VACCINE REFUSAL IN ROMANIA. AN ESTIMATION BASED ON PUBLIC OPINION SURVEYS

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This article has been written in order to take into evidence the quantitative estimations with regard to vaccine refusal and even hesitation among the public in Romania. This is, of course, in the present context of the coronavirus pandemic. We believe that this descriptive approach to the current issue will be extremely useful and helpful. There are a lot of public opinion surveys run in Romania; however, most of the time, no one is looking back at them for a good period of time in such a manner as to achieve a longitudinal perspective of the phenomena investigated using these sociological methods.

Following sociological survey data, this paper aims at a comparative mapping of vaccine skepticism in Romania before and during the covid-19 pandemic.

Keywords: vaccine, vaccination, coronavirus pandemic, public opinion polls, vaccine refusal

The vaccine and vaccination process have been showing up sporadically as subjects in the public opinion surveys and even more consistently within the last 4–5 years in Romania (this being the aftermath of the debate surrounding the legislative proposal regarding mandatory vaccination for children and the problems caused by the high incidence of flu and measles within the same time period) and, especially during the last year, in the context of the global and national efforts made to combat the coronavirus (SARS-CoV-2) pandemic.

Unfortunately, since there is no focused institutional effort to gather the relevant sociological data, in order to better describe the situations mentioned above, we rely on isolated surveys made by various private research companies or institutions that do not abide by a standard methodology between them or even between each individual project, even when we are looking into data collected by the same marketing This greatly reduces research group. the compatibility of the available data and the possibility of applying a good portion of the specialty literature's well-known concepts, which could benefit greatly from standardization at the sociological survey's operational level. What we do have is a great variation in how we formulate

our questions and even in the indicator lists used to describe the aforementioned phenomena statistically.

Even so, we do believe that a statistical journey through the data and its interpretation in order to form a secondary analysis (at least to observe how public opinion on vaccination has evolved within the last few years, especially the levels of refusal related to vaccination within the Romanian public) will allow us to gain a more pragmatic understanding of this sector of public opinion. This understanding is extremely useful given today's context and, of course, any other similar events that the future might bring.

Considering the fact that we are discussing data gathered by multiple operators on the research market, a theoretical discussion regarding the concepts within the scale spectrum of acceptance, trust, hesitation, and refusal of the vaccine is no longer useful. We believe these concepts rely heavily on how the surveys were designed and how the questionnaires were built, individually, for each survey. Our work has a very pronounced empirical character, and as such, most of the citations are going to be towards the research reports that we have analyzed.

We have selected a few studies to analyze, which, given our experience in this field, we deem to be serious and bring new elements to pinpoint the significant moments from the last 4–5 years in the public debate about vaccination in Romania.

We have split this longitudinal perspective into three moments: before the Covid-19 pandemic; the pandemic. before any during public announcement about a vaccine was made (which has defined the reality of vaccination as a solution for the pandemic in a reasonable timeframe); during the pandemic but after the vaccine has emerged (this is also the period of time we are now living in, as we write this material). It should be noted that, since December 2020, we have already started the vaccination campaign, and now, in March 2021, we are practically in the middle of the campaign, which seems to be successful in Romania at this time, compared to other countries, including countries in the EU). Time is of the essence in evaluating the public opinion's attitude towards vaccination, especially since we are discussing a vaccination process that is being developed in the middle of the pandemic, as it is happening right now. Public opinion is, as expected, very sensitive to scientific success, media debates about vaccination, visual vectors from the medical field, and also to the mediacovered cases (even isolated ones) where the vaccination has been associated with particular issues.

It is however critical to mention that our fundamental hypothesis was, at the beginning of the pandemic, that this entire Covid-19 episode, with the upheaval that it has brought upon our dayto-day lives and the long-term restrictions which seemed to be echoes from our recent past etc. – that it would be perfectly normal to expect the public opinion's "appetite" for vaccination to grow, as the only method of overcoming an uncomfortable, dangerous and restrictive period for, essentially, everyone. We will discuss more in Conclusions whether this hypothesis stands after one year since the pandemic started, multiple media debates on the anti-covid vaccine, and during the full vaccination campaign.

SKEPTICISM AND VACCINATION BEFORE THE COVID-19 PANDEMIC

In this section, we will stop to look at two sociological measurements made shortly before the SARS CoV-2 pandemic: an IRES survey made in 2017 and an INSCOP survey made at the beginning of 2019, exactly one year before the pandemic started.

