The subjective experience of insecurity

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Navigating an Insecure Future

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I like subjective measures

They are Democratic: they allow people to decide themselves what matters and how they feel about it.

When there is more than one dimension (for work: income, hours, job loss etc.), individuals can assign their own weights to the different components.

Easy to add to surveys: questions don't take much time.

Seemingly understandable: very low non-response rate (much lower than that for income).

# 1) Some subjective economic insecurity measures have observable counterparts

- People may lose their jobs. What do they say about this probability?
- The responses can be qualitative: Probability of job loss over next two years, SOEP, 1985-1998

[1] Definitely — 2110

[2] Probable — 6552

[3] Improbable — 30445

[4] Definitely Not — 24784
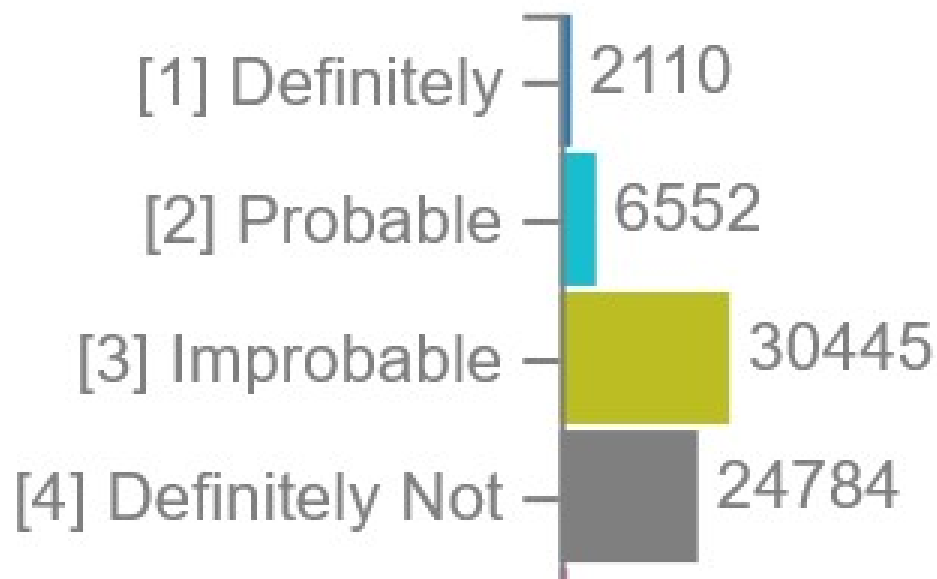
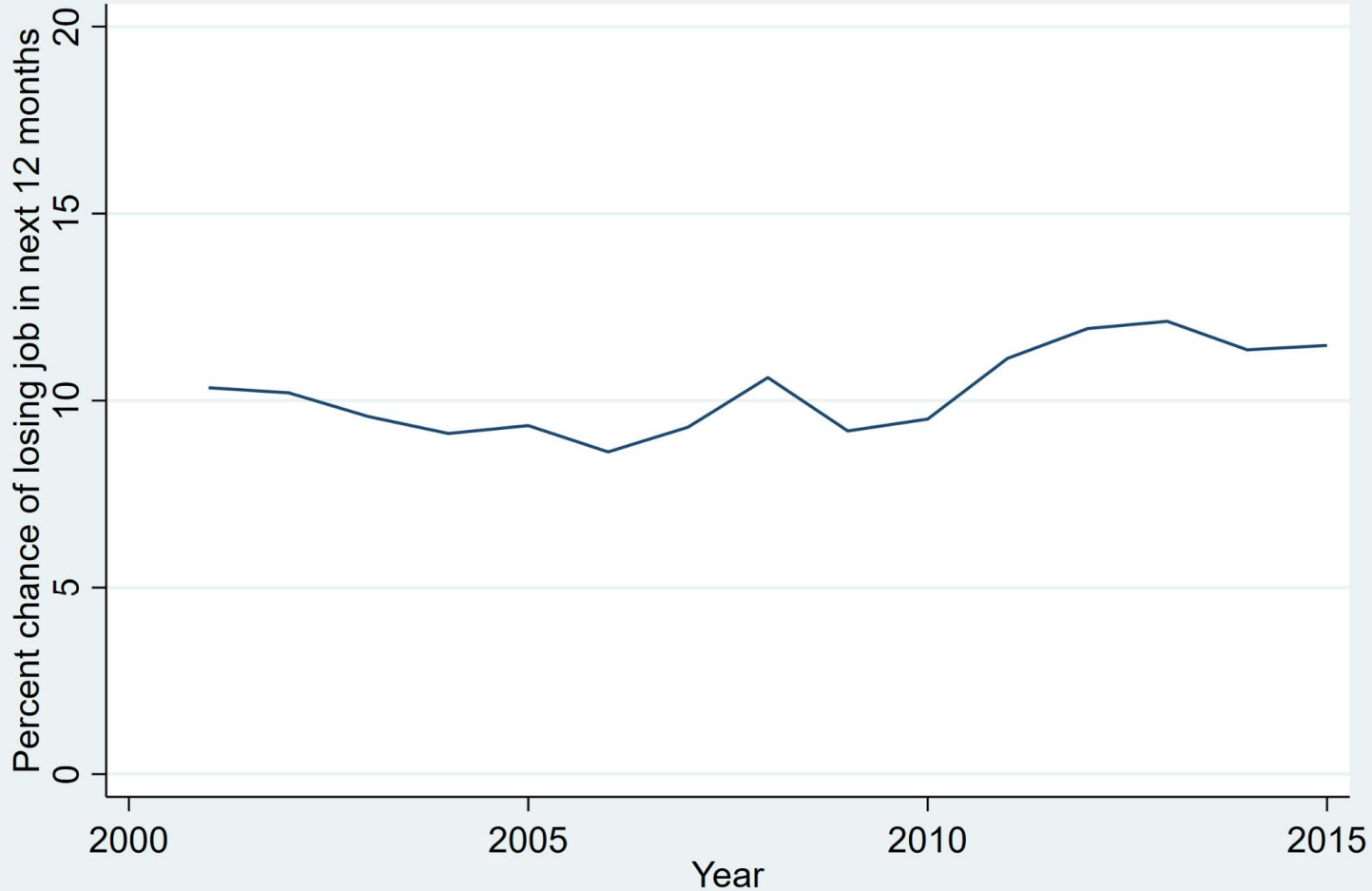# Time series of qualitative SOEP replies, 1985-1998

