

2024 Report

An Integrated Mapping of the Elderly Care Units in Greece



About the Authors



Helen E. Salavou is currently an Associate Professor of Business Administration at the Athens University of Economics and Business. Her main research interests involve entrepreneurship, traditional and social. She has published her work in international journals and participated in several national and international research projects.



Dr. **Andreas Georgiou** is a Lecturer in Sustainable Entrepreneurship at the University of Exeter Business School, after completing a PhD in Management Sciences at ESADE Business School. His research interests include social, community and collective entrepreneurship, as well as sustainable development. His most recent work has appeared in the European Management Journal and Organization Theory.



Dr. **Panagiotis Kyriakopoulos** is a postdoctoral researcher at the Enterprise Research Centre of Warwick Business School. He holds a PhD in Management from the Adam Smith Business School at the University of Glasgow. He has received several accolades, including the Adam Smith Business School Award for Excellence in Research, the British Council's Business and Innovation Alumni Award, and the Adam Smith Business School PhD Prize for Excellence.



Dr. **Xenia Mamakou** is a faculty member at the Athens University of Economics and Business. She holds a PhD in Information Systems and her main research interests are in the areas of business analytics, digital transformation, electronic commerce, e-government, and service quality.



Eleftheria V. Petropoulou is a Ph.D.c. at the Dpt of Business Administration at the Athens University of Economics and Business and a Gerontologist. She focuses on the principles of Social & Green Entrepreneurship and Geriatrics to develop interdisciplinary models and metrics that enhance the Organizational Sustainability, Resilience, Socio-Environmental Impact, and Financial Performance of For-Profit and Philanthropic/Non-Profit long-term care (LTC) facilities for senior citizens and the chronically ill.



Elisavet Protonotariou is a PhD Candidate at Athens University of Business and Economics, after completing a master in Accounting and Finance at AUEB. Sustainability, social, environment and due diligence are some of her interests. She is also business consultant and accountant and has her own business.



Dr. **Emmanouil Sofikitis** is a post-doctoral researcher at the Laboratory of Management, Strategy and Entrepreneurship of the Athens University of Economics and Business. His research background includes quantitative studies in the areas of International Business, Strategic decision-making of small and medium-sized enterprises and International Entrepreneurship. Dr. Sofikitis has several years of expertise in the coaching of entrepreneurial teams and start-ups including social entrepreneurship ventures under business acceleration programs and open-innovation projects.

Introduction

The present report highlights the main challenges that are dealing with the elderly care units in Greece. It starts with the establishment of the National Healthcare System in the 1980s, aiming to expand universal healthcare coverage, a move away from the previous insurance-based model which was limited to formally employed individuals. It all began with the creation of Greece's National Healthcare System in the 1980s, which aimed to provide universal healthcare. Before that, the system only covered people with formal jobs through an insurance-based model. As the years rolled into the 1990s and 2000s, the focus expanded, this time to improving elderly care. Social shifts like more women entering the workforce and fewer families able to provide caregiving at home created new pressures. Philanthropy and non-governmental organizations stepped in to help, boosting healthcare services along the way. Such austerity measures cut health care budgets to the bone, with elderly care taking the sharpest blow. Then came the COVID-19 pandemic just as the industry was getting back on its feet. That presented new challenges: nursing homes struggled with infection control, isolation, and continuity of operations. Now, the focus is on rebuilding. Reforms aim to strengthen infection prevention, modernize care with technology, and prepare the sector for what's next. Big legislative changes are also on the horizon, especially with the establishment of the Ministry of Social Cohesion and the Family in 2023. These efforts are important since Greece faces the growing needs of an aging population while dealing with ongoing economic and social challenges. Smart innovation and thoughtful policies will be the foundation for a sustainable, high-quality elderly care system moving forward.

