

4th International Conference on Public Policy (ICPP4) June 26-28, 2019 – Montréal

Panel T17P01- Session I

Can SDG3 "Ensuring Healthy Lives and Promoting Well-Being for All Ages" Be Achieved?

Does Germany's Health Policy Portrait Include Aged Persons?

Author

Ana Andrun
HAW Hamburg & Willy Brandt School of Public Policy
ana.andrun@haw-hamburg.de

Date of presentation June 28, 2019

Abstract

The World Health Organization (WHO) lists "MG2A Old Age" in its 2018 International Classification (ICD-11) under "General Symptoms, Signs and Clinical Findings". Three years after Social Development Goals (SDGs) of 2015, this entry recognizes ageing-associated illnesses in the whole new category. The question whether ageing is and should be seen as a disease has been widely debated in public health field. Plethora of illnesses are related to aging, ranging from cardiovascular disease to cancer. This paper addresses health policy efforts in regard to healthy ageing in Germany, one of the fastest growing ageing populations in Europe. By investigating recent policy reforms and federal documentation spanning from 2015 until 2019 and juxtaposing them against healthy ageing standards of WHO - this paper reveals today's context of healthy ageing (frame) and current forms in which health prevention policies among the aged in Germany are represented (portrait) This paper shows that Germany's health policy goals certainly follow SDG3 prospects, as well as WHO's healthy ageing orientation. However, they can be largely widened in scope in regard to the health prevention and promotion policies geared at the aged population. This paper, by closely examining Germany's prevention act reform and federal programs in healthy ageing, sheds new light on neglected issues of age-related illnesses and lifestyle and therefore opens the further discussion about preventative policies aimed at their improvement.

Keywords: policy language, textual analysis, healthy ageing, health promotion

Introduction

"Youth is what we love. Age weights upon our head like a burden heavier than the rocks of Etna, drawing a curtain of darkness over our eyes...age is miserable, tainted with death; away with it!", Oedipus et Colonus", Sophocles (trans. McLeish, in Fiore 2014).

By 2050 the world population over the age of 60 will account to 2 billion (Federal Statistical Office of Germany, 2016). What is ageing? On a cellular level, it may mean adaptation to stress, stem cell exhaustion, metabolism derangement and inflammation that accelerates into chronic diseases (Franceschi et al., 2007). The Ancient Greek physician Galen viewed ageing as a natural process of life before death which is possible to prolong with certain habits and prevention (Burstein & Finch, 2018). Hesiod's Pandora, when opening the Pithos, released to the world "illness and age"; Olympian gods as natural rulers were eternal and not able to age. On the other hand, ancient Chinese hoped for old age; Confucius boldly stated, "At the end of a man's life, his words are graceful" (Fiore, 2014). In Ancient Rome, Cicero reasons illnesses of old age, "we have to fight against aging, as we do against a disease" ("Cicero — De Senectute", in Schäfer 2002). Modern medicine views age scientifically: as a season of life characterized by possibility of frailty, sarcopenia, chronic obstructive pulmonary disease (COPD), cancer, and Alzheimer, or Parkinson disease. Ageing may or may not include rheumatoid arthritis (RA), Osteoarthritis (OA), Osteopenia, and Macular Degeneration (Franceschi et al., 2007). All of these diseases are results of biological reactions in our bodies, and yet, as they are the most seen in aged persons, they became age-related illnesses.

In Germany, the number of elders continues to grow: 22.2 million (56 % women and 44 % men), out of 81 million citizens are over 60 years of age. In 2050, this figure will already have risen to more than a third. In 2017, 81% of all dependent on care were 65 years of age or older, and 71% of those older than 90 years of age were care-dependent (Federal Statistical Office in Germany, 2016). Germany is rated number 4 overall due to relatively high levels of domains related to capability, educational attainment, healthy life expectancy and income security (HelpAge, 2015), and this might signal that it possesses fundamental structures ready to host this imminent "greying society".

As no ageing process is the same, so are the biological causes of the illnesses attached to it. Galen divided the science of medicine into three basic groups: that which is healthy, that which is ill, and that which is in-between. He defined old age as in-between ("neutrum") (*De sanitate tuenda*, in Schäfer, 2002). Much like in Renaissance, geroscience today explores

ageing and chronic age-related diseases (ARDs) and geriatric symptoms (GSs), seeking to understand their common set of biological mechanisms. Since physiological ageing (senescence) is not really distinguishable from pathologies, scientists cluster in two: those who believe aging is different from age-related diseases, and those who do not. Arguably, the distinction of when exactly old age stops being healthy and becomes a disease is not clear, "precise boundaries do not exist and the two extremes are represented by centenarians, who largely avoided or postponed most ARDs/GSs and are characterized by decelerated aging, and patients who suffered one or more severe ARDs in their 60s, 70s, and 80s and show signs of accelerated aging, respectively" (Franscheci et al., 2017). The two divides regarding the view on ageing have theoretical and evidence-based policy consequences. Present day policy realities pertain accommodate this divide by placing, similarly to Galen's "neutrum", ageing somewhere in the middle: whereat health policies aim at both prevention and intervention.

This paper discusses ways in which Germany's health policy considers the need for preventative public health measures for the aged by investigating does it involve all ailments of old age or it has just picked a few. By conducting a document analysis of federal frameworks of 16 states from 2016 and the number (29) of healthy ageing programs from official federal sources, it looks at how "large" is the "portrait" of health policy is: what is the scope of policies in place and which ones are most mentioned. This paper includes an overview on current WHO and EU policies in healthy ageing. It further inspects aforementioned programs and categorizes them into themes. Categories were decided based on WHO's key policy areas (intervention) and WHO's health promotion topics (prevention/promotion). The findings outline the extent of public health nexus related to the old age, and number of aspects it endorses from both health promotion and health intervention policies.

