

Chile

The 2018 Aging Readiness & Competitiveness Report: Small Innovative Economies



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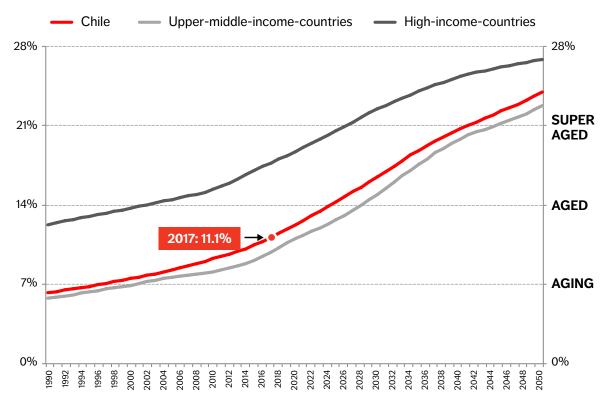
Health Care

An economic leader and high-income powerhouse within Latin America, Chile's commitment to social service programs and robust health care are increasing longevity and hastening the country's transition toward becoming a super-aged society in which over one in five people is age 65 and older.

Chile's population has been aging at a rapid pace due to increased life expectancy¹ and low birth rates,² with people living an average of 79.7 years and having just 1.7 children per couple.³ Those age 65 and older represented 6.2 percent of the population in 1990, which had jumped to 11.1 percent in 2017. This share is projected to grow steadily and will hit 21 percent by the year 2041 (Figure 1).⁴ Recognizing this rapid shift and the potential implications for the economy and society at large, the national government is increasingly focused on policy change and is providing funding to municipalities and local stakeholder groups on the front lines designing and implementing agerelated programs tailored to local needs. The geographical heterogeneity and physical separation of communities further

Figure 1. People Age 65 and Older as Percentage of Total Population

Chile's rapidly aging society is on course to become super-aged by 2050.



Source: United Nations, Department of Economic and Social Affairs, Population Division

fosters the development of local programs and services from the bottom up.

Family has historically played a central role in Chilean culture—a role even more prominent in the life of older adults. The family represents the primary means of social connection, caregiving, and introduction to new technologies. Despite a long history and tradition of family

cohesion, older adults in Chile are becoming increasingly independent, self-sufficient, and empowered. Associations of older adults are a formidable force in Chile and are increasing their reach, impact, and degree of political influence.

As in other countries, Chile's increase in life expectancy is straining the country's pension system, which is funded through

individual savings accounts. Previous governments have attempted to address this challenge to no avail. And more reforms will be needed to increase the sustainability of the system and to provide a degree of financial security for older adults. The recently elected government has announced that it will adopt a policy of positive aging, focusing on health, safety, and participation, and place a more explicit focus throughout the government on aging.5 The administration also affirmed that it will increase allocation of resources to agingrelated policies, which, if implemented, could provide the support needed for local initiatives to scale.

The government's traditionally narrow focus on pensions is beginning to broaden and take a more holistic view on aging and supporting older adults to remain productively engaged. The government's current approach is characterized by umbrella programs. But more policymaker attention will be needed to support those able and interested in working remaining in the labor force and to actively integrate this growing demographic into the country's economic growth and development strategy.

The percentage of the economically active population older than 60 has increased from 4.8 percent in 1990 to eight percent in 2017 and is expected to reach 10.8 percent in the year 2030.⁶ Despite this upward trend in statistics, older adults still face considerable challenges to remain in, or to re-enter, the formal labor market. Structural and cultural

barriers push many older workers into the informal sector where employment is sporadic and tenuous. However, recognizing this phenomenon, some notable initiatives are working to change that, with local non-governmental organizations (NGOs) increasingly confronting ageism in the marketplace, supported by the Inter-American Convention on Protecting the Human Rights of Older Persons, which Chile has ratified.

A global leader in information and communications technology (ICT) connectivity, Chile is well-positioned to leverage this infrastructure to improve the social connectedness, productive engagement, and health of its older population. But efforts to reduce its substantial digital divide are still nascent. The government has begun to advance initiatives to strengthen digital literacy among seniors and local start-ups, such as RedActiva, that are developing tech-based solutions designed specifically for older users and are helping increase access, mobility, and safety—tapping into a growing market where other innovative companies are set to follow.

While Chile's age-related policies are largely in their infancy, the country's commitment to health care and wellness has laid a solid foundation and remains critical to older adults' overall welfare. The majority of older adults utilize public health care, and the government has a systematic evaluation process to identify seniors at risk of dependency or isolation and intervenes when necessary. More recently, Chile has

developed its National Plan for Dementia, which seeks to identify early signs of the disease and implement programs for older adults and their caregivers. While it is a leader in this respect, long-term care (LTC) in Chile remains a notable gap, with LTC provided predominantly by families or philanthropic institutions and with little government resources or support.

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Health Care and Wellness

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Chile's long history of neoliberalism focused on free markets, trade, privatization, and global engagement have helped inform the country's still-evolving approach to aging policy.

The central government sets high-level policy, programs, and funding for age-related initiatives. The country's high degree of decentralization, grassroots organizations, and challenging topography afford incredible power and autonomy to the municipalities to develop and implement programs within their communities. With a history of experimentation and commitment to evidence-based policymaking, local pilot projects and university research are driving social innovation in this relatively nascent field and continuing to inform Chile's evolving policy on aging.

Key Enablers

Chile's embrace of neoliberal economic policy set it apart from other nations in the region following more populist development strategies, orienting Chile outward toward privatization and international engagement, with respect to both economic and social policy. Such **outward orientation** resulted in bold moves on the part of the government, including being the first country to privatize its pension system. While strong implementation of neoliberal policies in the 1970s and 1980s had a limited focus on social welfare and contributed to rising inequality, the end of the dictatorship in 1990 and subsequent development of a rights-based social policy has placed increasing focus on social spending to address issues of equity, poverty, and unemployment.7

The rights-based focus is most prominently manifested in the health system. The National Constitution enshrines health care as a fundamental right to be provided in an accessible manner to the entire population.⁸ As a result, Chile's well-developed health care infrastructure has increased health care access, coverage, and prevention for remote patients in need. It is now being leveraged as a primary access point to engage older adults throughout the country and could be a foundation for additional programs specifically targeting older adults in the future.

Apart from health care, this historic outward orientation and engagement with international institutions has informed a more holistic approach to aging-related policy in Chile. The adoption of the Madrid International Plan of Action on Aging in 2002, based on the United Nations Principles for Older Persons, which focus on independence, participation, care, and dignity, all helped inform Chile's formulation of its own social policies on aging. This coincided with Chile's establishment of its National Service for Older Adults (Servicio Nacional del Adulto Mayor or SENAMA), which has become the country's primary government agency on aging.

This international engagement and rightsbased approach to aging has continued over time as the country's social policy continues to evolve to become more integrated and interdisciplinary. With increasing recognition of the role of the government in social welfare, the national government established an institutional framework and umbrella organizations to inform policy, forming the Ministry of Social Development in 2011 to establish a more positive and integrated approach to aging.9 That the country signed on to the Inter-American Convention on Protecting the Human Rights of Older Persons in 2015 and ratification in 2017¹⁰ illustrates this ongoing effort to integrate international best practices and norms and to strengthen their domestic framework.

While the national government and SENAMA have established broad

national initiatives to support older adults and are the major source of funding, **decentralization** of implementation has enabled responsive innovation. Legally and politically, municipalities enjoy the autonomy to decide how to implement national policies as well as how to apply their allocated funds from the central government. This local focus and capacity allow for pilot projects that address local needs to be designed and implemented by those who know and understand the community best.

The dispersion of social innovation and focus on local needs is also influenced by Chile's topography, as the geographic heterogeneity and the territorial differences in Chile are marked.¹² The country has the highest geographic concentration of GDP among the Organisation for Co-operation and Development (OECD) countries, with Santiago, Valparaíso, and Concepción the largest drivers of national growth. Relative detachment from these major city centers encourages local solutions and empowers individuals seeking to make a difference in their own communities. However, these dynamics can make it difficult to scale the projects to the national level, making collaboration ever more important.