The IRES¹ study's main subject is about the legislative project regarding vaccination, and it does not contain (or was never shared with the public) an explicit question about the general acceptance (or disagreement and refusal) about vaccines and vaccination. The study does, however, contain two questions from which we can obtain a quantitative evaluation of the skepticism regarding the vaccination: 29% of the respondents say that they agree with the statement that adverse drug reactions of vaccines are higher than the benefits. The second question is evaluating the public opinion towards vaccines from the National Program of vaccinating children - 15% of them say that some vaccines are not good for children, 1% of them say children should not be vaccinated, and 83% say that vaccination is good and children should be vaccinated (1% DK/NA).



IRES - 2017 - 29% of the respondents say that they agree with the statement that adverse drug reactions of vaccines are higher than the benefits



INSCOP - 2019 - 10.3% say that the risks of vaccination are much greater than the benefits

Two years later, a larger study dedicated to the general issue of vaccination, the one conducted by INSCOP², shows that 28.7% of people said that they are neither against or for vaccination and consider that the vaccination process is a complicated issue and it must be evaluated from case to case – 10.3% said that the risks of vaccination are much greater than the benefits of vaccination. In this very same study, 20.8% of the attendees have said that the only reason that they have agreed to vaccinate their children is that it is mandatory in order to enroll the children into pre-school.

In 2019, the INSCOP study revealed that 8.1% of the people believe that vaccinating the kids is not necessary, and 4% have said that they have not vaccinated their children (or their grandchildren, depending on the case) as per the National Vaccination Program.

Another variable that could indicate the hesitation towards or refusal of vaccination is the question related to mandatory vaccination of children in order to be allowed to enroll in school or pre-school. In 2017, 12% of the respondents had said that they have a bad or very bad opinion about the fact that they can only enroll their children into a collective body only after they obtain the written legal evidence that the child has been vaccinated, according to the National Vaccination Program. In 2019, 24.4% of them said that they do not agree with mandatory vaccination for kids in order for the latter to be allowed into pre-school or school.

We should also mention that, in the context in which vaccination was not tied to a specific situation, like the pandemic we are confronting nowadays, a direct question about the agreement with vaccination was arguably not the most relevant. Agreement, hesitation, and refusal of vaccination were better measured in this context with a set of specific questions. For now, we are simply taking note of the questions above for the pre-pandemic situation.

SKEPTICISM AND VACCINATION DURING THE COVID-19 PANDEMIC

Starting with March 2020, Romania is clearly and officially affected by the pandemic. Administrative and medical actions are being taken, restrictions that most people have never seen before are being implemented. March and April are national lockdown months for Romania as well as in most European countries.

Our hypothesis was that after such an episode in their lives, the public's appetency for vaccination (generally speaking, not just against covid) was expected to grow, given that the vaccine is the only solution that could bring the country and the world back to a state of normalcy at least similar to the one we had before the pandemic. After all, vaccination was not a strange concept to the public compared to the restrictions that were unimaginable one or two months before the covid virus arrived to Europe.

One year since the debut of the pandemic, we observe that the anti-vaccine movements have not just persisted; they have created new theories exclusively about the anti-covid vaccine. These are not, however, the subject of this paper. Let us continue to observe how public opinion has evolved regarding vaccination during the pandemic.

It is obvious that the restrictions imposed in the efforts of trying to manage and contain the Covid-19 pandemic have affected, like many other industries, the research market industry. Since many commercial activities have been reduced, most of the contracts in the field of collecting sociological or marketing data were devoid of purpose. Even worse, some interactions required in sociological research, like questionnaires conducted face-to-face or at the subject's residence, qualitative interviews, or focus groups with a physical presence, have become impossible, at least during the first part of the pandemic. Moreover, we find more studies related to how public opinion perceives the pandemic and all its associated phenomena in the summer and fall of 2020 when some restrictive measures have been lifted. These studies are more methodologically valid to form a long-term perspective. After going through the shock dealt by the restrictive measures taken in April-March, the summer and autumn of 2020, the public is more used to the idea of the pandemic, has already seen its effects, and witnessed many media debates on this subject. The vaccine was no longer a theory, and the public opinion practically had time to mature with regard to the pandemic.

We will cite here two studies: a global IPSOS survey (with a sample that includes Romania) from July–September 2020 and a national LARICS survey published in November 2020, which was actually conducted even before the announcement of the first vaccine against Covid-19.

IPSOS³ conducted an international survey (28 countries), and in that survey, Romania is among the last countries in terms of confidence in a future vaccine for Covid-19. In this study, **43% of Romanians said that should a vaccine against** Covid-19 emerge, they would not get it, and 57% said they would get vaccinated.



