Chapter 15 Research in Public Policies for Aging



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Abstract Evidence-based decision-making is an imperative for conducting effective policies, particularly in the case of aging. Systematic research can contribute to better decision making by clarifying concepts, allowing us to place an issue into a larger theoretical framework and by providing evidence on what works. It can help to assess the efficacy, efficiency and legitimacy of different policy alternatives. Finally, it can inform of the potential problems that could be faced and present evidence of the effectiveness of the adopted policies. This chapter offers a brief review of the contributions that researchers can make at different stages in the policy cycle.

Keywords Public policy · Evidence-based policies

15.1 Introduction

A public policy is not a single action of government in response to specific political circumstances or social demands of the moment. Public policy has been defined in several ways; for the purposes of this chapter we will use one of the most comprehensive definitions. Public policy is everything the government does, and the main objective is to match goals to facts, purposes and mandates that it receives from society through a process that brings together resources, laws, organizations/institutions and programs [1].

The process of satisfying the needs that are thought to be in public interest is complex. Each need must be clearly identified and recognized and, ideally, it should have a minimum level of social consensus to merit public action. There are aspects of social development in which there is general agreement in favor of public action, such as the provision of public services, education, health, and public safety, among

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others. New areas of development have been included more recently in governmental action, such as gender equality, promotion of a sustainable environment and, without a doubt, the aging population.

In today's societies there are increasing interests and needs to be attended to, and the most recent discussions include not only the list of needs to be addressed but mainly the priorities, as well as the forcefulness and immediacy in which they can and must be attended to.

What priority does attention to age and aging have in the actions of institutions? What economic, material and human resources are assigned to them and how should they be assigned? What are the costs and the benefits? Are the interventions defined by the evidence? How are these interventions evaluated?

All these questions reveal that public policy on a complex issue like the aging of the population requires two interrelated approaches: one political-normative approach that consists of understanding and attending to needs that are concordant with the legal framework, and one techno-scientific that implies collecting enough evidence to enable the government and its institutions to set priorities and act efficiently and effectively.

The development and implementation of evidence-based public policies is a challenge worldwide, since most government decisions are not based on enough evidence or scientific-technical knowledge does not become available fast enough for the policy designers to be efficient. Another factor in the policy cycle can also explain the gap between the politically defined needs to be addressed and the technologies and actions implemented to do so.

This chapter aims to show the importance of a close relationship between the policy sciences and the decision-makers in the field of age and aging. In particular, how can research contribute to better policies in this area and relevant contributions to different stages of the policy-making process? In Sect. 15.2, an overview of the policy-making process is offered, with attention to the usefulness of research in each stage. Section 15.3 discusses the challenges that have to be overcome in order to increase the use of research in decision-making.

15.2 The Process of Public Policies

Conventionally, policy-making has been looked at as a process, meaning a series of interconnected decisions that aims to solve or manage a public issue or problem. The most popular model is the policy cycle that depicts policy-making as a series of tasks, each one producing elements necessary to perform the next, resulting in a feedback loop [2]. There are several versions of this model, and in the following paragraphs, we explain each stage briefly.

15.2.1 Establishing Public and Government Agendas

An agenda is a set of issues or challenges that are considered to be important. The public agenda is shaped by the convergence or social agreement on the salience of an issue. The government agenda is made up of the issues included in the social agenda that public officials decide to act upon. This decision is influenced by the priorities of the political elite and the representatives of the people (i.e. members of Congress).

At present, the issues of age and aging of the population are on most public and government agendas both nationally and internationally. However, the understanding and level of attention given to the issues involved can vary widely among different stakeholders and the manifestation can also differ from country to country and even from region to region within a single country. For the international community, represented by the United Nations (UN) and the World Health Organization (WHO), the issue is mainly of interest because of its implications on health, social development and human rights. In recent years this interest has increased, not only due to the growth of the population 60 years of age or older, but also because of the conditions in which people are aging and the implications for family, society and governments.

The UN has shown interest in the issue of older adults since 1948 when the General Assembly approved Resolution 213 (III) relating to the project for the Declaration of Old Age Rights. Since then it has been approached indirectly by the General Assembly and by organisms interested in social issues [3]. It was not until 1977 when the problem was put forth directly with emphasis on the need to organize a world assembly on older adults, and in 1978 it was agreed that this conference would take place in 1982. The Second World Assembly on Ageing took place in 2002. These meetings have resulted in a large number of documents that propose different approaches to dealing with the issue. WHO has always been concerned with this issue, but after 2000 it began to promote specific studies such as the Study on Global Aging and Adult Health (SAGE). Another example of how the question has become more relevant is the fact that April 7th of 2012, World Health Day, was dedicated to the topic of aging and health.