PESTEL Analysis of the LTC Greek Sector

The PESTEL of Greece's long-term care (LTC) sector suggests certain opportunities and threats towards its future direction. Opportunities mainly come from technological and social dimensions. The increasing integration of such sophisticated technologies (e.g., Artificial Intelligence) within LTC settings creates a great opportunity to enhance the quality of the service and the efficiency of its operation toward meeting the growing needs related to an aging population. Moreover, the social trend to recognize the demand for overall elderly care services because of the increase in the elderly population could facilitate the industry's growth and diversification of services. Strong threats, however, emanate from the economic and legal frameworks.

Among all the challenges, the economic ones stand out as the toughest. This challenge is essential for this sector, as many ECUs are resource-constrained, highlighting the need for donations and support crucial. From a legal perspective, there is an increase in regulatory pressures at the level of national reforms, as well as in EU directives, binding the staffing standards, the quality of care, and facility management with heavy regulations. As such, these regulations guarantee that the levels of care will be high, but often put more operational burdens on the LTC facilities and make everyday functioning, not to say strategic planning, much more cumbersome. It therefore addresses these challenges with regard to a balanced use of technological innovations and adjustments in social changes within narrow economic

constraints and regulatory landscapes, finally ensuring sustainability and quality in the care of Greece's elderly.

Population Demographics

Demographically, Greece has reached a critical point in the history of the country's healthcare infrastructure, since it is among the fastest-growing aging populations in Europe. The average age of the Greek population increased dramatically from 31.2 years in 1960 to 45.5 years in 2021, a period in which the structure of the population changed significantly. This is further stated by the tendency towards aging, represented by the Aging Index, whereby Greece is above the average in the EU, with a larger proportion of elderly compared with people of working age. This creates the risk of a dangerous upward spiral of pressures on the system. With Greece's population aging rapidly, it's clear that strong and effective strategies must be developed to tackle these growing challenges.

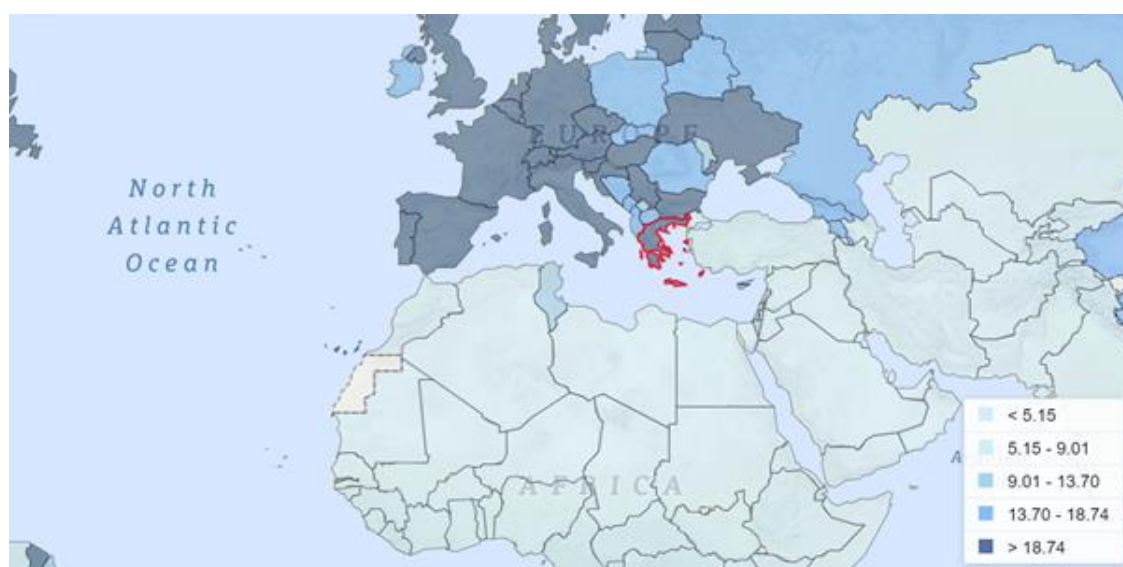


Figure 1: Global map with the frequency of citizens over 65 years old (in millions) (World Bank, 2022)

If present estimates prove true, by the year 2050, there will be a threefold increase in the global share of citizens over the age of 65. In Greece alone, the same age segment shall reach a proportion of 22%. Correspondingly, this demands necessary re-evaluation of healthcare services, shifting from their restrictive bounds, since increased demand would emerge in both quality and extent.

