

**Before, During and After the Deluge:
Monitoring the French Resident Population's Response to
the Covid-19 Pandemic with a Probability-Based
Longitudinal Survey**

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Context

THREE YEARS LATER: TIME FOR AN ASSESSMENT

In France, the COVID-19 pandemic is legally over:

“La loi abroge à partir du 1er août 2022 les dispositions du code de la Santé publique relatives à l'état d'urgence sanitaire, créé au printemps 2020, ainsi que le régime de gestion de la crise sanitaire instauré par la loi du 31 mai 2021”

- 39,866,718 COVID-19 cases (JHU 2023)
- 166,176 COVID-19 deaths (JHU 2023)
- Excess mortality: 7.5% in 2020, 6.3% in 2021 (Blanpain 2022)
- GDP: -7.9% in 2020 (Baleyte et al 2021)
- € 424 billion extra state expenditure 2020-2022 (Minister Olivier Dussopt, RFI, 14 April 2021)

AFTER COVID: AN EARLY LEGACY OF THE PANDEMIC? COMPARING ECONOMIC AND PSYCHOLOGICAL WELL-BEING (2019-2022)

Inequalities exacerbated *during* COVID period, but *after*?

- Which social groups have ‘lost ground’ because of the pandemic?
- Are there social groups who have in fact ‘gained ground’ during the pandemic?
- How much the pandemic had a *direct* effect (through COVID infections and COVID-related interventions) and an *indirect* (through life disruptions or categorical burdens) effect on individuals’ economic and psychological well-being?

Research question

Did economic and psychological well-being change over the pandemic, and if yes, over which social groups?

Methods & Data

DATA: THE ELIPSS PANEL (1)

A high-quality probability online panel for the scientific community since 2012

- 2012: initial recruitment round (1,039 participants)
- 2016: expansion recruitment round (817 first round + 2,514 additional participants)
- 2020: expansion recruitment round (1,391 first rounds + 890 additional participants)
- 2023: expansion recruitment round (1,736 first rounds + 905 additional participants)

INSEE recruited a random sample of individuals aged over 18 with a fixed address in metropolitan France who can read French

DATA: THE ELIPSS PANEL (2)

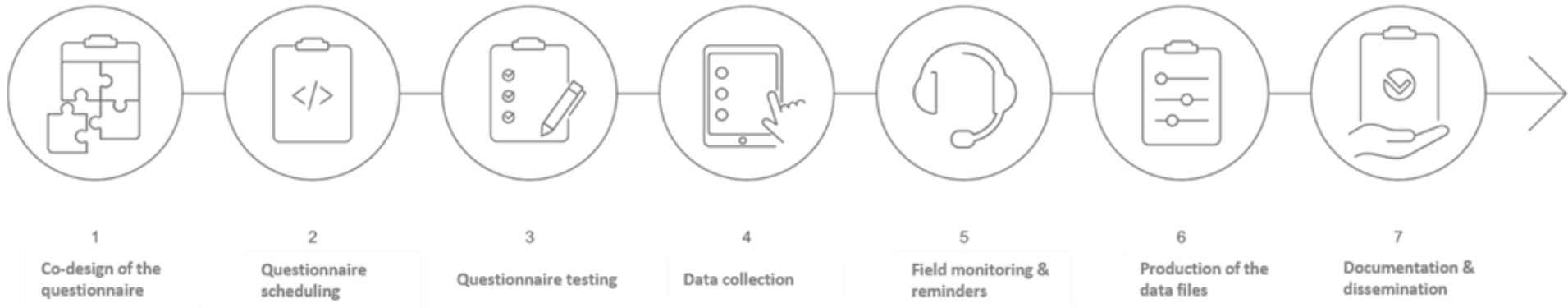
A large production...

- Cross-sectional or longitudinal projects with no thematic restrictions
- Monthly survey, 10 waves per year
- 9 waves designed by research applicants; 1 wave for the ELIPSS core questionnaire
- 20 minutes duration per wave

... to data dissemination for research

DATA: THE ELIPSS PANEL (3)

The life cycle of an ELIPSS survey



DATA: THE ELIPSS PANEL (4)

Focus on the annual survey

- Repeated once a year
- Sociodemographic and general attitude module
- Systematically matched with the data files available on the dissemination platform
- 20 minutes duration per wave

Focus on the 'CoCo' Project (Coping with Covid-19)

- ANR Flash Covid-19 call (March 2020)
- Compare pre- and post-lockdown everyday life and inequality

