Version 1.0
4, October, 2021

Executive Summary
COVID-19 Mobile Phone Survey

1. Overview

This report summarizes results from the Philippines COVID-19 Mobile Phone Survey implemented in September, 2021. COVID-19 has altered the way that survey data are currently collected to protect the health and safety of those conducting surveys as well as stop potential disease transmission. However, effective and rapid decision making during all stages of the pandemic still require data not only about infections, but also about human behavior. Mobile phone surveys can offer the opportunity to collect real time data on behavior, exposure, knowledge and perceptions as well as care, treatment and resource allocation. To understand how Filipinos are coping with the spread of COVID-19, a nationwide survey was conducted to understand people's attitudes toward and experiences during the pandemic.

In the survey 2,430 individuals subscribed to Globe, Smart, and Sun mobile phone networks anonymously participated in the survey using short message service (SMS) and mobile web modes.

This survey used the infrastructure that was built to conduct the Bloomberg Philanthropies Data for Health Initiative Non-Communicable Diseases Mobile Phone Survey. The COVID-19 Survey was the culmination of significant work by the Department of Health, including but not limited to telecommunications approval from the Philippines National Telecommunications Commission, agreements with mobile network aggregators, data hosting, and management at the Department of Health's Epidemiology Bureau (EB), Public Health Services Team (PHST), Disease Prevention and Control Bureau (DPCB), Systems Integration and COVID-19, Mental Health, Health Promotion Bureau (HPB), Communications Management Unit (CMU) at the Department of Health.

The Department of Health led questionnaire development, sampling and data collection. Technical assistance was provided by the US Centers for Disease Control and Prevention, and InSTEDD. Bloomberg Philanthropies Data for Health Initiative provided financial support through the CDC Foundation.

This report is structured as follows:

- Goals (Section 2)
- Design and Implementation (Section 3)
- Results (Section 4)
- Conclusions (Section 5)

2. Goals

The goal of the Philippines COVID-19 Mobile Phone Survey was to provide nationally representative estimates of knowledge, attitudes and practices, vaccination receptivity, and accessibility to testing to improve and enhance the COVID-19 pandemic response in the Philippines. The results may be used to help shape the governments' response to the pandemic and indicate whether the current strategies are effective.

The COVID-19 Mobile Phone Survey included 31 questions on the following topics:

- Demographics
- Noncommunicable disease risk factors
- Testing and diagnosis and testing availability
- Mitigation practices
- Vaccination receptivity

3. Design and Implementation

3.1 Design

The design parameters used for the COVID-19 Mobile Phone Survey are shown below in Table 1.

Table 1. Mobile Phone Survey Design

Component	***Design***
Mode	SMS and mobile web
Mode Strategy	The primary mode of contact was SMS with mobile web as the fallback. The "fallback" mode initiated if the respondent did not complete the survey in the primary mode.
Sample	A two-phase sample of mobile phone numbers generated via random digit dialing (RDD), using the mobile phone prefixes for Globe, Smart, and Sun stratified by age and sex in the second phase.
Number of Interviews	2,430 interviews, allocated proportionally across strata to the general population distribution.
Strata	4 strata, created by crossing sex (male, female) with age (18-34, 35+)
Questionnaire	The COVID-19 Mobile Phone Survey questionnaire, included 31 questions in 2 languages: Filipino and English.
Contact times	All 7 days of the week, between 8am and 8pm each day
Contact attempts	• Contact #1: SMS • Contact #2: SMS, 26 hours after Contact #1 • Contact #3: Mobile Web, 26 hours after Contact #2 • Contact #4: Mobile Web, 26 hours after Contact #3
Cost to Respondents	None. Incoming SMS messages are free. The channels were configured to not invoice any data charges to respondents.
Incentives	Every person who completed the survey were sent 50 Pesos load.
Tool and Hosting	Surveda, with data hosted at the Philippines Department of Health

3.2 Implementation

The Philippines COVID-19 Mobile Phone Survey implementation process consisted of four stages: Planning and Pre-Test, Full-scale Data Collection, Data Management and Analysis, and Data Release and Use.

Data collection commenced on September 25th, 2021. A total of 2,430 individuals completed or partially completed (defined as answering at least five COVID-19 behavior or risk factor questions) the survey through the three major mobile network operators in three weeks.

4. Results

This section presents the following results:

- Demographics and Response Rates (section 4.1)
- NCD Risk Factors - Tobacco Use (section 4.2)
- NCD Risk Factors - Alcohol Use (section 4.3)
- NCD Risk Factors – Mental Health (section 4.4)
- COVID-19 Testing & Treatment (section 4.5)
- COVID-19 Mitigation Practices (section 4.6)
- COVID-19 Vaccine Attitudes (section 4.7)

4.1 Demographics and Response Rates

The Philippines Mobile Phone Survey included 2,430 interviews across 4 age by sex groups. Table 2 shows the Mobile Phone Demographic distribution compared to the 2020 Philippines Statistical Authority population national statistics for sex and age.