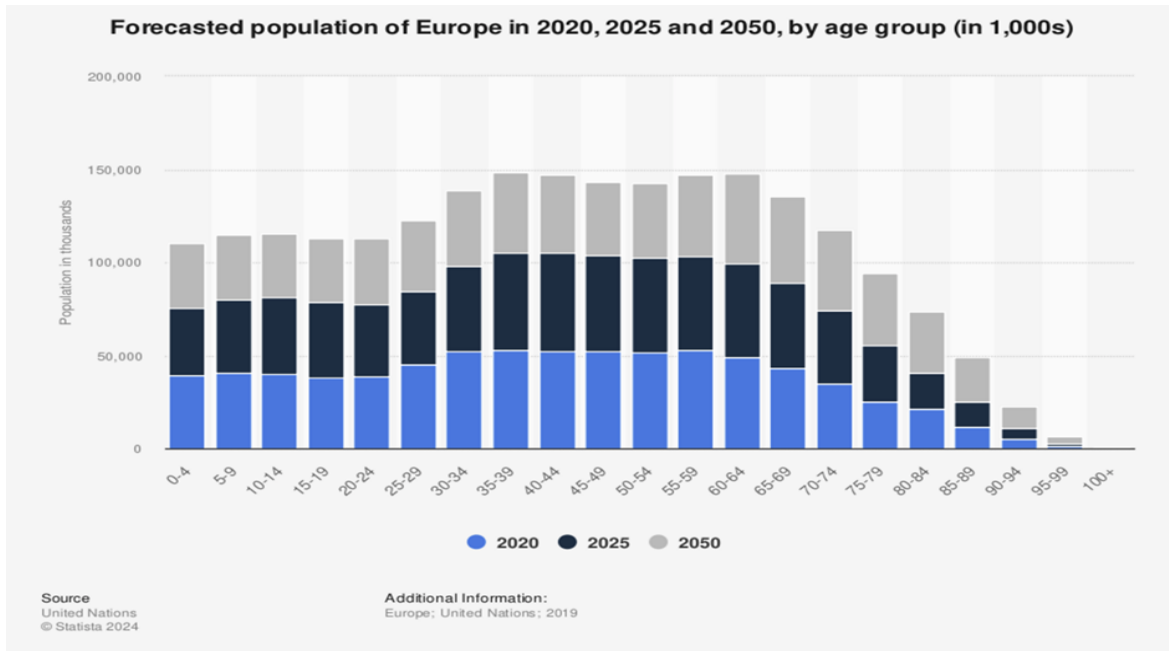


Figure 2: Projections in the increase of the EU's population by age group (Statista, 2024)

Population Trends

Greece's population trends highlight a dramatic demographic shift that's being seen across many OECD countries: an aging population. By 2050, an estimated 36% of Greeks will be 65 or older. Looking further ahead, the number of old-age dependents is expected to increase by 63.1% by 2070 (see Figure 3). Therefore, these projected indications constitute a reversal of the call's prediction that new levels and pressures demand be put on health care and social structures; until then recognition will have to be evident regarding the structuring changes, support for an older population. The report also notes a disturbing trend in the low birth rate, which makes it difficult to raise the population and adds strain to a country's pension and health systems. It signals an acceleration in the number of centenarians, estimates that more dependents on care will rise and predicts a strain on public health and long-term care institutions. Thus, one of the most important reactions to such challenges in order to achieve appropriate health care that is sustainable for a better state of expectation of life, therefore calls for visioning and strategic policies that could formulate health systems resolute enough against these demographic and economic challenges outlined.

