December 2020 

A review of policy changes to promote work participation in older workers

If you have questions about this report, please contact us at:

Institute for Work & Health  
400 University Avenue, Suite 1800  
Toronto, Ontario M5G 1S5

[info@iwh.on.ca](mailto:info@iwh.on.ca)  
[www.iwh.on.ca](http://www.iwh.on.ca)

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A review of policy changes to promote work participation in older workers

Authors: Ivan Steenstra, Emma Irvin, Kim Cullen, Dwayne Van Eerd

Date: December 2020

Acknowledgements: The authors would like to acknowledge Quenby Mahood and Joanna Liu for their support in conducting the search and retrieving the articles. In addition, they would like to acknowledge support for Basak Yanar for her translational service and Heather Johnson for her support in reviewing, quality assurance and creating the tables for the report.

This study was supported by funding from the Centre for Research on Work Disability Policy (Social Sciences and Humanities Research Council Award 895-2012-1017).

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# Introduction

Work disability policy will be affected by aging of the workforce (1). Between 2003 and 2013, the employment rate of Canadians 55 or over increased from 53% to 60.5% (2). The employment rate of Canadians between the ages of 65 to 69 increased from 14.8% to 24.4% (2). More than 4 million Canadians report disability with everyday activities and it is well-known that disability increases with age (3). The combination of these factors - Canada’s aging workforce and higher disability rates that accompany aging – underlines the importance of preserving the ability to participate in employment for aging workers.

## Rationale

Work disability policy makers, practitioners and workplaces will have to deal with an aging workforce. At present, more than two in five workers are aged 45 and older. More than half of Canadians responding to an Angus Reid survey about retirement said they did not leave their jobs at the time they expected, with 48 per cent saying they were forced to retire early because of factors beyond their control (4). This forced early retirement can often result in serious financial consequences and is indicative of a trend highlighting older workers being forced into unemployment or work disability schemes. Protection of older workers, especially those with a chronic disease or disability, will become more complex because of the increasing numbers of such cases. Targets for the prevention of work injuries that are set by policy makers (5) are likely complicated by an aging workforce that could be more prone to (serious) injury (6), co-morbidities (7) and more likely experiences longer duration of time on benefits once injured (8).

The Changing Workplaces Review (9) by the Ministry of Labour in Ontario states: "The baby boom generation that swelled the growth of the post-war labour market is now nearing or commencing retirement... Businesses today need to adapt to these changes to succeed." Therefore, there are multiple stakeholders, such as policy leaders, employers, insurance representatives, requesting insight as to what these changes for success may entail. Possible solutions for these changes may have been already integrated in other jurisdictions. However, the efficacy, context, and types of changes that surround policy and retirement are not well synthesized. A comprehensive review on the current knowledge of the effects from international policy changes could inform this process for Ontario.

There are a number of publications describing the increase in volume in aging workers. However, only a few scientific studies have examined the impact of policy changes on the work participation of an aging workforce. Following from a recent systematic review on work participation in older workers, we determined there was a need to better understand the scope of the literature on policy impacts on employment of older workers (10).

The objective of this paper was to summarize the available evidence from the scientific literature on the effects of policy changes aimed at improving employment participation in older workers.

## Methods

To meet this objective, we conducted a scoping review of the peer-reviewed literature. A scoping review aims to provide an overview of a broad field (11). As such, a scoping review may guide the direction of future research activity in a given area (11). This scoping review encompassed the extent, range, and nature of research activity that currently exists in relation to the impact of policy changes and older worker participation in the labour market.

Our review was conducted based on the framework for scoping reviews developed by Arksey and O'Malley (12) and modified by Colquhoun (11). These steps included: identifying the research question; identifying relevant studies; study selection; charting the data; collating, summarizing and reporting results (13). In conducting the review, we followed the principles of transparency and reproducibility (14). The methods for each step are described below in more detail:

**Stage 1: Identifying the research question**

The scoping review sought to answer the following research question: "What effect does policy have on the labor market participation of older workers?"

**Stage 2: Identifying relevant studies**

Search Strategy: To identify articles focused on the research question we conducted a literature search using the following multidisciplinary databases: Cochrane Central Register of Controlled Trials (CENTRAL), MEDLINE, EMBASE, Web of Science, PsycINFO, ABI Inform, Sociological Abstracts, Health and Safety Science Abstracts, and EconLit.

We developed the search strategy, in consultation with experienced library staff at the Institute for Work & Health (IWH) where this research was based. The search examined the peer-reviewed literature and did not limit by language sources or study design to ensure we retrieved a breadth of evidence with respect to the subject matter. Our search strategy used a modified P.I.C.O. structure (Population, Intervention, Comparison, and Outcome). In order to keep our search as comprehensive as possible we did not require a comparison group as part of our search strategy. The search strategy was customized for each database as controlled vocabularies differ significantly in the databases described above. Reference Manager(c) was used to store data from all searches and to remove duplicates.

**Stage 3: Study selection**

The review team met to develop a set of inclusion and exclusion criteria, a common iterative step in scoping reviews. Titles and abstracts of each article identified in the literature search were screened by at least two reviewers for relevance. Full text articles were retrieved for those studies that met the inclusion criteria, and for those with insufficient information present in the title, abstract, or keywords to determine relevance. Reviewer pairs were rotated to reduce bias. Discrepancies were resolved by reviewers initially and then with a third reviewer where consensus was not attained. Screening and data extraction were done using spreadsheets constructed by IWH using Microsoft Office Excel version 16.23.

**Stage 4: Charting the data**

Data were extracted from articles that met our relevance criteria for mapping purposes. Data was extracted according to the variables agreed upon by the review team. During the process of data extraction, the review team met to resolve issues related to locating the data in the text, establish the nature and type of the data, numerically chart the data, and develop themes emerging from the data. Data extraction was performed independently by two reviewers.

