

2023–2024 Physician Practice Information Survey

Sample Design and Survey Methodology

November 9, 2022

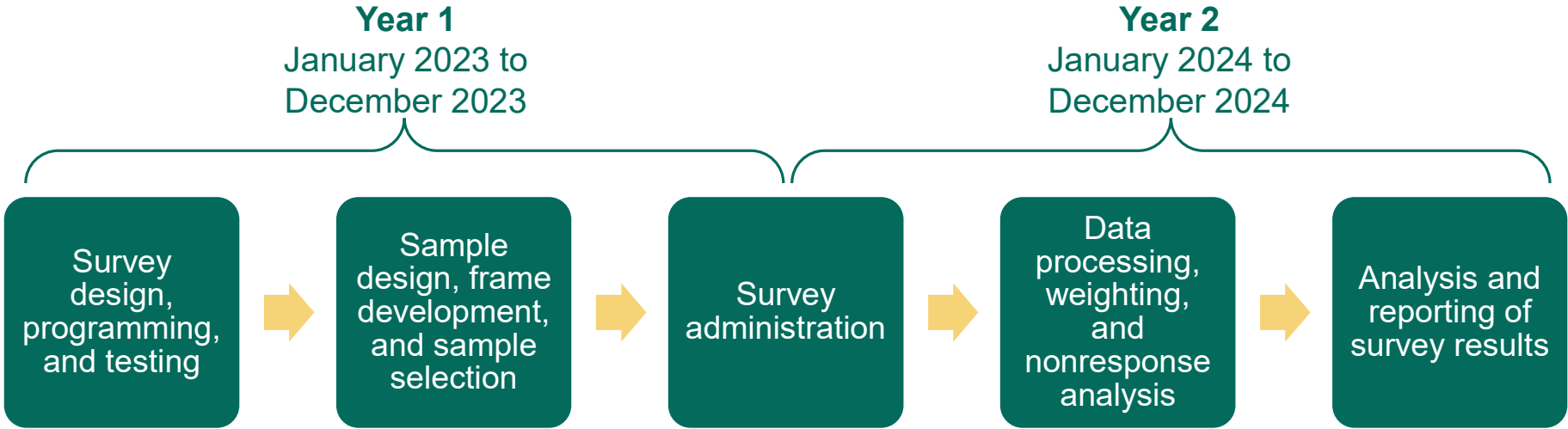


Overview

- / Mathematica will develop, field, and analyze data from a survey of physician practices and a survey of physicians in 2023–2024 for the American Medical Association (AMA).**
 - We will collect the data needed to calculate practice expenses per hour of patient care by physician specialty for up to 46 Medicare specialties.
 - The practice survey will provide the components of physician expense (numerator); the physician survey will provide the physician patient care hours (denominator).



Project process and timeline





Survey design, programming, and testing

	Practice survey	Physician survey
Survey design	Mathematica will start with the AMA's existing practice survey instrument and revise in collaboration with the AMA.	Mathematica will develop a physician survey instrument to collect information on hours spent in direct patient care by physicians.
Programming	Both surveys will be programmed online using Conconfirm and tested by both Mathematica and the AMA.	
Testing	Mathematica will conduct a pre-test with a sample of AMA-identified practices and physicians (up to 10 pre-tests with each). Mathematica will review pre-test findings with the AMA and make modifications to surveys.	

Timing: January to May 2023



Sample design and frame development

/ **Sampling unit**

- We will identify group practices using Taxpayer Identification Numbers (TINs); the TIN is our sampling unit.

/ **Who will be sampled**

- Practices: Individual ownership practices and those with more complex ownership structures
- Physicians affiliated with sampled practices that complete a practice survey

/ **Data sources**

- Medicare Data on Provider Practice and Specialty (MD-PPAS), OneKey data, and Medicare fee-for-service claims data

/ **Sampling strategy**

- Practices will be sampled based on size, specialty, ownership, and site-of-service

Timing: January to March 2023



Sample selection

	Practice survey	Physician survey
Size of survey sample (overall)	10,800 practices (3,400 complex-ownership practices and 7,400 individual-ownership practices) Sample will be released in two waves: the first wave of 3,000 practices and the second wave of 7,800 practices	Starting sample estimated to be 90,000 physicians from the 3,243 practices that complete the practice survey
Target number of survey completes	3,243 practice surveys (1,043 from complex-ownership practices and 2,200 from individual-ownership practices)	9,000 physicians
Anticipated response rate	30%	10%

Timing: April to May 2023



Survey fielding preparation

/ **Key activities:**

- Gather endorsements from medical specialty societies
- Draft personalized invitations, reminder letters, and mailing inserts
- Build a sample management system to manage the sample
- Prepare an adaptive design plan to guide survey fielding

Timing: January to May 2023



Survey administration

	Practice survey	Physician survey
Mode and duration	Single-mode, online survey fielded in two waves; each wave runs for seven months First wave will include a three-month pilot to assess procedures and initial response	Single mode, online survey fielded in three waves; each wave runs eight weeks
Contact strategy, cooperation, and incentives	Practice contact information will come from OneKey (provided by IQVIA) Mathematica will contact practices by email and mail Monetary incentive offered to individual-ownership practices that complete the survey Individual practice survey report showing practice-level data offered to all practices that complete the survey	Practices that completed the practice survey will be asked to send the link to the survey to their physicians via email Mathematica will survey physicians in practices that chose not to share the survey link Physician emails will come from IQVIA. Mathematica will contact physicians by email and mail
Monitoring and reporting	Mathematica will monitor progress and report responses weekly to the AMA	

Timing: June 2023 to April 2024



Data processing, weighting, and nonresponse analysis

/ Data processing

- Mathematica will review early and interim survey data to prepare for analysis.
- Final data files will be processed to create analytic data file.

/ Weighting and nonresponse adjustments

- Mathematica will develop final analysis weights to adjust for probability of selection, practice eligibility, and cooperation, ensuring selected weighted totals match marginal population totals from the sample frame.
- Mathematica will evaluate the potential for nonresponse bias by conducting a nonresponse bias analysis.
- Mathematica will provide the AMA with a data file layout and a weighted analytic file of survey data, with one observation per practice per specialty.

Timing: May to July 2024



Analysis and reporting of survey results

/ Analysis

- To calculate estimates of practice expenses per patient care hour, Mathematica will divide estimates from the practice survey (*expenses*) by the physician survey (*patient care hours*) for sampled practices.

/ Reporting and documentation

For the AMA:

- Summary statistics report
- Summary practice expense report
- Survey methodology report

For practices that

complete the survey:

- Individual practice survey reports

For medical specialty societies:

- Medical specialty reports

Timing: August to December 2024



Project delivery

/ Throughout the project, Mathematica will:

- Conduct regular check-in calls with the AMA (weekly or every other week)
- Communicate risks early and identify and discuss remediation plans
- Create and monitor data security plan
- Monitor budget and schedule

Timing: January 2023 to December 2024