README file for

"Data and Code for Evidence and Lessons on the Health Impacts of Public Health Funding from the Fight against HIV/AIDS"

by Marcus Dillender
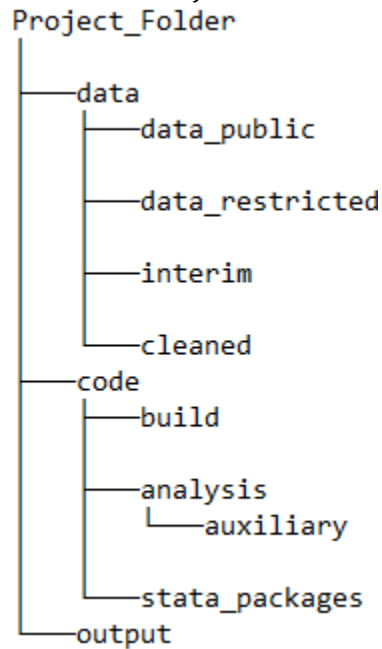
openicpsr-184821

I. Overview

This document describes how to replicate the results of "Evidence and Lessons on the Health Impacts of Public Health Funding from the Fight against HIV/AIDS". The replication kit includes all code necessary to replicate the analysis and all data the author is permitted to post online. The raw mortality data are restricted-use and were obtained by submitting an application for the data to the National Center for Health Statistics. I provide instructions for requesting these data below. Below, I also provide instructions for replicators, summarize the replication materials, and list and describe the data used in the project.

II. Instructions for Replicators

There is a single master script—master.do—that runs the code from start to finish to replicate the results. To run master.do, the user must specify the appropriate directory containing the replication kit only within this single do file. The analysis is conducted entirely within Stata using the Stata 17 version of this software. All user-generated Stata packages called upon within the code are included in the replication kit. For analysis displayed in exhibits, the names of the analysis do files indicate the exhibit that displays the analysis. For analysis do files that produce results not shown in exhibits, master.do indicates the section of the paper relevant for the analysis. To be able to fully replicate the analysis, the restricted data must be placed in the restricted_data/ folder.

Once the directory is set in the master do file and the restricted data are placed in the restricted_data/ folder, running the master do file will reproduce all of the results. For reference, the analysis was conducted on a computer with the following specifications: Intel Core i9-10900X with 10 cores, 3.70 GHz, and 256 GB of RAM. On this computer, the run time for the code is approximately 1 hour and 45 minutes.

III. Basic Project Folder Structure

```
Project_Folder
│
├───data
│       ├───data_public
│       │
│       ├───data_restricted
│       │
│       ├───interim
│       │
│       └───cleaned
├───code
│       ├───build
│       │
│       ├───analysis
│       │     └───auxiliary
│       │
│       └───stata_packages
└───output
```

IV. Organization of Code

The master do file—master.do—contains Stata code that runs all other scripts in the correct order. The remaining files are organized within three directories:

- build/ contains code that reads in raw data, cleans these data, and prepares analytical data files that are stored in data/cleaned/.
- analysis/ contains code that conducts the analysis using the analytical data files in the data/cleaned/ folder. The auxiliary_code/ folder contains additional code used in multiple analysis files. Outputs from the analysis are stored in the output/ folder.
- stata_packages/ contains all the Stata packages used in code/build/ or code/analysis/. These Stata packages come from the Boston College Statistical Software Components archive and are as follows:
  reghdfe
  ftools
  outreg2
  distinct
  statastates
  estout
  rddensity
  rdrobust
  drdid
  csdid
  bacondecomp

coefplot
shp2dta

V. Statement about Rights

I certify that the author of the manuscript has legitimate access to and permission to use the data used in this manuscript.

VI. Data Descriptions

The paper uses data from the following sources. Accessibility information, data citations, and the source data (whenever possible to disclose) are included in the replication kit. Researchers wishing to use the data sources referenced below and included in this kit for purposes other than replication are encouraged to use and cite the original sources. All of the data included in the replication kit are in the data_public/ folder.