BUILDING ON ELIPSS: THE COCO SURVEYS

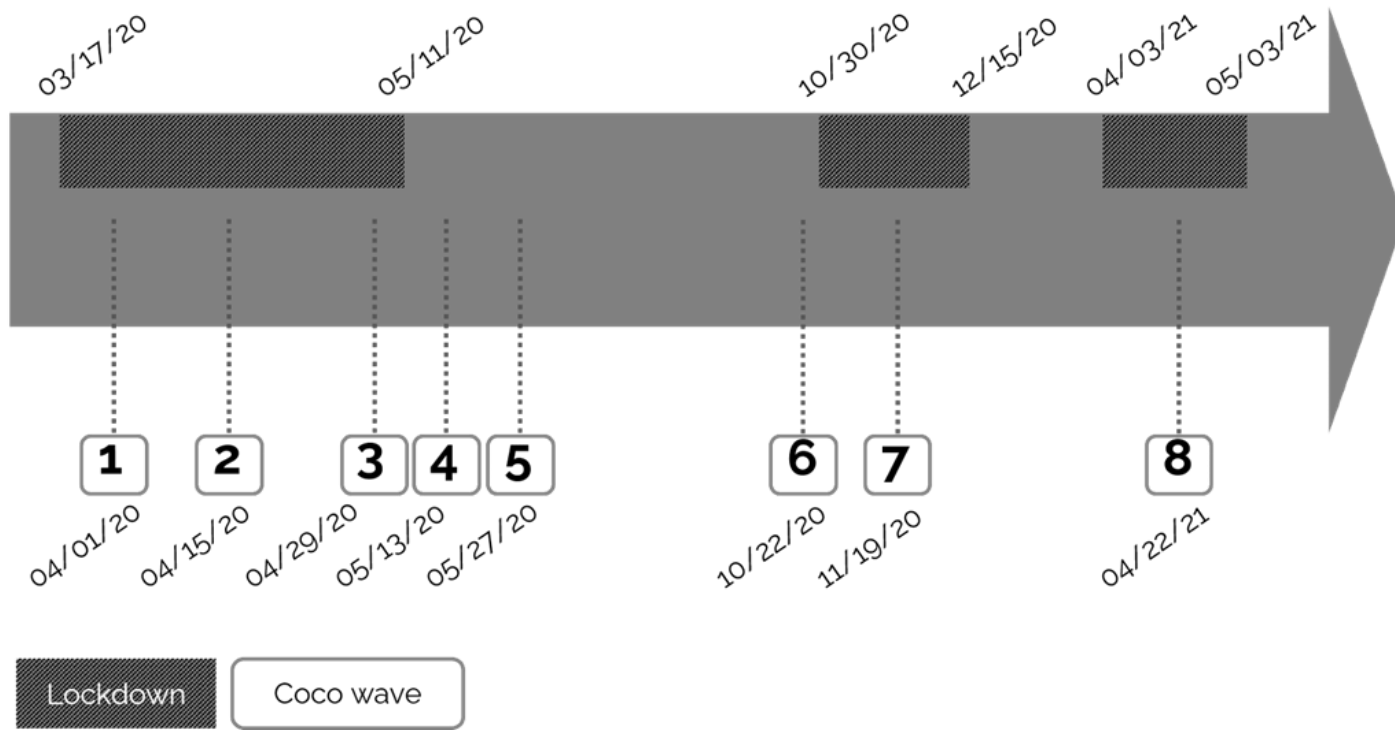
Why? Compare pre- and post-lockdown everyday life and inequality

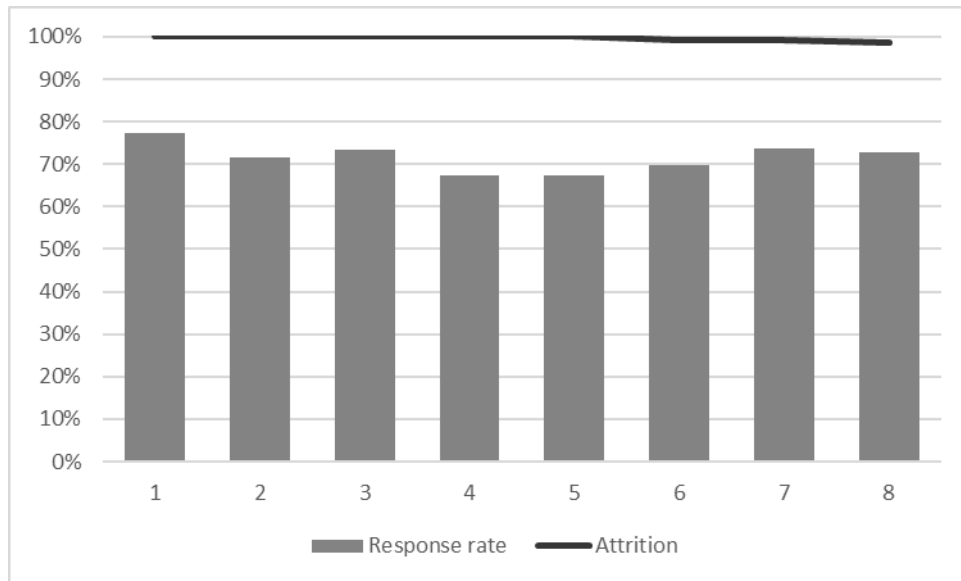
How? Eight waves in total:

- 1-5th April 1-June 5, 2020, during and just after the first lockdown
- 6th at the end of October 2020, just before the start of the second lockdown
- 7th in mid-November 2020, during the second lockdown
- 8th in mid-April 2021, during the third (and final) lockdown

Each wave open to panelists for 1-week; the first 5 waves were scheduled every other week