Table 2. Mobile Phone Survey Demographics

	Mobile Phone Sample	**National***
Sex**	2,430	6,952,012
Male	48.0%	50.0%
Female	52.0%	50.0%
Age**		
18-34 years old	42.8%	44.9%
35+ years old	57.2%	55.1%
Island Group	**n**	**Sample %**
Luzon	1679	80.6%
Visayas	206	9.9%
Mindanao	199	9.5%

*July 2020 population data provided by Philippines Statistical Authority
**Sample was drawn to provide sex and age stratum specific estimates

To achieve the 2,430 interviews, we sent invitations to 64,181 mobile phone numbers. Due to the nature of the RDD (random digit dialing) sampling, it was expected that many of these mobile phone numbers were invalid or non-working at the time of data collection. Out of these, 5,411 provided some sort of response but only 3,381 consented and provided the age and sex information necessary to be eligible to participate. Of these, 123 were ineligible as they were less than 18 years of age, and 532 respondents of eligible age were rejected due to stratum sample sizes being full. The result was 2,726 eligible respondents, of which 2,430 provided interviews (completed or partial) with known sex and age. Completed interviews were defined as answering all survey questions. Partial interviews were defined as answering at least five COVID-19 questions and not finishing the survey. The interview rate was 89.1% and the overall response rate was 4.70%, which is described in detail below.

The final disposition codes for this sample are shown in Table 3.

Table 3. Final disposition codes for all dialed mobile phone numbers

Disposition	Definition	n	Percent
1. Complete (I)	Answered all survey questions	2,099	3.3%
2. Partial (P)	Answered age and sex questions and at least five COVID-19 questions but did not finish the survey	331	0.5%
3. Breakoff: Eligible (O)	Answered age and sex questions but did not answer any COVID-19 questions	296	0.5%
4. Ineligible: Age	Under age 18	123	0.2%
5. Ineligible: Quotas	Answered age and sex questions but quotas were full	532	0.8%
6. Refused	Refused consent	1,457	2.3%
7. Breakoff: unknown eligibility	Answered some questions but stopped before completing eligibility	573	0.9%
8. No answer	No answer, possibly nonworking number	58,770	91.6%
Total		**64,181**	

In this project, the sampling design involved two Phases. Each phase had a response rate. The final response rate was the product of Phase I and Phase II response rates.

$$Phase\ I\ Response\ Rate = \frac{Number\ MPNs\ screened}{Number\ MPNs\ dialed}$$

Or,

$$Phase\ I\ Response\ Rate = \frac{3{,}881}{64{,}181} = 0.0527$$

$Phase\ II\ Response\ Rate\ RR6_s = \frac{IP_s}{IP_s+O_s}$, for stratum s.

RR_6 was derived from the 2016 Standard Definitions of the American Association for Public Opinion Research (AAPOR). Phase II stratum-specific response rates (RR #6) are in Table 4:

Table 4. Phase II response rates for stratum *s*		
Age	**Males**	**Females**
18-34	$RR6_1 = 0.873$	$RR6_2 = 0.899$
35+	$RR6_3 = 0.890$	$RR6_4 = 0.900$

The overall response rate is the product of Phase I and Phase II response rates, resulting in an overall response rate for the entire COVID-19 Mobile Phone Survey in Philippines:

$$RR6_{overall} = \frac{IP_{overall}}{IP_{overall} + O_{overall}} * RR_{Phase\ I} = \frac{2{,}430}{2{,}430 + 296} * 0.0527 = 0.0470$$

4.2 NCD Risk Factors and Behavior - Tobacco Use

Overall, 17.3% of adults (aged 18 years and older) reported current tobacco use, either in the form of smoked tobacco products or use of e-cigarettes or vaping devices. Two in ten men (23.8%) currently used tobacco compared to 1 in 10 women (10.8%).

The prevalence of current tobacco smokers among all adults was 14.1%, with higher rates among men compared to women (19.5% vs 8.6% respectively). One in 10 men (12%) reported daily tobacco smoking compared to 5.3% of women who did the same.

The prevalence of current e-cigarette or vaping use was 7.3% for all adults. Men reported higher rates of current e-cigarette or vape use compared to women (9.7% among men vs 4.9% among women). Regarding age 18-34 year old Filipinos used e-cigarettes or vaping devices at higher prevalence rates compared to their older counterparts aged 35 years and older (9.5% vs. 5.4%). Men also reported higher rates of daily e-cigarette or vaping use compared to women (5.8% vs. 2.1% respectively). Overall 18-34 year old Filipinos daily use of e-cigarettes or vaping devices were higher than their older counterparts aged 35 years and older (5.2% vs. 3%).

