

Studying Social Inequality with Data Science

INFO 3370 / 5371
Spring 2023

Political Origins of Wealth Inequality

Learning goals for today

By the end of class, you will be able to

- ▶ trace political origins of racial wealth inequality
- ▶ link these to data science questions with a
 - ▶ unit of analysis
 - ▶ set of predictors
 - ▶ outcome variable



Walker Evans, 1933. The Breadline.

Source: National Gallery of Art



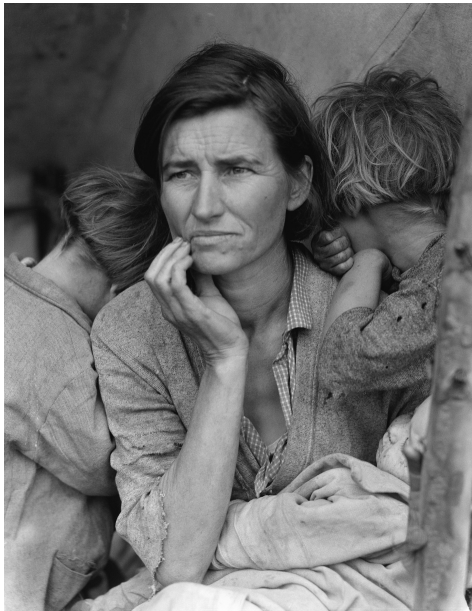
Lucienne Bloch, 1936. Land of Plenty.

Source: National Gallery of Art



Gordon Parks, 1942. Washington, D.C. Government Charwoman (*American Gothic*).

Source: National Gallery of Art



Dorothea Lange, 1936. Migrant Mother.
Source: Wikimedia, original in MOMA NY



Source: Wikimedia



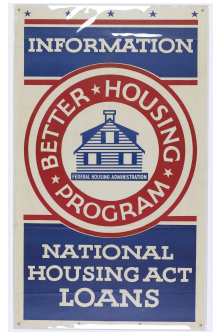
Source: Wikimedia



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Source: Wikimedia



Source: Smithsonian

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The agency **rates neighborhoods**

- ▶ A (most desirable)
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- ▶ C (declining)
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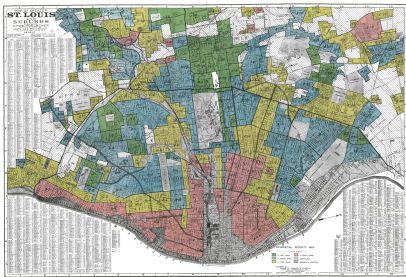
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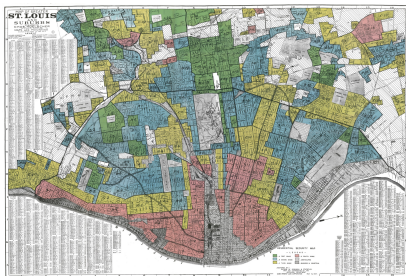
Black families → D grade

Jackson, Kenneth T. [Crabgrass frontier: The suburbanization of the United States](#). Oxford University Press, 1987.



St. Louis

94,030 African Americans

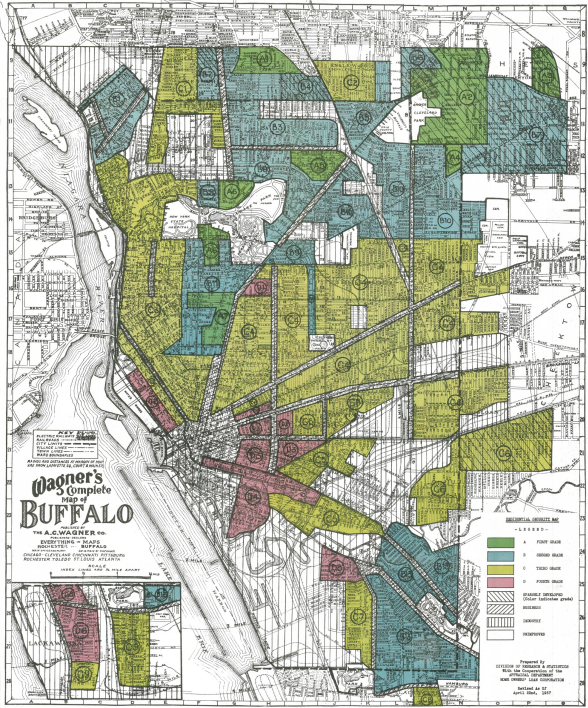


St. Louis

94,030 African Americans

0 outside of red areas

Faber 2020, citing Jackson 1985



NEW YORK
 100 N. W. COR. OF 4TH & 5TH STS.
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Wagner's
Complete
 MAP of
BUFFALO

THE A.C. WAGNER CO.

