GOVERNING LABOR MARKET RISKS

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ABSTRACT: *Based on compensation hypothesis, this study formulates several hypotheses about the relationship between work insecurity and preferences for protection. By combining a vignette study with a survey among workers (in total 914 workers from the Netherlands responded to four different vignettes (n= 3656 vignettes)) it was possible to address the following questions: How do the preferences for protection relate to labor market insecurities and to what extent are the effect of experimental conditions on preferences for risk governance affected by experiences in the actual work situation? The findings mainly support the expectations derived from the compensation hypothesis and expand them by showing how insecurities in the workplace cross-over to the experimental setting. While the compensation hypothesis is investigated in prior research, this is the first (semi-)experimental study allowing for arguing that the link between individual risks and preferences for protection are causal.*

KEYWORDS: *labor market, insecurity, demand for protection, vignette experiment*

INTRODUCTION

This study aims to increase understanding of the relationship between the insecurity that people face and their demand for protection, which can be offered via the government, private insurance, or the community, using a semi-experimental research design. As such, this article builds on prior work regarding people's attitudes toward the welfare state, which are defined as

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individuals' opinions about government intervention intended to cover social risks (Hasenfeld–Rafferty 1989; Svallfors 1997; Gërxhani–Koster 2012; Attewell 2020). At the same time, this research expands the scope of these studies as the focus is not on government intervention alone. While most prior work focuses on government intervention as a response to the insecurities that people experience, the present study includes a wider range of possibilities for compensation. Greater demand for protection by the *government* is one option, which resembles using bureaucratic means to correct for market failures (Simon 1991), but there is also the possibility that individuals opt for other means to increase their security. Most notably, this includes the *market* (through private insurance) and the *community* (through informal collective action) (Bowles–Gintis 1996). Together, these three elements create the welfare mix or welfare triangle that can reduce individual risks (e.g., Van Berkel et al. 2012). Studies of social security have addressed these alternatives in terms of privatization, individualization, and the decentralization of institutions, but far less attention has been paid to these options from the perspective of individual preferences.

An important distinction is that the research addresses the difference between self-interest-based arguments versus studies that provide other-regarding explanations, which reflect different kinds of welfare state attitudes. Studies of welfare state *demand* are, almost by definition, based on self-interest explanations. Here, the self-interest explanation prevails since it can be assumed that people support policies that cover the risks they face or enhance their position. However, studies focusing on welfare state *attitudes* and *support* (also) include these other-regarding explanations. The latter stream of research investigates, for example, issues concerning criteria such as deservingness (Van Oorschot 2006) and distributive justice (Grey 1975).

The present study investigates people's preferences for covering labor market-related risks. Hence, the analysis is in line with the self-interest position as it asks whether these insecurities affect the demand for protection. Theoretically, this study relies on the compensation hypothesis (Burgoon–Dekker 2010; Walter 2010; Rehm et al. 2012), which links the risks individuals face with their preferences for social protection. The core of the compensation hypothesis lies in its connection of insecurities with the demand for protection, and it has been applied to the different causes of these insecurities, such as economic globalization and ethnic diversity (e.g., Rehm 2009; Walter 2010. Burgoon et al. 2012; Thewissen–Rueda 2019). While these studies show that demand for protection is related to the experience of social risk, they mainly rely on analyses of large-scale data such as the European Social Survey (ESS) and the European Values Survey (EVS). These surveys have greatly improved the understanding of welfare state attitudes, but since the related data are cross-sectional, the temporal

order of the relationships cannot be exactly established. The present study tries to link insecurity and welfare state demand more explicitly by analyzing data collected via a vignette study. In recently conducted vignette studies (Kootstra 2016; Buss 2019; Lim–Tanaka 2019; Heuer–Zimmerman 2020), most of the attention is paid to issues such as redistribution and deservingness, which are more other-regarding, and not so much about the more general issue of peoples' preferences concerning the management of labor market risks that individuals face. What is more, the choice of other means of protection is not considered.

In the analysis that follows, the focus is on two such labor market insecurities. The first is termed labor market insecurity and relates to the worker's employability, which reflects their chance of unemployment and the likelihood of finding a new job if they become unemployed (Kalleberg 2009; Bidwell et al. 2013). The second insecurity refers to employers' tendency to fill certain jobs with employees on temporary contracts. If one has such a job, this may translate into experienced insecurity. To assess whether this is true, the second kind of labor market insecurity, termed flexibilization, is also included in the analysis.

In sum, this study aims at answering three questions:

(1) how are preferences for the governance of labor market risks (e.g., via the government, private insurance, or community) related;
(2) how do these preferences relate to labor market insecurities; and
(3) to what extent are the effects of experimental conditions on preferences for risk governance affected by experiences in actual work situations?

