

Methodology

The American Trends Panel survey methodology

Overview

The American Trends Panel (ATP), created by Pew Research Center, is a nationally representative panel of randomly selected U.S. adults. Panelists participate via self-administered web surveys. Panelists who do not have internet access at home are provided with a tablet and wireless internet connection. Interviews are conducted in both English and Spanish. The panel is being managed by Ipsos.

Data in this report is drawn from the panel wave conducted April 20 to April 29, 2021 and includes an oversample from Ipsos' KnowledgePanel (KP) members ages 18-24. A total of 13,749 panelists responded out of 16,924 who were sampled, for a response rate of 81%. This includes 13,031 from the ATP and 718 respondents from the KnowledgePanel. The cumulative response rate accounting for nonresponse to the recruitment surveys and attrition is 4%. The break-off rate among panelists who logged on to the survey and completed at least one item is 2%. The margin of sampling error for the full sample of 13,749 respondents is plus or minus 1.4 percentage points.

Panel recruitment

The ATP was created in 2014, with the first cohort of panelists invited to join the panel at the end of a large, national, landline and cellphone random-digit-dial survey that was conducted in both English and Spanish. Two additional recruitments were conducted using the same method in 2015 and 2017, respectively. Across these three surveys, a total of 19,718 adults were invited to join the ATP, of whom 9,942 (50%) agreed to participate.

In August 2018, the ATP switched from telephone to address-based recruitment. Invitations were sent to a random, address-based sample of households selected

American Trends Panel recruitment surveys

Recruitment dates	Mode	Invited	Joined	Active panelists remaining
Jan. 23 to March 16, 2014	Landline/ cell RDD	9,809	5,338	2,183
Aug. 27 to Oct. 4, 2015	Landline/ cell RDD	6,004	2,976	1,243
April 25 to June 4, 2017	Landline/ cell RDD	3,905	1,628	620
Aug. 8 to Oct. 31, 2018	ABS	9,396	8,778	5,893
Aug. 19 to Nov. 30, 2019	ABS	5,900	4,720	2,324
June 1 to July 19, 2020; Feb. 10 to March 31, 2021	ABS	3,197	2,812	2,442
	Total	38,211	26,252	14,705

Note: Approximately once per year, panelists who have not participated in multiple consecutive waves or who did not complete an annual profiling survey are removed from the panel. Panelists also become inactive if they ask to be removed from the panel.

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from the U.S. Postal Service's Delivery Sequence File. Two additional recruitments were conducted using the same method in 2019 and 2020, respectively. Across these three address-based recruitments, a total of 18,493 adults were invited to join the ATP, of whom 16,310 (88%) agreed to join the panel and completed an initial profile survey. In each household, the adult with the next birthday was asked to go online to complete a survey, at the end of which they were invited to join the panel. Of the 26,252 individuals who have ever joined the ATP, 14,705 remained active panelists and continued to receive survey invitations at the time this survey was conducted.

The U.S. Postal Service's Delivery Sequence File has been estimated to cover as much as 98% of the population, although some studies suggest that the coverage could be in the low 90% range.¹ The American Trends Panel never uses breakout routers or chains that direct respondents to additional surveys.

About the Ipsos KnowledgePanel

The Ipsos KnowledgePanel is an online probability-based panel representative of the U.S. adult population. Households without internet connection are provided with a web-enabled device and free internet service. KnowledgePanel's recruitment process was originally based on a national RDD sampling methodology. In 2009, the panel switched to using an ABS methodology. Additional information about the recruitment, sampling and weighting procedures for the Ipsos KnowledgePanel are available [here](#).

Sample design

The overall target population for this survey was non-institutionalized persons ages 18 and older, living in the U.S., including Alaska and Hawaii. The ATP sample consisted of all current panel members. The KnowledgePanel sample included an oversample of KnowledgePanel members ages 18-24.

Questionnaire development and testing

The questionnaire was developed by Pew Research Center in consultation with Ipsos. The web program was rigorously tested on both PC and mobile devices by the Ipsos project management team and Pew Research Center researchers. The Ipsos project management team also populated test data which was analyzed in SPSS to ensure the logic and randomizations were working as intended before launching the survey.

¹ AAPOR Task Force on Address-based Sampling. 2016. "[AAPOR Report: Address-based Sampling](#)."

Incentives

All respondents were offered a post-paid incentive for their participation. Respondents could choose to receive the post-paid incentive in the form of a check or a gift code to Amazon.com or could choose to decline the incentive. Incentive amounts ranged from \$5 to \$20 depending on whether the respondent belongs to a part of the population that is harder or easier to reach. Differential incentive amounts were designed to increase panel survey participation among groups that traditionally have low survey response propensities.

Ipsos operates an ongoing modest incentive program for KnowledgePanel to encourage participation and create member loyalty. The incentive program includes special raffles and sweepstakes with both cash rewards and other prizes to be won. Typically, panel members are assigned no more than one survey per week. On average, panel members complete two to three surveys per month with durations of 10 to 15 minutes per survey. An additional incentive is usually provided for longer surveys. For this survey, KnowledgePanel members were offered 10,000 points (equivalent to \$10) in addition to the regular incentive program on April 26, 2021 at 8:30pm Eastern to those who hadn't responded yet in an attempt to boost the number of responses from KnowledgePanel members.