Social innovation is also influenced by the rich history of mass mobilization and **community activism**, which is manifest in stakeholders' capacity to organize and craft solutions to meet local needs. The elevated importance of issues related to aging in the public discourse is due largely to the high level of political participation of older adults

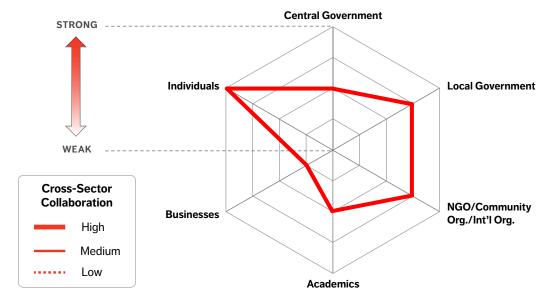
in elections: according to Chile's Electoral Service¹³ (Servicio Electoral de Chile), almost 30 percent of voters in the 2016 municipal elections were age 60 and older. This proportion remained consistent in the presidential elections in 2017, with voters older than 60 representing 28.98 percent of the total.14 This, together with the rising number of organizations comprised of older adults across the country and the organizing skills of this age group, could render them an increasingly formidable political force. However, Nanet González from the program Más Adultos Mayores Autovalentes from the Ministry of Health contends that many older adults are still reluctant to assert their legal rights and advocate for themselves—seeing their benefits as a favor instead of a right.15

Attributes in Aging-Related Innovation

Unlike other countries that receive strong guidance and directives from the central government, in Chile, social innovation stems from individuals and local organizations that work within their communities. These groups then find synergy by collaborating to identify resources, funds, and expertise. This more holistic and positive view is slowly affecting the way the Chilean society sees and engages with older adults, resulting in a more empowered age group that can self-organize and exercise their rights.

The high level of decentralization has resulted in strong collaboration among

Figure 2. Driving Forces of Innovation and Cross-Sector Collaboration



stakeholders at the local level, an approach that is evident in many of the highlighted initiatives in this report, with almost all of them characterized by alliances between local organizations—primarily local government, foundations, universities and non-governmental organizations. Consuelo Moreno from Fundación Oportunidad Mayor, a nonprofit dedicated to supporting older adults that manages several initiatives across the country, underscored the importance of this network effect, emphasizing that "We always seek to create networks. It's our main way of working. And if there is not a network, we try to create one and raise interest in the topic of aging."16

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- CONSUELO MORENO, Fundación Oportunidad Mayor

With a tradition of evidence-based policymaking, municipalities and universities are test beds for social innovation in

Chile. Collaborative initiatives between municipalities, universities, and local implementation agencies are rolling out interdisciplinary projects and collecting data to refine models and enable scale. Despite the limited coursework and focus on aging in academic curricula to date, universities have nonetheless been drivers of age-related research. The University of Valparaiso represents a major incubator of Chile's age-related innovation. In an interdisciplinary effort, experts from the faculties of medicine, architecture, engineering, and education together developed the age-friendly city initiative, Gerópolis, an integrated community social infrastructure model that promotes active aging. Developed in an ideal testing ground with Chile's highest concentration of older adults, researchers developed a novel approach that has gained recognition from the World Health Organization (WHO) and is a model for other communities.

The central government looks to policy innovations at the municipal level as well to inform national policy. The country's National Plan for Dementia originated as a local project called Kintun in the community of Peñalolén, located in Chile's metropolitan region. Más Adultos Mayores Autovalentes, a program to empower older adults to play an active role in aging positively and healthy within their community, also started as a local project in the comuna of Pedro Aguirre Cerda in the city of Santiago.

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Recognizing the growing importance of this booming demographic, the national government, along with many proactive local governments, are steadily advancing policies and programs aimed at the social inclusion and empowerment of older adults.

Local governments, in particular, have taken steps to establish a range of programs to enhance autonomy, minimize risks of isolation, foster social inclusion, and boost overall welfare through active aging. While the country is making advances, more can be done, especially to enhance mobility and accessibility. The decentralization of Chile's government puts much of the impetus for designing and implementing age-related initiatives into the hands of municipalities and local organizations, with some notable leaders paving the way and advancing innovative models for others to follow.

Social Connection

As in other Latin American countries, family in Chile represents the primary social unit and plays a central role throughout people's lives, particularly in older age. Today, most older adults still live with their children.

As of 2016, three-fifths of those age 60 and older lived with their children, and 38 percent also with lived with grandchildren. While intergenerational households are predominant, older adults are increasingly living independently due to a shift toward smaller families and an increasing sense of individualism and autonomy.

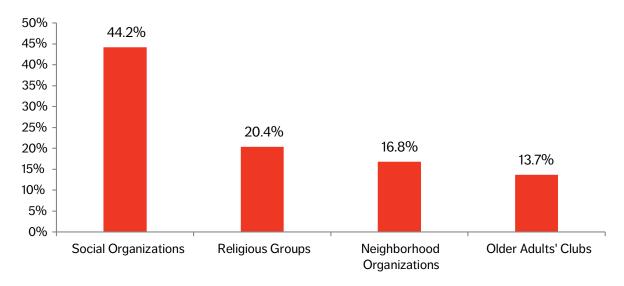
The evolution of the familial social structure is occurring at a steady pace. Between 1990 and 2015, the percentage of households comprised exclusively of older adults age 65 and older rose from 4.8 percent to 10.9 percent.¹⁸ During the same timeframe, the percentage of homes comprised of family members ages 15 to 64 increased from 24.8 percent to 33.3 percent.¹⁹ This change in living arrangements can be partially attributed to the shift in traditional family structure, due to factors such as the growing participation of women in the labor market and a shift in values and norms toward a more individualistic mindset.20 The evolution of the family structure is also reflected in a decreased sense of responsibility to care for grandchildren. According to the Fourth Poll of Quality of Life in Older Age released in 2017, the percentage of respondents age 60 and older that perceived caring for

grandchildren as an obligation dropped by almost one-quarter from 45.4 percent in 2010 to 34.6 percent as of 2016.²¹

Improved financial security is also enabling this shift toward greater autonomy among older adults, partly thanks to the 2008 Pension Reform, which sought to provide support for the most vulnerable. The reform sought to reduce poverty among older adults as well as to close the gender gap by introducing the Solidarity Pillar, which provides a minimum pension of CLP 107,304 (USD 159) that is funded by the state for those who are not eligible to receive any other pension and fall within the 60 percent poorest of the population. The reform benefits older women who tend to have less income than their male counterparts due to lower labor market participation rates and fewer contributions to their individual savings accounts. Additional income gained by older adults through the reform has helped them establish greater financial independence.²²

However, despite family structure and living arrangement changes, older people maintain relatively close social connections with their families and their communities. According to the Fourth Poll of Quality of Life in Older Age, senior respondents (age 60-plus) on average had 2.68 close friends and knew the names of 6.62 neighbors, and only 4.9 percent of respondents didn't know the names of any of their neighbors.²³ Moreover, the same poll points out that 45.5 percent of older adults interviewed don't live with their relatives but still see them every day or several times a week.

Figure 3. Groups Maintaining Social Connections of Chile's Older Population



Source: Roseli, J., Herrera, M. S., Fernández, M. B., Rojas, M. (2017)

Social connections are also developed and maintained through older adults' participation in various organizations: 44.2 percent of the respondents participated in social organizations, 20.4 percent of which were in religious groups; 13.7 percent in older adults' clubs; and 16.8 percent in neighborhood organizations (Figure 3).²⁴

National Priority, Local Action

Municipalities in Chile play an important role promoting the social connection of older adults, ranging from large-scale recreational workshops to smaller leisure initiatives. Local governments in Chile have considerable autonomy, and while local governments follow national directives in relation to older adults, municipalities and local organizations implement programs based on the specific needs of the community. Moreover, although national funds finance projects throughout the country, each municipality ultimately determines how those resources are spent.

Opportunities for fostering continued social connection among older adults is partly due to strong and active networks of older adults' organizations, largely

"Older adults represent the country's most organized age group."

– TANIA MORA, Director of the Judicial and Human Rights Unit of SENAMA

developed with the support of SENAMA. The concept of SENAMA originated in 1995 under the umbrella of the Ministry of Social Development and further developed inside the country's national system of care, which seeks to protect and guarantee the rights of the country's most vulnerable people.

SENAMA stemmed from Chile's rightsbased approach to aging and age-related policy, with the government taking responsibility for the well-being of older adults. According to Tania Mora, Director in charge of the Judicial and Human Rights Unit of SENAMA, the government body was created "seeking to institutionalize the topic of the elderly and aging within the state," mainly because "we [the Chileans] saw that aging would be an issue in a few decades, and that the state should prepare itself for it."25 SENAMA is an implementing agency, but since its inception, there has been discussion among government officials about elevating its role to a sub-secretary or a ministerial entity in order for it to play a greater role in policy formation.

