevant project was found to support large interventions to support health care reform as mentioned in the CSR. |
| **IT** | Many ESI Funded projects were identified in Italy, including some that support access to healthcare, the reform of health systems and e-health services. |
| **LV** | ESI Funds are being used to address health system reform but no project was identified to directly address access to healthcare as suggested by the CSR. However, EEA grants are being used to support access to healthcare, health system reform, health promotion and the health workforce. |
| **LT** | Lithuania is using ESI Funds to support different interventions related to access to healthcare, health system reform and health promotion as suggested by the CSR. |
| **LU** | A few ESI funded projects were identified to support health promotion and the health workforce as suggested by the country report. |
| **MT** | Only a few ESI funded projects are supporting the modernisation of health infrastructure (2 projects) as suggested by the CSR. EEA grants are also being used for this purpose. |
| **NL** | ESI Funds are being used mostly to support research and innovation and e-health. One EIB project supporting health infrastructure was also identified. Health was not mentioned in the CSR or country report. |
| **PL** | Many ESI Funded projects were identified in Poland, including those supporting access to healthcare, health system reform and support for the health workforce as suggested by the country report. |
| **PT** | Portugal is using ESI Funds intensively to support interventions related to its healthcare system and to improving access to healthcare as suggested by the CSR. Other EEA grants are also supporting these areas. |
| **RO** | Romania is using ESI Funds to support healthcare although no project targeting access to healthcare was identified, even though this was mentioned in the CSR. However, other funds (EEA, Norway grants) are being used to support health interventions including to improve access to healthcare. |
| **SE** | Sweden is using ESI Funds to support its healthcare system, and it is also using ESI funds to support research and innovation projects and e-health although no mention was included in the CSR or country report. |
| **SI** | Slovenia is using both ESI Funds (through a few projects with large budget to support its health system, and increase access to healthcare as mentioned in the CSR). It is also using other external funding (EEA and Norway grants) to support health. |
| **SK** | Slovakia is using ESI Funds through a few projects with large budgets to support health system reform (mentioned in the CSR) and the health workforce. However, no project was identified to support access to healthcare and also no external funding supporting health interventions was identified. |
| **UK** | The UK is using ESI Funds, although no project was identified to directly target the health system (which was suggested in the country report). Additionally, at least one EIB project was identified, which is providing support for health infrastructure. |

- Conclusions and recommendations covering key success factors of projects, challenges encountered with the use of ESI Funds to support health investments and cross-thematic conclusions and recommendations
- A final chapter with recommendations linked to the next MFF 2021-2027.
- An annex with additional information and links to the other outputs of the project.

# METHODOLOGICAL APPROACH

The ESI Funds for Health project set out an ambitious goal: to identify and classify all health-related projects supported by ESI Funds across the EU-28 and assess their contribution to EU health policy goals. The project also aimed to highlight and share good practices, success factors and lessons learned, and to build capacity across the EU for investing in health. The approach itself provided some interesting insights and generated some lessons about data availability and the links between projects and policy.

### Mapping projects across the EU-28

To identify the health spending across the EU-28, the project looked at relevant OPs and the 'lists of operations' published by programme Managing Authorities (MAs) as part of EU funds regulations. The OPs were classified as health-relevant based on a previous study[6] for the European Commission. These were reviewed together with all Interreg[7] programmes (273 in total) in order to identify the Investment Priorities and Specific Objectives[8] that could support health projects.

The identification of projects was more complex, as this information is not routinely tracked at EU level. Member States are required to publish 'lists of operations' funded for each OP and to make this information easily available on the internet[9]. The lists differ considerably in their format, content and availability[10] and are published exclusively in the national language of the Member State. A large team of experts screened the lists by keyword to identify project titles relevant for health and allocate them to one of the six health themes. All available information (e.g. project title, short description, beneficiary, budget, dates) was compiled in a country factsheet for each Member State and these are available on the project website.

Information about all of the projects was compiled in an Excel database, which allowed for statistical analysis of projects and spending amounts by Member State, theme and sub-theme. A detailed mapping document was prepared for each health theme and Interreg programme. These provide details of which Member States and OPs include relevant priorities and objectives for the theme, as well as statistical information on numbers of projects and spending amounts by Member State and sub-theme.

While the mapping work sheds considerable light on the actual investment support from ESI Funds for the health sector midway through the programming period, the availability and quality of data limit the conclusions that can be drawn from the statistics alone. The funding of literally thousands of projects per programme and the fact that the lists of operations were published in different formats and languages posed considerable difficulties in deciphering the information and developing a database for all Member States. Many programmes only published project titles, making it difficult to ascertain whether or

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[6] Ernst & Young, Mapping the use of European Structural and Investment Funds in health in the period 2007-2013 and 2014-2020 programming periods, 2016.

[7] Interreg implements the European Territorial Cooperation objective. It has three strands: cross-border (Interreg A); transnational (Interreg B) and interregional (Interreg C).

[8] Investment Priorities are set out in the fund-specific regulations for the ESF (Regulation 1304/2013) and the European Regional Development Fund (Regulation 1301/2013), while Specific Objectives are developed by the Member State authorities as part of the programming process.

[9] Article 115 of the Common Provisions Regulation on ESI Funds (Regulation 1303/2013) requires Member States to maintain a list of operations by OP and Fund in a spreadsheet format which allows data to be sorted, searched, extracted, compared and easily published on the Internet (e.g. .csv or .xml format). This list should be updated every six months.

[10] The lists were reviewed in September 2017 for all OPs, with the exception of some regional OPs in Greece and Italy and all lists for the Spanish and Romanian OPs, which had not been published at the time the research was carried out. These were subsequently collected and reviewed in July 2018.

not the project was health-related and, where it was, to assign it to a theme or sub-theme. In the future, programme MAs could be provided with a more consistent reporting format to publish information about projects, thus allowing easier and more accurate thematic mapping of this sort.

### Identifying and analysing a set of exemplary projects

Given the limitations of the published data, this study collected more detailed information on 63 exemplary projects, with at least 10 for each health theme. These projects were selected to provide an overview of the diversity of projects receiving support, based on the following criteria:

- Relevance of the project to contribute to EU health policy goals and/or national health policy reform;
- Innovative character of the project;
- Expected impacts, including in terms of reducing health inequality;
- Potential for transferability;
- Involvement of health authorities and stakeholders;
- Cross-sectoral nature of the project, involving diverse stakeholders;
- Balanced geographical coverage.

The 63 projects selected do not necessarily represent the best practice available but, rather, a snapshot of the variety of ways in which health needs are targeted by the ESI Funds in practice. The team interviewed project beneficiaries to understand how the projects were conceived, developed and implemented. A factsheet for each of the 63 projects is available in a searchable database on the project website.

### Reaching out to stakeholders through workshops and a final conference

A key project objective was to engage with a wide range of stakeholders – public authorities, programme MAs, project beneficiaries, experts and others – to disseminate the findings, raise awareness about the importance of health in the ESI Funds, and build networks and capacity for better future programme and project implementation. This was achieved through the organisation of six events around the EU. Each event was 'hosted' by a project beneficiary from the exemplary project list, allowing for peer review of a set of similar projects as well as a wider debate on the contribution of ESI-funded projects to relevant health policy goals. A detailed report summarising the key findings from each event, along with agendas and presentations, are available on the project website.

### Assessing the contribution of the funds to health policy goals

The final step was to gather all of the findings in order to draw conclusions on the contribution of ESI Funds to relevant EU health policy goals, as well as the priorities for each Member State as expressed through the European Semester process, mainly the country reports and relevant Country-Specific Recommendations (CSRs). The assessment brings together the statistical information, showing broad spending trends, individual successes and challenges highlighted by the exemplary projects, and the broader discussions during the thematic events, during which the ability of ESI-funded projects to tackle health policy challenges was addressed more directly by stakeholders and experts. Each thematic chapter of this report addresses a series of questions:

- How are health objectives considered in the programming of the ESI Funds (including in terms of Thematic Objectives)?
- What are the typical ESI-funded investments within the theme?
- How do these ESI-funded investments address health policy challenges and needs?
- What good practices exist for health investments supported by the ESI Funds?
- Are there opportunities for improving the use of ESI Funds within the theme?

Collectively, these results have shed light on the use of ESI Funds in practice, policy accomplishments, and the improvements needed in order to get better results in the short and long term. The conclusions and recommendations reflect on potential action by the different stakeholders (e.g. the Commission, programme MAs, beneficiaries) in the current and upcoming MFF to ensure that key health priorities are supported by ESI Funds.

# CHAPTER 1: INVESTING TO ADDRESS HEALTH INEQUALITIES AND IMPROVE ACCESS TO HEALTHCARE


**Investment is needed to address health inequalities and improve access to healthcare in the EU**

The right to timely, affordable and good quality preventative and curative healthcare is enshrined in the European Pillar of Social Rights (EPSR)[11], with access to preventative healthcare and medical treatment also included in the EU Charter of Fundamental Rights[12]. At the level of health systems, access to healthcare metrics indicate the proportion of a population that reaches appropriate health services. Healthcare coverage improves people's overall health status and is essential for good quality of life.

Along with effective disease prevention and social protection policies, access to high-quality healthcare services is an essential component in addressing health inequality and reducing social exclusion and poverty, which are important targets of the Europe 2020 strategy. Timely access to healthcare can also prevent higher healthcare costs in the long-run, increase the productivity of the workforce and facilitate people's active participation in society, as emphasised in the European Commission's Social Investment Package[13].

In theory, almost all EU Member States provide universal access to healthcare for their citizens. In practice, however, there are significant inequalities and some populations experience difficulties in accessing the care they need. Multiple factors such as lack of healthcare coverage, distance from healthcare facilities, the price and quality of medical services and preventive care, and a shortage of healthcare staff with the right skills can decrease access to healthcare.

Specific population groups may be particularly prone to poor access to healthcare due to social and/or economic factors. Vulnerable groups (e.g. migrants, people with low health literacy, those with low income, or ethnic minorities such as Roma people and those living in remote areas) also experience systematic barriers (such as cost, social stigma, administrative, language or cultural barriers) preventing them from accessing healthcare services. By supporting interventions that improve access to healthcare, ESI Funds can positively affect the quality of life and socio-economic conditions of these vulnerable groups.

The European Semester process identified particular needs for improved access to healthcare in some Member States. These include: (1) ensuring access for populations in

[11] European Commission, The European Pillar of Social Rights in 20 Principles website.
[12] Charter of Fundamental Rights of the European Union, Article 35.
[13] European Commission, Policy Roadmap for the implementation of the Social Investment Package, 2015.

geographically remote areas; (2) reducing out-of-pocket (including informal) payments for healthcare services; (3) shortening waiting times for services; (4) ensuring necessary resources and increasing overall funding for healthcare (including increasing funds for prevention); and (5) reforms of the system of coverage to healthcare services[14]. Not only are these actions closely linked to the reform of health systems and social policies[15], they are essential to protect individuals and their families from the risk of poverty and social exclusion due to ill health[16].

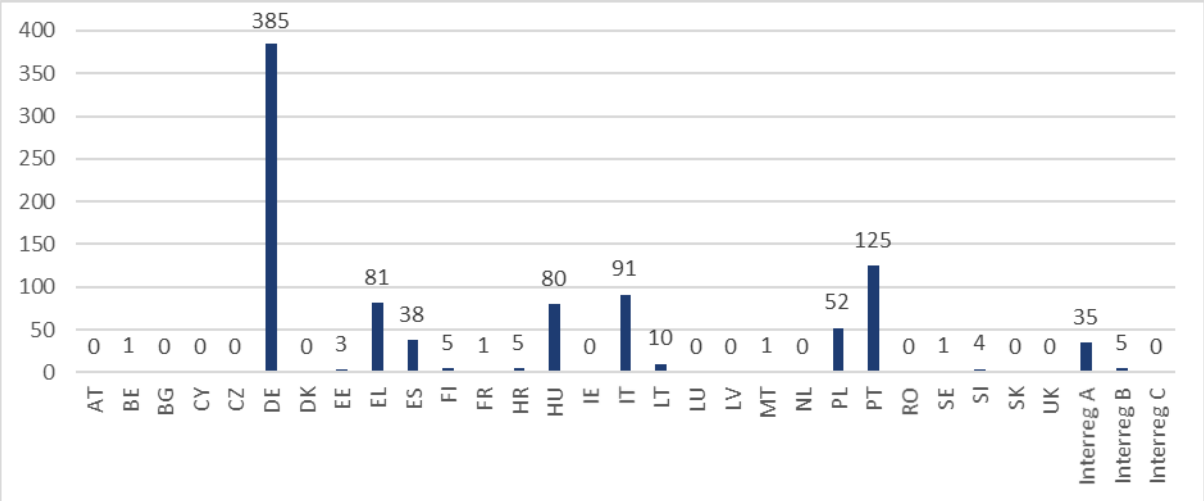
ESI Funds can support Member States to address these needs. In the current financing period, 923 of 7,404 projects (around 12%) support improved access to healthcare in the EU. These investments represent around EUR 1.3 billion and primarily target improvements in health infrastructure, reducing distance to healthcare and enhancing access to health services for vulnerable population groups.

## HOW ARE ESI FUNDS USED TO IMPROVE ACCESS TO HEALTHCARE DURING THE 2014-2020 PERIOD?

### Interventions focus on improving access for specific population groups and the availability of healthcare in remote locations

Midway through the current funding period, 923 projects in 16 Member States target access to healthcare. Germany has a large number of small projects, with Portugal, Italy, Greece, Poland and Hungary also reporting significant numbers of projects. Some relevant projects are financed under the Interreg cooperation programmes, as shown in Figure 5.

**Figure 5: Improving access to healthcare projects by Member State and Interreg programme**

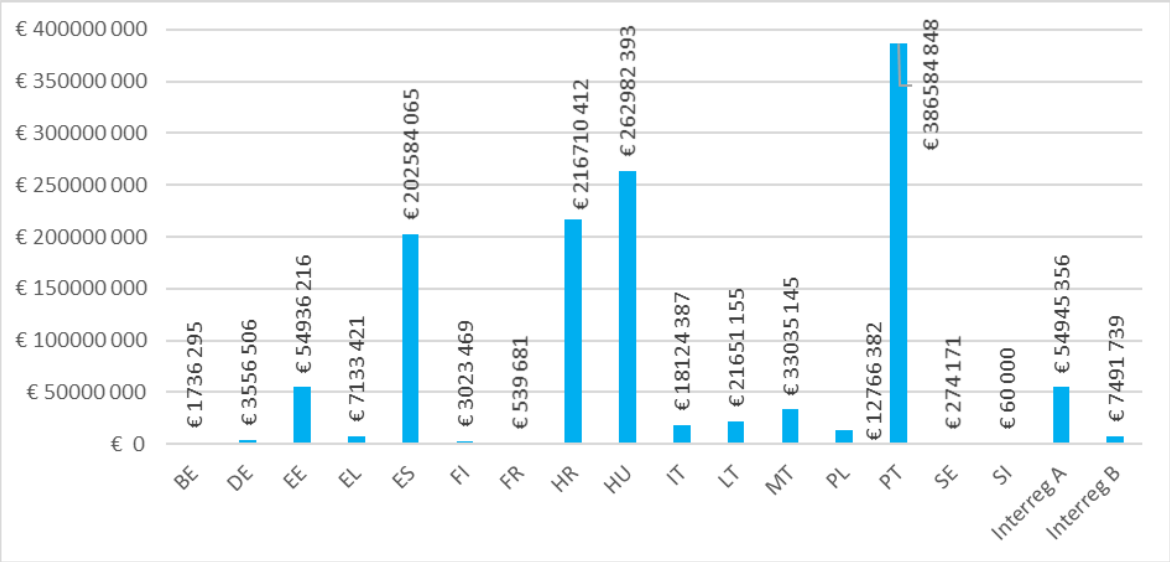



The total budget for all access to healthcare projects (ESI Funds and national co-financing) is around EUR 1.3 billion, with an average project budget of approximately EUR 1.5 million. The highest spending on access to healthcare does not come from those countries with the largest numbers of projects. The Member States with the greatest number of projects do not spend large amounts of funding, with the exception of Portugal and Hungary. By

[14] A review of the 2015-2018 country reports and CSRs found that several Member States need to pay particular attention to these issues. For more detail see the country factsheets published on the project website: http://www.esifundsforhealth.eu/explore-country.
[15] EuroHealthNet, The European Semester: A health inequalities perspective, November 2017.
[16] European Commission, COM(2016) 725 final, Annual Growth Survey 2017, p. 12.

contrast, Croatia spends nearly EUR 217 million on a small number of projects[17]. Further details are presented in Figure 6 below.

**Figure 6: Total budget for access to healthcare projects by Member State and Interreg programme**




Note: Budget information was available for 861 of the 923 projects.

Many of these projects support interventions to increase access to healthcare for specific population groups and address distance, affordability and quality of services. A considerable number of projects also target the improvement of health infrastructure. Many projects, particularly those from Germany, focus on improving the skills and capacities of health workers to care for vulnerable groups. Few projects directly target the reduction of disparities in healthcare coverage.

While many countries face similar challenges in respect of improving the accessibility of healthcare services for the general population and specific vulnerable groups, different approaches are used to address these challenges[18]:

- In **Portugal**, the majority of projects focus on improving the qualifications of healthcare providers to meet the needs of specific vulnerable groups. A different approach is followed in the Algarve region, where a project uses mobile health units to provide healthcare services and promote social inclusion in rural and remote areas.
- Mobile units are also used by projects in other countries. In **Belgium**, a project is using mobile laboratories for the benefit of patients with chronic diseases, as well as the healthcare communities that serve them, by reducing the burden of caring for these patients in a hospital setting. A cross-border project funded by the **Greece-Bulgaria Interreg A** programme improves access to primary healthcare in the rural cross-border areas, where the population has difficulty accessing healthcare services, with mobile health units staffed by a range of health specialists.
- In **Hungary**, most investments focus on infrastructure development and improvement, thus explaining the relatively large spend. Similarly, in **Spain,** the majority of the investment supports infrastructure and transport improvements (e.g. the development of helicopter pads or specialised mobile units for hospitals).

[17] At the time of data collection, no information was available on whether these amounts were only earmarked or actually spent.

[18] For more detail, see the project factsheets published on the project website: http://www.esifundsforhealth.eu/project-database.

- In **Italy,** the majority of the access to health projects focus on improving the qualifications of health workers to better support vulnerable groups. One regional project, for example, aims to develop a care model that puts the elderly at the centre of health and social care, building on the crucial role of community-based services provided by family and nurses. This particular group of health professionals facilitate a three-way dialogue (elderly person-health services-social services). "Soft measures" to improve access to healthcare are also the focus of the projects identified in **Germany**, where a large number of smaller-budget projects are improving qualifications in palliative care.
- Several **Interreg** projects contribute to improving access to healthcare for border regions. In the **Euregio Maas-Rijn Interreg A**, one project focuses on increasing the social integration of vulnerable groups by targeting long-term active social participation of people with dual diagnoses. In the **Northern Periphery and Arctic Interreg B**, one project addresses access to healthcare challenges jointly faced by the northern countries. The project is supporting innovative ways to provide remote (digital) support for people with dementia and other frail elderly people living in remote areas. Another project supported by the same programme tackles the growing issue of social isolation and its health impacts among older people in remote, sparsely populated areas. By supporting social connection among older people, the project will reduce dependence on care professionals and help to build resilient self-sustainable communities in these areas.
- In **Greece**, several projects in the Athens municipality are developing a social supermarket and pharmacy to provide medicines, medical supplies and para-pharmaceutical products free of charge for people that would otherwise not be able to afford such medicines (e.g. the unemployed, uninsured, homeless persons, migrants).

**Measuring the outcomes of access to healthcare projects is both complex and necessary**

The use of indicators to measure project results is especially important for interventions to improve access to healthcare. The ESI Funds only contain one common output indicator relevant for health, i.e. the population covered by improved health services. This indicator is used by six Member States (EL, ES, FR, HU, MT, PT) for projects related to access to healthcare.

In addition, Member States defined several programme-specific indicators to monitor the performance of the projects related to access to healthcare. These indicators typically refer to the number of participants in health programmes or number of such programmes. Examples of programme-specific indicators used for this theme by Member States are:

- Number of modernised treatment facilities in regional hospitals functioning as competence centres (EE).
- Coverage of population of immigrants and asylum seekers receiving social care services (EL).
- Reduction in hospital referral rates from primary health care providers in deprived/isolated areas (HR).
- The relative difference of outpatient visits in regional areas and big cities (LV).
- Number of hospital admissions due to improved primary health care services (MT).
- Average waiting time for access to level II priority hospital care (PT).

Very few Interreg Programmes include monitoring indicators. The following examples have been found in Interreg projects addressing access to healthcare:

- Number of people who used a health service on either side of the border (BE-FR).
- Number of specialised doctors working on a cross-border basis in the area (FR: Mayotte-Comores-Madagascar).

- Number of missions, audit, exchange and expertise in the health sector, the social sector and medico-social issues (Indian Ocean Area).

However, while several countries have developed their own programme-specific indicators, these indicators rarely attempt to measure health outcomes. Stakeholders at the access to healthcare workshop stressed the need for other indicators to demonstrate the full range of impacts of projects improving access to healthcare. They also acknowledged that measuring improvements in access to healthcare is a complex task, which often requires citizens or service users to provide feedback on their experience. There is a need to develop a more comprehensive system of appropriate indicators that capture impacts on the population and include both the outputs and health outcomes of projects.

The ESI Funds should continue to target access to healthcare in line with the EPSR, the Sustainable Development Goals and other relevant policies. However, closely linked policies such as health and social care must be coordinated to ensure more ambitious and targeted actions to reduce health inequality, advance social inclusion and improve socio-economic sustainability. It is also important to track links to innovation, environment and digital policies, among others, in order to ensure that the availability of healthcare is enhanced and expanded in a sustainable manner.

**ESI Funds can complement national funding to improve access to healthcare and address health inequalities**

Demographic and technological changes are putting considerable pressure on health systems and citizens across the EU. Member State budgets are not always able to adequately cover the rising unmet health needs. This in turn exacerbates health inequalities between all citizens and especially for underserved and vulnerable groups. By increasing or complementing national budgets, ESI Funds are contributing to improve access to healthcare and social care, enhance the quality of life, and improve the socio-economic circumstances of vulnerable groups. The funds are therefore a key tool in tackling health inequalities; they can play an important role by supporting interventions that improve access to healthcare (sometimes coupled with social care), which in turn positively affect the quality of life and socio-economic circumstances of vulnerable groups and the general population.

Many ESI Funded projects are addressing health inequalities directly and indirectly. By identifying specific needs for improved access to healthcare in some Member States (e.g. ensuring access for populations in geographically remote areas; reducing out-of-pocket payments for healthcare services; shortening waiting times for services; ensuring necessary resources and increasing overall funding for healthcare; and increasing coverage to healthcare services), the European Semester process is a useful mechanism to address health inequalities. The reduction of out of pocket fees –which is major a barrier to healthcare for the poorest in society—is a particularly important area. Such efforts are vital to guard against the risk of poverty and social exclusion due to ill health for vulnerable groups.