The Vital Statistics Multiple Cause of Death Files (Department of Health and Human Services 2020a)

- **Accessibility**: Prior to 1989, the publicly available Vital Statistics Multiple Cause of Death Files have the information required for this study. The 1987 and 1988 files used for this study were downloaded from the [CDC's website](#) and are in the replication kit. The 1989 to 2019 Vital Statistics Multiple Cause of Death Files are restricted-use and were obtained through an application to the National Center for Health Statistics. According to the National Center for Health Statistics, appropriate projects for requesting the data are those with a reasonable likelihood of contributing to knowledge of a health-related issue. The National Center for Health Statistics reviews the data requests, typically in 4 to 6 weeks. More information on the application process, as well as a list of variables available in the data, can be found [here](#). To replicate the analysis, the restricted-use Vital Statistics mortality data must be obtained by request and placed within the data_restricted/mortality_from_cdc/ folder. The code draws on the file names and directory structure that were provided by the CDC. The data_restricted/ folder contains a text file that displays these file names and the directory structure.
- **Data Citation**: Department of Health and Human Services. 2020a. Multiple Cause of Death, 1987-2019. National Center for Health Statistics.
- **Included Source Data**:
  MORT87.pub
  Vs88mort.raw (note that I needed to add ".raw" to the file downloaded from the CDC)

HIV and AIDS Information from CDC External Research Request (Centers for Disease Control and Prevention 2020a)

- **Accessibility**: City-level data on HIV and AIDS were obtained through a special request to the CDC's Division of HIV/AIDS Prevention/HIV Incidence and Case Surveillance Branch. The first step in initiating this special request was to reach out to the CDC. I was given a brief form to fill out explaining the request. The files I received from the CDC are included in the replication kit.
- **Data Citation**: Centers for Disease Control and Prevention. 2020a. "City-Level HIV/AIDS Outcomes by Year." External Request for Analysis of National HIV Surveillance Data through the Division of HIV/AIDS Prevention/HIV Incidence and Case Surveillance Branch.
- **Included Source Data**:
  AIDS Diagnosis by MSA.csv
  AIDS Prevalence by MSA.csv
  HIV Diagnosis by MSA.csv
  HIV Prevalence by MSA.csv

AIDS Information from CDC Wonder (Department of Health and Human Services 2005)
- **Accessibility**: Information on AIDS cases reported and diagnosed by cities were accessed using the CDC Wonder tool. The tool is free to use, and the data are in the replication kit. From the link, four separate queries produce the data used in the project. To get from the link to the data sets, do the following (the numbering below corresponds to the numbering on the web page):
  - 1. First box: select "Location"; Second box: varies by outcome, see below
  - 2. Highlight from Akron, OH, to Youngstown, OH
  - 3. Varies by outcome, see below
  - 4. Varies by outcome, see below
  - 5 through 7. Leave defaults (i.e., include all cases)
  - 8. Check "Show Totals" (which is the default) and "Show Zero Values"
  - Click "Send"
  - ➔ Data populate
  - Click "Export"
- **Data Citation**: Department of Health and Human Services. 2005. "Centers for Disease Control and Prevention, National Center for HIV, STD and TB Prevention, AIDS Public Information Data Set US Surveillance Data for 1981-2002." CDC Wonder Online Database.
- **Included Source Data (with instructions for each specific query at the URL above)**:
  aids_cases_diag_year.txt
  - 1.Second box of step 1: select "Year Diagnosed"
  - 3. Highlight "*All*"
  - 4. Highlight "*All*"
  aids_cases_rep_year.txt

1.Second box of step 1: select "Year Reported"

3. Highlight each year 1987 to 2002

4. Highlight "*All*"

aids_cases_rwca_1994.txt

1.Second box of step 1: select "None"

3. Highlight each year 1981 to 1995

4. Highlight each year 1981 to 1994

aids_cases_rwca_1995.txt

1.Second box of step 1: select "None"

3. Highlight 1995

4. Highlight 1995

State-Level AIDS Information from CDC Atlas (Centers for Disease Control and Prevention 2021b)

- **Accessibility**: State-level information on AIDS cases come from the CDC Atlas tool. The tool is free to use, and the data are in the replication kit. To get from the link to the data set, do the following (the numbering below corresponds to the numbering on the web page):

  Step 1. Click "HIV"

  Step 2. Click "Tables"

  ➔ New page opens

  1. Check "AIDS prevalence" and then click "Next"

  2. Check "State" and "Select all states" and then click "Next"

  3. Check years 2000 to 2018 and then click "Next"

  4. Leave defaults (i.e., include all cases) and then click "Create my table"

  ➔ Data populate

  Click "Export"

- **Data Citation**: Centers for Disease Control and Prevention. 2021b. "NCHHSTP AtlasPlus." Retrieved from https://www.cdc.gov/nchhstp/atlas/index.htm on October 18, 2021.