The vignette study was included as part of a survey of workers (both employers and the self-employed) in the Netherlands. A representative cross-section of 914 workers participated. In the survey, participants were asked to respond to four different vignettes (n = 3656). The main takeaways of the analyses that follow are that the differences in preferences for protection do not diverge (they are complementary), that labor market insecurities explain preferences for protection, and that people's actual situation affects their preferences for protection.

GOVERNING LABOR MARKET RISKS

This study investigates how risks in the labor market affect people's preference for protection. By doing so, the study contributes to research on social risks, particularly the risks associated with individuals' positions in the labor market (Jacoby 2001; Benda et al. 2017). While most of the research about social

protection focuses on one dimension, namely protection through social policies funded by the government (Benassi–Mingione 2019), there are other means through which individual risks can be covered: people can buy private insurance through the market and can get social support through informal community relations. The main reason for distinguishing these three types is that they are based on different means of governance (Bowles–Gintis 1996). Protection through the government relies on formal bureaucratic control, through the market based on prices, and through the community based on mutual trust.

A theoretical question concerning bureaucracies, markets, and community is how the three are related. The first answer is based on insights provided by Williamson (1979) and later expanded by Ouchi (1980). According to Williamson's transaction costs approach, economic transactions are governed either by the market or the hierarchy. If markets fail (e.g., lead to inefficiencies or do not produce the required goods), there is reason for government intervention. In the case of labor market uncertainties, if the market provides private insurance through which workers can cover their risks, this option may be preferred. However, if these forms of insurance are too costly (for example, because workers with secure positions are not willing to pay for them or because the cost of buying insurance on the market is too high), the government can step in by providing obligatory insurance that needs to be paid by all workers. This means that the transaction cost framework is based on governance structures that involve both the market and the governance hierarchy, depending on the costs associated with each of these options. Ouchi (1980) extended this framework by adding that both markets and bureaucracies can fail. And, if they do, informal relations come to predominate. While Ouchi's framework mainly applies to formal organizations and shows that bureaucratic control has its limits, it can also be applied to the governance of labor market risks. For example, if insurance is too costly and the government does not intervene, workers may find support in the community. What is important here is that this three-way scheme is a matter of discrete options: either the market, the bureaucracy, or the community provides protection. This means that they are substitutes, and it is assumed that workers will have preferences for one of them depending on the level of insecurity they experience (in combination with other factors, such as the trust they place in each of the mechanisms).

Adler (2001) provides a different perspective on the three modes of governance. According to him, the market, hierarchies, and communities are not so many alternatives but can supplement each other, meaning that people may (also) prefer a combination of the three. From this perspective, the option has particular strengths and weaknesses. By combining options, their relative strengths can be used to overcome any weaknesses. For example, private insurance may lead to

market failure, but this may be backed by instilling bureaucratic control along with trust relations in smaller groups. From this, a different conceptualization of governance mechanisms emerges as the alternatives are not regarded as substitutes but can also function as complements. In this case, people would not pick one of the options but may favor combining them. It should be noted that a preference for private insurance, government policies, and community relations at the same time may indicate an overall preference for protection. Nevertheless, this approach still deviates from the strong distinction between the three mechanisms (price, authority, and trust) as assumed in, for example, transaction cost economics.

INSECURITY AND PREFERENCES FOR PROTECTION

The general consensus in the literature on social risks is that people who experience these risks prefer to see them covered (Bonoli 2005; Paskov–Koster 2014). This is echoed in the basic premise underlying the compensation hypothesis: the preference for protection is stronger if people are faced with insecurities (Rodrik 1998). The compensation hypothesis is usually applied to macro-level factors, such as the openness of the economy and heterogeneity, to explain why welfare states expand. In the present analysis, the focus is not on the causes of insecurity but on further examining how insecurity is related to preferences for protection through the government, community, and the market.

The literature distinguishes several insecurities that workers face. One important difference is between subjective and objective insecurity: whereas subjective insecurity refers to the estimations that workers make regarding their chances in the labor market, objective insecurity refers to actual job losses (being laid off) (Scheve–Slaughter 2004; Boeri–Van Ours 2008; Klandermans et al. 2010). The importance of this distinction lies in its timing. Whereas the subjective insecurity of workers can be felt at any time, objective insecurity can usually be established after the fact (that is: if the worker is fired). This has consequences in terms of the risks that workers face. While subjective insecurity can be experienced by workers who have jobs, this is not the case for objective insecurity. This also means that actual risk is only present as soon as a worker experiences a job loss. However, as the compensation hypothesis states, workers who experience more insecurity are more in favor of protection, which not only refers to the situation of a job loss but also to a state of subjective insecurity. One

