

POLICY ANALYSIS BY PRAXIS

Socio-economic impact of COVID-19: Salary subsidy paid by the Unemployment Insurance Fund in 2020



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Context

- The salary subsidy was paid from March-June 2020 to an employee whose employer's activities were significantly disrupted due to extraordinary circumstances. The amount of the subsidy was 70% of the employee's prior wage or up to 1000 euros with the subsidy amounting to 50% of the employee's prior wage or up to 800 euros in June.
- The subsidy was paid if at least two of the three conditions were met: a 30% decrease in turnover or income compared to the same month in the previous year; a reduction in the wages of at least 30% of the employees; and/or a reduction in the workload of at least 30% of the employees. The corresponding reductions had to amount to at least 50% in June to qualify for the subsidy.
- A total of 17,500 institutions and 137,500 people were paid a subsidy, with the amount of subsidies paid being 256 million euros (Estonian Unemployment Insurance Fund, 2021¹).

Main messages

- Without the crisis measures, COVID-19 would have left more than 65,000 people out of work and increased the poverty rate by almost 4 percentage points (pp). Poverty would increase more for employed people in the 50-63 age bracket, men and people working in the processing industry or in the accommodation and food service sectors.
- With the help of the salary subsidy, the actual increase in poverty rates during the first wave of the virus averaged out at just 0.3 pp.
- The crisis itself has a strongly regressive effect on incomes, i.e. it reduces the incomes of poorer households relatively more. With the help of the measure, this effect was reversed and lower-income households lost less in income than wealthier ones.

Introduction

In the first few months of the COVID-19 crisis, the number of registered unemployed people increased significantly, but less than predicted. Thus, by the end of June 2020, the share of registered unemployed was 7.9% of people aged 16-64, which was 1.7 times higher than in the same period the previous year (4.7%) and 1.4 times higher than in February 2020 (5.7%). At the same time, the forecasts of the European Commission and the Estonian Unemployment Insurance Fund were clearly higher than the actual scale of the crisis, predicting that more than 100,000 people would become unemployed².

A number of measures have been taken to mitigate the effects of the crisis, the most important of which relate to the salary subsidy, in order to help prevent a rise in registered unemployment. One of the most central was the Unemployment Insurance Fund's salary subsidy measure, in which the fund compensated employers with salaries of up to 70% or up to 1000 euros, provided that the company's turnover, employees' salaries or workload had decreased by 30%. To qualify for the subsidy, two of the three conditions mentioned had to be met.

According to initial assessments, the compensation has been considered more successful than unsuccessful in reducing the effects of the crisis², but to date, no detailed analyses of the impact of the measure on the poverty rates, incomes or inequality of different socio-demographic groups have been published in Estonia.

Methodology

The analysis focuses on three scenarios that allow the impact of both the COVID crisis and the Unemployment Fund wage measure to be compared:

- (1) The baseline scenario without COVID or the wage measure
- (2) A scenario where the crisis occurred but no action was taken
- (3) A scenario where both the crisis occurred and the measure was implemented

The scenarios are based on population data for 2019 (N = 1.33 million), which include the annual income of and subsidies received by each person.

In Scenario (1), the raw data are first re-weighted to find the number of employed and unemployed people in 2020 in the absence of COVID. For this purpose, the Ministry of Finance's long-term forecast from autumn 2019 for employment and unemployment rates in 2020 (i.e. the last pre-crisis forecast) was used.

To assess a situation where the effects of COVID have materialised but no action has been taken (2), the JRC's analysis² was used, where the European Commission's QUEST macro-model estimates the decline in employment and the increase in unemployment in the event of a crisis.

In order to determine the impact of salary subsidies (3), the authors created a crisis measure within the EUROMOD policy framework in accordance with the rules of the Unemployment Insurance Fund, considering the actual number of unemployed and salary subsidy recipients added during 2020. When all scenarios are considered and participation in the measure is determined, the socio-demographic profile of the household and the sectoral employment figures are checked at the same time. The weighting of factors is based on the Pacifico (2014)³ approach.