Enhanced access to healthcare is a key tool to broaden coverage and improve health outcomes, in particular for vulnerable groups. The ESI Funded project 'Proximity Labs' (BE) – which uses mobile laboratories to reach patients with chronic diseases and the healthcare communities that serve them- illustrates this approach while also highlighting the connections to country specific recommendations and the sustainability of health systems. The use of mobile laboratories removes the need to care for these patients in a hospital setting which is beneficial for both patients and the health system. The proximity labs concentrate on chronic disease patients and help the more vulnerable groups among these by educating them to the risks associated with their disease and providing them with the necessary diagnostic tests. A further benefit of the project is to contribute to the reform of the health system by encouraging the transition from hospital to community-

based care. The 'Proximity Labs' is a project that supports the 2017 CSR recommendation for Belgium to improve the sustainability of public finances by potentially reducing the need for and expenses related to the hospitalisation of chronic disease patients.

Universal access to healthcare is a key prerequisite to reduce health inequalities. Member States must also enable access for all to high-quality early years education and employment as well as welfare services to prevent disadvantages and promote health. Targeted services are insufficient to reduce health inequalities and can easily become socially stigmatising 'poor services for poor people'. Instead, following the principle of universal proportionalism, Member States should address disadvantages and ensure that different kinds of support are offered to people according to the type and level of need they experience within universal systems. The ESI Funds have been used to support such measures. For example, several of the identified projects are improving access to healthcare for older groups in rural areas (Portugal), helping children with mental health problems, neurodevelopmental disabilities and their parents/guardians by improving the relevant health infrastructure (Lithuania), and focusing on health issues and rehabilitation among recently arrived immigrants (Sweden)[19].

The ESI Funds are increasingly considered a source for funding innovative social and health projects. By testing interventions that national governments are unable or unwilling to fund at an experimental stage, ESI Funds can provide the opportunity to pilot, scale-up and replicate promising interventions. They often enable sharing new models in health and social fields, while adapting to specific regional and local health and social needs (e.g. the Mobile Health Units project in Portugal). The added value of the ESI Funds goes beyond offering financial support and scaling-up of (existing) services. Funding opportunities can also be seen as a positive way for local public sector institutions to reinforce collaboration with other sectors and with regional and national authorities.

**Links between access to healthcare and social policies should be strengthened**

Most of the spending related to access to healthcare is programmed under Thematic Objective 9, which addresses social inclusion, poverty and discrimination, and the relevant OPs are typically managed by authorities with responsibility for broader social issues rather than health specifically. Planning and supporting health investments within the broader scope of objectives related to social inclusion should reinforce the fact that social inclusion and poverty can be strongly impacted by people's access to quality healthcare, and care must be taken to ensure sufficient support for the health care dimension of social objectives. Following on this, projects should derive from identified needs and should tackle the origin of challenges. Prioritising investments in access to healthcare has an important return, driving numerous spill-over effects, especially where gaps in access to healthcare are at the origin of socio-economic problems.

One of the common success factors among ESI-funded projects was the existence of a strategic framework at national or regional level that addresses the issue of access to healthcare from a number of perspectives. This implies a focus that goes beyond health and encompasses a variety of measures such as social services support, 'soft' infrastructure, and the institutional capacity of public authorities and other stakeholders such as civil society groups. The process of preparing such a framework requires different sectoral institutions to work together and understand that problems and solutions are inter-linked, resulting in projects that better target the actual problems, and are 'owned' and supported by all necessary institutions and stakeholders. The framework is also

[19] For more detail, see the project factsheets published on the project website: http://www.esifundsforhealth.eu/project-database.

necessary to fulfil the ex-ante conditionality for health investments[20], which requires that Member states have in place a strategic policy framework for health including, among other things, coordinated measures to improve access to health services. It is important also that different EU funds and OPs (e.g. those funded by ERDF and ESF) are coordination as well in this regard.

## CONCLUSIONS AND RECOMMENDATIONS

By complementing national funds for improving access to healthcare, ESI Funds are playing an essential role given existing fiscal pressures on national budgets and the increasing need for healthcare and mounting health inequalities. The ESI funds are supporting many opportunities to pilot, scale-up and support cross-country and cross-sectoral collaborations of promising interventions that improve access to healthcare. Such interventions enable the development and share of new cross-sectoral collaborations and models in the health and social fields and they have also reinforced multi-level collaboration (e.g. national, regional and local authorities collaborating to enhance access to health services).

The diversity of the health needs across EU regions provides a rationale for investing in regional and local interventions and infrastructure apt to support health opportunities and good health and social outcomes. Projects supported by the ESI funds tend to tailor to very specific regional and local health and social needs as well as to functional aspects of well-being, especially the ability to work and to fulfil social roles and address specific needs of vulnerable and isolated populations (as exemplified by the case of the Portuguese host project). The participation of the health and local communities was considered one of the major success factors of projects. However, more could be done to facilitate a systematic and transparent system for the involvement of stakeholders during the programming and implementation of ESI Funds.

Measuring access to healthcare is a complex but also essential task to keep track of progress. Not only the development of good and specific indicators for ESI Funded projects is essential to measure their contribution to access to healthcare; measurement and tracking can also facilitate the synergies between ESI Funds, national and other funding available for this area.

[20] This refers to the thematic ex-ante conditionality 9.3, included in Annex XI of Regulation 1303/2013 laying down common provisions for the ESI Funds.

# CHAPTER 2: FUTURE-PROOFING HEALTH SYSTEMS


**Modern health systems must be accessible, effective and sustainable**

Effective and resilient health systems underpin Europe's ability to deliver high quality healthcare to individuals[21]. Population ageing, technological change and growing citizen expectations are placing greater pressure on Member State health budgets. Action will be necessary to ensure the long-term fiscal sustainability of healthcare systems, secure Member States' ability to provide access, and meet the increasing and changing need for health and care services[22].

Well-functioning health systems are central to meeting the headline targets of the Europe 2020 Strategy, particularly those relating to employment, education and social inclusion. While the EU recognises the important role of health systems, multiple challenges remain, and health systems must balance long-term sustainability with accessibility and effectiveness[23].

Key needs have already been identified in some Member States through the CSRs[24] that form part of the European Semester process. These often include the need to avoid institutional care where possible, which therefore requires the transformation of healthcare and social service delivery for groups such as the elderly, people with disabilities, people with mental illness and children deprived of parental care. An over-emphasis on hospital-based care has also been identified in some Member States, suggesting a need to strengthen primary care services and improve integration of care. Health system reform is central to the health and treatment of European citizens.

ESI Funds can support investments that improve the efficiency of health systems while delivering quality and accessible health services to individuals, mainly through Thematic Objective 9 (Social inclusion) and Thematic Objective 11 (Improving the efficiency of public administration). Under these objectives, a wide range of investments can be realised across Member States, whether in infrastructure, skills, care and social services or institutional supports[25].

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[21] European Commission, State of Health in the EU, Companion Report 2017.

[22] European Commission and Economic Policy Committee, Joint Report on Health Care and Long-term Care Systems and Fiscal Sustainability, October 2016.

[23] European Commission, COM (2014) 215 final, Communication on Effective, Accessible and Resilient Health Systems.

[24] For details, see the country factsheets published on the project website: http://www.esifundsforhealth.eu/explore-country.

[25] European Commission, Investments in Health: Policy Guide for the European Structural and Investment Funds (ESIF) 2014-2020, March 2014. A comprehensive overview of programming related to the health reform

Investment in health system reform represents a significant share of overall ESI-funded investments in health. In total, 1,738 health system reform projects were identified in the Member States, accounting for around EUR 1.6 billion in investments. This represents 23% of the projects identified[26].

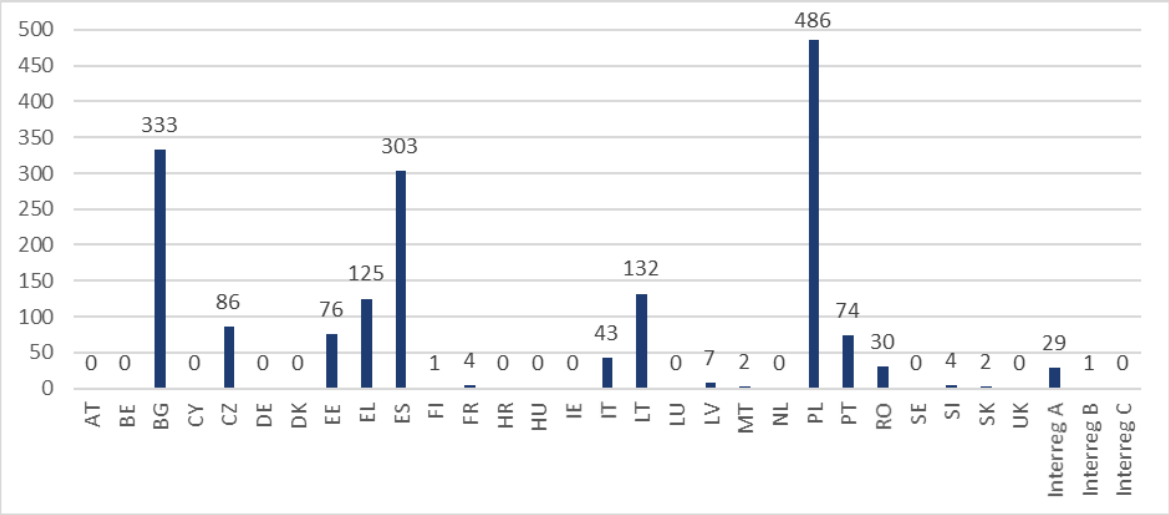
## HOW ARE ESI FUNDS USED TO SUPPORT THE REFORM OF HEALTH SYSTEMS DURING THE 2014-2020 PERIOD?

### Spending addresses deinstitutionalisation and strengthens primary care

Investments in health system reform were found in 16 Member States, with a particular concentration of projects in Poland (486 projects), Bulgaria (333 projects) and Spain (303 projects). In Poland, a large number of individual projects (450) focusing on the same action and theme are being implemented in different regions: 366 of these projects support deinstitutionalisation measures; 172 relate to strengthening primary care and supporting the transition away from hospital care; and 95 relate to investments in healthcare facilities[27].

Of the 333 projects relating to health system reform in Bulgaria, 319 aim to contribute to deinstitutionalisation. This corresponds to specific country objectives to reduce the number of elderly people, people with disabilities, children and youth in institutional care. In Spain, around one third of the health reform projects also target deinstitutionalisation measures, while the majority invest in the improvement of health infrastructure's efficiency and sustainability. In addition to Poland, Bulgaria and Spain a significant number of projects on health system reform can also be found in Lithuania, Greece, Czech Republic, Estonia and Portugal.

**Figure 7: Health system reform projects by Member State and Interreg programme**




When looking at ESI-funded projects in terms of funding rather than number of projects, the picture changes somewhat. Poland and Spain continue to represent the bulk of investment, having spent approximately EUR 530 million and EUR 238 million for health system reform respectively. However, while only 86 projects on this theme were identified

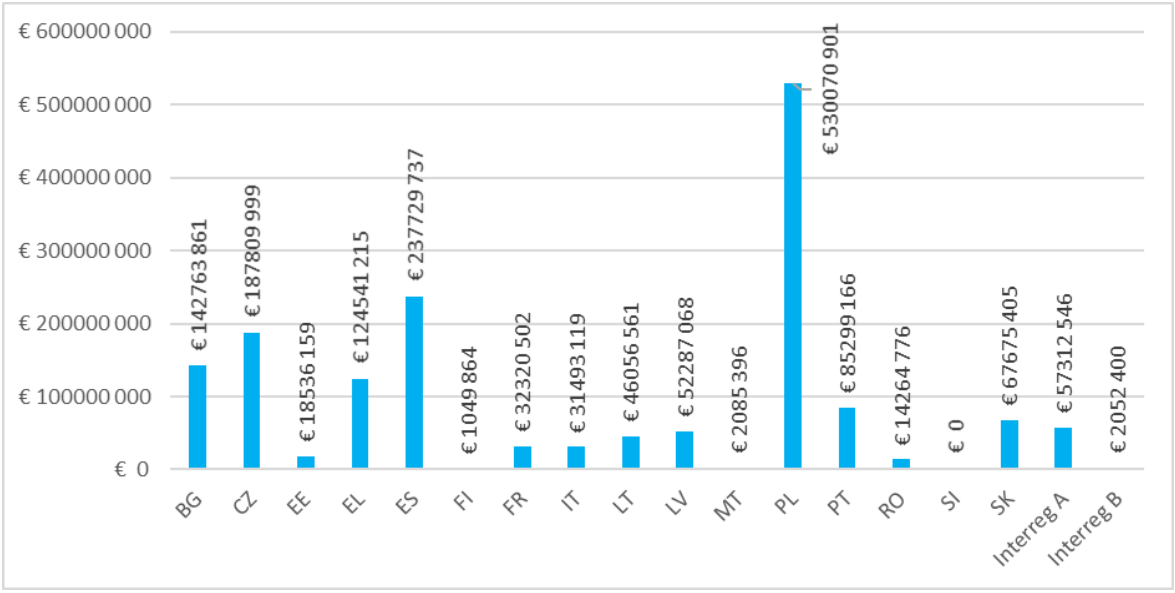
projects can be found in the thematic mapping document published on the project website: http://www.esifundsforhealth.eu/explore-health-theme

[26] For details, please see the thematic mapping documents published on the project website: http://www.esifundsforhealth.eu/explore-health-theme

[27] Some projects address multiple objectives and are thus included more than once in this breakdown.

in the Czech Republic, these projects represent almost EUR 188 million, the third highest spending among the Member States. The Czech projects have an average budget of more than EUR 2 million, and 68 of the 86 projects are investments in the development, expansion or modernisation of healthcare facilities. One further project of almost EUR 4 million will create five mental health centres to close the gap identified in community-based mental health care. Similarly, while Slovakia has only two projects relating to health system reform, each has a significant budget (almost EUR 18 million and EUR 50 million, respectively). These projects focus on recruiting carers and social services staff to support people at home instead of in institutional care.

**Figure 8: Total budget for health system reform projects by Member State and Interreg programme**




Note: Budget information was available for 1,601 of the 1,738 projects and none of the projects in Slovenia.

### Measuring the outcomes of health system reform projects

The common output indicator for health is relevant for projects related to the reform of health systems, and has been used by 5 Member States (EL, ES, MT, PL, PT). In addition, Member States defined several programme-specific indicators to monitor the performance of the health reform-related projects. These indicators typically refer to the number of persons benefitting from certain programmes or number of institutions undergoing reforms. Some indicators (e.g. in Poland) refer also to improved efficiency of the health care services. Examples of programme-specific indicators used for this theme by Member States are:

- Number of participants with disabilities and participants over 65, unable to take care of themselves, with improved access to services (BG);
- Number of modernized primary health centres (EE);
- Share of inhabitants of disadvantaged urban areas covered by the newly created health infrastructure (FR);
- Reduction of number of people in health care institutions (HR);
- Percentage of elderly population (65 years old and beyond) who receive assistance at home (IT);
- Average time of bed occupancy in health units (PL).

Very few Interreg Programmes include monitoring indicators with relevance to health. The following examples were found:

- Number of people who used a health service on either side of the border; Number of tools/instrument to access health and social services on both sides of the border (FR-BE);
- Number of projects to improve cross-border cooperation in the field of health (BE-DE-NL);
- Number of health care institutions reorganized, modernized or reequipped (EL-BG).

**Member States use ESI Funds to support complex reforms**

A key challenge in using ESI Funds to support health system reform, particularly deinstitutionalisation, is that, historically, Structural Funds have been used to build institutional care facilities, which can worsen the cost-effectiveness of healthcare systems and lock-in institutional care over the long-term[28]. During 2014-2020, however, Member States have used ESI Funds to target deinstitutionalisation and reform of long-term care systems.

Member States have approached health system reform in a variety of ways, depending on their strategic aims, health system composition, and national health challenges. These include integrated social and health services systems to support the elderly and people with disabilities, as well as addressing youth employment while providing long-term care solutions for the elderly. Many projects go beyond investment in new or upgraded infrastructure to support broader health system reform or other policy objectives[29]:

- Investment in infrastructure to support health system reform goals is seen, for example, in the Mental Health Centres project in the **Czech Republic**, which is part of a broader mental health care reform. This project is establishing seven centres that will provide integrated, community-based care to people who might otherwise be institutionalised. While this is an investment in new infrastructure, it also reflects a move away from an institution-based care model to a more community-based mental healthcare.
- In **Latvia**, the Ministry of Welfare is developing a social services system to develop and test a country-wide model for delivering health and social services for people with disabilities and mental illness outside of institutional settings.
- In **Finland**, the PoPSTer project is supporting nationwide reform to health and social services within one region, Northern Ostrobothnia, which is developing its own model for delivering health and social services under the reformed national system. In addition to supporting health system reform, the investment (and national reform, more broadly) is linked to other health policy objectives, including deinstitutionalisation, access to health in remote areas, and addressing health inequality.
- In **Slovakia**, the Support of Caretaker Services project represents a shift away from residential care for the elderly. The project created more than 3300 nursing positions to support the care of elderly people and people with disabilities at home, with the goal of avoiding institutional care. The project intends to carry out a feasibility study into developing a long-term funding model for the programme to ensure that it can be sustained and become a core part of the healthcare system. A similar project in the Raseiniai region in **Lithuania**, is providing an integral care (including nursing and social care services) to elderly and disable people at home.
- In **Italy**, the low-budget (EUR 20,000) Generational Clashes project in Trieste sought to address both youth unemployment and elderly care issues. The project matched young volunteers at risk of long-term unemployment with elderly citizens at risk of

[28] European Union Agency for Fundamental Rights, From institutions to community living, Part II: funding and budgeting, p. 11-12.

[29] For more detail, see the project factsheets published on the project website: http://www.esifundsforhealth.eu/project-database

social exclusion to develop individual health and social care plans, under the supervision of healthcare services.

- The STAR project, funded by the **Slovenia-Croatia Interreg A** programme, focuses on the challenges in planning healthcare services for elderly people in a cross-border context, while at the same time avoiding institutional care. The project aims to coordinate the establishment of different forms of care services across the Croatia-Slovenia border (a day care and a household group within a retirement home) for elderly citizens, as well as training for family caretakers to support elderly people to remain at home for longer.

While the Czech and Latvian projects represent significant investments in transforming the health system country-wide, smaller projects target more local transformation of healthcare delivery. The Finnish PoPSTer project, among others, uses small investments to implement national reform at local level. All Member States must meet the growing demand for health and social services for elderly people, and many of these projects focus specifically on developing new service provision models for elderly care outside of institutional settings.

**Aligning investment with national and EU policy priorities to build support for reform**

Aligning the objectives of individual projects – and OPs – with broader national and EU policy goals can help health authorities to secure ESI funding and build political support for reforms. Linking the health policy goals of projects to national policy priorities (such as population ageing or workforce development) increases understanding by other national Ministries and can help to build support from central agencies (including Finance Ministries) at Member State-level for the investments proposed.

The availability of ESI Funds for reform in the health sector also helps to secure political support for such reform and can be useful in overcoming resistance at national level. Investments should therefore be linked to EU policy goals, particularly those set out in the ESI Funds Investment Priorities and in the CSRs delivered through the European Semester process. This will help health sector beneficiaries to build a stronger case for including proposed investments in national OPs. It will also help to ensure that investments address the particular needs of the different national health systems.

**A strategic approach is needed to ensure that investments supports system-wide reform**

Health system reform presents complex challenges. Many ESI-funded projects do not address the entire health system and thus have no impact beyond the life and locale of the project. The project-based nature of ESI investments, and the often small size of investments, means that they can struggle to address entrenched system-wide issues. When building a strategic health system reform agenda, it is essential that Member States ensure a coordinated and coherent approach to investment rather than a project-by-project approach. Investments that are linked to local needs, a strategic national health policy, broader national policy goals and EU-level policy and structural reform objectives (e.g. European Semester recommendations) are more likely to achieve meaningful reform. The ex-ante conditionality for health requires Member States to have a national or regional strategic policy framework for health that contains – among other things - measures to stimulate efficiency in the health sector.

A strategic approach might involve using pilots and studies to test and demonstrate the benefits of reform at a smaller scale before scaling up to a broader, possibly national, level. This can be an effective way of using the project-based nature of ESI Funds investment to support a broader reform agenda. Ensuring that project design includes the monitoring of impacts, as well as adapting investments to new and improved information,

allows beneficiaries to learn how reforms are best implemented in a local context and take innovative approaches within their projects. Effective monitoring also helps to build the evidence base needed to support the case for scaling-up investments.

The project-based nature of ESI Funds' investments creates a challenge in ensuring the sustainability of impacts beyond the lifetime of specific projects. Coupling projects with other activities that seek to secure longer-term funding can help to overcome this problem. For example, some reform projects identified in the course of this study were implemented in parallel with reform of national healthcare funding models, with ESI Funds used to support the transition period while long-term operational costs were supported through new financing arrangements.

**ESI funded project are contributing to health system reforms that address health inequalities through 'hard' and 'soft' investments**

Health systems budgets are under strain due to demographic changes, new technological advancements in health care, and the changing expectations of citizens. The country specific recommendations, that are part of the EU semester process, have recognised the main needs in Member States (e.g. the need to avoid institutional care where possible, to transform healthcare and social service delivery for groups such as the elderly and people with disabilities, and to strengthen primary and integrated care services).

ESI Funds are contributing to address some of these critical areas. The Italian Generational Clashes project –where the health and social condition of older people in Trieste are being monitored by a team of volunteers and health professionals and identified needs are being addressed through personalized care plans—is reducing inequalities in terms of health status. Moreover, the project is part of the wider programme 'Habitat Microaree' whose primary objective is the promotion of health in the territory, giving priority to vulnerable groups, with a view to reducing health inequalities and influencing health determinants. Based on the understanding that institutional services cannot effectively respond to current socio-demographic changes, the project contributes to reforming healthcare system by fostering the transition from institutionalised to community-based care services.

ESI Funds have tended to support large-scale infrastructure investments, resulting in an over-emphasis on long-term inpatient care with potentially detrimental effects for the long term affordability and suitability of the health system. Infrastructure or 'hard' investments must be balanced with 'soft' investments such as direct service provision and staff training. Currently, there is a greater need for 'soft' investments, including community-based care systems, staff training on new models of care, peer-to-peer support networks, and de-institutionalised mental health services. Strong primary care is fundamental to reducing health inequalities. However, for this to occur, there are three key requirements: (1) major investments in primary care supply and quality; (2) targeted investment in primary care supply in low coverage areas and (3) national guidance and support for effective interventions for chronic conditions. Reforming health systems and transitioning towards community care and deinstitutionalisation requires a paradigm shift and a change in strategic planning -emphasizing citizen's rights and quality of care throughout the process.

Overall, the ESI for health project found that for the current period, investments are less focused on infrastructure and more on soft investments. The ESI funds can help to bridge the gaps in national budgets while also providing investment funds for any infrastructure that will be required for community based services. The need is not just for reforming health systems, a change in approach from the ESI funds and implementing partners is required to understand that 'soft' infrastructure is required to make health systems ready for the challenges of the future.

Furthermore, the coordination of investments from the ESF and ERDF could further support effective health system reform. In general, ESF investments are less focused on infrastructure and more on soft investments. However, in the case of investments focused on deinstitutionalisation, infrastructure investment will still be needed to support the transition. While deinstitutionalisation should ultimately lead to reduced health sector spending, there will be a transition period where expenditure increases due to the need to maintain institutional or hospital-based care while community-based services are being established. ERDF investments can support Member States to bridge this transition period.

Beneficiaries may face challenges in overcoming institutional biases towards infrastructure investment, particularly persuading national central agencies (e.g. Finance Ministries) of the need for increased soft investment in operational costs. Guidance from the Commission could help beneficiaries to build the case for soft investment and thus overcome this challenge.