distinction related to the subjective-objective difference regarding insecurity in the labor market focuses on the estimations of workers about their position and the contractual positions that they have. Here, the main assumption is that temporary contracts reflect a more vulnerable position in the labor market than a permanent one. Again, however, this is not so much about whether workers actually face being laid off but whether they feel their position is secure. A final distinction is related to security regarding a job (job insecurity) and security regarding work in general (work insecurity). While job insecurity reflects the estimation of workers about their current job within an organization, work insecurity concerns the estimation of their position in the labor market. Hence, work insecurity more closely reflects the employability of workers as it also includes the potential of finding a new job after losing the current one. This dimension thus concerns the severity of the impact of losing the current job, which is a more inclusive conceptualization than job security. Nevertheless, it remains a subjective estimation of the situation made by the individual and does not wholly reflect an objective situation.

Empirically, the assumed link between risks and preferences for protection is investigated by combining information from the vignette experiment with actual data about work-related situations. To get a first indication of whether work insecurity affects preferences for protection, the vignette data were used to test the first hypothesis:

Hypothesis 1: The more work-related insecurity workers experience (in the experimental situation), the stronger the preference for protection through the government, market, or community.

Nevertheless, having an insecure position is relevant to preferences for protection may also mean that workers who face insecurities in real life also tend to have a stronger preference for protection in the experimental setting. It should be noted that individuals have an impact on the level of insecurity they tolerate; having an insecure position thus also depends on self-selection. As a result, those in a secure position may strongly dislike being in an insecure position, which strengthens the preference for protection. In other words, their responses in the controlled setting may be affected by their actual work situation. To test for this, the analysis includes two indicators of worker insecurity – namely, work insecurity (the chance of job loss combined with the chance of re-employment) and the use of temporary contracts for the worker's job. It is assumed that workers with jobs associated with greater work insecurity and in which temporary work is more common have riskier positions and a stronger preference for protection. Whether the actual work situation affects preferences for protection is investigated by testing the following two hypotheses.

Hypothesis 2a: The more work insecurity workers experience (in their work situation), the stronger the preference for protection by the government, market, or community.

Hypothesis 2b: The greater the level of flexibilization workers experience in their job (in their work situation), the stronger the preference for protection by the government, market, or community.

Formulating hypotheses about the vignette conditions and the actual situation of workers leads to the next question: do the vignette conditions and the work situations affect each other in the formation of preferences for protection? If they do, there are two ways this may happen: the insecurities in the vignette and the real world may strengthen or weaken each other.

The expectation that insecurities strengthen each other is based on the assumption that workers who experience labor market insecurity (in real life) may have a better understanding of what it means to be insecure (if they read about it in the vignette). Theoretically, this can be understood with reference to the psychological mechanism known as availability bias (Kahneman–Tversky 1973). In general, this hypothesis claims that people respond more strongly to situations that are more readily apparent/available. Applied to the present research, this may be translated into the expectation that workers that have an insecure labor market position in real life will be more strongly triggered by the work insecurity condition in the vignette than those who have a more secure labor market position. The hypothesis summarizing this idea reads as follows.

Hypothesis 3a: The more insecurity workers experience (in their work situation), the stronger the relationship between work insecurity and the preference for protection by the government, market, or community (in the vignette).

The alternative expectation here is that workers with a more secure position respond more strongly in terms of preferences for protection. There are two reasons for expecting this. First, insecure workers can be expected to favor protection, regardless of the vignette conditions. Hence, they respond less to the work insecurity described in the vignette. Second, for workers with a more secure labor market position, being faced with work insecurity may actually trigger them to think about their needs if this happens in the real world. As a result, this group of workers does respond to the presence of work insecurity in the vignette condition. Hence, while workers in an insecure position may be adjusted to work insecurity, the situation is more of a wake-up call for secure workers. This leads to the final hypothesis.

Hypothesis 3b: The stronger the relationship between work insecurity and the preference for protection by the government, market, or community (in the vignette), the less insecurity workers experience (in their work situation).

DATA AND METHOD

A vignette study was designed as part of a survey to test the hypotheses. The vignette part of the study allows us to investigate the impact of semi-experimental conditions (Alexander–Becker 1978; Wallander 2009). In a vignette study, respondents are asked to read a short description of a hypothetical situation. The characteristics of the situation (the conditions) are randomly assigned, and hence their impact on the preferences that respondents have may be tested (which are the dependent variables of this study). In this study, the respondents are workers (both employees and the self-employed) who are asked to indicate their preferences regarding the governance of labor market risks. An advantage of using a vignette study is that it allows the investigation of to what extent such preferences are affected by circumstances (Alexander–Becker 1978). Hence, the variation in preferences for governing labor market risks explained by the experimental conditions can be interpreted in terms of cause and effect. While vignette studies are often applied to isolate experimental conditions from those encountered in the real world (the actual situation that the respondents describe in the survey part), the present study takes a different route. Instead of treating the survey questions about the actual work situation of respondents as control variables, respondents' relationships with the preferences are explicitly taken into account in this study. First, by investigating whether respondents' labor market insecurities relate to their preferences for risk governance in the vignette study. And second, by investigating how these real-life insecurities interact with hypothetical insecurities in the formation of their preferences.