In summary, the analysis is therefore as follows:

- The authors use the macro labour forecasts of the Ministry of Finance and the European Commission for both the end of 2019 and spring 2020. This is done in three scenarios in order to align the EUROMOD employment and unemployment input data for 2019 with the labour market shock and the crisis measure.
- The re-weighting takes place at the household level, i.e. the weights of all household members change in a similar way.
- As the number of those employed decreases and the number of those unemployed increases, the number of wage earners and recipients of unemployment benefits are re-weighted accordingly. At the same time, the population structure remains the same if it is checked simultaneously by age groups and gender.
- Remuneration for the compensation measure is determined in the occupied EUROMOD, where the authors created the policy rules according to the actual sectoral and age proportions of the beneficiaries¹.
- The results of the survey are presented for the anchored poverty line, unless otherwise stated.

Although this methodology closely follows the JRC 2020 analysis², a more detailed description is provided by the authors.

Results

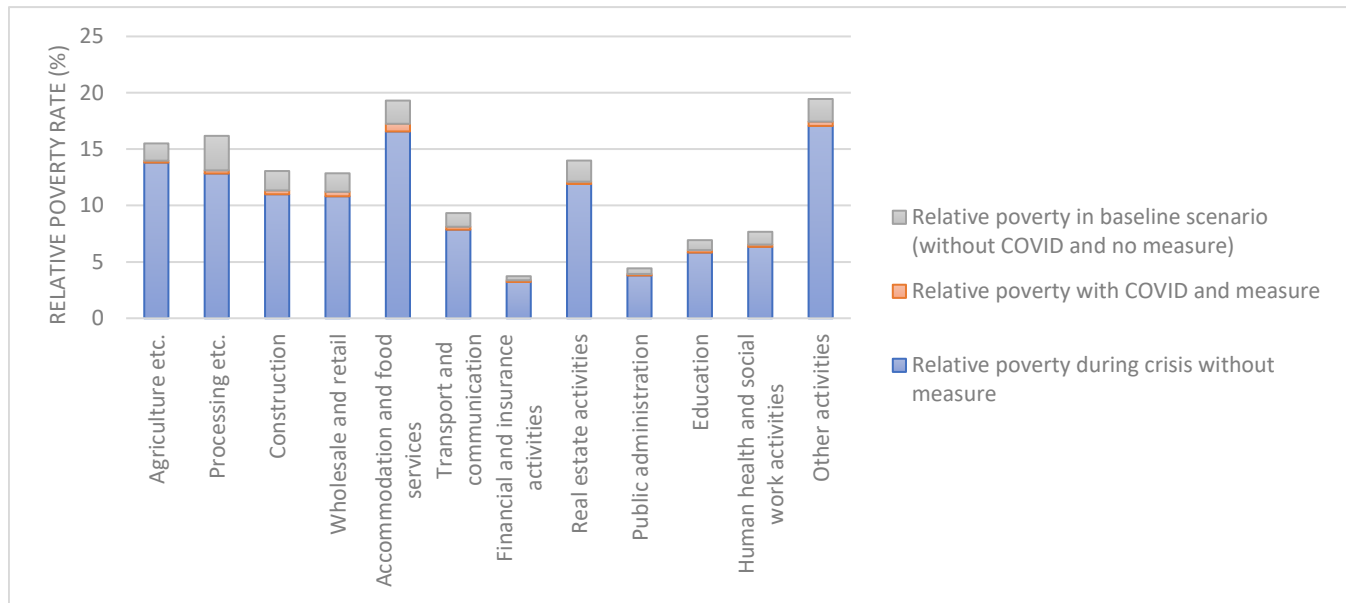
The results of the analysis confirm that the wage compensation measure helped to mitigate the negative effects of the crisis, including the impoverishment of households and the increase in inequality. Without the crisis measure, relative poverty would have increased by around 4 percentage points compared to the situation without COVID (21.6% vs 25.4%). During the implementation of the wage compensation measure, the average poverty rate of the population as a whole increased by just 0.3 percentage points during the first wave of the crisis (to 21.9%).

The impact of the crisis and the wage compensation measure on relative poverty varies across socio-demographic groups (see Table 1) and sectors of activity (see Table 2). Among areas of activity, the impact of the crisis was greatest in the processing, mining and energy sectors (where relative poverty increased by 3.3 percentage points), accommodation and food services (where poverty increased by 2.7 percentage points) and other sectors such as entertainment and leisure (where poverty increased by 2.4 percentage points). Financial and insurance workers were least affected by the crisis (with poverty increasing by 0.5 percentage points in these sectors). In most of these areas of activity, there were also more beneficiaries, and thus the impact of the wage compensation measure was greater, reducing relative poverty almost to the original level in some cases. Given the existence of the wage compensation measure, the poverty rate remained highest in the accommodation and food service sector, where relative poverty increased by 0.7 percentage points compared to the situation without COVID.