IPSOS - July-September 2020



Cel mai probabil, pandemia de Covid19 va fi stopata cu ajutorul unui vaccin. Daca un asemenea vaccin ar fi disponibil in urmatoarea perioa

LARICS – 2020 - 38.6% of respondents said they would not get vaccinated against the coronavirus/ 26.6% said that the risks of vaccination outweigh its benefits

One of the key questions (multiple choice) in this study is related to the reasons why participants in the study do not want to be vaccinated against covid-19 (worth bearing in mind that it was addressed only to those who said they would not get the vaccine). The main reason respondents gave for not wanting to be vaccinated is the fear of side effects - 66% of Romanians who answered this question mentioned this fear. The second reason for not getting vaccinated is that people do not trust the effectiveness of the vaccine, 33% of Romanians do not trust the vaccine. Interestingly, in this study, the third reason Romanians give for refusing to get vaccinated against the coronavirus is that they are against vaccination in general (23%) of respondents).

On the one hand, in the study conducted by LARICS⁴ in October, there is a very interesting question related to vaccination against covid-19, whereby 38.6% of respondents said they would not get vaccinated against the coronavirus, and 30% said that they would get vaccinated, but not as soon as the vaccine appears. They said that they preferred to wait for other people to get vaccinated before them so that they could monitor the side effects that should occur. Also, 8% of people said they would get vaccinated if the vaccine were

better explained to them, only 21.8% of respondents said they would get vaccinated for sure. Also, in the LARICS survey from October 2020, 44.2% of respondents said that vaccination should be evaluated for each individual case for it is a more complicated issue than it seems, and 26.6% said that the risks of vaccination outweigh its benefits. Only 25.5% agreed that the benefits of vaccination outweigh the risks – of course, the benchmark for these responses was the covid-19 vaccine, which skeptics rejected primarily for being a new vaccine.

We note that at this time, in the summer/autumn of 2020, but before the announcement of the first vaccine, about 40% of Romanians refused the idea of getting vaccinated against Covid-19.

AFTER THE EMERGENCE OF THE VACCINE

The next study that we shall analyze is the one conducted by Avangarde⁵ in November 2020. It is a phone survey, run over a short period of time, which slightly overlaps the moment of the public announcement of the first anti-covid vaccine being approved, whose delivery to the European

countries would begin in December 2020/ January 2021. Let us not forget that this moment is also the one when the image vectors of the medical field communicate frequently with the mass media on the topic of the upcoming vaccine, with the express purpose of reducing the anxieties of the populace, which had been revealed in the previous surveys, regarding this new type of vaccination.

In this study, 25% of Romanians said they would never accept to be vaccinated against Covid-19 when such a vaccine should become available, and 36% said that they would want to be vaccinated, but only after a period of time needed to monitor the possible strong side effects among the already vaccinated segment of the population. Moreover, among those who said that they would definitely not get the vaccine, 72% said that they do not believe in the efficiency of this vaccine, whereas 24% said that they do not believe in vaccines in general.

In January 2021, therefore after the vaccination campaign was de facto in Phase 1 in our country, we have an abundance of national surveys on the topic of the anti-covid vaccine and vaccination process: Avangarde, IRES and INSCOP make such data sets available to the media and the larger public.

In the survey conducted by Avangarde,⁶ we observe that 35% said that would definitely get vaccinated and **30% said they would definitely not** get vaccinated against covid-19, taking into consideration that a part of the population has already been vaccinated. On the question regarding the trust they have in the efficacy of the anti-covid vaccines, 39% said that they are more likely to not trust it, whereas 37% said they are more likely to trust it. In addition, we can readily make note of the fact that 24% of respondents declare themselves against vaccination and 37% are for vaccination, while 27% say that do not have a well-formed opinion nor are they interested in the subject.



Avangarde – 2020 - 25% of Romanians said they would never accept to be vaccinated against covid-19 when such a vaccine should become available/ 72% said that they do not believe in the efficiency of this vaccine, whereas 24% said that they do not believe in vaccines in general



Avangarde - 2021



INSCOP - 2021 - 39.4% said they do not want to be vaccinated against covid-19 during this year

In the survey conducted by IRES⁷, still in January, we observe that 9% of the respondents said they have a very bad opinion on vaccines, in general, and 9% said they have a bad opinion. Only 22% said they have a very good opinion on this subject and 57% said they have a good opinion. Of the 18% who said that they have a bad and very bad opinion on vaccines, 30% of them said that the main reason for their bad opinion is that vaccines have side effects and 18% said that they do not believe in vaccines and do not agree with them. With regard to anti-covid vaccines and their safety and efficacy -26% said that they are safe to a small degree and 20% said that they are safe to a very small degree or not at all. Of all the respondents to the survey, 22% said they would definitely not get vaccinated and 9% said that they would most probably not get vaccinated. Of the 31% who said that that would probably or definitely not get vaccinated, the majority said that they do not plan to be vaccinated because they are afraid of the side effects of the vaccine (27%), because they do not trust these anti-covid vaccines (23%), while 12% said they do not believe in vaccines in general.