Finally, the need to develop capacity and skills for reform of health systems is key for future development. This can be done through investments under Thematic Objective 11 (improving efficiency of public administrations). Cross-Member State activities such as knowledge-sharing, guidance, twinning or site visits can also help to build the knowledge base for reform.

## CONCLUSIONS AND RECOMMENDATIONS

There are complex challenges on the way to the realisation of health system reforms. Many ESI-funded projects have a limited impact within the timeline and geographical area covered by the specific project. The project-based nature of ESI investments, and the often small size of investments, means that they can struggle to address system-wide issues. Therefore, it is essential that Member States ensure a coordinated and coherent approach to investment rather than a project-by-project approach.

Investments that are linked to local needs, a strategic national health policy, broader national policy goals and EU-level policy and structural reform are more likely to be successful. When the health policy goals of projects are also aligned to national policy priorities (such as population ageing or workforce development), it is more likely that other sectors and Ministries might help to build support from central agencies (including Finance Ministries) at Member State-level for the investments proposed. Linking investments in health reforms to EU policy goals, particularly those set out in the ESI Funds Investment Priorities and in the CSRs delivered through the European Semester process is also important to secure political support and can be useful in overcoming resistance at national level.

Using pilots and studies to test and demonstrate the benefits of reform at a smaller scale before scaling up to a broader, possibly national level is an important added-value from the ESI funds. Beneficiaries can test and learn how reforms are best implemented in a local context and take innovative approaches within their projects.

A balance is needed between infrastructure or ‘hard’ investments and ‘soft’ investments such as direct service provision and staff training. The coordination of investments from the ESF and ERDF could further support effective health system reform. In general, ESF investments are less focused on infrastructure and more on soft investments. However, in the case of investments focused on deinstitutionalisation, infrastructure investment will still be needed to support this transition. Both types of investments are needed for ESI Funds to successfully address health inequalities.

# CHAPTER 3: INVESTING IN E-HEALTH TO ADDRESS FUTURE HEALTHCARE NEEDS


**E-health can support EU health systems to address current and future challenges**

Digitalisation can support European health systems to become more effective, sustainable, accessible and resilient. E-health solutions are diverse in their scope and size, with the potential to both reform national health systems and address specific needs at local level[30]. When managed effectively, e-health solutions can increase cost efficiency and help health systems to meet the pressures of an ageing population, limited financial resources and soaring health expenditure[31]. If they are to make a meaningful contribution, however, new digital technologies in the health area need to be designed, implemented and adapted to the needs of citizens and health systems.

Successful deployment of e-health requires investment in infrastructure and human skills, as well as acceptance and trust from citizens and health workers. While digital health data can open countless opportunities for more personalised and better care, it also requires the development of systems that are able to connect to each other, making interoperability a key prerequisite for e-health to benefit EU citizens and health systems. The sensitivity of health information makes the safe storage and management of individuals' medical data one of the biggest challenges facing data-dependent e-health projects. The participation of SMEs in e-health markets is crucial to stimulating digital innovation and spurring regional development.

ESI Funds can help to address some of these challenges. Although e-health has the fewest number of ESI-funded projects (225 of 7,404 projects or around 3%), the average budget per project is relatively high, at EUR 2.7 million. Most of these e-health projects focus on the digitalisation of health records. Here, Member States are at different stages in the digitalisation of their health systems, and ESI Funds are clearly being used as a means of advancing this process. ESI Funds are also supporting e-health projects with other aims, such as boosting the participation of SMEs in e-health, increasing cross-border interoperability for travelling patients, and furthering health innovation.

[30] European Commission, SWD(2018) 126 final, Staff Working Document on enabling the digital transformation of health and care in the Digital Single Market; empowering citizens and building a healthier society.
[31] European Commission, Investments in Health: Policy Guide for the European Structural and Investment Funds (ESIF) 2014-2020, March 2014, p. 13.

### Building secure, data-rich and connected health systems will enable the digital transformation of healthcare in the EU

The EU has been proactive in encouraging the uptake of e-health solutions, notably in its 2005 e-health Action Plan, updated in 2012[32], and 2018 Communication on the transformation of health and care in the Digital Single Market[33,34]. The 2018 Communication identified three main areas for development in e-health: (1) improving citizens' access to and sharing of health data (including across borders); (2) gathering data that can be used to further research, disease prevention and personalised medicine; and (3) putting in place digital tools to empower citizens and increase healthcare accessibility.

Although not explicitly noted in any CSR, e-health has been addressed by some of the Country Reports developed within the European Semester. They report that e-health solutions are being developed or implemented in some Member States, while other countries are encouraged to continue or speed up implementation of e-health systems, noting that delays might be caused by lack of sufficient funding or reluctance on the part of health professionals[35].

### Strategic health and digital policy frameworks can guide the digital transformation of health and care services

A precondition to access ESI Funds for health-related investments is the existence of a coherent health policy framework that identifies priority areas for investment (ex-ante conditionality for health spending during 2014-2020). For e-health another precondition must be met: the Member State must have in place a strategic policy framework for digital growth that covers e-health (ex-ante conditionality 2.1)[36].

Most Member States have adopted OPs supporting e-health through Thematic Objective 2 (Information and communication technologies), Thematic Objective 1 (Research, technological development and innovation) and Thematic Objective 9 (Social inclusion)[37].

## HOW ARE ESI FUNDS USED TO ADDRESS E-HEALTH DURING THE 2014-2020 PERIOD?

### Spending trends: from health system reform to regional innovation hot spots

Only 225 of the 7,404 health projects (around 3%) are related to e-health, the lowest among the health themes covered by this report[38]. E-health projects were found in 19

[32] European Commission, COM(2004) 356 final, e-Health - making healthcare better for European citizens: An action plan for a European e-Health Area; European Commission, SWD(2012) 413 final, Staff Working Document, eHealth Action Plan 2012-2020 Innovative Healthcare for the 21st century. The 2012 Action Plan sets out how e-health can fit into the Europe 2020 Strategy and the Digital Agenda for Europe. It identifies several key areas to exploit the potential of e-health and looks at how Member States can cooperate. These include interoperability of e-health services and systems, developing EU standards, convergence on digital access and digital literacy, and furthering research and development in e-health.

[33] European Commission, COM(2018) 233 final, Communication on enabling the digital transformation of health and care in the Digital Single Market; empowering citizens and building a healthier society.

[34] European Commission, SWD(2018) 126 final, Staff Working Document on enabling the digital transformation of health and care in the Digital Single Market; empowering citizens and building a healthier society.

[35] For details, please see the country factsheets published on the project website: http://www.esifundsforhealth.eu/explore-country

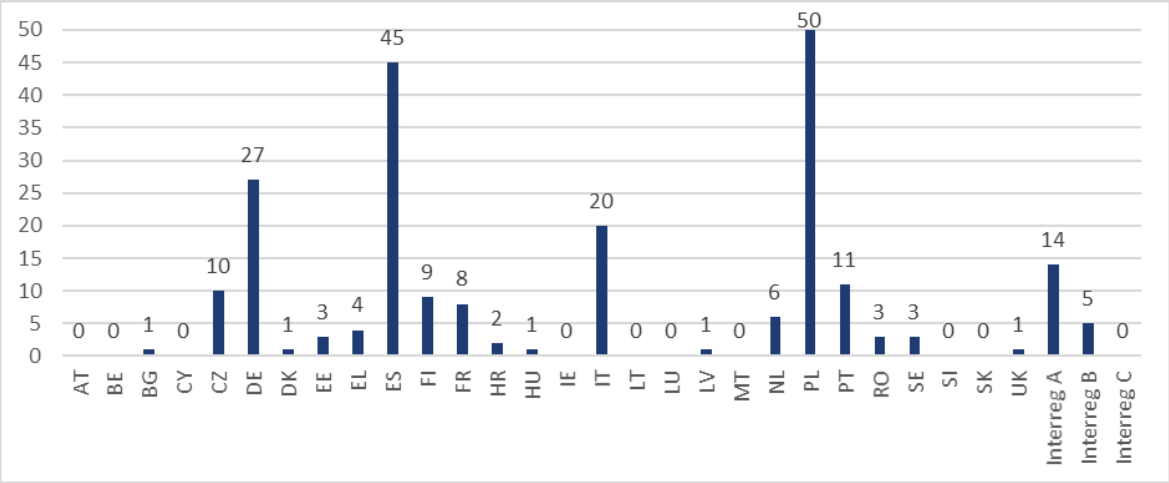
[36] European Commission, Investments in Health: Policy Guide for the European Structural and Investment Funds (ESIF) 2014-2020, March 2014.

[37] European Commission, Investments in Health: Policy Guide for the European Structural and Investment Funds (ESIF) 2014-2020, March 2014. A comprehensive overview of programming related to the e-health projects can be found in the thematic mapping document published on the project website: http://www.esifundsforhealth.eu/explore-health-theme

[38] For details, please see the thematic mapping documents published on the project website: http://www.esifundsforhealth.eu/explore-health-theme

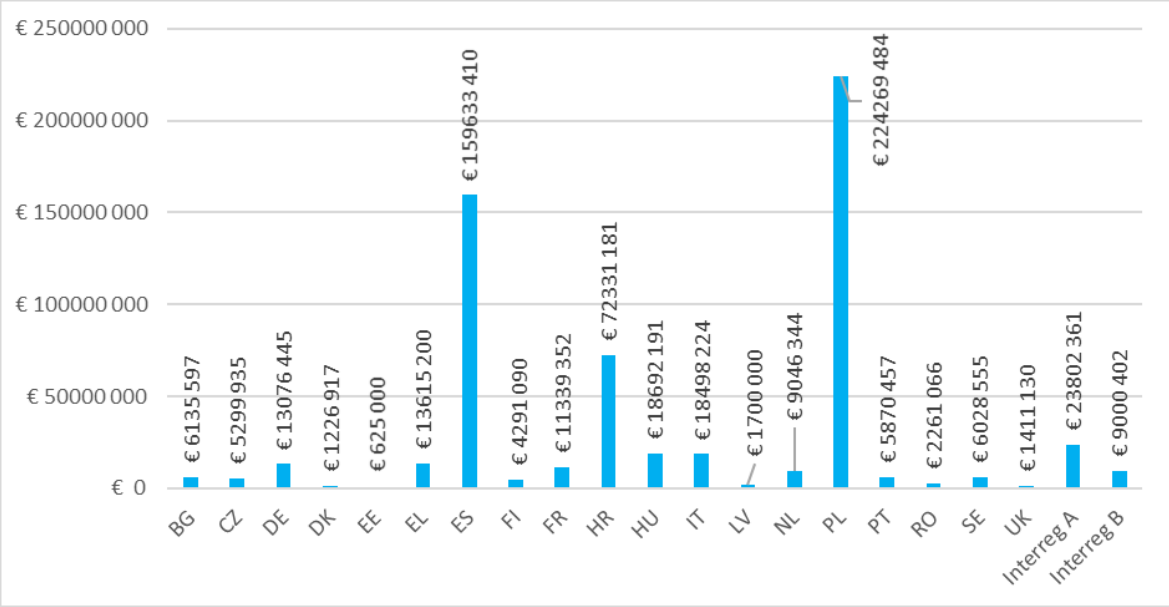
Member States and two Interreg programmes, with Poland and Spain having the highest numbers of projects (see Figure 9 below).

**Figure 9: E-health projects by Member State and Interreg programme**




E-health projects accounted for 7% of all spending, showing that the average budget for e-health projects was higher than some other themes. Just over EUR 600 million is spent on e-health projects (including both co-financing from Member States and the ESI Funds), with an average project budget of EUR 2.7 million[39]. Spain and Poland have the highest spending as well as the greatest number of projects, but spending is also high in Croatia, where the two projects identified were particularly large. Similarly, Hungary has one of the higher budgets allocated to e-health despite having only one such project. Figure 10 below shows each country's spend on e-health projects.

**Figure 10: Total budget for e-health projects for each Member State and Interreg programme**




[39] The median average is EUR 680,000, highlighting the influence of several significant infrastructure projects, including projects in Croatia and Poland with a budget of EUR 70 million and EUR 50 million, respectively.

E-health projects typically target several major issues: (1) development of electronic health records, for use by healthcare professionals and to be accessed by patients; (2) exchange of health information, improving interoperability of health systems; (3) telehealth and (4) mobile health (m-health) services aiming to improve access to healthcare, efficiency and cost-effectiveness of interventions.

Many of the projects with the largest budgets are related to the provision of e-services and the digitalisation of the national health system, in which electronic health records play an integral part. These large-scale projects have a role in reforming the way in which the health system functions. They can also touch on the exchange of health information and all of its preconditions: ensuring data security, compliance with patient confidentiality in handling of data, interoperability of IT systems, and training for professionals on their use. These projects are concentrated in Central, Southern or Eastern Member States where digitalisation has not yet been completed.

Smaller e-health projects can target subjects such as developing technology-human support systems and improving access to healthcare. The following examples give an idea of the diversity of issues addressed[40]:

- In **Hungary**, the National Healthcare Service Centre and the Ministry of Human Capacities have put in place a major project to digitalise the health sector, with a budget of over EUR 18 million. The new system of electronic health records will allow healthcare professionals to connect to a shared database of patients' medical history, as well as allowing patients to access their own information. The system will include e-prescriptions, online appointment booking and e-documentation, with the capability to incorporate new technology when it becomes available.
- In **Sweden**, an university-led project is working to stimulate an e-health market that empowers SMEs to compete with large companies for public procurement contracts by working with healthcare providers, health services and SMEs.
- In **France,** there is a project to create a database of patient records at regional level to facilitate patient identification across different healthcare institutions. The ESI-funded project has attracted interest from other regions in France.
- The topic of e-mental health is addressed through a **North-West Europe Interreg B** project based in the Netherlands. As well as raising awareness about e-mental health, the project supports research, product development and piloting, and communications. Spread across six different countries, it deals with different attitudes to and acceptance of e-mental health issues.
- In the **Central Baltic Interreg A** region, another project has funded the development and deployment of software designed to help children and healthcare providers to better understand children's health and well-being. The project targets children from low-income families in Finland, Latvia and Estonia.
- In **Greece**, several projects are designed to reach vulnerable populations and improve their access to health services. Specific actions include setting up local health centres focused on primary care and using mobile phone applications to inform refugees of their right to healthcare.
- In **Central Europe (Interreg B)**, a cooperative project by a university and a business network aims to reduce fragmentation of the healthcare system by mapping stakeholders and creating links to encourage their cooperation.

**Tracking the outcomes of e-health projects**

[40] For more detail, see the project factsheets published on the project website: http://www.esifundsforhealth.eu/project-database

The common output indicator for health was not used for this e-health projects. Examples of programme-specific indicators used by Member States to monitor the performance of e-health projects are:

- Number of projects for development of e-governance sectoral systems (e-procurement, e-health, e-customs, e-archiving, e-insurance, etc.) (BG).
- Percentage of the population covered by the Digital Health Services of the National Health Service (ES).
- Number of new digital services available to the public in the areas of health and education (FR).
- ICT solutions addressing the healthy active ageing challenge and e-Health services and applications (including e-Care and ambient assisted living) (HR).
- New e-services applications in the areas of health, environment, customs and interdepartmental services (MT).

Very few Interreg Programmes include monitoring indicators. The following examples have been found with relation to e-health:

- Number of tools/instruments to access health and social services on both sides of the border (BE-FR).
- Number of health ICT systems developed (EL-BG).

**ESI Funds can be used to build more open systems for SME innovation, richer research and cross-border cooperation**

Several stakeholders that participated in the workshop highlighted the importance of developing open e-health markets[41]. They pointed out that SMEs currently struggle to compete in public procurement calls dominated by larger companies, despite their potential to contribute to innovation in e-health[42].

A precondition for making the e-health market more open is to improve the interoperability of health systems, potentially also across borders. Interoperability has been identified as a key priority for e-health policy and for government e-services in general, and emphasised in both the 2012 e-Health Action Plan[43] and the 2018 Communication on the future of e-health in the Digital Single Market[44]. More interoperable health systems could help EU citizens and healthcare professionals to access health information when the patient is in another EU country, as well as stimulate health research by giving researchers access to larger datasets. Opening ICT systems to allow different providers to produce apps or services compatible with the system could also widen access to public procurement and create more competition, potentially leading to lower prices and higher quality services.

In its 2017 guidelines for the European Interoperability Framework, the Commission suggested that ESI Funds could be used to support the implementation of the Framework, specifically mentioning the existing opportunities to invest through Thematic Objective 2 (Information and communication technologies) and Thematic Objective 11 (Improving the efficiency of public administration)[45].

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[41] The workshop took place in Budapest on 17-18 September 2018. More information about the workshop can be found on the project website: http://www.esifundsforhealth.eu/workshops.

[42] One of the ESI-funded projects presented at the workshop was working to support SMEs in health by opening the public procurement market (RUVes project from Sweden).

[43] European Commission, SWD(2012) 413 final, Staff Working Document, eHealth Action Plan 2012-2020 Innovative Healthcare for the 21st century.

[44] European Commission, COM(2018) 233 final, Communication on enabling the digital transformation of health and care in the Digital Single Market; empowering citizens and building a healthier society.

[45] European Commission, COM(2017) 134 final, European Interoperability Framework – Implementation Strategy.

In sum, e-health plays a central role in the reform and adaptation of health systems in the Member States and will be essential for any future integration of health and care services across EU borders. ESI Funds already support large-scale projects that digitalise health records to improve access to health data for professionals and patients and smaller projects that encourage technological innovation to improve health services through telehealth and m-health tools. As European health systems become digitalised, open systems that promote interoperability should be prioritised. This would be the basis to further support SME participation in this market, potentially through ESI-funded projects (chiefly guided by the Thematic Objective 3). Facilitating wider competition in the field of e-health should encourage innovation that will improve European healthcare. Cross-border interoperability between EU health systems could improve patients' experiences when in other Member States and provide more comprehensive datasets that serve to accelerate research projects.

## CONCLUSIONS AND RECOMMENDATIONS

The wealth of data and the availability of new technologies to collect, store, analyse and share data offer numerous opportunities for the health field. For these opportunities to materialise, a number of conditions need to exist, including an innovation-friendly environment, a digitally-skilled workforce, and the necessary policies to balance the needs of health systems, health-technology developers, care providers and patients.

Important challenges for the uptake of e-health technologies are the need to secure data, and the need to provide sufficient protection for sensitive health data, in this way fostering the trust of patients, health providers and other users of the e-health system. Hence, data security and data protection are key elements of e-health projects. For instance, projects related to the development of systems for electronic health records, which are one of the most common type of project for e-health, require substantial attention and investments to ensure the protection of privacy and data security. Because of the sensitivity of health data, privacy and data security can pose an obstacle to the deployment of a system, unless these issues have been carefully addressed at the planning and resource allocation stages.

Interoperability of software and applications is a key prerequisite for the scaling-up and ultimate impact of e-health projects. One of the major strengths of e-health projects is that they can be transferred relatively easily to different contexts and places: for example, the structure of an app built for one group of vulnerable people might be transferrable to another group of vulnerable people, with some minor adaptations. Also, these kinds of projects should ensure that their creation can be added to and updated as technology changes, to ensure the sustainability of investment. Interoperability is key to ensure that data can cross-borders, and that fragmentation of data can be avoided.

A good balance is needed between ESI Funds supporting large, comprehensive projects (like the host project, EESZT) and smaller projects developing concrete technological solutions which could potentially be applied across the EU. Projects should be people-oriented rather than technology-oriented. The ultimate objective of all health projects, including the projects focusing on e-health solutions, is to improve health and well-being of the society. On the other hand, in order to promote uptake of e-health solutions, elements of e-health should be integrated in each health-related project.

# CHAPTER 4: FOSTERING INNOVATIVE SOLUTIONS FOR HEALTHCARE


**Regional disparities in research and innovation need to be addressed**

The EU needs to address the gap in research and innovation (R&I) potential between Member States and regions, as well as between the EU and the rest of the world[46]. Despite significant investment in R&I, the EU continues to lag behind the US and Asia in terms of translating basic research into new products and services[47]. Gaps also exist within the EU, with only a handful of countries and regions seen as leading innovators[48]. The EU should tap into the unexploited R&I potential of lagging regions[49] and re-focus R&I efforts on today's social challenges, including health and demographic changes[50].

Health innovation can be defined as the use of new ideas, processes, services or products to improve health-related activities (including prevention, diagnosis and treatment) and health systems, in terms of quality, outcomes and cost-effectiveness[51]. R&I activities can range from breakthrough research to the development of final products and processes and the application of existing solutions to different purposes. These activities are closely linked to, and dependent on, the human capital and infrastructure in the territory in which they take place. Improving the overall environment for R&I is therefore critical for many Member States and regions[52].

Although health innovation is often an important driver of increasing expenditure, it can also contribute to the creation of employment and enhance the competitiveness and cohesion between EU regions and countries. It can also improve the quality, outcomes and cost-effectiveness of health systems[53], e.g. by empowering patients to take care of their own health and increasing the range of issues that can be solved through primary care[54].

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[46] European Commission, Regional Innovation Scoreboard 2017, p. 4.
[47] European Commission, Draft Thematic Guidance Fiche for Desk Officers, Research and Innovation, 2014.
[48] European Commission, Regional Innovation Scoreboard 2017.
[49] European Commission, State of the Innovation Union, 2015.
[50] European Commission, Europe 2020, COM(2010) 2020, A European strategy for smart, sustainable and inclusive growth.
[51] Omachonu, V.K. & Einspruch, N.G., Innovation in Healthcare Delivery Systems: A Conceptual Framework, *The Innovation Journal: The Public Sector Innovation Journal*, Volume 15(1), Article 2, 2010.
[52] A review of the 2015-2018 country reports and CSRs found that some countries have received recommendations to increase the intensity of public R&I, improve the quality of R&I and enhance the translation of research into innovation output, and to foster cooperation between business, academia, public and private partners. For details, see the country factsheets published on the project website: http://www.esifundsforhealth.eu/explore-country
[53] European Commission, SWD(2013) 43 final, Staff Working Document, Investing in Health, 'Towards Social Investment for Growth and Cohesion – including implementing the European Social Fund 2014 – 2020'.
[54] European Commission, The State of Health in the EU: Companion Report 2017, p. 24.

Specific innovations in active and healthy ageing, anti-microbial resistance (AMR), mental health and neurodegenerative diseases are central to addressing these emerging challenges for EU health policy[55].

A large number of projects are supporting R&I in health (1,708 of 7,404 projects, around 23%). This corresponds to a large portion of the overall spending for this period (approximately EUR 1.8 billion). The majority of these projects focus on innovation in products and processes but there are also projects developing innovative care models, supporting clinic-industry collaboration, R&I infrastructure and human resources.

The ESI Funds offer many opportunities to support health innovation, from the development of particular products to the enhancement of R&I infrastructure and the wider innovation environment. Investments can be made mainly through the Thematic Objective 1 (Strengthening research, technological development and innovation) and Thematic Objective 3 (Enhancing the competitiveness of SMEs)[56].

Most Member States have adopted OPs that support health innovation through these broader objectives, as well as through Investment Priorities related to ICT development (Thematic Objective 2)[57]. ESI Fund support for R&I must be in line with the regional or national smart specialisation strategies (RIS3), which is an ex-ante conditionality (i.e. a precondition for receiving financial support from the ERDF). By enabling each region to identify and develop its own competitive advantages, RIS3 aim to boost growth and jobs, and promote the creation of R&I clusters. To date, many RIS3 have identified health as a key area for specialisation[58]. In addition to the ESI Funds, Horizon 2020 (H2020) is another major funding source for R&I (see the box below for details on each).