The analysis also reveals gender and age differences: both the crisis and the measure have a greater impact on relative poverty among men, and the working-age population is most affected by those aged 50-63 and least affected by those aged 25-39. At the same time, young people aged 16-24 are the most affected by the crisis as a whole, among whom the measure increases relative poverty by 0.5 percentage points compared to the situation without COVID.

In addition to the significant rise in relative poverty, the wage measure helped prevent inequalities from increasing. Whereas in a situation where COVID did not exist and the year was a normal one the GINI index would have been 0.3882, it would have risen to 0.4074 without the wage compensation measure. Together with wage compensation, in reality the GINI index fell slightly (to 0.3865). This is explained by the fact that people with lower incomes benefited more from the wage compensation measure and people with higher incomes lost relatively more. The central reason here is the replacement rate and the maximum rate of compensation.

Table 1. Impact of COVID crisis and compensation measure on relative poverty by sector of activity.



Source: Authors' calculations on the 2019 registry data of the EUROMOD microsimulation model

Table 2. Impact of COVID crisis and compensation measure on relative poverty by socio-demographic group and impact on GINI index

	Section	Prior to COVID	COVID without measure	COVID with measure	Impact of crisis	Impact of measure
Poverty line (€)	Anchored	593.25				
	Unanchored		549.3	585.2	-43.8	35.8
Relative poverty of population (%)	Anchored	21.6	25.4	21.9	3.8	-3.5
	Unanchored		21.4	21.3		
Gender	Men	19.8	23.9	20.2	4.0	-3.7
	Women	23.2	26.8	23.5	3.6	-3.3
Age	16 – 24	22.1	26.5	22.6	4.3	-3.9
	25 – 39	15.8	19.8	16.1	4.0	-3.6
	40 – 49	18.6	23.0	19.0	4.4	-4.0
	50 – 63	18.3	22.9	18.5	4.7	-4.4
Labour market status	Employed	9.7	10.9	9.5	1.3	-1.4
GINI index	Population	0.3882	0.4074	0.3865		

Note: The column 'Impact of crisis' shows the change in relative poverty before COVID vs COVID without measure; the column 'Impact of measure' shows the difference between 'COVID without measure' vs 'COVID with measure'. In the case of socio-demographic characteristics, the poverty line is anchored.

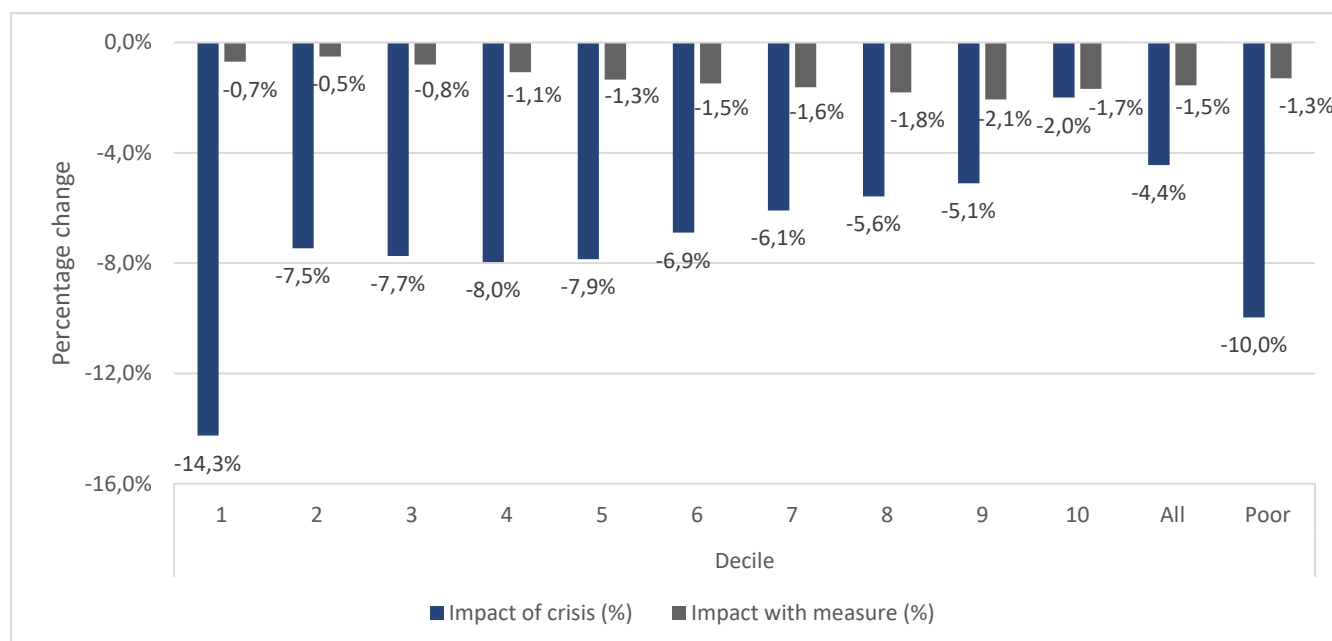
Source: Authors' calculations on the 2019 registry data of the EUROMOD microsimulation model