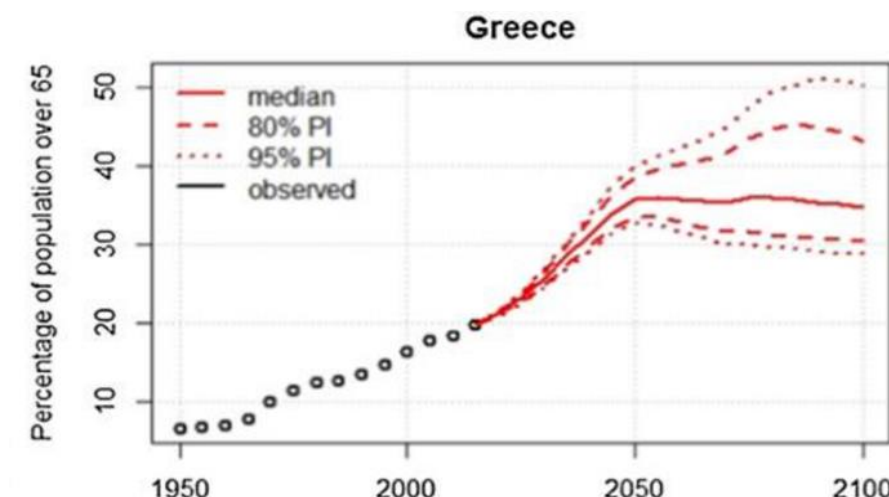


Figure 3: Projection on the number of individuals aged 65+ (Lamnisis et al., 2021)

Defining Older Adults and Elderly care units (ECUs)

Elderly people (e.g., people over 65 year old), often face a decline in their physical and functional abilities. As shown in Figure 4, this raises their risk of health problems. Elderly Care Units in Greece are specifically designed to help this vulnerable population to provide care, and many services, such as medical attention, and personal help. Supporting healthy aging requires initiatives that help older adults maintain mobility, cognitive health, and good nutrition. Defining and providing long-term care (LTC) is challenging and thus it makes it difficult to create consistent policies and deliver effective services. To tackle these issues, Greece needs to adopt flexible care models that can adapt to the unique and often complex needs of its aging population to improve their quality of life.