**Stage 5: Collating, summarizing and reporting results**

The results of the data charting stage were collated to numerically describe the breadth of the literature with regard to our research question. In addition, the thematic analysis was summarized and reported, both in the context of the nature of the existing literature, and to identify research gaps.

# Descriptive Results

## Literature Search

The search identified 3288 references once results from the different electronic databases were combined and duplicates removed (See Figure 1).

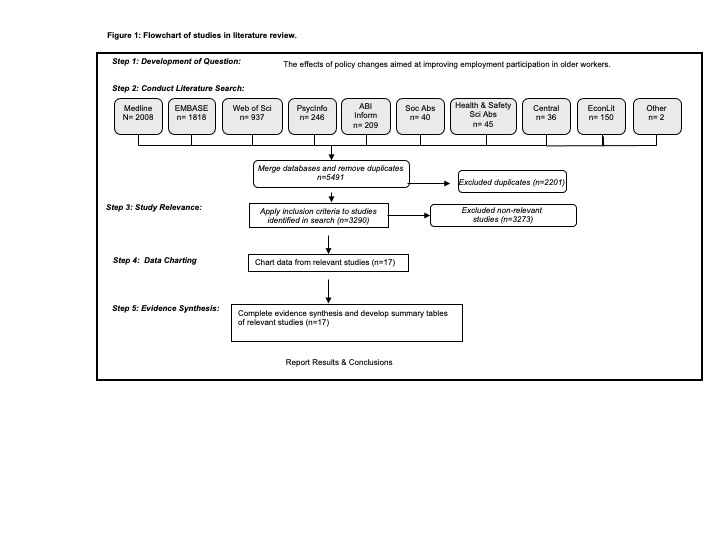


Figure 1: Flowchart of study identification, selection and synthesis

## Relevance Screen

Overall, 2201 titles and abstracts and 3273 full articles were excluded for not meeting relevance criteria. There were 17 unique studies identified that met the inclusion criteria.

## Data Extraction & Study Characteristics

The data collected in this review was retrieved from articles with varying research designs. Predominantly observational studies were analyzed using both quantitative and qualitative methods. Highlighted in Table 1 are the study designs from the included studies.

Table 1. Research designs and types of analyses employed by the studies included in the review.\*

|  |  |
| --- | --- |
| **Research Designs** | **Types of Analyses** |
| Narrative review | Descriptive |
| Grey literature review | Simulation |
| Population survey | Quantitative analysis administrative data |
| Policy analysis | Dynamic rational expectations model |
| Cross-sectional | Logistic regression |
| Prospective cohort | Difference-in-Differences |
|  | Discrete time life cycle |

\*Research design and analysis are independent of one another

As the literature review investigated international policies, a range of jurisdictions were represented in the final analysis. Figure 2 displays a geographic representation of the articles’ origins. The vast majority of studies were conducted in Scandinavian and East-Asian countries. A chart of the year of publication highlights that most studies were conducted in 2016 (Figure 2).

****

Figure 2. Jurisdiction of studies included in this review and year of publication.

Policies analyzed in the varying studies, were not homogenous in timeline. The implementation of policies ranged from 2002 through 2014, within a variety of jurisdictions. Figure 3 displays an illustration of the timeline of policy implementation, recognizing that some studies analyzed multiple jurisdictions while others focused in on specific country policies.

****

Figure 3: Timeline timing of policy implementation with example research studies from the review.

# Thematic Results

## What is known about policy changes to promote work participation in older workers?

Bauknecht and Cebulla (15) published a paper “Extending Working Lives–Sticks and Carrots to Get the Older Unemployed Back into Employment”. “Sticks and carrots” were used by Bauknecht and Cebulla (15) to describe the interventions retrieved in the grey literature in terms of punishment versus reward to elicit change. The results of our scoping review parallel the grey literature findings of Bauknecht and Cebulla (15) and found similar results in the peer reviewed literature. We used the “sticks” and “carrots” dichotomy to classify the policy changes (and their effects) described in the literature identified within this review. “Policy change” is made up of a wide variety of interventions implemented at once or shortly after each other, which makes it hard if not impossible to disentangle the separate effects of each change. Many authors describe outcomes in terms of labor force participation of older workers, not just the number of workers receiving a retirement benefit; some extend their analysis to negative side effects, such as negative employment effects for younger workers, although in some cases the observation of these side effects does not seem to be based on collected data but are only addressed in the discussion sections of papers. Therefore, the sticks and carrots description will not disentangle the complex effects in policy change but instead provide a conceptual description of findings that were penalizing or reward-oriented. The results section is presented by Section 1: Sticks, and Section 2: Carrots. Please refer to the appendix for a complete charting of the study data.

## Description of effects: Sticks

A number of the studies demonstrated common themes regarding the policy changes of increasing the age of eligibility of retirement, and the effect of social insurance programs. Many of the adjustments based upon these policy changes were considered as sticks. Quotations retrieved from the analyzed literature are displayed in Table 2 to highlight the stick concept of these policy changes in a variety of contexts. Two main themes emerged from the studies reviewed.

* 1. **Increasing the age of eligibility for retirement**

Many of the studies identified in this scoping review examined the impact an increase in the age of retirement eligibility had on employment(16-18). While some studies concluded that this policy measure had a positive impact on labor force participation of older workers. However, many also reported negative side effects of these measures, especially in populations that can be considered as ‘vulnerable’ (see Table 2). Overall, the studies indicate that changes in policy related to age of retirement resulting in increased use of alternative policies (sick leave, UI), or increased the burden of other (e.g., younger) workers. Some studies showed that policy changes were not effective in increasing participation of older workers in the labour market.

* 1. **Effect of social insurance programs**

Laun & Wallenius (16) concluded that a generous work disability system in fact results in a de facto early retirement. This “early retirement” could however have serious financial consequences after reaching the official age of retirement, since pension build up ends or at least decreases once a worker is on a work disability pension (16). Sanchez-Martin and colleagues (17) conclude something similar, where they observe an increase in labour supply and sizable cuts in pension cuts, but at the expense of unemployed workers. Their proposed solution was to penalize the minimum pension age of older workers. Voluntary retirement at a younger age is often the privilege of higher income earners.