Timeline of CoCo waves and French lockdown





8

SURVEY WAVES

70%

AVERAGE **RESPONSE RATE**

min : 67% max : 77%

1/3

PANELIST RESPONDED
AT **ALL** THE COCO
SURVEY WAVES

97%

PANELIST RESPONDED
AT **ONE** OF THE COCO
SURVEY WAVES AT
LEAST

SAMPLE LIMITS

Sample under-represents the following categories:

- One-person households
- People in the Paris area
- Households with individuals over 60 years or under 25 years of age
- People with lower education
- Ethnoracial minorities

Other minority groups – like the homeless and people living in retirement homes – not included despite potentially most at risk during the pandemic

Mental health between 2019 and 2022

- **Objective**

Assess mental health changes across different social groups using pre- and post- pandemic measures (MHI-5)

- **Data**

Mental Health Inventory 5 and individual-level predictors
(3.7% missing in 2022)

- **Analytical strategy**

Model determinants of mental health in the pre-pandemic period
Model 2019-2022 changes

Measuring Mental Health - Background

- Subjective well-being (Recchi et al 2020)

- ‘Eye of the hurricane’ paradox

- Mental Health Inventory 5

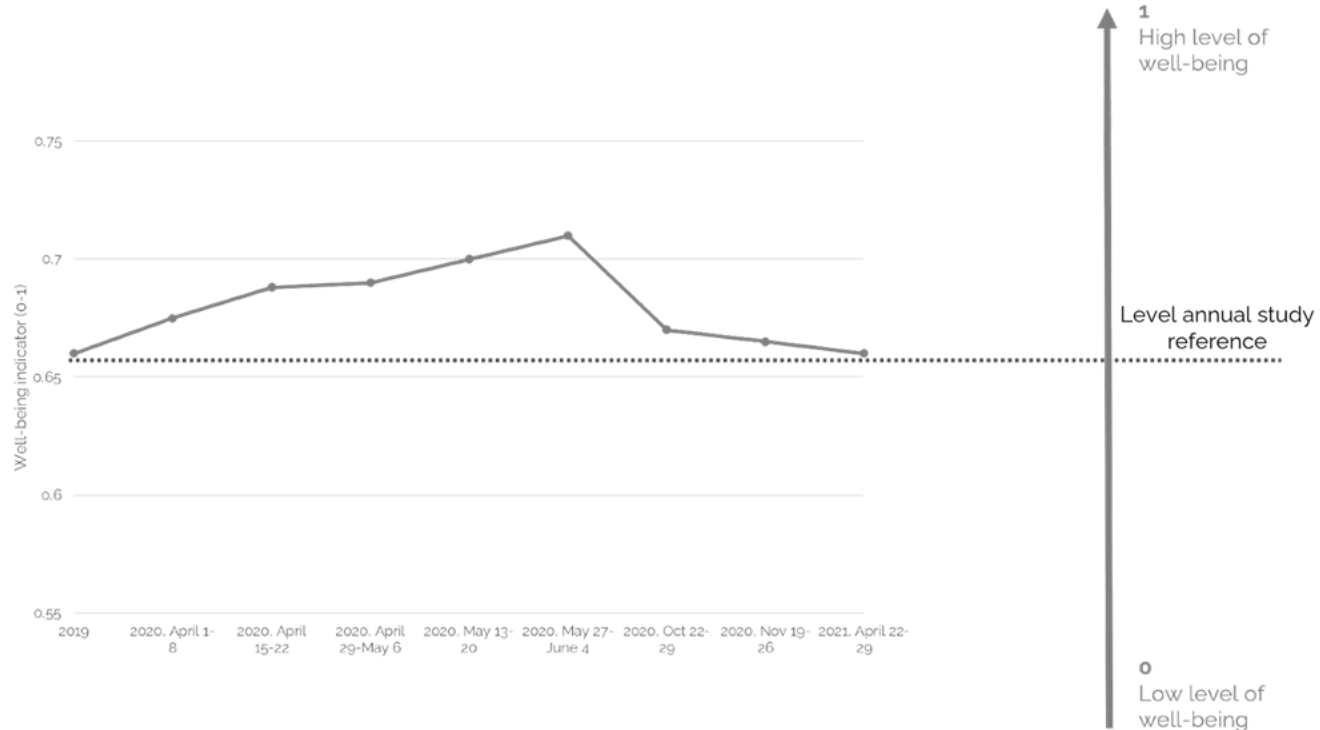
In the past two weeks, have there been times when you felt:

- Very nervous
- So discouraged that nothing could lift your spirits
- Calm and relaxed
- Sad and defeated
- Happy

always, often, sometimes, rarely, never

- Responses recoded from 0 to 1, so that 0 represents the lowest feeling (‘always nervous’, ‘never happy’); expressed as the **mean score on a 0-100 point scale**

- The Eye of the Hurricane
 - How do people assess their health and stress levels?



