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Top Influencers

The Bureau of Economic Analysis (BEA) and its journal, the *Survey of Current Business*, are respected sources of data on the health of our national economy due in large part to the individuals who influenced BEA and its predecessor agencies over the past century. From economic theory to the mechanics of producing reliable statistics, their contributions helped make BEA and its accounts the reliable, authoritative sources of economic data they are today. The *Survey* has chronicled the evolution of BEA's output for almost a century.

As we have celebrated the centennial of the *Survey* over the past year, some of these top influencers have been profiled on the centennial website. This month, we conclude this series with profiles on economists [Dale Jorgenson](#) and, presented here, **Selma Fine Goldsmith**.

Selma Fine Goldsmith

Trailblazer in Income Distribution Research

By Mary-Lynne Neil

Today's Bureau of Economic Analysis (BEA) is a reflection of its predecessor agencies, the brilliant minds who have contributed to its mission, and the determination of its leaders to provide accurate, timely, informative, and unbiased statistics for our nation's policymakers. As we wind down our celebration of the centennial of BEA's flagship journal, the *Survey of Current Business*, it is remarkable to look back at the many people who helped advance the work of BEA and its predecessor agencies, including Nobel Prize winners, trailblazing women economists, dedicated BEA staff, renowned academics, and many others. Some of BEA's "top influencers" are profiled in the *Survey*'s [centennial pages](#).

Economic statistician Selma Goldsmith is recognized as a top influencer on BEA's legacy for her contributions to the U.S. National Economic Accounts, the originality of her research on the size distribution of income in the United States, and her creative approaches to addressing data shortcomings.

Selma Goldsmith (née Fine) was born in 1912 in New York City. She attended Cornell University, where she graduated (Phi Beta Kappa) with a B.A. degree in 1932. Goldsmith then attended Harvard University, where she received her doctorate from Radcliffe in 1936.¹ Her doctoral dissertation focused on business cycles in 17th- and 18th-century England.

Goldsmith's early career began at the U.S. Department of Agriculture, followed by the Natural Resources Planning Board,² where she worked on income data; this work led to her first major publication on the use of income tax data.³ During this time period, she married Yale economist

Raymond W. Goldsmith, with whom she had three children. A subsequent career move led her to the National Income Division in the Office of Business Economics (OBE) at the Department of Commerce, where she became chief of the Income Division.

In the 1950s, Goldsmith published a series of groundbreaking articles on income inequality, focusing on the size distribution of income, changes to the distribution over time, and the causes of these changes. An article from 1950, "Statistical Information on the Distribution of Income by Size in the United States,"⁴ is a clear example of her original and creative approach with data.

In this article, Goldsmith looked at data from a 15-year period, based on surveys from 1935–1948, to analyze the inequality of family income distribution. She encountered many problems as she began her research. First, the data she gathered were based on small survey samples. These surveys lacked standard definitions of the variables. Additionally, they were not consistent sources of information. The main sources of her data were the Consumer Purchases Study (1935–1936 data), a survey by the Bureau of Labor Statistics jointly with the Bureau of Human Nutrition and Home Economics⁵ (1941 data), the Census Bureau (1944–1948 data), and the Federal Reserve Board in conjunction with the Michigan Survey Research Center (1945–1948 data).

Goldsmith devised creative and technically rigorous solutions to identify usable data from these sources. One of her major concerns about the data was the overall underestimation of income due to differences in the definitions of income and income units (for example, family or individual), which could create biases. She compared her estimates to other estimates, including some by [Simon Kuznets](#). She pointed out the need for more complete and standardized national surveys.

A year later, in 1951, Goldsmith's chapter, "Appraisal of Basic Data Available for Constructing Income Size Distributions," was published in a volume by the National Bureau of Economic Research.⁶ In this analysis, Goldsmith used five main sources for the statistics: 1) field surveys; 2) federal tax returns filed with the Bureau of Internal Revenue; 3) information on workers with wage credits at the Bureau of Old-Age and Survivors Insurance; 4) estimates of aggregate income, by source, prepared by the National Income Division of OBE at the U.S. Department of Commerce; and 5) estimates of total population by families and individuals from the Census Bureau. Additional subsidiary sources were also used.