**Supporting R&I investment with ESI Funds and H2020**

Although both ESI Funds and H2020 can support R&I activities, each has a distinct focus:

- **Different scope**

H2020 prioritises transnational projects and rewards excellence and innovation, while the ESI Funds aim to support the harmonious development of Member States and regions, and prioritise the improvement of R&I capacities and ecosystems to promote regional growth.

- **Different management**

H2020 is centrally managed at EU level, with funds directly awarded to final beneficiaries. The ESI Funds are under shared management, with each Member State or region allocating funds in its own territory.

[55] In line with other EU initiatives (e.g. the European Innovation Partnership on Active and Healthy Ageing) and policy documents (e.g. Action Plan against Anti-microbial Resistance, Public Health Strategies on neurodegenerative diseases and European Pact for Mental Health and Well-being).

[56] European Commission, Investments in Health: Policy Guide for the European Structural and Investment Funds (ESIF) 2014-2020, March 2014.

[57] A comprehensive overview of programming related to the R&I can be found in the thematic mapping document published on the project website: http://www.esifundsforhealth.eu/explore-health-theme

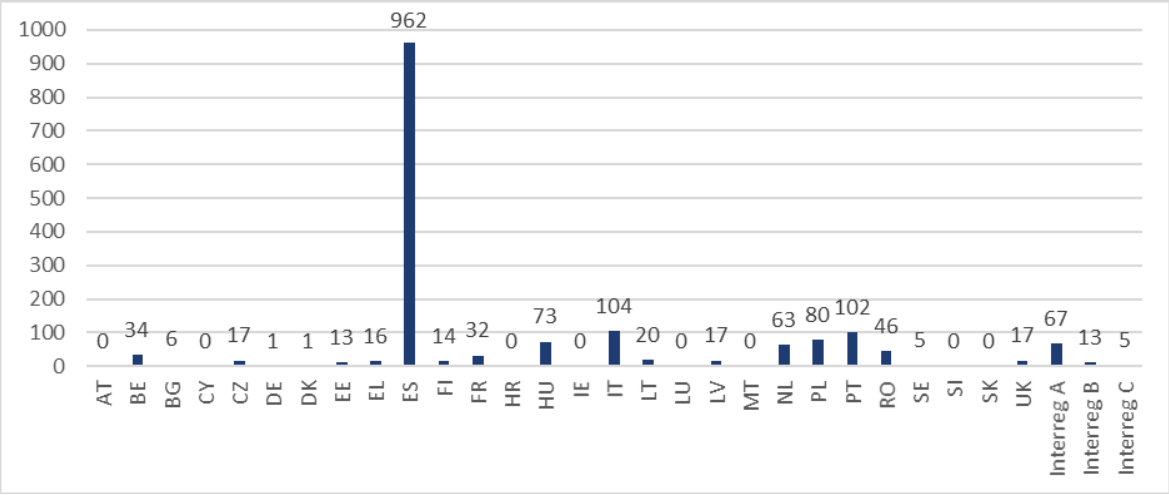
[58] European Commission, Perspectives for Research and Innovation Strategies for Smart Specialisation (RIS3) in the wider context of the Europe 2020 Growth Strategy, 2015.

## HOW ARE ESI FUNDS USED TO SUPPORT HEALTH INNOVATION DURING 2014-2020?

### Spending focuses on the development of new products and processes

Midway through the 2014-2020 funding period, 1,708 projects in 20 Member States have been funded in support of health innovation and R&I in health[59]. Over half of these projects (56%) are in Spain, followed by numerous others in Italy, Portugal and Poland. Many relevant projects are also financed under the three Interreg cooperation programmes. Further details are presented in Figure 11 below.

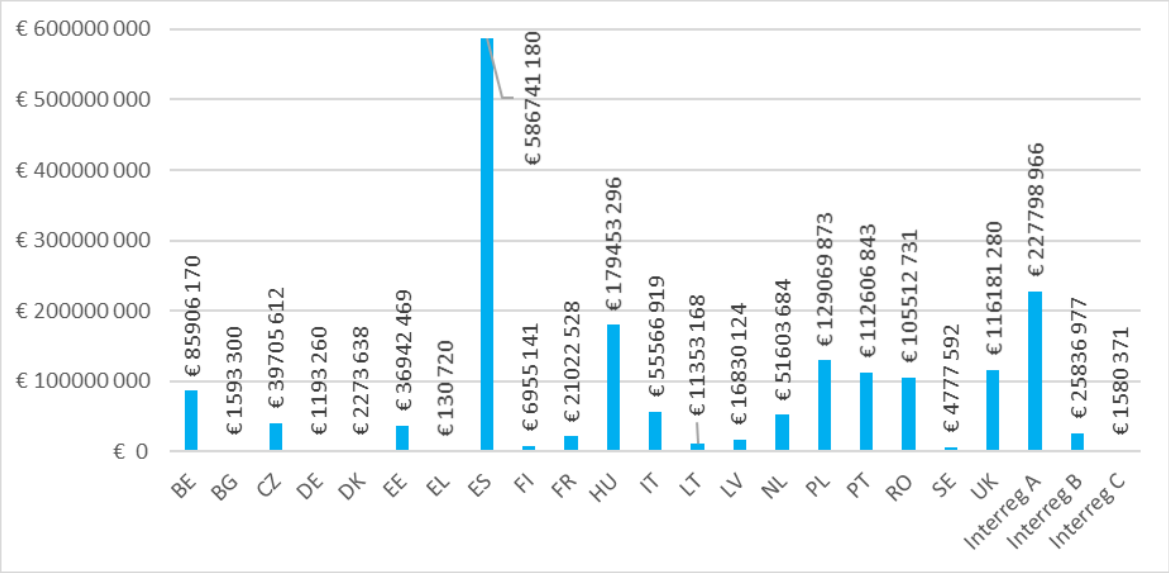
**Figure 11: Health R&I projects by Member State and Interreg programme**




In terms of actual spending on health innovation projects, the picture varies considerably by Member State. The total budget of the R&I projects identified is approximately EUR 1.8 billion, while the average project budget is approximately EUR 1 million. Spain shows significantly larger spending on R&I health projects (around EUR 587 million), as do the Interreg programmes (in total around EUR 255 million across the three strands). Hungary follows, with spending on R&I health projects of around EUR 179 million, followed by Poland (around EUR 129 million) and the UK (approximately EUR 116 million). Figure 12 below shows the total expenditure (EU funds and any Member State co-financing) for health innovation projects.

[59] For details, see the thematic mapping documents published on the project website: http://www.esifundsforhealth.eu/explore-health-theme

**Figure 12: Total budget of health R&I projects by Member State and Interreg programme**




Note: Budget information was available for 1,700 of the 1,708 relevant projects.

The vast majority of the health R&I projects target innovation in products and processes at different phases of research and development and with different technology readiness levels (TRLs). Some projects target the development of R&I capacities and environments by supporting research infrastructure, clinic-industry collaboration and human resources in the R&I field. Another group of projects aim to address key health and societal challenges such as the ageing of the population, through R&I of new and changing care models.

There are no significant differences between the types of projects supported by Member States[60], with most focusing on the development of new products or processes (e.g. in **Spain, Italy, Portugal and Poland**). For instance, the Fast Breast check project in **Italy** is developing an improved medical device to support better screening of breast cancer. Of the countries with greatest numbers and spending on R&I projects, only **Hungary** shows R&I projects primarily addressing research infrastructures development. In the **Netherlands**, the COILED project is providing a platform to speed up the discovery of drug candidates by connecting academic and industry research. In **Romania**, the AgeWell project is bringing together an interdisciplinary team of experts (experts in medical robotics, neurologists and physiotherapists) to create a rehabilitation pole to support elderly people.

Considerable contribution to health innovation comes from the **Interreg programmes,** which tend to support the largest health R&I projects (with average budgets of EUR 3 million). The majority of these projects targets the development of new products or processes (e.g. application of 3D technology for imaging in the treatment of kidney cancer in children, development of new tools for early cancer detection, research into the spreading and protection against AMR) and care models (e.g. application of new technologies for improved care or provision of services to the elderly). Some Interreg projects also support the development of research infrastructure in general.

**Measuring the outcomes of research and innovation projects**

[60] For more detail, see the project factsheets published on the project website: http://www.esifundsforhealth.eu/project-database

The common output indicator for health services was not used for this theme. Examples of programme-specific indicators used by Member States to monitor the projects are:

- Piloted products and services which have been developed in the innovation platforms (FI).
- Number of implemented instruments supporting the inclusion of disable people in the labour market (PL).
- Professional publications (CZ).

Very few Interreg Programmes include monitoring indicators. The following four examples have been found with relation to R&I:

- Population covered by cross-border initiatives in the fields of employment, training, culture, sport and health (ES-PT POCTEP).
- The annual number of peer reviewed journal and conference publications in two target sectors (Health and Life Sciences and Renewable Energy) with cross-border authorship and with the potential to create economic impact(UK-IE Northern Ireland-Ireland-Scotland).
- Develop new cross-border area interventions to support positive health and wellbeing and the prevention of ill health (UK-IE Northern Ireland-Ireland-Scotland).
- Beneficiaries supported by new cross-border area initiatives for positive health and wellbeing and the prevention of ill health (UK-IE Northern Ireland-Ireland-Scotland).

**Better synergies are needed between the ESI Funds and H2020 at the strategic level**

It is important to ensure that EU funding instruments for R&I – especially the ESI Funds and H2020 – are complementary at a strategic level and that they adequately address R&I needs in the EU. Synergies between the ESI Funds and H2020 are crucial to:

- The sustainability of the activities after the funding stops – innovation should be supported along the whole process (from concept through research to commercialisation). Combining H2020, which focuses more on concept development, and the ESI Funds, which can support projects closer to market, is key to ensuring project longevity[61].
- The closure of the R&I gap between EU regions – H2020 funding (including for health projects) tends to go to high-performing regions, thus the ESI Funds need to provide balance by supporting other regions and projects through initiatives such as the Stairway to Excellence or the Seal of Excellence[62].
- The achievement of the smart specialisation strategies (S3) while addressing societal challenges in the EU - the potential of national and regional S3 to contribute to regional development could complement the focus of H2020 on central societal challenges. Options for the ESI Funds to complement other R&I financing instruments could be further clarified.
- Stakeholder awareness of all funding options for R&I – there are numerous EU financing opportunities for R&I projects and stakeholders should have easy access to such information. For example, local one-stop shops could provide guidance for potential beneficiaries about all possible funding options available to them. Ensuring that the EU funds reach more projects and support R&I in all regions could be enhanced by bundling similar projects to reduce the number of small isolated projects, or facilitating information exchange across regions and countries. This would require

[61] European Commission, Enabling synergies between European Structural and Investment Funds, Horizon 2020 and other research, innovation and competitiveness-related Union programmes, Guidance for policy-makers and implementing bodies, 2014, p. 12.

[62] The Seal of Excellence initiative provides ESI funding for H2020 proposals that were deemed excellent but not funded for reasons of competition, while the Stairway to Excellence initiative focuses exclusively on supporting R&I projects from EU-13 Member States.

stakeholders to have comprehensive information about R&I projects with similar topics or activities, which is not yet easily accessible.

**Strategic documents can explicitly target R&I in health**

Clear links to local health and S3 could facilitate more effective use of ESI Funds to support health innovation. In some areas, strategic documents contain no specific objectives for R&I in healthcare, resulting in a project-based approach of proposing and selecting research ideas for ESI funding. In particular, regional and national RIS3 could further support the identification of priority areas for investment, including health. Currently, many regions and countries have strategies that are too general to provide such guidance, thus identifying specific areas could facilitate more targeted investment and help to monitor the long-term impact of R&I projects on health. In addition, the opportunities for social innovation should be explored and promoted in strategic documents in order to stimulate the development of such projects alongside traditional R&I product and process projects[63].

**Efficient management of ESI-funded R&I projects should be facilitated**

Challenges for R&I projects sometimes stem from the set-up and procedures linked to ESI Funds. Balancing administrative responsibilities and research efficiency is a common challenge for ESI-funded R&I projects, while the extent of administrative burden can vary significantly, depending on the Managing Authority. The thematic workshop revealed this to be a particular concern for beneficiaries from research centres and academia. One possible remedy might be a Commission-issued template setting out general rules for reporting.

Managing different stakeholders with potentially contradictory incentives and motivations (e.g. academia, research institutions, businesses, SMEs) can also be a challenge for ESI-funded R&I projects. While the involvement of diverse stakeholders in innovation projects is critical to their success, cooperation between public and private organisations poses important questions. Private companies' concerns about their intellectual property rights to the outcome of research often complicates collaboration between public and private partners. Engaging SMEs to participate in research projects can also be challenging, as, given the state aid rules applying to ESI Funds, SMEs often have little incentive to participate in R&I projects. More detailed EU guidelines on the procedures for providing ESI Funds for R&I to different entities would be useful, possibly with links to other relevant financing instruments such as EIB loans.

**The specific challenges relating to health R&I should be adequately considered**

Health R&I is impacted by its own set of specific challenges. Compared to other areas, the development of new products and processes in the health sector is often more complex and costlier, frequently taking longer to reach patients and other users. Their high cost and lengthy development make health innovation heavily reliant on healthcare systems that are accessible, affordable and sustainable. Due to their complexity, health R&I often require substantial investments and meaningful collaboration and coordination across a wide range of participants, including the public and the private sector (e.g. collaboration between universities, public research centres, hospitals and the private industry). Regulations - including legal, ethical and regulatory requirements relating to the safety and quality of health products and to patients' needs – means that health R&I usually requires a long time between development and commercialisation.

Beneficiaries of ESI-funded health R&I projects therefore need to navigate a complex landscape, and Managing Authorities should better support them to comply with all

[63] European Commission, Guide to Social Innovation, February 2013, pp. 21-47.

administrative, legal and ethical requirements consistently. For instance, the development of new products (e.g. drugs, medical devices, treatments) requires the recruitment of patients for clinical trials. However, engaging patients or patient organisations can be a lengthy process, incurring additional delays and costs that other R&I projects might not encounter.

## CONCLUSIONS AND RECOMMENDATIONS

The ESI Funds remain an important source of support for R&I projects, including in the area of health. Their broad scope allows the financing of specific innovations (e.g. development of new products, processes and services), as well as R&I infrastructure and cross-border cooperation in research.

Nevertheless, there is scope for improvement. For instance, enhancing the synergies between different financing instruments for R&I (e.g. ESI Funds, Horizon 2020 and other EU and national funds) could help to support health R&I activities throughout the lengthy and costly innovation process until innovations are ready to enter into the market. Allowing for the sequential, parallel and complementary use of funds to support R&I projects is one of the possible ways to enhance synergies between the funds. ESI Funds can also directly contribute to closing the innovation gap between regions and countries by funding projects that were shortlisted for Horizon 2020 but could not be funded under this program due to budget constraints – for instance by strengthening the Stairway to Excellence programme.

There is also scope to improve the design of RIS3 so that they can better match the needs and opportunities available for health R&I, including the development of public-sector, as well as user-centred and social innovation. The process of early consultation of stakeholders ('entrepreneurial discovery process') could be further strengthened to define the RIS3 in a way that better reflects the competitive advantages of countries and regions in terms of research and innovation. This would facilitate the identification of particular areas in which the industry and the public sector can more effectively participate in research and innovation activities.

# CHAPTER 5: INVESTING IN THE FUTURE THROUGH PREVENTION


**Health promotion and disease prevention are cost-effective and counteract social isolation**

Non-communicable or chronic diseases are a leading cause of mortality and a growing burden in Europe[64]. This trend is closely linked to the EU's ageing population. There is significant evidence to suggest that health promotion and disease prevention should be prioritised to address this increasing burden[65].

Health promotion enables people to increase control of their own health and its determinants, i.e. the conditions in which people are born, grow, work, live, and age, and the wider forces shaping daily life conditions[66]. Disease prevention aims to address risk factors and thereby minimise the burden of diseases. Healthy ageing complements these approaches by addressing specific issues. Health and safety at work are essential to prevent disease and promote health in the workplace. Taken together, these elements aim to change the emphasis from cure to prevention and from patient treatment to holistic health promotion for all individuals.

The widespread adoption of health promotion and disease prevention programmes also has important implications outside of the healthcare sector. In terms of employment and productivity, for example, keeping the workforce healthy and happy is essential for future prosperity and growth. Similarly, its implied social cohesion, particularly the reduction of social exclusion and isolation, is vital for stronger communities, towns, and cities.

Health promotion and disease prevention are at the forefront of budget pressures for EU countries. Several CSRs within the European Semester have focused on the need to improve the functioning of labour markets by ensuring higher participation and better employability of older workers and other disadvantaged groups. Other recommendations have focused on the need to improve the overall conditions that allow people to enter or stay longer in employment (e.g. persons with disabilities, parents with young children, elderly people)[67].

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[64] WHO Europe, Non-communicable Diseases website.
[65] Rutter, H., Savona, N., Glonti, K., Bibby, J., Cummins, S., Finegood, D. T., & Petticrew, M., The need for a complex systems model of evidence for public health, *The Lancet*, 390(10112), 2017, pp. 2602-2604.
[66] Graham, H., & White, P. C. L., Social determinants and lifestyles: integrating environmental and public health perspectives, *Public Health*, 2016 December, 141, pp. 270-278.
[67] A review of the 2015-2018 country reports and CSRs found that at least 10 Member States need to pay particular attention to issues of employability and the conditions in the labour market. For more detail, see the country factsheets published on the project website: http://www.esifundsforhealth.eu/explore-country.

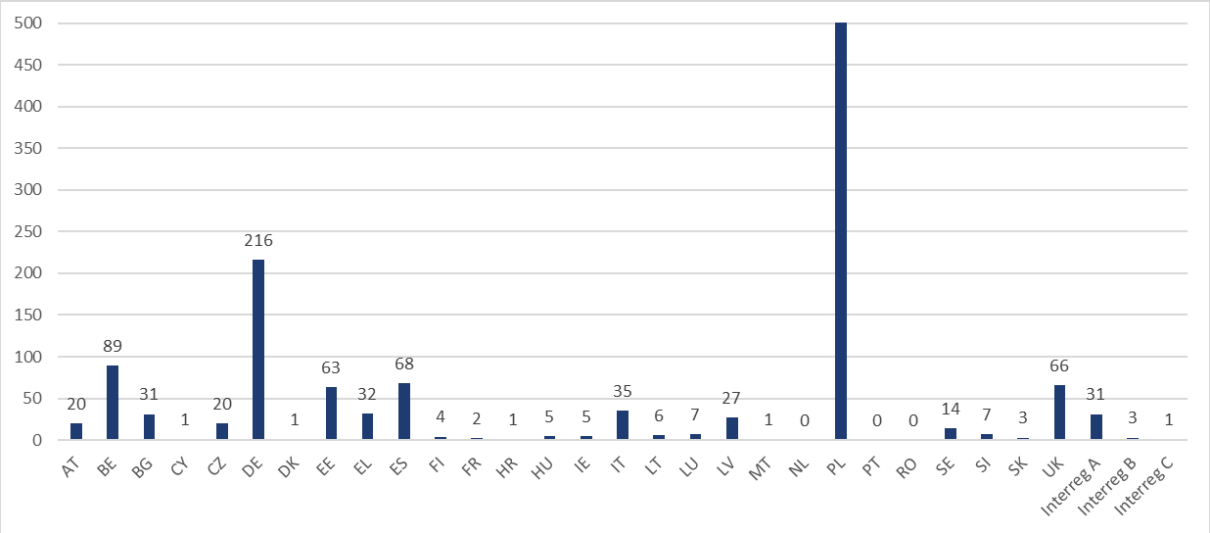
Despite the strong case for more investment in health promotion, public spending remains insufficient across the Member States[68]. The number of ESI-funded projects is greatest in this theme, with 2,535 of 7,404 projects (around 34%), possibly reflecting the call for more investment. The ESI Funds can support this theme chiefly through Thematic Objective 9 (social inclusion), followed by Thematic Objective 8 (employment) and Thematic Objective 10 (education)[69]. Member States have included health promotion projects in their OPs by setting investment priorities that focus on social integration and improvements in the labour market[70].

## HOW ARE ESI FUNDS USED TO SUPPORT HEALTH PROMOTION AND HEALTHY AGEING DURING THE 2014-2020 PERIOD?

### ESI Funds support disease prevention and cross-sectoral interventions to improve employability

Midway through the 2014-2020 programming period, 2,535 projects in 25 Member States support health promotion, healthy ageing and workplace health and safety[71]. Although this theme has the greatest number of projects (34% of the total), their small average budgets (around EUR 0.8 million) means that they account for only 24% of total budget. More than half of the projects (70%) are in Poland, followed by Germany, Belgium and Spain. Interreg programmes support 35 projects in this theme, as shown in Figure 13.

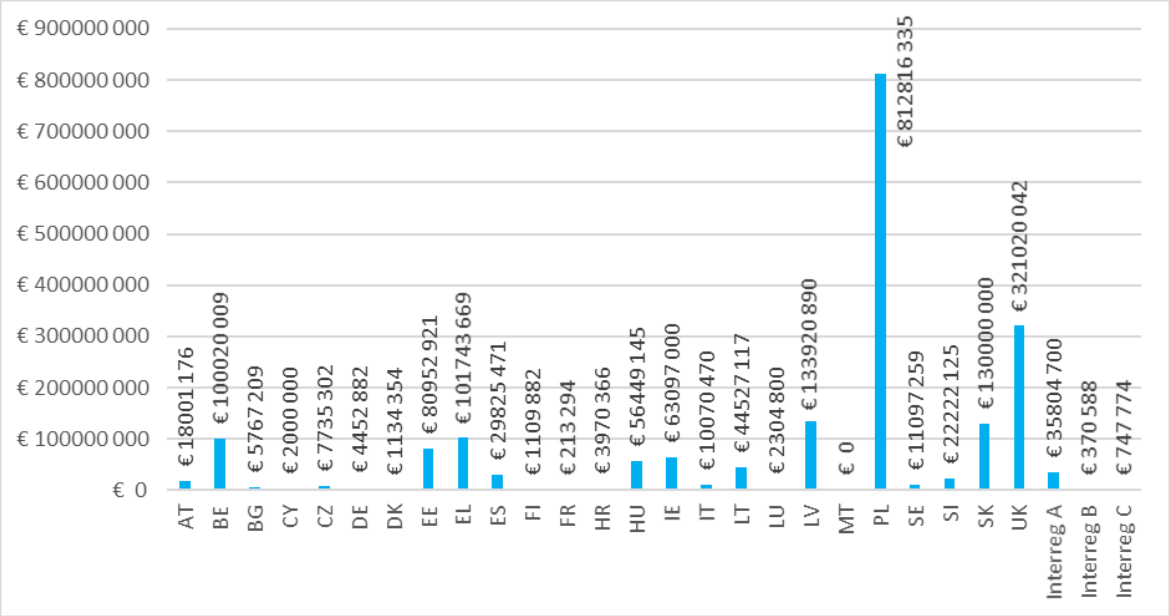
**Figure 13: Health promotion projects by Member State and Interreg programme**




The largest spending on health promotion projects (including Member State co-financing) was observed in Poland, followed by the UK and Latvia. The total expenditure for all projects in the theme is approximately EUR 2 billion, as shown in
Figure 14 below.

