

PROJECT ACRONYM AND TITLE: *Age-It – A novel public-private alliance to generate socioeconomic, biomedical and technological solutions for an inclusive Italian ageing society*

FUNDING PROGRAMME *PNRR M4C2 Inv.1.3 PE- Partenariati Estesi*

HOST DEPARTMENT or CENTER: Department of Economics

SCIENTIFIC RESPONSIBLE: Agar Brugiavini

FINANCIAL DATA:

Project total costs	Overall funding assigned to UNIVE
€ 114.737.062,66	€ 5.582.585,63

ABSTRACT:

Population ageing is a major and unprecedented global phenomenon. It involves an increasing chance for individuals to reach old age (even if not necessarily in good health), and a rising share of older people over the total population. Global ageing is driven by the reductions in fertility and improvements in survival, typically occurring through the demographic transition. In turn this has triggered several dynamic processes involving society, markets, welfare states, cultural and political change, within an interconnected system. Ageing is a multi-faceted complex process, presenting challenges and risks, but also offering ground-breaking opportunities to promote inclusive well-being for society as a whole.

The Age-It programme follows the view of the World Health Organization, promoting “active and healthy ageing” (WHO 2015). Accordingly, ageing is not considered as a time of decline in mental and physical functioning, leading to a condition of health and socioeconomic dependency that makes older people a “social problem”, but rather as a period of life in which individuals can use their maturity to represent a resource for society, and an opportunity for building economically prosperous, socially just, and sustainable societies.

Italy is ranking high in global ageing: 23.3% of the population is 65 or older, life expectancy in 2015-20 is among the highest in the world, both at birth (83.3 years) and at the age of 65 (21.1 years), with current very low levels of fertility (1.24 children per women in 2020). This position as a frontrunner of ageing, together with the country’s extraordinary regional disparities (North vs. South, Coastal vs. Inland, Rural vs. Urban), make Italy the ideal “empirical laboratory” to address how different combinations of biological, clinical, cultural and socioeconomic factors, in addition to a variety of institutional responses by health and social care systems to the ageing process, are leading to different individual and societal outcomes.

However, structural bottlenecks have hampered the advancement of research: the prevalence of discipline-specific analytical frameworks, the limited transdisciplinary collaboration, the scattered availability of data, and the difficulty in translating the various scientific studies into policies.

Likewise, scanty opportunities for public-private and for academic and professional collaboration have so far limited the scope for transferring new research findings into practise or for contributing to a coherent national active and healthy ageing strategy.

OBJECTIVES and EXPECTED RESULTS:

The overall objective of **Age-It** is to increase Italy's contribution to research on ageing, making it a leader in research as well as in strategic European and global value chains, in accordance with the objectives and priorities of the National Research Plan (NRP) 2021-2027. Applying a holistic, interdisciplinary, and problem-solving approach, Age-It will overcome the fragmentation of different perspectives on ageing, involving a critical mass of partners including research and educational institutions, care providers and civil society associations, business units and industries. It will therefore include actors from all the relevant public and private, profit and non-profit domains, also opening the path to reduced time-to-market for added-value products and services. All activities are planned on the basis of five core objectives:

1. Producing an interdisciplinary blueprint of research on ageing, that will last well beyond the time of the programme itself, and will set the gold standard at the national and international level (OECD 2017; OECD 2020);
2. Unleashing the potential of fundamental and applied research on ageing, to push forward the frontiers of knowledge and drive breakthrough life-changing innovation in relation to social, environmental and economic changes, and biomedical factors, with a focus on sustainable development and a human-centred approach, also through the promotion, creation and development of start-ups and spin-offs from research;
3. Setting the basis for an architecture of the welfare system fully participating to the recovery effort, which will make Italy a more inclusive and cohesive society. This objective involves different domains: the pension system, health and long-term care systems (an integrated care model), and active labour market policies. It will aim at decreasing inequalities in the standard of living and ultimately reduce unequal ageing;
4. Training a new, gender-equal generation of cross-disciplinary scholars, with a particular focus on increasing the social and economic capital, and private-public collaboration, in the research communities of southern Italian regions and inner areas. The scholars will be able to reach worldwide excellence in their own discipline with the ability to use tools and concepts with an interdisciplinary approach to the different ageing dimensions;
5. Bridging the gap between academia and markets to upskill professionals on techniques providing the practical knowledge and skills to deliver future solutions.

