# MEPS HC 246: 2023 Jobs File

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# A. Data Use Agreement

Individual identifiers have been removed from the micro-data contained in these files. Nevertheless, under Sections 308 (d) and 903 (c) of the Public Health Service Act (42 U.S.C. 242m and 42 U.S.C. 299 a-1), data collected by the Agency for Healthcare Research and Quality (AHRQ) and/or the National Center for Health Statistics (NCHS) may not be used for any purpose other than for the purpose for which they were supplied; any effort to determine the identity of any reported cases is prohibited by law.

Therefore in accordance with the above referenced Federal Statute, it is understood that:

- 1. No one is to use the data in this data set in any way except for statistical reporting and analysis; and
- 2. If the identity of any person or establishment should be discovered inadvertently, then (a) no use will be made of this knowledge, (b) the Director Office of Management AHRQ will be advised of this incident, (c) the information that would identify any individual or establishment will be safeguarded or destroyed, as requested by AHRQ, and (d) no one else will be informed of the discovered identity; and
- 3. No one will attempt to link this data set with individually identifiable records from any data sets other than the Medical Expenditure Panel Survey or the National Health Interview Survey. Furthermore, linkage of the Medical Expenditure Panel Survey and the National Health Interview Survey may not occur outside the AHRQ Data Center, NCHS Research Data Center (RDC) or the U.S. Census RDC network.

By using these data you signify your agreement to comply with the above stated statutorily based requirements with the knowledge that deliberately making a false statement in any matter within the jurisdiction of any department or agency of the Federal Government violates Title 18 part 1 Chapter 47 Section 1001 and is punishable by a fine of up to \$10,000 or up to 5 years in prison.

The Agency for Healthcare Research and Quality requests that users cite AHRQ and the Medical Expenditure Panel Survey as the data source in any publications or research based upon these data.

# B. Background

# **1.0** Household Component

The Medical Expenditure Panel Survey (MEPS) provides nationally representative estimates of health care use, expenditures, sources of payment, and health insurance coverage for the U.S. civilian noninstitutionalized population. The MEPS Household Component (HC) also provides estimates of respondents' health status, demographic and socioeconomic characteristics, employment, access to care, and satisfaction with care. Estimates can be produced for individuals, families, and selected population subgroups. The panel design of the survey includes five rounds of interviews covering 2 full calendar years. Information about each household member is collected through computer assisted personal interviewing (CAPI) technology, and the survey builds on this information from interview to interview. All data for a sampled household are reported by a single household respondent.

The MEPS HC was initiated in 1996. Each year, a new panel of sample households is selected. Because the data collected are comparable to those from earlier medical expenditure surveys conducted in 1977 and 1987, it is possible to analyze long-term trends. Historically, each annual MEPS HC sample consists of up to 15,000 households. Data can be analyzed at either the person, the family, or the event level. Data must be weighted to produce national estimates.

The set of households selected for each panel of the MEPS HC is a subsample of households participating in the previous year's National Health Interview Survey (NHIS) conducted by the National Center for Health Statistics (NCHS). The NHIS sampling frame provides a nationally representative sample of the U.S. civilian noninstitutionalized population. In 2006, the NCHS implemented a new sample design for the NHIS, to include households with Asian persons in addition to households with Black and Hispanic persons in the oversampling of minority populations. In 2016, NCHS introduced another sample design that discontinued the oversampling of these minority groups.

# 2.0 Medical Provider Component

When the household CAPI interview is completed, and permission is obtained from the sample members to contact their medical provider(s), a sample of these providers is contacted by telephone to obtain information that household respondents cannot accurately provide. This part of the MEPS is called the Medical Provider Component (MPC), and it collects information on dates of visits, diagnosis and procedure codes, and charges and payments. The Pharmacy Component (PC), a subcomponent of the MPC, does not collect data on charges or diagnosis and procedure codes, but it does collect detailed information on drugs, including the National Drug Code (NDC) and medicine name, as well as amounts of payment. The MPC is not designed to yield national estimates. It is primarily used as an imputation source to supplement/replace household-reported expenditure information.

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# 3.0 Survey Management and Data Collection

MEPS HC and MPC data are collected under the authority of the Public Health Service Act. The MEPS HC data are collected under contract with Westat, Inc. and the MEPS MPC data are collected under contract with Research Triangle Institute. Datasets and summary statistics are edited and published in accordance with the confidentiality provisions of the Public Health Service Act and the Privacy Act. The NCHS provides consultation and technical assistance.

As soon as the MEPS are collected and edited, they are released to the public in stages of microdata files, and tables via the MEPS website and datatools.ahrq.gov.

Additional information on MEPS is available from the MEPS project manager or the MEPS public use data manager at the Center for Financing, Access, and Cost Trends, Agency for Healthcare Research and Quality, 5600 Fishers Lane Rockville, MD 20857 (301-427-1406).

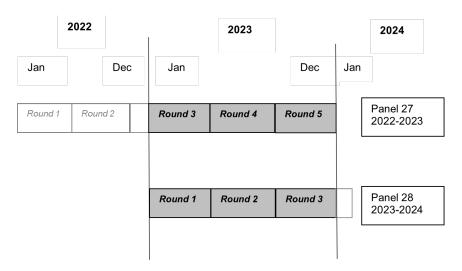
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# C. Technical and Programming Information

Section C of this document offers a brief overview of the data provided in MEPS Jobs Public Use File HC 246 (hereafter referred to as the Jobs PUF), a detailed description of the content and structure of the codebook, reserved code values, and variable naming conventions. It is followed by Section D containing the Variable-Source Crosswalk, Appendix 1 containing sample SAS program code, and Appendix 2 containing sample Stata program code. A copy of the survey instrument used to collect the information on this file is available on the MEPS website.

## **1.0** General Information

This file is being released as a research file and has undergone the standard quality control procedures usually performed on MEPS data files. The file includes 34,513 records, with each record representing a unique job for a person by round. This file presents information about jobs starting on or before December 31, 2023 only. This Jobs PUF contains job records from two MEPS panels and includes information collected in Rounds 3 through 5 for Panel 27 and Rounds 1 through 3 for Panel 28, as illustrated below. The 2024 Jobs PUF will provide data for Panel 28 jobs that start in 2024.



In the Employment section of CAPI, MEPS collects job-related information in the round in which a job is first reported. For most jobs, these job characteristics are only captured in the first reported round, and are not updated in later rounds if the job continues. While the details collected vary by job type (see Section C2.0: Data File Information), the data reported for a job in its first survey round may include earnings by type (gross salary, tips, etc.), start and stop dates, hours and weeks worked, establishment size, industry and occupation codes, presence of retirement and other benefits, self-employment versus wage-earner status, temporary or seasonal situations, and health insurance availability. Data updates are collected for a only small set of job-characteristics in later rounds in which the job continues.

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In order to obtain complete MEPS information collected for a job, analysts must note the round in which the job is first reported. This is because MEPS collects most job characteristics in that round only, as noted above. Appendix 3 provides a summary table of variables collected in first round only.

Unlike fielding periods in 2020 through 2022, MEPS fielded only two panels in 2023. Therefore, this file only contains data for two panels. For the first year panel, jobs from Panel 28 Rounds 1, 2, and 3 are included in the 2023 Jobs PUF. Complete information for any Panel 28 job is available for jobs that started before January 1, 2024, whether that job was first reported in Round 1, 2, or 3. This is the case for any first year panel (the panel that began its first year of interviewing in the given year) in a Jobs PUF. Round 3 is collected as a cross-year round, between 2023 and 2024, covering the entire period between the current interview date and the prior interview date (regardless of calendar year). Round 3 is not truncated.

For the second year panel (the panel that continued with its second year of interviewing in the given year), jobs from Panel 27 Rounds 3, 4, and 5 are included in the 2023 Jobs PUF. If the Round 3, 4, or 5 job continued from Round 1 or Round 2, analysts must look back to the Jobs PUF from the previous year (2022) to obtain complete information for the job. Round 3 is collected as a cross-year round, between 2022 and 2023, covering the entire period between the current interview date and the prior interview date (regardless of calendar year). It is not truncated. Round 5 is a terminal round, referring back to the period between Round 4 and December 31, 2023. The round is truncated at December 31, 2023, even if the job continued beyond that date.

Appendix 1 includes sample SAS code and Appendix 2 contains sample Stata code to assist analysts in obtaining information from previous Jobs PUFs. A complete list of variables available on the first report of a job only can be found in Appendix 3. Analysts should note that, because of differences in sample composition between the current year and the previous year files (i.e., a person was included in the previous year's delivery but not the current year or vice versa), or because more accurate information was received in subsequent round comments following the delivery of the Jobs records in the previous year, there occasionally may not be a corresponding job in the previous year file.

## 2.0 Data File Information

#### 2.1 Codebook Structure

For each variable on the 2023 Jobs PUF, an unweighted frequency is provided in the accompanying codebook file.

#### 2.2 Reserved Codes

This Jobs PUF includes several reserved code values.

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**Table 1**Reserved Code Values and Definitions

| Value | Label              | Definition  |
|-------|--------------------|---|
| -1    | Inapplicable       | Question was not asked due to skip pattern  |
| -7    | Refused            | Question was asked and respondent refused to answer question                                      |
| -8    | Don't know         | Question was asked and respondent did not know answer or the information could not be ascertained |
| -10   | Top coded          | Variable was top-coded for confidentiality, as described above                                    |
| -15   | Cannot be computed | Value cannot be derived from data   |

The value Cannot be Computed (-15) was assigned to the MEPS constructed variables when there was not enough information from the instrument to calculate the constructed variable. Not having enough information is often the result of skip patterns in the data or of missing information stemming from the responses Refused (-7) or Don't Know (-8). Note that, in addition to Don't Know, reserved code -8 also includes cases for which the information from the question was Not Ascertained.

#### 2.3 Codebook Format

This codebook describes an ASCII dataset (with related SAS, SPSS, R, and Stata programming statements and data user information), although the data are also provided in a SAS data set, SAS transport file, Stata data set, and Excel file. The file contains 91 variables and has a logical record length of 292 with an additional 2-byte carriage return/line feed at the end of each record.

**Table 2**Programming Identifiers For Each Variable in the Jobs PUF

| Identifier  | Description   |
|-------------|---|
| Name        | Variable name   |
| Description | Variable descriptor   |
| Format      | Number of bytes   |
| Type        | Type of data: numeric (indicated by NUM) or character (indicated by CHAR) |
| Start       | Beginning column position of variable in record                           |
| End         | Ending column position of variable in record                              |

## 2.4 Variable Source and Naming Conventions

As the collection, universe, or categories of variables were altered, the variable names have been appended with "\_Myy" to indicate the collection year in which the alterations took place. These alterations are described in detail throughout this document.

In general, the variable names reflect the content of the variable. Due to system changes, variable names are no longer restricted to 8 characters. Variables contained on this file were derived from the questionnaire itself or from the CAPI. The source of each variable is identified in Section D: Variable-Source Crosswalk. Sources for each variable are indicated in one of two ways:

- 1. Variables derived from CAPI or assigned in sampling are so indicated as "CAPI Derived" or "Assigned in Sampling," respectively;
- 2. Variables that come from one or more specific questions have those questionnaire sections and/or question numbers listed in the "Source" column.

#### 2.5 File Contents

Each record in the 2023 Jobs PUF represents one job reported by a person in a round. In the MEPS, all persons whose reported age is 16 years or older are asked to report on jobs held. Depending on an individual's job history, these reported jobs may be held:

- at the interview date,
- in the round but before the interview date, or
- before the round.

Only those persons reporting a job in a round who have either a positive person-level or family-level weight on the Populations Characteristics PUF will have a record in the 2023 Jobs PUF. Job records may appear on the 2023 Jobs PUF where the person's edited age contained in the Population Characteristics PUF is younger than 16. In these cases, the full year person-level variables on the Population Characteristics PUF will indicate no employment, even though the Jobs PUF records for these individuals will continue to contain valid employment information. While this typically occurs in the second panel of a full year delivery, it may, in rare instances, occur in the first panel as well.

#### 2.5.1 Record Identifiers

The unique record identifier is the variable JOBSIDX, which is composed of a person identifier (DUID + PID), a round identifier (RN), and a job number (JOBNUM). The similarly named variable JOBIDX (without "S") has the same structure as JOBSIDX but without the round identifier (RN). JOBIDX allows analysts to easily select all rounds of the same job for the same person. The DUID identifier in this data release is composed of a 2-digit code to identify the panel and a 5-digit dwelling unit identifier. A panel indicator (PANEL) is included on the file to

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distinguish Round 3 jobs held by Panel 28 persons from Round 3 jobs held by Panel 27 persons. The variable ORIGRND indicates the round in which a job was first created. As such, ORIGRND may or may not contain the same value as RN. After the round the job was first reported, ORIGRND copies forward to job records in subsequent rounds.

ESTBIDX is an establishment identifier composed of DUID + "an establishment number" and can help analysts to (a) determine potential duplication of job records (i.e., a person reports multiple jobs to the same establishment in the same round with many or all of the same characteristics), and (b) better understand job changes, since job holders may leave an establishment and return to the same establishment in any round.

ESTBIDX was added to MEPS in 2021, so analysts pooling data from before 2021 are encouraged to refer to prior years' documentation files to ensure correct and consistent treatment of data over time.

Each job record contains the following identifier variables: JOBSIDX, JOBIDX, ESTBIDX, DUID, and DUPERSID. Each of these identifier variables begins with the 2-digit panel number; this allow analysts to easily identify records delivered in a previous year Jobs PUF (when panel is used in conjunction with other variables, such as RN and ORIGRND). In addition, CAPI assigns a unique job number that *may not be used in subsequent rounds* on different jobs. This 3-byte number, JOBNUM, is unique to the *reporting unit* (RU) and is set to a value that corresponds with the RU in which a person's job was first reported (e.g., A RU is '1', B RU is '2', C RU is '3', etc.). Note: The unique job number within the reporting unit did not exist in all prior years of MEPS Jobs files. It is important that analysts using multiple years of Jobs files carefully read the documentation for every year represented in their analyses in order to identify important differences in variables across data years.