SENAMA was launched in 2003 as an autonomous and decentralized institution

charged with implementing public policies, plans, and programs. The leading government agency focused on older adults, SENAMA's primary mission is to foster active aging, develop programs generated by older adults that enhance social integration, provide a network of services to older adults in need, and increase awareness of the value of this demographic in society. With a decentralized model, local organizations driven and comprised of older adults are empowering people age 60 and older and helping transform cultural perceptions.26 "When talking about the organizations [formed by organized interest groups] in Chile, be they community, religious, or municipal groups, the older adults represent the country's most organized age group,"27 said Mora.

SENAMA currently implements 13 national initiatives for older adults that provide education regarding legal rights and available services and support networks, social engagement through local tourism, volunteering, active aging, day centers with workshops, psychological support, and home health care, among other things. Each program has unique qualification criteria for participation. To be funded, programs must demonstrate their ability to deliver services aligned with the mission and standards of SENAMA. Two particularly interesting SENAMA projects are:

 The Programa Centros Diurnos del Adulto Mayor (Day Centers for Older Adults Program) that provides personal, social, and community workshops for older adults. These workshops are designed and supervised by SENAMA and implemented by local partners, such as housing authorities or long-term care facilities. This initiative creates a space for older adults to interact socially, maintain social connections, and take workshops for skills development, helping provide a sense of connectedness and empowerment.

• The Condominios de Viviendas Tuteladas (supervised housing) program offers housing, along with both psychosocial and community support, for adults age 60 and older who are living independently but in vulnerable circumstances such as social isolation. Social workers work with residents to develop psychological and social intervention plans that incorporate the family and community. The initiative remains limited in scale, with a target population for 2018 of just 1,101 older adults.

Gerópolis and the WHO Age-Friendly City Initiative

Gerópolis, a project of the University of Valparaíso's faculties of medicine, architecture, and engineering and the Ministry of Education, was recognized by the WHO as one of the community-based social innovations of the year in 2018. The initiative started in 2006 as part of research within the University of Valparaíso and evolved into a research center "to develop an integral and replicable model to reveal, understand, and address the reality of older

adults as a social construction, through the implementation of integrated strategies in education, health, and territory in terms of community space."²⁸ Valparaiso was an ideal testing ground for the project as it is home to the highest number of older adults in Chile, with 20.6 percent of the population age 65 and older. And in Valparaiso, for every 100 children younger than 15, there are 107 older adults, while the national average of is 86 older adults per 100 children age 15 and younger.²⁹

The research center has four pillars:

- Association through strategic permanent partnerships between academic institutions and other stakeholders from public, private, and social sectors;
- Intervention through social programs with and for older people in the scopes of education, health, and territory;
- Professional Education that incorporates the topic of aging in the institution's various courses; and
- Knowledge Generation and diffusion regarding the scope of aging and the needs of older adults through an interdisciplinary approach.

"The project is complex and combination of research and intervention. It is an academic project with the goal to apply research, direct intervention, and develop partnerships at the grassroots, institutional, and national levels," said Alessandra Olivi, Program Coordinator of Gerópolis.

Gerópolis promotes aging in place and seeks to offer solutions that increase the opportunities for autonomy and independence for older adults. The program has created an Interdisciplinary Center for Integral Development of Older Adults, integrating internal and external stakeholders within the city. Their aging in place model trains Health Multiplication Agents (AMS or Agentes Multiplicadores de Salud); has developed a mobile health platform for older adults; and also runs the Urban Appropriation Program, which codesigns spaces and devices for older adults.

The program is driving innovation through its Mixed Executive Board (CEM) comprised of academic institutions, both private and public institutions, civil society organizations, NGOs, and international agencies. It offers consultancy, coordination, and participatory management connecting older adults to the program's multiple entities and resources. The CEM monitors the partners and implementation of the Gerópolis program, creating informational feedback loops that help refine the program and inform other disciplines. Older adults participate directly in the trainings, which not only inform the programs, but also provide a way for older generations to interact with the younger one.31

The program is also innovative in that its interventions are based on the needs of older adults within that community, rather than by high-level guidance from Santiago that may not be as attuned to the dynamics of Valparaiso. According to Olivi, this allows the possibility for local actors to intervene

and apply small changes without large costs. According to the WHO,³² almost 2,500 older adults have been impacted by the project, with the program regularly monitored and evaluated to capture its impact and then to inform and direct future funding. The program could be replicated by other cities seeking to adopt it, but the roll-out of future funding—which to date has been from the WHO—remains a hurdle.³³

In addition to these initiatives, SENAMA also manages The National Fund for the Older Adult (FNAM or Fondo Nacional del Adulto Mayor), the primary national source of financing for programs and services targeting older adults. Created by the Chilean government in 2003, FNAM funds individual initiatives in three primary areas:

- Projects developed by organizations that are comprised of older adults;
- Initiatives proposed by public or private institutions that focus on older adults' autonomy and supporting the vulnerable; and
- Institutional agreements to address vulnerable older adults.³⁴

The Fund has had a considerable impact nationally, having increased its funding substantially from CLP 1.4 billion (or USD 2 million) in 2006 to CLP 4 billion (or USD 5.9 million) in 2018. While the Fund finances a broad scope of projects in municipalities and organizations across the country, it can only finance roughly half of those proposed, indicating the significant and growing demand. Government support is

also increasing the number of organizations that are willing and able to provide services to this demographic. In 2017, 8,026 projects were presented to the Fund, with 4,290 selected to receive annual funding. According to the Ministry of Development, these resources benefit more than 186,000 older adults.³⁵

Of the 29 projects approved in 2017 for institutions, 15 were awarded to municipalities and 11 to foundations or NGOs. The remaining projects are being implemented by hospitals, research centers, universities, and schools. Most of the projects are interventions that seek to improve the health and wellness of older adults with disabilities by way of caregiver training, care services, and teaching self-care to older adults.

Abuse: An Ongoing Issue

While there are a range of supportive initiatives for older adults, the needs and value of these individuals are not always recognized, and incidents of neglect, maltreatment, and abuse still occur. Elder abuse is an issue of concern for older adults and their advocates, but the government does not systematically track and quantify these incidents, and there is no formal legislation for protection. According to the Fourth Poll of Quality of Life in the Older Age,³⁶ one in 10 older adults interviewed perceive that their family mistreats them because of their age. The absence of legal

and social means to address elder abuse leaves those being abused with no clear pathway for remedy. For example, in the case of abuse within the home, there are not alternative housing facilities available that would provide safe shelter and support.³⁷ While awareness of this issue is growing, there are not yet formal programs or strong advocacy groups mobilized to combat it.

Accessibility

Accessibility legislation first passed in Chile in 1995 and, reformed in 2010 and 2016, is shifting gradually to a more integrated view of the issue. Initially limited to access to parking, toilets, and public buildings, the first reform occurred after Chile signed the UN Convention on the Rights of Persons with Disabilities to incorporate the norms of the Convention into domestic legislation. The second reform called for accessible routes including transportation. Buildings that were constructed prior to passage that don't conform to the new guidelines have a deadline of March 2019 to transition their facilities and comply with the new legislation. Congress attempted to postpone this deadline, but the NGO Ciudad Accesible (Accessible City), with the support of civil society, successfully petitioned to have the deadline enforced.

According to Pamela Pritt, Director of Ciudad Accesible, "the main problem [with Chilean accessibility legislation] is the lack of clarity in the norms, which allows room for interpretation and causes confusion

among the independent reviewers of the blueprints."38 Experts also note that enforcement of laws and norms typically occurs only after complaints from civil society, and civilian engagement in this area is very limited due to the bureaucratic and time-consuming process required to file a complaint. Data are lacking, and shortfalls are common, as accessibility was rarely considered prior to construction and is often only addressed after complaints have been made and the issue has been recognized—making the upgrading of Chile's built environment to accommodate older adults a challenge and the prioritization of age-friendly designs in new construction ever more important.

In terms of transport accessibility, the Santiago Metro Area has made strides. In 2012, the transportation authorities for the Santiago Metro Area launched a plan aimed at full accessibility on all metro lines by 2014. Implementation of the plan languished but resumed in 2016 after an accident in a station. This involved a child with neurological problems falling from his wheelchair and off the escalator, bringing the issue of metro accessibility back to the public eye.39 According to the Directive of Metropolitan Public Transportation, 84 percent of its fleet should meet the standards of accessibility established by law, including ramp access, lower floors, space for wheelchairs, incorporating signs in braille, and sound alerts. Enforcement and inspection, however, remain low. Enforcement remains an issue, with only one percent of the fleet being inspected every month.⁴⁰ While progress has been made in

"The main problem [with Chilean accessibility legislation] is the lack of clarity in the norms."