In Japan, Usui et al. (18) found that employment status (i.e., those who had salaried jobs vs those who were self-employed) was a contributing factor to the uptake of pension benefits and reported status of under and over employment. Specifically, those who had a salaried job at age 54 tended to reduce their working hours once they began receiving pension benefits and tended to report being underemployed. Whereas men who were self-employed at age 54 tended to report overemployment after they began to receive pension benefits. This finding suggests that salaried men may not have voluntarily adjusted their working hours downward, which presumably reflects their limited job opportunities after the age of 60. The authors suggest that this dynamic is a result of insufficient pension benefits for those who were self-employed throughout their work lives, given that these individuals are eligible only for the flat-rate portion of the pension they may, therefore, be required to supplement their pension. However, they report that, few employment opportunities exist after the mandatory retirement age of the early 60s for those who had salaried jobs in their 50s. The authors recommend policy measures to provide people who were employed in their 50s with more work opportunities — specifically, allowing them to work on a full-time basis, as well as offering more flexible work — would better utilize their potential work capacity.

Table 2. Sticks of policy changes: select quotations from the retrieved studies

|  |  |  |  |
| --- | --- | --- | --- |
| Theme | Comment | Location | Source |
| **Increasing the eligibility age for retirement** | *“We investigated whether older Italian employed women reacted to the postponement of retirement by increasing their sick leave. The empirical analysis offers unequivocal evidence that this has indeed been the case, in particular, for low-income grandmothers living in regions with a poor supply of childcare services.”* | Italy | (Coda Moscarola et al. 2016) (19) |
| *“Turkish Statistical Institute data shows that after the increase in age for retirement benefits the unemployment rates for the age group of 40 and over is increasing.”* | Turkey | (Öğütoğulları & Kılıç 2016) (20) |
| *“A delay in retirement leads to increase in unemployment; these two policies are complementary systems. So reaching the goal of extending retirement creates a false sense of achievement, since it does not necessarily increase labour force participation in older workers.”* | Austria | (Inderbitzin, 2016) (21) |
| *“The results of the evaluation of the Belgian Intergenerational Solidarity Pact (ISP) suggest a slight positive impact of the ISP on the employment rate of older workers but to the detriment of the younger workers. However, there is a lack of statistical power.”* | Belgium | (Dejemeppe et al. 2015) (22) |
| *“Contrary to the expectations of the Finnish pension reform aimed at extending working lives, offering choice with respect to the timing of retirement may actually encourage healthy workers to choose earlier retirement regardless of the provided economic incentives for continuing in work.”* | Finland | (Leinonen et al, 2016)  (23) |
| *“The expansion of the social pension for the elderly from a targeted to a universal program starting in 2009 has little impact on the overall labor force participation of older persons, but is associated with a decrease in labor force participation by 6 to 7 percent among elderly from low-income households in areas outside the Bangkok metropolis.”* | Thailand | (Paweenawat & Vechbanyongratana, 2015) (24) |
| *“In Finland, changes in the eligibility age thresholds for unemployment and part-time pensions, and the effect of tightening medical criteria for disability pension eligibility jointly raised the average age at which workers leave employment by 3.9 months, mainly due to a sharp drop in disability pension enrolment from age 58 upwards and a lower incidence of unemployment at younger ages.”* | Finland | (Kyyra, 2015) (25) |
| **Effect of social insurance programs** | *“unlike US men, Japanese men are not choosing the optimal pensionable age and labour hours to maximize their intertemporal utility.”* | Japan | (Usui, 2016) (18) |
| *“Finland raised the eligibility for a so-called unemployment pension from 57 to 59 in 2005. This measure seemed to decrease long-term un-employment in the 55-59 bracket, but unemployment rose in the 60-64 age bracket. They do note that at the same time it was harder to get a “de facto retirement” through disability benefits because of stricter medical screening of disability and work incapacity.”* | Finland | (Bauknecht & Cebulla, 2016) (15) |
| *“Germany (Hartz reforms in 2005) decided to change unemployment benefit levels from 60-67% of previous earnings and 53-57% with support from social assistance when that led to an income at a subsistence level after about 2 years, to a policy where after two years a flat rate means tested unemployment benefit plus housing allowance. These measures seem to reduce long run unemployment rates by 1.4%.”* | Germany | (Boockmann, 2015) (26) |
| *“In 2006, Germany raised the duration of earnings-related unemployment benefits, paid out in the first two years of unemployment. This resulted in reduced unemployment especially in the 57-64 age bracket. However, this measure was reversed for some age groups in 2008.”* |  | (Dlugosz, Stephan, & Wilke, 2010) (27) |
| *“Not only did the changes in level and duration on benefits necessitate the need to find a job, many countries specifically increased the minimum age to look for a job. The Netherlands increased the age to 57.5 in 2004 (for both unemployment benefits as for work disability benefits). This measure raised job finding rates weakly. Germany raised the age to look for a job to 57 years or older in 2007.”* |  | (Bauknecht & Cebulla, 2016) (15) |

## Description of effects: Carrots

The policy changes that reflected a reward or incentive were characterized as “carrots”. The “carrots” were broken down into three main categories of changes at both workplace and insurance level. Highlighted in Table 3 are three themes related to carrots and quotations from the supporting literature.

* 1. **Work Accommodation**

Workplace accommodations can reduce the rate of early retirement among older workers. Accommodations may be particularly attractive and effective for workers with health conditions or disabilities.

* 1. **Incentive Payments (for employees or employers)**

Incentive payments for either employees or employers appear to have the desired effect in helping to maintain older workers in the labour market. However, the impacts of incentives appear to differ by jurisdiction. Financial incentives may help those in the low wage economy retain working status.