Tobacco smokers were asked how the COVID-19 pandemic had influenced their smoking behavior. Among tobacco smokers, approximately one third (35%) reported that there was no change in their smoking behavior because of the pandemic. Four in ten (42.3%) reported that the smoked less than usual, and two in 10 (22.7%) smoked more than usual.

Table 5 shows key outcomes from the 2021 COVID-19 Mobile Phone Survey on tobacco use.

Table 5. Tobacco Use Overall and by Sex

Tobacco Use	Overall		Males		Females	
Tobacco Smokers	**%**	**(95% CI)**	**%**	**(95% CI)**	**%**	**(95% CI)**
Current tobacco smokers	14.1	(12.7-15.5)	19.5	(17.2-21.9)	8.6	(7.1-10.2)
Daily tobacco smokers	8.6	(7.5-9.8)	12.0	(10.1-13.9)	5.3	(4-6.5)
E-cigarette or Vaping Device Users						
Current use e-cigarette or vaping device	7.3	(6.2-8.3)	9.7	(7.9-11.4)	4.9	(3.7-6.1)
18-34 years old	9.5	(7.7-11.3)	12.0	(9-14.9)	6.9	(4.8-9.1)
35+ years old	5.4	(4.2-6.6)	7.7	(5.6-9.7)	3.2	(1.9-4.6)
Daily use of e-cigarette or vaping device	4.0	(3.2-4.8)	5.8	(4.4-7.2)	2.1	(1.3-3)

18-34 years old	5.2	(3.8-6.6)	7.3	(4.9-9.6)	3.0	(1.5-4.4)
35+ years old	3.0	(2.1-3.9)	4.6	(3-6.2)	1.5	(0.6-2.4)
Currently smoke tobacco or use an e-cigarette or vaping device	17.3	(15.8-18.8)	23.8	(21.3-26.3)	10.8	(9-12.5)
COVID-19 Influence on tobacco smoking:						
Smoked more than usual	22.7	(17.9-27.4)	25.0	(19-30.9)	17.5	(10-25.1)
Smoked less than usual	42.3	(36.7-48)	44.2	(37.3-51.1)	38.1	(28.5-47.8)
No change in smoking behavior	35.0	(29.6-40.4)	30.9	(24.5-37.2)	44.3	(34.4-54.2)

4.3 NCD Risk Factors and Behavior - Alcohol Use

Three in ten adult Filipinos consumed alcohol in the past 30 days (29%), with males reporting higher rates of alcohol consumption than females (35.9% vs. 22% respectively). More 18-34 year old Filipinos reported drinking alcohol compared to their older counterparts aged 35 years and older (31.9% vs. 26.5%); younger females also reported higher rates of current smoking compared to the 35 years and older (26.7% vs 18.3%).

Among current alcohol users, 4 in 10 (39%) reported that there was no change in their alcohol consumption during the pandemic. Half (53.4%) of the current alcohol users reported that they drank less than usual during the pandemic, and approximately 1 in ten (7.5%) drank more than usual during the pandemic. Men and women reported similar influences in alcohol consumption because of the pandemic.

Table 6 shows reported alcohol use overall and by sex from the COVID-19 Mobile Phone Survey.

Table 6. Alcohol Use overall and by Sex

Alcohol Use	Overall		Males		Females	
	%	(95% CI)	%	(95% CI)	%	(95% CI)
Current alcohol users (past 30 days)	29.0	(27.1-30.8)	35.9	(33.1-38.8)	22.0	(19.7-24.3)
18-34 years old	31.9	(29-34.8)	37.0	(32.6-41.4)	26.7	(22.9-30.4)
35+ years old	26.5	(24.2-28.9)	35.0	(31.4-38.7)	18.3	(15.4-21.2)
COVID-19 Influence on alcohol use:						
Drank more than usual	7.5	(5.4-9.7)	6.7	(4.1-9.4)	8.8	(5.3-12.4)
Drank less than usual	53.4	(49.4-57.4)	56.4	(51.3-61.5)	48.6	(42.4-54.8)
No change in alcohol consumption	39.0	(35.2-42.9)	36.8	(31.9-41.8)	42.6	(36.4-48.7)

4.4 NCD Risk Factors and Behavior – Mental Health

The COVID-19 pandemic has had a major effect on Filipino lives causing persistent thoughts of concern, anxiety or sadness. The COVID-19 mobile phone survey included questions on mental health well-being. One out of five (21.8%) adult Filipinos reported that they needed mental health services because of the

COVID-19 pandemic. Regarding age, 18-34 year olds were twice as likely to report that they needed mental health services because of the COVID-19 pandemic compared to the 35 years and older age group (31.6% vs 14.4% respectively). Similar results were attained for both men and women with younger Filipinos aged 18-34 years old needing mental health services because of the pandemic (27.8% vs 13.1% men & 35.6% vs 15.6% women).

