DATA MANAGEMENT AND SHARING PLAN

Element 1: Data Type

A. Types and amount of scientific data expected to be generated in the project:
Survey: This study will recruit approximately 300 firearm-injured youth between the ages of 15-34 from a Level 1 Trauma Center in the Texas Medical Center. Participants will be surveyed at baseline, 6 months, and 1-year with validated scales and survey questions that have been used in published firearm studies. Constructs being measured include psychological distress, mental cognition, behaviors, economic mobility, environmental health, firearm victimization, and firearm propensity (e.g. access, ownership, carriage, attitudes). The complete instrument will take approximately 30 minutes to complete.

Interviews: This study will also conduct digitally recorded semi-structured interviews with patient participants (n=36). Transcripts will be deidentified and professionally transcribed. A codebook will be generated using methods described in Aim 2. The codebook and summary of coding files will be shared as detailed below.

Data will be archived in openICPSR.

B. Scientific data that will be preserved and shared, and the rationale for doing so:
Survey data: De-identified individual and aggregate survey data -raw and recoded- will be shared. The de-identification process will remove direct and indirect respondent identifiers. Once data are confirmed final, respondent identifiers will be deleted. Data will be provided to validate and replicate research findings described in the Aims.

Interview data: Transcripts from interviews and focus groups with participants will be de-identified and sensitive content redacted where identification is plausible. These de-identified and redacted transcripts and coding summaries will be shared. Voice recordings will not be shared to ensure participants will not be reidentified by voice.

Where applicable, sensitive data will be managed using ICPSR's restricted data dissemination practices to ensure the data are kept confidential.

C. Metadata, other relevant data, and associated documentation:
Documentation to be made publicly available to the research community will include PDF documents containing:

- Study protocols
- Survey instruments
- Interview guides
- Copies of blank, dated, stamped consent forms and IRB approvals
- Survey codebook
- Manual of operations

Element 2: Related Tools, Software and/or Code

Qualitative data will be collected and analyzed using NVivo. Quantitative data will be collected using REDCap and analyzed using SPSS and MPlus.

ICPSR makes quantitative data available in multiple widely-used access and preservation formats, including SPSS, SAS, Stata, R, Delimited, and ASCII. Other types of data collected will adhere to ICPSR recommended submission formats to maximize access. The Center of Nursing Research has trained statisticians and data analysts available to help with file preparation for archiving.

Element 3: Standards

Data will be standardized to the NIH Common Data Elements library format to the extent possible. Shared data will be deidentified, and original data will be maintained at the investigator's institution.

Element 4: Data Preservation, Access, and Associated Timelines

A. Repository where scientific data and metadata will be archived:
The research data from this project will be deposited with a service of the Inter-university Consortium for Political and Social Research (ICPSR), openICPSR, to ensure that the research community has long-term access to the data. ICPSR is a CoreTrustSeal certified repository providing long-term access to and preservation of data packages curated by domain specialists.

B. How scientific data will be findable and identifiable:

Every ICPSR data collection receives a globally unique and persistent identifier, which are registered with DataCite (a global DOI provider) and included in the citation and metadata record of each ICPSR data collection. ICPSR creates rich study- and variable-level metadata records in the Data Documentation Initiative (DDI) disciplinary metadata format using information supplied by data depositors and other sources. Metadata are available for bulk export in a variety of metadata formats (Dublin Core, DDI, and MARCXML), as well as exportable from and embedded in dataset landing pages, including structured Schema.org data markup indexed by leading search engines. Metadata are organized using standardized, well-established formats, templates, and vocabularies, and are released with a clear and accessible data usage license.

C. When and how long the scientific data will be made available:

Research data will be available upon publication of related work and will remain available at ICPSR indefinitely, or as long as required by institutional policy or the sponsor. The investigator/project team will contact ICPSR 3-4 months before the required release date to determine if there would be lag time between data submission and ICPSR's release of the data.

Element 5: Access, Distribution, or Reuse Considerations

A. **Factors affecting subsequent access, distribution, or reuse of scientific data:**
Human subject information will be fully de-identified before ICPSR disseminates it to the public. Research participants will receive information about where and how data from this study will be shared during study enrollment procedures and in informed consent documents. Interview participants will be informed their de-identified data will be shared with open access for future use. Participants who want to withdraw their data from the study prior to de-identification may contact the study team or the university's research administration office.

Restricted-Use Data Access:
Access to information that may be used to identify human subjects, even indirectly, will be managed according to ICPSR restricted-use data access policy and procedures to maintain privacy and confidentiality protections of human subjects.

Reuse, Attribution and Redistribution: Users agree to: make no attempt to identify human subjects, cite the data/DOI, not redistribute the data without ICPSR written permission.

B. Whether access to scientific data will be controlled

Qualitative and quantitative data will be shared via **openICPSR** as open access. The only requirements to access downloadable, de-identified data through ICPSR are user registration and agreement to ICPSR's Terms of Use, which require users to agree to not re-disseminate data, to use appropriate data citation, and to maintain human subjects protections.

C. Protections for privacy, rights, and confidentiality of human research participants:
Data will be de-identified according to HIPAA and the Common Rule. All direct respondent identifiers (e.g., names, residence, email addresses) will be removed. Interview transcripts will be redacted to remove additional non-standard identifiers. De-identification will be completed prior to the finalization of shared data files. Digitally recorded interviews will be deleted following transcription. Participants will have the opportunity to opt out of sharing during informed consent procedures. Once personally identifying information is removed from the data set and deleted, we will not be able to identify data associated with a specific research participant for removal from the dataset.

Element 6: Oversight of Data Management and Sharing

The Office of the Executive Vice President & Chief Academic Officer (EVP/CAO) and The Office of Data Science (ODS) at UTHealth Houston will provide joint institutional oversight for the DMS plan. Datasets resulting from this research will be cataloged within the institutional DEPUT system. DEPUT is the institutional oversight management portal supported by UTHealth Houston for DMS validation and tracking. DEPUT is the university's tracking system to ensure data is archived per the plan (for compliance) and the catalog of where to find UTH data (not an archive itself). The study PI [redacted] will update data status in DEPUT, and the institutional office of Sponsored Projects Administration (SPA) will perform annual validation according to the DMS plan. Validation results will be reported to EVP/CAO and ODS for review. Gaps, if any, will be identified with appropriate correcting measures implemented. The PI will have overall responsibility for compliance with data collection, storage, and safety protocols.