Or the measures can be quantitative: SOEP again, 1998 onwards

Germany
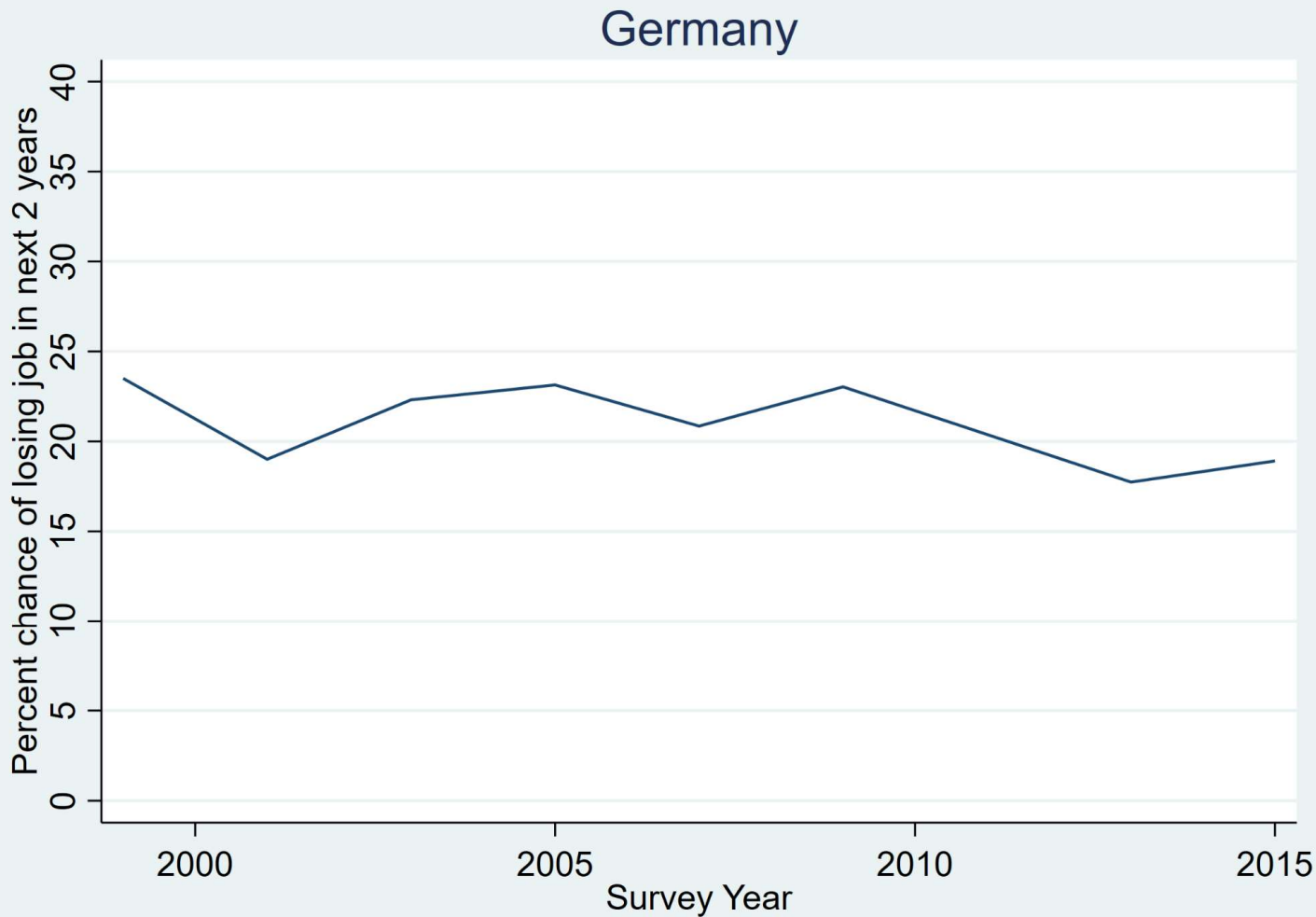
Mean percentage is around 20% probability job loss in next two years