Ageing and Public Health

Ageing is a risk factor for chronic inflammatory diseases: diabetes, cardio vascular disease (CVD), atherosclerosis, dementia, cancers. Additionally, ageing exhibits frailty and sarcopenia: unintentional weight loss, poor hand grip, slow speed gate, feelings of exhaustion, and degeneration of the muscle mass. The main causes of death in aged are ischaemic heart disease, cerebrovascular disease (stroke), lung cancer. The burden of disability increases 3-4 times from age 55 to age 75 (WHO, 2019). 75% of the people above the age of 75 suffer from multimorbidity (having number of illnesses at the same time). Among mental health illnesses, dementia and depression are the main causes for the need for care. Due to disability,

multimorbidity or mental health illnesses, physical inactivity further fuels associated diseases (NCDs) (Federal Statistical Office, 2016).

The WHO suggests that the burden of ill health among older people can be reduced or prevented by interventions of environment: addressing injury, NCDs, poverty, social isolation and exclusion, mental health disorders, and elder maltreatment (WHO, 2019) Public health promotion, on the other hand, reduce multimorbidity and increase the quality of life of the aged. Healthy ageing policies include delaying retirement, increased community activities, improving lifestyles of the aged through education and social inclusion, long-term care systems, and cost-effective health prevention and promotion. It remains unclear which policies are more effective than others (Oxley, 2009).

Perception of ageing influences quality of aged persons and policies on ageing. Ageism views all aged persons as the same, framing them as frail, dependent and useless, framing ageing as either a problem, burden or a cost (Baum, 2018). "Unlike other forms of discrimination", WHO states, "ageism remains socially acceptable, strongly institutionalized, largely undetected and unchallenged" (WHO, 2019.) This translates into attitudes of aged being overlooked for employment, social services, and being stereotyped in the media. Ageist views contribute to aged persons feeling less valued, and it poses a greater risk for their social isolation and depression. In a 2016 "World Values Survey", 57 countries found that 60% of respondents reported that older people are not respected, and the lowest respect was recorded in high income groups (WHO, 2016) The older adults who embrace the negative attitudes about ageing may live 7.5 years less than those with positive attitudes about their ageing (Levy, Slade, Kunkel, & Kasl, 2002) and older persons with positive age stereotypes would be more likely to recover from disability (Levy, Slade, Murphy, & Gill, 2012).

In order to offset international policy awareness to the issues of ageing and ARDs, WHO defines a benchmark for healthy ageing. Additional to genetic and behavioral factors, healthy ageing depends on environmental and socioeconomic determinants, influenced by the individual (intrinsic), and policy systems (environment). Combined, they set ageing in the defined the context. This context is fluid, it is regarded as a process, and it can be influenced and changed. Healthy ageing is seen as "the process of developing and maintaining the functional ability that enables wellbeing in older age" (WHO,2019). Functional ability and intrinsic capacity, within a broader environment that factors in diversity and socioeconomic status together contribute to the making of this process. Functional abilities involve being able to contribute to one's work and relationships. These abilities can only be made possible when

intrinsic capacities of the person are in place. Intrinsic capacities include that the basic needs of the person are met, like mobility, and the opportunity to learn, remember, and cope with stress. Our environments (home, community, attitudes and values regarding ageing, health and social policies and it's the systems and services) influence both.

Is health promotion and prevention "useful" when aimed at the aged? Already in 1799, German physician Burkhard Seiler (*Anatomia corporis humani senilis*), noticed that that most old persons do not die because of the weaknesses of their age, but several illnesses that have a cumulative mutual effect (Schäfer, 2002). Due perceived as cumulative and non-remediable illnesses of old age, health prevention policies are targeted to younger populations. It also could be just an inherent ageist view on our policies (Kietzman, 2019). Which age-related illnesses are capable of modification and even of reversal? Within NCDs spectrum, lifestyle-related habits (diet, exercise, mental health) as the main causes of NCDs, when altered, can revert (obesity, diabetes type II), ease (depression to well-being) or alleviate the occurrence of the disease (exercise can slow the age-related bone loss in osteoporosis (Bundeszentrum für Ernährung, 2018). Health prevention policies, when late to reverse the disease, can still prevent the development of multimorbidity.

This paper's research corpus includes federal frameworks documentation signed by each state in accordance to the new Prevention Act Law ("Landesrahmenvereinbarungen", in this paper referred to as "federal frameworks") (1) and federal level programs accessible via online health agency portals (urban state level) (2). This paper looks at the extent in which both intrinsic and functional abilities are mentioned through the aforementioned documentation and in the form of either policy areas and/or health prevention. For this reason, the WHO's healthy ageing key policy areas (Table 1) and WHO's layout of health prevention and promotion policies (Table 2) were both used as guidelines for data collection and categorization. When those two had the same entries – the duplicates, for coding purposes, were deleted and one category was made. Healthcare diagnostics screening and overall primary prevention (alike vaccination) due to the scope of this paper's research, were omitted.

Prevention of falls of the aged and mobility in the city

Promotion of physical activity

Vaccination and prevention of infectious disease in health-care settings

Public support for informal care giving with a focus on home care, including self-care;

Prevention of social isolation and social exclusion;

Prevention of elder maltreatment;

Urban mobility

Opportunities for the work should they be willing doing so

Basic needs met and socio-economic status

Table 1. WHO Europe: Key Policy Areas of Healthy Ageing, (WHO, 2019b).

Dental hygiene education and oral health services

Policies and interventions to address tobacco, alcohol, physical activity and diet

Dietary and nutritional interventions

Intersectoral policies and health services interventions to address mental health and substance abuse

Strategies to promote sexual and reproductive health

Strategies to tackle domestic violence, including public awareness campaigns; treatment and protection of victims; and linkage with law enforcement and social services.

Table 2. WHO's health prevention and health promotion (WHO, 2019a).