#### 2.5.2 Initial Reporting Round

Most persons held only one job at the first interview date - their "Current Main Job." For persons who held more than one job at the round's interview date (a current job), respondents were asked to identify the main job. This job was classified as the "Current Main Job" and any other simultaneously held jobs were classified as a "Current Miscellaneous Job." The MEPS also obtained some information on any former jobs (Former Main Job or Former Miscellaneous Job) held in the reference period but not at the interview date. For those persons neither working at the interview date, nor earlier during the reference period, limited information on the last job the person held outside of the reference period was collected. Additionally, for those persons aged 55 or older who retired from a job during the reference period, the MEPS obtained some job-level information about the retirement job (Retirement Job).

The variable SUBTYPE indicates the type of job record - current main (1), current miscellaneous (2), former main (3), former miscellaneous (4), last job outside reference period (5), or retirement job (6). When a job was initially reported, MEPS asked for detailed information about any "Current Main Job" and basic information about other job types. Refer to the variable list below and to Employment section questionnaires to see which information was asked for each job type. The following variable list identifies which variables are collected based on the job

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SUBTYPE (current main job, current miscellaneous job, etc.). Whether a variable was collected also varies depending on whether the person was self-employed or was a wage-earner (paid to work for an employer) at a job; these distinctions can be found in the first two columns of the table. (Note: wage-earner is used to describe workers who are not self-employed.) The last column indicates whether the variable is collected only in the round in which the job is first reported (collection only), only when the job is reviewed (review only), or both (collection and review). Appendix 3 is an additional resource, listing variables collected only in the round in which the job was first reported.

This summary table varies over time to reflect changes in MEPS, so analysts should refer to the documentation for every separate year of the MEPS included in their analyses. (The table was first introduced in the 2018 Jobs documentation).

As changes are made, details concerning new and removed variables are addressed in Jobs documentations sections that describe the variable type.

Table 3

Variables Set for Each SUBTYPE

| Variable     | Self-Employed Jobs | Wage Earner Jobs | Current Main | Current Miscellaneous | Former Main | Former Miscellaneous | Last Job Outside<br>Reference Period | Retirement | When Populated        |
|--------------|--------------------|------------------|--------------|-----------------------|-------------|----------------------|--------------------------------------|------------|-----------------------|
| JOBTYPE      | X                  | X                | X            | X                     | x           | X                    | X                                    | X          | collection only       |
| JSTRTM       | x                  | x                | X            | X                     | x           | X                    |                                      |            | collection only       |
| JSTRTY       | X                  | X                | X            | X                     | x           | x                    |                                      |            | collection only       |
| JSTOPM       | x                  | x                |              |                       | x           | x                    | X                                    | X          | collection and review |
| JSTOPY       | X                  | X                |              |                       | x           | x                    | X                                    | X          | collection and review |
| RETIRJOB     | X                  | X                |              |                       |             |                      |                                      | X          | collection and review |
| SUBTYPE      | X                  | Х                | X            | X                     | X           | X                    | X                                    | X          | collection and review |
| JOBHASHI     | Х                  | х                |              | X                     | x           | x                    | X                                    | X          | collection only       |
| NUMEMPS      |                    | X                | X            |                       | X           |                      |                                      |            | collection only       |
| ESTMATE1_M19 |                    | X                | х            |                       | X           |                      |                                      |            | collection only       |

| Variable     | Self-Employed Jobs | Wage Earner Jobs | Current Main | Current Miscellaneous | Former Main | Former Miscellaneous                       | Last Job Outside<br>Reference Period | Retirement | When Populated                                   |
|--------------|--------------------|------------------|--------------|-----------------------|-------------|--|--------------------------------------|------------|--|
| MORELOC      |                    | X                | X            |                       | X           |  |                                      |            | collection only                                  |
| BUSINC       | X                  |                  | X            |                       | X           |  |                                      |            | collection<br>only                               |
| PROPRIET     | x                  |                  | X            |                       | x           |  |                                      |            | collection only                                  |
| TYPEEMPL     |                    | х                | х            |                       | х           | x if not<br>self-<br>employed<br>& retired | х                                    | X          | collection<br>only                               |
| YLEFT_M18    |                    | X                |              |                       | X           |  | X                                    |            | collection only                                  |
| YNOBUSN_M18  | Х                  |                  |              |                       | х           |  | х                                    |            | collection<br>only                               |
| HRSPRWK      | х                  | X                | X            | Х                     | X           |  |                                      |            | collection only                                  |
| HRS35WK      | X                  | X                | X            |                       | X           |  |                                      |            | collection only                                  |
| SICKPAY      |                    | Х                | Х            |                       | х           |  |                                      |            | collection only                                  |
| PAYDRVST     |                    | X                | X            |                       | X           |  |                                      |            | collection only                                  |
| PAYVACTN     |                    | X                | X            |                       | х           |  |                                      |            | collection only                                  |
| RETIRPLN     |                    | X                | X            |                       | X           |  |                                      |            | collection only                                  |
| SESNLJOB     | х                  | Х                | Х            | X                     | X           |  |                                      |            | collection only                                  |
| ТЕМРЈОВ      | X                  | X                | X            | X                     | X           |  |                                      |            | collection only                                  |
| WKLYAMT      | х                  | x                |              | х                     |             |  |                                      |            | collection only                                  |
| EMPLINS      | Х                  | Х                | x            |                       |             |  |                                      |            | collection only                                  |
| OFFRDINS     | х                  | x                | X            | x                     | х           | х  | X                                    | х          | collection<br>only<br>through<br>P27R4/P28<br>R2 |
| OFFRDINS_M24 | X                  | Х                | X            | X                     | X           | X  | X                                    | X          | collection<br>only as of<br>P27R5/P28<br>R3      |

|               | 1                  |                  | 1            | 1                     | 1           | ı                    |                                      | 1          |  |
|---------------|--------------------|------------------|--------------|-----------------------|-------------|----------------------|--------------------------------------|------------|--|
| Variable      | Self-Employed Jobs | Wage Earner Jobs | Current Main | Current Miscellaneous | Former Main | Former Miscellaneous | Last Job Outside<br>Reference Period | Retirement | When Populated   |
| DIFFPLNS      | x                  | x                | x            | x                     | x           | x                    | x                                    | х          | collection<br>only<br>through<br>P27R4/P28<br>R2                       |
| DIFFPLNS_M24  | х                  | X                | х            | х                     | х           | х                    | X                                    | X          | collection<br>only as of<br>P27R5/P28<br>R3                            |
| ANYINS        | X                  | Х                | х            | х                     | Х           | X                    | х                                    | X          | collection<br>only<br>through<br>P27R4/P28<br>R2                       |
| ANYINS_M24    | х                  | х                | Х            | X                     | х           | х                    | х                                    | X          | collection<br>only as of<br>P27R5/P28<br>R3                            |
| INUNION       | х                  | Х                | X            | X                     | X           | X                    | Х                                    | X          | collection only  |
| EMPLUNIONPROV | х                  | х                | х            | Х                     | х           | х                    | х                                    | Х          | collection only  |
| HIDISAVW      | х                  | х                | X            | X                     | х           | X                    | Х                                    | X          | at insurance collection only   |
| HHMEMBER_M18  | х                  |                  | X            | X                     | X           | X                    | Х                                    | X          | collection only  |
| TOTLEMP_M18   | х                  |                  | X            | X                     | X           | X                    | Х                                    | X          | collection and review  |
| TOTNUMEMP     | х                  |                  | X            | X                     | X           | X                    | Х                                    | X          | collection only  |
| RVWTOTNUMEMP  | х                  |                  | Х            | X                     |             |                      |                                      |            | review only  |
| INDCODEX      | х                  | х                | х            |                       | х           |                      | х                                    | х          | constructed<br>based on<br>collection<br>only<br>through<br>P27R3      |
| INDCAT17      | х                  | х                | х            |                       | X           |                      | х                                    | X          | constructed<br>based on<br>collection<br>only as of<br>P27R3/P28<br>R1 |

| Variable    | Self-Employed Jobs | Wage Earner Jobs | Current Main | Current Miscellaneous | Former Main | Former Miscellaneous | Last Job Outside<br>Reference Period | Retirement | When Populated   |
|-------------|--------------------|------------------|--------------|-----------------------|-------------|----------------------|--------------------------------------|------------|--|
| OCCCODEX    | Х                  | х                | Х            |                       | X           |                      | X                                    | X          | constructed<br>based on<br>collection<br>only<br>through<br>P27R3      |
| OCCCAT18    | х                  | х                | х            |                       | х           |                      | х                                    | х          | constructed<br>based on<br>collection<br>only as of<br>P27R3/P28<br>R1 |
| SALARIED    |                    | X                | X            |                       | X           |                      |                                      |            | collection and review  |
| HOWPAID     |                    | Х                | Х            |                       | х           |                      |                                      |            | collection<br>and review   |
| DAYWAGE     |                    | X                | X            |                       | X           |                      |                                      |            | collection<br>and review   |
| HRSPRDY     |                    | X                | X            |                       | X           |                      |                                      |            | collection   |
| MAKEAMT     |                    | X                | X            |                       | X           |                      |                                      |            | and review collection  |
| PERUNIT_M18 |                    | X                | X            |                       | X           |                      |                                      |            | and review collection  |
| MORE10      |                    | X                | X            |                       | X           |                      |                                      |            | and review collection  |
| MORE15      |                    | X                | X            |                       | X           |                      |                                      |            | and review collection  |
| MOREMINM    |                    | X                | X            |                       | X           |                      |                                      |            | and review collection  |
| GROSSPAY    |                    | X                | X            |                       | X           |                      |                                      |            | and review collection  |
| GROSSPER    |                    | X                | X            |                       | X           |                      |                                      |            | and review collection  |
|             |                    |                  |              |                       |             |                      |                                      |            | and review collection  |
| SALRYWKS    |                    | X                | X            |                       | X           |                      |                                      |            | and review collection  |
| HRSALBAS    |                    | X                | X            |                       | Х           |                      |                                      |            | and review   |
| EARNTIPS    |                    | X                | X            |                       | X           |                      |                                      |            | collection and review  |
| EARNBONS    |                    | Х                | х            |                       | Х           |                      |                                      |            | collection<br>and review   |

|               | Self-Employed Jobs | Wage Earner Jobs | Current Main | Current Miscellaneous | Former Main | Former Miscellaneous | Last Job Outside<br>Reference Period | Retirement | When Populated                            |
|---------------|--------------------|------------------|--------------|-----------------------|-------------|----------------------|--------------------------------------|------------|---|
| Variable      | Se                 |                  |              | Ü                     |             | FC                   | La<br>Re                             | Re         | collection                                |
| EARNCOMM      |                    | Х                | X            |                       | X           |                      |                                      |            | and review                                |
| TIPSUNIT_M18  |                    | X                | X            |                       | X           |                      |                                      |            | collection and review                     |
| TIPSAMT       |                    | X                | X            |                       | X           |                      |                                      |            | collection and review                     |
| BONSUNIT      |                    | х                | Х            |                       | х           |                      |                                      |            | collection and review                     |
| BONSAMT       |                    | х                | х            |                       | х           |                      |                                      |            | collection<br>and review                  |
| COMMUNIT      |                    | х                | Х            |                       | х           |                      |                                      |            | collection and review                     |
| COMMAMT       |                    | х                | х            |                       | х           |                      |                                      |            | collection and review                     |
| HRLYWAGE      |                    | х                | х            |                       | х           |                      |                                      |            | collection and review                     |
| TYPECHGD      | х                  | х                | Х            |                       |             |                      |                                      |            | constructed<br>based on<br>review only    |
| STILLAT       | Х                  | Х                | Х            |                       |             |                      |                                      |            | review only                               |
| MAIN_JOB      | Х                  | Х                | Х            |                       |             |                      |                                      |            | review only                               |
| DIFFWAGE      |                    | X                | X            |                       |             |                      |                                      |            | review only                               |
| STILLWORKFTPT | X                  | X                | X            |                       |             |                      |                                      |            | review only                               |
| WHYCHNGPTTOFT | X                  | Х                | X            |                       |             |                      |                                      |            | review only                               |
| WHYCHNGFTTOPT | X                  | Х                | X            |                       |             |                      |                                      |            | review only                               |
| STILLWRK      | Х                  | Х                |              | Х                     |             |                      |                                      |            | review only                               |
| OFFTAKEI      | Х                  | Х                | Х            | Х                     |             |                      |                                      |            | review only                               |
| NOWTAKEI_M22  | Х                  | Х                | Х            | Х                     |             |                      |                                      |            | review only                               |
| ESTBTHRU      | х                  | х                | х            | х                     |             |                      |                                      |            | review only<br>through<br>P27R4/P28<br>R2 |

| Variable     | Self-Employed Jobs | Wage Earner Jobs | Current Main | Current Miscellaneous | Former Main | Former Miscellaneous | Last Job Outside<br>Reference Period | Retirement | When Populated                              |
|--------------|--------------------|------------------|--------------|-----------------------|-------------|----------------------|--------------------------------------|------------|---|
| ESTBTHRU_M24 | X                  | X                | X            | X                     |             |                      |                                      |            | collection<br>only as of<br>P27R5/P28<br>R3 |
| INSESTB      | X                  | X                | X            | X                     |             |                      |                                      |            | review only<br>through<br>P27R4/P28<br>R2   |
| INSESTB_M24  | X                  | X                | X            | X                     |             |                      |                                      |            | collection<br>only as of<br>P27R5/P28<br>R3 |
| WHY_LEFT_M18 | X                  | X                |              |                       | X           | X                    |                                      |            | review only                                 |

For last jobs outside of reference period and retirement jobs that ended more than two years before the beginning of the reference period, questions that populate HHMEMBER\_M18 (indicating whether any other household members work at the business) and TOTLEMP\_M18 (number of employees as of this round at the self-employed job)) were not asked. The precise calculation of the two-year cut-off date was not possible for some persons due to allowed negative values on stop year, stop month, and reference period start month. Therefore, in some circumstances, HHMEMBER\_M18 and TOTLEMP\_M18 may be still collected for some retirement jobs and for some jobs outside the reference period, even though they ended more than two years before the reference period.

Additional factors that determine whether an Employment question is asked, or whether a job characteristic is available on this file are described throughout this document.

#### 2.5.3 Skip Patterns

Due to the complexity of many skip patterns, it is recommended that analysts of the 2023 Jobs PUF become familiar with the Employment (EM) section in the MEPS questionnaire. To aid analysts, a crosswalk between variables and MEPS questionnaire numbers is provided in this release in Section D: Variable-Source Crosswalk.