Data collection protocol

The data collection field period for this survey was April 20 to April 29, 2021. Postcard notifications were mailed to all ATP panelists with a known residential address on April 20, 2021.

Invitations were sent out in two separate launches: Soft Launch and Full Launch. Sixty ATP panelists and 490 KP panelists were included in the soft launch, which began with an initial invitation sent on April 20, 2021. The ATP panelists chosen for the initial soft launch were known responders who had completed previous ATP surveys within one day of receiving their invitation. All remaining English- and Spanish-speaking panelists were included in the full launch and were sent an invitation on April 21, 2021.

All panelists with an email address received an email invitation and up to three email reminders if they did not respond to the survey. All ATP panelists that consented to SMS messages received an SMS invitation and up to three SMS reminders.

Invitation and reminder dates

	Soft Launch	Full Launch
Initial invitation	April 20, 2021	April 21, 2021
First reminder	April 23, 2021	April 23, 2021
Second reminder	April 26, 2021	April 26, 2021
Final reminder	April 28, 2021	April 28, 2021

Data quality checks

To ensure high-quality data, the Center's researchers performed data quality checks to identify any respondents showing clear patterns of satisficing. This includes checking for very high rates of leaving questions blank, as well as always selecting the first or last answer presented. As a result of this checking, nine ATP respondents were removed from the survey dataset prior to weighting and analysis.

Weighting

The ATP data was weighted in a multistep process that accounts for multiple stages of sampling and nonresponse that occur at different points in the survey process. First, each panelist begins with a base weight that reflects their probability of selection for their initial recruitment survey (and the probability of being invited to participate in the panel in cases where only a subsample of respondents were invited). The base weights for panelists recruited in different years are scaled to be proportionate to the effective sample size for all active panelists in their cohort. To correct for nonresponse to the initial recruitment surveys and gradual panel attrition, the base weights for all active panelists are calibrated to align with the population benchmarks identified in the accompanying table to create a full-panel weight.

For ATP waves in which only a subsample of panelists are invited to participate, a wave-specific base weight is created by adjusting the full-panel weights for subsampled panelists to account for any differential probabilities of selection for the particular panel wave. For waves in which all active panelists are invited to participate, the wave-specific base weight is identical to the full-panel weight.

In the final weighting step, the wave-specific base weights for panelists who completed the survey are again calibrated to match the population benchmarks specified above. These weights are trimmed (typically at about the 1st and 99th percentiles) to reduce the loss in precision stemming from variance in the weights. Sampling errors and test of statistical significance take into account the effect of weighting.

The following table shows the unweighted sample sizes and the error attributable to

Weighting dimensions

Variable	Benchmark source
Age x Gender	2019 American Community Survey
Education x Gender	
Education x Age	
Race/Ethnicity x Education	
Born inside vs. outside the U.S. among Hispanics and Asian Americans	
Years lived in the U.S.	
Race/Ethnicity among age 18-24	
Education among age 18-24	
Census region x Metro/Non-metro	2019 CPS March Supplement
Volunteerism	
Voter registration	2016 CPS Voting and Registration Supplement
Party affiliation	2020 National Public Opinion Reference Survey
Frequency of internet use	
Religious affiliation	

Note: Estimates from the ACS are based on non-institutionalized adults. The 2016 CPS was used for voter registration targets for this wave in order to obtain voter registration numbers from a presidential election year. Voter registration is calculated using procedures from Hur, Achen (2013) and rescaled to include the total U.S. adult population. The 2020 National Public Opinion Reference Survey featured 1,862 online completions and 2,246 mail survey completions.

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sampling that would be expected at the 95% level of confidence for different groups in the survey.

Group	Unweighted sample size	Plus or minus ...
Total sample	13,749	1.4 percentage points

Sample sizes and sampling errors for other subgroups are available upon request. In addition to sampling error, one should bear in mind that question wording and practical difficulties in conducting surveys can introduce error or bias into the findings of opinion polls.

Dispositions and response rates

Final dispositions	AAPOR code	ATP	KP	Total
Completed interview	1.1	13,031	718	13,749
Logged onto survey; broke-off	2.12	163	50	213
Logged onto survey; did not complete any items	2.1121	74	41	115
Never logged on (implicit refusal)	2.11	1,430	1,404	2,834
Survey completed after close of the field period	2.27	1	3	4
Completed interview but removed for data quality	2.3	6	3	9
Screened out	4.7	0	0	0
Total panelists in the Wave 89 survey		14,705	2,219	16,924
Completed interviews	I	13,031	718	13,749
Partial interviews	P	0	0	0
Refusals	R	1,673	1,498	3,171
Non-contact	NC	1	3	4
Other	O	0	0	0
Unknown household	UH	0	0	0
Unknown other	UO	0	0	0
Not eligible	NE	0	0	0
Screen out	SO	0	0	0
Total		14,705	2,219	16,924
AAPOR RR1 = $I / (I+P+R+NC+O+UH+UO)$		89%	32%	81%

Cumulative response rate	ATP	KP	Total
Weighted response rate to recruitment surveys	12%	10%	12%
% of recruitment survey respondents who agreed to join the panel, among those invited	74%	59%	72%
% of those agreeing to join who were active panelists at start of Wave 89	60%	51%	59%
Response rate to Wave 89 survey	89%	32%	81%
Cumulative response rate	5%	1%	4%