

Part B. Statistical Methods

1. The potential respondent universe for the *Monthly Return of Arson Offenses Known to Law Enforcement* (OMB No. 1110-0008) includes all United States LEAs submitting crime data via SRS. In 2020, an estimated 6,400 SRS agencies reported one to 12 months of arson data to the FBI’s UCR Program, while 252 reported zero months.

LEAs consist of federal, state, county, city, tribal, university and college, and territorial agencies which correlate to all population group sizes and have many diverse attributes. These agencies include a mix of population density and degrees of urbanization; various compositions of population, particularly youth concentration; population mobility with respect to residents’ mobility, commuting patterns, and transient factors; different economic conditions including median income, poverty level, and job availability; areas with different modes of transportation and highway systems; different cultural factors and educational, recreational, and religious characteristics; family conditions with respect to divorce and family cohesiveness; climate; effective strength of law enforcement; policies of other components of the criminal justice system; citizens’ attitudes toward crime; and crime reporting practices of the citizenry.

SRS Agencies, 2020			
	Population Group	Number of Agencies	Population Covered
Cities	Group I (250,000 inhabitants and more)	39	33,492,580
	Group II (100,000 to 249,999 inhabitants)	111	15,398,455
	Group III (50,000 to 99,999 inhabitants)	243	16,553,287
	Group IV (25,000 to 49,999 inhabitants)	408	13,843,056
	Group V (10,000 to 24,999 inhabitants)	803	12,557,602
	Group VI (Less than 10,000 inhabitants) ^{1,2}	3,416	9,666,279
Counties	Group VIII (Nonmetropolitan County) ²	730	6,515,322
	Group IX (Metropolitan County) ²	902	3,253,338
SRS Arson Participation, 2020		Total	6,652
		Number of Agencies	140,559,962

¹ Includes universities and colleges to which no population is attributed.

² Includes state police to which no population is attributed.

Months Submitted	Number of Agencies
0 months	252
1 month	126
2 months	84
3 months	53
4 months	52
5 months	39
6 months	72
7 months	48
8 months	136
9 months	150
10 months	140
11 months	258
12 months	5,242
Total	6,652

An estimated 5,242 of the 6,652 agencies voluntarily participating in the FBI's UCR Program and under SRS in 2020 submitted 12 months of data. One to 11 months of data were provided by 17.4 percent (1,158) of the LEAs, while 252 submitted no arson data.

2. Arson data are collected/received from state UCR program participants monthly. The FBI's UCR Program has established various time frames and deadlines for acquiring the monthly data. Monthly reports/submissions should be received by the seventh day after the close of each month. Annual deadlines are also designated to collect/assess receipt of monthly submissions. There are times when special circumstances may cause an agency to request an extension. The FBI's UCR Program has the authority to grant these extensions. The law enforcement community requested crime data be collected monthly since police records are based on a calendar month; however, the FBI's UCR Program has agencies submitting data quarterly, twice a year, and even once a year. Upon approval, LEAs can submit data at intervals which minimize the burdens to the agency.

As the data collection is intended to collect all arson offenses from LEAs in the United States, sampling methodologies are not used. Past arson data collections have not included national or subnational estimates for arson because the FBI's UCR Program had not defined the imputation procedures for the crime of arson under SRS.

SRS was retired and the UCR Program transitioned to a NIBRS-only data collection on January 1, 2021. In preparation, the UCR Program partnered with BJS to develop a methodology for producing valid national and subnational estimates for NIBRS data. This joint effort aimed to devise a statistically robust method to calculate national estimates and to ensure the methodology met the needs for both agencies to have a single "voice" for NIBRS data from DOJ. The project goals were to produce a method for national-level estimates of

offense counts and rates similar to the first five tables of *CIUS*. In addition to offense counts and rates, the methodology would produce estimates of other key indicators available in NIBRS (e.g., victim and offender characteristics, weapon involvement, and location type). After appropriate coverage rates have been met, valid state estimates will be calculated.