Among those who needed mental health services because of the pandemic, approximately one third (36.2%) sought and consulted mental health services, with similar rates among men and women (40.6% vs 32.5% respectively) as well as among the two age groups.

Considering the pandemic's impact on mental health, approximately 1 in ten (16.1%) Filipinos rated their overall mental health as poor or somewhat-poor within the past month. Two in 10 (22.7%) rated their overall mental health status as average, and six in 10 (61.3%) assessed their overall mental health as excellent or somewhat good in the past month.

Table 7 presents Mental Health overall and by sex.

Table 7. Mental Health Overall and by Sex

Mental Health	Overall		Males		Females	
	%	(95% CI)	%	(95% CI)	%	(95% CI)
Needed mental health services because of the COVID-19 pandemic	21.8	(20-23.6)	19.7	(17.2-22.2)	23.9	(21.4-26.5)
18-34 years old	31.6	(28.4-34.7)	27.8	(23.4-32.2)	35.6	(31.1-40.1)
35+ years old	14.4	(12.4-16.4)	13.1	(10.4-15.9)	15.6	(12.8-18.5)
Among those who needed mental health services, those who consulted mental health services because of COVID-19.	36.2	(31.6-40.8)	40.6	(33.4-47.8)	32.5	(26.6-38.4)
Current mental health assessment influenced by COVID-19 (past 30 days reflection)						
Excellent or somewhat good	61.3	(59.1-63.4)	64.5	(61.5-67.6)	58.1	(55.1-61)
Average	22.7	(20.8-24.5)	21.6	(19-24.3)	23.7	(21.1-26.3)
Somewhat poor or Poor	16.1	(14.4-17.7)	13.9	(11.6-16.1)	18.2	(15.9-20.5)

4.5 COVID-19 Testing & Treatment

Testing remains an important component of the COVID-19 pandemic response. Overall, 2 out of five (46.4%) adult Filipinos indicated they have ever been tested for COVID-19, with more men being tested compared to women (52.4% vs. 40.3% respectively). Filipinos aged 35 years and older reported higher rates of COVID-19 testing compared to their 18-34 year old counterparts (50.4% vs 41.5%). Both males and females in the older age group reported higher rates of testing as well (56.6% vs 47.5% males & 44.2% vs 35.3% females respectively).

Overall, one in 10 (13.1%) adult Filipinos self-reported that they had been diagnosed with COVID-19, with 6.7% reporting that they received treatment for COVID-19 at a health care center or hospital. Men

and women reported similar rates for ever being diagnosed with COVID-19 and recipients of treatment for COVID-19 at health care centers or hospitals. Regarding age, 35 year olds reported higher rates of being diagnosed with COVID-19 compared to their younger counterparts (14.6% vs 11.3% respectively). Likewise the older age group were more likely to be treated for COVID-19 compared to the 18-34 year olds (8.3% vs 5.1% respectively). By sex, 35 and older women were more likely to be treated for COVID-19 (7.7% vs. 3.4%).

Among adult Filipinos who indicated that they had not been tested for COVID-19 since the pandemic began, three out of four (77.7%) reported that they knew where they would be able to get a COVID-19 test if they needed one.

Table 8 presents the COVID-19 Testing and Treatment overall and by sex.

Table 8. COVID-19 Testing & Treatment Overall and by Sex

COVID-19 Testing & Treatment	Overall		Males		Females	
	%	(95% CI)	%	(95% CI)	%	(95% CI)
Tested for COVID-19	46.4	(44.3-48.4)	52.4	(49.4-55.4)	40.3	(37.5-43.1)
18-34 years old	41.5	(38.4-44.7)	47.5	(42.8-52.1)	35.3	(31.1-39.5)
35+ years old	50.4	(47.6-53.1)	56.6	(52.7-60.5)	44.2	(40.4-48.1)
Diagnosis for COVID-19 (among POP)	13.1	(11.7-14.5)	14.3	(12.3-16.4)	11.9	(10-13.8)
18-34 years old	11.3	(9.3-13.3)	12.2	(9.2-15.3)	10.3	(7.7-13)
35+ years old	14.6	(12.7-16.6)	16.1	(13.2-19)	13.1	(10.5-15.7)
Treatment for COVID-19 (among POP)	6.7	(5.5-8)	7.9	(5.8-9.9)	5.7	(4.1-7.3)
18-34 years old	5.1	(3.4-6.8)	6.9	(4-9.8)	3.4	(1.6-5.3)
35+ years old	8.3	(6.4-10.1)	8.8	(6-11.7)	7.7	(5.2-10.2)
Think they would be able to get a test among those who have NOT had a COVID-19 test	77.7	(75.3-80.1)	76.1	(72.4-79.9)	78.9	(75.8-82)

4.6 COVID-19 Mitigation Practices

Mitigation strategies employed in the Philippines to prevent the spread of COVID-19 have included suspension of public transportation, bans on intra-country travel, stay-at-home measures, mask wearing policies, social distancing and regular hand washing.

