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Position Paper

The Austria Card:

An Inexpensive Model

Designed To Help End the Pandemic



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1 Executive Summary

- Studies suggest that monetary incentives and especially direct payments may increase vaccination coverage.
- Selective provision of monetary incentives for vaccination may weaken social cohesion.
- In order to preserve social cohesion, these payments should target both a) previously vaccinated as well as b) newly vaccinated individuals as long as they keep up to date with their required vaccines.
- With the *Austria Card*, every vaccinated Austrian would get a pre-paid card with a balance of 300 euros. This measure would be implemented in cooperation with the Austrian banking sector. The Austrian Card is an option to reduce administrative costs compared with alternative means of funds distribution.
- These pre-paid cards can only be used at participating Austrian businesses, e-commerce giants like Amazon would be excluded. Thus, the funds invested directly support the Austrian economy.
- This measure would cost approx. 2.5 billion euros, out of which about 20 per cent would immediately flow back to the federal government due to the VAT. Moreover, it could replace other support measures for the Austrian economy and would, because of the increased vaccination coverage, might rule out or reduce the length of further lockdowns. The weekly costs of a lockdown are estimated at about one billion euros. Thus, the savings and increased tax revenues would clearly exceed the costs.
- After almost two years of living in a pandemic, 300 euros would be a nice (but late) Christmas present for an exhausted population. Moreover, it would be a considerable signal of hope to end the pandemic and get back to normality. Finally, it could also help Austrian politicians to regain the trust of the electorate.
- Repeated rounds of the Austria Card would encourage individuals to keep up to date with their required vaccines.



2 Problem

Policymakers have considered monetary incentives to encourage unvaccinated individuals to get inoculated. Monetary incentives provide positive reinforcement to individuals who comply with vaccination mandates. Prior to any consideration of positive reinforcement measures, many individuals already chose to get vaccinated without any reinforcement. These individuals are likely to be disgruntled when other individuals receive incentives for a behavior they chose without incentives. Disgruntled previously vaccinated individuals may pose a threat to the success of subsequent rounds of vaccination mandates, as they may expect additional reinforcement to keep complying to vaccination requirements. At the same time, monetary incentives targeted to previously unvaccinated individuals alone are likely to increase mistrust towards vaccines, as the selective implementation fuels conspiracy beliefs.

3 What we know

Trubatch et al. already concluded twenty years ago in a study about hepatitis B vaccinations that even small monetary incentives significantly increase the vaccination coverage of hard-to-reach groups.¹ Moreover, Jecker showed that "payments were successfully used to increase vaccination for human papillomavirus in England, hepatitis B in the United States and United Kingdom, and tetanus toxoid in Nigeria."² In addition, Campos-Mercade et al. confirmed that monetary incentives also work in the case of Covid-19 by performing a field study in Sweden. Indeed, they concluded that "money had the power to increase participation by about 4 percentage points."³ However, both Jecker and Campos-Mercade et al. brought forward ethical caveats against such measures that particularly apply to countries with a very uneven distribution of both wealth and income, since poor people could be coerced to get vaccinated. In our view, despite its doubtless social and economic inequalities, this point does not really apply to the Austrian case since Austria is

https://www.science.org/doi/10.1126/science.abm6400

¹ Trubatch, Beth, Dennis Fisher, Henry H. Cagle and Andrea M. Fenaughty. 2000. "Vaccination Strategies for Targeted and Difficult-to-Access Groups." *American Journal of Public Health* 90(3): 447. Accessed November 25, 2021. <u>https://www.ncbi.nlm.nih.gov/pmc/articles/PMC1446179/pdf/10705870.pdf</u>. ² Jecker, Nancy S. 2021. "Cash incentives, ethics and COVID-19 vaccination." *SCIENCE*, accessed December 24, 2021.

³ Campos-Mercade, Pol, Armando N. Meier, Florian H. Schneider, Stephan Meier, Devin Pope and Erik Wengström. 2021. "Monetary incentives increase COVID-19 vaccinations." *SCIENCE* 374(6569): 879-882. Accessed November 25, 2021. <u>https://www.science.org/doi/abs/10.1126/science.abm0475</u>.



much more equitable than the United States. This is shown by the Gini coefficient, a "summary measure of income inequality [...] [that] ranges from 0, indicating perfect equality (where everyone receives an equal share), to 1, perfect inequality (where only one recipient or group of recipients receives all the income)."⁴ In Austria, this index stands at 0.3, while the United States' most recent result is 0.41.⁵ Consequently, we are convinced that monetary incentives to increase Austria's vaccination coverage should definitely be considered as an additional instrument for serious consideration for local decision makers.

Table 1

Vaccination	# of vaccinations	% of population	% of inoculable population
First Dose	6,477,022	72.64%	81.97%
Second Dose	5,967,446	66.92%	75.52%
Third Dose	3,465,440	38.86%	43.86%

Data accessed on December 23, 2021.

Source: Statistik Austria, Österreichisches COVID-19 Open-Data-Informationsportal des BMSGPK.