Since some LEAs have not yet completed the transition to NIBRS, in 2022 the UCR Program opted for the continued collection of additional incidents from those agencies still collecting data under SRS. Renewing the *Monthly Return of Arson Offenses Known to Law Enforcement* data collection will also allow LEAs to submit updates to previously reported incidents.

Although the FBI makes an effort through its editing procedures, training practices, and correspondence to ensure the validity of the data received, the accuracy of the statistics depends primarily on the adherence of each contributor to the established standards of reporting. The FBI relies on the integrity of data contributors reporting data; however, staff from the CJIS Audit Unit are available, upon request, to conduct quality assurance reviews. The results of the audits are not used to adjust crime data but to educate reporting agencies on compliance with FBI's UCR Program guidelines.

3. Response rates are maximized through liaison with state UCR programs. Communications encouraging data submissions occur frequently because of the relationship between the FBI's UCR Program staff and LEAs. UCR Program staff have a strong understanding of contextual challenges agencies face in reporting valid and reliable data and regularly work to overcome no-response issues when such challenges occur. The mission of the UCR Program is to acquire arson data, establish guidelines for the collection of such data, and publish the information.

Twelve months of arson data were provided to the UCR Program by 78.8 percent (5,242) of the participating SRS agencies. One to 11 months of information were submitted by 17.4 percent (1,158), while the remaining 3.8 percent (252) provided zero months. These agencies are nonresponsive due to being understaffed, underfunded, or are implementing a new data record system. "Other agencies" and "other state agencies" consistently provide missing or incomplete data. Even though these agencies are non-reporters, they are considered participants in the UCR Program and will provide data when any submission issues have been resolved. Based on historical reporting trends, similar response rates are expected in future arson collections; however, the UCR Program actively liaisons with national LEAs to encourage participation in all data collections.

The UCR Program assists agencies in submitting 12 months of complete data through active liaisons with the state UCR programs and individual LEAs. To encourage the submission of data, a list of missing reports is sent to state UCR programs and individual LEAs twice a year and then follow-up engagement is made to those agencies to further encourage the submission of missing data.

4. The FBI has conducted the arson information collection since 1979. The response rates for arson have remained relatively consistent from year to year. During the implementation of the arson information collection, extensive research regarding the offense of arson was conducted by UCR Program staff. Liaison with members of law enforcement, fire services, and insurance communities had been effective in the effort to fulfill the Congressional mandate to collect arson offense data and to design a collection form which would provide meaningful information to all concerned. Representatives of the UCR Program, International Association of Chiefs of Police, National Sheriffs' Association, USFA, National Fire Protection Association, and other national and international fire service associations met to discuss the design of a viable collection device and other pertinent implementation procedures of fulfilling the legislative mandate to collect arson. Representatives of the various agencies in attendance solicited suggestions and comments on a number of proposals concerning the collection of arson, some of which were implemented into the design of the proposed arson collection form. Other meetings and liaison activities were conducted to obtain a base of information concerning the offense of arson. Direct liaison with fire chiefs and arson investigators afforded an opportunity to discuss details of the arson form and persons directly involved in investigation, detection, and reporting of fires, and specifically, arson cases. The information shared throughout these meetings provided the designers of the arson collection form with the pertinent information to incorporate into the new form.

Today, the UCR Program receives guidance for implementing or making changes to a data collection from the CJIS APB. The CJIS advisory process was developed to obtain the user community's advice and guidance on the development and operation of all CJIS Division programs. The philosophy underlying the advisory process is one of shared management, i.e., the FBI along with federal, state, county, city, tribal, university and college, and territorial data providers and system users share responsibility for the operation and management of all systems administered by the FBI for the benefit of the criminal justice community.

There have not been any changes to the current arson form which require testing. No comments or suggestions of problems with the form have been reported through the CJIS APB Working Groups, UCR Subcommittee, CJIS APB, or the ASUCRP which meet frequently throughout each year and are dedicated to improving the collection, use, and utility of crime data as reported through the FBI's UCR Program and all state and local crime reporting programs.

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