There seems to be a growing consensus as to the importance of the issues of aging and adult health, seen from a wider perspective that involves the health sciences, but also aspects such as human rights, human development and equality.

15.2.2 Defining the Issue

If there is one crucial aspect in defining a public policy it is the definition of the problem itself. Techno-scientific evidence is of vital importance at this stage. In the case of aging, there seem to be sufficient technical and scientific reasons to argue the important of paying attention to this issue, as there seems to be a worldwide and

local consensus that the population is getting older and that this has implications in society. However, defining a public policy problem is not as simple as it may seem: an agreement is needed as to what the core characteristics are, age and aging itself, and what preventive or care alternatives are available in order to avoid situations such as frailty, sarcopenia, disability, dependency or the geriatric syndromes. What are the dimensions and causes? Who is affected and to what extent? And, how will this situation pan out if nothing is done about it? Does the government have the capacity to deal with these issues? There are many different answers to these questions, some which can be derived from evidence and others that require a political and ethical approach.

Usually, there is plenty of information on each of the aspects mentioned: statistical data, surveys, ethnographic studies, scientific studies, clinical trials, and more. One can safely assume that the more variables included in a particular issue, the more complicated it becomes to define or to prioritize an intervention. The mere existence of information does not guarantee that it will be used, as we will see later.

Once the problem or issue at hand is defined, we need to analyze what to do in order to improve the situation. Different ways of defining an issue will result in different approaches in dealing with it. That is why establishing an adequate definition of the problem is so crucial and to a great extent determines the result of the next stage in the policy cycle.

15.2.3 The Making or the Formulation of Public Policy

This stage refers to identifying options for solving the problem previously defined. The assessment of which alternatives are considered viable depends on such elements as social acceptance and pressure, available resources, institutional capabilities and even administrative traditions, among others [4]. The formulation of a policy requires the clear identification the following elements:

- The goals and priorities. A clear indication of the desired results of the policy is a crucial element. For example, it's not enough to say that the policy will improve the quality of life of older adults. It has to specify exactly what that means in all aspects to be covered, as well as which aspects will be dealt with first in accordance with the situation in each community, along with what parameters will be used to measure the improvement in the quality of life. For this, the review of good practices in different countries could be helpful.
- The existing alternatives. In order to achieve the goals stated, alternative packages of interventions must be identified and assessed. Research could contribute in a large extent to tackling this aspect. Being aware of similar policies and programs in national and international settings would make it possible to optimize costs and maximize benefits of an intervention, to avoid duplication, and to promote inter-institutional and multidisciplinary work. An example of this is the World Report on Ageing and Health and the Global Strategy and Action Plan on

Ageing and Health 2016–2020, both published by the WHO. Integrated strategies such as those suggested by WHO allow the organization of different interventions taking into account social and economic outcomes, both in terms of health and wellbeing of older people, along with enabling their on-going participation in society.

- The risks. All interventions may cause unwanted effects, meaning that they could generate situations that could be worse than the alternative of not doing anything at all. Programs could be designed without enough evidence and over time that their benefits are limited and that they even have adverse effects. One such case is the use of vitamin E, which in some places is recommended on a daily basis as an "anti-oxidant"; however, recently, meta-analysis shows that even though it could prevent cardiovascular illnesses and cancer, in high doses it could increase the risk of death [5].
- Alternatives that maximize results. Because of the need to optimize health care expenditures, being able to ensure that an intervention is viable and positive in terms of cost-effectiveness often becomes a decisive factor. In general, this type of study is carried out by both, medical and administrative personnel. Ideally, they do it together since this will allow for the overseeing of the optimization of resources per se, but also will also allow for achieving health objectives with more benefits than costs. For instance, healthy aging is the result of lifestyles throughout life. It is thus important to invest in promoting a healthy lifestyle and preventing illness during the course of life.

Ideally, the identification of these elements should be included in the research on age and aging.

Without evidence, the alternatives could be biased by the personal preferences of the decision-makers or be too inertial, just marginally different from past interventions, causing substantial contribution to be made. Even worse, the lack of research or omitting the use of existing research could lead to a worse situation for those affected by policy decisions.