EVERYTHING IN MAPS
 INDICATED BY BUFFALO
 CHURCH - CIVIL AND COMMONS DISTRICTS
 INCLUDING TOWNSHIP 17-18-19

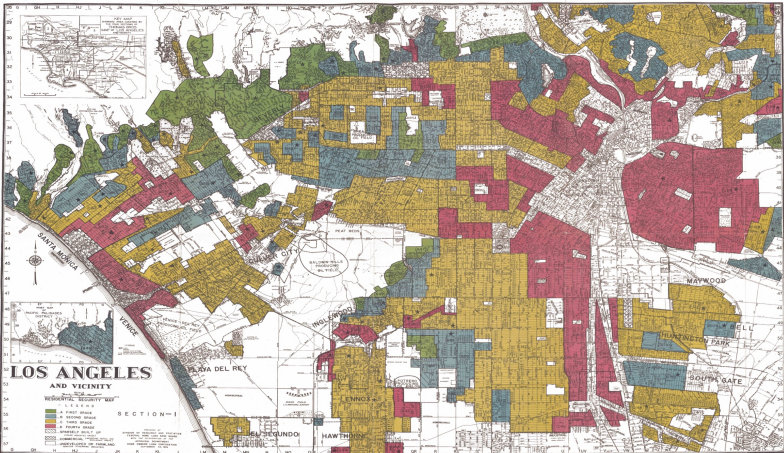
SCALE 1 INCH TO 1 MILE



LEGEND

- A FIRE DRAIN
- B FIRE DRAIN
- C FIRE DRAIN
- D FIRE DRAIN
- E FIRE DRAIN
- DOUBLE LOTS (Color indicates grade)
- UNIMPROVED
- UNIMPROVED
- UNIMPROVED
- UNIMPROVED

Prepared by
 GEORGE W. FORD & COMPANY
 With the Cooperation of the
 OFFICIAL ENGINEER
 NEW YORK - LAW CORPORATION
 Buffalo, N. Y.
 April 10th, 1917



SECTION 1 ATTACHED HERE

HOLC loans: 1933–1934

Source: Faber 2020

\$3 billion of loans in two years

1 out of 10 non-farm, owner-occupied home

1950s and 1960s: Suburbs boomed

[[image source](#)]



1950s and 1960s: Suburbs boomed

[[image source](#)]



HOLC ended

1950s and 1960s: Suburbs boomed

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HOLC ended

but the Federal
Housing Administration
maintained the
mapping policy

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How did communities
and homeowners respond?

Local organizations furthered racist policies

BLUE RIDGE

PIQUET SOUND
Elliott Bay
SEATTLE'S Distinctive RESIDENTIAL PARK

BLUE RIDGE

NOT A SUBDIVISION - BUT A COMMUNITY
View homesites in Blue Ridge are priced from \$1000.00 including city water in cast iron mains and complete sewer system to each tract. Conventional terms.

HUGH RUSSELL
Sales Agent
OFFICE: 921 17th AVENUE N.W.
CORNER W. 10TH AND 17th N.W.
TELEPHONE: DUWIGHT 9000, SEATTLE, WASH.

* SEATTLE'S DISTINCTIVE RESIDENTIAL PARK... EVERY HOMESITE A BEAUTY SPOT

BLUE RIDGE
A BEAUTIFUL PLACE TO BUILD AND OWN
YOUR HOME

Source: Blue Ridge Seattle

Local organizations furthered racist policies

16. **RACIAL RESTRICTIONS.** No property in said Addition shall at any time be sold, conveyed, rented or leased in whole or in part to any person or persons not of the White or Caucasian race. No person other than one of the White or Caucasian race shall be permitted to occupy any property in said Addition or portion thereof or building thereon except a domestic servant actually employed by a person of the White or Caucasian race where the latter is an occupant of such property.

17. **ANIMALS.** No fowl or animal other than song birds, dogs or cats as household pets, shall at any time be kept upon land embraced in this Addition.

18. **AMENDMENTS.** The owner or owners of the legal title to not less than 300 residence lots in said Addition may at any time by an instrument in writing duly signed and acknowledged by said owner or owners, terminate or amend said Mutual Easements of Blue Ridge Addition, and such termination or amend-

Source: Civil Rights and Labor History Consortium, University of Washington

Fair Housing Act (1968)

[image source](#), [video](#)



Fair Housing Act (1968)

- ▶ enforcement was difficult ([video](#))

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Fair Housing Act (1968)

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 - ▶ white families had gotten that through past home ownership
 - ▶ Black families had not

Segregation and racial inequality
rooted in the 1930s
persists today

data science (example 1)

Did HOLC maps cause neighborhoods to become more segregated?