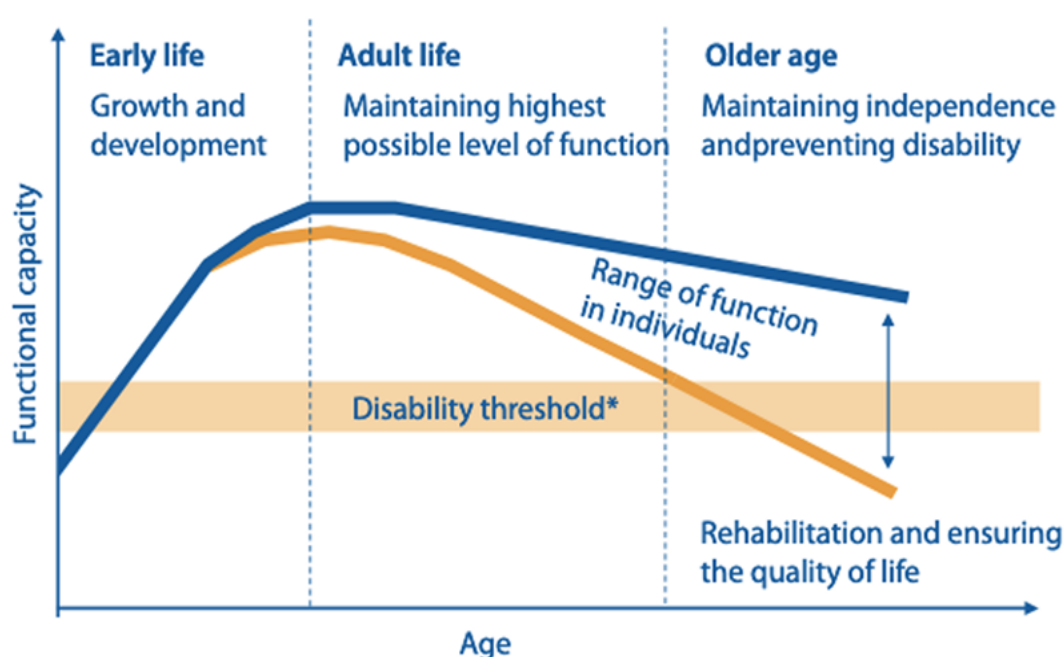


Figure 4: Functional capacity across different ages (Eldemire-Shearer, 2008)

Long-Term-Care Models

With the growing existence of ECUs, the diversity of LTC delivery models reflects a responsiveness to both population and health system needs among ECUs. Key models including the Kaizer model focus on preventive strategies and linkage of primary and secondary care to reduce time in hospitalization related to long-term conditions, enabling better self-care approaches. It is built on the concept of integrated care focusing on the improved management of chronic conditions to reduce hospitalizations. That is, it shies away from siloed healthcare delivery and instead reinforces integrated service provision among providers and locations for patients to receive a full spectrum of care that meets their individual needs. Since Greek ECUs belong to the secondary care level, only a few emphasize preventive medicine. Conversely, the Pfizer model prioritizes proactive healthcare engagement, particularly for high-risk patients, to bolster self-management and complement existing health services. The Evercare model shifts focus towards home-based nursing care with a holistic approach, minimizing medical intervention in favor of tailored nursing practices that consider the broad impacts of polypharmacy. Namely, it focuses

on older people in need of chronic care, delivering complete ancillary services, such as regular health monitoring and an individualized nursing plan to help them perform their daily living activities better at home and improve their health status. It is being used by smaller ECUs (the ones that are dedicated to mirroring the homes of the elders) and it is implemented in regional, non-profit ECUs. Examples of these are the regional municipal retirement homes run by the local authorities of Swiss cantons. Meanwhile, the Public Health model reemphasizes disease prevention and the broader socio-economic determinants of health, a framework that gained renewed importance during the COVID-19 pandemic with its focus on infectious disease control and antimicrobial resistance. This model is usually adopted and integrated within an existing LTC model of geriatric clinics, which also serve as teaching and research centers, which, yet, are not yet present in Greece. Another model is the Guided Care model, which prioritizes high-risk patients with numerous health conditions to provide them with the knowledge needed to deal with diseases, improving the quality of provided health care services. Since Greeks tend to consider ECUs as the last resort of care for their relatives, they tend to reach out to them in the later stages of life, when the older beneficiaries have become high-risk patients. Last but not least, the Wagner model pays attention to the need for a supportive network and healthcare infrastructures to maximize care delivery by integrating six essential elements for managing chronic diseases, such as clinical information systems and community support.



Challenges facing the sector in Greece and the EU

Socioeconomic determinants combined with the way healthcare systems operate form the overall health status of elderly people in Greece and Europe. In regions with significant older populations, such as the EU and the OECD, health inequalities are present, including unequal access to healthcare services according to socioeconomic status, and chronic diseases such as heart disease and diabetes being widespread. These lifestyle choices often include poor dietary habits and low physical activity. The growing need for medical care and support is a major issue in this field. These issues are made worse in environments with limited resources, like Greece. Although the efforts and initiatives of the European Union to prioritize health-related problems and launch rules (e.g., EU funds for health programmes, standards for medical services), some differences still exist in how these rules are implemented between member states, indicating different national differences and budgetary capacities.

The Greek elderly care industry is primarily dealing with a lack of funding, and infrastructure, and a lack of skilled employees. This calls for more funding, better infrastructure and skilled personnel to overcome these challenges. In addition, geographical imbalance affects accessibility to services. Urban centers such as Athens and Thessaloniki are doing better than rural areas that have much fewer resources. The sector also faces serious workforce shortages, exacerbated by migratory trends among health professionals seeking better opportunities abroad. This leads to significant gaps in the quality and availability of care. The integration of new staff, often from different backgrounds, into long-term care is necessary but slow. There is therefore a great need for strategic workforce improvements and comprehensive policy reforms to ensure equitable, high-quality care in all regions.