[68] European Commission, State of Health in the EU, Companion Report 2017, p. 18.
[69] European Commission, Investments in Health: Policy Guide for the European Structural and Investment Funds (ESIF) 2014-2020, March 2014.
[70] A comprehensive overview of programming related to health promotion can be found in the thematic mapping document published on the project website: http://www.esifundsforhealth.eu/explore-health-theme.
[71] For more detail, see the thematic mapping documents published on the project website: http://www.esifundsforhealth.eu/explore-health-theme.

**Figure 14: Total budget of health promotion projects by Member State and Interreg programmes**




Note: Information about the project budget was not available for the project in Malta. Overall, budget information was not available for 80 of the 2,535 projects.

The average budget of projects also varied across Member States. Larger projects are mostly found in Slovakia, Ireland and Hungary, where the average health promotion project budget exceeds EUR 10 million. Although many health promotion projects are funded in Germany, their average budget is below EUR 25,000.

**ESI Funds address a broad range of issues, combining health with employability and social integration**

The spending trends suggest that Member States are using ESI Funds in this theme primarily to support employability and social integration, with most projects targeting the reintegration of unemployed persons into the labour market. While these projects are not strictly health-oriented, they indirectly contribute to health objectives by supporting social inclusion of the elderly or people with disabilities.

Although fewer projects directly target health promotion and disease prevention, these are often large-scale national or regional interventions covering an array of implementation techniques: screening, awareness and education relating to various risk factors, and promotion of a healthy lifestyle. Another group of projects focus on early detection of diseases, primarily cancer. There are also training initiatives to build capacity for health promotion and disease prevention across health and non-health sectors.

The broad nature of projects in this area is reflected in the diverse approaches of Member States. These include programmes on substance abuse, healthy lifestyle campaigns that emphasise the importance of physical activity and good diet, solutions to care for the elderly and/or people with disabilities, and programmes to support the needs and abilities of disadvantaged jobseekers[72].

- In **Croatia**, the Institute of Public Health is leading an EUR 4 million project (Healthy Living) to improve the health of the population by reducing behavioural, biomedical

[72] For more detail, see the project factsheets published on the project website: http://www.esifundsforhealth.eu/project-database

and socio-medical risk factors through the creation of supportive environments enabling good health and quality of life for its citizens. In particular, the project aims to improve knowledge of and attitudes to the importance of healthy nutrition and physical activity in preventing obesity and excess weight.

- The **France-Spain Interreg A** (Capas-Cité) project (with a budget of EUR 2.7 million) unites two universities to implement an ESI-funded project to improve the health of underprivileged groups, specific vulnerable groups (obese people) and young people (pupils and students) through physical activity. The project aims to create a new cross-border health infrastructure, together with a programme to support physical activity in the targeted groups across two border cities: Tarbes in France and Huesca in Spain.
- In **Slovenia**, an EUR 6 million project (Responsible approach to alcohol use, SOPA) aims to establish an interdisciplinary approach for screening and intervention relating to harmful alcohol-drinking among Slovenian adults. The project builds capacity for health professionals and social workers. It also targets media representatives to promote responsible coverage of alcohol consumption in order to effect cultural change around alcohol misuse. A similar project in **Estonia** (Soberer and healthier Estonia) is providing healthcare and support services for the prevention and treatment of alcohol misuse.
- In **Latvia**, the 'Complex health promotion and disease prevention measures' project aims to improve the availability of health promotion and disease prevention services by implementing local measures to promote healthy nutrition, physical activity, mental health and sexual and reproductive health, as well as to reduce consumption of addictive substances. The implementation of these local projects is an initiative of the Ministry of Health in collaboration with the municipalities.
- In **Poland**, the 'Green care farms' project implemented by the Kujawsko-Pomorski Agricultural Advisory Centre established 15 green care farms, providing care and daily activities for dependent persons (e.g. elderly people and people with disabilities). The main goal of the project is to increase the availability and diversity of care services in rural areas while providing further qualifications for caregivers and tutors (volunteers).
- In **Austria**, the project 'Vienna job exchange' provides counselling and support for long-term unemployed persons with drug addiction issues, with the aim of sustainable reintegration into the regular or subsidised labour market. Although the primary focus is on professional reintegration and qualification, promoting overall fitness and ability to work is intrinsically linked to general health.
- In **Luxembourg**, the 'Empowering careers and employability – OPECE' project aims to help young people with autism to find employment. Project activities chiefly consist of drafting tailored action plans ('employability reports') for young individuals. The form of assistance is adapted according to the needs and abilities of the jobseekers. The assessments conducted for these reports have outcomes such as personalised job search strategies or participation in protected workshops.
- In the **Central Baltic Interreg A** programme, the 'Let us be active!' project promotes the social activity of seniors as volunteers in the cities of Pärnu, Riga and Turku. The project cooperates with healthcare professionals and social workers to promote senior volunteering as a means of social inclusion for older city residents. The project stimulated the development of new volunteering activities for seniors, such as Senior Volunteering Call Centre in Riga and Trip Friend Activity in Turku, which have become very popular among older city populations.
- In **Sweden**, the Sundsvall Municipality project, 'Sustainable working life' focuses on promoting health and preventing illness through training and certification for trainers in the fields of safety, health and gender equality. The project focuses on health promotion measures and aims to develop skills to increase awareness about the relationship between work and health. A key element of the project is educating coaches in 'health, work environment and equality' to then become a permanent resource in the municipality.
- Under the **Baltic Sea Interreg B programme**, the 'BaltCity Prevention' project (EUR 2.7 million) focuses on developing new technologies for use in planning and developing

prevention measures. A co-creation process and user participation are important elements of this new intervention model. The prevention measures are offered by public health authorities (e.g. healthcare and social departments in municipalities) and target people with different health issues.

**Indicators used for ageing and health promotion projects**

The common output indicator for health was used only in two Member States (BG and EL) for this theme. Member States defined several programme-specific indicators to monitor the performance of the ageing and health promotion projects. These indicators typically refer to the number of participants in health programmes or number of such programmes. Examples of programme-specific indicators used for this theme by Member States are:

- Unemployed persons over the age of 50 participating in employment programmes (BE).
- Disadvantaged participants who after their participation in the process of education/ training, are looking for a job, broaden their skills or are employed (CZ).
- Number of people who have received services aimed at reducing alcohol consumption (EE).
- Number of awareness raising activities/ public campaigns (HR).
- Share of persons from target groups with changed lifestyles for health purposes as a result of ESF-supported public awareness-raising, education and training activities (themes: healthy lifestyles, health preservation and promotion, disease prevention) (LT).
- Number of enterprises supported in hazardous industries that have implemented labour protection requirements (LV).
- Number of implementations of analytical models for the protection of health essential for the correct process of mapping the needs in the health sector (PL).
- Share of participants not included in institutions upon leaving (SI).

Very few Interreg Programmes include monitoring indicators. The following examples have been found with relation to ageing and health promotion:

- Number of tools/instrument to access health and social services on both sides of the border (BE-FR).
- Number of projects addressed to disadvantaged people: young, elderly and vulnerable population groups (BE-DE-NL).
- Number of projects to improve cross-border cooperation in the field of health (BE-DE-NL).
- Population covered by cross-border initiatives in the fields of employment, training, culture, sport and health (ES-PT).
- Number of tools for monitoring, information and prevention of natural, environmental (pollution) and health risks; Number of collaborative research projects on epidemiological and infectious risks; Number of researchers working on collaborative projects on epidemiological and infectious risks (Indian Ocean Sea).

**More cross-sectoral integration, sustainability and long-term planning are needed**

ESI Funds have made an important contribution to health promotion and disease prevention, supporting programmes that target population level changes, ageing issues, and workplace health and safety. Discussions during the thematic workshop highlighted several areas requiring the support of ESI Funds to alleviate the burden of chronic diseases and improve the lives of EU citizens. More and better links to other policy sectors, streamlined administration, financial complementarity and sustainability, and capacity development were recurrent themes during these discussions.

Multi-sectoral collaboration is essential for interventions addressing the social determinants of health. Including health in all policies requires all actions implemented in different areas to pay attention to the protection of health as enshrined by Article 9 of the Lisbon Treaty ('in defining and implementing its policies and actions, the Union shall take into account requirements linked to the […] protection of human health'). Such an approach would allow for systematic consideration of health implications during policy-making. Addressing complex risk factors such as tobacco and alcohol consumption, obesity and excessive weight requires health promotion interventions to be complemented by government policy in other areas, e.g. taxation, and consumer policy[73].

A key requisite for smart investment is the ongoing availability of up-to-date information on best practice in health promotion and disease prevention. For example, the 'EU Best Practice Portal[74]' for good and best practices, co-funded under the Health Programme, and the 'Health Promotion and Disease Prevention Knowledge Gateway[75]' are two initiatives that could be more effectively integrated with ESI-funded projects.

**ESI Funds can complement limited national budgets**

In spite of the increasing emphasis on health promotion initiatives, healthcare budgets in many Member States are not able to adequately cover the needs of an ageing population, risky lifestyle behaviours and the rising costs of chronic disease. Frequently, ESI Funds have helped national and regional authorities to implement projects that could not be funded from national sources. The ESI Funds were seen as a means of engaging national governments or implementing innovative approaches.

Cohesion Policy will remain one of the main instruments of support in the future EU Multiannual Financial Framework post-2020. Health promotion and disease prevention must be highlighted among the priority goals for the health sector and incorporated into the assessment and recommendations within the European Semester process. At the same time, health promotion and disease prevention should be included and considered at all levels of policy-making.

## CONCLUSIONS AND RECOMMENDATIONS

Multi sectoral collaborations are key for interventions related to healthy ageing, health promotion and disease prevention. Many ESI funded build upon already established inter-sectoral cooperation and well developed multi-sectoral competences. Previously established networks of relevant stakeholders with participatory engagement of stakeholders in the action planning that defines the responsibilities with established strategic frameworks is essential to successful projects.

There is an urgent need for more international or cross-border cooperation in health promotion programmes to overcome silos and link health interventions to interventions in other sectors. This also requires linking a whole range of different stakeholders to the same action, inter alia, by sharing experiences, capacity-building, and supporting public institutions to carry out the work.

Importance is growing for health promotion across EU Joint Actions programmes. The ESI funds have a key role to reduce health inequalities and new life burdens. More information and coordination between ESI funded projects and other EU programmes and initiatives could enhance synergies and improve the outcomes of projects.

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[73] European Commission, State of Health in the EU, Companion Report 2017, p. 19.
[74] https://webgate.ec.europa.eu/dyna/bp-portal/
[75] https://ec.europa.eu/jrc/en/health-knowledge-gateway

# CHAPTER 6: PLANNING AND BUILDING A STABLE AND RESILIENT HEALTH WORKFORCE


**The challenges of workforce shortages, recruitment and retention, distribution and planning need to be addressed**

Europe needs a stable and resilient workforce capable of supporting modern and effective health systems. The healthcare workforce is diverse and includes health professionals (e.g. doctors, nurses, dentists, midwives, pharmacists) as well as public health professionals, health management and administrative and support staff[76]. Demand for healthcare has increased as a result of demographic changes in Europe's population, an ageing workforce, and recruitment and retention difficulties. Many Member States also face considerable migration among young health professionals and imbalances in the geographical distribution of health workers. Technological changes, evolving patient needs and new and re-emerging threats to health (e.g. communicable diseases) require specific skills[77]. All of these factors contribute to significant vulnerabilities in the European health workforce, in terms of both numbers and skills. Around half of Member States need to pay particular attention to this issue as part of the European Semester and structural reforms linked to creating jobs and growth in line with EU 2020 priorities[78].

The number of ESI-funded projects addressing the health workforce is relatively low (275 of 7,404 projects, around 4%) although these projects have quite large budgets (around EUR 3.6 million on average). Projects tend to target education and training, either to allow medical professionals to finish their education and practical training or to support continuous professional development. While workforce planning – the data collection and capacities required to understand, project and plan to meet future workforce needs – is an important policy priority, no projects directly tackling this issue have been funded. Other strategic issues such as workforce retention strategies have been directly addressed by a limited number of projects funded to date.

The ESI Funds offer many opportunities to address these issues, mainly through Thematic Objectives 8 (Employment and labour mobility) and 10 (Education, skills and lifelong

[76] European Commission, SWD(2012) 93 final, Staff Working Document, Action Plan for the EU Health Workforce.
[77] European Commission, COM(2008) 725 final, Green Paper On the European Workforce for Health; Joint Action Health Workforce Planning and Forecasting, Final Guide of the Joint Action on Health Workforce Planning and Forecasting.
[78] A review of the 2015-2018 country reports and CSRs found that around half of Member States (mostly Member States in Central and Eastern Europe) need to pay particular attention to this issue. For details, see the country factsheets published on the project website: http://www.esifundsforhealth.eu/explore-country

learning)[79]. Most Member States have adopted OPs containing priorities and objectives that allow for spending on the health workforce, although projects generally need to have an employment or education angle in order to receive funding through these programmes[80].

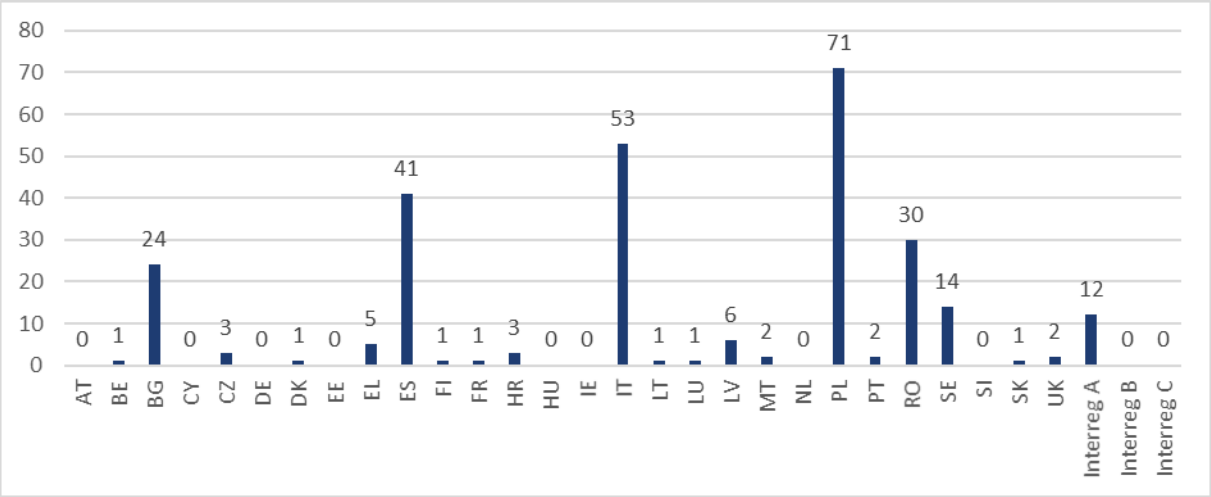
## HOW ARE THE ESI FUNDS USED TO ADDRESS HEALTH WORKFORCE CHALLENGES IN THE PERIOD 2014-2020?

### Spending focuses on training and workforce supply

Midway through the 2014-2020 funding period, 275 projects supporting the health workforce have been funded, across 20 Member States[81]. Almost half of these projects (45%) are in Poland and Italy, followed by a considerable number in Spain, Romania and Bulgaria. Twelve relevant projects are also financed under the Interreg A cooperation programmes. Further details are presented in

Figure 15 below.

**Figure 15: Health workforce projects by Member State and Interreg programme**




For the actual spending on health workforce projects, the picture varies considerably by Member State. Figure 16 below shows the total expenditure (EU funds and any Member State co-financing) for health workforce projects. The total expenditure (EU funds and any Member State co-financing) for all health workforce projects identified is around EUR 979 million, while the average project budget is approximately EUR 3.6 million. The largest projects on average are found in Croatia and Greece, at EUR 38 million and EUR 14 million respectively, reflecting earmarking of significant funding for grants for training of medical professionals in regional or local institutions[82].

The projects vary considerably in scope and scale. Some are small-scale, locally-driven efforts to build specific skills but there are also health workforce training initiatives carried

[79] European Commission, Investments in Health: Policy Guide for the European Structural and Investment Funds (ESIF) 2014-2020, March 2014.

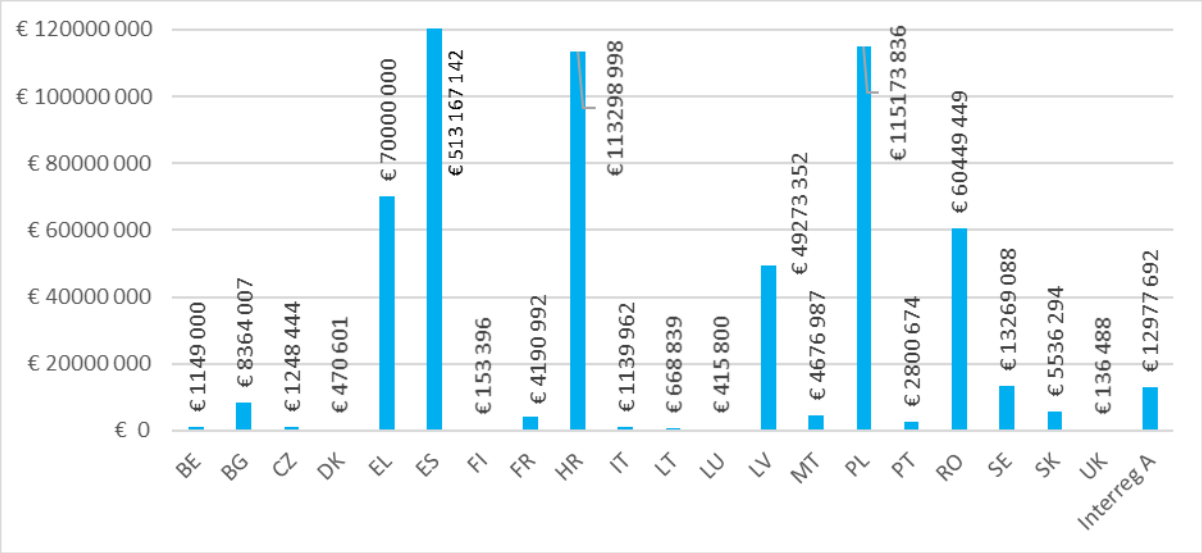
[80] A comprehensive overview of programming related to the health workforce can be found in the thematic mapping document published on the project website: http://www.esifundsforhealth.eu/explore-health-theme

[81] For details, see the Health Workforce mapping document published on the project website: http://www.esifundsforhealth.eu/explore-health-theme

[82] At the time the country research was finalised (July 2018) there was no public record of how the funds were awarded to direct beneficiaries.

out more widely. These typically aim to address shortages of qualified medical professionals, working together with national education systems to ensure that students and recent graduates get the theory and practice they need to qualify and join the workforce. Such projects can be found in many Central and Eastern Member States, including Bulgaria, Romania, Latvia, Poland and Slovakia.

**Figure 16: Total budget of health workforce projects by Member State and Interreg programme**




Note: Budget information was available for 272 of the 275 health workforce projects.

### A mix of approaches exist across Member States

The variety of approaches by Member States is linked to issues such as shortages in specific locations, lack of funds within hospitals and other institutions to pay salaries, migration of healthcare workers across Member States, and support for new and innovative curricula and educational approaches[83].

- In **Bulgaria**, the Ministry of Health implements an EU 2.8 million project to provide financial support for doctors completing residencies in six advanced medical specialties. Numerous other projects combine training with employment measures, supporting unemployed young people to take up jobs in emergency care or other health services or supporting smaller health institutions to provide training and jobs for unemployed persons, essentially using the ESI Funds to create working places. This is in line with the CSR received by Bulgaria regarding shortages of health professionals.
- In **Poland**, the large number of health workforce projects reflects the fact that similar projects involving training for nurses, midwives and physicians have been funded individually in multiple regions across the country. In addition, a specialised Institute for Postgraduate Medical Education is implementing an ESI-funded project to develop specialist education for physicians in almost 80 specialties, including epidemiology and demography.
- In **Latvia**, a severe shortages of health professionals in areas outside the capital city is a pressing issue, with limited incentives for professionals educated in the capital to subsequently work and live in other regions. ESI funds are used to create such incentives. A relatively large (EUR 23 million) lifelong learning programme targeting

[83] For more detail, see the project factsheets published on the project website: http://www.esifundsforhealth.eu/project-database

healthcare professionals is also underway. The training provided is strategically defined and coordinated by the Ministry of Health.

- In **Spain**, the majority of projects aim to improve the working conditions of health professionals by covering some certification costs or contributing to the remuneration of health professionals in some regions, for example.
- In **Sweden**, projects aim to support labour markets in more remote areas and among young people. The projects funded to date support competency development among healthcare workers in order to improve the attractiveness of the profession. Projects also tackle the inclusion of vulnerable groups (e.g. those living in remote areas, foreign-born persons and newly arrived immigrants) by providing employment in the health sector.
- In **Denmark,** an ESI-funded project supports courses on entrepreneurship for students studying healthcare-related fields. The project aims to foster the creation of more small businesses in the sector.
- **Italy** has many small specialist training projects to support social institutions, including non-governmental organisations (NGOs). One example is the project 'Teach to care', undertaken by an NGO in cooperation with several trade unions in the Lombardy region. The project focuses on the needs of an ageing population, teaching care providers greater empathy and other specific skills for working with the elderly, including networking platforms for care providers.
- In the **Czech Republic**, a partnership of NGOs provides training on handling the 'dual diagnosis' of mental illness and drug addiction. These projects are often developed and designed by local social or health institutions to meet very specific local needs.

**Measuring the outcomes of health workforce projects**

The common output indicator for health is more relevant for other themes covered by the project. For the health workforce, there are no directly related common indicators. Member States defined several programme-specific indicators to monitor the performance of the health workforce projects. These indicators typically refer to the number of persons participating in training programmes or number of persons employed in the health sector. Examples of these programme-specific indicators are:

- Share of persons who successfully completed training and apply the obtained knowledge at work from 6 to 12 months after taking part in the ESF activities (LT);
- Participants in training sessions for health care and social services professionals (PT);
- Persons employed in the field of health two years after completing medical education and training supported by ESF (HR);
- Number of persons providing health care, health care support, and pharmaceutical care with improved professional qualification in the frames of life-long learning activities (LV).

Very few Interreg Programmes include monitoring indicators. The following four examples have been found with relation to the Theme 6:

- Number of persons certified in emergency assistance (Mayote-Comores-Madagascar);
- Population covered by cross-border initiatives in the fields of employment, training, culture, sport and health (ES-PT);
- Specialist training and development programmes for cross-border area health and social care providers (UK-IE);
- Number of missions, audit, exchange and expertise in the health sector, the social sector and medico-social issues (Indian Ocean Area).

**Most project target training and education needs, fewer - workforce retention or strategic planning**

There are a great many interesting projects in place that are making a real difference to building skills and ensuring that more graduates are equipped to join Europe's health workforce. However, the analysis of spending trends and inputs from the peer review and workshop discussions found a lack of projects focusing on strategic issues such as retention of workers or detailed longer-term health workforce planning. This raises the question of the extent to which training and education projects are rooted in assessment and planning of health workforce needs at a strategic level. This is particularly important for larger-scale projects that support training and qualification within certain healthcare specialities, or relocation of workers to different parts of the country. These projects are indeed linked to health strategies (as required by the ex-ante conditionality for health spending in 2014-2020) but in most cases do not include detailed health workforce planning efforts.