The following examples of variables involved in skip patterns are presented to be illustrative; these examples do not represent the full range of variables affected by questionnaire skip patterns.

In one example of a skip pattern, the MEPS does not obtain job-related benefits such as vacation, sick leave, and pension information for self-employed jobs, so these benefits variables were coded as Inapplicable (-1) for self-employed jobs. MEPS also does not attempt to obtain wage, salary, and information regarding whether the job was in the private sector, federal or local government (TYPEEMPL) for the self-employed. So again, due to the skip pattern, TYPEEMPL, HRLYWAGE, and all other wage and salary variables were coded as Inapplicable (-1) for self-employed jobs.

Conversely, the questions relating to business organization type (BUSINC, PROPRIET) are asked only of the self-employed, so those variables were coded as Inapplicable (-1) for jobs performed by wage earners.

#### 2.5.4 Job Updates and Inapplicable (-1) Values

The MEPS used dependent interviewing in Rounds 3, 4, and 5 for Panel 27, and in Rounds 2 and 3 for Panel 28 (see Review of Employment [RJ] section in the questionnaire). In these rounds, the MEPS asked about current main and current miscellaneous jobs held at the previous round interview date to determine whether the job holder continued to work at these jobs. For other job types (former, last, or retirement) reported in the previous round, the MEPS did not ask any follow-up questions. These jobs, by definition, are no longer held by the person and therefore are not included on the file except in the round they were first reported, the rounds in which the job continued, and the round in which it ended. (Note: a former job in the prior round may have been a current job in an earlier round.)

With dependent interviewing, if a person still held a Current Main Job from the previous round, the MEPS asked whether the job was still the main job. For most job holders, it was reported that they still worked at the same job and it was still their main job. For some job holders, the job is reported to have ended, or to have continued, but is no longer the main job. If, in a subsequent interview, a job was no longer held, it was designated as a former job for that follow-up round. It is also possible, although unusual, for a job to change from main to miscellaneous (or vice versa) in a round subsequent to the initial report.

If job status remained the same for a continuing job (either current main or current miscellaneous), the MEPS asked a subset of the employment questions as a review. Because the MEPS asked only this subset of questions if job status for a person did not change in later rounds, many job-level variables on the subsequent round's job records were coded as Inapplicable (-1); the information for these variables for a continued job are located on the record for the job in the first round in which it was reported. Thus, when working with job records, it is important to (a) determine whether a job continues from the previous round, and (b) identify the round in which the continuing job was first reported (ORIGRND). In rounds for a continuing job, the variables STILLAT (for jobs that were current main in the previous round) and STILLWRK (for jobs that were current miscellaneous in the previous round) indicate whether a person still holds the job at the subsequent round interview date. The variable SUBTYPE on the subsequent round record indicates whether the job is main or miscellaneous in that subsequent round. Note that if a Panel 27 job included in this 2023 Jobs PUF is continued from a job first reported in Round 1 or 2, much of the information will be contained in the 2022 Jobs PUF (HC

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237). Analysts should access the prior year file to obtain the desired job characteristics. Appendix 1 provides a sample SAS program showing how to do this, and Appendix 2 provides a sample Stata program showing how to do this. A complete list of variables available on the first report of a job only can be found in Appendix 3.

Any newly reported job in Rounds 2-5 is collected the same way as a newly reported job in Round 1.

Variables that relate only to the review of a job that was first reported in a previous round (DIFFWAGE, ESTBTHRU, ESTBTHRU\_M24, INSESTB, INSESTB\_M24, MAIN\_JOB, NOWTAKEI\_M22, OFFTAKEI, STILLAT, STILLWORKFTPT, STILLWRK, RVWTOTNUMEMP, WHY\_LEFT\_M18, WHYCHNGPTTOFT, WHYCHNGFTTOPT) were not asked in Round 1, and are not asked in any round in which a job is newly reported. These variables were coded as Inapplicable (-1) on a Jobs record for the round in which the job was initially reported.

Another type of job update pertains to situations where a reviewed current miscellaneous job becomes the current main job in the round. The flag variable TYPECHGD indicates whether a job changed from a current miscellaneous job to a current main job. For these types of jobs, questions that were asked when the job was first reported as a current miscellaneous job were not re-asked, with three exceptions.

- 1. Responses to either EM540 or EM620 (typical hours worked per week) were used to populate the variable HRSPRWK. When originally reported, EM620 (but not EM540) was asked for the current miscellaneous job. As a current main job, EM540 was asked instead of EM620. Consequently, there may be different values on HRSPRWK between rounds.
- 2. Responses to either EM560 or EM630 (whether job is temporary) were used to populate the variable TEMPJOB. When originally reported, EM630 (but not EM560) was asked for the current miscellaneous job. As a current main job, EM560 was asked instead of EM630. Consequently, there may be different values on TEMPJOB between rounds.
- 3. Responses to either EM570 or EM640 (whether job is seasonal) were used to populate the variable SESNLJOB. When originally reported, EM640 (but not EM570) was asked for the current miscellaneous job. As a current main job, EM570 was asked instead of EM640. Consequently, there may be different values on SESNLJOB between rounds.

#### 2.5.5 Exceptions to the Inapplicable (-1) Rule

Unlike the situation explained above (applicable for most variables on the file), for certain variables a value other than Inapplicable (-1) does not necessarily mean that a job is newly reported. For a small subset of variables, previous round variables were carried forward to the next round, even if there were no updates to the variables since they were originally reported.

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There are two distinct situations in which this special treatment was used, due to internal processing needs.

The first exception occurs when questions related to the affected variables were skipped over as Inapplicable (-1) during the interview in rounds subsequent to the one in which the job was initially reported, but the originally reported response was carried forward from round to round. This group includes the following 14 variables: EMPLINS, HRSPRWK, HRS35WK, JOBTYPE, JSTRTY, JSTRTM, MORELOC, NUMEMPS, OFFRDINS[\_M24], EMPLUNIONPROV, TYPEEMPL, JOBHASHI, HRSALBAS, and RETIRJOB. Note that HRSALBAS and RETIRJOB may also be updated in subsequent rounds.

The second exception occurs for certain questions that were asked during the review of a job in rounds following the round in which the job was initially reported. If there was no change based on the review, the value for the affected variable was carried forward from the previous round. If there was a change, the variable was updated to reflect the new information. These five variables are: JSTOPY, NOWTAKEI M22, OFFTAKEI, SUBTYPE, and TOTLEMP M18.

Variables related to earnings (such as HRLYWAGE, GROSSPAY, SALARIED) were treated similarly to the five variables just discussed. In the RJ section, the MEPS attempted to obtain information regarding changes in wages for the same job from round to round. If there were no wage changes (indicated by the DIFFWAGE variable), then the most recent round's information was carried forward. If changes were recorded, then the relevant variables were updated. For every new main job reported for a person, the MEPS attempted to obtain current wage information.

#### 2.5.6 Top-Coding, Bottom-Coding, Editing, and Confidentiality

#### Outlier Wage Editing on Current Main Jobs

In 2023, wage information on current main job records was logically edited for consistency using established rules and guidance from AHRQ. Outliers were checked for persons who reported a wage change where the newly reported wage (a) was substantially different from the prior wage (change >=100%), (b) was no different than the prior wage, (c) was low in value (\$0 < wage < \$1) or, (d) had a value higher than the prior year's top code value. There are numerous sources for these types of errors, including keystroke or respondent error. In 2023, wage information of approximately 100 persons were reviewed per panel, resulting in approximately 222 specific wage-related variable edits (overall).

#### Wage Top-Coding

Wage information reported during the interview is delivered in the 2023 Jobs PUF. The earnings variables include HRLYWAGE, BONSAMT, COMMAMT, TIPSAMT, DAYWAGE, WKLYAMT, GROSSPAY, and MAKEAMT. For reasons of confidentiality, earnings variables on the 2023 Jobs PUF were top-coded. A value of Top Coded (-10) for one of these variables indicates that the variable had a positive value and that the hourly rate for that earnings variable

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for the record was greater than or equal to \$132.21. The process by which the top-code value for the Jobs PUF was derived incorporates the wage top-code process used in the Populations Characteristics PUF top-coding process. The purpose of coordinated top-coding is to ensure confidentiality for each person across files.

In order to top code wage amounts delivered in the Jobs PUF using the hourly wage top code value identified in Population Characteristics PUF processing, calculated hourly wage variables were created by converting a wage from 'annual,' 'monthly,' 'bi-weekly,' 'weekly,' and 'daily' to 'hourly.' If an earnings amount is missing, no 'hourly' value is assigned to the job. When an earnings unit is needed to calculate the hourly wage variable and the unit is missing, a value is assigned based on a 2,080 hour work year. For example, if an annual wage is reported but the number of weeks per year a person works is missing, a value of '52' is used to calculate the hourly wage. In other cases, such as when earning units were reported as Other (91), no substitution is made and an hourly wage is not calculated for top coding purposes. In these cases, wage amounts are left as reported. These calculated hourly variables and assignment of missing unit values are for internal use and are not delivered in the Jobs PUF. Unlike the Population Characteristics PUF, no wage variables were imputed in the Jobs PUF. Instead, the earnings information remains as reported (e.g., don't know).

In addition to using wages from the first report of a current main job, updated wages from that job reported in any subsequent round were also included in deriving the wage top-code value. This updated wage value appears in the NHRWG\_M23 variable on the 2023 Population Characteristics PUF, but is reflected in wage variables including DAYWAGE, MAKEAMT, GROSSPAY, HRLYWAGE, and in some instances COMMAMT or BONSAMT in cases where one or the other is reported as the primary wage type on the 2023 Jobs PUF. The updated hourly wage variable changed in 2023. Analysts should refer to the 2023 Population Characteristics PUF for more details.

On the 2023 Population Characteristics PUF, any person who has a wage for any job in any 2023 round that is greater than or equal to the top-code value had all 2023 wages for all jobs top-coded, in all 2023 rounds. Any person whose wages are top-coded on the 2023 Population Characteristics PUF also has *all* wages on *all* jobs top-coded in the 2023 Jobs PUF.

Only current main jobs are summarized on the 2023 Population Characteristics PUF. This means that analysts will not find job information for current miscellaneous jobs, former miscellaneous jobs, newly reported former main jobs, retirement jobs, or last job held outside of the reference period on the 2023 Population Characteristics PUF. When reported wages at these specific types of jobs exceed the current year top-code value on the 2023 Jobs PUF, the wages for that job are top-coded on the 2023 Jobs file, along with all other wages for that job holder on all other jobs in the file. All wages for that job holder are top-coded in the 2023 Population Characteristics PUF as well. Analysts should note that there are other wages appearing only on the 2023 Jobs PUF that are top coded on the 2023 Jobs PUF but do not prompt top coding of all other wages on all files.

There are some jobs where respondents indicate that a supplemental wage, such as a commission, tip, or bonus, is greater than or equal to the wage top-code value but, at that same job, the base wage such as the annual salary is not. For these cases, only the tips, commissions,

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or bonus amounts were top-coded on the job when they are greater than or equal to the wage top-code value (note, these supplemental wages reside on the 2023 Jobs PUF but not on the 2023 Population Characteristics PUF). All other wage amounts for all jobs for these persons were left as reported. (This applies to wages and jobs on both the 2023 Population Characteristics PUF and 2023 Jobs PUF.)

Wages can be top-coded to -10 on the Jobs PUF for three less common situations. These situations are:

- 1. If wages at a current main job were imputed on the Full Year Population Characteristics PUF to a value less than the top code value but calculated on the Full Year Jobs PUF greater than or equal to the top code value, or
- 2. If wages at a current main job that changed to a current miscellaneous job are greater than or equal to the top code value. Note that wages earned through a miscellaneous job are not reported on the Full Year Population Characteristics PUF, or
- 3. If a wage is only available in the Jobs PUF, and the mathematical calculation used in the Jobs PUF process differs from the calculation method used in the Population Characteristics PUF, and the wage is greater than or equal to the top code value using both methods.

#### Wage Confirmation in CAPI

To improve the quality of wage reports, CAPI prompts the respondent to confirm wages reported in the Employment Wage section if a wage amount falls outside a specified wage range. Ranges vary depending on the unit of pay.

Table 4

Units of Pay and Corresponding Wage Ranges

| Unit of pay       | Wage range        |
|-------------------|-------------------|
| Per year          | \$5,000-\$200,000 |
| Per month         | \$375-\$20,000    |
| Per 2-week period | \$150-\$10,000    |
| Per week          | \$75-\$5,000      |
| Per day           | \$10-\$750        |
| Per hour          | \$1-\$125         |

To calculate the hourly rate for earnings types not reported on an hourly basis, the number of hours per week worked and, in some cases, the number of weeks worked were used in conjunction with the various amounts. These hours and weeks are included in the Jobs PUF along with the reported earnings amounts, but the calculated hourly rates are not included on the Jobs PUF for these jobs. (Earnings variables were not reconciled with income data collected elsewhere in the MEPS.)

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#### Establishment Size Information

The establishment size variable for the self-employed is TOTLEMP\_M18. In addition, two variables contain the individual responses collected at RJ110 and EM740 (number of employees at a self-employed job). They are RVWTOTNUMEMP (establishment size at continuing self-employed job) and TOTNUMEMP (establishment size at newly reported self-employed job), respectively.

The establishment size for wage-earners can be found in NUMEMPS (establishment size at non-self-employed job); this value is collected at EM430 (number of employees). Respondents who did not know the actual establishment size (NUMEMPS) were asked in question EM440 (ESTIMATE1\_M19) to choose approximate establishment size from a number of size ranges (e.g., 2-9, 10-25). The value Cannot Be Computed (-15) is not an allowed value for ESTMATE1\_M19.

For confidentiality reasons, NUMEMPS, TOTLEMP\_M18, RVWTOTNUMEMP and TOTNUMEMP were top coded to "-10 TOP CODED" for establishment sizes greater than or equal to 22,000 employees.