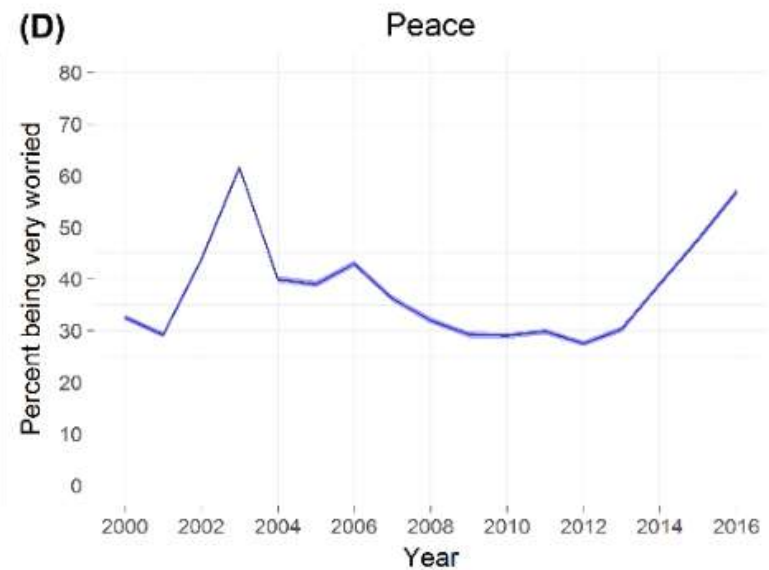Or the measures can be quantitative: HILDA

Australia

Mean percentage is around 10% probability job loss in next 12 months

2) Others ask about something that is not always easy to quantify objectively, such as "worries" (SOEP, 2000 onwards)
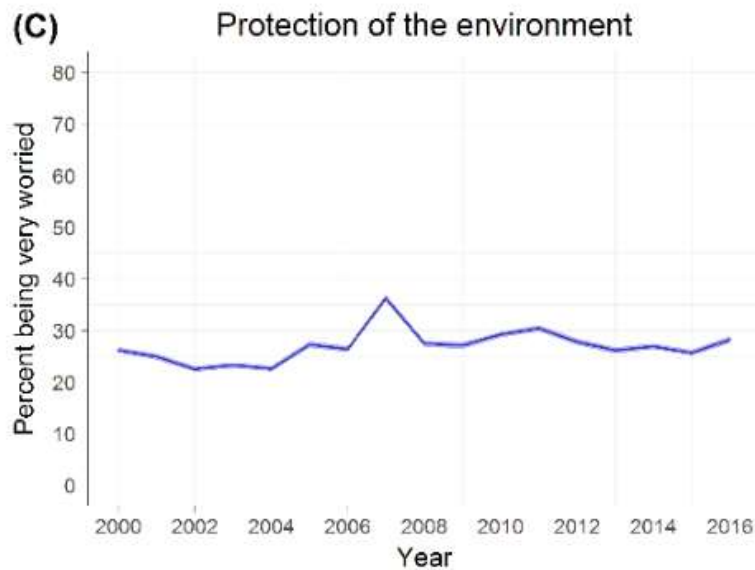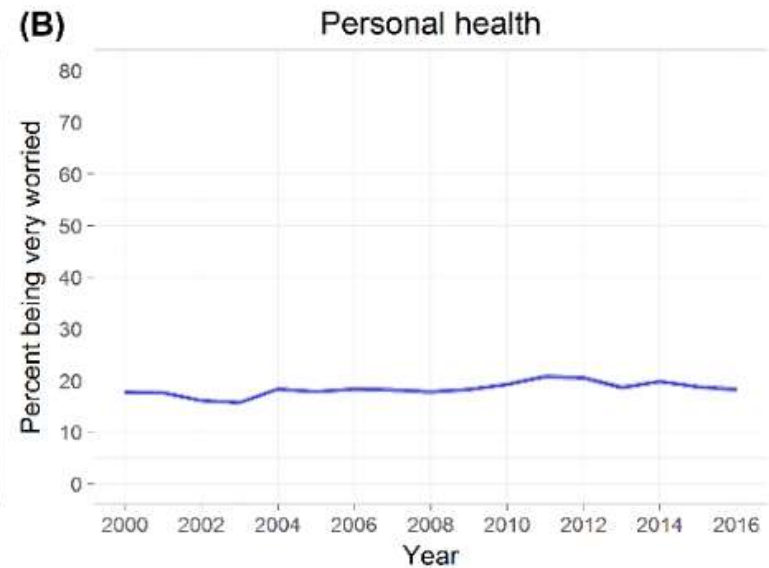
(E) Development of criminality in Germany