MHI-5 - Descriptive results (1)

Figure 9. MHI-5 distribution (2019 & 2022) with means and ± 1 SD, n=966

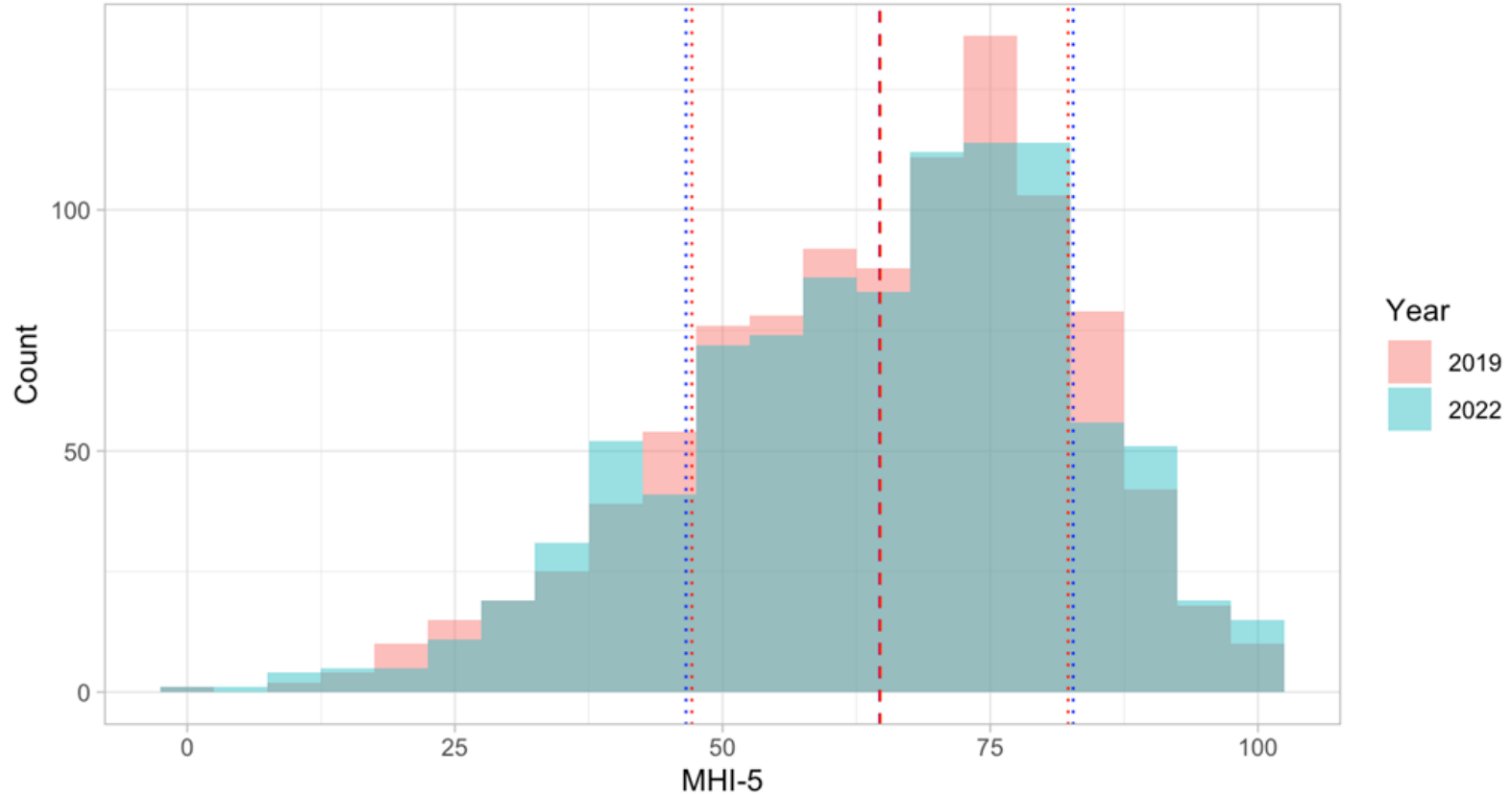
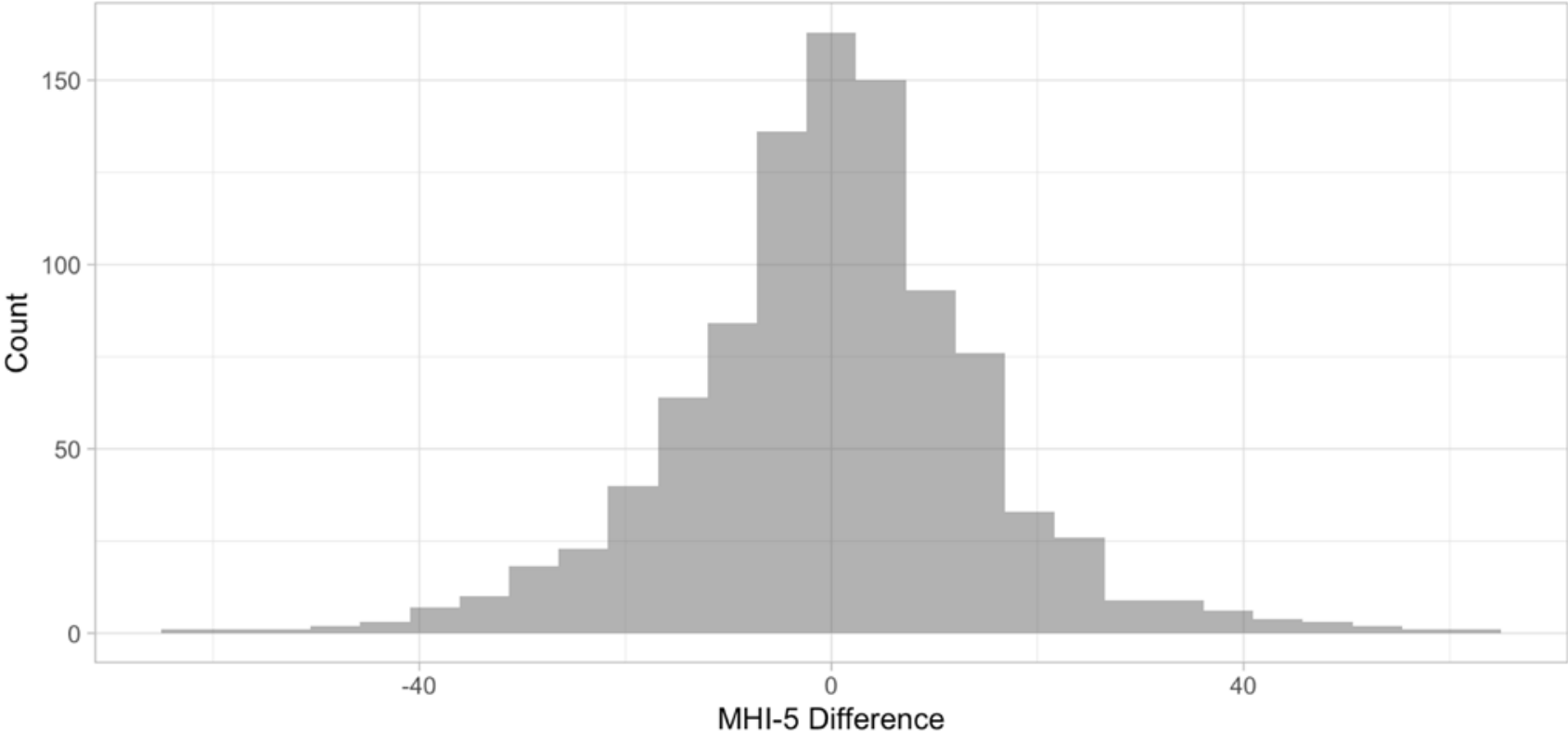