- **Included Source Data**: AtlasPlusTableData_state.csv

Surveillance, Epidemiology, and End Results Population Data (SEER 2019)

- **Accessibility**: The county-level population data come from the SEER program. The data can be downloaded from the SEER website and are included in the replication kit. To download the data directly from the URL provided, click the .gz files corresponding to the text files below and then unzip the text files.

- **Data Citation**: SEER. 2019. "Surveillance, Epidemiology, and End Results (SEER) Program Populations (1969-2018)." National Cancer Institute, DCCPS, Surveillance Research Program.

- **Included Source Data**:
  us.1969_2018.singleages.adjusted.txt
  us.1990_2018.singleages.adjusted.txt

Consumer Price Information (World Bank 2022)
- **Accessibility**: The data on consumer prices were downloaded from the [Federal Reserve Bank of St. Louis's website](), which used data from the World Bank. The data are included in the replication kit.
- **Data Citation**: World Bank, Inflation, Consumer Prices for the United States [FPCPITOTLZGUSA], Retrieved from FRED, Federal Reserve Bank of St. Louis; https://fred.stlouisfed.org/series/FPCPITOTLZGUSA on December 5, 2022.
- **Included Source Data**: prices_fred.xls

Actuarial Life Table for 2005 (Social Security Administration 2021)
- **Accessibility**: The actuarial life table for 2005 was accessed from the [Social Security Administration's website](). The information is included in the replication kit.
- **Data Citation**: Social Security Administration. 2021. "Actuarial Life Table, Period Life Table, 2005." Office of the Chief Actuary, Retrieved from https://www.ssa.gov/oact/STATS/table4c6_2005.html on December 13, 2021.
- **Included Source Data**: ssa_life_tables_2005.xlsx

Current Population Survey Annual Social and Economic Supplement (ASEC) (Flood et al. 2022)
- **Accessibility**: The Current Population Survey data were downloaded from the [IPUMS website](). This replication kit contains the extracted data. To download the data directly from the URL above, first create an IPUMS account. Then, select the following variables:

  > year
  > asecwth
  > statefip
  > age
  > sex
  > himcaidly
  > himcarely
  > verify
  > anycovly
  > hcovany

  Then, click "CHANGE SAMPLES", check "ACS" for the year 2018, and click "SUBMIT SAMPLE SELECTIONS". Next, click "CREATE DATA EXTRACT" and then change the data format to ".dta (Stata)". Finally, click "SUBMIT EXTRACT". The IPUMS codebook for this request is also included the data_public folder.

- **Data Citation**: Flood, Sarah, Miriam King, Renae Rodgers, Steven Ruggles, J. Robert Warren, and Michael Westberry. 2022. "Integrated Public Use Microdata Series, Current Population Survey: Version 10.0 [dataset]." IPUMS, Minneapolis, MN.
- **Included Source Data**:
  cps_ipums_download.dta
  cps_ipums_download.cbk

American Community Survey (Ruggles et al. 2022)
- **Accessibility**: The American Community Survey data were downloaded from the [IPUMS website](). This replication kit contains the extracted data. To download the data directly from the URL above, first create an IPUMS account. Then, select the following variables:
  > statefip
  > countyfip
  > perwt
  > sex
  > age
  > race
  > hcovany
  > hinscaid

  Next, click "CHANGE SAMPLES", check "ACS" for the year 2018, and click "SUBMIT SAMPLE SELECTIONS". Next, click "CREATE DATA EXTRACT" and then change the data format to ".dta (Stata)". Finally, click "SUBMIT EXTRACT". The IPUMS codebook for this request is also included the data_public folder.
- **Data Citation**: Ruggles, Steven, Sarah Flood, Ronald Goeken, Megan Schouweiler, and Matthew Sobek. 2022. "IPUMS USA: Version 12.0 [dataset]." IPUMS, Minneapolis, MN.
- **Included Source Data**:
  usa_ipums_download.dta
  usa_ipums_download.cbk