#### Job Start/Stop Year

In addition to top coding wages and establishment size, the start year of job (JSTRTY) and the stop year of job (JSTOPY) were bottom-coded. This was done because a person's age may be calculated using the job start or stop year and that age may indicate that the job holder is older than 85 years, the age top-code value used across MEPS PUFs. The bottom-code year value was calculated by taking the delivery year in which the job is first reported (e.g., 2023), subtracting the age top-code value (i.e., 85 years of age), then adding back 15 (i.e., the age of a person in the year before entering the work force as defined in MEPS). For the 2023 Jobs file, the bottom code value for the job start and stop year on jobs first reported in Panel 28 Round 1, Round 2, or Round 3, or Panel 27 Round 3, Round 4, or Round 5 is 1953. Jobs that were first reported in Panel 27 Round 1 or Round 2 were delivered in the 2022 Jobs file and have a bottom code value of 1952.

#### 2.5.7 Temporary and Seasonal Jobs

Two variables in this Jobs PUF pertain to the temporary and seasonal nature of a person's main or miscellaneous job. The variable TEMPJOB indicates whether a main or miscellaneous job is temporary (i.e., is a current main job for a limited amount of time or until the completion of a project). The variable SESNLJOB indicates either that a main or miscellaneous job is available only during certain times of the year or that the individual is working throughout the entire year at that job. Teachers and other school personnel who work only during the school year are considered to work year round. These questions were asked of newly reported jobs only. These variables were set to Inapplicable (-1) for all subsequent rounds. These questions were not asked of newly reported former miscellaneous jobs, last jobs outside of reference period, and retirement jobs.

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## 2.5.8 Reason No Longer at Place of Employment

In cases where a former job is newly reported, questions were asked regarding why the person is no longer at that place of work. For wage earners, this information is stored in YLEFT\_M18. For self-employed persons, this information is stored in YNOBUSN M18.

When a main or miscellaneous job ends in the round, the variable WHY\_LEFT\_M18 indicates the reason for leaving the place of employment in the round. This variable is helpful in understanding job changes, as well. It is included in the Population Characteristics PUF when describing a person's job change from one CMJ to another in the variable YCHGrrrr.

In order to ensure consistent interpretation of selection values for these variables, the MEPS provides accessible guidance for interviewers regarding the analytic construct of each value. Refer to Appendix 4 for further information.

#### 2.5.9 Retirement from a Job/Workforce

MEPS reflects the complex status of "retired" in several ways across the Jobs and Population Characteristics PUFs. These instrument flows are described below.

#### CAPI Path 1

For persons aged 55 or older who either (a) worked at some point in the round, or (b) are in their first MEPS interview and did not work in the round but worked prior to MEPS, the question EM350 probes for instances of retirement in the round. If the respondent reports retirement, they may then select an existing former job at question EM380 or create a new retirement job whose SUBTYPE is set to Retirement Job (6) at question EM390. More than one job may be selected, as well.

#### CAPI Path 2

In the case of persons who worked in the round (i.e., person has a former main job [SUBTYPE=3] in the round or a former miscellaneous job [SUBTYPE=4] in the round), a setting of Yes (1) on the Jobs PUF variable RETIRJOB indicates the job holder was actively employed at the job in the round but stopped working due to retirement. This information is represented in the Population Characteristics PUF variable EVRETIRE if the person is in scope and aged 55 or older in the round. These persons may continue to work in the round and have current job records, that is, jobs with SUBTYPE values of Current Main Job (1) and Current Miscellaneous Job (2). Analysts should note that EVRETIRE is not applicable to persons under age 55 and there is no equivalent variable that applies to retirement for younger MEPS respondents.

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#### CAPI Path 3

Jobs reported by persons in their first interview who worked prior to MEPS but not in the round, where SUBTYPE is Last Job Outside Reference Period (5), may also be selected at EM380 and RETIRJOB will be set to Yes (1). The designation is automatic when a new retirement job is reported instead of selected at EM390. These persons will have EVRETIRE set to Yes (1) in the Population Characteristics PUF where the person is in scope and edited age of 55 years or older in the round. As long as CAPI conditions are met, a person may report any number of retirement jobs in any round.

#### CAPI Path 4

When a person aged 55 or older is not employed in a round (i.e., not actively employed at any point in the round), the retirement question EM350 is skipped. Instead, the MEPS collects information on the reason the person is not working in the round at question EM750 where a workforce status of "retired" can be selected. This question is also asked in a person's first MEPS round when the person was employed prior to MEPS but not in the current round, or never employed at all. The response selected at EM750 to indicate why the person is not employed is captured in the Population Characteristics PUF variable NWK. Starting with Panel 27 Round 4 and Panel 28 Round 2, persons who previously indicated "retired" at EM750 will skip EM750 in all future rounds. This routing is applicable to Round 2 through Round 5 beginning with Panel 27 Round 4 and Panel 28 Round 2. Consistent with this change, beginning in 2023, NWK is specially constructed for persons not working in the reference period and who indicated in any prior interview their reason for not working is "retired." NWK will be set to Retired (2) when a person is not working in the reference period and previously indicated "retired" at EM750. These persons were not asked EM750 in the current round and will not be asked EM750 in the future. Since some retirees return to the workforce and then stop working again, NWK will be set to "retired" in any subsequent round the person is not employed in the reference period.

The construction logic of the Population Characteristics PUF variable EVRETIRE also impacts how "retirement" is reflected. Beginning with the 2022 Population Characteristics PUF, EVRETIRE now prioritizes persons indicating "retirement" as the reason for not working in the round at EM750 over whether "retirement" is indicated in the current round at EM350.

#### CAPI Path 5

It is also important to note that the retirement job classification is independent of any retirement response in the following variables:

- YNOBUSN\_M18 (EM530), which indicates why a person no longer has a selfemployed business;
- WHY\_LEFT\_M18 (RJ110), which indicates why a person left a job in the current round.

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These variables will be set for persons who will not be asked EM750 (NWK) because they were employed at some point in the round and either the person ended a self-employment job during the round or the person left a CMJ in the round. Responses to these questions and to EM750 (reflected in NWK) are not age-dependent. Therefore, analysts may also derive information regarding retirement status for persons aged 55 or younger using YNOBUSN\_M18 and WHY\_LEFT\_M18 from the Jobs PUF and NWKrr from the Population Characteristics PUF.

There is no variable equivalent to EVRETIRE asked of persons aged 54 or younger to assess whether a person who is currently working or had a job history of work when entering MEPS has ever retired.

#### 2.5.10 Health Insurance Data

#### Insurance Reporting on New Jobs

Questions about employment-related health insurance are asked both when any type of job is newly reported and when any continuing job is reviewed. For main jobs, either newly reported or changing from miscellaneous, the variable that indicates whether insurance is held through that establishment is EMPLINS. For all non-main jobs, including current miscellaneous jobs and all newly reported former jobs, the variable JOBHASHI indicates whether insurance is held through that establishment. MEPS also asks questions about whether insurance is offered to the job holder through the establishment, whether insurance is offered to anyone at the establishment, and whether there are multiple plans offered to the job holder.

Analysts should note that 2023 is a transition year for employment-related health insurance questions asked in the MEPS. Prior to Panel 27 Round 5, Panel 28 Round 3, and Panel 29 Round 1, if a respondent indicated Refused (-7) or Don't Know (-8) at EM660 (EMPLINS/JOBHASHI) or EM670 (OFFRDINS), subsequent insurance questions were skipped. As of Panel 27 Round 5, Panel 28 Round 3, and Panel 29 Round 1, CAPI was adjusted so that persons who indicate Refused (-7) or Don't Know (-8) at EM660 or EM670 are now asked subsequent insurance questions. Whether the respondent was offered health insurance from their employer (EM670, OFFRDINS) is now asked in cases where whether the respondent held insurance through employer (EM660, EMPLINS/JOBHASHI) were either Refused (-7) or Don't Know (-8). Whether health insurance was offered to anyone else at the employer (EM690, ANYINS) is now asked in cases where the response to whether the respondent was offered health insurance from the employer (EM670, OFFRDINS) was either Refused (-7) or Don't Know (-8).

Because more persons are now asked if insurance was offered through the job, more persons can be asked the question EM680 (DIFFPLNS) which asks if the company offers a choice of insurance plans. Additional changes were made to corresponding review of health insurance variables asked in the RJ section, discussed in further detail for continuing jobs, below.

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Consistent with variable naming protocol across the MEPS, variables with significant changes to response values or population asked the question were renamed as follows:

Table 5

Variables Renamed Due to Changes in Response Values or Population

| Jobs PUF variable through P27R4/P28R2 | Jobs PUF variable as of P27R5/P28R3  |
|---------------------------------------|--|
| EMPLINS                               | No change required. There are no changes to variable response values or to population who is asked the question. |
| JOBHASHI                              | No change required. There are no changes to variable response values or to population who is asked the question. |
| OFFRDINS                              | Renamed to OFFRDINS_M24  |
| DIFFPLNS                              | Renamed to DIFFPLNS_M24  |
| ANYINS                                | Rename to ANYINS_M24   |
| NOWTAKEI_M22                          | No change required. There are no changes to variable response values or to population who is asked the question. |
| ESTBTHRU                              | Renamed to ESTBTHRU_M24  |
| INSESTB                               | Renamed to INSESTB_M24   |

In light of these changes, for a newly reported job, depending on whether employment-related insurance is held or not, there may be follow-up information gathered which is contained in the following variables:

- OFFRDINS, which notes whether health insurance is offered through the job in cases where the job holder reports that they do not hold health insurance through the job, or, as of Panel 27 Round 5 and Panel 28 Round 3, OFFRDINS\_M24 which notes whether health insurance is offered through the job in cases where the job holder reports they do not hold health insurance through the job, or answered Refused (-7) or Don't Know (-8) when asked whether they held health insurance through the job;
- DIFFPLNS, which notes whether a choice of health insurance plans is available for cases where the job holder reports that health insurance is either offered or held through the job, or as of Panel 27 Round 5 and Panel 28 Round 3, DIFFPLNS\_M24 where more persons can flow to this question due to skip pattern changes at EM660 and EM670;
- ANYINS, which notes whether health insurance coverage through the job is available to any other employees at the establishment in cases where the job holder

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does not hold health insurance through the job and is not offered health insurance coverage through the job, or, as of Panel 27 Round 5 and Panel 28 Round 3, ANYINS\_M24 which notes whether health insurance coverage through the job is available to any other employees at the establishment in cases where the job holder does not hold health insurance through the job and is not offered health insurance coverage through the job, or where the job holder may also have indicated Refused (-7) or Don't Know (-8) at whether they hold health insurance through the job or were offered health insurance coverage through the job.

#### Source of Insurance: Employer/Union

If a job holder holds insurance at the employer (Yes [1] at EM660, EMPLINS or JOBHASHI) and that person belongs to a union (Yes [1] at EM700, INUNION), and the job is first reported in the round, respondents are asked to indicate whether the health insurance is from the employer/business or the union at EM710. Either or both establishments may be the source of insurance. Through Panel 23 Round 8, Panel 24 Round 6, Panel 25 Round 4 and Panel 26 Round 2 (collection in 2021), both establishments could be selected at EM710 (PROVDINS), and two sets of private insurance coverage were created in the Health Insurance (HX) section of MEPS.

- 1 Employer
- 2 Union
- 3 Both Employer and Union

Beginning in Panel 23 Round 9, Panel 24 Round 7, Panel 25 Round 5 and Panel 26 Round 3 (collection in 2021 and 2022), response options at EM710 changed. Respondents were required to identify the *primary* source of health insurance - either the employer/business or the union - if the respondent indicated both provide insurance at EM710 (PROVDINS renamed EMPLUNIONPROV for these cases).

- 1 Employer
- 2 Union
- 3 Both Employer and Union (Employer is Primary)
- 4 Both Employer and Union (Union is Primary)

Only the primary source of insurance coverage is created in the HX section. The result is that persons who reported insurance via both union and employer sources no longer have the secondary source insurance coverage recorded in HX.

The variable set at EM710 was renamed from PROVDINS to EMPLUNIONPROV beginning in Panel 26 Round 3, Panel 25 Round 5, Panel 24 Round 7, and Panel 23 Round 9 to reflect this change. EMPLUNIONPROV is Inapplicable (-1) in prior rounds. Note that PROVDINS was constructed through the 2022 Jobs PUF using responses collected in EMPLUNIONPROV for

jobs newly reported in the delivery year. When EMPLUNIONPROV is set to Both Employer and Union (Employer is Primary) (3) or Both Employer and Union (Union is Primary) (4), the variable PROVDINS was set to Both (3). Beginning with the 2023 Jobs PUF, PROVDINS is no longer constructed for the Jobs PUF. This file only contains EMPLUNIONPROV.

Analysts combining multiple years of MEPS should also be mindful that prior years in MEPS contained separate insurance records of both primary and secondary private insurance in the Person Round Plan Public Use File (hereafter referred to as the PRPL PUF). Like job records in the Jobs PUF, insurance may continue to be reviewed in the 2023 PRPL PUF. The PRPL PUF will contain insurance through both sources (employer and union) where each source provides unique coverage. Otherwise, the union coverage is removed as duplicate coverage.

#### Insurance Reporting on Continuing Jobs

For a continuing job, when no health insurance was held through the job in the round in which the job was first reported but health insurance was offered through the job, the question RJ70 OFFTAKEI is asked in later rounds to determine whether the employee now holds the health insurance that is offered through the job. (Note: if health insurance through this job was reported as being held via RJ70 in the prior round, RJ70 is not asked in the current round.)

Similarly, the insurance status question RJ80 (responses stored on NOWTAKEI through Panel 26 Round 2, Panel 25 Round 4, Panel 24 Round 6, and Panel 23 Round 8, and on NOWTAKEI\_M22 beginning in Panel 26 Round 3, Panel 25 Round 5, Panel 24 Round 7, and Panel 23 Round 9) is asked to determine whether health insurance is now held through the job in the following cases:

- insurance through the job ended in a prior round, or
- insurance coverage was never reported through the job and the person was not offered insurance through the job in the round a job was first reported, or
- the respondent disavowed coverage through the job in the HX section that was previously indicated in the EM section of the interview, or
- the respondent reported new employer-sponsored health insurance in the prior round but coverage was not active at the interview date (see below).

Beginning in 2021 Panel 26 Round 3, Panel 25 Round 5, Panel 24 Round 7, and Panel 23 Round 9, RJ80 is asked if the respondent reports new employer-sponsored health insurance in the prior round but that coverage was not active at the interview date, that is, a response of No (2) in the Health Insurance Time Period Covered Detail (HQ) section of MEPS at HQ01 "Was {PERSON} covered the whole time from {START DATE} until {END DATE}" and at HQ02 "Is {PERSON} covered now?" Before this change, persons for whom health insurance was not active at the interview date in the prior round skipped RJ80.

