Barriers for participation in HIV vaccine trials among general population in Argentina: first interim survey

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Background:
- Despite the availability of a wide range of effective HIV-prevention tools in recent years, the rate of new infections in adults worldwide has not shown a notable decrease.
- Many recent advances in the HIV prevention landscape have been developed. However, an effective vaccine remains the most promising tool to end the HIV-1 pandemic. Increased industry involvement, mobilization of resources, expansion of a robust pipeline of new concepts, and robust preclinical pivotal studies will be essential to accelerate efficacy testing of next generation HIV-1 vaccine candidates.
- Among the myriad factors related to HIV-vaccine research, one key aspect in conducting clinical trials is finding potential candidates that are willing to participate.
- HIV-vaccine acceptability studies have been conducted in the US and developing countries. This topic has not yet been evaluated in Argentina.

Materials and Methods:
- An anonymous online survey was administered from September to December 2019 among individuals (age between 18 to 60 years) who sought HIV testing services at a referral HIV clinic in Buenos Aires, Argentina, or who looked up information on its website and/or social networks.
- The survey captured attitudes towards a potential HIV vaccine, willingness to participate in an HIV vaccine trial and use of pre-exposure prophylaxis (PrEP).
- A cross-sectional analysis was performed.

Results:
- 838 participants completed the online survey (self-reported gender: cis-male 56.6%, cis-female 38.1%, non-binary 3%, transgender 2.4%). Among cisgender-men, 81.22% self-reported as MSM (n=385).
- Median age was 29 (IQR 24-36) years.
- 83.6% referred living in Buenos Aires and surrounding areas.
- Information regarding demographic profile and sex-related substance use is shown in table 1.
- Regarding participation in an HIV-vaccine trial, 60.6% reported they would agree to join a study, 29% would consider it, and 10.4% would refuse.
- The main barriers for participation were fear of being infected by the HIV-vaccine candidate (40.6%) and lack of time to participate in a trial (20.4%); 37.6% of the participants referred no obstacle for potential participation.
- Participant attitudes towards an HIV vaccine and PrEP are described in table 2.

Conclusion:
- This is the first survey conducted in Argentina to assess attitudes towards HIV vaccine trials.
- Although survey information specified that the vaccine candidate was not infective, main barrier to participation was fear of acquiring HIV due to the vaccine itself.
- Our study reflects the importance of education and the correct explanation of research protocols to potential participants.
- Since the study was carried out among individuals seeking health-services information, selection bias may apply.
- This report provides initial data to continue exploring an area of recent interest in our country.

Table 1. Demographic profile and sex-related substance use in 838 participants in an online HIV vaccine survey in Argentina. Values are numbers (percentages) unless otherwise stated

| VARIABLE                  | VALUE (N,%):  
|----------------------------|------------------------
| AGE, MEAN (SD)            | 30.5 (8.5)             
| SEX AT BIRTH              |                         
| MALE                      | 500 (59.7)             
| FEMALE                    | 338 (40.3)             
| SELF-PERCEIVED GENDER     |                         
| CISMAN                    | 474 (56.6)             
| CISWOMAN                  | 319 (38.1)             
| NONBINARY                 | 25 (3.0)               
| TRANSMAN                  | 8 (1.0)                
| TRANSWOMAN                | 12 (1.4)               
| EDUCATIONAL LEVEL         |                         
| PRIMARY                   | 16 (1.9)               
| SECONDARY                 | 248 (29.6)             
| TERTIARY                  | 174 (20.8)             
| UNIVERSITY                | 400 (47.7)             
| HEALTH INSURANCE          |                         
| NO                        | 216 (25.8)             
| YES                       | 622 (74.2)             
| CONDOM USE                |                         
| NO                        | 216 (25.8)             
| YES                       | 622 (74.2)             
| COCAINE USE               |                         
| NO                        | 796 (95.0)             
| YES                       | 39 (4.7)               
| AMPHETAMINE USE           |                         
| NO                        | 773 (92.2)             
| YES                       | 60 (7.2)               
| POPPER USE                |                         
| NO                        | 773 (92.2)             
| YES                       | 60 (7.2)               

Table 2. Attitudes towards an HIV vaccine and pre-exposure prophylaxis (PrEP) in 838 participants in an online survey in Argentina. PNTD = “Prefer not to disclose” / IDK = “I don’t know”

| VARIABLE                                      | VALUE (N,%):               
|-----------------------------------------------|-----------------------------
| WOULD YOU PARTICIPATE IN A HIV VACCINE CLINICAL TRIAL? |                         
| YES                                          | 508 (60.6)                 
| MAYBE                                        | 243 (29.0)                 
| NO                                           | 87 (10.4)                  
| WOULD YOU RECEIVE AN HIV VACCINE IF PART OF YOUR REGULAR IMMUNIZATION SCHEDULE? |                         
| YES                                          | 744 (88.8)                 
| MAYBE                                        | 78 (9.3)                   
| NO                                           | 16 (1.9)                   
| WOULD YOU USE PREP IF AVAILABLE?             |                             
| YES                                          | 508 (60.6)                 
| IDK WHAT IT IS                               | 243 (29.0)                 
| MAYBE                                        | 243 (29.0)                 
| NO                                           | 87 (10.4)                  

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