Healthy Ageing and Social Development Goals

International global and public health framework of today can be entirely credited United Nations, particularly WHO's efforts. The WHO, though its team of physicians, epidemiologists, public health professionals, and tied though UN's policy levels, is advising governments on UN health goals in 150 countries. Since its inception, it paved the way for the responsible use of antibiotics, strategies a number of communicable diseases, AIDS, malaria, etc. WHO's line of work includes action on "ground" level (deploying medical experts to virus outbreaks areas), research level (data aggregation, policy best practices, comparative health policy lessons, indicators, measuring and evaluation frameworks) policy level (non-binding recommendations) and international health level (by advising governments). However omnipresent WHO's work may be, population health is bound to assume the context of its own setting. The national and federal involvement in health is, for these reasons, not replaceable. In 2018, annual report towards the meeting of SDG goals reports that 13 million people die every year before the age of 70 from cardiovascular disease, chronic respiratory disease, diabetes and cancer, mostly in low and middle-income countries (World Health Organization, 2018). In that name, SDGs 2019's "zero draft" requires accelerated action, local

action, and strengthening institutions and national implementations. SDGs draft does not mention "elderly" or "aged" in its entire communication. It could be argued that, due to complexity of demographic changes, United Nations can, through WHO and SDGs, only aim to pass the skillset and instill the sense of urgency into member states (UN, 2019).

Is WHO's classification yet another signal of urgency for states to notice its aged? Possibly so. WHO's ICD-10, passed in 1992, counts "R54 Senility" under its Global Burden of Disease. R54 is a "garbage-code", an algorithm of ICD that assigns morbidity to possible underlaying causes. 26 years later, the ICD-11 lists an entire group of signs symptoms and syndromes to health-related illnesses. The classification of diseases changes over time: progress in diagnostics, social, societal and economic contexts make it fluid. For example, mental diseases were, before 1949, not accounted by ICD. Since they were classified under "Psychiatric Disorders", they started accounting for most of the biomedical debate (First, Reed, Hyman, & Saxena, 2015). Rapidly changing demographics on global scale might have contributed to WHO making this entry. Arguably, it could also be seen as a recognized trend, which is hoped to signal and increase scientific debate. Scientists believe that our knowledge about causes on death has been improved, and it allows for the better disease association and classification (Moriyama, Loy, Robb-Smith, Rosenberg, & Hoyert, 2011). Nomenclature of diseases creates pathways with pharmaceutical industry, academic community, healthcare and insurance companies, and policy makers. Diseases made known impact the way in which we "research, treat, and reimburse", ultimately leading to the increased attention to the subject (Zhavoronkov & Bhullar, 2015; Lord and Jones, 2012).

Despite the arguable progress in medical understanding of ageing, the evidence we currently work with is not at its highest potential. This allows for scientific disagreement. Biomarkers as to when age-related illnesses set in older age, and why, is unclear (Salive, 2013). Biomarkers involved in ageing are the same ones associated with cancer (Zhavoronkov, et al., 2014) or HIV (Marengoni et al., 2011). It is possible to imagine that classification of age-related illnesses will be changed and clarified when further the evidence gets clarified; for example, advanced measurement of epigenetics levels of aging in diseases are already possible (Horvath & Levine, 2015). Some authors state that diseases should be considered as a disease (Bulterijs, Hull, Björk, & Roy, 2015), others are against it as that view may impact the very same aging population negatively (Caplan, 2005).

What now? Authors suggest that the usage of "non-garbage" codes in the future ICD, and a task force that would help translate the evidence to policy-makers would positively impact prevention and promotion (Zharonkov & Bhullar, 2015). In order to ensure the well-being of all ages, the concept of well-being needs to be broken down and evaluated, and tools for accomplishing this should assume appropriate policy actions. Arguably, well-being comes in types. Steptoe, Deaton and Stone distinguish *evaluative wellbeing* (general life satisfaction) from *hedonic wellbeing* (emotions), and *eudemonic wellbeing* (sense of purpose and meaning). Evidence points out that higher levels of (eudonic) well-being is associated with longer survival. Ideally, healthy ageing policies should have all three as its main goal, but do not, as the economic and health benefits of well-being are not thoroughly explored yet (2015).

SDGs are important to those who age. Those who age are important to SDGs. The aged, as the fastest growing age group, will increase their impact through economic, social and political involvement. Aged persons enable economic development with their spending and investing; they engage in the workforce beyond retirement date and comprise a whole new entrepreneurial ecosystem (Lee, 2017). Demographic changes will cause aged persons to gain leverage in political participation. They will impact health systems, demand for goods and services, urban planning, labor markets.

SDG1 No Poverty	Addresses that socio-economic standing of	
	elderly	
SDG2 No Hunger	Enabling the nutrition for the elderly and the	
	access to it	
SDG3 Health and Well-being	Health systems needed to be transformed in	
	order to better access their needs,	
SD5 Gender Equality	Raises the older women's status in	
	households and their access to pensions	
SDG9 Industry Innovation Infrastructure	Addresses environments friendly towards all	
	aged groups including elderly,	
SDG10 Reduced Inequality	Ensures equal access to social services	
SDG11 Sustainable Cities and	Addresses environments friendly towards all	
Communities	aged groups including elderly,	
SDG16 Peace Justice Strong Institutions	Helps raise awareness about ageism ad	
	discrimination.	

Table 3. "Healthy Ageing and the Sustainable Development Goals", WHO, 2019.

SDGs applicable to aged persons align with WHO's key policy areas: the international healthy ageing framework shares same priorities. Furthermore, through its 13th General Program of Work 2019-2023, it sets the strategy in realizing SDGs. 14 billion US dollars will be invested in the over the five-year period in 3 areas: (i) strengthening capacity for emergency, multi-sector investments in prevention, (ii) health governance, capacity for multisector convening and engagement; (iii) increasing and building regulatory capacity and strengthening information and evidence for policies, strategies and performance measurement (WHO, 2018). Examples of WHO's accelerated work can be seen through its updated version in healthy cities program and the recognition of gender - socio-economic - ageing connections; specific policies that are translatable to national governments are provided. In 2015, WHO publishes "age-friendliness of cities" indicators, expanding it into "Creating agefriendly environments in Europe: a tool for local policy-makers and planners" a public policy guide in 2016. Advising on neighborhood walkability, accessibility of public space and feelings of safety is introduced in this report (WHO Regional Office for Europe, 2018). Moreover, WHO recognizes the role of gender in health, in its "Strategy on women's health and well-being in the WHO European Region" (2016) the importance of wage and pension gaps with increasing burden on older women (WHO, 2019d).