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To reflect the new CAPI flow, the variable set at RJ80 was renamed from NOWTAKEI to NOWTAKEI\_M22 in the 2021 Jobs PUF. The 2021 Jobs PUF contained both variables since data reflected both the old and new CAPI flow. Starting in the 2022 Jobs PUF, NOWTAKEI was no longer delivered since all records in the delivery used the new CAPI flow.

The MEPS then includes several clarifying questions regarding health insurance availability at an employer. Similar to changes described above for employment-related health insurance questions asked for new jobs, CAPI routing was modified beginning in Panel 27 Round 5 and Panel 28 Round 3 for reviewed jobs with responses of Refused (-7) and Don't Know (-8) for the following questions. When the person does not report, does not know, or refuses to indicate the insurance coverage status through the job at RJ70 or reports no insurance coverage through the job at RJ80, or, as of Panel 27 Round 5 and Panel 28 Round 3, where the person does not know, or refuses to indicate the insurance coverage status through the job at RJ80, the respondent is asked whether the person was offered insurance through the job at RJ90 (ESTBTHRU[M24]).

Lastly, when a respondent indicates that the job holder of a reviewed job neither holds insurance through the job nor was offered health insurance at the job, or, as of Panel 27 Round 5 and Panel 28 Round 3, does not know or refuses to indicate whether the job holder of a reviewed job holds or was offered health insurance at the job, the respondent is asked whether *any other* employees were offered health insurance through the job at RJ100 (INSESTB[\_M24]). Similar to the Panel 26 Round 3, Panel 25 Round 5, Panel 24 Round 7, and Panel 23 Round 9 CAPI change at RJ80, the Panel 27 Round 5 and Panel 28 Round 3 CAPI change at RJ80 meant that more persons could be asked whether the person was offered insurance at RJ90 (ESTBTHRU\_M24) or whether other employees were offered insurance at the employer establishment at RJ100 (INSESTB\_M24).

#### Disavowed Insurance

In some cases, respondents indicate in the HX section that health insurance reported in the EM section was reported in error. This is referred to as insurance being "disavowed." If newly reported health insurance through the job is disavowed in the HX section, follow-up questions (HX21, HX22, HX23) regarding whether health insurance is offered at the job, whether more than one plan is available, and whether health insurance is offered to any employees are asked in the HX section. This information was used in an editing process whereby responses in the HX section were transferred into the EM or RJ section. As a result, the disavowal process may result in a change to values originally collected in the EM or RJ section (wherever the health insurance was initially reported). The complete list of variables potentially impacted includes: EMPLINS, JOBHASHI, OFFRDINS[\_M24], DIFFPLNS[\_M24], ANYINS[\_M24], and EMPLUNIONPROV, collected in the EM section, and NOWTAKEI\_M22, OFFTAKEI, ESTBTHRU[\_M24], and INSESTB[\_M24], collected in the RJ section. In some cases, a disavowal may result only in a change to the value of EMPLUNIONPROV.

Health insurance through an employer can be disavowed in the MEPS based on a respondent's answer to one of two questions (HX20 and HP70).

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The variable HIDISAVW indicates which of the two questions resulted in the disavowal. HIDISAVW is set to the question number of the disavowal as described here.

- 1. HX20 This question is asked if either:
  - A. a person does not belong to a labor union and insurance coverage through the employer is reported at EM660 ([EMPLINS or JOBHASHI=1] and INUNION<>1), or
  - B. a person belongs to a labor union and insurance coverage through the employer only or insurance coverage through the union only are reported at EM660 ([EMPLINS or JOBHASHI=1] and INUNION=1) and,
    - (i) through Panel 26 Round 2, Panel 25 Round 4, Panel 24 Round 6, and Panel 23 Round 8, EM710 (PROVDINS = Employer Only [1] or Union Only [2]), or,
    - (ii) beginning in Panel 26 Round 3, Panel 25 Round 5, and Panel 24 Round 9, EM710 (EMPLUNIONPROV = Employer [1], Union [2], Both Employer and Union (Employer is Primary) [3] or Both Employer and Union (Union is Primary) [4]).

If the respondent volunteers that the job-related insurance coverage reported at HX20 was in error, the insurance coverage reported in the EM or RJ section was removed during the disavowal clean-up process.

2. HP70 - This question is asked of private health insurance coverage through a job that was reported in the EM section. The respondent is asked to verify that the job holder is the policyholder of the job related insurance coverage. If the response is No, Refused, or Don't Know, the job-related insurance coverage was removed during the disavowal clean-up process.

### 2.5.11 Industry and Occupation Coding

Industry and occupation codes were assigned by professional coders at the Census Bureau based on verbatim descriptions provided by respondents during the survey interview. The codes were determined at a detailed 4-digit level and then collapsed into broader groups on the file at a 2-digit level to ensure the confidentiality of the records. Starting in 2023, industry and occupation code variables are set based on newer Census Bureau coding schemes. Census Bureau used 2017 Census Industry (based on 2017 NAICS) and 2018 Census Occupation (based on 2018 SOC) coding schemes which were developed for the Bureau's Current Population survey (CPS) and American Community Survey (ACS). Prior to 2023, from FY 2010 through FY 2022, the coders at Census Bureau used 2007 Census Industry (based on 2007 NAICS) and 2010 Census Occupation Coding schemes (based on 2010 SOC) to provide industry and occupation codes for MEPS.

Categorical values on condensed industry and occupation variables did not change in 2023. However, because newer coding schemes were used to code variables, the previous variable representing the condensed industry code for a job at the interview date, INDCODEX, was renamed to INDCAT17, representing the condensed industry code for a job at the interview date coded to the 2017 Census coding scheme. Similarly, OCCCODEX was renamed to OCCCAT18, representing the condensed occupation code for a job at the interview date coded to 2018 Census coding scheme. As newer coding schemes are used in future study years, the last two digits of industry and occupation code variables will be renamed with the year of the newer coding scheme.

For transition purposes of Panel 27 persons who were also part of the 2022 file, the 2023 Jobs PUF includes INDCODEX and OCCCODEX variables containing values from the previous 2007 industry and 2010 occupation coding schemes. INDCODEX contains industry information on Panel 27 Round 3 records only that reflects the 2007 coding scheme, and OCCCODEX contains occupation information on Panel 27 Round 3 records only that reflects the 2010 coding scheme. To assist analysts with the transition between old and new coding schemes used on the 2022 and 2023 Jobs PUF, where a Panel 27 Round 3 job continues from Round 1 or Round 2, INDCODEX, INDCAT17, OCCCODEX, and OCCCAT18 were copied to the Panel 27 Round 3 record. These variables are set to Inapplicable (-1) for Panel 28 jobs and for Panel 27 Round 4 and Round 5 records. Appendices 4 and 5 contain crosswalks between the detailed and collapsed codes for industry and occupation.

Earlier versions of Census coding schemes were used in files before FY 2010. With the 2010 file, the Census Bureau began using 2007 Industry and 2010 Occupation codes, which were developed for the Bureau's Current Population Survey and American Community Survey. These updated coding schemes incorporate minor changes from the 2003 industry and occupation codes used for the 2002-2009 files; therefore, INDCODEX and OCCCODEX for 2010 and later files are comparable to those variables on the 2002-2009 files. (Industry and occupation variables for pre-2002 files are not comparable to those for later files.)

#### User Notes Regarding Industry and Occupation Coding in MEPS-HC 2018-2023

Each year, ARHQ obtains industry and occupation codes from the Census Bureau for all current main jobs (CMJ) in the Medical Expenditure Panel Survey (MEPS). Census codes to the North American Industry Classification System (NAICS) for industry codes and Standard Occupation Coding scheme for occupation codes. Values are determined for both industry and occupation codes using job characteristics collected from respondents during the MEPS interview.

Users of the detailed uncondensed 4-digit codes, available by application in the Data Center, should be aware of two factors impacting industry and occupation codes:

# Factor 1 - FY 2023 Transition from 2010 to 2017 NAICS Industry Codes, and from 2010 to 2018 Census Occupation Codes

In FY 2023, MEPS asked Census to transition from 2010 NAICS to 2017 NAICS, and from 2010 Census Occupation Code to 2018 Census Occupation Code. For Panel 27 persons, MEPS has both versions of industry and occupation codes, allowing AHRQ to compare cases where no

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change in industry or occupation code would be expected. These are cases where there was no change in reported job characteristics and no changes in the underlying NAICS/Census Occupation codes. Despite the expectation for no change between the old vs new NAICS/Census Occupation codes, the Census results for the new 2017 NAICS industry code were different from the old 2010 NAICS industry code for 900-1000 jobs. In addition (and independent of the NAICS cases), the Census results for the new 2018 Census Occupation code were different from the old 2010 Census Occupation Code for 900-1000 jobs. Census is unable to provide details on why these differences occurred.

#### Factor 2 - Truncation of Job Duties in 2018-2023

For data years 2018-2023, the verbatim text data sent to Census related to "job duties" was mistakenly truncated, resulting in 85%-89% of jobs having incomplete information when Census determined industry and occupation codes. While the MEPS survey collects up to 100 characters at question EM510 (job duties), if fewer than 50 characters were reported, Census received no job duty information. This omission may have impacted the accuracy of both industry and occupation codes in those years. This issue has been corrected for 2024 and future years.

Table 6

Extent of Truncation of Job Duties in 2018-2023

| File year | PUF no. | With complete data | With truncated data |
|-----------|---------|--------------------|---------------------|
| FY 2023   | HC247   | 14%                | 86%                 |
| FY 2022   | HC243   | 14%                | 86%                 |
| FY 2021   | HC233   | 15%                | 85%                 |
| FY 2020   | HC224   | 15%                | 85%                 |
| FY 2019   | HC216   | 12%                | 88%                 |
| FY 2018   | HC209   | 13%                | 87%                 |

#### Advice for Data Users

For both factors detailed above, the potential impact on the accuracy of industry and occupation codes could not be determined. When considering Factor 1, analysts should note that the detailed 4-digit codes provided by Census for MEPS jobs are available only in the Data Center by special request. The industry and occupation codes provided on the MEPS public use files (Full Year Consolidated PUF and Jobs PUF) are categorized into a smaller, condensed set of 2-digit codes. In Factor 1 cases, despite the large number of differences between the new and old versions of the 4-digit industry and occupation codes, AHRQ found very few differences in the 2-digit condensed industry and occupation codes generated under the old and new NAICS/Census Occupation coding schemes. Note: The error in Factor 2 does not lend itself to a similar comparison of the relative impacts of Factor 2 on the 2-digit vs. the 4-digit codes.

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Analysts using industry and occupation codes from 2018-2023 may wish to either (a) defer solely to the PUF 2-digit condensed industry and occupation codes, or, (b) if using the 4-digit detailed codes available only in the Data Center, perform sensitivity analyses comparing (i) results obtained using the 2-digit industry and occupation codes available on the PUF files against (ii) results obtained using the 4-digit industry and occupation codes available in the data center.

#### 2.5.12 Changes in Variable List

Variables were added and removed from the file because of changes in the questions asked in 2023 relative to prior years. The <u>MEPS HC questionnaires</u> from these years can be found on the MEPS website.

The following variables were added to or removed from the 2023 Jobs PUF.

#### Added

- ANYINS M24
- DIFFPLNS M24
- ESTBTHRU M24
- INDCAT17
- INSESTB M24
- OCCCAT18
- OFFRDINS M24

#### Removed

PROVDINS

#### 2.6 Person-Level Estimates

This 2023 Jobs file does not include any weights necessary to extrapolate these data to the U.S. population. To make person-level estimates, link to any of the 2023 MEPS files and use the person-level weight for the appropriate panel. The link should be made through the variable DUPERSID. Note that not all persons in the MEPS have positive weights and job records; only those persons who have either a positive person-level or family-level weight in the 2023 Population Characteristics PUF are included in the 2023 Jobs file.

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## 3.0 Longitudinal Analysis

Panel-specific longitudinal files can be downloaded from the <u>data section of the MEPS website</u>. For each panel, the longitudinal file comprises MEPS survey data obtained in Rounds 1 through 5 of the panel and can be used to analyze changes over a two-year period. Variables in the file pertaining to survey administration, demographics, employment, health status, disability days, quality of care, health insurance, and medical care use and expenditures were obtained from the MEPS Consolidated PUF from the 2 years covered by that panel. For more details or to download the data files, please see <u>Longitudinal Weight Files</u>.

# 4.0 Using MEPS Data for Trend Analysis

For analysts using the MEPS data for trend analysis, we note that there are uncertainties associated with 2020, 2021, and 2022 data quality for reasons discussed throughout Section 3 of the Population Characteristics PUF. Evaluations of important MEPS estimates suggest that they are of reasonable quality. Nevertheless, analysts are advised to exercise caution in interpreting these estimates, particularly in terms of trend analyses, since access to health care was substantially affected by the pandemic, as were related factors such as health insurance and employment status for many people.

The MEPS began in 1996, and the utility of the survey for analyzing health care trends expands with each additional year of data; however, when examining trends over time using the MEPS, the length of time being analyzed should be considered. In particular, large shifts in survey estimates over short periods of time (e.g., from one year to the next) that are statistically significant should be interpreted with caution unless they are attributable to known factors such as changes in public policy, economic conditions, or the MEPS methodology.

With respect to methodological considerations, changes in data collection methods, such as interviewer training, were introduced in 2013 to obtain more complete information about health care utilization from MEPS respondents; the changes were fully implemented in 2014. This effort likely resulted in improved data quality and a reduction in underreporting starting in the second half of 2013 and continuing throughout the 2014 full-year files; the changes have also had some impact on analyses involving trends in utilization across years. The changes in the NHIS sample design in 2016 and 2018 could also potentially affect trend analyses. The new NHIS sample design is based on more up-to-date information related to the distribution of housing units across the United States. As a result, it can be expected to better cover the full civilian noninstitutionalized population, the target population for MEPS, as well as many of its subpopulations. Better coverage of the target population helps to reduce the potential for bias in both NHIS and MEPS estimates.