- PAMELA PRITT, Director of Ciudad Accessible

and around Santiago, transport accessibility for older adults remains precarious through much of the rest of the country, with very few buses fitted with ramps or bus stops adapted for people with disabilities.

While the national government does not have a broad-based policy providing discounted public transportation for older adults, it is moving in that direction. In April 2018, the government announced plans to provide free transportation to older adults for trips to health care facilities. And the Ministry of Transport is now studying the issue to determine how it will ultimately be implemented. In addition, some municipalities are working to offer transport discounts to older adults at rates like those offered to students, but those efforts are ongoing and local in their application.

Technology-Driven Solutions

With limited direct intervention and resources from the central government, innovation is occurring within municipalities, and local entrepreneurs are beginning to

develop solutions to address the needs of older adults. These local partnerships are generating local solutions, and private participation is growing, with specific local initiatives showing promise looking to scale.

Most of Chile's age-related initiatives were designed by geriatric specialists and grew out of related centers specializing in aging. RedActiva, for example, is a mobility solution for older adults provided through a wearable device and was born in the Laboratory of Public Innovation in the Pontifical Catholic University of Chile (UC). After two years of working with the municipality of Santiago to identify improvements in older adult services, the Lab discovered that the challenges older adults face moving around in the city strongly influence their participation in government programs, their engagement in productive opportunities, and their interactions with the community. After identifying the main challenges in older adults' urban mobility, the municipality of Santiago, the Fundación Adulto Mayor (Older Adult Foundation), and the Asociación Gremial de Administradoras de Fondos de Pensiones de Chile (The Trade Association of Pension Fund Administrators of Chile) collaborated to form RedActiva.

RedActiva uses a low-cost device called BandaActiva, a wristband that uses RFID (radiofrequency identification) to allow older adults to locate and access services throughout the city. The band recognizes and applies incentives available to older adults on public transportation, and enables preferential access in buildings and on transport. These include triggering delays in

traffic lights to allow longer crossing times and identify safer walking routes, among other capabilities. "Our focus [as RedActiva] was to find what would make a difference for older adults to enable them to safely leave their home and move independently around the city,"42 said Cristóbal Tello, RedActiva Project Manager.

The program has grown out of extensive research and benchmarking from other countries' urban mobility and aging studies, partnerships with local businesses, and extensive consultation with the community. Strong support from the municipality and engagement by older adults living in the city is enabling the development of a locally focused, innovative solution that directly addresses their acute needs. The initiative is implementing its first pilot in the comuna (district) of Puente Alto in Santiago and will conduct its first impact evaluation in October 2018. The company is a first mover in the market and may pave the way for other innovators to follow. The market is in its infancy, but solutions such as RedActiva have the potential to further enhance urban mobility, reduce dependence on family and caregivers, and help older adults remain socially and productively engaged.

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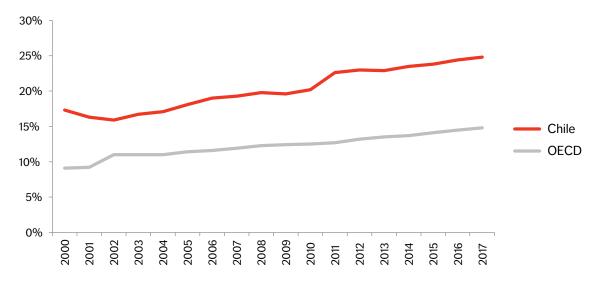


Health Care

Chile was the first country in the world to privatize its national pension system and today has a consolidated system with one of the highest coverage rates in the region.⁴³

Still, pension payments are in many cases unable to provide for a comfortable retirement for a population that is living longer, and older adults seeking to remain in or to re-enter the workforce face ongoing challenges. Ageism is an issue for older adults seeking to remain in the workforce, and in order to address it, some business and civil society organizations have mobilized themselves to raise awareness of the benefits of older, experienced employees and view work as a way to enable older adults to remain active. This continued productive engagement is especially important in Chile, a society that strongly values work as a tool to dignify the individual.

Figure 4. Labor Force Participation Among Adults Age 65 and Older



Source: OECD

Labor Force Participation of Older Adults

The labor force participation of Chile's older adults is among the highest in the OECD, with one in every four economically active, well above the OECD average of 14.5 percent. Labor market participation among those older than 65 has been rising rapidly, with the percentage of working older adults increasing twice as fast between 2010 and 2016 than between 2000 and 2009 (Figure 4).⁴⁴ According to a Latin American and Caribbean Demographic Centre projection, older adults' representation of the economically active population might

increase from 8 percent in 2017 to 10.4 percent in 2030.45

This trend is primarily driven by economic necessity—the reason cited by two-thirds of respondents to the Fourth Poll of Quality of Life in Older Age.⁴⁶ Although poverty among older adults is relatively low at 6.6 percent, multidimensional poverty—the multiple factors that can contribute to a person's deprivation such as poor health, lack of education, poor living standards, and other factors—affects about one in every five seniors.⁴⁷ One reason for this is the low payment rate of the country's pensions.⁴⁸ Except for the poorest people, most retire with a considerably lower income than they

received when they were working. While the gross pension payment rate of a median earner in the OECD countries is on average 57.9 percent for men and 57.2 percent for women, in Chile, the numbers drop to 45.5 percent and 36.6 percent, respectively.⁴⁹

While continued income tends to be the predominant reason older adults remain in the labor market, 69.2 percent would continue working regardless of economic reasons, and almost four out of five seniors claimed they liked their jobs.50 Labor occupies a central role in life in Chile, and the mindset of "work dignifies man" is a prominent cultural value.51 According to Maria Paz Carvajal, a professor specialized in aging, middle-class professional older adults, despite not having financial problems after retirement, end up without a social role. And this strongly affects their wellness, as they come from a generation that considers one's life to be based in his or her work and idleness a reflection of laziness.52

Structural Barriers to Older Adults' Participation in the Workforce

Notwithstanding the eagerness of older adults to continue working, the age group faces myriad challenges to remaining in the workforce, with several government policies indirectly pushing older workers into retirement and limiting their opportunity to be productively engaged. Many of these older adults are seeking to remain

in or to re-enter the workforce but face obstacles to employment where their skills and institutional knowledge are being insufficiently valued or leveraged.

Older people in Chile typically have less formal education than the rest of the population. In fact, the percentage of those older than 60 with a high school or university degree is close to half that of those between the ages of 19 and 59, and one in every four has not completed a basic education, more than twice the national average of 12.6 percent.53 As Chile's robust economic development increases demand for high-skilled workers, older workers often find themselves unable to compete with younger talent or find the skills training and support needed to bridge the gapultimately getting squeezed out of the labor market. Not only does this diminish the productive opportunities for older adults, it increases dependency and fails to leverage the knowledge and institutional experience the older generation could still bring to bear.

A persistent wage gap also functions as a disincentive to continue working. Older adults in Chile receive a wage that is on average 67 percent that of the rest of the labor force, while the OECD average is 86 percent. Moreover, the minimum wage for older adults is 25 percent lower than the rest of the population's—276,000 CLP (USD 403) per month for those between 18 and 65 years old and CLP 206,041 (USD 301) for those outside this bracket.⁵⁴ The lower wage can induce older adults to retire earlier to

collect a subsidy or pension from the state to fund their retirement rather than absorb the salary cut⁵⁵ and can dissuade them from reentering the formal labor market—a policy that both exacerbates stress on an already strained pension system and ushers still-productive older workers out of the formal workforce. The reduced pay rate for older adults remains controversial, with some experts suggesting it is an incentive for employers to keep older adults in the workforce, while others consider it institutionalized ageism.

A final structural barrier to employment is the unintended consequence of a program designed to support low-income older adults in Chile. The Solidarity Pension System (PBS) was incorporated into the existing individual savings account model of Chile through the Provisional Reform of 2008. It grants benefits for people of old age or disability who lack access to any pension, or when they do not have enough funds to receive a pension. In 2018, the Solidarity Pension equaled CLP 107,304 (USD 157) per month.56 However, if an individual receiving the PBS starts working and receives a salary larger than the minimum wage, this benefit is lost.57 Experts noted this as a disincentive for poorer people to engage in the formal workforce. as older adults either choose not to work or attempt to enter into the informal market so as not to lose their benefit.

"Companies hiring older adults are still something new. There is still a strong cultural barrier present, and regulatory and administrative issues still need to be addressed and incentives created."