Respondents

The respondents were drawn from a panel of individuals organized by the NIPObase Consumer (www.nipo.nl). From the database (containing 150,000 respondents from 64,000 households in the Netherlands), 2,000 people with a job were approached, representing a random selection of the Dutch labor market. The questionnaire was constructed by a team of researchers in close collaboration with experts in the field of new labor relations. The data collection process took place in 2018. Of those approached, 986 people responded. The dataset was checked for representativity concerning several background variables by comparing the distribution of these variables with those associated with the Dutch economy more broadly. The comparison shows that the female/male ratio in the dataset is 46:54, while in the economy as a whole, it is 48:52. In the Dutch economy, 56% of the workers are younger than 45, and the dataset included 54%

of workers that are younger than 45. The ratio of employees to the self-employed is 86:14 in the Dutch economy and 85:15 in the dataset. Regarding the economic sectors in which these workers are employed, the actual distribution is 2% in agriculture, 14% in industry, and 84% in services. The respective distribution is 1%, 1%, and 86% for these three sectors.

The analysis was conducted on a dataset including 914 people, as 72 respondents had missing values for at least one of the variables included in the regression models. The data that support the findings of this study are available through the data repository of Erasmus University Rotterdam.

Vignette design

The vignette consisted of six conditions. Since five of these conditions have two levels and one of them has three, there are 96 (= 2 x 2 x 2 x 2 x 2 x 3) unique combinations. Below are the conditions with their levels and the exact wording that was employed. The first condition is the main condition for testing the hypotheses, and the rest serve as control conditions.

1. *Work insecurity*
   a) "If you lose your current job, the chance is big that you can quickly find a new one."
   b) "If you lose your current job, the chances are small that you can quickly find a new one."
2. *Technological change*
   a) [Nothing mentioned on the vignette]
   b) "Your work becomes more complex due to technological developments."
   c) "Your work disappears due to technological developments."
3. *Employability of the elderly*
   a) "Within your sector, people of 55 and older can easily find a new job."
   b) "Within your sector, people of 55 and older have difficulty finding new jobs."
4. *Work pressure*
   a) "You do not experience any work pressure."
   b) "You experience very high work pressure."
5. *Physical demanding work*
   a) "Your work is not physically demanding."
   b) "Your work is physically demanding."
6. *Breadwinner*
   a) [Nothing mentioned on the vignette]

b) "You are the breadwinner."

All conditions are coded such that a higher level indicates a higher risk. Each control condition is related to the risk of the situation affecting the respondents in the vignettes and can therefore affect their preferences for managing these risks.

The vignettes were presented as follows to the respondents. First, they read a general introduction – namely:

> *In this part of the research, we will ask you to read a number of descriptions of a work situation. Please read them carefully. We ask you to imagine that you work in that situation. Then we will ask a couple of questions, keeping that situation in mind. Note that we ask you about your preferences. This means that there are no right or wrong answers.*

After reading the introduction, the conditions were presented to the respondents. They were structured as below.

> *Your work situation has the following characteristics: [technological change], [job insecurity], [employability of elderly], [work pressure], [physically demanding], and [breadwinner].*

This, for example, led to a vignette reading the following:

> *Your work situation has the following characteristics: Your work becomes more complex due to technological developments; if you lose your current job, the chances are small that you will quickly find a new one; within your sector, people 55 and older have difficulty finding a new job, you experience very high work pressure, your work is physically demanding, and you are the breadwinner.*

After reading the vignette with the description of the work situation, respondents were asked to indicate whether they would prefer the *governance of risks*. Their preferences were enquired about using three means of governing these risks – namely, insurance provided by the government (the bureaucratic option), organizing mutual support in a small group (the community option), and private insurance (the market option). Respondents could rate these options on a scale from 1 ('no need at all') to 11 ('a lot of need').

The conditions were randomly assigned to the respondents, meaning that these conditions were equally spread throughout the sample. The exact numbers are the following (percentages in brackets): work insecurity (50/50), technological change (33/33.5/33.5), employability of the elderly (51/49), work pressure (50/50), physically demanding work (51/49), and breadwinner (49/51).

Each respondent read four descriptions of a hypothetical work situation and

indicated their preferences for government, community, and market in response to the risks associated with that work situation. Since there were 914 respondents, the total dataset includes 3,944 vignettes.