Another change with the potential to affect trend analysis involved major modifications to the MEPS instrument design and data collection process, particularly in the events sections of the instrument. These were introduced in the spring of 2018 and thus affected data beginning with Round 1 of Panel 23, Round 3 of Panel 22, and Round 5 of Panel 21. Since the full-year 2017 Population Characteristics PUFs were established from data collected in Rounds 1-3 of Panel 22 and Rounds 3-5 of Panel 21, they have reflected two instrument designs. To mitigate the effect of

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such differences within the same full-year file, the Panel 22, Round 3 data and the Panel 21 Round 5 data were transformed to make them as consistent as possible with data collected under the previous design. The changes in the instrument were designed to make the data collection effort more efficient and easier to administer. In addition, expectations were that data on some items, such as those related to health care events, would be more complete with the potential of identifying more events. Increases in service use reported since the implementation of these changes are consistent with these expectations. *Analysts should be aware of the possible impacts of these changes on the data and especially trend analyses that include the year 2018 because of the design transition.* 

Process changes, such as data editing and imputation, may also affect trend analyses. For example, analysts should refer to Section 2.5.11: Utilization, Expenditures, and Sources of Payment Variables in the Consolidated PUF (HC-251) and, for more detail, to the documentation for the prescription drug file (HC-248A) when analyzing prescription drug spending over time. As always, it is recommended that, before conducting trend analyses, analysts should review relevant sections of the documentation for descriptions of these types of changes that might affect the interpretation of changes over time.

To smooth or stabilize trend analyses based on the MEPS data, analysts may also wish to consider using statistical techniques such as comparing pooled time periods (e.g., 1996-1997 versus 2011-2012), working with moving averages or using modeling techniques with several consecutive years of the data.

Finally, statistical significance tests should be conducted to assess the likelihood that observed trends are not attributable to sampling variation. In addition, researchers should be aware of the impact of multiple comparisons on Type I error. Without making appropriate allowance for multiple comparisons, conducting numerous statistical significance tests of trends will increase the likelihood of concluding that a change has taken place when one has not.

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## D. Variable-Source Crosswalk

### FOR MEPS HC 246: 2023 JOBS DATA FILE

### **SURVEY ADMINISTRATION VARIABLES - PUBLIC USE**

| Variable | Description                       | Source                 |
|----------|-----------------------------------|------------------------|
| JOBSIDX  | Job-round identifier              | CAPI Derived/Encrypted |
| JOBIDX   | Person's unique job identifier    | CAPI Derived/Encrypted |
| JOBNUM   | Unique DU-job identifier          | CAPI Derived           |
| ESTBIDX  | Establishment identifier          | CAPI Derived/Encrypted |
| DUPERSID | Person ID (DUID + PID)            | Assigned in Sampling   |
| DUID     | Panel # + encrypted DU identifier | Assigned in Sampling   |
| PID      | Person number                     | Assigned in Sampling   |
| RN       | Round                             | CAPI Derived           |
| ORIGRND  | Round job first reported          | CAPI Derived           |
| PANEL    | Panel to which job holder belongs | Assigned in Sampling   |

## **EMPLOYMENT VARIABLES - PUBLIC USE**

| Variable | Description            | Source   |
|----------|------------------------|--|
| JSTRTM   | Job start date - month | EM60_02, EM90_02,<br>EM110_02, EM130_02,<br>EM190_02, EM250_02   |
| JSTRTY   | Job start date - year  | EM60_01, EM90_01,<br>EM110_01, EM130_01,<br>EM190_01, EM250_01   |
| JSTOPM   | Job stop date - month  | EM140_02, EM200_02,<br>EM260_02, EM310_02,<br>EM400_02, RJ120_02 |

| Variable      | Description   | Source   |
|---------------|---|--|
| JSTOPY        | Job stop date - year  | EM140_01, EM200_01,<br>EM260_01, EM310_01,<br>EM400_01, RJ120_01                       |
| RETIRJOB      | Person retired from this job  | EM50, EM80, EM100,<br>EM270, EM380   |
| SUBTYPE       | Job sub-type  | EM50, EM80, EM100,<br>EM120, EM180, EM270,<br>EM340, EM380, EM390,<br>EM410, RJ10/RJ60 |
| STILLAT       | Still works at main job establishment   | RJ10   |
| TYPECHGD      | Job sub-type changed between rounds   | Constructed  |
| MAIN_JOB      | Still main job or business  | RJ20   |
| DIFFWAGE      | Any change in wage amount   | RJ30   |
| STILLWORKFTPT | Still works full or part time   | RJ40   |
| WHYCHNGPTTOFT | Why change part to full time  | RJ50   |
| WHYCHNGFTTOPT | Why change full to part time  | RJ55   |
| STILLWRK      | Still works at misc job establishment   | RJ60   |
| OFFTAKEI      | Offered insurance and now take  | RJ70   |
| NOWTAKEI_M22  | Now has health insurance through employer                                     | RJ80   |
| ESTBTHRU      | Offered insurance, did not take (review)                                      | RJ90 (through Panel 27<br>Round 4/Panel 28 Round 2)                                    |
| ESTBTHRU_M24  | Offered insurance, did not take (review) Panel 27 Round 5/Panel 28 Round 3    | RJ90 (as of Panel 27 Round 5/Panel 28 Round 3)   |
| INSESTB       | Insurance offered to any employees (review)                                   | RJ100 (through Panel 27<br>Round 4/Panel 28 Round 2)                                   |
| INSESTB_M24   | Insurance offered to any employees (review) Panel 27 Round 5/Panel 28 Round 3 | RJ100 (as of Panel 27 Round 5/Panel 28 Round 3)  |
| HIDISAVW      | Capi q where health insur thru emp/union disavowed                            | Constructed from HX responses  |

| Variable     | Description Source                                     |              |
|--------------|--|--------------|
| RVWTOTNUMEMP | Establishment size at continuing self-<br>employed job | RJ110        |
| WHY_LEFT_M18 | Reason why no longer at job now                        | RJ130        |
| JOBTYPE      | Self-employed or works for someone else                | EM420        |
| NUMEMPS      | Establishment size at not self-<br>employed job        | EM430        |
| ESTMATE1_M19 | Categorical approximate establishment size             | EM440        |
| MORELOC      | Employer has more than one location                    | EM450        |
| BUSINC       | Business incorporated                                  | EM460        |
| PROPRIET     | Proprietorship or partnership                          | EM470        |
| TYPEEMPL     | Employee type  | EM480        |
| YLEFT_M18    | Reason why no longer at job EM520                      |              |
| YNOBUSN_M18  | Reason why no longer has business                      | EM530        |
| HRSPRWK      | Number of hours worked per week                        | EM540, EM620 |
| HRS35WK      | Works at least 35 hours per week                       | EM550        |
| TEMPJOB      | Job at employer is temporary                           | EM560, EM630 |
| SESNLJOB     | Job is available certain time of year                  | EM570, EM640 |
| SICKPAY      | Has paid sick leave thru job                           | EM580        |
| PAYDRVST     | Has paid sick leave for doc visit thru job             | EM590        |
| PAYVACTN     | Has paid vacation leave thru job                       | EM600        |
| RETIRPLN     | Has pension/retirement plan thru job                   | EM610        |
| WKLYAMT      | Usual weekly gross income at misc job                  | EM650        |
| EMPLINS      | Has health insurance thru current main job             | EM660        |
| JOBHASHI     | Has health insurance thru job                          | EM660        |

| Variable      | Description  | Source  |
|---------------|--|---|
| OFFRDINS      | Offered insurance but chose not to take                                      | EM670 (through Panel 27<br>Round 4/Panel 28 Round 2)  |
| OFFRDINS_M24  | Offered insurance but chose not to take Panel 27 Round 5/Panel 28 Round 3    | EM670 (as of Panel 27<br>Round 5/Panel 28 Round 3)  |
| DIFFPLNS      | Choice of different health insurance plans                                   | EM680 (through Panel 27<br>Round 4/Panel 28 Round 2)  |
| DIFFPLNS_M24  | Choice of different health insurance plans Panel 27 Round 5/Panel 28 Round 3 | EM680 (as of Panel 27<br>Round 5/Panel 28 Round 3)  |
| ANYINS        | Health insurance offered to any employees                                    | EM690 (through Panel 27<br>Round 4/Panel 28 Round 2)  |
| ANYINS_M24    | Health insurance offered to any employees Panel 27 Round 5/Panel 28 Round 3  | EM690 (as of Panel 27<br>Round 5/Panel 28 Round 3)  |
| INUNION       | Belongs to labor union   | EM700   |
| EMPLUNIONPROV | Employer or union is primary health insurer                                  | EM710 (as of Panel 23<br>Round 9, Panel 24 Round 7,<br>Panel 25 Round 5, Panel 26<br>Round 3) |
| HHMEMBER_M18  | Any other hh member wrk at this business                                     | EM730   |
| TOTLEMP_M18   | Current establishment size at self-<br>employed job                          | Constructed from EM740 and RJ110  |
| TOTNUMEMP     | Establishment size at new self-<br>employed job                              | EM740   |
| SALARIED      | Person salaried, paid by hour, some other way                                | EW10  |
| HOWPAID       | How is person paid   | EW20  |
| DAYWAGE       | Person's daily wage rate   | EW30  |
| HRSPRDY       | Number of hours person worked in one day                                     | EW40  |
| MAKEAMT       | How much money does person make  | EW50  |
| PERUNIT_M18   | Period for which person is paid  | EW60  |

| Variable     | Description   | Source                        |
|--------------|---|-------------------------------|
| HRLYWAGE     | How much person makes per hour                      | EW70, EW140, EW190            |
| MORE10       | Person makes more or less than \$10/hour            | EW80, EW150, EW200            |
| MORE15       | Person makes more or less than \$15/hour            | EW90, EW160, EW210            |
| MOREMINM     | Person makes more or less than min. wage            | EW100, EW170, EW220           |
| GROSSPAY     | Person's salary before taxes (gross)                | EW110                         |
| GROSSPER     | Period in which gross salary was earned             | EW120                         |
| SALRYWKS     | Number of weeks per year salary is based            | EW130                         |
| HRSALBAS     | Hours per week salary based on                      | EW180                         |
| EARNTIPS     | Person earns tips                                   | EW230A                        |
| EARNBONS     | Person earns bonuses                                | EW230B                        |
| EARNCOMM     | Person earns commission                             | EW230C                        |
| TIPSAMT      | How much are person's tips                          | EW240                         |
| TIPSUNIT_M18 | Period which tip earnings are based on              | EW250                         |
| BONSAMT      | How much are person's bonuses                       | EW260                         |
| BONSUNIT     | Period which bonuses are based on                   | EW270                         |
| COMMAMT      | How much are person's commissions                   | EW280                         |
| COMMUNIT     | Period which commissions are based on               | EW290                         |
| INDCODEX     | Condensed P27R1-3 industry code (2007 Census IND)   | Constructed from EM490        |
| INDCAT17     | Condensed industry code (2017<br>Census IND)        | Constructed from EM490        |
| OCCCODEX     | Condensed P27R1-3 occupation code (2010 Census OCC) | Constructed from EM500, EM510 |
| OCCCAT18     | Condensed occupation code (2018 Census OCC)         | Constructed from EM500, EM510 |