15.2.4 The Decision or Choosing Among Options

There are three aspects to be taken into account here: technical viability, which generally considers economic resources, infrastructure and human capacities; political viability, which relates to the probability of cooperation among different actors (public, social and private), as well as leaders of opinion and the media; and social viability, meaning, it is necessary for communities to accept and adopt the policy and become active agents in moving forward with it.

In the case at hand, policies on population aging spread significantly around the world since the 1980s, with the celebration of the World Assembly on Ageing (Vienna 1982). Consensus was clear regarding the impact on development that the increase in the population aged 60 or 65 years and over would have. In this sense,

political viability was increased, and government and academia spoke in favor of the aging agenda, resulting in greater political viability. This was followed by an increase in the social acceptability of the issue, thanks to the emergence of a larger and strengthened set of non-governmental actions, increasing the social viability of aging policies.

The third aspect, referring to technical viability, has been harder to achieve, since the generation of specialized infrastructure and human capital compete for resources with other needs that are often considered as higher priorities or that are more profitable politically, such as public safety, gender equality, child protection or the sustainability agenda, to name a few examples.

In cases in which a minimum of political, social or technical viability is not achieved, the intervention should not necessarily be scrapped. It means only that the probability of it being carried fully forward in the long-term is reduced.

15.2.5 Implementation

Once a policy is decided on, we proceed to its execution. For many years this stage was not considered problematic, since there was an instrumental view of public sector organizations that would execute mandates without question or conflict. Bureaucracies exist to implement the orders of their political masters, and disciplinary procedures make sure of this. Since 1970, and as a result of uneven results delivered by well-intentioned policies, this assumption came into question. The implementation can also be a source of innovation and legitimacy of policies. On one hand, organizational capacities and politics can derail a well-designed policy (implementation failure). It could be that the policy itself was faulty (design failure), and public managers are forced to introduce changes in its operation to salvage it and improve its effectiveness and its acceptance by the community. The role of street-level bureaucrats and professionals is of special importance. They have direct contact with the target groups and their skills, political savvy and adaptive capacities can make things work or fail [6]. For example, social workers' decisions as to who is entitled to receive treatment could be optimal or produce errors, such as including people that do not have the intended profile (excess error) or excluding others that do (failure error) [7]. In general terms, it can be said that the implementation of public policy on population aging has been slow, mainly due to a lack of adequate and sufficient infrastructure. The slow development of human resources destined to the specific attention of the older adults, for example, and the scarce formation of geriatricians, have also been important obstacles. However, it is also important to point out that the way we view this issue has been transformed. While in the eighties there was talk of the population of 60 years, it was regarded as just a minority within the general population, while today the impacts of aging on several aspects of human development are recognized.

The implementation of public policy faces a double challenge. On one hand is the need to address the specific needs of older people, taking into account that it is a very diverse group. The needs of older people are different depending on whether they are 60, 70 or 80, if they live in the city or in a rural area, if they are male or female, if they have chronic diseases, etc. There are different approaches to dealing with the problems of an aging population, a population that will face a diverse set of challenges. Promotion, prevention and attention each require a different type of expertise, specialists and infrastructure. On the other hand, finding needed and sufficient evidence to support the aging population requires public policies with a transversal approach, similar to the gender approach, due to the impact it has in all areas of a country's development.

15.2.6 Evaluation

The evaluation of a public policy is, in general, a systematic process of collection and analysis of information for the purpose of showing the efficiency and effectiveness of interventions. Evaluations are a type of research and, therefore, require following technical and ethical standards that apply to research. The evaluation can be internal, that is, to assess the way the agency responsible for the policy is performing, or external, that is, to see if the interventions are generating public value. In the first case, the focus is on the adequate and cost-efficient use of resources (efficiency), as well as on determining the convergence between the objectives programmed *vis-a-vis* the results achieved (efficacy). In the second, the main interest is to identify and measure the effects produced by the intervention (effectiveness).

Evaluations could be classified according to who carries them out, their purpose, their content and the time they are applied. According to Osuna and Márquez [8], an evaluation could be performed by the same team that designs and implements the policy, by an external team, or by a mixed team of insiders and outsiders. Regardless of who performs the evaluation, the most important thing is to define the objective of the evaluation – whether it is for generating information or whether it is required for administrative control, to introduce reforms, to rationalize resources, or to document the lessons derived from the intervention.