The Member States within the EU have sovereign responsibility in providing health services and medical care via nationally designed programs. EU's public health issues are made among national representatives and the European commission, together with the array of EU institutions and interest groups. Altogether, they make EU's public health governance level. This level complements national programs in the following areas: health protection and improvement of EU citizens (1); support of the health infrastructure (2) and improving efficiency of health systems (3). The European Commission's Directorate for Health and Food Safety (DG SANTE) proposes legislation, financial support, and coordinates both best practices and best health promotion activities among member states. THE EU recognizes the changing need for health professionals in the wake of changing demographics and associated risk factors, and their key role in counseling might grow and expand to other sectors. Furthermore, it advocates for resilient health systems that will be able to meet rising demands of healthcare due to ageing populations.

The European Commission's Directorate-General for Economic and Financial Affairs (DG ECFIN) projects that the annual average potential gross domestic product (GDP) growth rate in the EU. Due to ageing demographics, EU is expected to witness the drop of 1.2 percent between 2031 and 2050. Due to expected high expenditure in pensions, the pension benefits rates will decrease by 5% to 10% for every retiree over 65 years of age (DG ECFIN, 2009). Low standards of living are associated with disease and poor health leads to social exclusion. Income differentiates the most between low and high levels of exclusion, rather than education and gender. The shared characterizes of social exclusion of elders is that no matter in what country they are in – the isolation increases as they age. The decrease or pension rates might not only lead them to poverty but also to social exclusion as well. The governments, in order to curb the rising costs of greying population, resort to extending pensionable age, lowering the rates or actively motivating elders to continue working. Gender gap, accentuated in countries where pension rate is linked to pre-retirement earnings, as a. reflection of the pay gap and interrupted working experience due to family care.

Health and demographic change are two out of 7 "Grand Challenges" of the Europe 2020 Strategy. Median age is predicted to rise to over 47 by 2060. The "dependency ratio", calculated as the relationship between people of "working age" (16 or 18 to 65 years) and those outside this range, will decline over the next 50 years from 4:1 to 2:1 "More Years, Better Lives - The Potentials and Challenges of Demographic Change" is member-states driven activity. Germany one of 17 member states to this the policy that fosters collaboration (Joint Programming Initiative, 2014). AFE-INNOVNET's Thematic Framework, launched in 2016 by the EU Commission, represents the shift from an informal network to an international non-for-profit organization which adopts the WHO's age-friendly environments approach in its Covenant on Demographic Change. Evidently, on the EU level, Member States are actively expanding their collaboration, triggered by EU funding. In the following pages, this paper will look into the wider EU context for healthy ageing and discover how Germany has instilled them to the context of its own population.

Ageing in Germany

"Healthy aging is a societal task, especially for the ministries of construction / environment, health, social affairs and senior citizens" National Prevention Konferenz (NKC), 2015

Germany is one of only five "super-aged" societies in the world: the number of people 65+ age is projected to grow 41 percent (and rise for 24 million individuals) by 2050. In 2050, it is expected to have aged persons accounting to one third of its population, while the population of ages 15 through 64 will shrink by 23 (UN, 2015). These demographic changes expected in the near future require cohesive and collaborative policy environments in order to offset the rising costs of both ill health of the aged, long-term care costs, as well as those regarding expected deficits due to changes in the labor workforce. As health is the result of a number of variables – health status of the population has, too, a similar effect: it protrudes variety of governmental issues.

The labor productivity of the population is aligned with the desire of aged persons to work, which in turn positively affects their health and well-being. In a 2014 study, more than 60 percent of those age 50 and older cited a desire to help shape and contribute to society, as well as to engage with other people and remain socially active as primary reasons for volunteering (Simonson et al., 2014). Moreover, it is positively associated with both governments' productivity and the wellbeing: aged people with healthy functional ability not only contribute to lowering the costs of their long-term care, but they re-enforce their own wellbeing by feeling valued and included in this envisioned-to-be inclusive society for "silver-agers." Over 28,000 people volunteer with the help of Senior Citizen Offices (SCOs) – approved by the Association for Senior Citizens' Offices to 2.5 million hours per year (AARP, 2019). However, older Germans in general are less active in the labor force than their counterparts in other OECD countries: it accounts for only 6.1 percent, considerably lower than the average of 14.1 percent (Oxley, 2009). Flexible Retirement Act ("Flexi-Rente"), approved in 2016, allows work past the normal retirement age and it entices employers hire aged persons through lower contributions (OECD, 2018).

Germany's long-term care system (LTC) was recently revised in order to access the need for the aged in wider scope. The First Bill to Strengthen Long-Term Care prepared wider definition of needs for the aged. In 2016, the Second Bill on Strengthening Long-Term Care extended to improve home-based care, it guarantees alleviating the burden on care-givers, and offers earlier counselling services and admitting into LTC. The Bill stipulates, for example,

that "care grade 1" includes "those who do not yet require any considerable degree of support but, for example, require long-term care counselling, some adaptation of their living environment or benefits in the area of general care" (German Federal Ministry of Health, 2015). The six needs concluded in the Bill are, alike WHO's key policy areas:

- 1) Mobility
- 2) Cognitive and communicative abilities
- 3) Behavior and psychological problems
- 4) Self-reliance
- 5) Coping with and independent handling of demands and pressures caused by illness or the need for therapy.
- 6) Organizing everyday life and social contacts.

The aged in Germany have a solid perception of their healthcare system and they feel they can rely on it: 81% of 65 or older (self)reported to received treatments in timely manner. More than two-thirds of LTC recipients age 65 and older receive the care services at home, instead of in institutions (Federal Statistical Office, 2016).