The lack of long-term comprehensive health workforce planning in many Member States may have an impact on the effectiveness of current approaches to address workforce shortages. For example, while short-term financial incentives can be successful in attracting new health professionals and stimulating the redistribution of workers within national borders, a longer-term perspective would equally consider the provision of training and specialisation opportunities in diverse locations (i.e. not only in big cities) or provision of amenities and services in diverse places (again, not solely in big cities). Essentially, providing long-term incentives and designing appropriate solutions for the health workforce demands a good understanding of the underlying challenges and possible future developments in the health sector[84].

In many cases, public institutions such as Ministries, health agencies or other relevant authorities lack the capacity and expertise necessary to collect comprehensive data on the current workforce and then model workforce needs in different scenarios[85]. In the 2014-2020 period, the ESI Funds could address this gap through Thematic Objective 11 (Improving the efficiency of public administration). Funds such as Interreg could also support cooperation between countries on this issue, including its migration elements. Momentum and technical support for this type of work can be found in the outputs of the Joint Action on Health Workforce Planning and Forecasting (JAHWF)[86] and the Support for the health workforce planning and forecasting expert network (SEPEN)[87]. These initiatives provide a useful starting point for any institution new to such planning and synergies between them and the ESI Funds should be developed further.

**Health inequalities and the health workforce**

A strengthened health workforce will be in a better position to ensure that health interventions and new resources coming into the health sector will improve the health of all populations, not just the most advantaged. The shortage of health workers is compounded by the fact that their skills, competencies and expectations are often not optimally suited to meet changing population health needs. Moreover, health reforms, taking place in many countries, also change the legal and institutional context of health professions. This can lead to inequalities in access and levels of care.

The Joint Action on Health Workforce concluded that health workforce planning and forecasting are mostly a national and local affair and there is not one health workforce

[84] Global Health Workforce Alliance, World Health Organization, Guidelines: Incentives for Health Professionals, Pre-publication copy, 2008; Joint Action Health Workforce Planning and Forecasting, Final Guide of the Joint Action on Health Workforce Planning and Forecasting.
[85] Joint Action Health Workforce Planning and Forecasting, Final Guide of the Joint Action on Health Workforce Planning and Forecasting.
[86] http://healthworkforce.eu/archive/
[87] http://healthworkforce.eu/

planning model or methodological approach which is applicable across all settings. However, an integrated approach for all of Europe would help to minimise the discrepancies between countries, regions and urban/rural divides. Interreg projects such as RARENET (a trinational network for education, research and management of complex and rare diseases in the Upper Rhine Region – France-Germany-Switzerland) highlight the potential of close cooperation between countries to tackle specific workforce challenges.

Several ESI funds funded projects sought to strengthen retention rates of newly qualified staff or provide specialised skills and services. In Bulgaria, the project specialisation in health is helping increase the professional capacity of doctors in order to ensure there are more specialists in the healthcare systems and that better health services are provided. The project is allowing 520 doctors to acquire their speciality and expanding their opportunities for upgrading their knowledge and skills. The project will reduce health inequalities by ensuring a highly skilled workforce will receive specialised training in Bulgaria. This will encourage equity in the quality of care received across the country.

In Portugal, the ESI funded project Equipment for New Advanced Training Programs in the area of Women's, Children's and Teenagers' Health is establishing a training centre exclusively dedicated to the training of students, doctors, and nurses in mothers, new-born, and paediatric patients with severe clinical conditions. The target groups of the project include medical students (paediatrics, obstetrics and gynaecology and postgraduate update courses), doctors, and nurses. The objective is to spread training to all the country, trying to reduce inequalities in the management of pregnant women, new-born infant, children and adolescent patients, and improving procedures and skills to the highest level.

Health workforce planning should be adjusted to regional, national, and local requirements. This is particularly evident within the current climate of budget restrictions and reductions. The ESI funds could be an important tool to help member states to develop resilient and forward looking health workforces without too great a burden on national budgets.

**Strong inter-institutional cooperation is key**

Improved inter-institutional cooperation is a critical pre-condition for expanding the scope of ESI Funds for the health workforce. Health authorities rarely have a direct role in the management and distribution of ESI Funds, thus they must cooperate and negotiate with the social or regional authorities that manage ESI funding programmes, especially those under cross-cutting objectives such as improving public administration (Thematic Objective 11). Project development also requires links to be established with other sectors, such as professional associations and education institutions, which might not only have insights about the needs of the health workforce but may also be the 'owners' of key data required for efficient health workforce planning.

Experts at the project workshop suggested that Member States could use the ESI Funds to do more to improve access to healthcare in rural and remote areas. In addition to the use of financial incentives, Member States could use funds to enhance the overall attractiveness of rural areas for healthcare workers, including supporting short-term work/study opportunities to develop prior exposure, as well as peer networks. This would necessitate effective cooperation between urban-rural communities, national and regional authorities, and the health and education sectors.

Looking ahead to the next MFF, it will be crucial for the different sectors, institutions and stakeholders to work more closely together when developing programmes to support the health workforce. Synergies with other EU programmes such as the JAHWF and the SEPEN should be strengthened to allow for a more strategic approach and to develop the capacities necessary to implement activities at a more strategic level.

## CONCLUSIONS AND RECOMMENDATIONS

Many ESI funded projects are addressing continuous professional training of healthcare workers. However, while many health authorities are carrying out these projects in a strategic way, they might lack the data and methods to carry out sophisticated health workforce planning and skills needs assessment and projection. There is still plenty of room for more international or cross-border cooperation in health workforce planning, including sharing of experience and capacity-building, but also supporting public institutions to carry out the work. There might be potential for this still in 2014-2020 within the TO 11 on supporting public administration.

Several Member States have had a good experience using the ESI funds to supplement the capacity of national health care and education systems to provide both the practical and formal training required to allow health care professionals to qualify as specialists. This is targeting critical health workforce shortages, both in terms of the types of professionals required and the geographical location of professionals. In some countries, ESI funds support the provision of financial incentives to health professionals to relocate to parts of the country where there are shortages. This has been successful due to strong project management, as well as consultation with professional associations and other stakeholders on how to motivate health care professionals to participate.

Ongoing initiatives outside the ESI funds, such as the Joint Action for Health Workforce Planning and the follow-up SEPEN network, can provide possible synergies with the ESI funds to allow Member States to develop effective projects targeting this complex field.

# CHAPTER 7: COUNTRY SPECIFIC ANALYSIS

This section presents an overview of the main findings regarding the use of ESI Funds to support health and the main areas worthy of potential development per Member State. This overview aims to provide some conclusions regarding potential future investments in health, based on the analysis of the ESI Funded projects mapped per theme and also on potential complementarities and synergies with other funding sources and with other related programmes at the EU, National and regional levels, when such information was available.

However, there are some limitations to the elaboration of conclusions and recommendations about the use of ESI Funds to support health investments at the level of Member States. This section provides an overview of health-related projects that have been financed by each Member State during the current period and compares this with the health policy priorities of Member States as identified in the European Semester (CSRs 2015-2018 and country reports). However, the data about ESI Funded projects was gathered midway through the current programming period[88]. Thus, we have identified the areas for which some Member States had not (yet) used ESI funds to address health priorities identified during the European Semester process. Yet, the reason for this could be that such information was not available at the time of data collection for this project. In addition to this, while we have included a brief reference to whether a small or large amount of ESI Funds has been allocated by countries, such indication is also subject to the same caveat; it is based on the projects that were published at the time of the data collection for this project. Furthermore, at least 4% of the identified projects did not include information about their budgets.

The following table presents an overview of our findings at the level of Member States, which contains the following information:

- A summary of the health priorities at the national and EU level, as presented in the European Semester documents (mainly the country reports and Country Specific Recommendations, if any) per theme (theme 1: access to healthcare, theme 2: reform of health systems, theme 3: e-health, theme 5: health promotion, disease prevention, healthy ageing, theme 6: health workforce).
- A brief overview of whether there are relevant examples of ESI Funded projects identified during this study which tackle some of the CSRs or some of the issues identified throughout the country reports per each country.
- Relevant examples of projects funded by other funding sources that also address issues identified in the CSRs or country reports.
- An approximate indication of the overall amount of ESI Funds spending in health, based on data collected for this study (countries where such total is above EUR 100 million were marked as 'high' and those where the total was below EUR 100 million were marked as 'low'.

[88] The lists of operations were reviewed in September 2017 for all Operational Programmes (OPs) with the exception of some regional OPs in Greece and Italy, and all the lists of Spain and Romania, which had not been published at that time. These latter were subsequently collected and reviewed in July 2018.

**Table 1:** Use of ESI Funds and other external funding sources to address health priorities per country[89]

| Member State | Themes in CSRs | Themes supported by ESI Funds | Relevant ESI funded projects | Other external funding | Amount of ESI Funds invested in health (2014-2020)<br>High (over EUR 100 million); Low (under EUR 100 million) |
|---|---|---|---|---|---|
| **AT** | 2 | None | Projects related to occupational and social integration of people with disabilities, illnesses or impairments. | Vienna Hospitals PPP Programme to construct and refurbish outdated facilities. | Low |
| **BE** | | | The Proximity Labs project aims to improve the care of patients with chronic diseases, which involves the use of new technologies for diagnosis. Several projects tackle the care needs of elderly people and people living with disabilities and other vulnerable groups. | N/A | High |
| **BG** | 1, 2, 5, 6 | 2, 5, 6 | No projects found to address access to healthcare. Several projects address healthcare services, including integrated care, the modernisation of health infrastructure, and the training of the health workforce. A large project is supporting the development of a national e-health system as part of the National Health Strategy. | Several projects (EEA grants and Norway grants) address health inequalities, the needs of vulnerable groups and foster improvements in access to healthcare. Other projects support people living with disabilities and also the creation of electronic records for vaccines. | High |
| **CY** | 1, 2 | None | No health-related projects were identified in Cyprus. | Some EEA grants are supporting health interventions at a detention centre, a day care centre for children with disabilities, and a health promotion project addressing inequalities. | Low |
| **CZ** | 2 | 2 | The Mental Health project is supporting the Psychiatric Care reform with the aim of increasing high quality services and emphasizing community rather than institutional care. Other projects are supporting the implementation of the national strategy "Health 2020", and the modernisation of health infrastructure. | Other projects funded with Norway grants and EEA grants are addressing the reform of the psychiatric system, community care services, health promotion, and the health workforce. | High |
| **DK** | | | Large research projects such as the Copenhagen Health Innovation, are developing innovative healthcare solutions with the help of ESI Funds. | N/A | Low |
| **DE** | | | Several projects of different sizes are addressing e-health. | Some projects related to research and innovation are being financed by EEA and Norway grants. | Low |
| **EE** | | | Several projects are supporting the establishment of primary health centres and healthcare infrastructure in general. | Norway grants are also supporting projects related to primary care and health infrastructure. | High |

[89] For a complete overview see the country factsheets published on the project website: http://www.esifundsforhealth.eu/explore-country

| | | | | | |
|---|---|---|---|---|---|
| **EL** | | | Large projects are supporting the establishment of primary healthcare units (TOMY), enhancing access through social pharmacies and other interventions on the healthcare system, including those placing emphasis on community care. | EEA grants are supporting healthcare interventions to enhanced prevention and treatment services, address the needs of vulnerable populations, and develop or improve health infrastructure. | High |
| **ES** | 2 | 2 | Numerous projects with different budget are building and modernising health infrastructure and supporting access to healthcare. | Only a few short projects funded by EEA grants are supporting these needs. | High |
| **FI** | 1, 2 | 1, 2 | Several projects are addressing access to healthcare and the reform of health systems in Finland. For instance, the PoPSTer project is supporting a large reform to the social and health services of the Norther Ostrobotnia region. Other projects are supporting access to healthcare including for vulnerable groups (immigrants, people with disabilities). | N/A | Low |
| **FR** | 2 | 2 | A few projects are supporting the modernisation of health infrastructure. | A few large EIB projects are supporting research into innovative healthcare solutions. | Low |
| **HR** | 2 | None | A large national project is addressing health risk factors. Other projects such as the development of e-services (including e-health) are also implementing nation-wide interventions. No projects were found to support the CSR on health systems. | Projects from EEA grants are addressing access to healthcare and health promotion and disease prevention, but no project was identified to directly tackle the reform or modernisation of the healthcare system. | High |
| **HU** | | | Several projects are using ESI Funds to invest in health infrastructure, increase access to healthcare. A few large projects focus on health promotion and also a large national project is setting up the national e-health platform with ESI Funds. | EEA grants are supporting healthcare interventions to enhance prevention and treatment services and develop or improve health infrastructure. | High |
| **IE** | 1,2 | None | Projects are mostly supporting health promotion and disease prevention interventions | A large EIB project is supporting the development of primary health care centres. | Low |
| **IT** | 2 | 2 | Many ESI Funded projects were identified in Italy, including some that support access to healthcare, the reform of health systems and e-health services. | N/A | High |
| **LV** | 1, 2 | 2 | Several large projects are supporting the reform of health systems, health promotion and disease prevention, and the health workforce nationally and at the level of municipalities. However, no project was found to directly support access to healthcare. | Other projects funded with EEA grants are supporting access to healthcare, the reform of health systems, health promotion interventions and the health workforce. | High |
| **LT** | 1, 2, 5 | 1, 2, 5 | Several ESI Funded projects are supporting health infrastructure and integral care in different municipalities in Lithuania. | Various projects are supporting the healthcare system, including through Norway grants. | High |
| **LU** | | | ESI Funds are being used to support projects related to health promotion and the health workforce. | N/A | Low |
| **MT** | 2 | 2 | A few projects are supporting the modernisation of health infrastructure (2 projects) and primary care (1 project). | A few projects with EEA grants are support the health system and access to healthcare. | Low |
| **NL** | | | ESI Funds are being used mostly to support research and innovation in health and e-health. For instance, the COILED project is providing a platform | One project funded by the EIB is supporting health infrastructure. | Low |

| | | | | | |
|---|---|---|---|---|---|
| | | | to speed up the discovery of drug candidates by connecting academia and industry research. | | |
| **PL** | | | Many ESI Funded projects were identified in Poland, including those supporting access to healthcare, health system reform and support for the health workforce. Projects such as the "Green care farms", providing care and daily activities for elderly people and people living with disabilities, are also supporting interventions to improve health outcomes and promote health. | Other funds including EIB, EEA and Norway grants are being used to support health in Poland. | High |
| **PT** | 1, 2 | 1, 2 | Numerous projects with different budget are building and modernising health infrastructure and supporting access to healthcare, including to address the needs of rural populations and to strengthen primary care. For instance, in the Algarve region, a project is providing primary care services to rural populations. | A few projects with EEA grants are also supporting the health system and access to healthcare. | High |
| **RO** | 1, 2 | 2 | ESI Funds are being used to support health system reform, including a large project to improve the strategic planning and capacity of the national public health programs by the Ministry of Health. | Several projects funded with EEA and Norway grants are supporting interventions to improve access to healthcare and to support the health system in general. | High |
| **SE** | | | Sweden is using ESI Funds to support different health interventions, including on access to healthcare for immigrants and several interventions to promote health and care and to support e-health. For instance, the RUVeS project is supporting cooperation between healthcare services and SMEs to promote a more competitive market for e-health applications. | N/A | Low |
| **SI** | 1, 2 | 1, 2 | Slovenia is using ESI Funds to support its health system, increase access and develop health promotion interventions. For instance, the SOPA project is developing a comprehensive approach to identify and support people with risky alcohol consumption and another large project by the Ministry of Health is developing preventive programmes at primary health care and local communities with the aim of reducing health inequalities. | Norway and EEA grants are also being used to support the health system and access to healthcare in Slovenia | Low |
| **SK** | 2 | 2 | Slovakia is using ESI Funds to support its health system, develop health promotion interventions and support its health workforce. For instance, a large project implemented by the Ministry of Labour is supporting home-based nursing care to dependent person and another is supporting deinstitutionalisation of alternative care. | N/A | High |
| **UK** | | | ESI Funds are being used to support interventions related to health promotion and disease prevention, e-health and the health workforce. | A large EIB project is supporting health infrastructure. | High |

Based on the information gathered per each country and presented in the above table, the following table presents a summarised analysis per each Member State, addressing two main questions: (1) whether the country has any specific priority area as identified within the European Semester (CSRs 2015-2018 and country reports); and (2) whether there were any relevant projects tackling those issues either funded with ESI funds or through other funding sources. Where the analysis indicates shortcomings in a Member State's use of ESIF to address its identified health priorities, there may be room for future ESIF investment in health.

The same limitations mentioned above apply for this analysis. First, the results of the mapping of ESI funded projects reflect the information that was available through the list of operations published by each Member State at the time when this information was gathered. Secondly, this project undertook a mapping exercise to identify all health-related investments made possible by ESI Funds during the 2014-2020 programming period, and a more in-depth study of a group of 63 exemplary projects; however, the project did not aim at assessing or evaluating any particular project or programme.

**Table 2:** ESI Funds invested in health v. health priorities identified within the European Semester

| Member State | Analysis and comments |
|---|---|
| **AT** | No relevant project was found to directly tackle the CSR related to the sustainability of the health and long-term care system. |
| **BE** | Some projects have been identified in relation to access to healthcare with further impacts on the sustainability of health systems; however, these projects did not directly address high quality healthcare for vulnerable groups as suggested by the country report. |
| **BG** | Several projects are addressing the CSRs (related to health system reform, health promotion and the health workforce). |
| **CY** | No ESI Funds were identified in relation to the CSRs. However, it is important to note that the legislation establishing the National Health System was adopted in 2017 and that Cyprus was advised to work towards making its system fully functional in 2020. |
| **CZ** | Some projects with ESI Funds and other funds are addressing the issues identified in the CSRs (health system reform and health workforce). Other projects funded with Norway grants and EEA grants are also addressing the reform of the psychiatric system, community care services, health promotion, and the health workforce. |
| **DK** | No CSR or mention of health on the country report. DK is using ESI Funds to support e-health and research and innovation in health, health promotion and the health workforce. |
| **DE** | No CSR but the country reports identifies e-health as an area that should be strengthened, and Germany is using ESI Funds to support e-health |
| **EE** | Several ESI Funded projects and Norway grants are supporting the establishment of primary health centres and healthcare infrastructure in general as suggested in the country report. |
| **EL** | Large projects are supporting the establishment of primary healthcare units (TOMY), enhancing access through social pharmacies and other interventions on the healthcare system, including those placing emphasis on community care as suggested in the Enhanced Surveillance Report. EEA grants are also being used to support these types of interventions. |
| **ES** | Spain is using ESI funds (and a few EEA grants) to address problems identified both in the CSRs (health systems reform) and in the country report (access to healthcare). |
| **FI** | Finland is using the ESI Funds to address issues highlighted in the CSRs and country report (access to healthcare and health system reform). |
| **FR** | France is using the ESI Funds to support health infrastructure and access to healthcare as mentioned in the country report. |
| **HR** | ESI Funded projects are addressing access to primary healthcare, the development of e-health services, health promotion and disease prevention activities and projects addressing the health workforce. No project was found to directly address the reform of health systems as mentioned in the CSR. |
| **HU** | ESI Funds are being used to support access to healthcare and health promotion, other funds are also supporting healthcare system reforms |

| | |
|---|---|
| **IE** | Ireland is using a combination of ESI Funds and other funds (EIB) to support access to healthcare and health promotion interventions but no relevant project was found to support large interventions to support health care reform as mentioned in the CSR. |
| **IT** | Many ESI Funded projects were identified in Italy, including some that support access to healthcare, the reform of health systems and e-health services. |
| **LV** | ESI Funds are being used to address health system reform but no project was identified to directly address access to healthcare as suggested by the CSR. However, EEA grants are being used to support access to healthcare, health system reform, health promotion and the health workforce. |
| **LT** | Lithuania is using ESI Funds to support different interventions related to access to healthcare, health system reform and health promotion as suggested by the CSR. |
| **LU** | A few ESI funded projects were identified to support health promotion and the health workforce as suggested by the country report. |
| **MT** | Only a few ESI funded projects are supporting the modernisation of health infrastructure (2 projects) as suggested by the CSR. EEA grants are also being used for this purpose. |
| **NL** | ESI Funds are being used mostly to support research and innovation and e-health. One EIB project supporting health infrastructure was also identified. Health was not mentioned in the CSR or country report. |
| **PL** | Many ESI Funded projects were identified in Poland, including those supporting access to healthcare, health system reform and support for the health workforce as suggested by the country report. |
| **PT** | Portugal is using ESI Funds intensively to support interventions related to its healthcare system and to improving access to healthcare as suggested by the CSR. Other EEA grants are also supporting these areas. |
| **RO** | Romania is using ESI Funds to support healthcare although no project targeting access to healthcare was identified, even though this was mentioned in the CSR. However, other funds (EEA, Norway grants) are being used to support health interventions including to improve access to healthcare. |
| **SE** | Sweden is using ESI Funds to support its healthcare system, and it is also using ESI funds to support research and innovation projects and e-health although no mention was included in the CSR or country report. |
| **SI** | Slovenia is using both ESI Funds (through a few projects with large budget to support its health system, and increase access to healthcare as mentioned in the CSR). It is also using other external funding (EEA and Norway grants) to support health. |
| **SK** | Slovakia is using ESI Funds through a few projects with large budgets to support health system reform (mentioned in the CSR) and the health workforce. However, no project was identified to support access to healthcare and also no external funding supporting health interventions was identified. |
| **UK** | The UK is using ESI Funds, although no project was identified to directly target the health system (which was suggested in the country report). Additionally, at least one EIB project was identified, which is providing support for health infrastructure. |

# CONCLUSIONS AND RECOMMENDATIONS

## KEY SUCCESS FACTORS FOR ESI-FUNDED PROJECTS TO ADDRESS EU HEALTH CHALLENGES

ESI Funds are making a real contribution to EU health policy goals and many good practice projects exist. There are important 'success factors' that usually lead to good outcomes, some of which are presented below, together with several exemplary projects. More details on individual projects can be found in the project database on the ESI Funds for Health website, as well as in the workshop materials[90].

### Pre-existing and/or well-developed cross-sectoral networks

The existence of a strong cross-sectoral network has helped many ESI-funded projects to achieve their objectives. By building on existing networks, projects can more easily benefit from cooperation with different actors and adopt more holistic approaches to solving public health problems.

- **Healthy Living (Croatia, EUR 3,970,366)** is run by the Croatian Public Health Institute in partnership with 21 county Institutes of Public Health, NGOs, schools and several Ministries. The project targets public awareness of the risk factors such as obesity and sedentary lifestyles by promoting physical education, improving the visibility of walking routes and supporting the work of volunteers at national parks.
- **Capas-Cité (Interreg A – POCTEFA, EUR 2,674,787)** promotes active lifestyles by building a new sports centre in Tarbes (CAPAS building), developing research on the links between physical activity and attention in schoolchildren and providing individualised physical training for disadvantaged groups at high risk for diseases associated with a sedentary lifestyle. The administrations of Tarbes and Huesca (twinned towns) and two universities (University of Zaragoza and University of Pau) collaborate on the project.
- **RARENET (Interreg A – Rhin Superieur, EUR 3,979,174)** is establishing a network of institutions (hospitals, universities, associations of health professionals, patient groups and industry partners) that support patients with rare oro-dental and autoimmune diseases by allowing the exchange of information, the development of training for health professionals, caregivers, and patients, and the creation and sharing of a collection of biological samples and data from patients suffering from these diseases.