It is desirable that evaluation be considered from the beginning of the designing of any intervention. Several aspects can be evaluated: from the design of the policy in order to have a reference of the expected results and the adequacy of the assumed theory of change, to the short-term results and long-term impacts or changes in society derived from the execution of the policy. The implementation and management processes can also be assessed. The evaluation of policy can take place at different moments, providing information on different aspects of the intervention. An evaluation performed after the intervention (ex-post) will produce information about its results and even impacts, given more time and an adequate operationalization of the expected changes in the situations of the individuals that experience a need or a problem. What impact is expected from a low salt diet? What impact would regular physical activity have on a person with diabetes? What would be the

results of promoting ballroom dancing among older adults? What would be the indicators and standards for measurement?

An intermediate evaluation or one that takes place during the course of an intervention is focused on gathering details on implementation and management in terms of cost-benefit. Lastly, an evaluation that is performed before the intervention enables us to learn the details of the design of the entire intervention to thereby allow us to identify the coherence between the selected means and the desired goals.

Although many public policies are well designed and implemented, they may not necessarily solve the problem posed, and could even have unwanted effects, or turn out to be excessively expensive and therefore unsustainable. Evaluation has gradually become more relevant to the public policy process. However, it is still most commonly considered only at the end of the period of intervention and implementation, mainly focusing on determining their impacts. The paradox is that, since no adequate methodologies have been established to allow for this sort of evaluation, it is impossible to determine *ex-post* the effects of the policy. It's rare for sufficient economic and human resources to be assigned and the results are not always used to change or even make a decision on whether to finalize the intervention.

There is no doubt that this is an area where scientific research could bring great added value to the process of public policy. Adequate and non-biased evaluation can provide important input for decision makers, providing arguments to defend good policies and increasing the level of legitimacy of public interventions [8].

In the case of the SAGE provides key information on demographic characteristics (age, sex, marital status and education), family arrangements and transfers, participation in the labor force and sources of income, and also, the state of physical and mental health of older adults. This can be used as a formative evaluation that can improve the implementation of public policies in the region. However, it is necessary to follow up on the application of this survey, constantly update information and incorporate different countries into the study. This would make it possible to have data not only for each of the countries, but also for the region, which in turn would allow for interconnection with other initiatives such as the Global Strategy and Action Plan on Ageing and Health 2016–2020.

15.3 The Role of Researchers in Decision Making

In the previous section, an overview of the policy cycle has been presented, with emphasis on the potential benefits of using research in each stage. In the following pages the usefulness of research will be further explored along with the reasons policy decisions find using research challenging.

In general, research can contribute by clarifying concepts and allowing to place an issue within a larger theoretical and evidence field. It also can provide tools for making estimations regarding the efficacy, efficiency and legitimacy of different alternatives. It can provide evidence on what has worked in the past in a given policy area. Finally, it can provide information on the potential problems that may have to

Needs of the decision-maker	Potential contributions of research
To define public problems	Definition of issues
	Determining causes and the components of the issue
	Determining who is affected by the issue
	Estimating the consequences of different alternatives
To formulate alternatives	Alternatives for tackling the problem
	Defining objectives and priorities
	Estimating risks, costs and benefits
	Estimating the monetary cost of interventions
To select an alternative	Estimating technical viability
	Estimating political viability (social research)
	Estimating social viability (social research)
Implementation/intervention	Actors who should be involved
	Means of ensuring the results
Evaluation of the intervention	Criteria for quantitative or qualitative evaluation
	Recommendations for improving or terminating an intervention

Table 15.1 Contributions of research to the policy process

be faced and present evidence on the effectiveness of the adopted policies. Table 15.1 summarizes these contributions.

From the previous review of contributions, it is easy to make a case for promoting a closer relationship between researchers from a wide array of disciplines and policy decision-makers. The development of policy sciences was the result of the discipline's founders who sought to create an alliance between science and government [9]. However, achieving this has proven challenging. In fact, it is more the exception than the rule. What are the reasons behind this? For Lindblom and Cohen the explanation is that social science is only one of many ways in which policymakers are informed, and sometimes it is not even the best [10]. Experience and intuition play a role that can be very important. Others blame the misunderstandings between the community of decision-makers and the researchers. Researchers generate information that is of limited relevance to the practitioners or make unrealistic suggestions that do not take into account the restrictions that the public-sector faces. This "two- communities" explanation rests on pointing out that academics and decision-makers live in separate realities, defined by divergent values, incentives and languages [10]. Others have considered this position simplistic: there is evidence of important networks that put practitioners and researchers in touch with each other along with the fact that a sector of public managers, even though not the majority, do make continuous use of scientific evidence [11].