Measures at the individual level

Furthermore, the focus is on two characteristics of respondents' jobs. First, the variable labor market insecurity was measured with the following items: "I'm afraid to lose my job," "I expect to earn less in the next five years compared to my current income," and "I'll easily find a new job if I lose the current one" (this last item was reverse coded to make sure that it was graded in the same direction). Respondents could choose among five answers ranging from 1 ('completely untrue') to 5 ('completely true'). The answers to these three questions were added up and divided by three to measure labor market insecurity (Cronbach's alpha is 0.65). The extent to which respondents are confronted with flexibilization was measured by asking them to rate the following item: "The kind of work that I do is mostly performed by workers with temporary contracts." Again, respondents could answer on a five-point scale.

Control variables

The following control variables were included in the analysis: *age*, *gender* (0 = man; 1 = woman), *educational level* (respondents were asked about the highest level of education that they had completed on a seven-point scale), and *work hours* (the number of actual working hours per week). Then, there were two variables that took into account the impact of external developments, namely *internationalization* (responses on a five-point scale indicating the extent to which the kind of work the respondent undertook is moving abroad), *technology* (the respondent's estimation of the impact that technology has on their current job, measured on a five-point scale). The variable *work status* was added to indicate whether the respondent was employed in the private sector, the public sector, or self-employed. Finally, the variable *sector* was added to the analyses. This variable consists of five categories (agriculture, industry, private services, public services, and others). Table 1 provides an overview of the descriptive statistics of the variables included in the analyses.

Table 1. *Descriptive statistics of the variables*

	Min. /Max. value	Mean	Standard deviation	Percentage
Government insurance	1/11	6.87	2.71	
Private insurance	1/11	6.22	2.64	
Mutual support through the community	1/11	5.32	2.64	
Labor market insecurity	1/5	2.29	0.90	
Flexibilization	1/5	2.16	1.31	
Age	19/76	42.64	11.69	
Woman	0/1			45
Educational level	1/7	4.61	1.57	
Work hours	12/80	34.89	9.90	
Internationalization	1/5	1.47	0.88	
Technology	1/5	2.57	1.25	
Work status				
Private sector	0/1			76
Public sector	0/1			12
Self-employed	0/1			12

Method

The first question that this study addresses is how the preferences for the three means of managing labor market risks are related. To answer this question, factor analysis was conducted with the three items. If the responses were independent, this resulted in three dependent variables that were analyzed separately. Otherwise (i.e., if these items were not independent and measured a single dimension of risk management), they were combined and analyzed as one dependent variable.

Then the preferences for governing labor market risks were explained using the vignette conditions in combination with the characteristics of respondents' work situation. The dependent variable (or variables) were measured on a scale from 1 to 11 and could be analyzed using linear regression. However, the respondents provided responses to four descriptions of their work situation, and it cannot be assumed beforehand that the 'independent' variables are completely independent. Instead, the dataset has a nested structure; the respondents' characteristics were similar in relation to the four work situations which they rated. To account for this, multilevel regression analysis (Snijders–Bosker 2011) was applied as it allows one to distinguish between the respondent level (Level 2) and the vignette level (Level 1).

The data were analyzed through the following steps. First, an empty model (Model 0) was calculated, which serves as a baseline model with which the next model was compared. The next model included the vignette conditions, both the work insecurity and the control variables, along with variables measuring the work situation of respondents (Model 1). The following model (Model 2) analyzed the interaction effects. To get a grip on how work and labor market insecurity is related to preferences for managing labor market risks, interaction effects were calculated both among the vignette conditions (work insecurity with all other vignette conditions) and between the actual work situation and the vignette conditions. Two aspects of the work situation were investigated: respondents' labor market insecurity and the extent to which their work is affected by flexibilization. Both indicators of insecurity were interacted with all vignette conditions. The interaction effects of labor market insecurity and flexibilization were analyzed in two separate models (Model 2a and 2b). A multilevel analysis allowed the computation of variances at the two levels separately, which were used to calculate the proportion of variance that is eliminated after adding explanatory variables. The fit of models was assessed with the deviance, which was calculated as the difference in the –2 log likelihood of the model.

RESULTS

As mentioned, a reliability analysis was undertaken to check whether the three responses were related. This analysis confirmed that they are, as the Cronbach's alpha of the three items is 0.75. Based on these outcomes, it was decided to construct a scale using the three items. The resulting scale is labeled *preference for labor market risk management*, which was constructed by adding the responses to the three items and dividing them by 3 (Mean = 6.08; S.D. = 2.18). This outcome shows that individuals' preferences are not uniform in terms of how they prefer to have risks managed: if these items would not be related to each other. However, this also means there is support for the idea of a welfare mix. Hence, these modes of governance instead serve as compensations rather than substitutes.