General Social Survey (Smith 2019)
- **Accessibility**: The General Social Survey data were downloaded from the [NORC website]() and are included in the replication kit. To download the data directly from the provided URL, click "2018" in the year-specific files.
- **Data Citation**: Smith, Tom W., Michael Davern, Jeremy Freese, and Stephen Morgan. 2019. "General Social Surveys, 2018 [machine-readable data file]." Principal Investigator, Smith, Tom W.; Co-Principal Investigators, Michael Davern, Jeremy Freese and Stephen L. Morgan; Sponsored by National Science Foundation. NORC ed. Chicago: NORC.
- **Included Source Data**: GSS2018.dta

Census Shapefiles (United States Census Bureau 2019)

- **Accessibility**: The Census shapefiles were downloaded from the [Census Bureau's website](#) and are included in the replication kit. To download the data directly from the URL linked to above, click "cb_2018_us_state_500k.zip".
- **Data Citation**: United States Census Bureau. 2019. "Cartographic Boundary Files – Shapefile." Retrieved from https://www.census.gov/geographies/mapping-files/time-series/geo/carto-boundary-file.html in March 2021.
- **Included Source Data**:
  cb_2018_us_state_500k.dbf
  cb_2018_us_state_500k.shp

Local Area Unemployment Statistics (U.S. Bureau of Labor Statistics 2020)

- **Accessibility**: The data on unemployment rates were downloaded from the [Bureau of Labor Statistics website](#) and are included in the replication kit.
- **Data Citation**: U.S. Bureau of Labor Statistics. 2020. "Local Area Unemployment Statistics." Retrieved from https://download.bls.gov/pub/time.series/la/ on July 7, 2020.
- **Included Source Data**: la.data.64.txt

Author Constructed/Compiled Data. I also constructed/compiled data from various government and non-profit reports as well as from articles published in academic journals. The reports are all available online for free. I accessed the journal articles through my university's journal subscriptions. All sources of information are cited in the manuscript and below, and I describe these data in more detail below.

Ryan White Information

- **Sources of Information**: I collected information on Ryan White funding from Bowen et al. (1992), Department of Health and Human Services (1994a,b, 2018, 2020b), General Accounting Office (1995b, 1998, 2000, 2006), Government Accountability Office (2009, 2012), and Health Resources and Services Administration (2011).
- **Citations**:
  Bowen, G Stephen, Katherine Marconi, Sally Kohn, Dorothy M Bailey, Eric P Goosby, Sonya Shorter, and Steve Niemcryk. 1992. "First year of AIDS services delivery under Title I of the Ryan White CARE Act." Public Health Reports, 107(5): 491.
  Department of Health and Human Services. 1994a. "The Ryan White CARE Act: Funding Formulas." Office of the Inspector General. OEI-05-93-00330.
  Department of Health and Human Services. 1994b. "The Ryan White CARE Act: FY 1992 Title 1 and Title 2 Expenditures." Office of the Inspector General. OEI-05-93-00331.
  Department of Health and Human Services. 2018. "Health Resources and Services Administration Budget Justifications for Fiscal Years 2009 to 2018."

Department of Health and Human Services. 2020b. "Tracking Spending – Increasing Accountability." Accessed December 16, 2020.

General Accounting Office. 1995b. "Ryan White CARE Act of 1990 Opportunities to Enhance Funding Equity." GAO/HEHS-96-26.

General Accounting Office. 1998. "HIV/AIDS DRUGS Funding Implications of New Combination Therapies for Federal and State Programs." GAO/HEHS-99-2.

General Accounting Office. 2000. "Use of Ryan White CARE Act and Other Assistance Grant Funds." GAO/HEHS-00-5.

General Accounting Office. 2006. "Changes Needed to Improve the Distribution of Ryan White CARE Act and Housing Funds." GAO-06-332.