Use requires two elements: that the information is understood and taken into account in the decision-making process and that this process would have been different in absence of such scientific data [12]. There is a wide array of forms for the use of the scientific information. In the case of the results found in evaluations, Landry, Amara y Lamaru [13] define the following steps in a ladder of utilization:

• <u>Transmission</u>: capacity to communicate data or knowledge;

- Cognition: the information is read and understood by the decision-maker;
- <u>Reference</u>: the information is quoted in documents such as reports, plans, programs, etc.
- Effort: there is an effort to adopt the conclusions derived from the information by decision-makers:
- <u>Influence</u>: the information influences the defined alternatives and the decisions made;
- Application: information leads to new uses or new data and knowledgegenerating projects.

There are some challenges or obstacles that make it difficult to make use of the evidence found on the higher steps of the ladder. Some are related to the research itself, the clarity of its language and the relevance of the guiding questions, methods and conclusions. Here, the credibility of the source of evidence is also an important aspect. If decision-makers cannot understand the evidence or the relevance of the work, it is improbable that they will use it. Other challenges have to do with to the degree in which decision-makers and other stakeholders are involved in the research process, considering their need for information and managing their expectations. Also, structures and dynamics of organizations can make it difficult to implement the recommendations derived from research even if there are individual practitioners that are convinced of their importance. Lack of resources or institutional capabilities is among the most important organizational barriers for the use of evidence. Finally, individual factors, such as cognitive bias, or competence in data analysis and attitudes towards evidence, can have a significant impact on the probability of evidence being used.

In order to bridge the gap between the supply of scientific evidence and the demand for and the use of the same evidence, we have several strategies or alternatives. Some of the most important are:

- Knowing and understanding the agendas of research and decision-making. The
 time needed for a research project to bear fruits can find itself in contrast with the
 immediacy of policy decision-making. Matching the agendas can facilitate decisions in which part of the public policy process will participate. Public officials
 can also promote and finance research relevant to improving their
 decision-making.
- The use of language. The researcher must consider using simple and accessible language that can be understood by key decision-makers. Professionalization and adequate professional development interventions can improve the capabilities of public sector managers to understand and use research.
- Creating more teams made up of researchers and decision-makers. The increased interaction between researchers and policy-makers can be beneficial for both sides, as they can develop rapport and a better understanding of each other's needs. An example is the initiative of the Nesta Operating Company, (http://www.nesta.org.uk/). This foundation for innovation is located in the United Kingdom, where its objective is to offer investment and subsidies to researchers whose knowledge they believe should be applied and to disseminate that

knowledge permanently thus making technology useful tool [14]. Another example is the creation of policy laboratories (policy labs) where government officials can establish partnerships with experienced researchers to analyze problems, review the effectiveness of present interventions and test new alternatives. The laboratories can also involve a wider set of actors from civilian society in order to crowdsource policy priorities and options and to establish collaborative networks for implementing and monitoring specific programs or projects. There are more than a hundred such initiatives all around the world.

Maintaining the independence of both the researcher and the decision-maker.
There is a need to make sure that researchers are given enough independence to
allow them to determine their methods and data-gathering and processing techniques. Ethical standards must be upheld in order to avoid real or perceived conflicts of interest.

Researchers have to be aware of the complexity of public policy. Most problems require more comprehensive and interdisciplinary approaches to be adequately understood. In this case, age and aging are no longer an issue that relates only to the 60-and-over age group. It has become a challenge for all areas of human development. Geriatrics not only includes the study of prevention, diagnosis, treatment and rehabilitation of illnesses related to age, but its goal goes beyond that and involves other disciplines meant to attend to the many social-sanitary aspects that affect the process of aging, illnesses, exposure to risks, long-term care, research, the training of specialists, and more.

Research and generation of knowledge is a public good in its own right. It produces social value when it is translated into better technologies or methods of diagnosing diseases that are increasingly complicated, when it leans toward the generation of models of prevention and replicable care and, no doubt, when it contributes to individuals having better knowledge about their health and how this improves the quality of their lifestyles. Stakeholders should therefore consider knowledge translation as an essential link in the generation not only of public policies but also of public value.

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