Pension System

Pension systems in all OECD nations—including Greece—are suffering from ageing populations and economic pressures. The three primary types of Greece's pension system include private pensions based on personal savings, workplace pensions, and public state pensions funded by taxes or contributions. There is an increasing interest of the EU and its member states on private pensions to complement state and employer-provided plans. For Greece, where spending on long-term care is relatively low, the government faces a tough balancing act: ensuring the financial sustainability of the system while expanding and improving elderly care highlighting the need for support for this population.

Social Mission

ECUs address the need of the country's rapidly aging population, which is notably higher than in many other OECD nations, and they provide essential secondary and social care services. These facilities support older people who often live alone, have limited autonomy, or need continuous care, but they currently exclude individuals with infectious diseases. ECUs operate under a mix of for-profit, non-profit, and hybrid models, with a dual mission. ECUs often provide innovative services (voice-activated assistants, medication management) for elder care (new services), and thus, they are becoming more and more necessary as Greece's healthcare policies change.

Formal and Informal Care, Long-term care and Short-term Care

The two central types of healthcare systems in Greece are formal and informal care. Around 76,000 beneficiaries are served by organizations like KAPI (Open Care Centers for the Elderly) and KIFI (Day Care Centers for the Elderly) and hospitals. The private sector also contributes to the care of older people, while the Red Cross and other third-sector organizations. In-home care (informal care) can also happen, but this needs to be officially acknowledged or quantified in healthcare statistics.

In terms of the long-term care facilities provided by the ECUs in Greece, modern ECUs offer safe accommodation, meals, regular medical supervision, hygienic care, and assistance with their mental, physical, and spiritual health. Long-term care, including assisted living homes, can also be provided on special occasions. Although it is less common, governmental programs fund home care for those who would instead remain in their homes. Personalized care plans that address older persons' medical and non-medical requirements are facilitated by geriatric assessments and hospice care, which are becoming increasingly popular.

Greece faces major gaps in long-term care facilities compared to other EU and OECD countries. In relation to its ageing population, Greece has among of the fewest long-term care beds in the OECD. There are considerable regional disparities in the availability of care, while many of the ECUs often face economic issues in their effort to expand their care facilities.



Geographic Distribution and Governance

In Greece, ECUs are present in three main types: for-profit, non-profit, and public organizations. In Greece, there are notable regional variations in the distribution of ECUs. Athens and Thessaloniki (urban areas) have the most ECUs, 139 and 33 ECUs, respectively. ECUs in urban areas have more funding chances and a better healthcare infrastructure than those in rural and isolated areas, including several islands. Notably, Western Macedonia only has four ECUs, whereas Epirus has six, revealing availability disparities. Only 21 of Greece's 152 for-profit and 127 non-profit ECUs are directly run by the government.

152 for-profit

127 non-profit

21 public

For-profit ECUs are mostly found in cities, and they rely on private payments and catering to wealthier clients. As they are located in urban areas they get access to better resources and larger markets, which helps them maintain higher standards of care. Non-profit ECUs are mostly found in rural or less wealthy areas. They receive funding from a mix of government programs, insurance, and community support. Unlike for-profit units, non-profits focus on the needs of the community. They also reinvest any extra funds into improving care rather than upgrading buildings. The government often provide funding for public ECUs although it is often challenging for them to grow because of their resources constraints. Pensions and governmental subsidies provide most of the funding for ECUs, with EOPYY covering a significant amount of the costs (e.g., medical charges) of the elderly care people. In private for-profit ECUs, residents often bear additional costs through direct payments. In contrast, non-profit ECUs cover these fees with donations and sporadic governmental support, but they still need help with the delay times of EOPYY. Looking at the percentage of care beds in European nursing homes run by the public or private sector in 2020 (Figure 5), the public sector held the majority of care beds in nursing homes in Austria, France, or the Czech Republic, while the private for-profit industry managed the majority of beds in Ireland.