# **Appendix 1 Sample SAS Program**

```
*** APP23.sas ***;
                   OPTIONS LS=132 PS=79;
9
                  *******************
11
                  *** Program Name: SAMPLE.SAS
12
                  ***
13
                       Description: This job provides an example of how to get job info ***
14
                  ***
15
                                      from Round 1 or Round 2 in the FY2022 JOBS file when a***
                  ***
                                      continuation current main job in the FY2023 JOBS file ***
16
                  ***
17
                                      is first reported in the FY2022 JOBS File.
18
                  ***
19
                                      This example creates a dataset of continuation JOBS
                                      records with a SICKPAYX variable copied from the
                  * * *
20
                  ***
                                                                                          ***
21
                                      Round 1 or 2 newly reported job.
                  ***
22
                  23
24
                  libname jobs22 "c:\mydata\jobs22";
libname jobs23 "c:\mydata\jobs23";
libname out "c:\mydata";
25
                                    "c:\mydata\jobs22";
26
27
28
29
                      a.
                  *** Select continuing Panel 27 Round 3 Current Main Jobs
                                                                                         ***
30
31
                  *** (SUBTYPE=1, STILLAT=1) from the FY 2023 JOBS file and
                                                                                         ***
                  \ensuremath{^{\star\star\star}} print selected variables from the first 20 observations
32
33
34
                   data j23r3;
3.5
                      set jobs23.h246;
36
                         if panel=27
37
                          and
                                 rn=3
38
                         and
                              origrnd<3
39
                                subtype=1
                         and
40
                         and
                                 stillat=1
                                sickpay=-1
41
                         and
42
43
                   run;
NOTE: There were 34513 observations read from the data set JOBS23.H246.
NOTE: The data set WORK.J23R3 has 3306 observations and 91 variables.
NOTE: Compressing data set WORK.J23R3 decreased size by 0.00 percent.
     Compressed is 19 pages; un-compressed would require 19 pages.
NOTE: DATA statement used (Total process time):
     real time
                        5.04 seconds
     cpu time
                         0.04 seconds
                   proc print data=j23r3 (obs=20);
4.5
46
                     title1 'Print Sample of Continuation Current Main Jobs';
47
                      title2 'Panel 27 Round 3 Records';
48
                          var jobidx panel rn origrnd subtype stillat sickpay;
                   run;
NOTE: There were 20 observations read from the data set WORK.J23R3.
NOTE: PROCEDURE PRINT used (Total process time):
     real time 0.02 seconds
     cpu time
                        0.03 seconds
50
                  *** b.
52
```

```
***
53
                   *** Select newly reported Panel 27 Current Main Jobs records
                       from the FY 2022 JOBS file and print selected variables
                                                                                               ***
54
                   *** from the first 20 observations.
                                                                                               ***;
5.5
56
57
                    data j22;
58
                         set jobs22.h237;
59
                                   panel=27
                            if
60
                                   rn in (1,2)
                            and
61
                            and
                                   subtype=1
62
                            and
                                   stillat=-1
63
64
                    run;
NOTE: There were 40074 observations read from the data set JOBS22.H237.
NOTE: The data set WORK.J22 has 5262 observations and 85 variables.
NOTE: Compressing data set WORK.J22 decreased size by 3.45 percent.
      Compressed is 28 pages; un-compressed would require 29 pages.
NOTE: DATA statement used (Total process time):
      real time
                          4.91 seconds
                          0.03 seconds
      cpu time
65
66
                    proc print data= j22 (obs=20);
                       title1 'Print Sample of Newly Reported Current Main Jobs';
67
68
                       title2 'Panel 27 Round 1 or 2 Records';
69
                    var jobidx panel rn origrnd subtype stillat sickpay;
70
                    run;
NOTE: There were 20 observations read from the data set WORK.J22.
NOTE: PROCEDURE PRINT used (Total process time):
                         0.01 seconds
      real time
      cpu time
                          0.01 seconds
72
                    proc freq data= j22 ;
73
                         tables sickpay/list missing;
74
                         title1 'Sickpay Value of FY2022 Newly Reported Current Main Jobs';
                         title2 'Panel 27 Round 1 or 2 Records';
7.5
NOTE: There were 5262 observations read from the data set WORK.J22.
NOTE: PROCEDURE FREQ used (Total process time):
      real time
                          0.01 seconds
                          0.01 seconds
      cpu time
77
78
                    title2;
79
80
81
                   *** C.
                                                                                               * * *
                   *** Sort and merge datasets into j23r3F
                                                                                               ***
82
                        Prepare FY2022 and FY2023 data for merge
83
                                                                                               ***;
84
8.5
                    proc sort data=j23r3;
86
                         by jobidx;
87
                    run;
NOTE: There were 3306 observations read from the data set WORK.J23R3.
NOTE: SAS sort was used.
NOTE: The data set WORK.J23R3 has 3306 observations and 91 variables.
NOTE: Compressing data set WORK.J23R3 decreased size by 0.00 percent.
      Compressed is 19 pages; un-compressed would require 19 pages.
NOTE: PROCEDURE SORT used (Total process time):
      real time
                          0.03 seconds
                          0.00 seconds
      cpu time
```

```
89
                   proc sort data=j22;
90
                        by jobidx;
91
                    run;
NOTE: There were 5262 observations read from the data set WORK.J22.
NOTE: SAS sort was used.
NOTE: The data set WORK.J22 has 5262 observations and 85 variables.
NOTE: Compressing data set WORK.J22 decreased size by 3.45 percent.
      Compressed is 28 pages; un-compressed would require 29 pages.
NOTE: PROCEDURE SORT used (Total process time):
      real time
                          0.01 seconds
                          0.01 seconds
      cpu time
92
93
94
                   *** Create a dataset (j23r3F) that includes all variables
                                                                                              ***
95
                   *** for the continuation Panel 27 Round 3 Current Main Jobs
                                                                                              ***
96
                   *** and create the new variable SICKPAYX by copying SICKPAY
                                                                                              ***
97
                   *** from the corresponding Round 1 or Round 2 newly reported
98
                                                                                              ***
                   *** job record. Users may prefer to drop "yy" variables at
                                                                                              ***
99
                   *** this point
100
                                                                                              ***;
101
102
                     data out.j23r3f j23r3f;
103
                          merge j23r3 (in=a)
104
                                j22
                                      (in=b keep = jobidx sickpay rename=(sickpay=SICKPAY22));
105
                          by jobidx;
106
107
                     if a and b and SICKPAY22 ^= .
108
                          then SICKPAYX = SICKPAY22;
109
110
                     if a and b;
NOTE: There were 3306 observations read from the data set WORK.J23R3.
NOTE: There were 5262 observations read from the data set WORK.J22.
NOTE: The data set OUT.J23R3F has 3306 observations and 93 variables.
NOTE: Compressing data set OUT.J23R3F decreased size by 5.00 percent.
      Compressed is 19 pages; un-compressed would require 20 pages.
NOTE: The data set WORK.J23R3F has 3306 observations and 93 variables.
NOTE: Compressing data set WORK.J23R3F decreased size by 5.00 percent.
      Compressed is 19 pages; un-compressed would require 20 pages.
NOTE: DATA statement used (Total process time):
      real time
                          1.57 seconds
                          0.01 seconds
      cpu time
112
113
                     proc freq data=j23r3f;
114
                          tables panel*rn*sickpay*sickpayx/list missing;
115
                                  'Diagnostic Post-Merge - Sickpay * Sickpayx';
116
                          title2 'Panel 27 Round 3 Continuation Current Main Jobs ';
117
                     run;
NOTE: There were 3306 observations read from the data set WORK.J23R3F.
NOTE: PROCEDURE FREQ used (Total process time):
                         0.01 seconds
      real time
                          0.01 seconds
      cpu time
```

## Print Sample of Continuation Current Main Jobs Panel 27 Round 3 Records

| Obs | JOBIDX        | PANEL | RN | ORIGRND | SUBTYPE | STILLAT | SICKPAY |
|-----|---------------|-------|----|---------|---------|---------|---------|
| 1   | 2790002101101 | 27    | 3  | 1       | 1       | 1       | -1      |
| 2   | 2790002102102 | 27    | 3  | 1       | 1       | 1       | -1      |
| 3   | 2790004101101 | 27    | 3  | 1       | 1       | 1       | -1      |
| 4   | 2790006102101 | 27    | 3  | 1       | 1       | 1       | -1      |
| 5   | 2790007101101 | 27    | 3  | 1       | 1       | 1       | -1      |
| 6   | 2790012102102 | 27    | 3  | 1       | 1       | 1       | -1      |
| 7   | 2790012104104 | 27    | 3  | 1       | 1       | 1       | -1      |
| 8   | 2790016101101 | 27    | 3  | 1       | 1       | 1       | -1      |
| 9   | 2790016102104 | 27    | 3  | 1       | 1       | 1       | -1      |
| 10  | 2790023101101 | 27    | 3  | 1       | 1       | 1       | -1      |
| 11  | 2790032101101 | 27    | 3  | 1       | 1       | 1       | -1      |
| 12  | 2790034101103 | 27    | 3  | 1       | 1       | 1       | -1      |
| 13  | 2790034102105 | 27    | 3  | 2       | 1       | 1       | -1      |
| 14  | 2790034104104 | 27    | 3  | 1       | 1       | 1       | -1      |
| 15  | 2790043103201 | 27    | 3  | 1       | 1       | 1       | -1      |
| 16  | 2790045102101 | 27    | 3  | 1       | 1       | 1       | -1      |
| 17  | 2790046101101 | 27    | 3  | 1       | 1       | 1       | -1      |
| 18  | 2790046102102 | 27    | 3  | 1       | 1       | 1       | -1      |
| 19  | 2790049101101 | 27    | 3  | 1       | 1       | 1       | -1      |
| 20  | 2790052101101 | 27    | 3  | 1       | 1       | 1       | -1      |

### Print Sample of Newly Reported Current Main Jobs Panel 27 Round 1 or 2 Records

| Obs | JOBIDX        | PANEL | RN | OrigRnd | SUBTYPE | STILLAT | SICKPAY |
|-----|---------------|-------|----|---------|---------|---------|---------|
| 1   | 2790002101101 | 27    | 1  | 1       | 1       | -1      | 1       |
| 2   | 2790002102102 | 27    | 1  | 1       | 1       | -1      | 1       |
| 3   | 2790004101101 | 27    | 1  | 1       | 1       | -1      | 1       |
| 4   | 2790006102101 | 27    | 1  | 1       | 1       | -1      | 2       |
| 5   | 2790007101101 | 27    | 1  | 1       | 1       | -1      | 2       |
| 6   | 2790012101101 | 27    | 1  | 1       | 1       | -1      | 1       |
| 7   | 2790012102102 | 27    | 1  | 1       | 1       | -1      | 1       |
| 8   | 2790012104104 | 27    | 1  | 1       | 1       | -1      | 1       |
| 9   | 2790012105105 | 27    | 1  | 1       | 1       | -1      | 2       |
| 10  | 2790016101101 | 27    | 1  | 1       | 1       | -1      | 1       |
| 11  | 2790016102104 | 27    | 1  | 1       | 1       | -1      | 2       |
| 12  | 2790017102102 | 27    | 1  | 1       | 1       | -1      | 1       |
| 13  | 2790021101101 | 27    | 1  | 1       | 1       | -1      | 1       |
| 14  | 2790023101101 | 27    | 1  | 1       | 1       | -1      | 2       |
| 15  | 2790024103102 | 27    | 1  | 1       | 1       | -1      | 2       |
| 16  | 2790024104101 | 27    | 1  | 1       | 1       | -1      | 2       |
| 17  | 2790032101101 | 27    | 1  | 1       | 1       | -1      | 2       |
| 18  | 2790032102102 | 27    | 1  | 1       | 1       | -1      | -1      |
| 19  | 2790034101103 | 27    | 1  | 1       | 1       | -1      | -1      |
| 20  | 2790034102101 | 27    | 1  | 1       | 1       | -1      | -1      |

### Sickpay Value of FY2022 Newly Reported Current Main Jobs Panel 27 Round 1 or 2 Records

#### HAS PAID SICK LEAVE THRU JOB

| SICKPAY | Frequency | Percent | Cumulative<br>Frequency | Cumulative<br>Percent |
|---------|-----------|---------|-------------------------|-----------------------|
| -8      | 196       | 3.72    | 196                     | 3.72                  |
| -7      | 11        | 0.21    | 207                     | 3.93                  |
| -1      | 707       | 13.44   | 914                     | 17.37                 |
| 1       | 2958      | 56.21   | 3872                    | 73.58                 |
| 2       | 1390      | 26.42   | 5262                    | 100.00                |

## Diagnostic Post-Merge - Sickpay \* Sickpayx Panel 27 Round 3 Continuation Current Main Jobs

| PANEL | RN | SICKPAY | SICKPAYX | Frequency | Percent | Cumulative<br>Frequency | Cumulative<br>Percent |
|-------|----|---------|----------|-----------|---------|-------------------------|-----------------------|
| 27    | 3  | -1      | -8       | 91        | 2.75    | 91                      | 2.75                  |
| 27    | 3  | -1      | -7       | 6         | 0.18    | 97                      | 2.93                  |
| 27    | 3  | -1      | -1       | 482       | 14.58   | 579                     | 17.51                 |
| 27    | 3  | -1      | 1        | 1990      | 60.19   | 2569                    | 77.71                 |
| 27    | 3  | -1      | 2        | 737       | 22.29   | 3306                    | 100.00                |

# **Appendix 2 Sample Stata Program**

#### **Convert SAS Datasets to .dat Files**

```
libname jobs22 "c:\mydata\jobs22";
libname jobs23 "c:\mydata\jobs23";

proc export data=jobs22.H237 outfile= jobs22.dta;
run;

proc export data=jobs23.H246 outfile= jobs23.dta;
run;
```

#### **Obtain ASDOC Program**

The STATA program ASDOC generates a log file and is called in the STATA program provided below. Analysts should download the program by entering STATA and keying the following into STATA command line:

ssc install asdoc, replace

#### Sample Stata Program

```
*#delimit;
set linesize 100
log using "c:\mydata\APPdofile.log", replace
**************************
* a. Select continuing Panel 27 Round 3 Current Main Jobs (SUBTYPE=1, STILLAT=1)
* from the FY 2023 JOBS file and print selected variables from first 20 obs
use "c:\mydata\jobs23.dta", clear
format PANEL ORIGRND SUBTYPE STILLAT SICKPAY %3.0f
keep if (PANEL==27 & RN==3 & ORIGRND < 3 & SUBTYPE==1 & STILLAT==1 & SICKPAY==-1)
*******************
*Print Sample of Continuation P27 R3 Records
asdoc list JOBIDX PANEL RN ORIGRND SUBTYPE STILLAT SICKPAY if _{\rm n}<=20, font(arial) fs(8) separator(0) noobs, save(stata_output.doc) title(Print Sample of Continuation P27 R3 Records)
sort JOBIDX
save "c:\mydata\j23.dta", replace
* b. Select newly reported Panel 27 Current Main Jobs records from
* the FY 2022 JOBS file and print selected variables from first 20 obs
use "c:\mydata\jobs22.dta", clear
format PANEL OrigRnd SUBTYPE STILLAT SICKPAY %3.0f
keep if (PANEL==27 & (RN==1 | RN==2)) & SUBTYPE==1 & STILLAT==-1
*Print Sample of Newly Reported P27 R1 or R2 Records
asdoc list JOBIDX PANEL RN OrigRnd SUBTYPE STILLAT SICKPAY if n<=20, font(arial) fs(8) separator(0) noobs,
{\tt save} \, ({\tt Stata\_output.doc}) \,\, {\tt title} \, ({\tt Print Sample of Newly Reported P27 R1 or R2 Records})
sort JOBIDX
rename SICKPAY SICKPAY22
keep JOBIDX SICKPAY22
save "c:\mydata\j22.dta", replace
*************************
*Sickpay Value of FY2022 P27 R1 or R2 Newly Reported CMJs
asdoc tabulate SICKPAY22, font(arial) fs(8), save(stata_output.doc) title(Sickpay Value of FY2022 P27 R1 or R2
Newly Reported CMJs)
^{\star} c. Create a dataset (J23R3F) that includes all variables
^{\star} for the continuation Panel 27 Round 3 Current Main Jobs
* and create the new variable SICKPAYX by copying SICKPAY
* from the corresponding Round 1 or Round 2 newly reported
use "c:\mydata\j23.dta", clear
merge 1:m JOBIDX using "c:\mydata\j22.dta", generate(matchvar22)
gen SICKPAYX = .
keep if matchvar22 == 1 | matchvar22 == 3
```

```
replace SICKPAYX = SICKPAY22 if SICKPAY22 != .
save "c:\mydata\J23R3f.dta", replace
*****************
* Diagnostic Post-Merge - Sickpay * Sickpayx
* Continuation P27 R3 Current Main Jobs Only
asdoc tabulate SICKPAY SICKPAYX, save(stata_output.doc) font(arial) fs(8) title(Diagnostic Post-Merge - Sickpay
* Sickpayx)
log close
______
    name: <unnamed>
     log: c:\mydata\APPdofile.log
 log type: text
•
. * a. Select continuing Panel 27 Round 3 Current Main Jobs (SUBTYPE=1, STILLAT=1)
. * from the FY 2023 JOBS file and print selected variables from first 20 obs
. use "c:\mydata\jobs23.dta", clear
. format PANEL ORIGRND SUBTYPE STILLAT SICKPAY %3.0f
. keep if (PANEL==27 & RN==3 & ORIGRND < 3 & SUBTYPE==1 & STILLAT==1 & SICKPAY==-1)
(31,207 observations deleted)
. *Print Sample of Continuation P27 R3 Records
. asdoc list JOBIDX PANEL RN ORIGRND SUBTYPE STILLAT SICKPAY if _n<=20, font(arial) fs(8) separator(
> 0) noobs, save(stata output.doc) title(Print Sample of Continuation P27 R3 Records)
. sort JOBIDX
. save "c:\mydata\j23.dta", replace
(file c:\mydata\j23.dta not found)
file c:\mydata\j23.dta saved
. \star b. Select newly reported Panel 27 Current Main Jobs records from
. * the FY 2022 JOBS file and print selected variables from first 20 obs
                         .
*********************************
. use "c:\mydata\jobs22.dta", clear
. format PANEL OrigRnd SUBTYPE STILLAT SICKPAY %3.0f
. keep if (PANEL==27 & (RN==1 | RN==2)) & SUBTYPE==1 & STILLAT==-1
(34,812 observations deleted)
. *Print Sample of Newly Reported P27 R1 or R2 Records
. asdoc list JOBIDX PANEL RN OrigRnd SUBTYPE STILLAT SICKPAY if _n<=20, font(arial) fs(8) separator(
> 0) noobs, save(stata_output.doc) title(Print Sample of Newly Reported P27 R1 or R2 Records)
(File stata output.doc already exists, option append was assumed)
. sort JOBIDX
```

```
. rename SICKPAY SICKPAY22
. keep JOBIDX SICKPAY22
. save "c:\mydata\j22.dta", replace
(file c:\mydata\j22.dta not found)
file c:\mydata\j22.dta saved
. *Sickpay Value of FY2022 P27 R1 or R2 Newly Reported CMJs \,
. asdoc tabulate SICKPAY22, font(arial) fs(8), save(stata_output.doc) title(Sickpay Value of FY2022
> P27 R1 or R2 Newly Reported CMJs)
(File stata_output.doc already exists, option append was assumed)
* c. Create a dataset (J23R3F) that includes all variables
 * for the continuation Panel 27 Round 3 Current Main Jobs
. \star and create the new variable SICKPAYX by copying SICKPAY
 * from the corresponding Round 1 or Round 2 newly reported
. * job record.
. use "c:\mydata\jobs23.dta", clear
. merge 1:m JOBIDX using "c:\mydata\j22.dta", generate(matchvar22)
. gen SICKPAYX =
(5,262 missing values generated)
. keep if matchvar22 == 1 \mid matchvar22 == 3
(1,956 observations deleted)
. replace SICKPAYX = SICKPAY22 if SICKPAY22 != .
(3,306 real changes made)
. save "c:\mydata\J23R3f.dta", replace
(file c:\mydata\J23R3f.dta not found)
file c:\mydata\J23R3f.dta saved
. ******************
. * Diagnostic Post-Merge - Sickpay * Sickpayx
. * Continuation P27 R3 Current Main Jobs Only
. asdoc tabulate SICKPAY SICKPAYX, save(stata_output.doc) font(arial) fs(8) title(Diagnostic Post-Me
> rge - Sickpay * Sickpayx)
(File stata_output.doc already exists, option append was assumed)
. log close
     name: <unnamed>
      log: c:\mydata\APPdofile.log
 log type: text
```