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American Sociological Review

Volume 85, Issue 5, October 2020, Pages 739-775

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<https://doi.org/10.1177/0003122420948464>



Article

We Built This: Consequences of New Deal Era Intervention in America's Racial Geography

Jacob W. Faber 

Some places were graded by HOLC. Others were not

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- ▶ Policy: Maps required for cities over 40,000 in population

Some places were graded by HOLC. Others were not

- ▶ Policy: Maps required for cities over 40,000 in population
- ▶ Practice
 - ▶ 31 cities over 40k that were not mapped
 - ▶ 188 cities under 40k that were mapped

Measuring segregation

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Within each place, there are Census tracts.

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Isolation index

On average over African American residents in the place, what is the average proportion of people in their Census tract who are African American?

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Isolation index

On average over African American residents in the place, what is the average proportion of people in their Census tract who are African American?

- ▶ 100% would be complete segregation

The effect of policy on segregation

Data

Predictors

place	year	ever graded by HOLC?
1	1930	yes
1	1950	yes
2	1930	no
2	1950	no
3	1930	yes
3	1950	yes

Outcome

isolation index

Unit of Analysis

place \times year



The effect of policy on segregation

Sample restrictions

- ▶ place observed in 1920 or 1930, before HOLC
- ▶ Black population over 100
- ▶ at least two Census tracts within the place
- ▶ not missing values on covariates

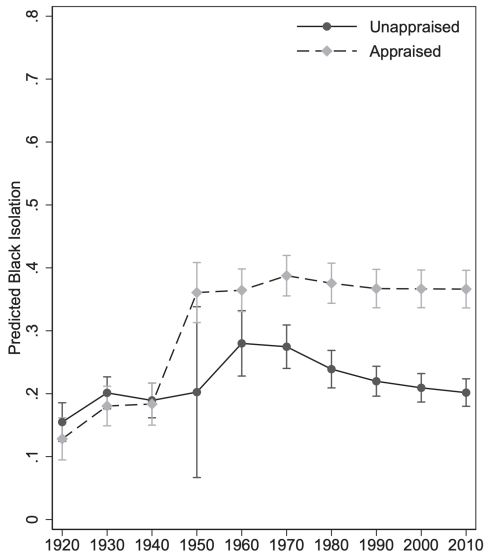


Figure 1 from Faber, J. W. 2020. [We built this: Consequences of New Deal era intervention in America's racial geography](#). *American Sociological Review*, 85(5), 739-775.

data science (example 2)

Racial Wealth Gap

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In the suburbs,

Racial Wealth Gap

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In the suburbs,

- ▶ Home ownership skyrockets
 - ▶ 44% owned their home in 1940
 - ▶ 62% in 1960

National estimates
from U.S. Census

Racial Wealth Gap

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Oliver, M., & Shapiro, T. (2013). [Black wealth/white wealth: A new perspective on racial inequality](#). Routledge.

Racial Wealth Gap

2022 Survey of Consumer Finances

<https://sda.berkeley.edu/sdaweb/analysis/?dataset=scfcomb2022>

SDA [Help](#) Accessibility mode **Study: SCF Combined Extract Data**

Analysis Create Variables Download Custom Subset Search [Codebook](#) [FAQ](#) [Net Worth Flowchart](#)

Variable Selection

Selected: HLIQ

Copy to:

Mode

Append Replace

- ▶ TECHNICAL
- ▶ DEMOGRAPHICS
- ▶ ASSETS
- ▶ DEBTS
- ▶ RATIOS
- ▶ DEBT PAYMENTS
- ▶ SHOPPING PATTERNS
- ▶ ATTITUDINAL
- ▶ INCOME
- ▶ CAPITAL GAINS
- ▶ NETWORTH
- ▶ EXPENDITURES
- ▶ HYPOTHETICAL FINANCIAL EMERGENCY RESPONSES

SDA Frequencies/Crosstabulation Program

Help: [General](#) / [Recoding Variables](#)

Row: (Required)

Column:

Control:

Selection Filter(s):

Weight: WGT - Sample weight

▶ Output Options

▶ Chart Options

▶ Decimal Options

▶ Create and Download CSV File

Racial Wealth Gap

2022 Survey of Consumer Finances ([link](#))

- ▶ unit of analysis: household
- ▶ predictor: race
- ▶ outcome: net worth = assets - debts
- ▶ summarized by the median

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White households: \$272,000

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White households: \$272,000

Black households: \$49,590

Ratio: 5.48

The typical White household has \$5.48 for each \$1 held by the typical Black household

Additional resources

- ▶ Oliver, M., & Shapiro, T. 2013. [Black wealth / white wealth: A new perspective on racial inequality](#). Routledge.
- ▶ Faber, J. W. 2020. [We built this: Consequences of New Deal era intervention in America's racial geography](#). *American Sociological Review*, 85(5), 739-775.
- ▶ Massey, D. S., & Denton, N. A. 1993. [American apartheid: Segregation and the making of the underclass](#). Harvard University Press.
- ▶ Killewald, A., Pfeffer, F. T., & Schachner, J. N. 2017. [Wealth inequality and accumulation](#). *Annual Review of Sociology*, 43, 379.

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