* 1. **Retiree Health Insurance**

Having an employer sponsored retiree health insurance program in place leads to more early retirement among older workers (28). Shoven (28) also points out that non-monetary benefits can influence workers decisions about joining the labour market not just leaving it. They further argue that the health insurance benefit is costly.

Table 3. Carrots of policy changes: select quotations from the retrieved studies

|  |  |  |  |
| --- | --- | --- | --- |
| Theme | Comment | Location | Source |
| **Work Accommodation** | *“As part of legislation on duty to accommodate: employer accommodation rates could be increased, disabled workers would be significantly more likely to delay labor force exit for up to two years”* |  | (Hill et al 2016) (29) |
| *“Interventions to facilitate work among employees with health problems or reduced work capacity have reduced disability rates among employees aged 50-61. This suggests that companies’ preventive interventions are an effective means to retain older workers with deteriorating health.”* | Norway | (Hermansen, 2014) (30) |
| *An analysis of a Norwegian policy change shows that offering additional leave as a retention measure reduces the individual relative risk of withdrawing a contractual pension (AFP) in the next two years of employment among older workers between the age of 61 and 62 years. Additional leave is of course a work accommodation by offering hours of days off when needed.* | Norway | (Hermansen, 2014) (30) |
| **Incentive Payments (for Employees or Employers)** | *Wage supplements and bonuses have been paid in the UK and Germany. In the UK a tax-free wage supplement was paid to low income earners; this measure however was only active between 1999 and 2000. Germany pays an integration bonus for up to 24 months and up to 50% of the standard benefit. Job centers can pay this bonus at their discretion on the basis of the claimant’s need.* | Germany | (Bauknecht & Cebulla, 2016) (15) |
| *Italy, Poland, Latvia and Germany provide subsidies to hire older worker. Italy reduced social security contribution for older workers to 50%, but conditions applied. Poland have similar arrangements and are only required to provide sickness coverage for 14 instead of 33 days. The Latvian initiative was not specifically for older workers but was widely used by this group and this group in the end transitioned to permanent employment.* | Multiple | (Bauknecht & Cebulla, 2016) (15) |
| **Retiree Health Insurance** | *“We find that retiree health coverage raises the probability of stopping full time work by 4.3 percentage points (around 38 percent) over two years among public sector workers aged 55–59, and by 6.7 percentage points (around 26 percent) over two years among public sector workers aged 60–64. In the younger age group, retiree health insurance mostly seems to facilitate transitions to part-time work rather than full retirement. However, in the older age group, it increases the probability of stopping work entirely by 4.3 percentage points (around 22 percent).”* | USA | (Shoven, 2014) (28) |

# Discussion

From our scoping review of the literature, we conclude that many of the policies that are considered “sticks” (negative consequences) have small to marginal effects on labour force participation of older workers, while suffering from major side effects such as an increase in unemployment in younger workers and an increase in sick leave by older workers. Policies that are considered “carrots” (positive, reward oriented), like workplace accommodations, seem to be more successful and less prone to serious side effects for the older workers. However, the “stick approaches” (e.g., changing the age of retirement) tend to be applicable to every worker; whereas accommodation might easier or only be possible in a certain segment of workers, for instance those that are not engaged in strenuous, physical jobs. It seems that there is a place for “stick” approaches, but side effects could be mitigated by providing additional support, for instance by providing counselling for possible mental health consequences in older job seekers.

Some potential negative side effects of some of the “carrot” approaches may impact younger co-workers and their workforce participation. Some older workers may decide not to retire until well into their seventies while having their jobs accommodated and continuing to receive the same salaries and benefits. As a result, fewer opportunities may be available for the younger cohort entering the same labour forces. Moreover, older age is often positively associated with chronic disease (31), and as a result, health insurance benefits might be the main incentive for these workers to remain in the labour force. A potential solution may be offering independent health insurance after retirement at a certain age. This non work-related insurance could act as incentive to truly enjoy retirement without anxiety about costs of healthcare (2). Some workplaces also offer workshops for older workers to prepare them for retirement because some might have some anxiety about retirement. In turn, this may stimulate opportunity for young workers participation in the labour force.

Employment and Development Canada has written an online report on initiatives in Canada to promote labor force participation of older Canadians (32). This report does not contain an analysis of possible effectiveness of interventions in Canada. Canadian provincial governments have implemented a smorgasbord of interventions, similar to the European initiatives (17, 33) . The Employment and Development Canada report was not searchable through the sources we used and therefore was not included in the main review, we decided to mention the report in the discussion since these are Canadian initiatives.

The study by Bauknecht & Cebulla (15) showed some evidence of effectiveness for some programs, but those effects can be small to negligible and even well intended programs can have unintended adverse consequences. The authors recommend close monitoring if reform impacts to improve effects on labor force participation in older workers and to eliminate non effective measures and those with other negative consequences. Such a study on recent policy changes in Canada could be easily done using existing Canadian databases. Jurisdictions should measure the impact of the reforms on older worker participation and any unintended negative consequences and publish the findings as a learning opportunity for others. It might even be that this type of monitoring is ongoing yet but not yet published.

Manger (34) describes the phenomenon that stigma of unemployment becomes stronger with increasing age and reduces the hiring opportunities of older workers (34). Any policy related to the promotion of labour force participation in older workers will have to address this stigma in order to be successful. One approach to circumvent this issue, is to teach older, unemployed workers to apply for positions while not disclosing any information that could point at their age. A modified resume or CV would be needed to obscure a longer employment history while focusing on more recent experiences and qualifications.

Some of the papers we retrieved met all of our inclusion criteria, however they did not report on longitudinal outcomes. One of these papers reported on an intervention called job crafting (33). The authors distinguish between two types of job crafting: 1. promotion-focused job crafting where employees redesign their jobs to create behaviors that increase structural (like job autonomy) and social (like asking for social support) job resources and challenge job demands (like volunteering for challenging projects). 2. Prevention-focused job crafting where employees redesign their jobs to decrease job demands (like reducing contact to demanding customers). The aim of these redesign strategies was to increase a sense of coherence at work, and through a decrease in burnout improve the motivation to continue working after retirement age.

