Annex 7 USAID/ENGAGE Citizen Awareness and Engagement Propensity Score Matching

ENGAGE
Enhance Non-Governmental Actors
and Grassroots Engagement

Re: Propensity score matching Analysis of Ukrainians civic engagement and awareness
From: USAID/ENGAGE
To: Interested parties
Date: March 18, 2019

The main goal of USAID/ENGAGE is to increase citizen awareness of and engagement in civic activities at the national, regional and local level and for realization of which the program seeks to develop and utilize variety of methods in programming activities to involve citizens. During first two years of program more than 22 000 people were directly engaged in public activities and 15.7 million indirectly via communication campaigns.

To monitor the trends of civil society development on national level ENGAGE use Civic Engagement Poll (CEP), which is representative poll on national and macro regional levels with sample over 2000 people. CEP includes range of questions among which are that measures level of awareness of civic engagement mechanisms and civic engagement. Having awareness was defined as knowing 10 or more awareness mechanisms. Civic engagement was defined as using at least one of 13 engagement mechanisms during the last 12 months.

At the same time program developed internal register of direct participants whom agreed to share their contact data for further communication. Based on the register information the sample from people aged 18+ was selected and the same CEP questioner as for general populations was disseminated. And one of the first findings was that there is tremendous difference in level awareness of civic engagement mechanisms between direct participants of ENGAGE's activities 35% knows at least 10 types of instruments and for general population – 13%.

The first brief analysis of two polls demonstrated that ENGAGE's intensive work on gender questions and on Eastern Ukraine influence on participants' data and reflected in total representative's share of female and region participants. Also, participants were noticeably younger in comparison to national sample. Based on first analysis results these two samples are not homogeneous enough for direct comparison. And the answer to the question: what the reason of such difference is because of ENGAGE's activities or other factors played role, is not so straightforward.

Difference between two samples except some demographic dimension dissimilarities has one reasonably major – participation in CSO activities. National sample is representative for all population and only around 17% participated in CSO activities in comparation to ENGAGE participants that have been affected by such initiatives. In other words, maybe because people participate in CSO activities they are already more aware and very limited ENGAGE impact is on the abovementioned difference.

To solve the dilemma and receive statistically representative results the propensity score matching method was selected. This approach helps to control observed variables and strengthen
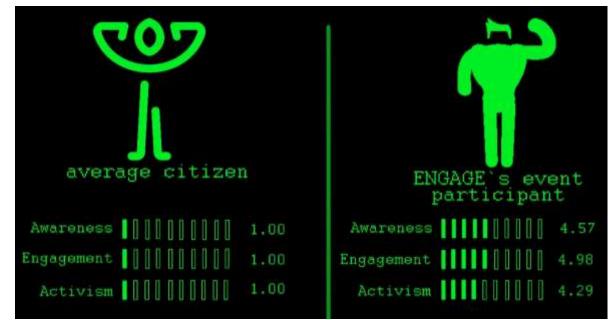
causal arguments because of reducing selection bias in quasi-experimental and observational studies.

ENGAGE participants were matched with a person from the national sample by region, age, gender, and level of engagement in CSO activities. The nearest neighbor algorithm was selected for matching. To extend the analysis and focus not only on awareness the engagement dimension was added.

Prior to running the analyses with the matched dataset, analysis was done overall national poll sample to ensure that those whom were selected as a matched control were no different than those were not selected as a match. After controlling for the matching variables, there were no significant differences in either awareness or engagement within the national sample, giving confidence that the matched control group was reflective of the national sample within the matching criteria.

In order to assess whether there was a difference in awareness and civic engagement after between those who participated in ENGAGE compared to those who did not, propensity score matching approach was used to minimize the potential bias due to the self-selection in ENGAGE.

Using the matched data set, logistic binomial regression analysis was applied to assess whether there was a difference in awareness and engagement between those who participated in ENGAGE events versus those who did not. Graphical representation is on pic.1 below.

Picture 1. Difference between general population (average citizen) and participants (ENGAGE's event participant)

In more details, description of graphical pic. 1 representation of binominal regression results are following:
- A person who participated in ENGAGE events is 4.57 times ($p<.001$) more likely to be aware than the average citizen in the same region, age group, gender, and with the same level of CSO activity. (Awareness, pic. 1)
- A person who participated in our events is 4.98 ($p<.001$) times more likely to engage in civic activities than the average citizen in the same region, age group, gender, and with the same level of CSO activity. (Engagement, pic. 1)

- A person who participated in ENGAGE events still is 4.29 (p<.001) times more likely to engage in civic activism than the average citizen even after controlling for awareness in the same region, age group, gender, and with the same level of CSO activity. (Activism, pic. 1)

To sum up, results of propensity score matching demonstrates that people exposed to ENGAGE activities are more aware, engaged and active. Hence, these evidences support achievements related to main program goal increase citizen awareness of and engagement in civic activities at the national, regional and local level. Moreover, the best way to get a person whom is aware of engaged in civic activities is to contact with ENGAGE's event participant.

Conclusions

- ENGAGE supported events reached the target audience and supports main program goal on increasing awareness of and engagement in civic activities.
- Participants' register in fact is the list of people with statistically significant higher level of awareness and engagement and can be used as an asset (resource) for further program activities.
- For further program next steps, on one hand propensity score matching demonstrates results and outcomes that support strategy (way of implementation) of the first program half and on the other, findings of other research and analytical learning papers should be considered for better reinforcement and synergy of efforts.