Health Prevention and promotion in Germany for the aged is done by the Federal Centre for Health Education (BZgA). Its work involves mass education of citizens on topics of health and health surveys; "health of the elderly" being one of its key topics installed through "Prevention Targets for the Second Half of Life: A Review " . The BZgA's database includes 1,200 projects on "Health Promotion for the Socially Disadvantaged", it is open to public and permits nationwide searching for projects. It incentives the projects among stakeholders through its Prevention Prize ("BZgA: Health of the Elderly," 2019). The adoption of Preventative Health Care Act (PrävG) in 2015 is a key step in straightening "settings-based" health promotion. This Act has changed the health policy landscape after being debated for a decade (DGUV, 2019). Its objective is to strengthen health prevention system through the network between statutory health institutions, federal state level, and private establishments and 500 million euro. That way, stakeholders involve care centers, schools and nursing homes and workplaces. PrävG sets mandatory framework agreements at the state level. Its recommendations are three-fold and divided in life phases: "healthy growing up" ("gesund aufwachsen"), "healthy living and working" ("gesund leben und arbeiten") and "healthy in old age" ("gesund im Alter"). This strategy is then passed onto the National Prevention Conference (die Nationale Präventionskonferenz, or NPC in English) further works on the execution of the shared goals (NKC, Bundesrahmenemphelungen, 2018). The NPC is set out from national government, the Länder (federal states), local authorities, the social partners and the social insurance institutions. It binds together Germany's statutory health insurance (GKV, who provide promote good health and prevention in the life environments), statutory long-term care insurance (SPV, provide prevention services to persons residing in care facilities), statutory accident insurance (GUV, preventing workplace accidents, occupational diseases and work-related health hazards) and statutory pension insurance (GRV, health-promoting behavior and health at work places). The list of PrävG members in appendix 1. The NPC is ought to produce a Prevention Report every four years. The first report is expected to be published in July 2019. It divides "Healthy in Old Age" objective into two topics when calling for Federal Frameworks: 1) Persons of no longer of working age 2) Persons in residential care facilities (NPK, 2016).

Prevention programs in healthy age have been around before 2015 Act. The goal of the Act is to have it fit to a community. For example, on the national level, the program of dietary guidelines "Healthy and Fit in Old Age", through the national IN FORM nutrition strategy, addresses the most optimal intake of macronutrients. It addresses diet in relation to diabetes, osteoporosis, hyperacidity, hypertension, dementia and depression. Dementia and curbing the numbers of people suffering from dementia are one of the main health goals of Germany's health ministry and ministry of food and agriculture (BZgA, 2019). Currently, 1,4 million people in Germany suffer from dementia and the quarter of them live in care homes. It comes by now surprise then that the preventing dementia is one of the key health goals of Germany on national level (Dementia Care Level). Through "The Every Age Counts" Strategic policy, the ministry of health together with the network of organizational partners comprising of social insurances and health agencies aims to build joint networks in order to support people with dementia, and structure the new health systems that will support people relied on care homes (Schnabel, 2016).

Overall, Germany's policy frameworks on national and federal level include the recognition of its fast ageing society (Preventative Health Care Act). It expressed the need for closer collaboration among different stakeholders (via NPC) through systemic collaboration (federal frameworks). In the following pages, this paper will show as to what topics precisely Germany's healthy ageing policy are in place.

Methods

This paper aims to show the corpus of policies in place relating to healthy ageing from 2015 until 2019. This is done by analyzing each federal commitment to the wake of Prevention Act joined with analysis of programs tailored for healthy ageing on the websites of 16 federal capital cities (health ministries). The categorization was based on WHO's key policy areas and WHO's health prevention areas are shown in appendix 3. This paper limited its scope of healthy ageing for people aged persons outside of care facilities. This paper also omitted primary health prevention programs that were healthcare based; it focuses rather on promotion documentation in order to find out all of its current topics. The object refers to policies put in place from 2015 (offset of SDGs). It could be said that this paper looks two levels of governance: national to federal (federal frameworks, see appendix 2) and purely federal (programs of state capitals). Grassroot programs about health and ageing were simply omitted due to their abundance and volume. All documents earlier than 2015 were omitted. Since prevention health is in Germany streamed from top-bottom approach, it was decided to inspect the top trier as it is mostly trend-setting for the future of local engagement. Technique of this content analysis show, through mentions of healthy ageing and in what context were included in federal and national documents and programs from 2015, the general scope of healthy-ageing related policies. It is a broad contextual analysis through which categories and themes emerge. This study contributes to understanding how age-related illnesses are conceptualized and incorporated into documents for public health.

Since the coding unit represents the sensitivity of analysis, this paper's findings can arguably be considered too broad. As the units inspected were online accessible programs based on categories, the findings do not dwell into other aspects. Deeper coding analysis of having coding unites looked through propositions or paragraphs could have given us more context as to how are those topics framed within programs, as well as executed. Further limitation was the accessible documentation on the official websites of the federal state and their health agencies (Gesunheitsämter). All online accessible documents linking to their websites were used for this research, and this further limits the findings in two ways: the number of non-governmental and grassroot organizations focusing on these topics independently from the healthy agencies is excluded (1) and the organization of the online data on the official websites was structured differently, which might have impacted that certain categories of healthy ageing were addressed by other agencies but they did not carry the same name (socio-economic, social services, for example) (2); regional and rural

programs, for the reasons aforementioned, were excluded 4). Internet searches of "healthy ageing" "life in old age" "health department old age" "federal programs healthy ageing" were conducted. The origin of documents, as the documents are national or multi-stakeholders based, are mixed. For these reasons, the corpus has been established to be look at either federal frameworks or urban programs.

Findings

The programs about diet in healthy age receive general attention and, in certain capitals, they are linked to age-related illnesses. Five federal capitals considered the aspects of diet as worth mentioning in relation to healthy ageing (Bremen, Hamburg, Magdeburg, Kiel, Munich). Interestingly, in Bremen, promotion programs include "Diet and Dementia", "Diet and Fall Prevention", "Eye Degeneration and Diet". Socio-economic aspects of aged and their diet are addressed in Stuttgart in the aspect of *Mittagstischangebot* – ensuring nutritious daily meal. The topic of dementia is present in relation to ageing as prevention from dementia. In Hamburg, 3 programs – "Life with Dementia", "Caring for Dementia" and "Dementia Assessment at Home" can be found. Potsdam recognizes the need for the public awareness of people working in services ranging from public transport and beyond and their knowledge of dementia in order to help senior citizens who suffer from the same to navigate their way safe throughout their city. Almost all capital cities offer counseling on general day-to-day services.