Job crafting seems similar to I-deals arrangements (35). I-deals are most useful in retaining older workers. The main challenge for enabling autonomy at work is likely related to workplace policies which are usually designed to cover all workers; the I-deal approach could be potentially useful for retaining older workers in the workforce.

# Conclusion

“Policy change” is made up of a wide variety of interventions implemented at once or shortly after each other by governments, which makes it hard if not impossible to disentangle the separate effects of each change. Even if this would have been possible, not all policy is implemented, or ended based on the results from rigorous evaluation or the best available evidence (36) but rather on political or ideological grounds and a “need to act” basis.

It is encouraging to find that many authors describe outcomes in terms of labor force participation of older workers, not just on the number of retirement benefits. Some researchers extend their analysis to negative side effects although in some cases the observation of these side effects does not seem to be based on collected data but more on experienced sentiments. We found clear directions for evaluation of Canadian policy changed aimed at increasing the labor force participation of older workers. All initiatives described in the OECD report can be evaluated using available Canadian databases at Statistics Canada. We also think it would be worthwhile to replicate the natural experiment described by Flavia Coda Moscarola et al. (19) on the effect of the availability of (affordable) childcare on the labor force participation of older women by comparing labor force data from Quebec with other Canadian provinces.

Summary characteristics of included studies

| **Author (First)** | **Location** | **Design** | **Pop.** | **Aims** | **Policy Year** | **Results** |
| --- | --- | --- | --- | --- | --- | --- |
| Bauknecht (2016) (15) | Europe | Narrative review | 50+ | This study presented snapshots of policy interventions (designed to encourage the re-employment of older unemployed people. encourage the re-employment of older unemployed people) implemented across Europe. | 2007 | This paper gave a brief summary of European state initiatives designed or tested to facilitate the return to work of older jobseekers and older inactive people of working age. The summary has necessarily been selective and, hence, non-representative, focusing on a few countries and on three pillars of policy: benefit reforms and welfare activation, active labour market policies, and wage subsidies. In some but not all instances, we have been able to introduce some evaluative evidence, which hinted at possible positive impacts of reported interventions.  Benefit reforms Welfare activation Active labour market policies Wage subsidies  “Bridge to pension policies: Finland: highly attractive for older worker, Germany: shortened the duration of the earnings related UB-I and prevented the future use of UB-II to bridge the time post-work and prior to retirement: shorter durations of earnings-related benefits reduced unemployment, especially for the oldest group (57-64). The Netherlands: reduced the maximum duration of earnings-related unemployment benefits from 60 months to 38 months in 2006: Early empirical evidence suggests that the reforms increased the probability of finding a job, especially as claimants approached the point to entitlement exhaustion. However, the size of the effect was small, as were the estimated net welfare benefits to the state.  Job search requirements: In the Netherlands, job search requirements were increased for workers aged over 57.5 years in 2004.24 This policy change has been credited with raising the job finding rates among older workers, albeit only weakly.25  Further evidence suggests that the probability of finding a job within the first 24 months of unemployment had been raised by six percentage points for men and 11 percentage points for women Researchers found that “stricter search requirements strongly increase the number of individuals that find a job after a maximum of 2 years in unemployment”. Search requirements for those employed and turning 57.5 years of age increased exit to employment by about six percentage points and into disability by three percentage points. At the same time, exits to employment rose from 19.1% to 30.2% without any concurrent effects on early retirement exit. Germany in 2007. Evidence of impact has been mixed. Jobseekers reducing reservation wages as a result of the reforms. Adverse effects on the mental health of older jobseekers.” |
| Boockmann (2015) (26) | Germany | Quantitative analysis Admin. data | 50+ | To examine the effects of wage subsidies for older workers. | 2002 | “To achieve the policy goal of increasing employment among older workers, policymakers need to consider other options. Where subsidies are meant to counteract incentives for early retirement, the focus should be on removing such incentives and increasing the employability of older workers instead of subsidizing wages. Limiting the incentives for early retirement is particularly important, as is shown by the analyses of subsidies in Belgium and Finland: these programs were effective only in preventing transitions into early retirement, a possibility that was created by policy incentives for early retirement in the first place.”  PROS: Subsidizing work rather than unemployment may be an effective market-based policy; Wage subsidies compensate for any pay–productivity gap among older workers and may increase their employability.; Wage subsidies appear to be more effective than creating public sector jobs.  CONS: The effects of the policy on employment are severely reduced by deadweight, displacement, and substitution effects.; Only large and properly targeted subsidies can be expected to have substantial effects, limiting their cost-effectiveness. If subsidies are given on a case-by-case basis, the policy may induce discrimination and stigma effects. Abolishing early retirement incentives and increasing older workers’ employability may be more effective than wage subsidies. |
| Coda Moscarola  (2016) (19) | Italy | Simulation  Admin. data | Italian women nearing retirement age | To investigate whether older Italian employed women reacted to the postponement of retirement by increasing their sick leave. | 2014 | “The empirical analysis offers unequivocal evidence that women reacted to the postponement of retirement by increasing their sick leave, in particular, for low-income grandmothers living in regions with a poor supply of childcare services. Radical reforms risk losing some of their effectiveness if they are not accompanied by parallel measures designed to introduce the welfare provisions previously indirectly and inadequately provided by the pension system, such as care facilities. The pension reform in 2014: introduced sharp restrictions to early retirement provisions (such as pure seniority pensions, formerly awarded almost irrespective of age) and more stringent age and seniority requirements for normal (old age) retirement. These restrictions affected women more than men.” |