The results indicate that within the last two weeks before the survey, over three quarters (77.6%) of adult Filipinos avoided public places because of COVID-19; 4 out of 5 (83.4%) avoided public transportation, and 9 out of ten (93.4%) avoided social contact or practiced social distancing to help mitigate the spread of COVID-19.

One in ten (10.0%) adult Filipinos reported that they cared for or had close contact with someone suspected of or who was diagnosed with COVID-19 in the two weeks before being interviewed.

Regarding adherence to mask wearing policies, 9 out of 10 adult Filipinos reported always wearing a face mask or face covering (93.4%), and always covering their mouth and nose when wearing a mask when out in public (96.3%). Three out of 4 (75.4%) Filipinos reported that they always sanitize or wash their hands after touching objects or surfaces to help mitigate the spread of COVID-19. Men and women reported similar rates with regards to all COVID-19 mitigation practices.

Table 9 shows the rates of COVID-19 Mitigation practices overall and by sex.

Table 9. COVID-19 Mitigation Practices Overall and by Sex

COVID-19 Mitigation Practices	Overall		Males		Females	
In the last 2 weeks:	**%**	**(95% CI)**	**%**	**(95% CI)**	**%**	**(95% CI)**
cared for or had close contact with some suspected of or diagnosed with COVID-19	10.0	(8.8-11.3)	10.8	(9-12.7)	9.2	(7.6-10.9)
avoided public places	77.6	(75.9-79.3)	75.6	(73.1-78.1)	79.5	(77.2-81.8)
avoided public transportation	83.4	(81.9-84.9)	84.5	(82.4-86.6)	82.3	(80.1-84.5)
avoided social contact or practiced social distancing	93.4	(92.3-94.4)	92.3	(90.8-93.9)	94.4	(93.1-95.7)
Always wore face mask or face covering when out in public	95.4	(94.6-96.3)	95.3	(94-96.5)	95.6	(94.4-96.7)
Always covered mouth and nose when wearing a mask out in public	96.3	(95.5-97.1)	96.6	(95.6-97.7)	95.9	(94.8-97.1)
Always sanitize or wash hands after touching objects or surfaces	75.4	(73.6-77.1)	71.7	(69-74.4)	79.1	(76.8-81.4)

4.7 COVID-19 Vaccine Attitudes

Regarding public attitudes towards getting vaccinated against COVID-19, overall, two out of 5 (42.9%) adult Filipinos reported that they had received the COVID-19 vaccine; men and women reported similar rates of vaccination. Regarding age, Filipinos 35 years and older reported higher rates of being vaccinated compared to the 18-34 year olds (48.0% vs. 36.6% respectively). Similar results were attained for both men and women with Filipinos 35 years and older reporting higher rates of vaccination compared to their younger counterparts (48.3% vs 39.6 males & 47.8% vs 33.5% females).

Among those who were not vaccinated, four out of 5 (79.6%) reported that they would definitely get the COVID-19 vaccine if it were available to them at the time the survey was implemented. Comparatively, less than 10% of adult Filipinos reported that they would not get the vaccine (probably or definitely not). Men were more likely to definitely not get the vaccine compared to women if a COVID-19 vaccine had been available at the time they were interviewed (4.2% vs 1.4%).

Among those who would not get a vaccine if it were available today, three out of 10 (29.0%) adult Filipinos cited they did not they did not think the vaccine was safe as the main reason for vaccine hesitancy. Two out of 10 (22.5%) were waiting to decide; two out of 10 (18.6%) did not think the vaccines were effective; one out of 10 (12.3%) were waiting on a specific COVID-19 vaccine; one out of

10 (12.1%) did not believe in vaccination; and less than one in 10 (5.6%) thought they would get COVID-19 from the vaccine.

Among those who had children 18 years or younger, 4 out of 5 (85%) would allow their children to be vaccinated against COVID-19 once approval was issued. With regards to age, Filipinos 35 years and older are more likely to vaccinate their children compared to their younger counter parts (90.0% vs. 75.5% respectively). Likewise, by sex 35 year and older men and women are more likely to vaccinate their children (91.5% vs77.8% male & 88.5% vs 73.7% female).

Table 10 presents COVID-19 Vaccine Attitudes overall and by sex.