The accessibility in the household is addressed in the terms of guidelines in Stuttgart. In Munich, the accessibility of parks and public spaces in relation to the aged is observed. Erfurt and Hannover Wiesbaden (indoor accessibility) or Hannover ("Essen auf Rädern" - food on wheels program, which accessibility to food). The evidence shows oral dental health inequalities in the older population among 14 European countries. Policymakers are urged to address the socio-economic aspect of dental health (Shen and Listl, 2018). Dental health is mentioned only in regard to nursing home settings, this paper's research did not span to establish why is that the case. When it comes to integrating the aged to work, Mainz through expanding the network for seniors to be active in, Magdeburg through offering learning courses and creativity workshops for seniors, Schwerin offering evening classes.

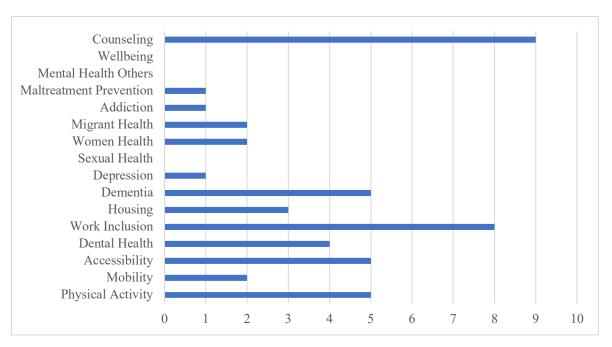


Table 4: Findings. Frequencies of themes of healthy ageing mentioned in 16 States.

Overall, this paper shows which prevention strategies dominate in the Germany's policy context. Those are counseling, diet, physical activity, accessibility and work inclusion. One might say, the basic functions are present. Diet has been expanded into socio-economic level (Stuttgart) and accessibility (Hannover), apart from its relation to a number of illnesses.

This paper shows us what are the silent topics of Germany's "portrait" when dealing with the aged., Wider health prevention policies including mental health (anxiety, trauma, coping with illnesses), sexual health (changes of the body, post-menopause, sexual health in 65 and over), aged migrants (information in different languages, counseling for health) are excluded or seldomly present. The addition to substances and maltreatment programs are minimal. Other agencies are included in these topics and this could justify the low number of entries. Nevertheless, in two cities only the aspect of gender and age burden has been distinguished. The world "well-being" has not mentioned once in any of the 29 programs inspected. It is mentioned twice in NPC's recommendation in the relation of different factors contributing to elder's well-being. However, the definition of well-being was not provided.

The inspection of federal frameworks shows the planned expansion of topics in two states: Hamburg and Saxony. Topics these states will assume in order to follow PrävG and NPC guidelines of "healthy in old age" are: exercise, fall prevention, nutrition, oral health, addition, and psychosocial well-being (Saxony) and exercise, nutrition, stress management and drug use (Hamburg). Since federal framework documents needed not including

specificities of community building of policies, it is not to assume that other states not including mentioning of healthy ageing or its aspects are less motivated to develop them. These findings do suggest only a diversity, alike in state programs, of states to frame and initiate policy. Since Health Prevention Act, through NPC, precisely encourages community based policies to take place, it could be argued that this level of initiation on the behalf of states speaks for their capacity and self-reliance.

Germany's policy portrait provides a solid frame for the WHOs execution of key policy areas for the aged and SDG3 "health and wellbeing". However, on the state level, the scope of enabling the aged to enjoy years of good health has been mainly oriented towards diet and physical activity, casting aside mental, dental heath, aged migrants, sexual health in old age, wellbeing. Mental health included only depression and dementia. Center for psychological health in the old age was founded in Mainz. None of the programs online showed additional accessibility ("leichte Sprache") and user-friendliness for the aged persons who are themselves the most interested in the topic. These portals did not offer larger fonts (because of the reduced eye sight) or clear text (in the case of the lower computer literacy), warnings for the external links.

State differences exist also in the layout of programs offered and no online portal summons them all onto one place. Certain states publish the reports about the aged in their cities without publishing any additional documentation about programs online (Erfurt). What is important to note in regard to these reports is that not only that they are online and already potentially less accessible to the aged population at large, but they are written in the language more suited for policy-makers rather than the aged, and arguably technocratic. Some programs included self-tests and assessments, and others (Hanover) do not have accessible programs online, but only guidelines for the aged. Self-assessment and are Hamburg in "Diet and Prevention" program as well as "Falls and Mobility" offers self- assessments on macronutrients and cognitive capabilities and possible dementia signs. Moreover, there seems to be an absence of online platforms which pool these programs together. The presence of such platform would enable state and local authorities to make comparison within local and state trends.

Conclusion

"Nine-tenths of our happiness is based solely on health, and with it, everything is a source of enjoyment." Schopenhauer

Healthy ageing, from the international level of WHO and UN, through inter-governmental structures of the EU, has found its way into Germany's system. The expanding of the primary prevention through the reform of care law (accessing better needs) and federal frameworks by the Health Prevention Act (building community) is now the present reality. The involvement of stakeholders and segmenting policies through communities and organic actors within these communities can, in the future, enable closer participation, should all the involved actors would be willing to do so (Garlichs, 2015).

Currently, federal frameworks, signed by 16 states between years 2015-2016, do not excessively mention the wider scope of topics in regard to healthy ageing. The exemptions are Hamburg and Saxony, hinting mental health and addiction themes that are seldomly mentioned in state levels. Through overall 29 online programs from federal ministries analyzed: diet, physical activity, accessibility and counseling count highest publications. Mental health as an issue separate from depression and dementia is non-existent; gender-related burden in ageing seldomly noticed; migrant health of the aged finds entries only in some federal states and arguably those with the highest number of immigrants. Sexual health of the aged finds no place in programs. Well-being is mentioned only once in federal framework (Hamburg). This paper's results present the present reality and also imply possibilities for moving towards well-being narrative in the future, as it shows great capacity for improvement.

Enabling the oldest population to eat healthily, move often and find no barriers on their way to work and hence productivity is insufficient when measuring it to the ambition of SDG goals. The aim of this paper was to guide a discussion further: are we subscribing the ageist recipes when promoting health to aging demographics? Ever since Cicero and Galen, health promotion of the aged embodied basic core premises: mobility, diet, and illness management. The future of our societies and SDGs is arguably more likely to become true with not only functional, but with healthy and satisfied aged population. Ensuring that our policies meet our future selves, not ageist narratives is bidirectional; investing in aged demographics is investing in future. By leveraging healthy ageing away from functionalities and towards wellbeing (of all its types) will bring us closer to making the aged feel that their ending phase of life does not mean *phasing* them out of life.