| Dejemeppe (2015) (22) | Belgium | Quantitative analysis using admin data | 50-59 | To evaluate the overall effectiveness of the ISP in raising the employment rate of older workers. To that purpose, we compare the actual evolution of the employment rate after the implementation of the policies to its predicted (counterfactual) evolution based on the estimation of a macro-econometric model in a period prior to the ISP | 2005 | “The results show that if there is a positive impact of the ISP, it is too small to be statistically significant. For men aged 50–59, the impact is only 0.52 (s.e. 0.31) of a percentage point, rising the employment rate from 35.7% to 36.2%, while for women aged 50–59, the impact is 0.26 (s.e. 0.18) of a percentage point, increasing the employment rate from 23.9% to 24.2%. Moreover, the results suggest a small negative effect on the employment rate of younger workers. For men aged 35–44 years old, the impact is -0.63 (s.e. 0.36) of a percentage point, decreasing the employment rate from 54.7% to 54.0%. For younger women, the impact is -0.10 (s.e. 0.34) percentage point. Even if the effects are larger in absolute value for men than for women, we cannot reject that both effects are the same and not significantly different from zero. In sum, the results suggest a slight positive impact of the ISP on the employment rate of older workers at the expense of younger workers. However, there seems to be a lack of statistical power to draw firm conclusions.” |
| Dlugosz  (2010) (27) | Germany | Quantitative analysis using admin data | Working age adults | Our paper analyzes for the first time the extent of the consequences of the scheme. The reform affected only older age groups and is thus a natural quasi-experiment. We identify the reform effects using a difference-in-differences approach, based on large high-quality administrative data. Because the reform shortened entitlement lengths of workers of age 45 and older, we compare unemployment incidence rates of older workers to those of a control group of workers aged 40 to 44. We distinguish between different age groups of older workers, because the treatment intensity (the cut in benefit lengths, respectively) varied between age groups. We also estimate the extent of the fiscal effects for the German unemployment insurance fund. | 2006 | “Investigating a major labor market reform within the European regulated labor market setting, our paper finds large anticipation effects of a reform, which nearly halved unemployment benefit entitlement lengths for older workers…. First, we show that this highly disputed element of the Hartzreforms, coming into effect in 2006, induced a rush of workers and aims to take advantage of the previous legislation in its last days. Second, we find a considerable decline in unemployment incidence among older workers after the reform. Third, we estimate that the policy change could have saved the German unemployment insurance fund about 15% of its annual expenses; it was, however, partly repealed as soon as 2008.” |
| Hermansen (2014) (30) | Norway | Difference-in-difference analysis | 62-66 | The aim of this article is to examine whether offering additional leave impacts the relative risk of withdrawal of a contractual pension. | 2011 | “An overall average increase in the relative risk of a 61- or 62-year-old worker retiring on the contractual pension between 2001 and 2010; however, among older workers employed in companies offering additional leave there has been a decrease in the relative risk. The effect of additional leave is evident both before and after controlling for the selected individual and company characteristics. Thus, the analysis shows that offering additional leave as a retention measure reduces the individual relative risk of withdrawing a contractual pension (AFP) in the next two years of employment among older workers between the age of 61 and 62 years.” |
| Hill (2016) (29) | USA | Time series | Individuals 51 years and older | In this paper we offer new evidence about workplace accommodation, specifically the factors that determine whether newly disabled workers receive accommodation from their employers, as well as the short- and long-term effects of employer accommodation on employment and SSDI claiming behavior. | 2006-2010 | “We find that only a quarter of newly disabled older workers in their 50s are accommodated by their employers in some way following onset of a disability. Importantly, we find that few employer characteristics explain which workers are accommodated; rather, employee characteristics, particularly the presence of personality traits correlated with assertiveness and open communication, are highly predictive of accommodation.”  “If employer accommodation rates could be increased, disabled workers would be significantly more likely to delay labor force exit for up to two years. However, accommodation does not appear to reduce subsequent disability insurance claiming.” |
| Inderbitzin (2016) (21) | Austria | Policy analysis | 50+ | To study impact of extending UI benefits on employment and retirement behaviour | -- | “A delay in retirement leads to increase in unemployment; these two policies are complementary systems. So reaching the goal of extending retirement creates a false sense of achievement, since it does not necessarily increase labour force participation in older workers” |
| Kyyra (2015) (25) | Finland | Overview | -- | This study provides a comprehensive evaluation of the effects of reforms that altered the eligibility age thresholds of two early retirement schemes and tightened the medical criteria for disability pension benefits. | -- | “These pension reforms jointly raised the average age at which workers leave employment by 3.9 months, mainly due to a sharp drop in disability pension enrolment from age 58 upwards and a lower incidence of unemployment at younger ages. These effects are heterogeneous, much of which is attributable to the spillover effects that vary across individuals.” |
| Laun (2016) (16) | Sweden | Discrete time life cycle model | 55-69 | To study the role of old-age pensions, disability insurance and healthcare in accounting for the differing labor supply patterns of older individuals across countries | -- | “Our result regarding the over- prediction of disability insurance incidence in some European countries is similar in spirit to that of Ljungqvist and Sargent (2006), who find it hard to reconcile generous unemployment insurance benefits with the observed employment rates in Europe. We find that the incentives faced by older workers differ hugely across countries. In fact, based solely on differences in social insurance programs, the model predicts even more cross-country variation in the employment rates of people aged 55–69 than we observe in the data.  Individuals differ with respect to educational attainment, health insurance coverage and their preference for leisure. Individuals choose when to stop working and when/if to apply for disability and old-age pension benefits. The granting of disability insurance benefits is correlated with health, but the screening process is imperfect. In equilibrium, some people who are granted benefits are in fact healthy, while some of the people denied benefits are truly disabled. Individuals care about their health and can partially insure against health shocks by investing in health. Health expenditures are dependent on health insurance coverage.” |