Figure 1 shows the impact of the pandemic and the measure by income deciles. The disposable income of households fell by an average of 4.4% without intervention and as a result of the crisis, but with the salary subsidy this decrease was just 1.5%. The crisis would also have had a regressive effect on incomes in the absence of the measure, reducing the incomes of households living in poverty by an average of 10% and by as much as 14.3% for households in the first income decile. At the same time, the reduction in the highest deciles would be between 2% and 5%. However, it is worth noting that the boundaries of income deciles are not fixed, i.e. people may move between groups as a result of a crisis or measure.

On the other hand, the salary subsidy measure clearly has a regressive effect and supports lower-income households. Whereas in the first decile the measure restores on average 13.6% of disposable income, in the second it restores 7.0% of disposable income, but for households with a median income this is only 6% and for households with the highest income only 0.3%. In other words, the measure has had a very strong inverse relationship with disposable income, on the one hand reducing the negative effects of the crisis, but at the same time supporting the most vulnerable households.

The employee was paid a 70% salary subsidy of their previous average income from March-June and a 50% salary subsidy of their prior income in June. The authors also assessed the impact of the measure on relative poverty in a situation where the salary subsidy would be 40% of the employee's previous income in all months. Such a change would have a rather small effect on relative poverty per year (just 0.1 percentage points). In interpreting this result, it should be borne in mind that the analysis here is based on annual data, and since employees could receive subsidies for up to three months, then although the effect of the change in the replacement rate on the employee is large on a monthly basis, the effect on income is smaller on an annual basis while maintaining employment. It has also been assumed that employees will remain in employment with a 40% salary subsidy, although the actual situation may be different. Thus, a lower subsidy does not preclude a situation in which some of the beneficiaries become unemployed in the hope of receiving an unemployment benefit with a higher rate of replacement, for which in fact around a third of newly unemployed people qualify. All in all, a person's income would also fall in other months, which in turn increases the risk of falling into poverty.

Figure 1. Impact of COVID-19 crisis and wage compensation on disposable income.



Note: The boundaries of income deciles are not fixed, i.e. people may move between groups as a result of a crisis or measure.

Source: Authors' calculations on the 2019 registry data of the EUROMOD microsimulation model

Conclusion

The salary subsidy has clearly been effective in mitigating the effects of the crisis, supporting the retention of employment and reducing the negative effects on relative poverty on average and across socio-demographic groups. In groups where the impact of the crisis has been greater (such as processing, accommodation and catering) there are also more beneficiaries and compensation has kept poverty close to pre-crisis levels. The measure has also helped to alleviate growing inequalities. While the net negative impact of the COVID crisis itself was clearly greater in the first wave for lower-income deciles, the loss of disposable income after the implementation of the measure was smaller for lower-income households than for higher-income households.

The main value of the measure still lies in retaining employment. Based on this analysis, the annual poverty rates and inequality indicators are insensitive to the size of the replacement rate, i.e. whether the employee is compensated with 70% or somewhat less of their salary. In other words, employees receive a reduced salary for up to three months but are still employed. After the payment of the subsidy, the wage is then largely restored, and employment is retained. In avoiding the risk of poverty, this is a significant gain for the worker compared to a situation where one falls into unemployment and almost half of those unemployed do not qualify for subsidies. At the same time, it is not advisable to pay salary subsidies for a longer period than at present if the costs would increase and the impact on poverty reduction would decrease.

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Project materials can be found online at:

- <https://c19majandus.ut.ee/avaleht>
- <http://www.praxis.ee/tood/covid-19-sotsiaal-majanduslik-moju/>