Table 10. COVID-19 Vaccine Attitudes Overall and by Sex

COVID-19 Vaccine Attitudes	Overall		Males		Females	
	%	(95% CI)	%	(95% CI)	%	(95% CI)
Vaccinated against COVID-19	42.9	(40.9-44.9)	44.3	(41.4-47.3)	41.5	(38.7-44.2)
18-34 years old	36.6	(33.6-39.6)	39.6	(35.1-44.1)	33.5	(29.5-37.6)
35+ years old	48.0	(45.3-50.7)	48.3	(44.5-52.2)	47.8	(44-51.5)
Vaccinated against COVID-19 by region						
Luzon	44.3	(41.9-46.7)	45.6	(42.2-49.1)	42.9	(39.6-46.2)
Visayas	43.5	(36.7-50.3)	44.3	(34.3-54.3)	42.7	(33.5-52)
Mindanao	36.1	(29.4-42.9)	38.8	(28.4-49.1)	33.9	(25.1-42.7)
Would get a COVID-19 vaccine if it were available today:						
Definitely yes	79.6	(77.5-81.8)	80.4	(77.3-83.6)	78.9	(75.9-81.9)
Probably yes	12.8	(11-14.6)	10.5	(8-12.9)	15.0	(12.4-17.6)
Probably not	4.8	(3.6-6)	4.9	(3.2-6.6)	4.7	(3.1-6.3)
Definitely not	2.8	(1.9-3.7)	4.2	(2.6-5.8)	1.4	(0.5-2.3)
Among those who would not get a vaccine if it were available today, the main reason why they would not get the vaccine:						
Waiting for a specific COVID-19 vaccine brand	12.3	(5.5-19.1)	16.6	(6.6-26.6)	5.4	(0-12.7)
Do not think it is safe	29.0	(19.5-38.4)	30.2	(17.8-42.6)	27.0	(12.7-41.4)
Do not think it is effective	18.6	(10.5-26.6)	13.2	(4.1-22.4)	27.0	(12.7-41.3)
Waiting to decide	22.5	(13.8-31.2)	19.6	(8.7-30.5)	27.0	(12.7-41.4)
Think he/she will get COVID-19	5.6	(0.8-10.4)	5.8	(0-12.1)	5.4	(0-12.7)

Does not believe in vaccination	12.1	(5.4-18.8)	14.6	(5.2-24)	8.1	(0-16.9)
Will allow their children to get vaccinated (once approved)	85.0	(83.1-86.8)	86.8	(84.2-89.3)	83.2	(80.6-85.9)
18-34 years old	75.5	(71.6-79.4)	77.8	(72.2-83.4)	73.3	(67.8-78.7)
35+ years old	90.0	(88.1-91.9)	91.5	(89-94)	88.5	(85.7-91.4)

5. Conclusions

Conclusions:

Effective and rapid decision making during the pandemic require data not only about infections, but also about human behavior in the Philippines. The data presented in the Philippines COVID-19 Mobile Phone Survey provides timely data supporting current COVID-19 response strategies as well as data to develop future response strategies. Some key outcomes included:

- Overall, there was high adherence to mitigation strategies implemented to prevent the spread of COVID-19, nine out of 10 adult Filipinos reported, always wearing a mask or face covering when going out in public, and always covering both their mouth and nose while wearing a mask. Three quarters of all adult Filipinos reported that they always wash or sanitize their hands after touching objects or surfaces to reduce the spread of COVID-19. In the last two weeks, nine out of 10 reported that they avoided social contact or practiced social distancing, 8 in 10 avoided public transportation, and over 7 in 10 avoided public places because of COVID-19.
- One in 10 adult Filipinos reported that they had close contact with some suspected of or diagnosed with COVID-19.
- Overall, two out of 5 adult Filipinos ever tried to get a test for COVID-19, men reported higher prevalence of ever trying to get a test compared to women (52.4% vs 40.3% respectively.)
- Overall, one out of 10 adult Filipinos reported that they had been ever diagnosed with COVID-19 since the pandemic began.
- Among those who have did not have a COVID-19 test, three quarters thought would be able to get a COVID-19 test if they needed one.
- Public attitude towards was high, with 9 out of 10 adult Filipinos reporting that they would receive a COVID-19 vaccine if it were available to them. Among adults who have children 18 years old and younger, Eight out of 10 would vaccinate their children.
- The ramifications of the pandemic in relation to NCD risk factor behaviors include, one out of five adult Filipinos needing mental health services because of the pandemic. Among those who reported that they needed mental health services, one third consulted mental health services because of the COVID-19 pandemic.
- One out of five men reported currently smoking compared to 8.6% of women. 10% of men reported current use of e-cigarettes or vaping devices compared to 5% of women, and one third of men report current use of alcohol compared to 1 in five women. With regards to the impact of COVID-19 on smoking and drinking habits, 2 out of 5 smokers reported less than usual

smoking habits, and half of current alcohol users reported less than usual alcoholic consumption.

Findings from the Philippines COVID-19 Mobile Phone Survey will help provide or augment results that maybe used to shape the government's response to the pandemic. Results will help inform the Department of Health in the Philippines as they improve and enhance COVID-19 response efforts.

Limitations:

The main limitation of any mobile phone survey includes the population's access to a mobile phone. Therefore, the population who do not have access to mobile phones was not represented in this survey. The results of the mobile phone survey were based on self-reports and may be influenced by recall or social desirability bias.