Table 2a. *Multilevel regression analysis of preferences for governing labor market risks*

	Model 1			Model 2a		
	b	S.E.	p	b	S.E.	p
Intercept	3.04	0.57	0.00	1.61	0.76	0.03
Vignette conditions						
Work insecurity	0.79	0.04	0.00	1.81	0.29	0.00
Technological change (ref.=not mentioned)						
Work disappears	0.26	0.05	0.00	0.63	0.18	0.00
More complex work	0.17	0.05	0.00	0.32	0.18	0.07
Employability of elderly	0.64	0.04	0.00	1.13	0.15	0.00
Work pressure	0.34	0.04	0.00	0.49	0.15	0.00
Physical demanding	0.37	0.04	0.00	0.54	0.15	0.00
Bread winner	0.27	0.04	0.00	0.54	0.15	0.00
Individual characteristics						
Labor market insecurity	0.25	0.07	0.00	0.46	0.19	0.02
Flexibilization	0.21	0.05	0.00	0.19	0.06	0.00
Age	–0.01	0.01	0.05	–0.01	0.01	0.03
Gender	0.03	0.14	0.80	0.01	0.15	0.95
Educational level	0.02	0.04	0.60	–0.03	0.04	0.47
Work hours	–0.01	0.01	0.33	–0.01	0.01	0.43
Internationalization	–0.01	0.07	0.95	0.07	0.08	0.39
Technology	0.02	0.05	0.67	0.00	0.06	0.99
Work status (ref.=self-employed)						
Employed private sector	–0.26	0.30	0.30	–0.02	0.30	0.95
Employed public sector	–0.25	0.10	0.25	–0.17	0.20	0.39
Sector (ref.=public services)						
Agriculture	0.38	0.62	0.55	0.65	0.73	0.37
Industry	0.14	0.31	0.65	0.06	0.34	0.89
Private services	0.05	0.27	0.85	0.10	0.29	0.73
Other	0.05	0.27	0.85	0.05	0.29	0.88
Vignette interactions with work insecurity						
Technological change (ref.=not mentioned)						
Work disappears				–0.23	0.11	0.04
More complex work				–0.11	0.11	0.35
Employability of elderly				–0.30	0.09	0.00
Work pressure				–0.07	0.09	0.46
Physical demanding				–0.09	0.09	0.31
Bread winner				–0.17	0.09	0.07
Interactions with labor market insecurity						
Work insecurity				–0.16	0.05	0.00
Technological change						
Work disappears				0.11	0.06	0.08
More complex work				0.08	0.06	0.20

	Model 1			Model 2a		
	b	S.E.	p	b	S.E.	p
Employability of elderly				–0.08	0.05	0.14
Work pressure				0.01	0.05	0.87
Physical demanding				–0.03	0.05	0.50
Bread winner				0.08	0.05	0.13
Variance individual	2.89	0.00		2.85	0.00	
Variance vignette	1.32	0.00		1.25	0.00	
Deviance		678.45			2457.59	

Note: 3644 vignettes; 914 respondents. Empty model: –2 log likelihood: 14061.18; Variance individual: 2.98; Variance vignette: 1.68.

Table 2b. *Multilevel regression analysis of preference for governing labor market risks (cont.)*

	Model 2b		
	b	S.E.	p
Intercept	1.60	0.77	0.04
Vignette conditions			
Work insecurity	1.82	0.29	0.00
Technological change (ref.=not mentioned)			
Work disappears	0.61	0.18	0.00
More complex work	0.31	0.18	0.07
Employability of elderly	1.12	0.15	0.00
Work pressure	0.48	0.15	0.00
Physical demanding	0.55	0.15	0.00
Bread winner	0.53	0.15	0.00
Individual characteristics			
Labor market insecurity	0.25	0.08	0.00
Flexibilization	0.31	0.13	0.02
Age	–0.01	0.01	0.03
Gender	–0.01	0.01	0.91
Educational level	–0.03	0.04	0.47
Work hours	–0.01	0.01	0.46
Internationalization	0.07	0.08	0.59
Technology	0.00	0.06	0.98
Work status (ref.=self-employed)			
Employed private sector	–0.02	0.30	0.93
Employed public sector	–0.17	0.20	0.39
Sector (ref = public services)			
Agriculture	0.65	0.74	0.38
Industry	0.06	0.34	0.87
Private services	0.12	0.30	0.68
Other	0.08	0.29	0.77

	Model 2b		
	b	S.E.	p
Vignette interactions with work insecurity			
Technological change (ref = not mentioned)			
Work disappears	–0.22	0.11	0.05
More complex work	–0.09	0.11	0.43
Employability of elderly	–0.32	0.09	0.00
Work pressure	–0.07	0.09	0.47
Physical demanding	–0.10	0.09	0.28
Bread winner	–0.17	0.09	0.08
Interactions with flexibilization			
Job insecurity	–0.11	0.04	0.00
Technological change			
Work disappears	–0.04	0.05	0.41
More complex work	–0.02	0.04	0.64
Employability of elderly	–0.01	0.04	0.77
Work pressure	0.03	0.04	0.37
Physical demanding	–0.01	0.04	0.78
Bread winner	0.03	0.04	0.37
Variance individual	2.84	0.00	
Variance vignette	1.25	0.00	
Deviance		2458.76	

Note: 3644 vignettes; 914 respondents. Empty model: –2 log likelihood: 14061.18; Variance individual: 2.98; Variance vignette: 1.68.