- IGNACIO HINOJOSA, ServiSenior

Overcoming Cultural Barriers and Shifting Perceptions

According to the Fifth Poll of Inclusion and Exclusion of Older Adults in Chile conducted in 2017, only 28 percent of those polled believe that older adults can look after themselves.58 The perception of older adults' vulnerability is widespread across Chilean society,⁵⁹ largely due an association of older adults with the deterioration of cognitive, physical, and social capabilities, which they believe can affect their ability to adapt to new demands in the labor market such as the use of technologies or the fast pace of work.60 According to a study conducted by the Study Center for the Aged and Aging in the University of Chile (CEVE - UC), 61 77 percent of those polled believe it is hard to find work for older adults, and 46 percent believe that the jobs available for this demographic are of poor quality.

According to Ignacio Hinojosa from ServiSenior, "companies hiring older adults are still something new. There is still a strong cultural barrier present, and regulatory and administrative issues still need to be addressed and incentives created." Universities and NGOs have also been particularly active in combatting stereotypes and identifying ways to appeal to employers to convey the value of the softer skills that older generations bring to the work environment.

According to a study conducted by the University of Santiago for the commerce, services, and tourism sector,⁶³ the sector is starting to include older adults as employees, due to their strong soft skills and sense of responsibility, which strengthen the businesses' interaction with the customers. "Seniors are valued for their ability to offer attention to clients' needs, as well as their responsibility, adaptability, and more collaborative mindset,"⁶⁴ said Hinojosa.

Seniors also tend to value the work more, present a stronger commitment to excellence, and prioritize quality over quantity. ⁶⁵ According to Hinojosa, another advantage of working with older adults is that their generation is seen as more committed than millennials, who switch jobs more often. ⁶⁶ That commitment, along with a general sense of responsibility and loyalty, make older adults more reliable employees over the long term. ⁶⁷

Training and Skills Development

As Chilean society ages, government policies, employment services, and skills training could help older adults to remain in or to re-enter the workforce. According to a study conducted by the Center of Public Policy from the University of Chile in 2017,⁶⁸ only four percent of workers between the ages of 60 and 74 had participated in a training session longer than eight hours in the past year. While modest programs exist, policymakers could play a greater role in creating incentives for employers and/or NGOs to boost training-related programs.

The National Service of Training and Employment (Servicio Nacional de Capacitación y Empleo) or SENCE, a government organization, seeks to improve the country's productivity by improving the employability of the population through orientation, skills training for work, and labor intermediation between employer and employee, which is provided through nine programs. However, most of these programs have an age limit between 18 to 65 years old for men, or 18 to 60 for women, explicitly excluding older workers.⁶⁹ In response to this gap, in 2013, SENCE and SENAMA partnered to develop programs that would:

- Facilitate older adults' access to the labor market;
- Help ensure equal opportunity through labor intermediation; and

 Enhance the skills and employability of older adults.

The SENCE-SENAMA partnership has been growing and, as of 2017, had included nearly 44,000 older adults.70 Two initiatives from SENCE that have had notable impact for older adults include Strengthening OMIL (OMIL Fortalecimiento) and Working Scholarships (Becas Laborales). Through the Municipal Offices of Labor Information (OMIL or Oficinas Municipales de Información Laboral), the Strengthening OMIL program provides older adults with an advocate to help place them in work opportunities, acting as an intermediary between the employer and the prospective employee. The program began in 2015 and in its first year found jobs for 607 older adults. Since then, the program expanded rapidly, and its impact increased almost fivefold in 2017, reaching 2,925 older adults.71

In addition to the Strengthening OMIL program, SENCE's Working Scholarships program targets poorer people with training programs for technicians and the trades to enhance employment prospects. The program focuses on adults older than 64—with 100 older adults participating in 2017 across eight municipalities.⁷² Although only 4.52 percent of SENCE's participants are older adults, participation is growing every year, and these programs could serve as a valuable resource for older adults with more funding and outreach from SENAMA and SENCE.

While nascent government efforts are growing, NGOs and business have

helped to fill the gap to capitalize on the productive opportunity of seniors, most notably through the ServiSenior program. ServiSenior is a university initiative established in Valparaíso in 2015 and based on a concept developed by two partners from Chile's Social Lab for Social Innovation. The program offers support to adults 50 and older in identifying opportunities in the labor market. "The organization recognizes that continuing working at this age is not only an economic matter, but it benefits older adults' motor skills and their psychology, allowing older adults to stay active,"73 said Hinojosa.

ServiSenior seeks to integrate older adults in the labor market through three different paths:

- Motivating older adults to explore opportunities in service sectors such as driving for a ride-sharing service;
- Identifying groups of tasks and services that can be performed by older adults, that are then packaged and marketed to companies; and
- Accompanying older adults to visit companies considering hiring and helping the companies to identify candidates and fill vacancies.

While ServiSenior's activities are based in Santiago, Valparaíso, and Viña del Mar, its virtual platform enables its scope to be national. Still small in scale, the initiative is seeing rapid growth in demand for its services.

Activity in this area isn't limited to NGOS. The consultancy 60 y Más (60 Plus) is a social enterprise founded in 2016 by two journalists seeking to address the unique challenges faced by older adults in the working middle class. "They age working and do not have time to prepare for their later lives. They do not have time to develop skills or knowledge through initiatives offered by the university or the municipality. Further, they also cannot access the social supports from the state as the working middle class are not considered the most vulnerable part of the population and are thus not eligible for additional benefits,"75 said co-founder of 60 y Más Maria Paz Carvajal.

The strength of 60 y Más lies in its aggregation of knowledge within Chile regarding the strengths and needs of older adults and communicating that to companies. Helping older adults to respond to companies' needs, 60 y Más is helping workers and companies adapt to Chile's evolving demographic reality by conveying to employers the importance of training, flexible working hours, and strategies to help workers understand the differences in workstyles and/or communication that are sometimes present across people of different generations. They also provide legal and administrative support to older adults with forms and filling out necessary information for employers, and serve as advocates for older adults in the workplace.

While these programs are garnering attention and supporting labor market

participation, more can be done to reduce structural barriers to employment and to expand the capacity of these worker training and advocacy programs to address the needs of this growing demographic and keep productively engaged those who desire to be.

Engagement and Eagerness to Work Reflected in Volunteerism

For those not driven by economic necessity, volunteerism offers opportunities for older adults to remain active and engaged. The OMIL, the administrative organization that enables older adults to access information about working opportunities, is also a resource for volunteerism. Two programs, in particular, seek to not only build strong social connections but also enable older adults to share their knowledge and experience with young students.

- The Senior Adviser (Asesores Senior)
 program enables retired teachers, among
 others, to volunteer teaching classes or
 tutoring kids with difficulties in school
 who live in vulnerable situations.
- The Volunteer Country of the Elderly (Voluntariado País de Mayores) connects older adult volunteers with young children who have been identified as vulnerable and in the Social Protection system. The older adults support the children with their studies and mentor them through their education.

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An early adopter and integrator of technology, Chile scores highest among Latin American countries on the World Economic Forum's 2016 Networked Readiness Index,⁷⁶ which measures a country's propensity to exploit the opportunities offered by information and communications technology.

It has the highest internet penetration rate in the region, with 85.7 percent of the population having access to internet, substantially higher than the 65.9 percent average in the Americas and 79.6 percent in Europe.⁷⁷ This high degree of integration and connectivity carries a range of benefits for older adults, including strengthening social connections and enhancing access and mobility. But more can be done to strengthen ICT skills and leverage technology to enhance the well-being of Chile's older generations.

Bridging the Digital Divide

Chile has been steadily developing its ICT sector for nearly two decades by promoting widespread access of broadband internet and advanced ICT services; advancing professional development initiatives to provide ICT training; and digitizing government services, which it refers to as "electronic government." Chile's Digital Agenda 2020 includes five axes: 1) digital connectivity, 2) digital government, 3) digital economy 4) digital skills and capabilities, and 5) digital development and cybercrimes. The national, top-down strategy is highprofile and as such has focused on transparency and accountability, with the initiatives being monitored, evaluated, and refined with information available to the public. However, while there has been significant progress in meeting the goals laid out in the strategy, government efforts to increase digital skills and capabilities are lagging, and there is no explicit commitment or focus within the strategy on older adults. Currently, only 22.7 percent of adults age 60 and older access the internet.78

This can be attributed to a range of factors, starting with ICT connectivity.⁷⁹ While 87.4 percent of homes have internet access, this drops to 54.6 percent for houses comprised exclusively of older adults. And, despite 42 percent of older adults having internet in their homes,⁸⁰ only 22.7 percent use it.⁸¹ The primary reasons cited for avoiding use include a lack of knowledge on how to use

"Older adults have computers in their homes, but they don't use them. The one technology that is being used more nowadays by this age group is the smartphone."

