

## Avoiding Injuries at Home for Older People in France

**Researchers:**

Simon Beck

Bruno Crépon

Lucile Romanello

**Sector(s):** Health

**Location:** France

**Sample:** 48,090 retired adults

**Target group:** Seniors (65+)

**Outcome of interest:** Take-up of program/social service/healthy behavior

**Intervention type:** Information Risk mitigation Preventive health Subsidies Pricing and fees

**AEA RCT registration number:** <https://www.socialscienceregistry.org/trials/1396>

**Partner organization(s):** Caisse Nationale d'Assurance Vieillesse (CNAV)

Accidents such as falls remain a major cause of injury, loss of self-sufficiency, and death among the elderly. Evidence suggests preventive safety adaptations at home can help reduce the risk of falling, yet few people make those investments. Researchers conducted a randomized evaluation to understand whether providing information about the risk of accident and methods for prevention, or incentives to install home safety measures affect take-up of a home safety adaptations program. Cost reduction incentives and information disclosures increased take-up of home safety adaptations. Providing information on the perceived risks of falling was more effective than offering home adaptations for free.

### Policy issue

Accidents at home, such as falls, remain a major cause of injury, loss of self-sufficiency, and death among elderly adults. These injuries cause the elderly to incur substantial costs, both direct costs for medical treatment and care and indirect costs such as loss of productivity and independence. Evidence suggests that installing preventive home safety features, such as adding handrails to stairs, walls, and ramps, can help reduce the risk of falling. Still, very few elderly households have made these preventive investments. One reason for this could be that older adults lack information on the risks of falling and the possible health consequences. Conversely, as previous studies by J-PAL affiliated professors have shown, if preventative health measures are costly, households may be unwilling to invest. Can information and subsidies increase demand for home safety adaptations?

### Context of the evaluation

In France, falls account for more than 80 percent of accidental injuries among elderly people. In 2005, 24 percent of adults aged between 65 and 75 reported suffering a fall in the previous year, with an estimated 450,000 falls requiring emergency care.<sup>1</sup> In 2004, the Caisse Nationale d'Assurance Vieillesse (CNAV), the French National Old-Age Insurance Fund, launched a program that aimed to help elderly people remain safe and self-sufficient at home. CNAV caseworkers offered to conduct home visits for program participants to assess any adaptations needed to make homes safer. Participants could also request a subsidy to cover

part of the cost of making safety adjustments. However, in 2011, only 0.2 percent of retirees living in Ile-de-France (the region of France that includes Paris) were registered for the program.



Elderly man speaks about falls accounting for more than 80 percent of accidental injuries among older people in France.

Photo credit: Aude Guerrucci, J-PAL

## Details of the intervention

Researchers, in partnership with CNAV, conducted a randomized evaluation to understand whether providing elderly households with various incentives and information affects the likelihood of installing home safety adaptations. Researchers randomly selected 48,090 retirees from CNAV's registries to participate in the study. They then randomly assigned 42,079 participants to receive one of fourteen flyers, while the remaining 6,011 retirees received no flyer.

1. *Standard flyer (Flyer 1)* provided information on the services offered by the CNAV with a brief description of the home adaptation program.
2. Flyers offering subsidies:
  1. *Standard subsidies flyer (Flyer 2)* provided information on the standard subsidies offered by CNAV, which varied depending on applicants' income.
  2. *Additional subsidies flyers (Flyers 3, 4, 5, and 6)* provided information on the standard subsidies and offered recipients additional subsidies to reduce costs beyond the standard subsidies. Flyers 3, 4, 5, and 6 offered subsidies for 15, 35, or 100 percent of the total cost, or 20 percent conditional on applying to the program before a given deadline, respectively.

3. *Process simplification flyer (Flyer 7)* provided a step-by-step explanation of how to apply for standard subsidies and install home adaptations.
3. Flyers with information on risk of falling:
  1. *Information on risk only flyers (Flyers 8, 9 and 10)* explained the risks of falling and how investments in home adaptations could help reduce the risk. Information was presented in the form of a statistical table (flyer 8), a testimony from a retired woman (flyer 9), or a personalized letter from the director of the CNAV (flyer 10).
  2. *Information flyers with a negative message (Flyer 11)* stressed the potential losses resulting from needing to depend on a caretaker after a fall.
  3. *Information flyers with a positive message (Flyer 12)* focused on the potential gains of preventing injury.
  4. *Information on perceptions flyers (Flyers 13 and 14)* displayed a graph that compared “perceived risks” and “true risks” of falling. Flyer 13 suggested that people think the risk of falling is lower than it actually is, the other flyer (14) showed that people’s perceived risks were equal to true risks.

Researchers compared the effects of sending participants flyers offering standard information on the services offered by the CNAV with flyers offering additional information on cost reductions or the risks and consequences of falling. Researchers collected administrative and survey data over seventeen months to measure participants’ perception of risk, planned safety investments, and take-up of the program.

## Results and policy lessons

*Offering both subsidies and information through flyers increased take-up of home safety adaptations, yet overall participation in the program remained low.* Participation ranged from 0.9 percent in the comparison group to a maximum of 1.8 percent in the group that received information on risk perceptions.

*Information was most effective when the message focused on people’s perception of risk.* Flyers that suggested that perceived risks were the same as the true risks of falling were the most effective to encourage take-up, increasing registration into the program by 0.87 percentage points, from a comparison group’s average of 0.9 percent (a 94 percent increase). Explaining the risks of falling with a statistical table, or stressing the gains of preventing injury were also effective, but had a slightly smaller impact.

*Results also show that the way the information was framed mattered.* Flyers that stressed the gains of preventing injury increased take-up by 0.67 percentage points (a 72 percent increase) while flyers that stressed the losses resulting from the need to depend on a caretaker had no impact.

*Flyers offering subsidies also increased take-up.* Of all the flyers offering subsidies, those that offered home adaptations for free had the largest effect, increasing participation in the program by 0.77 percentage points (an 83 percent increase). Flyers that offered additional subsidies conditional on commitment and providing a step-by-step explanation of how to apply for home adaptations also increased the likelihood of investing in home safety precautions by roughly 0.5 percentage points.

*Information on risk perceptions was more effective than offering subsidies.* Results suggest that providing information about people’s perception of their risk of falling was more effective than offering home adaptations for free. If retirees felt they were at risk of falling at home, but were uncertain about the true risks, a message that confirmed that their perceptions corresponded to the true risk encouraged them to participate in the home safety program.

---

1. L'état de santé de la population en France Suivi des objectifs annexés à la loi de santé publique Rapport 2011.