### Strategic and scientific underpinnings

Health projects need to target the right problems with the right solutions. Experience shows that when projects are clearly linked to strategic policy documents (e.g. health strategy), scientific findings or other relevant studies and data, they are more likely to deliver the right outcomes.

- **Responsible approach to alcohol use (SOPA, Slovenia, EUR 5,844,624)** was developed following a needs assessment based on existing quantitative data (e.g. share of the population that drink excessively, number of hospitalisations and health costs associated with alcohol use) and strong links to EU policy on reducing alcohol-related harm.
- **Specialised education for physicians in key epidemiology and demography areas (Poland, EUR 21,669,054).** This project provides training in medical specialities linked to the five groups of diseases found to be the main causes of economic inactivity among Poles.

[90] For more detail, see the project factsheets (http://www.esifundsforhealth.eu/project-database) or the workshop materials (http://www.esifundsforhealth.eu/workshops) published on the project website.

- **Specialisation in health/Improving conditions for treatment in emergencies (Bulgaria, EUR 2,810,425/EUR 3,579,098).** These two projects were developed in line with the national health strategy, which identified shortages of certain types of health professionals. Both projects aim to increase the numbers of qualified health professionals in these fields and build upon similar successful initiatives in the previous programming period.

**Involving stakeholders and users**

Successful ESI-funded health projects directly engage a wide range of health and other important stakeholders such as patients, trade unions and professional associations, hospitals and public health institutions, as well as targeted users of the outputs. Involving different stakeholders in the design and/or implementation of a project is important both for buy-in to the project and its results and to ensure that its objectives and activities are realistic. Stakeholder feedback can identify not only existing needs but also the most suitable solutions and approaches to addressing these gaps. Ensuring that ESI-funded health projects support workable solutions that have the acceptance of the various stakeholders involved can facilitate the subsequent roll-out and replication of successful practices.

- **NURED (Interreg A – Central Baltic, EUR 862,094)** is developing new curricula for education and training in the field of Home Care Nursing in the Central Baltic region. Extensive consultations are carried out during the preparation and use of the curricula, with practicing care workers providing input on the training needs. The input from teachers and students improves the relevance, ownership and uptake of the end product.
- **Improved availability of healthcare support personnel outside Riga (Latvia, EUR 9,960,102)** provides financial incentives to young doctors to relocate in regions outside the capital and take over the practices of retiring practitioners. Preliminary consultation with professional associations about the right financial incentives (amount/type) and a list of potentially interested candidates has been crucial to the project's success to date.
- **Fast Breast Check (Italy, EUR 1,126,455)** aims to validate and bring to market an innovative breast screening device. The project involves a large number of patients from the target group, who not only participate in trials but also provide feedback about the device.
- **MOBI (Interreg A – Euroregio Maas-Rhine, EUR 943,569)** aims to increase the quality of care and the social integration of people with dual diagnoses, while simultaneously educating professionals and family members through coaching. This is achieved through direct involvement of persons with dual diagnoses and their networks in working and training groups, coaching and counselling.
- **Mental Healthcare Reform (Czech Republic, EUR 3,869,590)** improves the interconnection between health, social and other services relating to mental health. The project consulted patients and their families in the design of the activities and includes 'satisfaction of clients and their families' as one of the project measures.

**Testing solutions that require trial and error**

The ESI Funds have supported many projects to develop innovative solutions in the health sector, e-health, disease prevention and healthy ageing. The EU added value is important here: many projects would not otherwise be funded and some also have a cross-border element that could be deployed in other EU regions and Member States.

- **i-4-1 health (Interreg A - Belgium-Netherlands, EUR 8,483,689)** develops cross-border collaboration in the field of antimicrobial resistance encompassing both humans and animals within hospitals, community centres and veterinary centres. The focus is on measurement and prevention, as well as developing solutions that can be reproduced throughout Europe.

- **AgeWell (Romania, EUR 1,723,485).** An interdisciplinary team (including medical robotics specialists and physicians) is working to develop a hub at the Technical University of Cluj-Napoca, which will deliver innovative solutions for current challenges and threats in healthy ageing, lifestyle and public health.
- **eMEN (Interreg B - North-West Europe, EUR 5,360,000)** addresses the increased demand for mental healthcare in Europe by promoting 'blended care', which uses both face-to-face and online therapy. Several pilot applications of various e-health tools have been carried out within the project, including cross-border testing.
- **EmpowerKids (Interreg A - Central Baltic, EUR 261,460)** addresses the problem of social exclusion and inadequate health information and social advice for children from low-income families. The project developed an online game targeting children aged 6-12, which allows social and health professionals to talk to children about nutrition, physical activity, daily routines and family resources, and to provide advice in an engaging way.

**Testing projects on a small scale for roll-out and scaling up to regional or national level**

Certain approaches to tackling issues in the health sector may be developed first on a smaller scale in the form of pilot projects which can be subsequently implemented at a larger scale (e.g. regional or national level). An important pre-condition for success here is the political will and capacity to further implement the models once they are tested.

- **Green care farms (Poland, EUR 815,165)** has established 15 green care farms that provide unique care services for elderly people and people with disabilities in rural areas. Other regions of Poland are looking at developing similar initiatives.
- **Let us be active! (Interreg A - Central Baltic, EUR 264,007)** develops new volunteering activities for seniors in the cities of Pärnu, Riga and Turku. Guidelines developed for this project may serve as a tool for similar projects in other cities across Europe, several of which are already interested in developing similar initiatives.

**Investment in people and processes to encourage uptake of research, innovation and technology, as well as the technology itself**

Many ESI-funded projects focus on creating an environment where digital solutions can be taken on quickly and easily. This essential preparatory work attempts to improve the uptake of e-health solutions by building partnerships and sharing expertise between different stakeholders. This often means establishing processes that bring together health service providers, SMEs and policy makers in order to ensure that the digital solutions in question are necessary and appropriate. Other forward-looking projects may work to encourage innovative SMEs to participate in a public health market that might otherwise be impenetrable due to long-term public procurement contracts.

- **digitalLIFE4CE (Interreg B - Central Europe, EUR 1,551,182)** is building connections between stakeholders in the Central European region, including policy makers, researchers and service providers. The aim of the project is to create a framework to share digital healthcare solutions quickly and easily, encouraging rapid transfer and uptake by policy makers.
- **RUVeS (Sweden, EUR 533,485)** aims to improve public procurement processes to encourage better integration of SMEs in the public digital healthcare market. This is based on building cooperation between health service providers and SMEs so that the latter better understand the needs of health services.
- **eMEN (Interreg B - North-West Europe, EUR 5,360,000)** has a shared platform across six countries, bringing together stakeholders from the health profession, SMEs, service users and policy makers. This partnership uses transnational cooperation to address the frequently poor development and implementation of E-mental health innovation.

### Blending and linking 'soft' elements of interventions with infrastructure investment

Combining 'hard' (e.g. infrastructure, land, buildings, equipment) and 'soft' (e.g. human resources, training, awareness) investments can boost the impacts of projects. In the current programming period, soft investments are typically made under the ESF, while the ERDF funds hard investment. Blending both types of investment can happen within a single project or through multiple projects drawn together under a broader plan/strategy. This strategy can be particularly useful in projects that seek to implement structural reforms which need both infrastructure (for example, new community-based facilities) and training for health sector staff to adapt to new ways of working.

- **Mental health care reform (Czech Republic, EUR 3,722,659)** is reducing the reliance on institution-based care for patients in the mental health system. It is part of the Psychiatric Care Reform Strategy, where ESF support soft investments such as training, development of quality standards and staffing community-based mental health centres and ERDF is used to improve and modernise existing infrastructure in general hospital services, and to fund equipment for community mental health centres. An overarching strategic framework allowed for the coordination of hard and soft investment.
- **OPs combining ESF and ERDF investments (Latvia and Slovenia).** While most Member States have separate OPs for the ESF and the ERDF, Latvia has one multi-fund national OP (OP Growth and Employment), which includes health and supports the coordination of hard investment under the ERDF and soft investment under the ESF funds within a single overall framework. Slovenia also uses a single multi-fund OP to coordinate investments and link them to national strategic objectives.
- **Advanced training programmes in women's, children's and teenage health (Portugal, EUR 1,411,407)** supports the creation of a training centre and equipment (infrastructure) along with training programmes, and is part of a wider strategic effort to develop research and innovation capacities in medicine in the city of Lisbon.

## CHALLENGES AHEAD: IMPROVING THE USE OF ESI FUNDS TO SUPPORT HEALTH

The authorities, stakeholders and experts consulted across the project activities highlighted persistent challenges and pointed out that there is more to be done to maximise health outcomes.

### Tackling the 'silo' mentality

The public institutions that manage and implement ESI Funds programmes and projects are often organised by sector (e.g. Ministry of Labour or Ministry of Health, social service provider) and there is a tendency to focus project design and implementation on the direct needs of that sector. This 'silo' approach can negatively impact health investment, which should take a more holistic, cross-cutting approach. Bridging the gap that separates health from non-health sectors is important for meaningful health outcomes from the ESI Funds, whose objectives are usually linked across traditional policy sectors.

### Easier requirements and more information about ongoing opportunities could facilitate the involvement of stakeholders and the sustainability of projects

Several stakeholders mentioned that they faced various issues with the administrative requirements for ESI Funded projects. However, this aspect was handled differently by each managing authority, and as a consequence, it only seemed to pose a challenge for some regions and Member States, and for some stakeholders (e.g. academia or SMEs).

In addition, many EU and national funding programmes address - or have the potential to address - health. However, a common complaint is that it is difficult to have an overview of ongoing projects and opportunities across different programmes, especially those that are subject to shared management with the Member States. Many projects are thus implemented in isolation and their outcomes remain fragmented.

For instance, collecting information about health-related projects funded by the ESF and ERDF across the Member States proved challenging for the ESI Funds for Health project. Although Member States are required to maintain and publish a list of projects funded[91], collecting and processing this information for all OPs required considerable research capacity. The information is published by managing authorities on their own websites in national languages only and with no consistent format or set of required information. This makes the collection and comparison of project data complex and time-consuming. If Member States were required to submit the information in a consistent format to a single online location, this would greatly facilitate the production of up-to-date overviews of health spending, as well as information on current projects that could benefit health stakeholders considerably.

There are many EU funding opportunities for health. In addition to the ESI Funds, there is considerable health-related investment in other programmes, such as Horizon 2020, or the Joint Actions and other activities funded through the EU Health Programme. For stakeholders, including many of those at the ESI Funds for Health workshops, the number of funding streams can be overwhelming, and it is not clear where to go for different types of projects. Better harmonisation of rules across programmes with decentralised management by the Member States and direct management by the European Commission would help to alleviate this. A network of health authorities dedicated to EU funding could provide the opportunity for key stakeholders to learn more about ongoing initiatives, build synergies and share outcomes and practices[92]. Better information and access to funding opportunities is also key for the financial sustainability of projects.

**A tendency towards large-scale, high-profile projects persists**

Health policy advocates a shift away from hospital- and institution-based care, which should, in theory, result in a reduced need for infrastructure investment. This is also seen in a shift in the ESI Funds framework for 2014-2020 away from capital expenditure for infrastructure towards the social aspects of health services, including health promotion and disease prevention.

Nonetheless, many stakeholders noted that Member State authorities charged with programming and project approval continue to express a preference for capital expenditure projects, due to their higher political profile and clearly visible return on investment. The higher expenditure also contributes towards better funding absorption rates, which is a problem for many Member States. While large infrastructure investment remains necessary to address regional development needs, population changes and ageing infrastructure, it is important that it does not crowd out 'soft' investment, such as staff training or community-based services. A focus on infrastructure investment also risks locking-in the institutionalised approach, undermining the transition from institution-based to community-based care.

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[91] Article 115(2) of the Common Provisions Regulation on ESI Funds (Regulation 1303/2013) requires Member States to maintain a list of operations by OP and Fund in a spreadsheet data format, which allows data to be sorted, searched, extracted, compared and easily published on the Internet, for example in .csv or .xml format.

[92] European Commission, 2014, Enabling synergies between European Structural and Investment Funds, Horizon 2020 and other research, innovation and competitiveness-related Union programmes, Guidance for policy-makers and implementing bodies, http://ec.europa.eu/regional_policy/sources/docgener/guides/synergy/synergies_en.pdf

The ESI Funds should lead the way in prioritising investment in such 'soft' investments and solutions. These projects clearly demonstrate linkages with specific objectives in relevant strategic health policy documents, and their championing by ESI Funds will help to convince national central agencies (i.e. Finance Ministries) of their merits. In addition, the ability to blend or combine finance from across the different funding streams is important to project success, as it helps to achieve a balance between infrastructure and soft investment.

**The project-based nature of ESI Funding can create obstacles to address priority health challenges**

In order to access ESI Funds support, beneficiaries must develop projects with clearly formulated objectives, activities, expected outcomes and timeline. While this allows programme and fiscal authorities to control how money is spent, in some cases it can prevent the ESI Funds from targeting priority health challenges.

Some stakeholders pointed out that the four-five year maximum timeline of most projects was not sufficient to see sustainable results. A lack of continuity between different projects targeting similar problems and objectives was also noted.

Strategic tasks surrounding policy reform are often not conducive to project-based funding. For example, health workforce planning requires capacity to collect and analyse data on health workers, but this is the long-term work of public institutions, it is challenging to set up a project to support this. Limitations in policy reform activities then weaken implementation efforts, such as projects supporting the education, training and placement of healthcare workers without sufficient understanding or planning for future demands.

ESI-funded projects tend to request the maximum funding available from the relevant funding programme. There is limited experience with bringing in other sources of funding, including from private sources. This impacts the sustainability of results, with project benefits ending with the funding.

Some worthy potential project beneficiaries lack the capacity to formulate their needs in project terms. This limits their ability to prepare strong funding applications and manage the resulting projects, including administrative and monitoring requirements. Authorities and project beneficiaries alike mentioned that the administrative burden related to securing funds as well as managing approved projects could be reduced.

The project-based nature of EU funding programmes is a complex issue. While a project-based system facilitates prioritisation, controlled spending, and transparent and clear outcomes, such an approach is not entirely effective in solving long-term policy challenges. Maximising outcomes for health investment requires a greater focus on the capacity of the institutions carrying out policy reforms, through dedicated support funding, linking reform to spending priorities, and providing more opportunities for blending different types of public and private funds.

## CROSS-THEMATIC CONCLUSIONS AND RECOMMENDATIONS

**More capacity building is needed to support ESI Fund investments across the EU**

While many projects are addressing important needs related to the healthcare sectors (for instance continuous professional training of healthcare workers), it is important that such projects are identified and prepared in a strategic way. Many public authorities are working on this area; however, stakeholders and experts pointed out that in some cases, they might lack the data and methods to carry out some of this work, as it might be the case with sophisticated health workforce planning and skills needs assessment and

projection. For the health workforce, this type of planning and associated strategic-level work is an important gap in many Member States to which the ESI funds do not seem to be systematically contributing.

In addition, capacity building can contribute to better planning and integration of ESI funds into national and regional strategies. As mentioned above, the project-based nature of ESI Funds, and lack of continuity between projects targeting similar problems can in some cases prevent the ESI Funds from targeting priority health challenges. Better planning and integration of projects into national and regional strategies can achieve a good balance between the project-based nature of ESI Funds and the strategic long-term work and needs of public institutions.

More collaboration between Member States, including cross-border cooperation, sharing of experience and capacity-building, but also supporting public institutions to carry out the work could contribute to the effective use of ESI Funds. This aspect could also be directly supported within the Thematic Objective 11 in the 2014-2020 programming period on supporting public administration or its equivalent in the next programming period.

**More holistic and cross-sectoral collaboration is needed**

Collaborations between the health sector and other different sectors is essential for obtaining meaningful health outcomes from ESI Funds' investments. For example, efforts to decrease health-related harm from alcohol consumption through education or awareness raising can be better supported when combined with increasing levels of active employment or with other policies at the national or regional level.

Many identified projects have shown that effective cross-sectoral collaborations often involve existing or new networks, often developed at local and regional level. Funding programmes should ensure that there are plenty of opportunities for bottom-up project development, based on these types of networks. This can help avoid a 'silo' mentality in the use of ESI Funds, which could negatively impact or limit the outcomes of health investments.

**Coordination and blending of different funds and types of investments should be enhanced**

The importance of being able to combine different EU funds to address health was highlighted throughout the ESI Funds for Health project on multiple occasions, and some beneficiaries were even unaware that this is possible in the current funding period. Both the ESF and the ERDF include Thematic Objectives that can support investments in health and social infrastructure, which can be achieved through various means. Investments in institutional capacity, efficiency and meaningful involvement of public authorities and stakeholders at national, regional and local level is also possible through both funds. Stakeholders that participated in the workshops highlighted the importance of fostering links between both funds and possibly involve other funds as well in order to achieve a better, more strategic and sustainable return on investment in health, from a wider and long-term perspective.

In addition to combining funding streams, the combination of different types of investments ('soft' investments and investments in infrastructure) can also lead to positive outcomes. Within the current programming period, a shift away from capital expenditure for infrastructure towards the social aspects of health services, including health promotion and disease prevention can be observed. This is in line with best practices indicating the need for more 'soft' investments, such as staff training or community-based services to support various health related interventions.

**Synergies between ESI Funds and other funds should be promoted**

The importance of promoting synergies and complementarities between ESI Funds and other funds was highlighted by projects across different themes and by stakeholders participating in the thematic workshops. For instance, ESI funds can contribute to reduce health inequalities and address risk health factors through different interventions related to health promotion, including awareness campaigns. For other themes such as the health workforce, ongoing initiatives outside the ESI funds, such as the Joint Action for Health Workforce Planning and the follow-up SEPEN network, can provide possible synergies with the ESI funds to allow Member States to develop effective projects targeting this complex field. These projects can help by providing the needed planning activities to support more targeted interventions such as many training projects. For R&I projects, synergies between ESI Funds and other sources of funding such as H2020, and other EU, national or regional grants are essential to ensure that large and costly projects can deliver innovations until they are ready to be used by their ultimate beneficiaries.

**Increased support for cross-border healthcare is needed**

Cross-border cooperation on healthcare can help citizens move between Member States for work or leisure, while accessing services adapted to their needs. For instance, sharing health data across borders can significantly help patients seeking cross-border care and might also boost health research, which in turn contributes to health innovation. Cross-border cooperation is also essential to address cross-border threats, which require unified responses and collaborative approaches. Interreg projects can help to build bridges and overcome problems that require a unified response. One example is the 1-4-1-health Interreg project in Belgium and the Netherlands researching antimicrobial resistance, an issue that clearly has no regard for man-made land borders.

While the Interreg projects are significantly contributing to health investments across the EU, outside of these, there are few ESI-funded projects in the area of health with a cross-border dimension. This situation is at odds with EU published policy on health, where successive Commission documents have called for greater cooperation between Member States in the area of health[93]. E-health is particularly relevant given the numbers of Member States reorienting their health systems based on a digital foundation of electronic health records[94].

Overall, the Interreg projects represent just 4% of the health projects funded during 2014-2017, with allocations of around 2% of the total for the current programming period. Therefore, it will also make sense for national and regional programmes to consider collaboration with the cooperation programmes of Interreg and with health stakeholders in other Member States[95]. Again, this could be facilitated through a formal network of health stakeholders dedicated to EU funding. The possibility for Member States and regions to use parts of their own allocations to fund projects anywhere in Europe jointly with other regions (in addition to dedicated Interreg programmes) is also promising.

[93] European Commission, SWD (2012) 413 final, Staff Working Document, eHealth Action Plan 2012-2020 Innovative Healthcare for the 21st century.

[94] European Commission, COM (2018) 233 final, Communication on enabling the digital transformation of health and care in the Digital Single Market; empowering citizens and building a healthier society.

[95] Article 70, 2 of the Common Provisions Regulation on ESI Funds (Regulation 1303/2013) establishes the possibility that ESI Funds might be allocated to an area outside the Operational Programme provided that some conditions are satisfied (e.g. that the total amount allocated under a programme to operations outside the region is not above 15% of the total support for the ERDF.

**ESI Funds have an important role in addressing health inequalities**

Health Inequalities arise from avoidable differences in social, economic and environmental variables, which give rise to worse health outcomes for people from disadvantaged groups[96]. Rather than the result of individual behaviour[97], these differences are associated with exposure to unhealthy living and working conditions as well as unsatisfactory access to basic social services[98]. The financial crisis in 2007-2009 and subsequent fiscal measures have restricted efforts to reduce health inequalities in many EU countries[99]. For the current programming period, ESI Funds can contribute to reduce health inequalities through various types of investments, for instance by improving access to healthcare, or by designing interventions that can help to address risk factors, promote health of vulnerable groups, address unemployment or provide education for groups with health-related problems or in need of long-term care.

Since the European Commission's communication 'Solidarity in health: reducing health inequalities in the EU', published in 2009, two additional key mechanisms that can be used by Member States to address inequalities have been adopted: the EU Semester and the European Pillar of Social Rights[100]. The EU Semester process can guide Member States towards policies and social reforms impacting on key social determinants of health (i.e. access to health care, expanded early childhood education and care, and reduction in poverty and income inequalities)[101]. The European Pillar of Social Rights, which outlines twenty principles covering the socio-economic determinants of health, also represents an important policy initiative for tackling inequalities between and within Member States[102]. The inclusion of the Social Pillar and Social Scoreboard in the EU Semester has the potential to enable more effective responses to key social issues, which will in due course improve health and social inequalities.

The requirement that all projects complete a Health Inequalities Impact Assessment (HIIA) could also help to keep health inequalities at the forefront of current and potential projects. Based on the recognition that health is determined by actions within a broad range of policy areas, including education, housing and employment, a HIIA is a tool for assessing how a proposed, new or revised policy or practice will cause variations in these health determinants, and thereby consider the impact on health. HIIA is an important tool in tackling health inequalities given its capacity to map and make transparent the effect of an initiative on different social groups, to prevent unintended consequences, and also to reinforce positive health outcomes of decisions, made in the spectrum of policy areas.

**Better indicators to track the impact of ESI Funds are needed**

While the ESI funds for health project did not gather information about the outcomes of projects, one important aspect of the mapping activity was the identification of the indicators, which are the essential tools to measure the impacts of projects. The different Operational Programmes (OPs) include indicators that enable the monitoring of

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[96] Whitehead M. (1990). The concepts and principles of equity and health. Copenhagen. WHO Regional Office Europe

[97] Marmot, M. (2005). Social determinants of health inequalities. The lancet, 365(9464), 1099-1104.

[98] World Health Organisation (2010). A conceptual framework for action on the social determinants of health. Geneva

[99] Marmot M et al. (2013) Health inequalities in the EU: final report of a consortium. Consortium lead: Sir Michael Marmot. Brussels: European Commission

[100] EuroHealthNet (2017). EuroHealthNet Position: on the proposal by the European Commission to establish a potential European Pillar of Social Rights (EPSR), available at: https://eurohealthnet.eu/sites/eurohealthnet.eu/files/publications/EuroHealthNet%20response%20on%20a%20potential%20EU%20Social%20Pillar.pdf

[101] EuroHealthNet (2017). The European Semester : A health inequalities perspective, available at: https://eurohealthnet.eu/publication/european-semester-health-inequalities-perspective

[102] EurohealthNet, (2018). Policy Precis, The European Pillar of social Rights https://eurohealthnet.eu/sites/eurohealthnet.eu/files/newsletter/InfoSheet_SocialPillar_HighRes2.pdf

spending outputs and results. Member States are required to use a set of common indicators for monitoring the programmes. In the case of health, there is only one required common output indicator which specifies the population covered by improved health services. Moreover, programme-specific indicators can also be used, but most used indicators are measuring the outputs rather than the outcomes of projects.