(F) Immigration to Germany
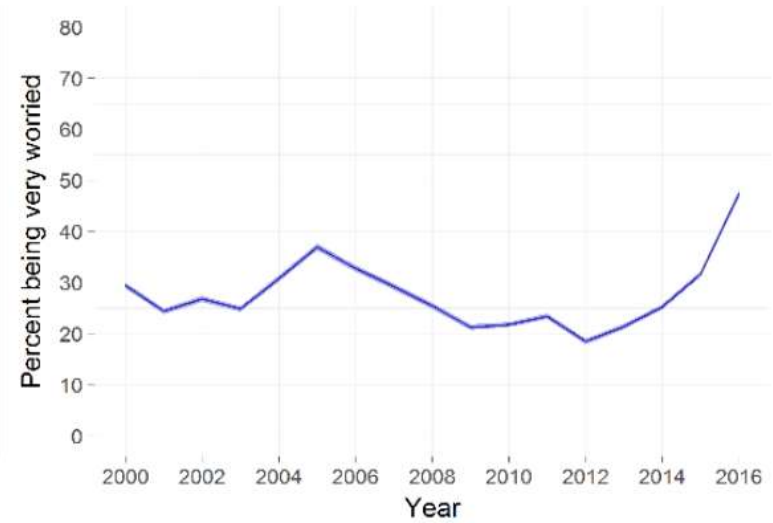
(G) Hostility towards foreigners in Germany
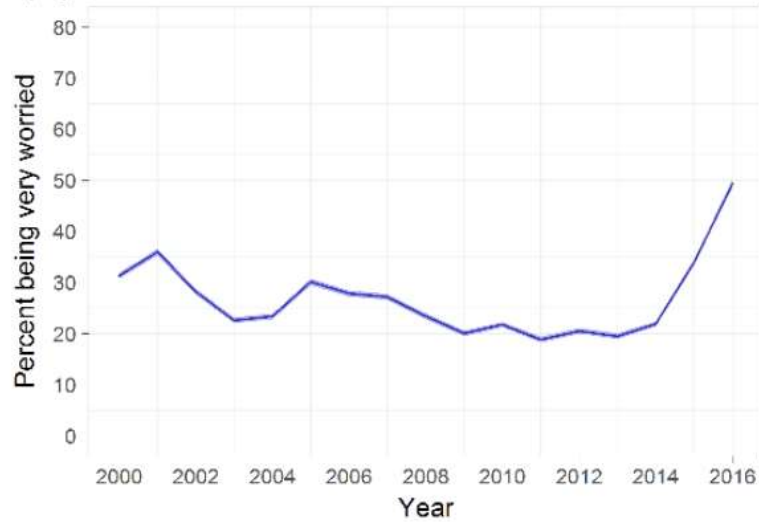
(H) Other worries
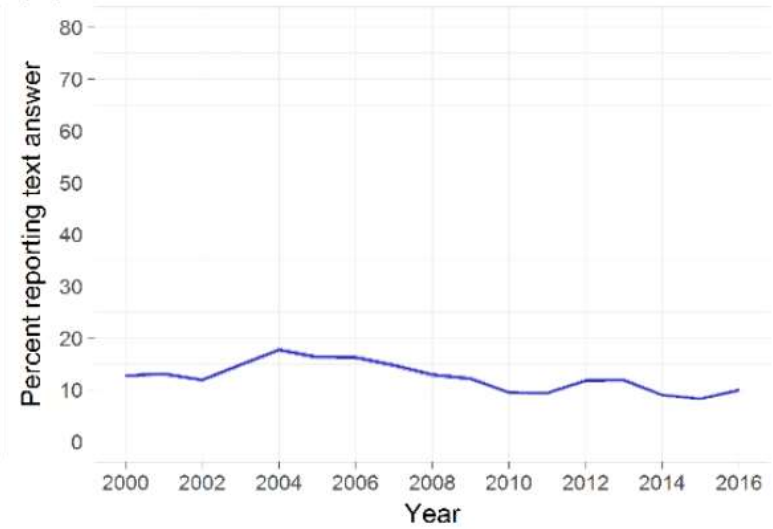
There is also a category for job security (only for workers)
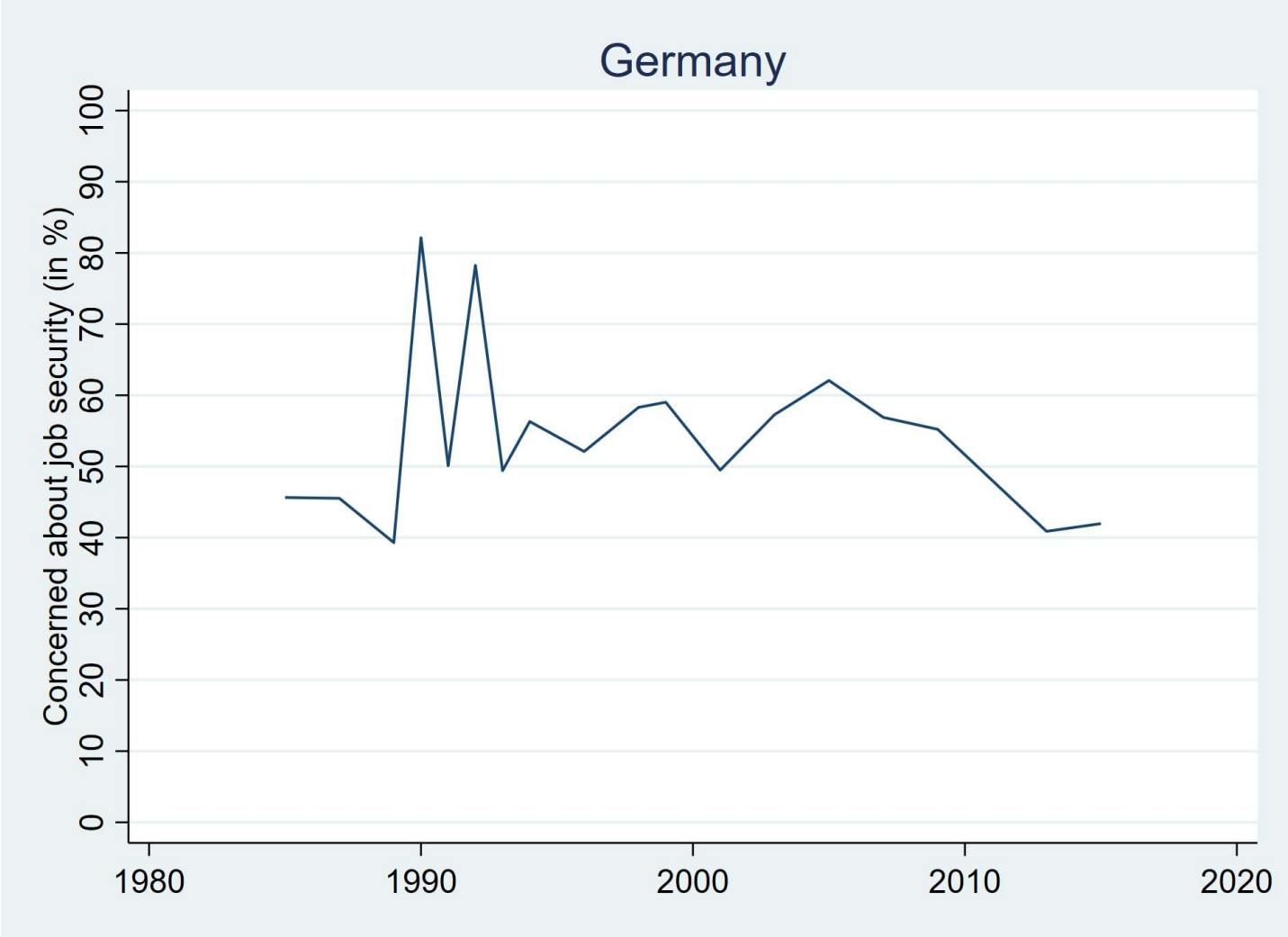
3) We often measure income; financial insecurity, the gap between income and expenditure, is more nebulous