Government Accountability Office. 2009. "Implementation of the New Minority AIDS Initiative Provisions." GAO-09-315.

Government Accountability Office. 2012. "Ryan White CARE Act Improvements Needed in Oversight of Grantees." GAO12610.

Health Resources and Services Administration. 2011. "FY 2010 Grant Recipient Expenditures." Retrieved from https://ryanwhite.hrsa.gov/sites/default/files/ryanwhite/grants/fy10-part-expenditures-report.pdf in August 2020

- **Included Files**:
  title1.xls
  title2.xls
  t1years.xls
  rwca_2010_expenditures.xlsx

State-Level Information on Medicaid and HIV Laws

- **Sources of Information**: I collected information on Medicaid programs and HIV criminalization laws from Kaiser Family Foundation (2022), Lehman et al. (2014), and McMorrow et al. (2017).

- **Citations**:
  Kaiser Family Foundation. 2022. "Medicaid & CHIP." https://www.kff.org/state-category/medicaid-chip/ Accessed June 1, 2022.

  Lehman, J Stan, Meredith H Carr, Allison J Nichol, Alberto Ruisanchez, David W Knight, Anne E Langford, Simone C Gray, and Jonathan H Mermin. 2014. "Prevalence and Public Health Implications of State Laws That Criminalize Potential HIV Exposure in the United States." AIDS and Behavior, 18(6): 997–1006.

  McMorrow, Stacey, Genevieve M Kenney, Sharon K Long, Jason A Gates, et al. 2017. "The ACA Medicaid Expansion Led to Widespread Reductions in Uninsurance among Poor, Childless Adults." Washington, DC: Urban Institute.

- **Included File**: state_info.xlsx

City Centroids

- **Source of Information**: I was unable to find a single data source with the latitude and longitude of city centroids for the city codes from the AIDS Public Information Data Set. To create Appendix Figure A1, I used the [Missouri Census Data Center's Geocorr 1990](#) geographic correspondence tool and combined two city definitions, which involved manually verifying that each city's centroid coordinates were correct and editing as necessary. To get to the data used for identifying the centroid coordinates from the above URL, do the following (the field headings on web page are italicized below):
    1) *Select the state(s) to process:* Highlight all states
    2) *Select one or more source geographies:* For the first set, highlight "1990 Primary MSA: PMSA", and for the second set, highlight "1995 Primary MSA: PMSA"
    3) *Select one or more target geographies:* Highlight "Entire Universe [no code]"
    4) Check "Have weighted centroids calculated and kept on the output file"
    5) Click "Run request"
- **Citation**: Missouri Census Data Center. 2023. "Geocorr 1990: Geographic Correspondence Engine." Retrieved from https://mcdc.missouri.edu/applications/geocorr1990.html in February 2021.
- **Included File**: cityfips.xls

Gallup Information on LGBT Populations in Cities

- **Source of Information**: Information on the LGBT population in U.S. cities came from a report about a Gallup survey.
- **Citation**: Newport, Frank and Gary Gates. 2015. "San Francisco Metro Area Ranks Highest in LGBT Percentage." Gallup.
- **Included File**: gallup.xlsx

State-Level AIDS Information from Surveillance Archive

- **Source of Information**: I collected state-level information on AIDS cases from the CDC's HIV Surveillance Reports Archive.
- **Citation**: Centers for Disease Control and Prevention. 2020b. "HIV Surveillance Reports Archive." https://www.cdc.gov/hiv/library/reports/hiv-surveillance-archive.html. Last reviewed May 7, 2020. Accessed on October 18, 2021.
- **Included File**: surv_report_data.xlsx