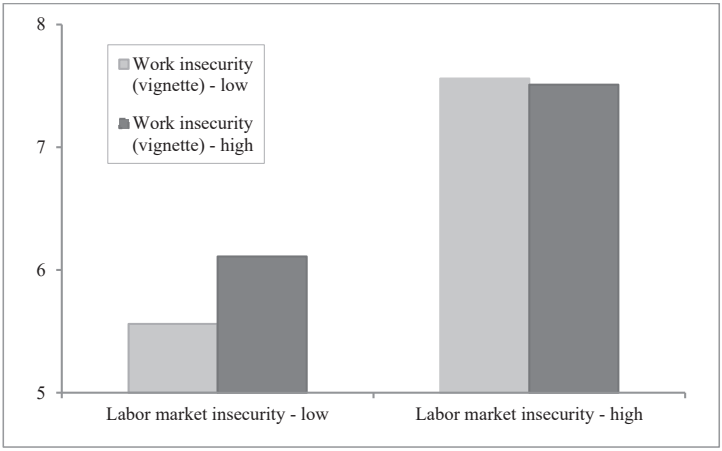
Next, multilevel regression models were calculated to explain these preferences and to test the hypotheses. The outcomes are reported in Tables 2a and 2b. Model 1 includes the vignette conditions and the variables measuring the work situation of respondents. Starting with the vignette conditions, the results show that all of them matter in explaining the preference for protection. These preferences are stronger if people experience more work insecurity, if technology affects their work, if the overall employability of the elderly in their sector is lower, if they experience work-related pressure, if their work is physically demanding, and if they are the main breadwinners. This shows the clear link between the general risks that workers face and their preferences for protection; the higher the risks, the stronger these preferences. Moving to the characteristics of the work situation, Model 1 shows that two of the latter stand out: respondents indicate a greater need for protection if they experience more insecurity in the labor market and if their work is affected more strongly by flexibilization. Together, adding these variables to the model increases its fit (Deviance = 711.54). At the individual level, it leads to a 3% reduction in variance at the individual level and a 21% reduction in variance at the vignette level. The results provide support for Hypotheses 1 (people who are placed

in a work-insecure condition have a stronger preference for protection) and Hypothesis 2a and 2b (workers who face more labor market insecurity and those who have a job that is often associated with a temporary contract have a stronger preference for protection).

In Models 2a and 2b, the interaction effects were added to the models. These interaction effects reside at the vignette level and were calculated for the level of work insecurity and the extent to which the work is affected by flexibilization. Starting with the interaction effects at the vignette level, Tables 2a and 2b show that the preference for managing labor market risks is related to the interaction between work insecurity and the employability of older workers in the sector. The sign of this is negative ($b = -0.30$; $p < 0.001$). An inspection of this interaction effect shows that the negative impact results from the weak preference that respondents have for protection if they do not experience work insecurity in combination with high levels of employability for the elderly. Furthermore, the effect of work insecurity on the preference for protection is steeper if the elderly in the sector are less employable.