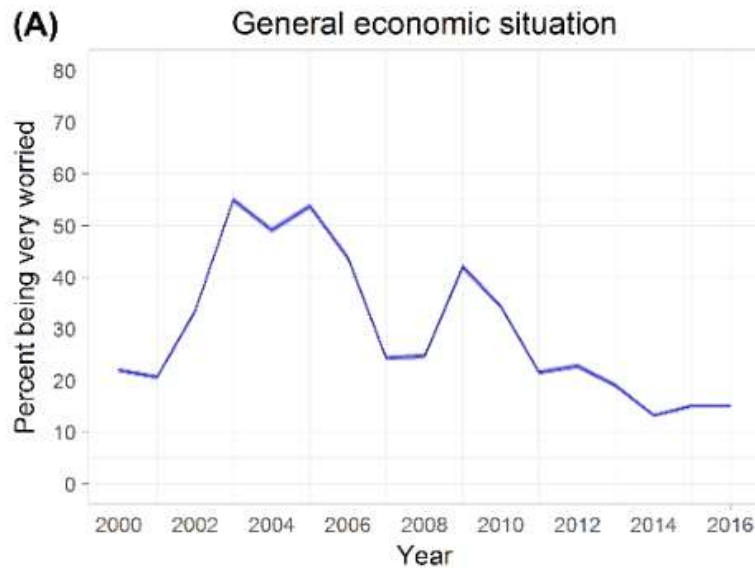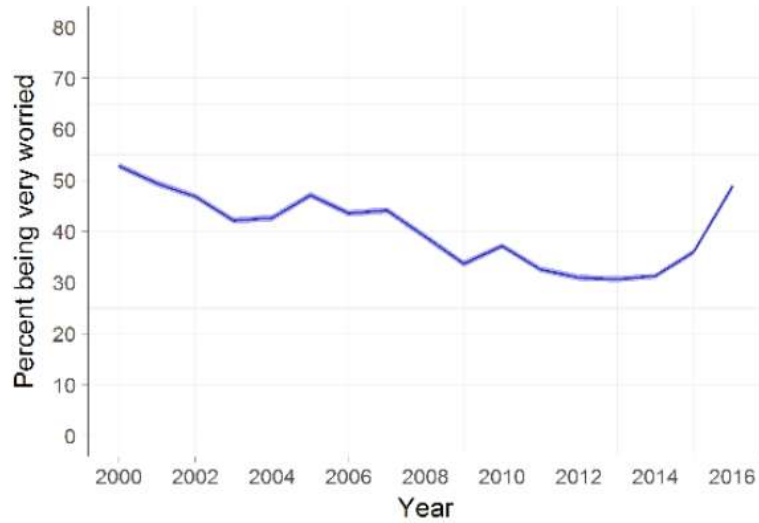Respondents Waves 1 to 18 (1991-2008) of the BHPS are asked "*Would you say that you yourself are better off or worse off financially than you were a year ago?*". One quarter better-off, one quarter worse-off and one half about the same.