References

- AARP International. (2019). The Ageing Readiness and Competitiveness Report: Germany. Retrieved from https://arc.aarpinternational.org/File%20Library/Full%20Reports/ARC-Report---Germany.pdf
- Bundeszentrum für Ernährung. (2018). Gesund und aktiv ins Alter.
- Baum, C. (2018). The ugly truth about ageism: it's a prejudice targeting our future selves | Life and style | The Guardian. Retrieved June 26, 2019, from https://www.theguardian.com/lifeandstyle/2018/sep/14/the-ugly-truth-about-ageism-its-a-prejudice-targeting-our-future-selves
- Bulterijs, S., Hull, R. S., Björk, V. C. E., & Roy, A. G. (2015). It is time to classify biological aging as a disease. *Frontiers in Genetics*, 6. https://doi.org/10.3389/fgene.2015.00205
- Burstein, S. M., & Finch, C. E. (n.d.). A 2,000-year-old view of old age. 1.
- BZgA: Health of the Elderly. (2019). Retrieved June 26, 2019, from https://www.bzga.de/home/key-topics/health-of-the-elderly/
- Caplan, A. L. (2005). Death as an unnatural process. *EMBO Reports*, 6(Suppl 1), S72–S75. https://doi.org/10.1038/sj.embor.7400435
- Directorate-General for Economic and Financial Affairs (DG FSCIN) 2009 Ageing Report: Economic and budgetary projections for the EU-27 Member States (2008-2060) http://ec.europa.eu/economy finance/publications/pages/publication14992 en.pdf
- DGUV. Deutsche Gesetliche Unfallversicherung. 2019. Preventive Health Care Act. Retrieved from https://www.dguv.de/en/prevention/topics-a-z/praevg/index.jsp
- Federal Statistical Office in Germany. (2016). Older People in Germany and the EU. 100.
- First, M. B., Reed, G. M., Hyman, S. E., & Saxena, S. (2015). The development of the ICD-11 Clinical Descriptions and Diagnostic Guidelines for Mental and Behavioural Disorders. *World Psychiatry*, 14(1), 82–90. https://doi.org/10.1002/wps.20189
- Franceschi, C., Capri, M., Monti, D., Giunta, S., Olivieri, F., Sevini, F., ... Salvioli, S. (2007). Inflammaging and anti-inflammaging: A systemic perspective on aging and longevity emerged from studies in humans. *Mechanisms of Ageing and Development*, 128(1), 92–105. https://doi.org/10.1016/j.mad.2006.11.016
- German Federal Ministry of Health. 2017. Peer Review on "Germany's latest reforms of the long-term care system" DG Employment, Social Affairs and Inclusion.
- Garlichs, D. (2015). [The new German prevention act: an effective strategy?].Retrived from https://www.ncbi.nlm.nih.gov/pubmed/26445263
- HelpAge. (2015). Global Age Watch Index 2015, London, 2015, ch 8 Western Europe, North America and Australasia.
 Help Age International.
 Horvath, S., & Levine, A. J. (2015). HIV-1 Infection Accelerates Age According to the Epigenetic Clock. The Journal of Infectious Diseases, 212(10), 1563–1573. https://doi.org/10.1093/infdis/jiv277
- Howard Oxley. (2009). *Policies for Healthy Ageing: An Overview* (OECD Health Working Papers No. 42). https://doi.org/10.1787/226757488706
- Kietzman, K. (2019). Population Health and Older Adults: A Public Health Issue that is Coming of Age | American Society on Aging. Retrieved June 26, 2019, from https://www.asaging.org/blog/population-health-and-older-adults-public-health-issue-coming-age
- Kooperationsverbund. 2019. Dokumente zum Präventionsgesetz. Retrieved fromhttps://www.gesundheitliche-chancengleichheit.de/dokumente-praeventionsgesetz/
- LacusCurtius Cicero De Senectute. (n.d.). Retrieved June 26, 2019, from http://penelope.uchicago.edu/Thayer/E/Roman/Texts/Cicero/Cato Maior de Senectute/text*.html
- Lee, J. A. (2017). Beyond Millennials: Valuing Older Adults' Participation in Innovation Districts. 40.
- Levy, B. R., Slade, M. D., Kunkel, S. R., & Kasl, S. V. (2002). Longevity increased by positive self-perceptions of aging. *Journal of Personality and Social Psychology*, 83(2), 261–270. https://doi.org/10.1037//0022-3514.83.2.261
- Levy, B. R., Slade, M. D., Murphy, T. E., & Gill, T. M. (2012). Association Between Positive Age Stereotypes and Recovery From Disability in Older Persons. *JAMA*, 308(19), 1972–1973. https://doi.org/10.1001/jama.2012.14541
- Marengoni, A., Angleman, S., Melis, R., Mangialashe, F., Karp, A., Garmen, A., ... Fratiglioni, L. (2011). Aging with multimorbidity: A systematic review of the literature. *Ageing Research Reviews*. https://doi.org/10.1016/j.arr.2011.03.003
- Moriyama, I. M., Loy, R. M., Robb-Smith, A. H. T., Rosenberg, H. M., & Hoyert, D. L. (2011). *History of the statistical classification of diseases and causes of death*. Hyattsville, Md: U.S. Department of Health and Human Services, Centers for Disease Control and Prevention, National Center for Health Statistics.
- National Prevention Conference. (2016). Federal Framework Recommendations of the National Prevention Conference in accordance with Section 20d, Paragraph 3 of Book V of the