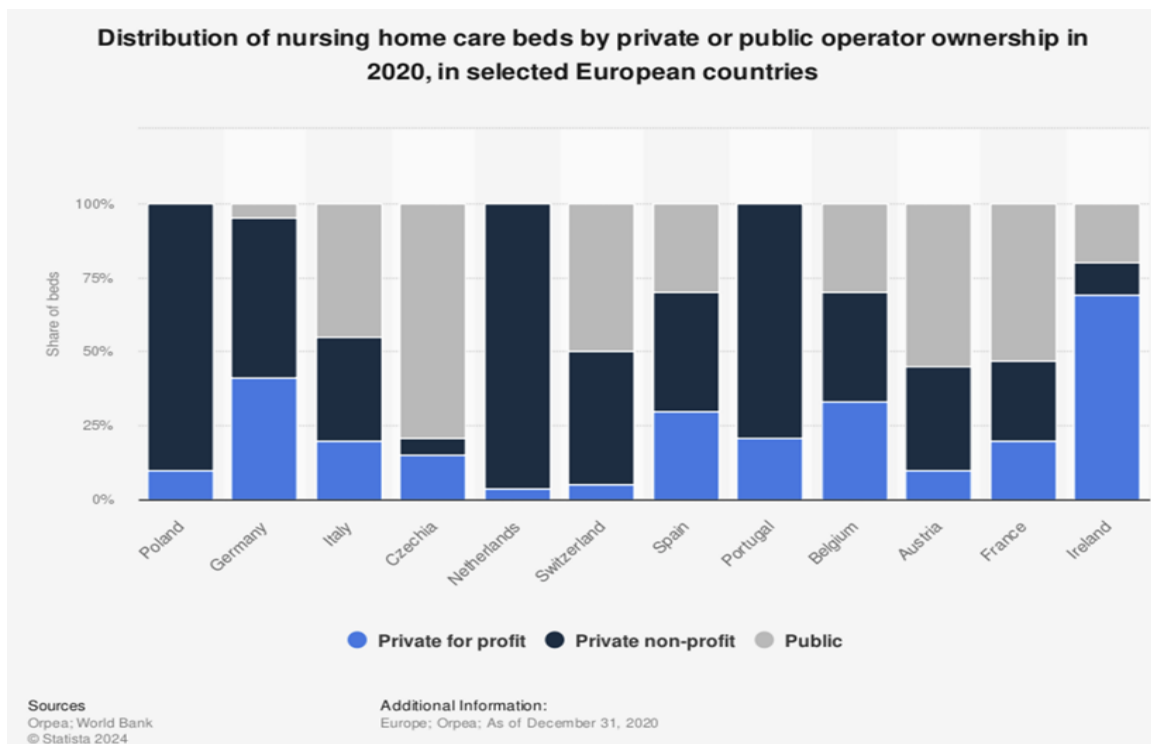


Figure 5: Distribution of nursing home care beds by private or public operator ownership in 2020, in selected European countries (Statista, 2024b)

Case Studies of Best Practices in Greece

Several case studies in this sector are considered successful case studies of ECUs. For example, Irida Nursing Homes (<https://iridacare.gr>) is a chain of superior facilities and medical treatments, while Aktios (<https://aktios.gr>) is known for its quality services and specialized dementia care. Papadopouleion (<https://papadopoulion.gr>) promotes its elderly care people's physical and mental well-being by emphasizing customized care plans. Moreover, Resteion (<https://restion.gr>), with 67 unit capacity (number of beds) and 11,000 m² infrastructure, is an ECU that creates a cohesive community.