Figure 10. MHI-5 difference (2019 to 2022), n=966



Results - Modeling 2019 MHI-5 (2.1)

MODELING 2019 MHI-5

- **Objective**
Assess the determinants of mental health in a baseline, pre-pandemic period
- **Outcome variable**
MHI-5 2019 (0 to 100)
- **Predictor variables**
Individuals' sociodemographic profiles (1)
Individuals' economic situation (2)
Individuals' health situation (3)
- **Models**
OLS regressions
- **Robustness checks**
MHI-5 cutoff as binary outcome variable

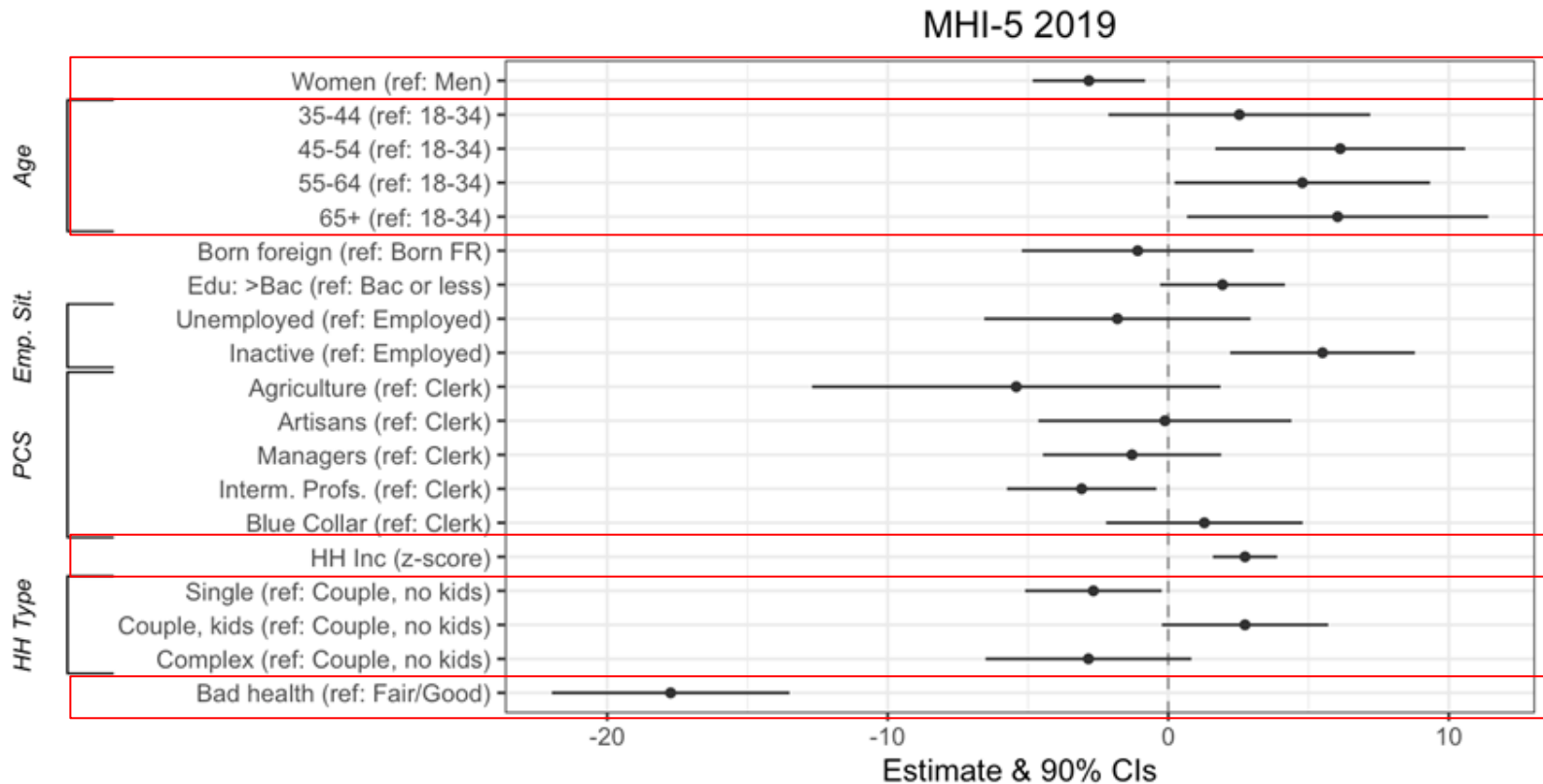


Figure 11.
OLS model
on MHI-5
2019, n=865

Results - Modeling MHI-5 Changes

MODELING 2019-2022 MHI-5 CHANGES

- **Objective**
Assess the determinants of changes in mental health
- **Outcome variable**
MHI-5 2022
- **Predictor variables**
Identical to 2019 analyses (sociodemographic profile, economic, and health situations)
+ COVID-19 factors (infection and post-COVID symptoms, knowing people who died)
+ MHI-5 2019
- **Models**
OLS regressions
- **Robustness checks**
MHI-5 difference as outcome variable
MHI-5 cutoff as binary outcome variable