Currently, Austria has 8.92 million residents. Out of them, approx. 7.9 million are older than twelve and thus deemed part of the inoculable population. In addition, a further 521,000 are above five years old. As EMA has approved the Biontech/Pfizer vaccine for children on November 25, this group is now also potentially inoculable. Table 1 shows the number of Covid-19 vaccinations performed in Austria by December 23, 2021, as well as their percentage as measured against the whole population and the inoculable population above 12 years. Monetary incentives should have a direct impact and also include people that have already been vaccinated in order to preserve social harmony. Our model of the Austria Card can achieve both of these goals at surprisingly low costs.

⁴ United States Census Bureau. 2021. "Gini Index." United States Census Bureau, accessed December 24, 2021. <u>https://www.census.gov/topics/income-poverty/income-inequality/about/metrics/gini-index.html</u>.

⁵ The World Bank. No date. "Gini index (World Bank estimate)." *The World Bank Data*, accessed December 24, 2021. <u>https://data.worldbank.org/indicator/SI.POV.GINI</u>



4 Austria Card in Detail

With the Austria Card, every vaccinated Austrian would receive a pre-paid-card with a balance of 300 euros. The data is drawn from the electronic vaccination passport, and the measure is implemented in cooperation with the Austrian banking sector. The Austria Card can subsequently be used to shop at participating Austrian businesses, while e-commerce giants such as Amazon are excluded as we anticipate such exclusion as politically (if so) welcome to local politics. The costs of about 2.5 billion euros (see Table 2) thus fully support the Austrian economy by stimulating consumption. Consequently, this measure also works as a Keynesian stimulus, especially if multiplier effects in the mid- to long-run are taken into account.⁶ However, the Austria Card should, despite its positive Keynesian effect, not be seen in terms of economic ideology, but only on the grounds of its effects on the vaccination coverage of the Austrian population in conjunction to its economic stimulus.

Table 2

Costs of the Austria Card	
Already vaccinated	1,943,106,600 €
Unvaccinated > 12 y.o.	427,318,500€
Unvaccinated > 5 y.o.	156,315,300€
SUM	2,526,740,400€

According to the studies cited above, Austria's vaccination coverage would increase as a result of the Austria Card, thereby de facto ruling out another lockdown / significantly reducing the length of another lockdown and saving one billion euros per week. In addition, by stimulating demand, the Austria Card could replace some of current support measures for the Austrian economy. Furthermore, approx. twenty percent of the funds invested will immediately flow back to the federal government because of the VAT. Overall, the savings and increased tax revenues would significantly exceed the costs of the Austria Card. In addition, this measure could help

⁶ Dupor, Bill, Marios Karabarbounis, Marianna Kudlyak, and M. Mehkari. "Regional consumption responses and the aggregate fiscal multiplier." (2021).



Austrian stakeholders regain the trust of the electorate by giving the people a considerable signal of hope that the pandemic will finally be over. This psychological effect should not be underestimated.

The fight against the COVID-19 pandemic will require multiple rounds of vaccination mandates. Repeated rounds of the Austria Card as vaccination mandates become more regular would incentivize individuals to comply.⁷ Incentive designs, such as the Austria Card, that may incorporate longer-term incentives are more likely to succeed.

With that in mind, the Austria Card could become permanently important in the years ahead, thus requiring some updates to its implementation: 150 Euros in June (if the vaccination status of a person at this time of the year is up to date), and again in November. People would receive 150 Euros in November upon confirmation of valid vaccination status. Splitting between June and November corresponds to the "*Urlaubs- und Weihnachtsgeld*" (Holiday and Christmas extra payments) and would therefore be connected to a well-established tradition.

Such a multi-stage model might have an additional benefit: It could lead to increased demand for vaccinations in June when people realize that many got the payments. The model is also extendable: In the future, the government could, depending on the progression of the pandemic, consider doing another round.

The principles of nonselective implementation and the consideration of long-run incentives are general and can be applied to every vaccination campaign. The Austria Card proposition can substitute selective, and potentially costlier, campaigns, while it can complement policies that target vaccinated individuals regardless of their vaccination timing. The combined outcome of the Austria Card with current

⁷ Andreoni, James, and John H. Miller. "Rational cooperation in the finitely repeated prisoner's dilemma: Experimental evidence." *The economic journal* 103, no. 418 (1993): 570-585.



policy tools would be an increase in vaccination coverage and a reduction in health care costs. At the same time, the Austria Card can be a viable alternative to previously implemented vaccination campaigns that have lost traction.

5 Conclusion

This position paper shows that monetary incentives can increase a people's willingness to get vaccinated and, consequently, its vaccination coverage. Our model of the Austria Card would achieve this result at a low cost. We are happy to elaborate on our model and provide support for its implementation. Let us end the pandemic together!

6 Disclaimer

This Position Paper, which forms the summary of a larger more elaborate paper, was drafted to provide Austrian decision makers with an additional tool – based on quantitative models. This paper was not drafted for any specific political party nor are the authors affiliated with any political party. This paper rather constitutes an alternative thought approach for any local decision makers and are intended as an expert advice. Any opinions expressed in this paper reflect the views of the authors alone.

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