- MARIA TERESA ABUSLEME, Professional Assessor of the Department of Mental Health, Ministry of Health

technology, fear of damaging devices, and an inability to read small text on screens.⁸²

Though there is limited use of desktop computers and internet by older adults at home, their use of smartphones has increased significantly in recent years, and older adults demonstrate interest in engaging more with social platforms. especially related to social networks and email.83 "Older adults have computers in their homes, but they don't use them. The one technology that is being used more nowadays by this age group is the smartphone," 84 said Maria Teresa Abusleme, Professional Assessor of the Department of Mental Health in the Ministry of Health, who is in charge of SENAMA's Studies Unit. The Fourth National Poll of the Quality of Life in Old Age⁸⁵ found that the share of older adults with a smartphone had increased from 3.6 percent in 2013 to 20.1 percent in 2016. For those who use the internet, the Online Poll of Usage of Digital Platforms indicates that 71.1 percent use email, 57.3 percent use WhatsApp, and 53.7 percent

use social media at least 30 minutes per day.86

According to the same poll, more than three-quarters of respondents age 60 and older reported interest in learning more about computers and the internet, and more than 90 percent of respondents agree or strongly agree that "it's fundamental to know how to use the internet." The most common channels for older adults to learn how to use computers and the internet are workshops and family members.87 "Older adults first ask their relatives for help, especially children and grandchildren, and then when they receive limited or unsatisfying support, whether its related to access or know-how, the older adults try to seek an alternative through digital literacy workshops, which they generally learn about through word of mouth or through institutional partnerships,"88 said Javiera Sanhueza Chamorro, a sociologist and gerontologist. According to multiple experts contacted by FP Analytics, a much more robust outreach effort is needed to enhance older adults' digital connectedness.

Promoting Digital Literacy of Older Adults

The lack of an explicit focus on older adults in the National Digital Strategy 2020 has left municipalities and non-governmental actors to fill the gap. "At present, the focus of the government [related to technological engagement] at a national policy level, at least, is mainly in the educational system, in children and adolescents," 89 said Marco

Zunica, CEO of Chiletec. According to the Online Poll of the Usage of Digital Platforms,⁹⁰ 54 percent of respondents age 60 and older reported having participated, or currently participating, in a workshop to learn how to use computers or the internet, and three out of four interviewees that were participating considered the workshop very useful.

SENAMA has allied itself with foundations and academia to bridge the digital divide. In 2015, it launched a partnership with Chilenter, an organization dedicated broadly to ICT skills development. The initiative was designed to narrow the technological gap for older adults by offering computer skills development and providing free access to various web platforms.91 The project sought to bring technology closer to the people, providing digital literacy courses and improving quality of life and social engagement by providing a channel for older adults to more actively participate in society through technology.92 Nevertheless, the initiative has been discontinued.

However, Chilenter is also engaging the private sector, most recently in a partnership with LG Digital Labs to provide digital literacy workshops in the most vulnerable communities. That project relies on alliances with local institutions such as neighborhood organizations or colleges. Despite the project not targeting older adults at the outset, its implementation in the municipality of Viña del Mar was made in partnership with the Communal Union of

Older Adults and will address this age group exclusively.

Technology Is Changing Perceptions and Connecting Older Adults

Chamorro points out that misperceptions about the relationship between age and technology remain a barrier to technological engagement. "There is a stereotype in which people believe that technology only pertains to the youth and that older adults are in a process of social detachment and do not have interest in this new social bonding space. The older adult is not considered an actor or consumer in this digital realm."93 Her initiative, Blogueros Mayores (Senior Bloggers) is an online space where bloggers share their thoughts and experiences through opinion articles posted on the website Think Ageless, a virtual platform that publishes blogs or articles raising awareness of topics related to older adults. The goal is to counter the main media narrative and stereotypes that present old age as an unpleasant period of life filled with loss and hardship. Given that Blogueros Mayores' posts are written by and for older adults, it provides direct examples of active adults and raises awareness of their capabilities as protagonists of change who are part of the technological revolution.

Blogueros Mayores was initially financed by a state fund for social communication projects, an initiative from the General Secretary of the Government that seeks to raise awareness through the diffusion of "There is a stereotype in which people believe that technology only pertains to the youth and that older adults are in a process of social detachment and do not have interest in this new social bonding space. The older adult is not considered an actor or consumer in this digital realm."

– JAVIERA SANHUEZA CHAMORRO, Sociologist and Gerontologist at Think Ageless

regional and local media into communities. The project is now sustaining itself through crowdfunding and partnerships, including a partnership with TENA, a worldwide brand of care products for older adults. This allowed for a new version of Blogueros Mayores to start in June 2018.

This second edition of Blogueros Mayores will focus on developing in adults age 50 and older the social media skills needed to enjoy platforms using multiple technologies, including written and video. It will include information on how to use social media, photography, and internet images through a series of group workshops, multiplying the reach of the initial project. The difference between the first and second iterations of the program lies in the degree of development of older adults' capabilities. It seeks to provide a more integrated view of

social communicators. A total of 150 older adults applied for the project's 10 vacancies. It presently has 10 older bloggers, with an average age of 63—the youngest being 57 and the oldest 75.

According to Chamorro, "the dream is that through this means of communication, the Blogueros Mayores have a more national presence, spreading their voices to different localities each facing their own unique realities. Aging in Chile is different depending on region, and if the program reaches a national scope, that could address these singularities and raise awareness of them."94

Technology Partnerships Are Growing, but Private Sector Engagement Is Limited

As in other sectors, private companies have yet to focus on this growing demographic. Marco Zuniga, CEO of Chiletec, said "If you ask me today if older adults are seen as consumers, [I would say] at this moment they are not a concern of industry. However, if there was an orientation demonstrating potential demand, undoubtedly the companies would respond."95

The eHomeseniors project represents an exception and potential model, seeking to enhance older adults' lives through technology. The project was launched in 2015 based on an idea from Carla Taramasco, an academic at the University of Valparaiso. Funded by the regional government of Valparaiso, she sought to

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incorporate the idea of using technology to create "smart spaces" that serve the needs of older adults, tailoring it to the Chilean context. The project was developed with the support of the Servicio de Salud Viña del Mar Quillota (Health Service from Viña del Mar Quillota) and the geriatric hospitals from the region. Together they developed the project with the goal of, according to Taramasco, "taking care of the older adult inside their own home, improving their quality of life, increasing autonomy, and reducing health risks inside the home." 96

The eHomeseniors project developed three smart sensors to be placed within the home of older adults: one to detect nycturia—the need to urinate in the middle of the night—a second sensor to detect repetitive events as a means of identifying early symptoms of cognitive deterioration, and a third that recognizes falls and communicates with those who can assist the older adult.

The main challenges are how to make the devices age-friendly, how to manage data privacy, and how to develop the project with a limited budget. According to Taramasco, "the limited resources, however, have fomented innovation, and eHomeseniors is allied with a very proactive working group and have the support of local health institutions, which have enabled the project to move forward and to succeed." The project is currently in its second phase and is developing other in-home devices to help older adults. However, the project is operating on a limited scale as it had to reduce its size and the number of participants due to financial limitations, from 75 participating seniors in the first pilot to 20 in the second.97

Despite the limited engagement by the private sector at present, the potential consumer market presented by older adults for health applications and beyond is considerable. "In Chile there is a very interesting market for older adults that is developing—including care and nutrition services, said Zuniga.

He noted that technology should naturally follow this path, but the market hasn't yet been measured and the potential exposed. "There's an opportunity for a catalyzer. If someone would invest in this study [assessing the potential of the silver market] and demonstrate its value, the services would then likely be developed and reach this age group," said Zuniga. 98

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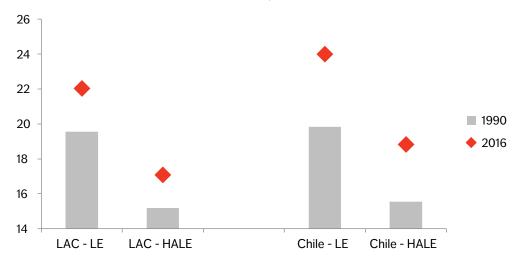


Health Care

While municipalities are the primary actors in aging policy implementation and innovation in other areas, the central government has traditionally been the force behind health care and wellness programs in Chile.