Appendix A: PHILIPPINES COVID-19 2021 P-values for Sex Differences

	Male		Female		
Risk Factors & Behaviors	**n**	**Wgt'd %**	**n**	**Wgt'd %**	**P-value**
Currently smoke tobacco	1129	19.5	1214	8.6	*<.0001*
Currently smoke tobacco daily	1129	12.0	1214	5.3	*<.0001*
Currently use e-cigarette or vaping device	1118	9.7	1213	4.9	*<.0001*
Currently use e-cigarette or vaping device daily	1118	5.8	1213	2.1	*<.0001*
Currently smoke tobacco or used an e-cigarette or vaping device	1137	23.8	1226	10.8	*<.0001*
Currently drink alcohol	1110	35.9	1196	22.0	*<.0001*
Needed mental health services because of the COVID-19 pandemic	974	19.7	1049	23.9	*0.0197*
Among those who needed mental health services, those who consulted mental health services because of COVID-19.	181	40.6	240	32.5	*0.0883*

	Male		Female		
COVID-19 Testing & Treatment	**n**	**Wgt'd %**	**n**	**Wgt'd %**	***P-value***
Tested for COVID-19	1080	52.4	1149	40.3	*<.0001*
COVID-19 diagnosis	565	27.5	458	29.7	*0.4*
Treatment for COVID-19	154	34.6	133	35.3	*0.9*
Diagnosis for COVID-19 (among POP)	1075	14.3	1144	11.9	*0.1*
Treatment for COVID-19 (among POP)	664	7.9	819	5.7	*0.1*
Think they would be able to get a test among those who have NOT had a COVID-19 test	498	76.1	673	78.9	*0.3*

	Male		Female		
Pracitces	**n**	**Wgt'd %**	**n**	**Wgt'd %**	***P-value***
In the last 2 weeks, cared for or had close contact with some suspected of or diagnosed with COVID-19	1128	10.8	1211	9.2	*0.2009*
In the last 2 weeks, avoided public places	1124	75.6	1202	79.5	*0.0238*
In the last 2 weeks, avoided public transportation	1114	84.5	1186	82.3	*0.1549*
In the last 2 weeks, avoided social contact	1116	92.3	1193	94.4	*0.0507*
Wore face mask or face covering when leaving home	1116	95.3	1195	95.6	*0.7242*
Always covered mouth and nose when wearing a mask out in public	1109	96.6	1181	95.9	*0.3832*
Always sanitize or wash hands after touching objects or surfaces	1102	71.7	1181	79.1	*<.0001*

	Male		Female		
COVID-19 Vaccine Attitudes	**n**	**Wgt'd %**	**n**	**Wgt'd %**	***P-value***
Vaccinated against COVID-19	1114	44.3	1198	41.5	*0.1624*
Among those who have not been vaccinated, would definitely or probably get a COVID-19 vaccine if it were available today	616	90.9	701	93.9	*0.0473*
Will allow their children to get vaccinated (once approved)	684	86.8	746	83.2	*0.0611*

NCD Risk Factors	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Currently smoke tobacco	1003	14.6	1340	13.7	*0.507*
Male	468	20.1	661	19.1	*0.6701*
Female	535	9.0	679	8.4	*0.7235*
P-value		*<.0001*		*<.0001*	

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Currently smoke tobacco daily	1003	7.9	1340	9.2	*0.2841*
Male	468	10.9	661	12.9	*0.3126*
Female	535	4.9	679	5.6	*0.5656*
P-value		*0.0004*		*<.0001*	

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Currently drink alcohol	994	31.9	1312	26.5	*0.0047*
Male	465	37.0	645	35.0	*0.5048*
Female	529	26.7	667	18.3	*0.0006*
P-value		*0.0005*		*<.0001*	

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Currently use e-cigarette or vaping device	1002	9.5	1329	5.4	*0.0003*
Male	467	12.0	651	7.7	*0.0186*
Female	535	6.9	678	3.2	*0.0045*
P-value		*0.0065*		*0.0004*	

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Currently use e-cigarette or vaping device daily	1002	5.2	1329	3.0	*0.0112*
Male	467	7.3	651	4.6	*0.0668*
Female	535	3.0	678	1.5	*0.0817*
P-value		*0.0024*		*0.0009*	

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Needed mental health services because of the COVID-19 pandemic	831	31.6	1192	14.4	*<.0001*
Male	396	27.8	578	13.1	*<.0001*
Female	435	35.6	614	15.6	*<.0001*
P-value		*0.0147*		*0.2211*	

	n	Wgt'd %	n	Wgt'd %	*P-value*
Among those who needed mental health services, those who consulted mental health services because of COVID-19.	258	36.5	163	35.6	*0.8412*
Male	107	43.0	74	36.5	*0.3765*
Female	151	31.1	89	34.8	*0.5561*
P-value		*0.0514*		*0.8258*	