Respondents who reported being better or worse off were then asked "*Why is that?*", with the answers to this open-ended question being reported verbatim.

Three response categories dominate for worse financial position:

Higher expenses (50%); Lower income (28%); "Other" (11%).

A focus only on income and its changes may miss a large part of financial insecurity: respondents are arguably better placed than we are to identify it.

- So we can ask individuals about their financial situation.

- Percentage who Inability to face unexpected financial expenses (EU-SILC)

- For the EU-28, this rose from 37% in 2010 to 40% in 2012.

- From whence it has slowly dropped, finally going under its 2010 level in 2017.

- This figure was 31% in 2019.

There is wide geographical variation
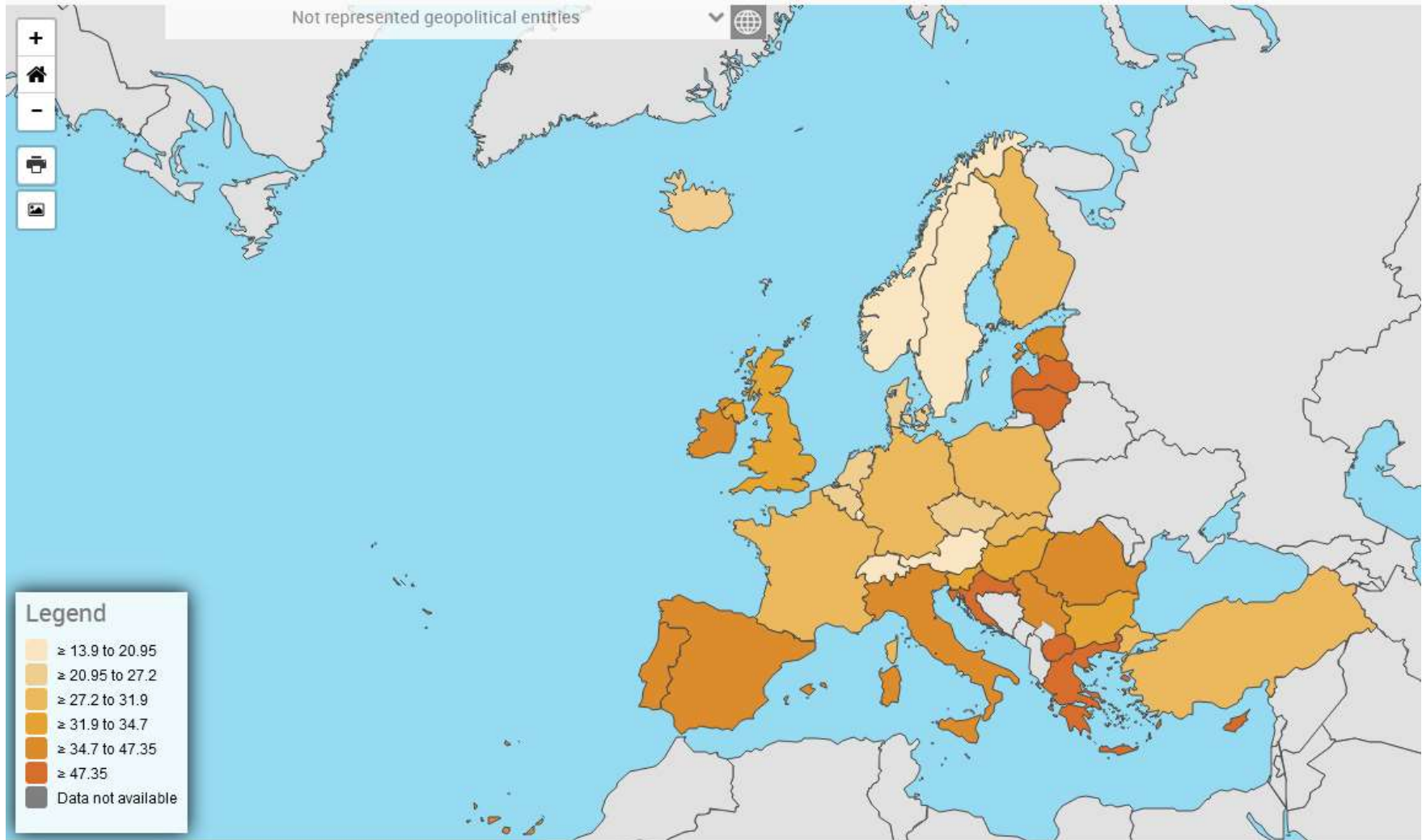
4) On the labour market, Job Insecurity
Objective measure: Five-year retention rates