- German Social Code. Retrived from
- https://www.dguv.de/medien/inhalt/praevention/themen_a_z/praevg/nat_praevkon/bundesrahm/bundesrahmenenglisch.pdf
- National Prevention Conference. (2018). Federal Recommendations.
 - Bundesrahmenempfehlungen. Retrieved from
 - https://www.bundesgesundheitsministerium.de/fileadmin/Dateien/3_Downloads/P/Pra eventionsgesetz/BRE Fassung vom 29.08.2018.pdf
- Salive, M. E. (2013). Multimorbidity in Older Adults. *Epidemiologic Reviews*, *35*(1), 75–83. https://doi.org/10.1093/epirev/mxs009
- Schäfer, D. (2002). "That senescence itself is an illness": A transitional medical concept of age and ageing in the eighteenth century. *Medical History*, 46(4), 525–548.
- Schnabel, E. (2018) Dementia in Germany care and policy strategies. Living Well With Dementia: Toward Dementia-Friendly Policy. Retrieved from https://www.ryerson.ca/content/dam/crncc/knowledge/eventsandpresentations/2017/Dementia2017/SC
- Schen, J., Listl, S. (2017). Investigating social inequalities in older adults' dentition and the role of dental service. European Journal of Health Economy. DOI 10.1007/s10198-016-0866-2
- Simonson, J., Ziegelmann, J. P., Vogel, C., Hameister, N., Müller, D., & Tesch-Römer, C. (2014). German Survey on Volunteering Deutscher Freiwilligensurvey (FWS) 2014. Survey instrument English version.

 107.
- United Nations. 2019. Gearing up for a Decade of Action and Delivery for Sustainable Development: Political + Declaration of the SDG Summit, Zero Draft. Retrieved from https://www.un.org/pga/73/wp-+ content/uploads/sites/53/2019/05/Zero-draft-Political-Declaration-HLPF-17.5.19 .pdf
- OECD. 2018. Key policies to promote longer working lives Country note 2007 to 2017. Retrived from https://www.oecd.org/els/emp/Germany%20Key%20policies Final.pdf
- World Health Organisation. Healthy Ageing and the Sustainable Development Goals. Retrieved June 26, 2019, from WHO website: http://www.who.int/ageing/sdgs/en/
- World Health Organisation Regional Office for Europe. (2018). *Creating age-friendly environments in Europe:* A tool for local policy-makers and planners (p. 68).
- World Health Organisation. (2016). Discrimination and negative attitudes about ageing are bad for your health. Retrieved June 26, 2019, from https://www.who.int/news-room/detail/29-09-2016-discrimination-and-negative-attitudes-about-ageing-are-bad-for-your-health
- World Health Organization. (2018). *World health statistics 2018: Monitoring health for the SDGs*. Retrieved from http://apps.who.int/iris/bitstream/handle/10665/272596/9789241565585-eng.pdf?ua=1
- Zhavoronkov, A., & Bhullar, B. (2015). Classifying aging as a disease in the context of ICD-11. *Frontiers in Genetics*, 6. https://doi.org/10.3389/fgene.2015.00326
- Zhavoronkov, A., Buzdin, A. A., Garazha, A. V., Borisov, N. M., & Moskalev, A. A. (2014). Signaling pathway cloud regulation for in silico screening and ranking of the potential geroprotective drugs. *Frontiers in Genetics*, *5*. https://doi.org/10.3389/fgene.2014.00049

Appendix 1

Voting members:	Non-voting members in	Involved in drafting	Partners committed to
	an advisory capacity:	Federal Framework	Federal Framework
- Statutory health insurance: National Association of Statutory Health Insurance Funds (GKV- Spitzenverband) - The German Social Accident Insurance (DGUV) - Social Insurance for Agriculture, Forestry and Horticulture (SVLFG) - The German Federal Pension Insurance - Statutory long- term care insurance GKV- Spitzenverband - Statutory pension insurance			
	Prevention and Health Promotion		

Table: Stakeholders of Preventative Health Care Act and Federal Frameworks.

Appendix 2

Federal State	Date of Signing	Mentions of Old Age (Overall)/ Categories Number	Categories
Baden-Württemberg (Stuttgart)	19.10.2016	0/0	
Bayern (Munich)	26.06.2017	1/0	
Berlin (Berlin)	11.07.2018	0/0	
Brandenburg (Potsdam)	14.3.2017	1/0	
Bremen (Bremen)	7.12.2016	0/0	
Hamburg (Hamburg)	8.9.2016	2/4 Target group 1: persons after the acquisition phase in the municipalities Target Group 2: Residents of inpatient care institutions	Exercise habits Nutrition Stress Management Drug use
Hessen (Wiesbaden)	1.4.2016	1/0	
Mecklenburg-Vorpommern (Schwerin)	16.1.2017	0/0	
Niedersachsen (Hanover)	2016	1/0	
Nordrhein-Westfalen (Düsseldorf)	26.8.2016	1/0	
Rheinland-Pfalz (Mainz)	21.7.2016	0/0	
Saarland (Saarbrücken)	2.2.2017	1/0	
Sachsen (Dresden)	1.6.2016	1/7	Movement / Sport Fall prevention Nutrition Oral health in old age Addiction Psychosocial well-being
Sachsen-Anhalt (Magdeburg)	23.11.2016	0/0	
Schleswig-Holstein (Kiel)	2016	0/0	
Thüringen (Erfurt)	7.4.2016	1/0	

Table: Signing, Ageing and Categorization. Federal Frameworks (Kooperationsverbund, 2019).

Appendix 3

WHO key areas EU Region	Coding categories	WHO health promotion	Coding categories
Prevention of falls of the aged	Accessibility	Diet promotion	Diet (and related to diet coded within diet)
Public support for informal care giving with a focus on home care, including self-care;	Counseling	Tobacco, Alcohol, Drug Addiction Control	Addiction
Prevention of social isolation and social exclusion;	Work Inclusion	Health promotion physical activity	Physical Activity
Prevention of elder maltreatment;	Maltreatment Prevention	Mental Health	Depression Dementia
Urban mobility	Mobility	Sexual health	Sexual health
Basic needs met and socio-economic status.	Housing	Spec. population health	Migrant Health Women Health

Table: Coding units, based on WHO's definitions of key policy areas and WHO's public promotion (WHO, 2019a; WHO, 2019b).

 $[*]Working\ version\ for\ the\ purposes\ of\ the\ conference\ only-please\ do\ not\ distribute.$