The project puts together top scientists in the bio-medical domain, the economic domain, the demographic, statistical and political science domain, plus the data analytics domain, to create a unique critical mass of competences and knowledge to address the ageing process and challenges.

More specifically for the Spoke coordinated by Ca' Foscari, aims and expected results are the following.

SPOKE 6 *The Silver Economy. Work, participation, and welfare at older ages*

Abstract

Spoke 6 investigates the role of the silver economy in order to foster inclusive and cohesive welfare policies focusing on a positive approach at the microeconomic level. These include: 1) increasing the labour market participation of older people, especially in meaningful work (e.g., by accounting for individual preferences, needs and capacities); 2) promoting the digital and green transition of older workers (e.g., reducing the age-digital divide and removing barriers and inequalities in training) within the firm; 3) favouring a cultural transition about the ageing processes both at the individual and the societal level (e.g., acting on financial and healthy literacy at older ages); 4) enhancing participation, especially in old age and retirement years, in the area of informal and voluntary work (as a dimension of active ageing). Mobilize sustainable investments for the green transition of the economic system. Define sustainable financial instruments and offer

sustainable funding access to firms, especially SME. Define ESG scores targeted for SMEs and improving firms and financial institutions' alignment to EU Green Taxonomy.

Improve financial inclusion and funding to individuals, families and SME leveraging the complementarity among different funding and lending channels (digital and traditional).

Make public debt and financial system resilient in the face of economic, social and climate shocks.

Work Packages

Structure: Activities are organised in five WPs, which cover four interconnected dimensions: the relationship between ageing and work, including the relationship between health and labour market activities (WP1, WP2), innovations through the silver economy (WP3), welfare state interventions (WP4) and fighting unequal ageing (resources for old age and insurance – WP5).

Disciplines: Economics, econometrics, demography, sociology, management, psychology, actuarial science, financial mathematics, and engineering.

WP1 Empowering older people and older workers: human capital and productivity WP1 aims to: 1) develop an evidence-based work-related map of risks and trigger points over the life course, with permanent impact on well-being in old age; 2) define KPIs of the impact of ageing on human capital, at the individual and firm level, with measures of productivity, and the impact of automation for older workers; 3) evaluate the effects of the digital and green transition on the young-old labour demands, within the firm; 4) estimate a “career tracker”, to identify the policy interventions – discussed and developed in close collaboration with Spoke 10 – necessary to make ageing at work sustainable and active.

Output: Policy brief on healthy ageing in the work environment. Main KPIs relating work impact on well-being ageing. Guidelines for private firms and the public sector to empower older workers to co-design their working environment. Dissemination material to increase knowledge on the effects of ageing on human capital and resources

WP2 Active ageing: work, health and well-being. WP2 aims to: 1) estimate pathways to retirement related to the risk of injuries and health hazards; 2) estimate the role of co-designing a safe environment and of training on the job; 3) develop a multidimensional indicator of “ageing at work” linked to type of job, hazardous and risky tasks, mental health; 4) measure objective and subjective life-work balance for older workers; 5) assess “health and safety literacy” and derive KPIs for social health; 6) simulate the impact of the digital and green transition on working patterns, also in light of an increasing demand for health-related jobs (with WP5).

Output: Policy brief on pathways to retirement and occupational risks for older workers. New multidimensional indicators of “ageing at work”, new prototype of modules for data collection on objective and subjective experience of older workers at work. Laymen summaries report to increase knowledge in general population about “Health and safety literacy”

WP3 Silver economy and social capital. WP3 aims to: 1) identify the KPIs that foster the transmission of “know-how” between generations – especially for arts & crafts, and learn about best practices of intergenerational knowledge sharing; 2) foster the creation of new forms of entrepreneurship at older ages; 3) understand changes in preferences and attitudes of the older people for demand for goods and services; 4) identify the drivers of co-creation given new products and technological changes; 5) identify investment patterns for a silver ecology and civic engagement.

Output: Policy brief on the valorisation of social capital in the silver economy, scientific publications on changes in preferences and attitudes of the older people for demand for goods and services. Guidelines for end users to allow older people approaching new forms of entrepreneurship. Laymen summaries reports on the transmission of know-how between generations.