The study conducted by INSCOP⁸ shows that 21.4% of the respondents believe that the risks of vaccination outweigh the benefits and 41.4% do not trust the process of approval given to the anticovid vaccines at the level of the medical institutions of the European Union. Of all the respondents, **39.4% said they do not want to be vaccinated against Covid-19 during this year, and of these latter ones, 49% said it is a definitive decision and 49% said they might change their mind in the future.** Of the ones who said they choose not to be vaccinated, 30.9% said they do not want to get the vaccine because they fear the side effects, 26.8% said they are not convinced of the efficacy of the vaccine and only 5.8% declared themselves to be against vaccines in general.

Therefore, after the emergence of the first vaccine and after the vaccination campaign has already started in Romania, we can observe that 30% (Avangarde) and 31% (IRES) said they would not get vaccinated. These percentages are slightly more favorable to vaccination when compared to the ones before the vaccination campaign even begun. As to the reasons for not accepting the vaccine, we can see that before the beginning of the campaign, the most frequently given ones against anti-covid vaccination are the side effects (66% Ipsos) and the second reason was the lack of trust people have in the efficacy and safety of the vaccine (33% Ipsos). After the campaign started rolling, of the ones who declared that they would not be getting the vaccine in the INSCOP study: 30.9% said they do not want to be vaccinated because they fear the side effects, 26.8% said they are not convinced of the efficacy of the vaccine (INSCOP) and in the IRES study: they said they do not want to be vaccinated because they fear the side effects of the vaccine (27%) and because they do not trust these anti-covid vaccines (23%).

Before the vaccination campaign even began, 23% of those who said that they would not get the vaccine against Covid-19 said that they chose not to do it because they are against vaccination in general (Ipsos), whereas, once the campaign started in earnest, only 5.8% (INSCOP) and 12% (IRES) of the ones who said they would not get vaccinated against Covid-19 also declared to be against vaccination in general.

CONCLUSIONS

The pandemic was rapidly installed, including in our country, and it was perceived as a total social fact, if we take into account the issue that, ever since the beginning, it entailed unprecedented restrictions, at least in our lifetimes. Our hypothesis, when we began monitoring the ongoing social phenomena and public opinion, was that such a program of restrictive measures would lead to an increase in the acceptance level of the vaccine and the vaccination of the population, as an only solution to overcome this milestone of medical crisis.

Of course, we also took into account that, in the last few years, as the access to health-related information was democratized (together with the proliferation of conspiracy theories and messages pertaining to the anti-vaxx movement on social media), the acceptance of the existence of the pandemic, as well as the necessity for vaccination could not have been exempt from denial, hesitation and other such social reactions. However, we were entirely convinced that, as the need to return to a world resembling the pre-pandemic one grew stronger, the motivation for vaccination would be very high and the anti-vaxx campaigns would be regarded as rather bizarre episodes of the fight against Covid-19.

Nevertheless, at least partially, the pandemic fueled the anti-vaxx movement with new topics. Some of them quite paradoxical: for instance, many who oppose vaccination also oppose the restrictions generated by the necessities to manage the pandemic.

In short, as supported by the data above, once the Covid-19 pandemic was acknowledged and quarantine/lockdown measures were imposed, attention in the public space started gravitating towards the expectation that some vaccine variants would help us overcome the situation. And yet, in this very context, the public was no more favorable to vaccination than before the pandemic, we could even say that it was against vaccination in a larger proportion, when we refer specifically to anti-Covid vaccination.

In November 2020, when vaccination becomes a close and safe perspective and the authorities announce that they are already working on a national plan to administer the vaccine, an increase in the appetite for vaccination begins to become visible, which also results from the slight reduction of the percentages in the segments that either directly refuse or are hesitant about the vaccine. This tendency is maintained at the beginning of 2021, when the implementation of the vaccination program becomes a certainty. We expect the hesitation and refusal regarding the anti-covid vaccination to continue decreasing as the vaccination program goes forward, notwithstanding the issues that might arise (see the episode with the problematic Astra-Zeneca batches of March 2021).

Last but not least, a paradox that, this time, helps with the acceptance of the vaccine by the larger public: the fact that the vaccination schedule was made according to rather strict criteria and categories, as well as the fact that vaccine stocks go through some unexpected shortages, have transformed the vaccine into a scarce resource and asset, which in turn made it sought after by the "hesitant" public. The perception that medics, military, police and secret service people, and even high-ranking administrators "jostle" for the first available spots in the vaccination schedule, has created a type of valorization of the vaccine among the social segments that were previously skeptical or uninterested in this issue. In a nutshell, a parallel conspiracy-laden narrative that actually aids in the popularization of the vaccine.

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