COVID-19 Testing & Treatment	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Tested for COVID-19	958	41.5	1271	50.4	*<.0001*
Male	451	47.5	629	56.6	*0.0029*
Female	507	35.3	642	44.2	*0.002*
P-value		*0.0001*		*<.0001*	

	n	Wgt'd %	n	Wgt'd %	*P-value*
COVID-19 diagnosis	388	27.4	635	29.1	*0.556*
Male	212	25.9	353	28.6	*0.4887*
Female	176	29.5	282	29.8	*0.956*
P-value	*0.4306*	*0.4306*	*0.7464*	*0.7464*	

	n	Wgt'd %	n	Wgt'd %	*P-value*
Treatment for COVID-19	106	31.6	181	37.0	*0.3546*
Male	54	37.0	100	33.0	*0.6166*
Female	52	25.0	81	42.0	*0.0369*
P-value		*0.175*		*0.2133*	

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Diagnosis for COVID-19 (among POP)	953	11.3	1266	14.6	*0.0211*
Male	449	12.2	626	16.1	*0.069*
Female	504	10.3	640	13.1	*0.1402*
P-value		*0.3478*		*0.1299*	

	n	Wgt'd %	n	Wgt'd %	*P-value*
Treatment for COVID-19 (among POP)	671	5.1	812	8.3	*0.0138*
Male	291	6.9	373	8.8	*0.3446*
Female	380	3.4	439	7.7	*0.0063*
P-value	*0.049*		*0.5713*		

	n	Wgt'd %	n	Wgt'd %	*P-value*
Think they would be able to get a test among those who have NOT had a COVID-19 test	556	75.3	615	80.0	*0.0539*
Male	233	74.2	265	78.1	*0.3129*
Female	323	76.2	350	81.4	*0.095*
P-value		*0.6072*		*0.3125*	

Mitigation Practices	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
In the last 2 weeks, cared for or had close contact with some suspected of	1003	9.9	1336	10.2	*0.8149*
Male	476	10.1	652	11.5	*0.4462*
Female	527	9.7	684	8.9	*0.6528*
P-value		*0.8296*		*0.1192*	

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
In the last 2 weeks, avoided public places	997	77.7	1329	77.4	*0.8596*
Male	474	76.6	650	74.8	*0.4835*
Female	523	79.0	679	80.0	*0.67*
P-value	*0.3662*		*0.0235*		

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
avoided public transportation	986	80.9	1314	85.5	*0.004*
Male	471	81.5	643	87.1	*0.0125*
Female	515	80.2	671	83.9	*0.1005*
P-value		*0.5946*		*0.1005*	

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Wore face mask or face covering when leaving home	991	95.4	1320	95.4	*0.9367*
Male	471	95.3	645	95.2	*0.9163*
Female	520	95.6	675	95.6	*0.9858*
P-value		*0.8518*		*0.7546*	

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Always covered mouth and nose when wearing a mask out in public	980	95.4	1310	97.0	*0.0438*
Male	466	96.1	643	97.0	*0.4158*
Female	514	94.6	667	97.0	*0.0413*
P-value	*0.2377*		*0.963*		

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Always sanitize or wash hands after touching objects or surfaces	976	73.4	1307	77.0	*0.0539*
Male	460	70.7	642	72.6	*0.4836*
Female	516	76.4	665	81.2	*0.0443*
P-value		*0.044*		*0.0002*	

	n	Wgt'd %	n	Wgt'd %	*P-value*
	991	92.6	1318	94.0	*0.1775*
In the last 2 weeks, avoided social contact					
Male	472	90.7	644	93.8	*0.0584*
Female	519	94.6	674	94.2	*0.7701*
P-value		*0.0185*		*0.7456*	

COVID-19 Vaccine Attitudes	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Vaccinated against COVID-19	990	36.6	1322	48.0	*<.0001*
Male	462	39.6	652	48.3	*0.0038*
Female	528	33.5	670	47.8	*<.0001*
P-value		*0.0473*		*0.841*	

	18-34 years old		35+ years older		
	n	Wgt'd %	n	Wgt'd %	*P-value*
Among those who have not been vaccinated, would definitely or probably get a COVID-19 vaccine if it were available today	630	91.6	687	93.3	*0.2353*
Male	279	89.2	337	92.6	*0.1544*
Female	351	93.7	350	94.0	*0.8826*
P-value		*0.0475*		*0.4579*	

	n	Wgt'd %	n	Wgt'd %	*P-value*
Will allow their children to get vaccinated (once approved)	470	75.5	960	90.0	*<.0001*
Male	212	77.8	472	91.5	*<.0001*
Female	258	73.3	488	88.5	*<.0001*
P-value	*0.2489*		*0.1202*		