	Australia[a]	Canada	Finland	France	Germany[b]	Japan	Spain	Switzerland[c]	United States (1)[d]	United States (2)[e]
Total									50.9	..
1980-1985		46.7	52.3	..	..	67.2	..	..	54.8	..
1985-1990	38.5	45.5	45.4	56.7	62.1	64.8	57.9[f]	..	50.8	..
1990-1995	41.3	47.9	42.8	49.9	60.7	64.2	42.8	55.2	..	48.6
Gender:									51.9	..
Men									58.6	..
1980-1985		49.0	53.2	..	..	77.0	..	..	53.5	..
1985-1990	40.2	48.4	47.0	57.3	64.1	73.5	59.4[f]	..	..	49.8
1990-1995	42.4	49.1	45.8	50.5	60.2	71.9	43.0	60.9	49.6	..
Women									50.7	..
1980-1985		43.8	51.3	..	..	50.4	..	..	47.9	..
1985-1990	36.3	42.1	43.7	56.2	59.3	50.5	54.8[f]	..	..	47.4
1990-1995	40.0	46.5	39.3	49.5	61.4	51.8	42.4	49.0	..	..

Five-year retention rate: Take 100 people in work in a firm in 1980. How many of them still work in the same firm in 1985?

The replacement rate is not the only important characteristic: What are the consequences of job loss?

- chances of finding another job, unemployment benefits, quality of new job

So, again, let's ask individuals about their job insecurity

Reported as the most important job aspect (ISSP figures):

Table 2. Job Values				
ISSP 1997, 2005 and 2015				
Job Values: Percentage Saying 'Very Important'				
WOMEN				
	1997		**2005**		**2015**
High Income	16.9	**	21.5	**	17.0
Flexible Working Hours	18.3	**	21.2		19.8
Good Opportunities for Advancement	15.9	**	18.9	**	21.4
Job Security	56.5		57.6	**	60.9
Interesting Job	51.6	*	54.5	**	51.0
Allows to Work Independently	31.9		32.4	**	29.5
Allows to Help Other People	25.0	**	29.4		29.4
Useful to Society	21.6	**	26.8	**	29.3
MEN				
	1997		**2005**		**2015**
High Income	19.0	**	24.8	**	18.8
Flexible Working Hours	14.7	**	19.2	**	15.9
Good Opportunities for Advancement	16.1	**	20.5		21.1
Job Security	53.6		52.2		54.2
Interesting Job	49.3		51.0	**	47.0
Allows to Work Independently	32.0	*	34.0	**	29.0
Allows to Help Other People	15.9	**	20.8		20.1
Useful to Society	17.2	**	21.3	*	23.2

Notes: Weighted Data; ** (*) = significant difference by year at the one (five) per cent level.