Also, the ECUs operated by the Holy Diocese of Monemvasia & Sparti (<https://immspartis.gr/idrymata-scholes-politismos>) and the "Agios Porfyrios" Gerontological and Care Support Center (<https://iaath.gr/index.php/idrimata/kentro-gerontologias-kai-pronoiakis-ypostirixsis-agios-porfyrios>) highlight the integration of spiritual and community engagement into their care frameworks, enriching the social health of their residents, combining most of the times environmental sustainable practices. Lastly, Chrysanthio (<https://chrysanthio.gr>) emphasizes environmental sustainability and personal autonomy within a community-centric setting. The cases above show the personalized services provided by ECUs and the high-quality standards in this sector.

Case Studies of Best Practices in Europe

The summary of the best practices in elder care across Europe highlights exemplary models from renowned residential care facilities that have established benchmarks in (service) innovation and quality care services. For example, the Korian Group (<https://korian.fr>) in France is well-known for its quality care, and it has nursing homes in six European countries (France, Germany, Belgium, Italy, Spain, and

the Netherlands). Another interesting example is the Emeis Groupe (<https://emeis.com/en>) that offers personalized care and support. In the UK, Care UK (<https://careuk.com>) integrates community engagement to preserve critical social ties while emphasizing a person-centered strategy that significantly improves individual resident satisfaction and well-being. The Vivantes Network in Germany (<https://vivantes.de/themen/altersmedizin>) demonstrates its excellence in long-term care. Lastly, Spain's DomusVi (<https://domusvi.es>) is dedicated to improving its care for older people and uses specialized programs for complex health concerns. These case studies demonstrate benchmarks of the quality of services provided in this sector.

Policy recommendations

Suggestions are recommended for improving the sustainability and resilience of ECUs in Greece and tackle the above issues. At the regional level, the European Union urges Greece to leverage EU funding to improve infrastructure, especially in underserved rural areas and islands. Focusing on building networks between ECUs and public-private partnerships can foster innovation and attract more funding at the national level. Working with different stakeholders (e.g., other NGOs and institutions) can improve the legitimacy of the ECUs and attract additional funding from funders and investors.



Concluding Remarks

The main challenges that the ECUs face were examined in this report, taking into account the growing ageing population in Greece. This report suggests a set of policy recommendations, such as utilizing digital health technologies, adoption of best practices and the development of new public-private partnerships. This report also suggests the need for technological investments and access to EU funding for the LTC sector maximizing the social impact of the ECUs in Greece.

References

Lamnisos, D., Giannakou, K., & Jakovljevic, M. (2021). Demographic forecasting of population aging in Greece and Cyprus: one big challenge for the Mediterranean health and social system long-term sustainability. *Health Research Policy and Systems*, 19(1). <https://doi.org/10.1186/s12961-020-00666-x>

Eldemire-Shearer, D. (2008). Ageing: the response yesterday, today and tomorrow. *The West Indian Medical Journal*, [online] 57(6), pp.577–588. Available at: <https://pubmed.ncbi.nlm.nih.gov/19580239/> [Accessed August 2024].

Statista (2024). Forecasted age of population of Europe 2050 | Statista. [online] Statista. Available at: <https://www.statista.com/statistics/960319/age-distribution-of-europe/#:~:text=This%20statistic%20displays%20the%20age%20distribution%20of%20Europe> [Accessed August 2024].

Statista (2024b). Nursing home care beds in Europe, by operator sector 2020. [online] Statista. Available at: <https://www.statista.com/statistics/1239811/distribution-of-nursing-home-care-beds-by-public-or-private-ownership/> [Accessed August 2024].

World Bank Group (2022). World Bank Open Data. [online] World Bank Open Data. Available at: https://data.worldbank.org/indicator/SP.POP.65UP.TO.ZS?contextual=region&end=2023&locations=GR&most_recent_year_desc=false&start=1990&type=shaded&view=map [Accessed August 2024].



ReAct Research Project

<https://ReAct.aueb.gr>

ReAct@aueb.gr