# **Appendix 3 Variables Available in Round Job First Reported Only**

| Variable       | Applicable to current main job | Applicable to current miscellaneous job |
|----------------|--------------------------------|---|
| ESTMATE1 M19   | x, wage earner                 | miscenaneous job                        |
| BUSINC         | x, self-employed               |   |
| PROPRIET       | x, self-employed               |   |
| SICKPAY        | x, wage earner                 |   |
| PAYDRVST       | x, wage earner                 |   |
| PAYVACTN       | x, wage earner                 |   |
| RETIRPLN       | x, wage earner                 |   |
| SESNLJOB       | X                              | X                                       |
| TEMPJOB        | X                              | X                                       |
| WKLYAMT        |                                | X                                       |
| DIFFPLNS(_M24) | X                              | X                                       |
| ANYINS(_M24)   | X                              | X                                       |
| INUNION        | X                              | X                                       |
| HHMEMBER_M18   | x, self-employed               | x, self-employed                        |
| TOTNUMEMP      | x, self-employed               | x, self-employed                        |
| INDCODEX       | X                              |   |
| INDCAT17       | X                              |   |
| OCCCODEX       | X                              |   |
| OCCCAT18       | X                              |   |

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# **Appendix 4**

## **Reasons for Leaving Employment**

Interviewers use the following information to guide selection of values regarding reasons for leaving employment. Former jobs selected as retirement jobs at EM380 will not be asked EM520 or EM530. Numeric response values are included parenthetically next to the label. The most current version of this language may be found online in the MEPS Survey Questionnaire section Medical Expenditure Panel Survey MEPS Survey Questionnaires (ahrq.gov).

#### **YLEFT M18 (EM520)**

#### JOB ENDED, TEMPORARY, SEASONAL, CONTRACT, ETC. (1)

Voluntary or involuntary termination of employment based on the completion or cancellation of a predetermined task or work order. For example, construction workers may no longer be employed due to the fact that a specific project has been completed and no subsequent projects have begun.

#### **BUSINESS CLOSED OR SOLD (2)**

Voluntary or involuntary cessation of operations by the owners of the business.

#### ILLNESS, INJURY, HEALTH PROBLEM (3)

Inability to work due to impairments, or physical or mental health conditions. The impairment or condition should be of such severity that it incapacitates the individual and prevents him/her from doing any kind of gainful employment.

#### TERMINATED, FIRED, DISMISSED (4)

Employer ends job against the will of the employee. This can be due to issues with the employee's performance but it also may be due to factors outside the employee's control, such as company restructuring or the elimination of a position.

#### LAID OFF, LET GO (5)

Persons are on layoff if they are waiting to be recalled to a job from which they were temporarily separated for business-related reasons, such as temporary drops in demand, business downturns, plant remodeling, material shortages, and inventory taking. They must have either been given a date to report back to work or, if not given a date, must expect to be recalled to their job within six months.

#### **QUIT - FAMILY REASON, MATERNITY LEAVE (6)**

This answer category includes cases where an RU member ceases employment in order to be in the household to take care of household duties, children, and/or spouse. It also includes cases

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where an RU member may quit in order to be available to care for another family member who is ill, either in the RU member's home or elsewhere. Maternity leave allows a pregnant RU member voluntarily terminates employment due to the birth of her child or quits to take care of an adopted child.

#### QUIT - SCHOOL (7)

RU member is no longer employed in order to attend classes at any kind of public or private school, including trade or vocational schools in which students receive no compensation in money or kind, or only minimal educational stipends (fellowship, scholarship).

#### **QUIT - JOB RELATED REASON (8)**

RU member voluntary leaves employer directly due to job related conditions. Examples may include a difficult work environment, inconsistency or dissatisfaction with scheduling or hours, change in position expectations or responsibilities, or relocation. This includes quitting due to taking another job.

#### **QUIT - ANY OTHER REASON (9)**

RU member voluntary leaves employer for any other reason. This may include wanting time off from working or time off to pursue other interests such as volunteering or personal hobbies.

#### YNOBUSN M18 (EM530)

#### **BUSINESS CLOSED OR SOLD (1)**

Voluntary or involuntary cessation of operations by the owners of the business.

#### RETIRED (2)

Voluntary termination of employment usually the result of reaching a specified age and tenure. Also include situations in which the person is no longer seeking main employment due to a retirement decision.

#### **ILLNESS OR INJURY (3)**

Inability to work due to impairments, or physical or mental health conditions. The impairment or condition should be of such severity that it incapacitates the individual and prevents him/her from doing any kind of gainful employment.

#### WHY LEFT M18 (RJ130)

#### JOB ENDED, TEMPORARY, SEASONAL, CONTRACT, ETC. (1)

Voluntary or involuntary termination of employment based on the completion or cancellation of a predetermined task or work order. For example, construction workers may no longer be employed due to the fact that a specific project has been completed and no subsequent projects have begun.

#### **BUSINESS CLOSED OR SOLD (2)**

Voluntary or involuntary cessation of operations by the owners of the business.

#### RETIRED (3)

Voluntary termination of employment usually the result of reaching a specified age and tenure. Also include situations in which the person is no longer seeking main employment due to a retirement decision.

#### ILLNESS, INJURY, HEALTH PROBLEM (4)

Inability to work due to impairments, or physical or mental health problems. The impairment or problem should be of such severity that it incapacitates the individual and prevents him/her from doing any kind of gainful employment.

#### **TERMINATED, FIRED, DISMISSED (5)**

Employer ends job against the will of the employee. This can be due to issues with the employee's performance but it also may be due to factors outside the employee's control, such as company restructuring or the elimination of a position.

#### LAID OFF, LET GO (6)

Persons are on layoff if they are waiting to be recalled to a job from which they were temporarily separated for business-related reasons, such as temporary drops in demand, business downturns, plant remodeling, material shortages, and inventory

taking. They must have either been given a date to report back to work or, if not given a date, must expect to be recalled to their job within six months.

#### **QUIT - FAMILY REASON, MATERNITY LEAVE (7)**

This answer category includes cases where an RU member ceases employment in order to be in the household to take care of household duties, children, and/or spouse. It also includes cases where an RU member may quit in order to be available to care for another family member who is ill, either in the RU member's home or elsewhere. Maternity leave allows a pregnant RU member voluntarily terminates employment due to the birth of her child or quits to take care of an adopted child.

#### **QUIT - SCHOOL (8)**

RU member is no longer employed in order to attend classes at any kind of public or private school, including trade or vocational schools in which students receive no compensation in money or kind, or only minimal educational stipends (fellowship, scholarship).

#### **QUIT - JOB RELATED REASON (9)**

RU member voluntary leaves employer directly due to job related conditions. Examples may include a difficult work environment, inconsistency or dissatisfaction with scheduling or hours, change in position expectations or responsibilities, or relocation. This includes quitting due to taking another job.

### **QUIT - ANY OTHER REASON (10)**

RU member voluntary leaves employer for any other reason. This may include wanting time off from working or time off to pursue other interests such as volunteering or personal hobbies.

# **Appendix 5 MEPS Industry Codes Condensing Rules**

#### MEPS Industry Codes Condensing Rules FY2010 through FY2022, & FY2023 and Subsequent Files

| Condensed industry code | 2007 Census<br>industry code<br>range | 2017 Census industry code range | Description                            |
|-------------------------|---------------------------------------|---------------------------------|--|
| 1                       | 0170 - 0290                           | 0170-0290                       | Natural Resources                      |
| 2                       | 0370 - 0490                           | 0370-0490                       | Mining                                 |
| 3                       | 0770                                  | 0770                            | Construction                           |
| 4                       | 1070 - 3990                           | 1070-3990                       | Manufacturing                          |
| 5                       | 4070 - 4590,<br>4670 - 5790           | 4070-4590,<br>4670-5790         | Wholesale and Retail Trade             |
| 6                       | 0570 - 0690,<br>6070 - 6390           | 0570-0690,<br>6070-6390         | Transportation and Utilities           |
| 7                       | 6470 - 6780                           | 6470-6780                       | Information                            |
| 8                       | 6870 - 7190                           | 6870-7190                       | Financial Activities                   |
| 9                       | 7270 - 7790                           | 7270-7790                       | Professional and Business Services     |
| 10                      | 7860 - 8470                           | 7860-8470                       | Education, Health, and Social Services |
| 11                      | 8560 - 8690                           | 8561-8690                       | Leisure and Hospitality                |
| 12                      | 8770 - 9290                           | 8770-9290                       | Other Services                         |
| 13                      | 9370 - 9590                           | 9370-9590                       | Public Administration                  |
| 14                      | 9890                                  | 9890                            | Military                               |
| 15                      | 9990                                  | 9990                            | Unclassifiable Industry                |

MEPS uses the 4-digit Census occupation and industry coding systems developed for the Current Population Survey and the American Community Survey.

Through FY 2022, Census used the 2007 4-digit Census industry codes for MEPS. Starting in FY 2023, Census began using 2017 4-digit Census industry codes for MEPS.

Descriptions of the 4-digit Census industry codes (all years) and their cross-walk to North American Industry Classification System (NAICS) can be found at the <u>U.S. Census Bureau</u> website.

See Census IO Index for more information on the Census coding systems used by the MEPS.

# **Appendix 6 MEPS Occupation Codes Condensing Rules**

#### MEPS Occupation Codes Condensing Rules FY2010 through FY2022, & FY2023 and Subsequent Files

| Condensed occupation code | 2010 Census occupation code range | 2018 Census occupation code range | Description   |
|---------------------------|-----------------------------------|-----------------------------------|---|
| 1                         | 0010 - 0950                       | 0010-0960                         | Management, Business, and Financial Operations<br>Occupations |
| 2                         | 1005 - 3540                       | 1005-3550                         | Professional and Related Occupations                          |
| 3                         | 3600 - 4650                       | 3601-4655                         | Service Occupations   |
| 4                         | 4700 - 4965                       | 4700-4965                         | Sales and Related Occupations                                 |
| 5                         | 5000 - 5940                       | 5000-5940                         | Office and Administrative Support Occupations                 |
| 6                         | 6005 - 6130                       | 6005-6130                         | Farming, Fishing, and Forestry Occupations                    |
| 7                         | 6200 - 7630                       | 6200-7640                         | Construction, Extraction, and Maintenance<br>Occupations      |
| 8                         | 7700 - 9750                       | 7700-9760                         | Production, Transportation, and Material Moving Occupations   |
| 9                         | 9840                              | 9840                              | Military Specific Occupations                                 |
| 10                        | 9920                              | 9920                              | Not in Labor Force  |
| 11                        | 9990                              | 9990                              | Unclassifiable Occupation                                     |

MEPS uses the 4-digit Census occupation and industry coding systems developed for the Current Population Survey and the American Community Survey.

Through FY 2022, Census used the 2010 4-digit Census occupation codes for MEPS. Starting in FY 2023, Census began using the 2018 4-digit Census occupation codes for MEPS.

Descriptions of the 4-digit Census occupation codes and their cross-walk to Standard Occupational Classification (SOC) system can be found at the <u>U.S. Census Bureau website</u>.

See the Census IO Index for more information on the Census coding systems used by the MEPS.