The country's health care infrastructure is well-developed, and access has long been a priority, with the central government adapting policies to better accommodate the aging population. However, as in most countries, long-term care and support to caregivers require attention to ensure both the well-being and economic security of older adults and their caregivers along with the competitiveness of the economy at large.

Figure 5. Chile's LE and HALE Far Exceed the Average Across Latin America and the Caribbean, in Years



Source: Institute for Health Metrics and Evaluation

Health Status and Health Care Reform

Chile has seen the greatest improvement in life expectancy (LE) and healthy life expectancy (HALE) among Latin American and Caribbean countries. Over the period from 1990 to 2016, LE of adults ages 60 to 64 increased by 4.2 years, and HALE increased by 3.3 years, a larger increase than any other country in the region (Figure 5). As of 2016, Chile had the fourth highest LE and HALE in the region, following Costa Rica, Peru, and Panama. That year, the average 60-year-old in Chile was expected to live another 25.1 years, with 19.6 years in healthy status, ⁹⁹ due in large part to the

country's universal health care and robust provision of health care services.

The increase in LE and HALE is reflected in perceptions of health, as well. Over the past decade, the percentage of those age 60 and older that perceived their health as excellent or good increased from 39 percent in 2006 to 52 percent in 2016.¹⁰⁰ Nevertheless, chronic diseases represent a growing challenge. Seventy-six percent of men and 90.5 percent of women age 65 and older have one or more chronic disease,¹⁰¹ with the most prevalent being high blood pressure or hypertension at 63.3 percent, high cholesterol at 36.8 percent, arthritis at 31.7 percent, and diabetes at 28.8 percent.¹⁰²

In Chile, the right to health care was enshrined in 1980 in the Political Constitution for the Republic of Chile.¹⁰³ For the past several decades, the government—largely through the Ministry of Health—has endeavored to improve quality and access to care, with a focus on health coverage and prevention. Since 2005, everyone in Chile has had access to basic coverage, with limits on wait times and out-of-pocket payments.¹⁰⁴

Generally, the provision of health care in Chile is divided into three tiers. Primary health care represents the first contact of individuals, families, and communities with the health care system, which predominantly provides ambulatory or outpatient care. Primary care is most often provided through the municipal health care system, with a holistic approach that incorporates prevention and promotion of a healthy lifestyle. Chile has developed an extensive network of primary care centers, enabling easy access to medical care providers. Secondary health care includes specialized clinics. Tertiary care is for medical emergencies and hospitalization.

With at least one health care facility present in every municipality in the country, today the health system is the government institution most consistently and closely connected to older adults. According to Nanet González, who is in charge of the division of older adults in primary care in the Ministry of Health, "Chile has an accentuated geographic and territorial diversity with geographic dispersion.

""Chile has an accentuated geographic and territorial diversity with geographic dispersion. The health centers and local police are the minimum government unit present everywhere in Chile. Thus, several services that need to be performed in the territory are done through these two."

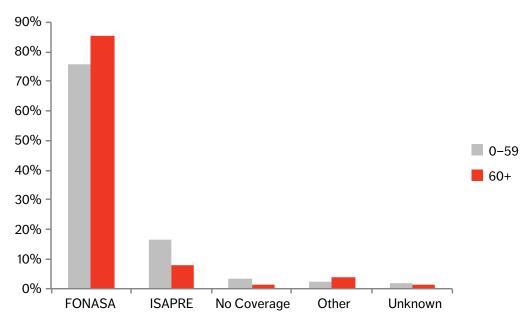
- NANET GONZÁLEZ, Ministry of Health

The health centers and local police are the minimum government unit present everywhere in Chile. Thus, several services that need to be performed in the territory are done through these two." 105

Universal Health Care Insurance

While health care in Chile is universal, it is paid for through a two-tier system that is funded by a percentage of the salary of each individual. Public health insurance—called FONASA (Fondo Nacional de Salud, or National Health Trust)—is funded through a payroll tax. FONASA covers three in every four people¹⁰⁶ and 85 percent of adults older than 60.¹⁰⁷ The private tier is much smaller





Source: ENCAVI, CASEN

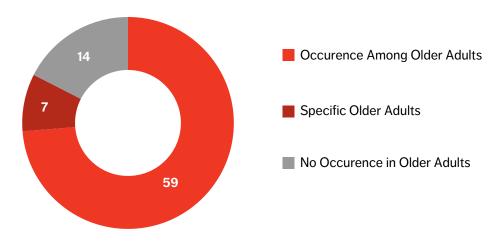
and is comprised of a system of exclusive private health insurance offerings from entities called ISAPREs (Health Security Institutions or Instituciones de Salud Previsional), which are used by about 17 percent of all people living in Chile and only 8.1 percent of older adults (Figure 6).

The high level of older adult enrollment in FONASA is largely due to the high cost of private insurance. FONASA is provided at no cost for pensioners in the bottom 20 percent income bracket, 108 and for those receiving the solidarity pension, the basic level of financial assistance provided by

the government to older adults. There is also an institutional arrangement between the private and public tiers that allows for the health care costs of high-risk health conditions not covered by the private ISAPREs to be absorbed by the public health care system. As a result, most older adults, many of whom have higher-risk conditions, fall under the public FONASA system.

In 1999, the government created the Guarantee Explicit System (GES) to address inequality in Chile's health care system and to help ensure that a group of pathologies

Figure 7. Health Conditions Covered by GES



Source: Ministry of Health AUGE

highly incident in the population, including older adults, would be suitably treated. The GES constitutes a set of benefits guaranteed by law, and it establishes a series of explicit rights related to health care, including access to treatment, standards requirements, maximum time limits to receive attention, and financial protection so that payment to providers is not an obstacle to care. It covers 80 health conditions, 59 of which affect older adults and several that are exclusive to them (Figure 7). The GES functions to ensure a minimum standard of care and provides financial aid for the payment of both treatment and medicine through FONASA or an ISAPRE. While GES' scope is broad, it does not currently cover some high-incidence diseases in old age such as cognitive impairment and dementia.109,110,111

Health Evaluation and Follow-Up for Older Adults

The government has increasingly incorporated the needs of older adults into its health policies with a focus on preventive care. One major program is the Annual Preventive Medical Evaluation for the Elderly (Examen de Medicina Preventiva del Adulto Mayor or EMPAM), created in 1998 by the Ministry of Health. The EMPAM was created to attend to the needs of primary care staff, providing orientation and technical support to facilitate more integrative care of people 65 and older. Its preventive focus seeks to detect health issues and risk factors, evaluate functionality and risks of

impairment, and generate an intervention plan that includes evaluation and follow-up.

The EMPAM provides a comprehensive evaluation of the health and wellness of older adults in one exam. In one group of tests that takes 60 minutes, the primary health care practitioner has enough information to evaluate older adults' medical history, functional capabilities, and risk of falls. In addition to testing for things like glycemia and cholesterol, the practitioners also evaluate patients' degree of social connection to assess risk of mistreatment or isolation. The evaluation allows the practitioners to collect information related to the health of older adults, to intervene with preventive health measures, and to refer older adults to secondary care if needed. Thus far, even though it is optional, the EMPAM has achieved considerable success, with nearly half of older adults taking their annual exam.

Promoting Healthy Lifestyles and Preventive Care

In addition to the annual examination under the EMPAM, the government is also seeking to introduce a regular, community-based mechanism to actively promote prevention and healthy lifestyles among older adults. In 2015, the Ministry of Health introduced Más Adultos Mayores Autovalientes (More Self-Sufficient Older Adults), in recognition of the functional deterioration in older adults that could be preventable with adequate care and a healthier lifestyle. It seeks to

prolong the autonomy of adults age 60 and older through education and preventive intervention.

Program implementation is local and based on alliances between the national health services and municipalities, operating in primary care centers or within NGOs. The centers are staffed with a kinesiologist, a physician focusing on body movement, and an occupational therapist to train older adults to be senior health monitors. After training, these older adults become local health agents, promoting a preventive culture and a healthy lifestyle in their own communities.

According to the Ministry of Health's González, despite having a health mandate, "the program is focused on more than the functional aspect of older adults; [it considers] topics such as the social network, renewing bonds, fostering use of shared spaces for building communities, and the potential of older adults to selforganize."112 Each health agent offers support for members of their community and elevates any concerns to the managers of the program. Thus far, Más Adultos Mayores Autovalentes is present in 166 of the 346 comunas (or districts in Chile, with the goal of reaching 200 by the end of 2018. González noted that "the dream is to reach the whole country and be tailored for each population."