VII. Summary Table for Data Sources

Data Source	Publicly Available for Download	In Replication Kit*	File Names in Replication Kit
Data from the Centers for Disease Control and Prevention			
1987 and 1988 Vital Statistics Multiple Cause of Death Files (HHS 2020a)	Y	Y	MORT87.pub Vs88mort.raw
1989 to 2018 Vital Statistics Multiple Cause of Death Files (HHS 2020a)	N, obtained by request to CDC	N	
HIV and AIDS Information from CDC External Research Request (CDC 2020a)	N, obtained by request to CDC	Y	AIDS Diagnosis by MSA.csv AIDS Prevalence by MSA.csv HIV Diagnosis by MSA.csv HIV Prevalence by MSA.csv
AIDS Information from CDC Wonder (HHS 2005)	Y	Y	aids_cases_diag_year.txt aids_cases_rep_year.txt aids_cases_rwca_1994.txt aids_cases_rwca_1995.txt
State-Level AIDS Information from CDC Atlas (CDC 2021b)	Y	Y	AtlasPlusTableData_state.csv
Surveillance, Epidemiology, and End Results Population Data (SEER 2019)	Y	Y	us.1969_2018.singleages.adjusted.txt us.1990_2018.singleages.adjusted.txt
Consumer Price Information (World Bank 2022)	Y	Y	prices_fred.xls
Actuarial Life Table for 2005 (Social Security Administration 2021)	Y	Y	ssa_life_tables_2005.xlsx
Current Population Survey ASEC (Flood et al. 2022)	Y	Y	cps_ipums_download.dta
American Community Survey (Ruggles et al. 2022)	Y	Y	usa_ipums_download.dta
General Social Survey (Smith 2019)	Y	Y	GSS2018.dta
Census Shapefiles (United States Census Bureau 2019)	Y	Y	cb_2018_us_state_500k.dbf cb_2018_us_state_500k.shp
Local Area Unemployment Statistics (U.S. Bureau of Labor Statistics 2020)	Y	Y	la.data.64.txt
Author Constructed/Compiled Data			
Ryan White Information	N/A, compiled by the author	Y	title1.xls title2.xls t1years.xls rwca_2010_expenditures.xlsx
State-Level Information on Medicaid and HIV Laws	N/A, compiled by the author	Y	state_info.xlsx

Continued on next page

Data Source	Publicly Available for Download	In Replication Kit*	File Names in Replication Kit
Continued from previous page			
City Centroids	N/A, compiled by the author	Y	cityfips.xls
Gallup Information on LGBT Populations in Cities	N/A, from article cited	Y	gallup.xlsx
State-Level AIDS Information from Surveillance Archive	N/A, compiled by the author	Y	surv_report_data.xlsx

*All data in replication kit are in data/data_public/

VIII. List of Analysis Files and Corresponding Exhibits

Name of Do File	Exhibit Displaying Analysis
table_1	Table 1
table_2	Table 2
table_3	Table 3
tables_4_A4_figure_5	Table 4, Appendix Table A4, and Figure 5
table_5_figures_6_7	Table 5 and Figures 6 and 7
decomp_gb	N/A
title2	N/A
table_6	Table 6
table_7_figure_8	Table 7 and Figure 8
table_8	Table 8
table_9	Table 9
pop_dynamics	N/A
hiv_cases_avoided	N/A
figure_1	Figure 1
figures_2_9_10_A2_A9	Figures 2, 9, and 10 and Appendix Figures A2 and A9
figures_3_11_A3_A10	Figures 3 and 11 and Appendix Figures A3 and A10
figure_4	Figure 4
figure_12	Figure 12
figure_13	Figure 13
figure_14	Figure 14
table_A1	Appendix Table A1
table_A2	Appendix Table A2
death_stats_table_A3	Appendix Table A3
table_A5	Appendix Table A5
table_A6_figure_A4	Appendix Table A6 and Appendix Figure A4
table_A7	Appendix Table A7
Figure_A1	Appendix Figure A1
figure_A5	Appendix Figure A5
figure_A6	Appendix Figure A6
figure_A7	Appendix Figure A7
figure_A8	Appendix Figure A8
figure_A11	Appendix Figure A11
table_B1_figure_B1	Appendix Table B1 and Appendix Figure B1

Notes: With the exception of the code to produce Appendix Tables A1 and A3 and Appendix Figure A1, the code for producing all other exhibits listed above draws on the cleaned analysis data files rather than on intermediate or raw data files.

IX. References

Bowen, G Stephen, Katherine Marconi, Sally Kohn, Dorothy M Bailey, Eric P Goosby, Sonya Shorter, and Steve Niemcryk. 1992. "First year of AIDS services delivery under Title I of the Ryan White CARE Act." Public Health Reports, 107(5): 491.