| Leinonen (2016) (23) | Finland | Quantitative  admin data | -- | To assess how the Finnish statutory pension age reform introduced in 2005 influenced the role of health as a predictor of retirement. | 2005 | “Contrary to the expectations of the Finnish pension reform aimed at extending working lives, offering choice with respect to the timing of retirement may actually encourage healthy workers to choose earlier retirement regardless of the provided economic incentives for continuing in work. Retirement at age 63-64 was more likely among the post- than the pre-reform group (OR 1.50; 95% CI 1.43-1.57). This reform-related increase in retirement was more pronounced among those without a history of psychotropic medication or hospitalizations due to circulatory and musculoskeletal diseases, as well as among those with below median level medication use. As a result, poor health became a weaker predictor of retirement after the reform.” |
| Öğütoğulları & Kılıç (2016) (20) | Turkey | Policy analysis | 40+ | To study the impact of the gradual increase of the retirement age on labour market participation and unemployment rates of 40+ workers. | 2002 | Turkish labour market faces significant problems such as high unemployment, low labor force participation in women, chronic and high unemployment levels, and workforce with low education levels. While Turkish economy is challenged by these structural problems, with the gradual increase of the retirement age, the low labor force participation and employment rates of the 40-65 workers has become an important challenge.  (Law introduced in 1999, effective in 200 & 2008)  Although, after the reform (the gradual increase of the retirement age), the labour market participation rates of 40+ workforce has been increasing, the employment rates of this group has been historically much lower than it should be (due to early retirement age before 2002).  40+ workers face significant challenges in the labour market as they face age discrimination, increased risk of dismissal, experience prolonged unemployment periods, and are more likely to settle in lower paid and temporary jobs.  On the other hand, the gradual increase in the retirement age can be a great opportunity to develop new policies. The broadening scope and diversity of the active labor force policies and unemployment insurance with a strong funding structure, can provide significant advantages in implementing new strategies for employment of older workers. |
| Paweenawat (2015) (24) | Thailand | Cross sectional | ages of 61 and 75 at the time of the surveys in the years 2007, 2009 and 2011 | This paper assesses the impact of the 2009 implementation of a universal Monthly Allowance for Older Persons on the labor force participation of older workers in Thailand. | 2009 | “The expansion of the social pension for the elderly from a targeted to a universal program starting in 2009 has little impact on the overall labor force participation of older persons, but is associated with a decrease in labor force participation by 6 to 7 percent among elderly from low-income households in areas outside the Bangkok metropolis.” |
| Raab (2014) (37) | Ireland | Simulation study | Retirement Age | The overall aim of the research is to compare equally salaried workers facing retirement incentives across country-typical retirement pathways. A simulation of net present values of the incentives is undertaken, adopting the method in Gruber and Wise (1999), followed by an analysis to determine whether observed retirement corresponds to the age patterns of these incentives.  The purpose of the paper is to identify the magnitude of retirement incentives for Ireland. | -- | Comparison of different policies/pathways for retirement Scenario 1: Social Welfare and State Pension only Scenario 2: Public sector occupational pension and State Pension Scenario 3: Private sector “integrated” occupational pension and State Pension Three country-typical pathways into retirement were examined and it was found that none of them is neutral with respect to labor supply behavior. All of these pathways provide rational reasons for early retirement which corresponds to the empirical evidence. Interestingly, the pathway with the largest institutional constraints on early retirement (S1) results in the highest propensity of early labor force exit. Overall, Irish workers face considerable losses when postponing retirement, and the dynamic patterns of these losses (accrual effects) largely correspond to observed behavior. Even though there are significant differentials in retirement wealth at equal ages, workers do not seem to respond to those wealth effects to a similar extent. Wealth effects only seem to play a role for people covered by company pensions (S2 and S3). Thus, dynamic labor supply incentives matter and seem to be a crucial factor driving retirement behavior. |
| Sánchez-Martin  (2014) (17) | Spain | Dynamic rational expectations model | 50+ | To explore the links between pension reform, early retirement, and the use of unemployment as an alternative pathway to retirement. | 2011 | “We find that this reform generates large increases in labour supply and sizable cuts in pension costs, but these are achieved at the expense of very large welfare losses, especially among unemployed workers.” |
| Shoven (2014) (28) | USA | Logistic regression of panel data | Mean 59; range 55-64 | To study the impact of retiree health coverage on the labor supply of public sector workers between the ages of 55 and 64. | -- | “In the younger age group, retiree health insurance mostly seems to facilitate transitions to part-time work rather than full retirement. However, in the older age group, it increases the probability of stopping work entirely by 4.3 percentage points (around 22 percent). We find that retiree health coverage raises the probability of stopping full time work by 4.3 percentage points (around 38 percent) over two years among public sector workers aged 55–59, and by 6.7 percentage points (around 26 percent) over two years among public sector workers aged 60–64.” |
| Usui (2016) (18) | Japan | Prospective cohort | Men aged 60-74 | To investigate how Japanese men aged 60–74 adjust their workforce attachment after beginning to receive a public pension. | -- | “Men who were employees at 54 gradually move to part-time work or retire after beginning to receive pension benefits; those who continue working tend to be underemployed. Men self-employed at 54, however, neither reduce their working hours nor retire, tending to be overemployed. In contrast, US men retire or become part-timers when they first claim social security; those who continue working are unlikely to be either overemployed or underemployed.” |