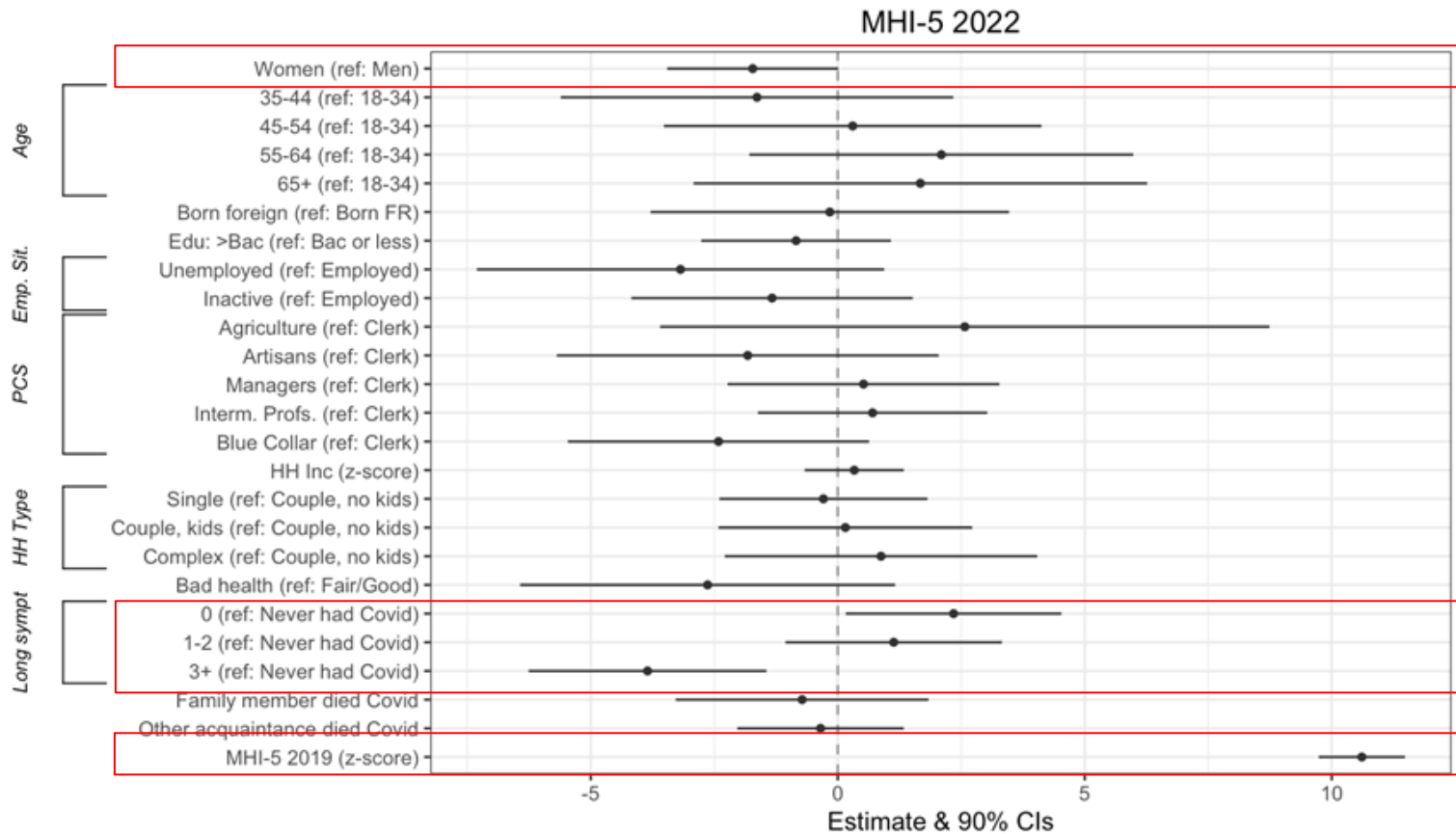


Figure 12. OLS model on MHI-5 2022, controlling for 2019 characteristics, n=828

Figure 13. Marginal effects on interaction between gender and household comp.