Centers for Disease Control and Prevention. 2020a. "City-Level HIV/AIDS Outcomes by Year." External Request for Analysis of National HIV Surveillance Data through the Division of HIV/AIDS Prevention/HIV Incidence and Case Surveillance Branch.

Centers for Disease Control and Prevention. 2021b. "NCHHSTP AtlasPlus." Retrieved from https://www.cdc.gov/nchhstp/atlas/index.htm on October 18, 2021.

Department of Health and Human Services. 1994a. "The Ryan White CARE Act: Funding Formulas." Office of the Inspector General. OEI-05-93-00330.

Department of Health and Human Services. 1994b. "The Ryan White CARE Act: FY 1992 Title 1 and Title 2 Expenditures." Office of the Inspector General. OEI-05-93-00331.

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Department of Health and Human Services. 2005. "Centers for Disease Control and Prevention, National Center for HIV, STD and TB Prevention, AIDS Public Information Data Set US Surveillance Data for 1981-2002." CDC Wonder Online Database.

Department of Health and Human Services. 2020a. Multiple Cause of Death, 1987-2019. National Center for Health Statistics.

Flood, Sarah, Miriam King, Renae Rodgers, Steven Ruggles, J. Robert Warren, and Michael Westberry. 2022. "Integrated Public Use Microdata Series, Current Population Survey: Version 10.0 [dataset]." IPUMS, Minneapolis, MN.

General Accounting Office. 1995b. "Ryan White CARE Act of 1990 Opportunities to Enhance Funding Equity." GAO/HEHS-96-26.

General Accounting Office. 1998. "HIV/AIDS DRUGS Funding Implications of New Combination Therapies for Federal and State Programs." GAO/HEHS-99-2.

General Accounting Office. 2000. "Use of Ryan White CARE Act and Other Assistance Grant Funds." GAO/HEHS-00-5.

General Accounting Office. 2006. "Changes Needed to Improve the Distribution of Ryan White CARE Act and Housing Funds." GAO-06-332.

Government Accountability Office. 2009. "Implementation of the New Minority AIDS Initiative Provisions." GAO-09-315.

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Health Resources and Services Administration. 2011. "FY 2010 Grant Recipient Expenditures." Retrieved from https://ryanwhite.hrsa.gov/sites/default/files/ryanwhite/grants/fy10-part-expenditures-report.pdf in August 2020.

Missouri Census Data Center. 2023. "Geocorr 1990: Geographic Correspondence Engine." Retrieved from https://mcdc.missouri.edu/applications/geocorr1990.html in February 2021.

Ruggles, Steven, Sarah Flood, Ronald Goeken, Megan Schouweiler, and Matthew Sobek. 2022. "IPUMS USA: Version 12.0 [dataset]." IPUMS, Minneapolis, MN.

SEER. 2019. "Surveillance, Epidemiology, and End Results (SEER) Program Populations (1969-2018)." National Cancer Institute, DCCPS, Surveillance Research Program.

Smith, Tom W., Michael Davern, Jeremy Freese, and Stephen Morgan. 2019. "General Social Surveys, 1972-2018 [machine-readable data file]." Principal Investigator, Smith, Tom W.; Co-Principal Investigators, Michael Davern, Jeremy Freese and Stephen L. Morgan; Sponsored by National Science Foundation. NORC ed. Chicago: NORC.

Social Security Administration. 2021. "Actuarial Life Table, Period Life Table, 2005." Office of the Chief Actuary, Retrieved from https://www.ssa.gov/oact/STATS/table4c6_2005.html on December 13, 2021.

U.S. Bureau of Labor Statistics. 2020. "Local Area Unemployment Statistics." Retrieved from https://download.bls.gov/pub/time.series/la/ on July 7, 2020.

United States Census Bureau. 2019. "Cartographic Boundary Files – Shapefile." Retrieved from https://www.census.gov/geographies/mapping-files/time-series/geo/carto-boundary-file.html in March 2021.

World Bank, Inflation, Consumer Prices for the United States [FPCPITOTLZGUSA], Retrieved from FRED, Federal Reserve Bank of St. Louis; https://fred.stlouisfed.org/series/FPCPITOTLZGUSA on December 5, 2022.