References

1. Hemp P. Presenteeism: at work-but out of it. Harv Bus Rev. 2004;82(10):49-58.
2. OECD. Scoreboard on older workers, 2006 and 2016. Paris: Organisation for Economic Co-operation and Development (OECD); 2016 [cited 2019 May 19]. Available from: http://www.oecd.org/employment/ageingandemploymentpolicies.htm.
3. Statistics Canada. Participation and activity limitation survey 2006, analytical report. Ottawa: Minister of Industry; 2007.
4. CBC. Early retirement leaves some Canadians cash strapped [internet]. Toronto: CBC/Radio-Canada; 2015 [cited 2020 December 8]. Available from: https://www.cbc.ca/news/business/early-retirement-leaves-some-canadians-cash-strapped-1.3135751.
5. WCB Manitoba. 2012 WCB Annual report, statistics and measures. Winnipeg: WCB Manitoba; 2012.
6. Farrow A, Reynolds F. Health and safety of the older worker. Occup Med (Lond). 2012;62(1):4-11.
7. Smith P, Bielecky A, Ibrahim S, Mustard C, Saunders R, Beaton D, et al. Impact of pre-existing chronic conditions on age differences in sickness absence after a musculoskeletal work injury: a path analysis approach. Scand J Work Environ Health. 2014;40(2):167-75.
8. Steenstra I, Busse JW, Hogg-Johnson S. Predicting return to work for workers with low-back pain. In: Loisel P, Anema JR, Pransky GS, editors. Handbook of work disability: Springer; 2013. p. 255-66.
9. Ministry of Labour. Changing workplaces review: guide to consultations. Ottawa: Ministry of Labour; 2015.
10. Steenstra I, Cullen K, Irvin E, Van Eerd D. A systematic review of interventions to promote work participation in older workers. J Safety Res. 2017;60:93-102.
11. Colquhoun HL, Levac D, O'Brien KK, Straus S, Tricco AC, Perrier L, et al. Scoping reviews: time for clarity in definition, methods, and reporting. J Clin Epidemiol. 2014;67(12):1291-4.
12. Arksey H, O'Malley L. Scoping studies: towards a methodological framework. Int J Soc Res Methodol. 2005;8(1):19-32.
13. Levac D, Colquhoun H, O'Brien KK. Scoping studies: advancing the methodology. Implement Sci. 2010;5:69.
14. Keown K, Van Eerd D, Irvin E. Stakeholder engagement opportunities in systematic reviews: knowledge transfer for policy and practice. J Contin Educ Health Prof. 2008;28(2):67-72.
15. Bauknecht JA, Cebulla A. Extending working lives-sticks and carrots to get the older unemployed back into employment. Intereconomics. 2016;51(3):134-9.
16. Laun T, Wallenius J. Social insurance and retirement: a cross-country perspective. Rev Econ Dyn. 2016;22:72.
17. Sanchez-martin AR, Garcia-perez JI, Jimenez-martin S. Delaying the normal and early retirement ages in Spain: behavioural and welfare consequences for employed and unemployed workers. De Economist. 2014;162(4):341-75.
18. Usui E, Shimizutani S, Oshio T. Are Japanese men of pensionable age underemployed or overemployed? Jpn Econ Rev. 2016;67(2):150-68.
19. Coda Moscarola F, Fornero E, Strom S. Absenteeism, childcare and the effectiveness of pension reforms. IZA Journal of European Labor Studies. 2016;5(1):1-18.
20. Ogutogullari E, Kilic C. A new problem area in Turkey labour market: the unemployment for aged 40 and over =Turkiye Isgucu Piyasasinda Yeni Bir Problem Alani: 40 Yas ve Ustu Issizler. With English summary. Calisma Iliskileri Dergisi. 2016;7(1):85-97.
21. Inderbitzin L, Staubli S, Zweimuller J. Extended unemployment benefits and early retirement: program complementarity and program substitution. Am Econ J Econ Policy. 2016;8(1):253-88.
22. Dejemeppe M, Smith C, Der Linden BV. Did the Intergenerational Solidarity Pact increase the employment rate of older workers in Belgium? A macro-econometric evaluation. IZA Journal of Labor Policy. 2015;4(1):1-23.
23. Leinonen T, Laaksonen M, Chandola T, Martikainen P. Health as a predictor of early retirement before and after introduction of a flexible statutory pension age in Finland. Soc Sci Med. 2016;158:149-57.
24. Paweenawat SW, Vechbanyongratana J. The impact of a universal allowance for older persons on labor force participation: the case of Thailand. Popul Rev. 2015;54(1):53-68.
25. Kyyra T. Early retirement policy in the presence of competing exit pathways: evidence from pension reforms in Finland. Economica. 2015;82(325):46-78.
26. Boockmann B. The effects of wage subsidies for older workers. IZA World of Labor. 2015;1:189.
27. Dlugosz S, Stephan G, Wilke RA. Fixing the leak: unemployment incidence before and after the 2006 reform of unemployment benefits in Germany. Mannheim, Germany: ZEW-Centre for European Economic Research 2010.
28. Shoven JB, Slavov SN. The role of retiree health insurance in the early retirement of public sector employees. J Health Econ. 2014;38:99-108.
29. Hill MJ, Maestas N, Mullen KJ. Employer accommodation and labor supply of disabled workers. Labour Economics. 2016;41:291-303.
30. Hermansen A. Additional leave as the determinant of retirement timing-retaining older workers in Norway. Nordic Journal of Working Life Studies. 2014;4(4):89-108.
31. Lerner D, Allaire SH, Reisine ST. Work disability resulting from chronic health conditions. J Occup Environ Med. 2005;47(3):253-64.
32. Employment and Social Development Canada. Promoting the labour force participation of older Canadians: promising initiatives [internet]. 2018 [cited 2020 December 8]. Available from: https://www.canada.ca/en/employment-social-development/corporate/seniors/forum/labour-force-participation.html#h2.1.
33. Lichtenthaler PW, Fischbach A. Job crafting and motivation to continue working beyond retirement age. Career Dev Int. 2016;21(5):477-97.
34. Manger C. Endogenous age discrimination. J Popul Econ. 2014;27(4):1087-106.
35. Rousseau DM, Ho VT, Greenberg J. I-Deals: Idiosyncratic terms in employment relationships. Acad Manage Rev. 2006;31(4):977-94.
36. Center for Evidence-Based Management. What is meant by the 'best available' evidence? [internet]. EZ Leiden, The Netherlands: Center for Evidence-Based Management; c2019 [cited 2020 December 8]. Available from: https://www.cebma.org/faq/meant-best-available-evidence/.
37. Raab R, Gannon B. Diversity of labor supply incentives and retirement: evidence from Ireland. Journal of Economic Policy Reform. 2004;17(4):303-21.