Despite the ongoing effort to expand these programs, some issues remain. One in every three older adults states they experienced difficulties accessing health care, 113 such

as scheduling an appointment, late or rescheduled appointments, or problems getting to the health care center. Moreover, a significant number of older adults don't use health care, despite having access to it. According to González, "The older population doesn't access the health care. It is not health care for everybody, [it] is health care for those who access it. And there is not a clear understanding of why people are not accessing it—if it is due to time, lack of knowledge, work, or if they are taking care of the grandchildren or of another person."114 This represents an important gap in the implementation of health care in Chile and is an issue that requires more study to better understand how to improve health care delivery for older adults.

Chile Is at the Forefront of Addressing Rising Incidence of Dementia

Chile is at the leading edge of dementia awareness in Latin America. The National Study of Dependency conducted by SENAMA in 2009¹¹⁵ showed that 7.1 percent of people older than 60 were experiencing cognitive deterioration. Cognitive deterioration was more prevalent among women, affecting 7.7 percent of women compared to 5.9 percent of men. This percentage increases considerably for those older than 75, affecting 13 percent of those ages 75 to 79 and 36.2 percent of those 85 and older. According to the OECD, the prevalence of dementia is expected to increase as the population ages, with the percentage of the population age 65 and

older with dementia estimated to nearly double from 1.17 percent in 2017 to 2.26 percent in 2037.¹¹⁶

With dementia prevalence projected to double over the next 20 years, the government has created a National Plan for Dementia. Designed in 2014 as part of a collaborative effort by the Ministry of Health, academia, and civil society including experts in neurology, psychiatry, geriatrics, gerontology, and social services, the National Plan for Dementia seeks to develop a participatory process that integrates people with dementia, their families, academia, and the broader society.

The Plan was inspired by a program called Kintun that was launched in 2013 in the city of Santiago with funding from SENAMA. Kintun used an interdisciplinary team to promote better support for individuals with dementia and their caregivers, based on Chile's model of community and familysupported health care. The program integrated multiple services to deliver more holistic care, including a comprehensive geriatric assessment, activity-based day care centers with guidance from psychologists, training and education of family caregivers, home visits and case management, and public awareness campaigns.^{117, 118} Evaluation of the pilot found a decrease in falls, improvements in the behavioral and psychological symptoms of dementia sufferers, and improved perceptions of those with dementia.¹¹⁹ The Ministry of Health backed the integrated approach, and as of late 2017, at least 259

people with dementia and their families were enrolled in the program.¹²⁰

Based on this model, the national plan was designed to promote the prevention and proper care of dementia through a system of diagnosis and continuous care and the training of social and health workers to care for people with dementia. To achieve this, the Plan—similar to Más Adultos Mayores Autovalentes—mobilizes and trains the staff at primary care centers to educate, provide preventive care, conduct diagnostic tests, provide treatment, and ensure follow-up for both the person with dementia and their caregiver. For people with mild and moderate dementia, Centers of Community Support were created that promote more comprehensive treatment, community education, and relief for the caregivers. For complex cases, Memory Clinics were established in the secondary care system focused exclusively on health conditions associated with memory, including specialized diagnostics and more specific interventions. Finally, Mental Health Centers are available for caregivers with high levels of stress and for people with dementia that present angst and/or anxiety.

"What makes it [the National Plan for Dementia] interesting is that it is focused on being interdisciplinary, having working teams that include different professions. It is [also] embedded in a mental health system that is focused on the community and family, where the person with dementia continues to live in their home," said Abusleme of the Department of Mental Health.

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Despite its early success, there are still gaps to be filled. "The main area for improvement in the Plan is related to the tertiary care [hospitalization] for those with dementia, since generally older adults with dementia now end up in psychiatric clinics, which is far from ideal," said Andrea Maria Slachevsky, Vice President of the COPRAD (Professional Corporation of Alzheimer and other Dementias or Corporación Profesional de Alzheimer y Otras Demencias).

Implementation of the Plan began in late 2017, and, while still being refined, the government has already invested CLP 4.8 billion (USD 7 million), making it the largest dementia plan in Latin America. Still in its early stages and expanding, the Plan reached 1,200 people in 2017. This constitutes just over one percent of the

nearly 190,000 people with some type of dementia, 123 highlighting the considerable need for expanded care.

Long-Term Care

Chile is just beginning to develop its long-term care system, and the central government plays a minimal role with respect to LTC facilities. Although there are an estimated 1,700 LTC homes in Chile, half of them are concentrated in the capital, and a third are informal or not registered. According to experts, the current number of LTC facilities is insufficient to cover all the country's needs. Most of the existing facilities are managed by private companies, non-profit organizations, or religious or philanthropic institutions and cannot keep up with demand.

There are 724 formally registered LTC centers (ELEAMs or Establecimientos De Larga Estadía para Adultos Mayores) in Chile that reach 19,634 older adults. Of these, 31.5 percent are foundations or nonprofit religious congregations, 65.8 percent are private institutions, and only 2.6 percent are public corporations.¹²⁵ The public or non-profit LTC options are limited, and private LTC establishments are costly, charging approximately CLP 2.7 million (USD 4,000) per month and providing limited care, similar to a hotel.¹²⁶ The only influence the government has on these institutions is through the Decreto 14 (Decree 14), which allows the state to inspect the centers' infrastructure

but not the quality of care. And while the government can make suggestions regarding quality of service, it has no enforcement power.

The government is trying to address this gap in LTC by subsidizing the ELEAMs run by municipalities or non-profit organizations. Through this policy, SENAMA funds 12 ELEAMs, which are located across the country and have a total capacity of only 618 older adults, just a small fraction of those in need. To qualify for residency, older adults must have a moderate or severe disability and a high degree of social vulnerability. The average age of ELEAM residents is 78 years, with all falling within the 60 percent of the general population considered most vulnerable. In addition to the fully funded ELEAMs, SENAMA launched the Subsidy ELEAM Fund (Fondo Subsidio ELEAM) in 2013, which has provided subsidies to public or non-profit ELEAMs to help offset the cost and annual support care for 7,000 older adults.127

SENAMA has also endeavored to provide managerial support. To increase ELEAM's capacity throughout the country, the Fundación Oportunidad Mayor, a prominent foundation in Chile working with older adults, in partnership with the Corporation Simón de Cirene and funded by SENAMA, developed a manual to manage ELEAMs seeking to provide "a useful and practical guide to self-diagnosis, design and improvement in the management of a long-term care center." 128

According to Consuelo Moreno from Fundación Oportunidad Mayor, "the manual was promoted throughout Chile, with trainings in almost every region in the country."129 The foundation used its strong collaborative mindset; established a partnership with the University of San Sebastian and the Fundación Más. an organization of volunteer older professionals; and provided staff to the ELEAMs to assist in implementation. The program pairs business students seeking an internship with older volunteers from the Fundación Más, creating working teams that visit the ELEAMs and support the implementation of the manual.

Home-Based Care

While there is limited government funding for LTC provided at formal institutions, the government has increased support for caregivers, which remains the primary form of LTC in Chile. The Home Care Program (Programa de Cuidados Domiciliarios) targets adults age 60 and older who live in a moderate or severe state of dependency and fall within the bottom 60 percent of the population by income. Families eligible for the program are identified through the municipalities and primary care centers. Professional staff visits the home to assess the older adult's needs and to develop an intervention strategy, focusing on personal care, support with tasks at home, and social interaction with the community. Despite having a positive impact with the families it reaches, the scope of the program is limited. Approximately 1,748 older adults benefited from the program in 2016, and according to the 2015 Second National Study of Disability in Chile, over a million people living in Chile presented some degree of severe disability. Not exclusive to older adults, the Chile Cares (Chile Cuida) program also provides support to caregivers through technical aids that are organized through the municipalities, although their scope is narrow.¹³⁰

While family members remain the main care providers for older adults, there is very limited support for caregivers, the majority of whom are women. Without institutional support, caregiving responsibilities can be psychologically taxing and can pull family caregivers out of the formal workforce, thereby hampering their own financial preparedness for retirement.¹³¹ An increasing number of older adults are also becoming caregivers. According to a study conducted by the University in Chile in 2009, 47 percent of the caregivers of patients with dementia are between the ages of 61 and 80.132 While not currently under consideration, institutional supports for informal caregivers—such as paid leave and tax benefits, which have been adopted in some high-income countries—could be avenues to address the growing need for caregiver support as Chilean society continues to age.

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