WP4 Life-cycle welfare. WP4 aims to: 1) analyse life course welfare interventions with an impact at older ages; 2) obtain a map of the “geography of retirement” in terms of services, purchasing power and amenities in relation to welfare provisions and for people most at risk of poverty or financial distress; 3) assess the degree of welfare coverage and any mismatch making use of an impact evaluation methodology; 4) learn about models of integrated welfare (including occupational pensions and firm-level health insurance) and the North/South gradient; 5) measure the “pension gap”, i.e., situations of poverty in old age due to lack of resources or lack of information and develop and “integrated model” of saving for retirement.

Output: Policy brief on welfare interventions with an impact at older ages, scientific publications on degree of welfare coverage, “pension gap” and geographic area at risk of poverty. Guidelines for end-users to make them aware of the indicators of “risky” retirement.

WP5 Mitigating unequal ageing: public and private resources for old age. WP5 aims to: 1) estimate the impact of the pension reform process on labour supply, wealth accumulation and well-being; 2) understand the role of the public/private pension mix for an ageing workforce and the role financial literacy as a determinant of the pension gap; 3) provide a full map of the financial/insurance instruments which accompany the ageing process using a life course approach; 4) analyse – in collaboration with Spoke 9 – technical solutions in different risk-environments that satisfy the demand for protection in old age; 5) provide a complete taxonomy and regional distribution of the existing LTC provisions and provide estimates and future projections of the sustainability of a Long-Term care (LTC) system.

Output: Policy brief on pension system reform and sustainability of the LTC system. Scientific publications on validated financial/insurance instruments useful in the ageing process. Guidelines for end-users on financial/insurance instruments that better fit their retirement plans.

Other Deliverables

Besides what mentioned for each WP, further deliverables are: reports integrating all policy briefs for a comprehensive overview of the policy strategies for ensuring the sustainability of the Italian Welfare System. New data collection modules to assess objective and subjective experience of ageing workers in the labour market to be integrated in the SHARE data set.

PARTNERSHIP: Age-It Enlarged Partnership

Affiliated Universities and research institutes (monitored by the Ministry of University and Research)

- 1 Università degli studi di Firenze UNIFI, (HUB and spoke leader)
- 2 Università degli Studi di Milano-Bicocca UNIMIB (spoke leader)
- 3 Università degli Studi del Piemonte Orientale "Amedeo Avogadro" UPO (spoke leader)
- 4 Università degli Studi di Padova UNIPD
- 5 Università Ca' Foscari Venezia UNIVE (spoke leader)
- 6 Alma Mater Studiorum – Università di Bologna UNIBO (spoke leader)
- 7 Università degli Studi di Roma “La Sapienza” SAPIENZA



- 8 Università degli Studi di Napoli Federico II UNINA (spoke leader)
- 9 Università degli Studi del Molise UNIMOL
- 10 Università degli Studi di Bari Aldo Moro UNIBA
- 11 Università della Calabria UNICAL
- 12 Consiglio Nazionale delle Ricerche CNR (spoke leader)

Other universities, research institutes and private entities

- 13 Istituto Nazionale di Statistica ISTAT
- 14 Istituto Nazionale di Ricovero e Cura per gli Anziani - IRCCS INRCA (spoke leader)
- 15 Istituto Neurologico Mediterraneo Neuromed I.R.C.C.S. NEUROMED Private
- 16 Università Commerciale Luigi Bocconi BOCCONI Private (spoke leader)
- 17 Università Cattolica del Sacro Cuore UNICATT Private
- 18 SISSA – Scuola Internazionale Superiore di Studi Avanzati SISSA
- 19 Università Vita-Salute San Raffaele UNISR, Private
- 20 Istituto Nazionale Previdenza Sociale INPS
- 21 Tech4Care srl TECH4CARE, Private
- 22 Generali Italia S.p.A. GENERALI, Private
- 23 HealthWare Group HEALTHWARE, Private
- 24 Beta 80 S.p.A Software e Sistemi BETA80, Private
- 25 Municipia S.p.a. MUN, Private

Other entities (not Spoke nor affiliates)

- 26 Confcooperative CONF, Private
- 27 Sanofi srl SANOFI, Private