

SUPPORTING JUSTIFICATION - PART B
CAUSAL ANALYSIS AND CONTERMEASURES TO RAIL-RELATED
SUICIDES -- Form Numbers FRA F 6180.125A; FRA F 6180.125B

- 1. DESCRIBE (INCLUDING A NUMERICAL ESTIMATE) THE POTENTIAL RESPONDENT UNIVERSE AND ANY SAMPLING OR OTHER RESPONDENT SELECTION METHOD TO BE USED. DATA ON THE NUMBER OF ENTITIES (E.G., ESTABLISHMENTS, STATE AND LOCAL GOVERNMENT UNITS, HOUSEHOLDS, OR PERSONS) IN THE UNIVERSE COVERED BY THE COLLECTION AND CORRESPONDING SAMPLE ARE TO BE PROVIDED IN TABULAR FORM FOR THE UNIVERSE AS A WHOLE AND FOR EACH OF THE STRATA IN THE PROPOSED SAMPLE. INDICATE EXPECTED RESPONSE RATES FOR THE COLLECTION AS A WHOLE. IF THE COLLECTION HAD BEEN CONDUCTED PREVIOUSLY, INCLUDE THE ACTUAL RESPONSE RATE ACHIEVED DURING THE LAST COLLECTION.**

The potential respondent universe consists of friends and family members of the deceased individual, the appropriate Coroner or Medical Examiner, and railroad personnel who were involved or witnessed the suicide. Of this potential universe, eight (8) individuals will be selected to answer the questionnaires. These eight (8) individuals will be selected based on their knowledge of the deceased individual and knowledge of the events leading up to his/her death. FRA/AAS expects a response rate of over 90% because the mode of data collection is by face-to-face interviews by trained staff who will reach out to the interviewees prior to the interview. The expected high response rate is reflective of experience where psychological autopsies have been conducted following sensitive outreach by research staff.

- 1. DESCRIBE THE PROCEDURES FOR THE COLLECTION OF INFORMATION INCLUDING:**

- STATISTICAL METHODOLOGY FOR STRATIFICATION AND SAMPLE SELECTION**

Over a two-year period, a psychological autopsy will be conducted on a systematic sample of 70 railroad suicides. A nationally representative sample will be obtained. The geographic location of these suicides would have a random distribution. AAS will reach out and attempt to conduct a psychological autopsy on every third case of railroad suicide that occurs. All individuals with relevant information about the deceased individual will be interviewed.

- ESTIMATION PROCEDURE**

Data obtained from the study sample will be extrapolated to obtain a population estimate for individuals who complete suicide on railroads. Data will be analyzed for

characteristics that may be associated with railway suicides after applying appropriate weights. In this study, sample data will be weighted by a factor of three, in order to adjust for the systematic sampling technique where every third case of railroad suicide will be included.

Despite the high response rate anticipated, data may be biased if non-respondents are concentrated geographically, by race, or by some other characteristic. In case data analysis indicates the possibility of such bias, weights will be adjusted appropriately to reflect the magnitude of the bias.

- **DEGREE OF ACCURACY NEEDED FOR THE PURPOSE DESCRIBED IN THE JUSTIFICATION**

For the study to be useful, AAS staff needs to be trained on interviewing techniques and appropriate recording of the data on the questionnaire. In order to accomplish this, AAS staff will be given in depth training prior to the start of data collection.

- **UNUSUAL PROBLEMS REQUIRING SPECIALIZED SAMPLING PROCEDURES, AND**

Systematic sampling will be done. Due to the random nature of the geographic location of railroad suicides, AAS will need to ensure that the sample obtained is nationally representative.

- **ANY USE OF PERIODIC (LESS FREQUENT THAN ANNUAL) DATA COLLECTION CYCLES TO REDUCE BURDEN**

No, there will be no use of periodic data collection for this study. This is the first time such data is being collected.

It should be noted once again that the total estimated burden for this proposed study is extremely minimal.

3. **DESCRIBE METHODS TO MAXIMIZE RESPONSE RATES AND TO DEAL WITH ISSUES OF NON-RESPONSE. THE ACCURACY AND RELIABILITY OF INFORMATION COLLECTED MUST BE SHOWN TO BE ADEQUATE FOR INTENDED USES. FOR COLLECTIONS BASES ON SAMPLING, A SPECIAL JUSTIFICATION MUST BE PROVIDED FOR ANY COLLECTION THAT WILL NOT YIELD “RELIABLE” DATA THAT CAN BE GENERALIZED TO THE UNIVERSE STUDIED.**

In addition to the cover letter that will be sent out to survivors by the FRA (and FTA) Administrator explaining the rationale for the proposed study, its importance for public safety on and around railroad property, the potential for preventing railroad suicides and encouraging respondents to participate, a second letter will also be sent out by AAS to

respondents. This letter will assure them that – after gathering and processing the data – AAS will release to FRA and FTA only generalized, statistical, summary reports and that AAS will not release any of the raw data provided to FRA.

Additionally, response rates will be maximized by outreach efforts by trained AAS staff, prior to data collection. AAS staff will explain the importance of this study to potential interviewees and ask for their consent to meet with them to collect the required data. If some individuals are unwilling to participate in this study, outreach will be made to other individuals who may be able to provide the required information.

As noted in the answer to question one of this part of the Supporting Justification, FRA/AAS expects a response rate of over 90% because the mode of data collection is by face-to-face interviews by trained staff who will reach out to the interviewees prior to the interview.

4. DESCRIBE ANY TESTS FOR PROCEDURES OR METHODS TO BE UNDERTAKEN. TESTING IS ENCOURAGED AS AN EFFECTIVE MEANS OF REFINING COLLECTIONS OF INFORMATION TO MINIMIZE BURDEN AND IMPROVE UTILITY. TESTS MUST BE APPROVED IF THEY CALL FOR ANSWERS TO IDENTICAL QUESTIONS FROM 10 OR MORE RESPONDENTS. A PROPOSED TEST OR SET OF TESTS MAY BE SUBMITTED FOR APPROVAL SEPARATELY OR IN COMBINATION WITH THE MAIN COLLECTION OF INFORMATION.

The questionnaires will be pilot tested by AAS staff after they have been trained to use the instruments. Issues that arise during the pilot test will be addressed prior to the start of actual data collection.

5. PROVIDE THE NAME AND TELEPHONE NUMBER OF INDIVIDUALS CONSULTED ON STATISTICAL ASPECTS OF THE DESIGN AND THE NAME OF THE AGENCY UNIT, CONTRACTOR(S), GRANTEE(S), OR OTHER PERSON(S) WHO WILL ACTUALLY COLLECT AND/OR ANALYZE THE INFORMATION FOR THE AGENCY.

FRA has engaged the services of the American Association of Suicidology (AAS), 5221 Wisconsin Ave., N.W., Washington, D.C. 20015, for the conduct of this study. AAS will be responsible for data collection, tabulation, and analysis.

The AAS primary point of contact for this work is:

Karen Marshall
Program Development Director
Tel.: (202) 237-2280
Fax: (202) 237-2282
kmarshall@suicidology.org

The FRA primary point of contact for the contracted study is:

Michael Coplen
Railroad Development Special Projects Manager
Tel.: (202) 493-6292
Fax: (202) 493-6333
michael.coplen@dot.gov