But not all people say that they have it:

Table 3. Job Outcomes					
ISSP 1997, 2005 and 2015					
Job Outcomes: Percentage Reporting the Characteristic in Question					
WOMEN					
	1997		**2005**		**2015**
Income is high	15.7	**	19.2	**	23.0
Prefer to spend less time in their job	13.2	**	10.4	**	8.3
Prefer to spend more time in their job	18.4	**	21.5	**	24.8
Opportunities for advancement are high	16.5	**	20.4	**	23.5
Job is secure	63.8	**	67.1	**	70.8
Hard work	41.1		42.8	**	48.4
Stressful work	81.5		81.7		82.7
Good job content	43.8	**	46.7		48.4
Good relations at work	67.9	**	65.1		65.7
High job satisfaction	41.6		42.5		44.3
MEN					
	1997		**2005**		**2015**
Income is high	24.4	**	30.0	*	32.3
Prefer to spend less time in their job	11.2	**	9.2	*	7.8
Prefer to spend more time in their job	23.1	*	25.2	**	29.6
Opportunities for advancement are high	20.9	**	25.5	**	29.3
Job is secure	61.2	*	63.3	**	68.0
Hard work	49.8	*	52.2	**	57.8
Stressful work	81.7		80.5	**	82.7
Good job content	40.0		40.9		42.3
Good relations at work	65.7		65.5	*	68.1
High job satisfaction	40.3	**	43.8		45.7
Notes: Weighted Data; ** (*) = significant difference by year at the one (five) per cent level.					

Distribution across countries:

Denmark	73.7%
West Germany	70.9%
USA	70.8%
New Zealand	69.2%
Great Britain	69.2%
Spain	69.1%
Canada	66.9%
Switzerland	66.5%
Sweden	65.6%
Norway	63.6%
Portugal	63.4%
Japan	58.0%
Hungary	56.5%
France	54.3%
Czech Republic	51.7%

We can equally ask about satisfaction with different aspects of the job.

BHPS Job satisfaction (Wave 18, for illustration).
Percentage reporting satisfaction of 6 or 7 on a 1-7 scale.

Satisfaction with Pay   48
Satisfaction with Job Security   60
Satisfaction with Work Itself   62
Satisfaction with Hours   56
Overall Satisfaction with Job   59

5) Cross-section or Panel data?

Hope that it is the former!

Much easier to collect and more-widely available.

Track changes over time by looking at changes in random samples of people from one year to another.

But I could answer an insecurity question differently from you (response style): I may thus give a higher insecurity response when "objectively" I am less insecure.

We get around this by using panel data: asking you the same question from year to year, and then mapping out the CHANGE in your replies over time. This cleans out any individual fixed effect in response style.

Note. As a side effect, it means that we can't relate EI to any individual characteristic that never changes over time: sex, country of birth, birth order etc. Also country, unless individuals are followed as they move between countries (almost never happens).

One way of showing that cross-section data contains useful information: If I SAY that I am less satisfied than you then I should ACT as if I am less satisfied as well.

This is what has been found in empirical literature predicting quitting a job, getting married, divorce, retirement, fertility and so on.

In this sense, we can use panel data (some subjective measure at time t predicting an outcome at times $t+\tau$) to show that we do not need panel data.

If we have multiple satisfaction measures we can see which predicts behaviour the best

Table 3
Quits and domain job satisfaction: duration models

	Type of job satisfaction							
	Overall	Promotion	Pay	Relations	Job security	Initiative	Work itself	Hours
All, Controlling for wages and hours								
Satisfaction coefficient	−0.108 (0.020)	−0.013 (0.017)	−0.058 (0.018)	−0.005 (0.019)	−0.073 (0.018)	−0.063 (0.020)	−0.052 (0.021)	−0.064 (0.019)
Log likelihood	−9744.29	−9759.20	−9753.60	−9759.53	−9750.60	−9754.37	−9756.04	−9753.35
Log likelihood at zero = −10,277.8; number of observations = 18,707; number of individuals = 8461; number of quits = 1308								

The least negative log-likelihood (the regression with the greatest explanatory power) is that including overall job satisfaction, as might be hoped.

With respect to the seven BHPS domain satisfaction variables, the most powerful is satisfaction with job security.

6) Objective or Subjective?

We can match subjective to objective measures (such as changing income, unemployment etc.).

But if subjective track objective, then why do we need subjective indicators at all?

Subjective indicators pick up some part of EI that is difficult to measure objectively.

And can provide real-time information summarising a number of objective domains.

7) What Does Insecurity Do?

Insecurity predicts poor health/MH in panel data.

It also predicts political participation, and voting for more Right-Wing parties.

But even in panel data, causality is a potential problem.

We would like to identify exogenous changes in insecurity. Covid does that, but has affected everyone (although not to the same extent arguably).

We have considered changes in labour-market regulations that affect one group but not another.

Layoff taxes (France and Italy).

One group is protected by higher layoff taxes. But the other group experiences rising job insecurity as a result.

Those rendered more insecure have fewer children (when married), marry more (if cohabiting), save more and spend less.

Individuals can protect themselves to an extent against EI.