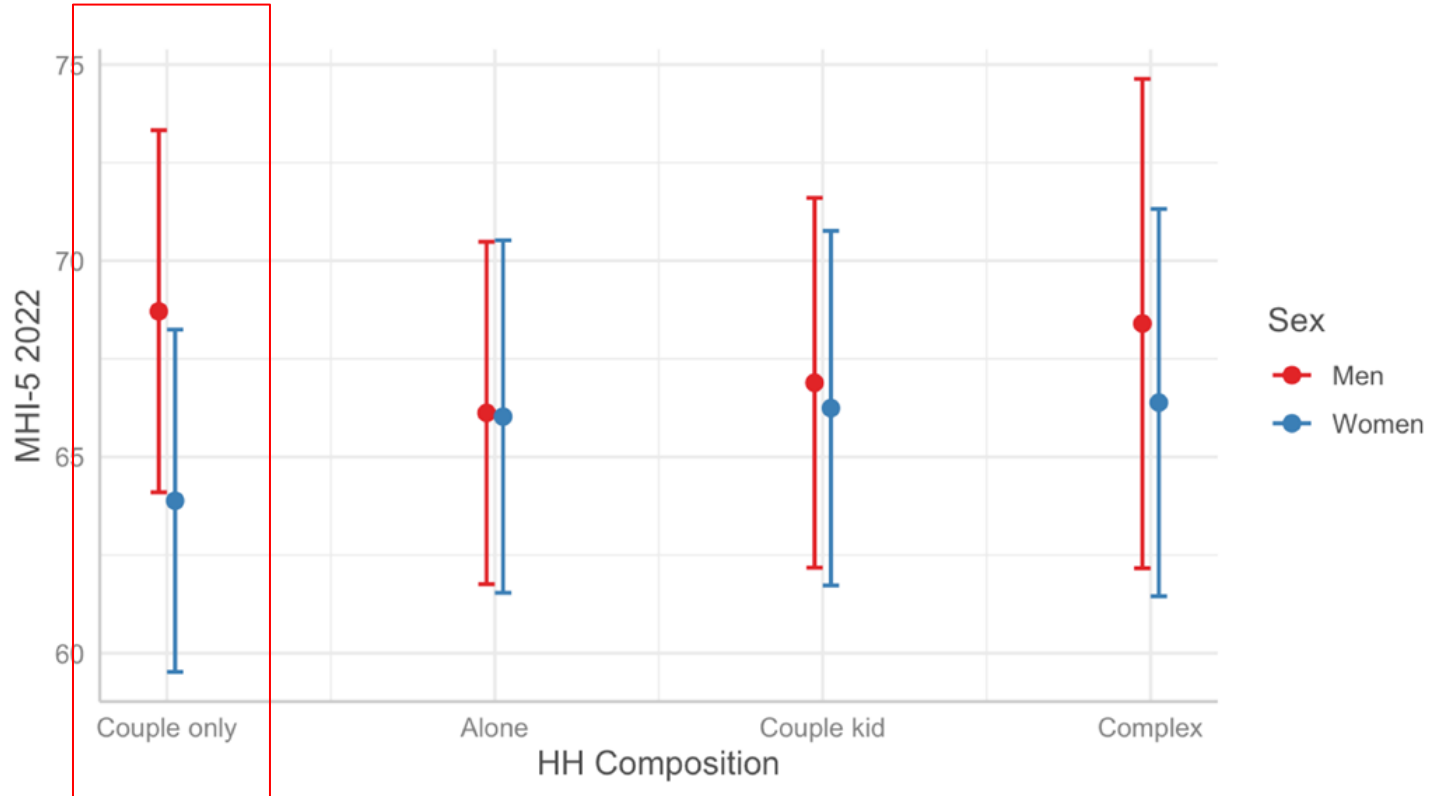
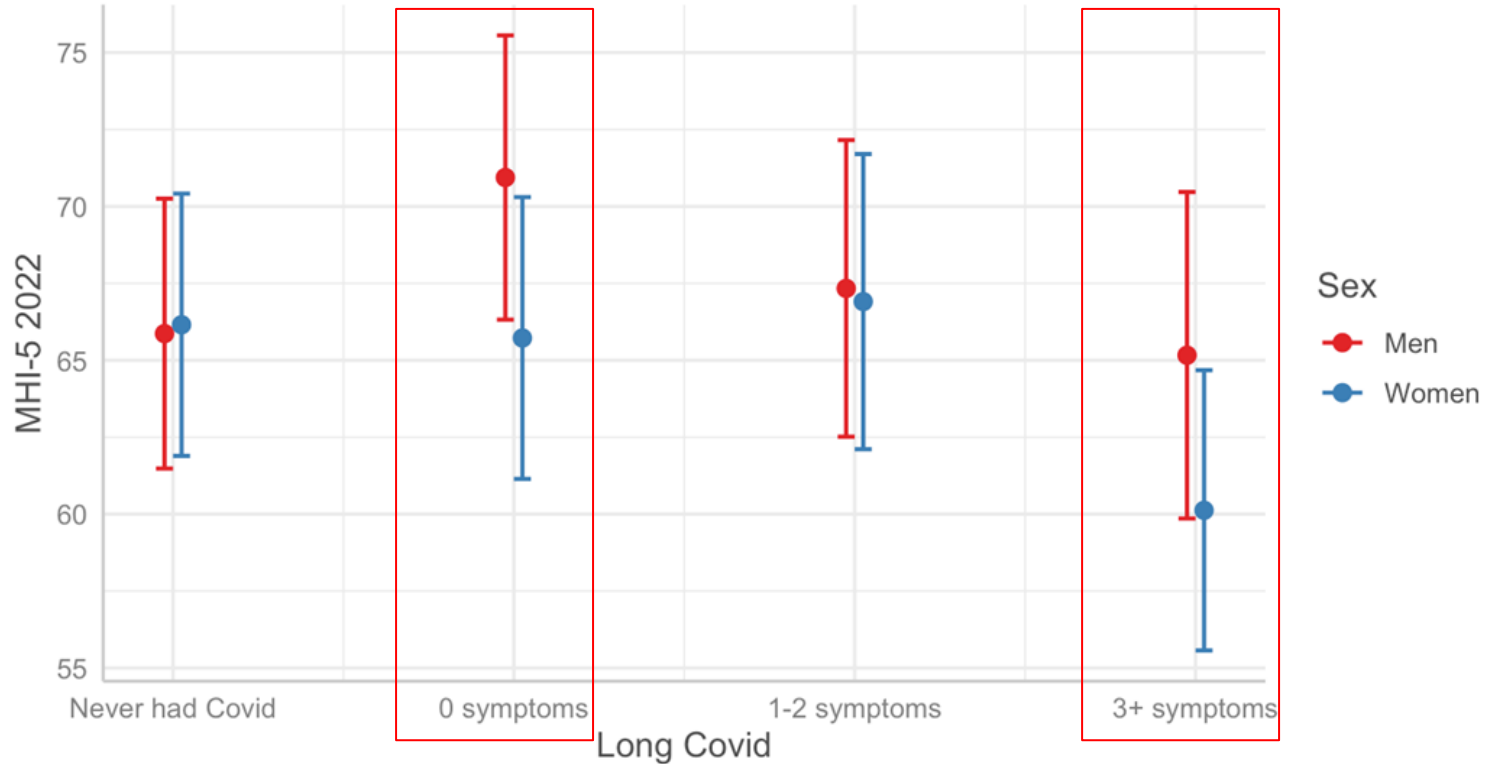


Figure 14. Marginal effects on interaction between gender and long COVID



Conclusions

RESULTS

- As a disease, COVID-19 had no *direct* impact on household income, but it did on mental health
- Psychologically, most people's mental health did not deteriorate. Still, for about ¼ it did. Mostly women and those who were already in poor health, unemployment, and blue collar work
- However, an infection with no post-COVID symptoms has a mental health 'survivor' effect (for men)

CAVEATS

We monitor changes in outcomes, but do not explore mechanisms (eg, telework) and confounders (eg, inflation)

Uniquely longitudinal and solid sample, but small and not representative of particularly at-risk groups

NEXT STEP: COCO-WaL SURVEYS: 9TH AND 10TH WAVES (2022)

- Two new modules fielded in October-November 2022 to take on board the 'Winners and Losers' project
- Questions: follow-ups of CoCo and retrospective assessments
- Rationale: unwrap continuity and changes from the pre-COVID period, weighing in on the effect of the COVID experience
- Focus on economic and psychological well-being

Thank you

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