Measuring the impacts of different projects was perceived as an important but difficult task by many stakeholders. The use of various types of indicators to track these impacts was especially complex for projects supporting access to healthcare and in general, for all projects that aim at reducing health inequalities. However, this is also an essential task to keep track of progress. Developing good and specific indicators for ESI Funded projects is essential to measure the contribution of these projects.

## LOOKING AHEAD TO THE MFF 2021-2027

Proposals for the MFF 2021-2027 were released in 2018, with an emphasis on stronger links between EU policy, particularly structural reform. From 11 Thematic Objectives in the current period, the new Cohesion Policy will focus on five policy objectives, one of which – a more Social Europe – will deliver on the European Pillar of Social Rights (EPSR), primarily through investments under ESF+. Another objective, 'a Europe closer to citizens', promises closer links to locally-led development strategies with funding from the ERDF and the Cohesion Fund. Cohesion Policy funds will be directly linked to the European Semester[103] and programmes will need to demonstrate progress in supporting implementation of the CSRs. A Reform Support Programme (RSP) will provide financial and technical support to Member States to pursue and implement reforms identified in the context of the European Semester.

Overall, these proposals present many opportunities for the health sector, raising the potential for cross-sectoral cooperation, blending funds, and the capacity for positive reform. The following sections highlight some of the most promising elements of the new MFF and how they can best deliver on the key challenges to date in the current programming period.

- **Stronger links with the European Semester and structural reform present an opportunity for health but care must be taken to maintain links with the social inclusion agenda and relevant stakeholders, including at local and regional level**

In the 2021-2027 period, the CSRs will serve as a roadmap for the design of Cohesion Policy programmes, and monitoring requirements will be aligned with progress on implementing the CSRs. This will follow on from the use of the CSRs as a guide for the mid-term review of the current programmes.

Structural reforms carried out in the framework of the European Semester target upwards social and economic convergence through inclusive growth in the EU and health has a key role to play here. While guidance from the Commission has been useful in triggering the health system reform needed for socially inclusive growth (such as de-institutionalisation and improvements in healthcare access), closer links with the European Semester process and CSRs will reinforce this process. In recent years, just under half of Member States received a CSR directly addressing the health sector, most of which pointed to resilient and accessible healthcare systems as a pre-requisite for the implementation of other socio-economic reforms. However, the Commission has found that issues related to long-term healthcare are among the slowest to be implemented within the European Semester[104], suggesting that there is considerable progress to be made.

During the course of the ESI Funds for Health project, some stakeholders expressed concern that the European Semester and the CSRs related to health place too much emphasis on the cost-effectiveness and sustainability of healthcare systems as opposed to the quality of care, including access and inequality issues. There is a critical inter-dependence between health and socio-economic policies, and this needs to be borne in mind within the context of the Semester as links between EU funds and implementation of the CSR become stronger. In particular, the European Semester and the CSRs related

[103] The European Semester is the EU annual cycle of economic policy coordination. Each year, the Commission undertakes a detailed analysis of each country's plans for budget, macroeconomic and structural reform. It then provides EU governments with CSRs for the next 12-18 months.

[104] European Commission, COM(2018) 400 final, 2018 European Semester – Country-Specific Recommendations 8.

to health, must pay attention to the social determinants of health and the reduction of health inequalities.

The European Semester is an important mechanism to underscore the need for health sector reform in line with the EU's agenda for social inclusion. At present, the European Semester process of problem analysis and the development of responses to CSRs is dominated by the EU institutions and national Ministries, with limited formal mechanisms for cooperation with external partners. If the ESI Funds are to be linked more closely to the European Semester process, care should be taken that external partners are given more opportunity to participate, particularly at local and regional level. As pointed out by European Regional and Local Health Authorities (EUREGHA), without the input of relevant sub-national authorities ESI-funded solutions can overlook the specific context required to reach end-users, particularly vulnerable and 'hard to reach' groups[105]. As health and the economy are closely related, the CSRs and EU funding programmes have a tangible opportunity to demonstrate EU added value in the joint development of a social and a more competitive Europe for all.

- **Increased emphasis on institutional capacity-building is a welcome development and should be extended to programming and implementation of ESF+**

The proposed RSP will dedicate EUR 25 billion to provide financial incentives and technical support for implementing structural reforms identified in the European Semester. Public health and social welfare are among the policy domains identified for support by the programme. This emphasis on creating incentives and building capacity for reform is a welcome development for health. Many of the 'gaps' identified through the ESI Funds for Health project are linked to structural reform issues that are difficult to address through project-based funding. It will be important to ensure that the RSP funding works in conjunction with the programmes and projects prepared for ESF+ funding, e.g. requiring institutional capacity analyses as part of each objective or priority axis within the OP. In some cases, reform-support funding (available both in the current period and the future) could be used to assist authorities in the programming of EU funds, including negotiating with administrations at the programme level for the right policy objectives and priorities. This could be very useful for health stakeholders.

Specific capacity building is also needed to improve health equity. Managing authorities or health systems managers should aim to get funding to train public health professionals to systematically monitor health inequalities and to incorporate a focus on health equity in the design, implementation, and evaluation of all relevant policies and programmes. In addition, connections and capacities are required across sectors to ensure the health implications are fully considered. The ESI funds could be used to develop the capacities of health professionals to work with other sectors to promote health, wellbeing, and equity. This will guarantee a fairer distribution of opportunities for good health and a reduction in health inequalities.

Capacities also need to be developed in terms of finance and financial literacy. The future InvestEU has included proposals to establish capacity building funding. This will be vital as the successful identification and use of new funding streams will be essential to health systems, programmes, and interventions.

- **Inclusion of the EU Health Programme within the ESF+ Regulation can boost cross-sectoral collaboration**

[105] EUREGHA position on the future of Health in Europe beyond 2020, 'Health in all Regions', October 2018.

For 2021-2027, the ESF+ is proposed as the EU's main instrument to invest in people and implement the EPSR. It merges a number of instruments relating to employment and social inclusion, as well as the EU Health Programme. Pooling resources in this way is a welcome recognition of both the cross-sectoral nature and the value of health as a policy priority. The importance of cross-sectoral collaboration and the challenge - especially at national level – of engaging sectorally oriented authorities and institutions with developing integrated programmes and projects to deliver stronger health outcomes was underlined throughout the ESI Funds for Health work. Looking ahead, the creation of a single funding instrument would likely enable better cooperation among the EU health, cohesion, employment and social policies. Ideally, this would be accompanied by smoother cooperation between the ESF+ and other funds, such as the ERDF/Cohesion Fund, Horizon Europe and InvestEU.

- **New opportunities for synergies between financing instruments provide greater potential to promote investments in health**

While 'traditional' R&I will continue to be supported by the ERDF through enhanced links with Horizon Europe and the S3s, the ESF+ will finance social innovation in the next MFF. More specifically, Member States will be encouraged to support social innovation and bottom-up approaches for community-led development. The next programming period provides further opportunities to invest across the spectrum of health innovation actions (particularly those that emphasise social innovation), from the development of new products and integration of digital solutions in health to the creation of new care models and soft measures for addressing Europe's societal challenges. These opportunities can be significantly enhanced by better synergies between the available financing instruments and national or regional S3s. Member States should therefore be encouraged to develop comprehensive S3s that recognise the potential and importance of social innovation activities that support soft measures, as well as the more traditional innovation actions centring on infrastructure, products and new ideas.

Exploring the application of existing solutions and new approaches to healthcare can complement infrastructure development and contribute to a range of objectives such as health promotion, health system reform and improving access to healthcare. Encouraging the funding of social innovation beyond the possibilities available under ESF+ (i.e. ERDF, InvestEU and Horizon Europe through their links with S3) can lead to an uptake in such investment, with significant benefits for health policy objectives.

- **Health stakeholders need more coordination across the EU to fully understand existing projects and initiatives and identify opportunities for funding and collaboration. The European Commission has a role in fostering this**

The events organised by the ESI Funds for Health project were well-received by participants as a chance for peer-to-peer networking. In their workshop evaluations, participants most often noted their appreciation for the opportunity to learn and be inspired by projects and people addressing similar challenges across the EU. They also stated their interest in similar sharing events in the future.

There is a further opportunity for better dissemination of EU-level initiatives (particularly those funded by the EU Health programme) among stakeholders in the Member States. The ESI Funds for Health events identified new possibilities for synergies between individual ESI-funded projects and other initiatives. For example, Ministries of Health managing projects targeting the supply and distribution of healthcare workers learned about the JAHWF and the option to receive a toolkit, training and technical assistance through the SEPEN. The Best Practice Portal (which gathers actions co-funded under the Health Programmes related to health promotion, disease prevention and management of non-communicable diseases) was also mentioned as a key tool for sharing knowledge and useful practices across Member States. Participants at the ESI Funds for Health

events suggested that a similar portal could help to disseminate good practices collected by ESI-Funded projects and help potential beneficiaries to transfer knowledge and identify potential collaborators.

The environment sector provides a good example of a network of Member States and some key NGOs working to develop and share common approaches to incorporating environmental sustainability in the programming and implementation of Cohesion Policy. Managed by DG Environment, this network[106] includes Member State environmental authorities and some managing authorities, as well as other Commission services (e.g. DG REGIO, DG CLIMA). Working groups cover specific issues and produce position papers and other outputs that support better integration of environment in the funds, with the network meeting once or twice a year to share information and outputs. The fact that the EU Health Programme will become a strand of ESF+ may provide the impetus for closer cooperation between the two programmes, despite their different management styles (i.e. ESF+ will be under shared management while the Health Programme remains centrally managed). Stakeholders' positive reactions to the networking element of the ESI Funds for Health project indicates that further networking dedicated to health could help to overcome many of the existing challenges, as well as building confidence and capacity among the authorities and institutions responsible for driving reform and maximising the health outcomes of these funds.

- **The systematic use of indicators could contribute to track the impact of ESI funds in addressing health inequalities**

The development of more nuanced indicators and their more consistent use are key to the systematic tracking of the impact of ESI Funds in health. Measuring reductions in health inequalities or improvements in access to healthcare often requires citizens, service providers and end beneficiaries to provide a more qualitative feedback on their experience. Incorporating various dimensions of the health impacts of projects may contribute as one of the 'enabling conditions' for taking decisions on the funds allocations. Both the next 2021-2027 period and the European Semester process deliberations are calling for stronger links between funding mechanisms, and recommending reforms of health systems to make them more 'accessible, resilient and sustainable'. This should be followed with a set of indicators able to measure systems' accessibility, resilience and sustainability potential.

While some countries have proactively developed their own programme-specific indicators, still, these indicators rarely attempt to measure health outcomes. 'Tailor-made' indicators show the need for (sub-)national- and context-specific progress measurement; however, the indicators' transferability potential should be further discussed. There are diverging realities in access to health and disparities in health, which can be addressed with EU funds. A more comprehensive system of appropriate indicators that capture impacts on diverse populations and include both the outputs and health outcomes of projects is needed. National or regional health monitoring systems should be able to collect and provide this type of information

The ESI Funds should continue to target access to healthcare in line with the State of Health in the EU initiative, European Core Health Indicators (ECHI), the EPSR and its updated Social Scoreboard, the Sustainable Development Goals' targets or even the OECD Better Life index. In relation with explicit healthcare services, potentially useful indicators could include self-reported unmet need for medical care (ECHI and Social Scoreboard), healthy life-years (at the age of 65, aggregated per gender; Social Scoreboard), as well as out-of-pocket expenditure on healthcare (Social Scoreboard). Given the regional application of the ESI funds, the use of life expectancy or disability-

[106] European Network of Environmental Authorities-Managing Authorities (ENEA-MA): http://ec.europa.eu/environment/integration/enea-ma_plenary_meetings_en.htm

adjusted life years (DALYs) –which are commonly used indicators—could offer additional advantages in measuring the impacts of projects on health outcomes across Europe. Another further source of inspiration could be the 2016 EC proposal for a Regulation to promote better integration of data collected through seven social surveys, which includes data on inequalities and social determinants of health, and the indicators used within the Sustainable Development Agenda 2030—e.g. indicators for SDG 3.8 'universal health coverage', which include coverage of essential health services, and proportion of population with large household expenditures on health as a share of total household expenditure or income.

There seems to be a need for further work on the use of indicators linked to the ESI funds, which might be able to capture the multiple and complex health dimensions of the funded projects. The system could benefit from a strengthened and updated approach but also from more coherence and coordination between various data sets and closely linked policies such as health and social care to ensure more ambitious and targeted actions to reduce health inequality, advance social inclusion and improve socio-economic sustainability. Also, tracking the links to innovation, environment and digital policies, among others, would be essential to ensure that the availability of healthcare is enhanced and expanded in a sustainable manner.

# REFERENCES

*All weblinks listed below were functional as of February 2019.*


Ernst & Young, 2016, Mapping the use of European Structural and Investment Funds in health in the period 2007-2013 and 2014-2020 programming periods, 15 January 2016, http://www.esifforhealth.eu/pdf/Mapping_Report_Final.pdf

EUREGHA, 2018, EUREGHA position on the future of Health in Europe beyond 2020, 'Health in all Regions', October 2018, http://www.euregha.net/wordpress/wp-content/uploads/2018/12/EUREGHA-Future-of-Health_V3.pdf

EuroHealthNet, 2018, Analysis of the Multiannual Financial Framework 2021-2027 from a health and health equity perspective, September 2018, https://eurohealthnet.eu/sites/eurohealthnet.eu/files/publications/EuroHealthNet%20Analysis%20of%20the%20Multiannual%20Financial%20Framework%202021-2027.pdf

EurohealthNet, (2018). Policy Precis, The European Pillar of social Rights https://eurohealthnet.eu/sites/eurohealthnet.eu/files/newsletter/InfoSheet_SocialPillar_HighRes2.pdf

EuroHealthNet (2017). EuroHealthNet Position: on the proposal by the European Commission to establish a potential European Pillar of Social Rights (EPSR), available at: https://eurohealthnet.eu/sites/eurohealthnet.eu/files/publications/EuroHealthNet%20response%20on%20a%20potential%20EU%20Social%20Pillar.pdf

EuroHealthNet, 2017, The European Semester: A health inequalities perspective, November 2017, https://eurohealthnet.eu/sites/eurohealthnet.eu/files/publications/EuroHealthNet%20Analysis%20of%20European%20Semester%20November%202017.pdf

European Commission, 2018, European Structural and Investment Funds Data website: https://cohesiondata.ec.europa.eu/

European Commission, 2018, The European Pillar of Social Rights in 20 Principles website: https://ec.europa.eu/commission/priorities/deeper-and-fairer-economic-and-monetary-union/european-pillar-social-rights/european-pillar-social-rights-20-principles_en

European Commission, 2018, European Semester website: https://ec.europa.eu/info/business-economy-euro/economic-and-fiscal-policy-coordination/eu-economic-governance-monitoring-prevention-correction/european-semester_en

European Commission, COM(2018) 233 final, Communication on enabling the digital transformation of health and care in the Digital Single Market; empowering citizens and building a healthier society.

European Commission, COM(2018) 400 final, 2018 European Semester – Country-Specific Recommendations.

European Commission, SWD(2018) 126 final, Staff Working Document on enabling the digital transformation of health and care in the Digital Single Market; empowering citizens and building a healthier society.

European Commission, Horizon 2020 Work-Programme 2018-2020, Towards the next Framework Programme for Research and Innovation: European Innovation Council (EIC) pilot, http://ec.europa.eu/programmes/horizon2020/sites/horizon2020/files/17._eicpilot_forprepublication.pdf

European Commission, 2017, Regional Innovation Scoreboard 2017, http://ec.europa.eu/growth/industry/innovation/facts-figures/regional_en

European Commission, 2017, The State of Health in the EU: Companion Report 2017, https://ec.europa.eu/health/sites/health/files/state/docs/2017_companion_en.pdf

European Commission, COM(2017) 134 final, European Interoperability Framework – Implementation Strategy.

European Commission, 2016, Implementing Smart Specialisation Strategies, A Handbook, http://s3platform.jrc.ec.europa.eu/documents/20182/154972/Implementing+Smart+Specialisation+Strategies+A+Handbook/2a0c4f81-3d67-4ef7-97e1-dcbad00e1cc9

European Commission, Economic Policy Committee, 2016, Joint Report on Health Care and Long-term Care Systems and Fiscal Sustainability, October 2016, https://ec.europa.eu/info/publications/economy-finance/joint-report-health-care-and-long-term-care-systems-fiscal-sustainability-0_en

European Commission, COM(2016) 725 final, Annual Growth Survey 2017.

European Commission, 2015, Perspectives for Research and Innovation Strategies for Smart Specialisation (RIS3) in the wider context of the Europe 2020 Growth Strategy, http://ec.europa.eu/research/regions/pdf/publications/ris3_report-082015.pdf

European Commission, 2015, Policy Roadmap for the implementation of the Social Investment Package, August 2015 version, http://ec.europa.eu/social/main.jsp?catId=1044&langId=en

European Commission, 2015, State of the Innovation Union 2015, https://publications.europa.eu/en/publication-detail/-/publication/0487b7b9-b5d6-11e5-8d3c-01aa75ed71a1/language-en/format-PDF/source-71238593

European Commission, 2014, Draft Thematic Guidance Fiche for Desk Officers, Research and Innovation, Version 3, http://ec.europa.eu/regional_policy/sources/docgener/informat/2014/draft_thematic_guidance_fiche%20research_innovation_final.pdf

European Commission, 2014, Enabling synergies between European Structural and Investment Funds, Horizon 2020 and other research, innovation and competitiveness-related Union programmes, Guidance for policy-makers and implementing bodies, http://ec.europa.eu/regional_policy/sources/docgener/guides/synergy/synergies_en.pdf

European Commission, 2014, Investments in Health: Policy Guide for the European Structural and Investment Funds (ESI Funds) 2014-2020, March 2014, https://ec.europa.eu/health/sites/health/files/health_structural_funds/docs/esif_guide_en.pdf

European Commission, COM(2014) 215 final, Communication on Effective, Accessible and Resilient Health Systems.

European Commission, 2013, Guide to Social Innovation, February 2013, http://s3platform.jrc.ec.europa.eu/documents/20182/84453/Guide_to_Social_Innovation.pdf

European Commission, SWD(2013) 43 final, Staff Working Document, Investing in Health, 'Towards Social Investment for Growth and Cohesion – including implementing the European Social Fund 2014 – 2020'.

European Commission, SWD(2012) 93 final, Staff Working Document, Action Plan for the EU Health Workforce.

European Commission, SWD(2012) 413 final, Staff Working Document, eHealth Action Plan 2012-2020 Innovative Healthcare for the 21st century.

European Commission, COM(2010) 2020, Europe 2020, A European strategy for smart, sustainable and inclusive growth.

European Commission, COM(2008) 725 final, Green Paper On the European Workforce for Health.

European Commission, COM(2004) 356 final, e-Health - making healthcare better for European citizens: An action plan for a European e-Health Area.

European Union Agency for Fundamental Rights, 2017, From institutions to community living, Part II: funding and budgeting, http://fra.europa.eu/en/publication/2017/independent-living-funding

Global Health Workforce Alliance, World Health Organization, 2008, Guidelines: Incentives for Health Professionals, Pre-publication Copy: http://www.who.int/workforcealliance/documents/Incentives_Guidelines%20EN.pdf

Graham, H., & White, P. C. L., Social determinants and lifestyles: integrating environmental and public health perspectives, *Public Health*, 2016 December, 141, pp. 270-278.

Ismeri Europa and WIIW, 2018, Support of ESI Funds to the implementation of the Country Specific Recommendations and to structural reforms in Member States, Final Report, 2018, https://publications.europa.eu/en/publication-detail/-/publication/de79c16e-6eb4-11e8-9483-01aa75ed71a1/language-en

Joint Action Health Workforce Planning and Forecasting, Final Guide of the Joint Action on Health Workforce Planning and Forecasting: http://healthworkforce.eu/wp-content/uploads/2016/11/WP2_FINAL_GUIDE_final_version.pdf

Marmot M et al. 2013, Health inequalities in the EU: final report of a consortium. Consortium lead: Sir Michael Marmot. Brussels: European Commission, https://ec.europa.eu/health/sites/health/files/social_determinants/docs/healthinequalitiesineu_2013_en.pdf

Marmot, M. 2005, Social determinants of health inequalities. *The Lancet*, 365(9464), 1099-1104.

Neagu O.M. et al. 2017, Addressing health inequalities by using Structural Funds. A question of opportunities, *Health Policy,* 2017 March, 121(3), pp.300-306.

Omachonu, V.K. & Einspruch, N.G. 2010, Innovation in Healthcare Delivery Systems: A Conceptual Framework, *The Innovation Journal: The Public Sector Innovation Journal*, Volume 15(1), Article 2.

Rutter, H., Savona, N., Glonti, K., Bibby, J., Cummins, S., Finegood, D. T., & Petticrew, M., 2017, The need for a complex systems model of evidence for public health, *The Lancet*, 390(10112), pp. 2602-2604.

Whitehead M., 1990, The concepts and principles of equity and health. Copenhagen. WHO Regional Office Europe.

World Health Organisation, 2010, A conceptual framework for action on the social determinants of health. Geneva.

World Health Organisation Europe, 2018, Non-communicable Diseases website: http://www.euro.who.int/en/health-topics/noncommunicable-diseases

# ANNEX I: ADDITIONAL INFORMATION ESI FUNDS FOR HEALTH PROJECT

**Additional information available on the ESI Funds for Health website**

The dedicated project website (www.esifundsforhealth.eu) provides further information on the research carried out. The website contains:

**Reports:**

- ESIF support for health investments: analysis report: http://www.esifundsforhealth.eu/sites/default/files/2019-02/Analysis%20Report.pdf
- Background report for the Conference of 6-8 December 2018: http://www.esifundsforhealth.eu/sites/default/files/2019-02/Background%20document%20Final%20Conference.pdf
- Final report of the workshops (including summaries and presentations for the 6 workshops): http://www.esifundsforhealth.eu/sites/default/files/2019-02/Final%20workshops%20report_1.pdf

**Mapping documents:**

- 28 country factsheets with information about the investments in each health theme in every Member State: http://www.esifundsforhealth.eu/explore-country
- Interreg mapping documents with information about the health investments supported under each strand of cooperation (Interreg A, B and C): http://www.esifundsforhealth.eu/regional-cooperation
- Six thematic mapping documents with aggregated information about the investments in each of the six health themes covered: http://www.esifundsforhealth.eu/explore-health-theme

**Project database:**

- Over 60 project examples, containing detailed information about the activities undertaken by the exemplary projects: http://www.esifundsforhealth.eu/project-database

**Workshops:**

- Information about the thematic workshops organised for each of the six health themes, including agendas, presentations and projects, together with workshop reports: http://www.esifundsforhealth.eu/workshops

**Conference:**

Information about the Final Conference held in Brussels on 6-7 December 2018, including the agenda, presentations and a report: http://www.esifundsforhealth.eu/final-conference-6-7-december-2018

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EB-07-18-006-EN-C

Publications Office

doi: 10.2818/42446
ISBN 978-92-9478-096-6