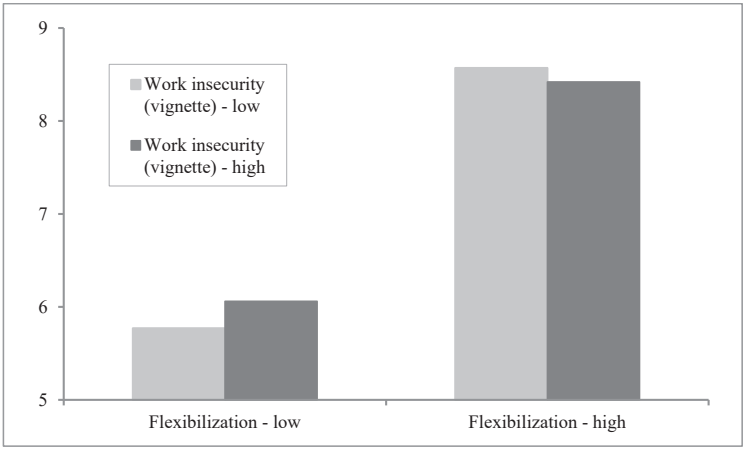
The interactions effects of the actual labor market insecurity and work insecurity presented in the vignette and the experience of flexibilization with work insecurity in the vignette were both negative ($b = -0.16$; $p < 0.001$ for labor market insecurity and $b = -0.11$; $p < 0.001$ for flexibilization). To see how the preferences for managing labor market risks were shaped by the interaction between the vignette situation and the work situation of respondents, they were plotted. In Figure 1, the interaction between labor market insecurity and work insecurity is presented, and Figure 2 shows the interaction effect of labor market insecurity with flexibilization. As Figure 1 shows, there is a difference in the responses to work insecurity presented in the vignette by workers experiencing a low level of labor market insecurity in real life and those in a situation associated with high levels of labor market insecurity. Those workers that have a work situation with low levels of labor market security respond more strongly to work insecurity in the vignette situation than those who experience high levels of labor market insecurity. A similar conclusion can be drawn for the level of flexibilization, as shown in Figure 2: the preference for risk management increases most strongly among respondents that experience the lowest level of flexibilization in their work situation if confronted with work insecurity. These results are in line with Hypothesis 3b that workers who experience higher levels of security have a stronger preference for protection.

Figure 1. *Interaction effect of work insecurity with labor market insecurity on preferences for risks management*



Source: Author's own calculation.

Figure 2. *Interaction effect of work insecurity with flexibilization on preferences for risk management*



Source: Author's own calculation.

DISCUSSION AND CONCLUSION

The results presented in this article provide further evidence for the compensation hypothesis: demand for social protection is driven by the risks that workers face. A preference for protection increases once workers are placed in an insecure labor market situation. The control conditions of the vignette further strengthen the theoretical idea that risks are the basis of the demand for protection.

Second, the findings show that this demand for protection is not restricted to government intervention but also spans market solutions (private insurance) and mutual support in the community. This conclusion has both practical and theoretical implications. From the standpoint of welfare state policies, the finding shows that other mechanisms can be used to cover labor market risks besides social policies. At the same time, it needs to be stressed that of the three options, protection by the government is preferred, followed by buying private insurance, and the community option scores considerably lower. Even so, there is no support for the assumption that the three are distinct substitutes. Therefore, mixing government policies with private insurance and informal help organized in small groups can be considered a valid approach. Regarding welfare state theories, the outcomes imply that what is studied under the heading "welfare state demand" is actually a more comprehensive concept that may be labeled demand for protection. As a theoretical construct, it includes more than a demand for social protection by the government; it seems to involve a demand for protection in a more general sense, including market and community mechanisms. Hence, articles aimed at explaining welfare state demand may actually be based on an overly narrow conception of what a preference for protection means for workers. From this, it also follows that future research can focus on how to conceptualize the theoretical structure of this demand and how it is explained.

Third, the analysis shows that insecurities are relevant for understanding preferences for protection. The strength of this relationship is supported by the outcome that its impact crosses over from the actual work situation to the experimental setting. From the perspective of a vignette study, this may seem striking; one of the assumptions in experimental research is that people's responses should be independent of their real-life situations. However, it should be pointed out here that the crossing-over of the actual work situation to the experimental setting does not mean that the vignette conditions are irrelevant. In fact, all of the vignette conditions matter for understanding the preferences for protection, and this particularly holds true concerning the extent to which workers are faced with work insecurity. The crossing-over effects of insecurities in the labor market come on top of that. What is important to note here is that

the outcomes should be interpreted as the subjective evaluations of respondents. Hence, the outcomes reflect subjective insecurities rather than objective ones.

Fourth, one of the advantages of applying a vignette study is that it allows for asking "what-if" questions. In principle, this is what a vignette study does: it describes a fictitious situation and asks people what they would do in that situation. The main finding in this regard is that the preference for protection among workers with a secure position becomes stronger if they are faced with labor market insecurities. In combination with the finding that workers with an insecure labor market position have a strong preference for protection, it is possible to speculate what will happen if an economy enters a crisis and labor market insecurities rise. Based on the outcomes, it can be predicted that demand for protection will also rise. Given that it is believed that the economic situation in many countries will worsen, the expectation is that demand for protection will increase.

There are several drawbacks of this study that need to be taken into account. First, as it investigated workers from one country (the Netherlands), it cannot be excluded that the findings are affected by the institutional setting in that country. Given that the work situation of workers affects their preferences, an institutional effect may also be present. Clearly, this cannot be established here. Future research may therefore replicate the vignette experiment presented here. Ideally, this would be done in a large number of European countries to investigate these (crossover) effects as well. Second, most attention was paid to labor market insecurities. Nevertheless, it is not claimed that this is the complete story. The vignette outcomes show that other risks also matter. Again, additional research that investigates this in further detail would be welcome.

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