Goldsmith desired a time series on the size distribution of consumer income that would be reliable, comparable from year to year, and consistent with national income estimates and their components. She adjusted the data from the sources for conceptual differences, further advancing the nation's statistical databases. This 113-page chapter concludes with comments from Stanley Lebergott of the Bureau of the Budget. He stated, "We owe a debt of gratitude to Mrs. Goldsmith for carrying through this task and not merely labeling it 'needed further research in the field.'" He added that thanks to her work, the United States had a valuable collection of survey data.

The results of Goldsmith's efforts are multifaceted. She not only came up with estimates of the size distribution of income, she did so while advocating for better source data and by creating a usable database of statistics. Her estimates acted as a control for estimates of the size distribution of income from other sources. Numerous other publications followed. Goldsmith continued to publish many articles on income distribution and inequality and refined the statistics and methodology she used. It is a testament to her accomplishments and foresight that 70 years later, BEA would again be continuing her pathbreaking work to create a distribution of personal income.⁷

Goldsmith received recognition for her contributions from the Department of Commerce in 1955 when it awarded her the Distinguished Service Award for the originality of her work. Her impressive scholarship resulted in “a Rockefeller public service award to study the methodology used in developing estimates of the size distribution of income in Great Britain and Canada.”⁸

Selma Goldsmith's last professional position was chief of the Income and Statistics Branch of the Census Bureau. Her career was cut short by cancer in 1961. She was 50 years old.

Bibliography

Cicarelli, James, and Julianne Cicarelli. *Distinguished Women Economists*. Westport, CT: Greenwood Press, 2003.

Conference on Research in Income and Wealth. “Appraisal of Basic Data Available for Constructing Income Size Distributions.” In *Studies in Income and Wealth, Volume 13*, 373–377. New York: National Bureau of Economic Research, Inc., 1951.

Kapuria-Foreman, Vibha. “Selma Evelyn Fine Goldsmith.” In *A Biographical Dictionary of Women Economists*, edited by Robert W. Dimand, Mary Ann Dimand, and Evelyn L. Forget. Cheltenham, United Kingdom: Edward Elgar Publishing, 2000.

National Bureau of Economic Research. *Fifty Years of Economic Measurement: The Jubilee of the Conference on Research in Income and Wealth, Studies in Income and Wealth Volume 54*, edited by Ernst R. Berndt and Jack E. Triplett. Chicago: University of Chicago Press, for the National Bureau of Economic Research, 1990.

Selected Articles by Selma Fine Goldsmith

- 1939. “The Use of Income Tax Data in the National Resources Committee Estimate of the Distribution of Income by Size,” (with Enid Baird), *Studies in Income and Wealth* 3.
- 1950. “Statistical Information on the Distribution of Income by Size,” *American Economic Review* 40.
- 1951. “Appraisal of Basic Data Available for Constructing Income Size Distributions,” *Studies in Income and Wealth* 13.
- 1953. “Income Distribution in the United States by Size, 1944–50,” (with George Jaszi), Supplement to the *Survey of Current Business*.
- 1954. “Size Distribution of Income Since the Mid-Thirties,” (with George Jaszi, Hyman Kaitz, and Maurice Liebenberg), *Review of Economics and Statistics* 34.
- 1954. “Inequality of Income Distribution—Discussion,” *American Economic Review* 44.
- 1956. “Reply to Dr. Clyman,” *Review of Economics and Statistics* 38.
- 1957. “Changes in the Size Distribution of Income,” *American Economic Review* 47.
- 1958. “Size Distribution of Personal Income,” *Survey of Current Business* 38.
- 1958. “The Relation of Census Income Distribution Statistics to Other Income Data, An Appraisal of the 1950 Census Income Data,” *Studies in Income and Wealth* 23.
- 1960. “Size Distribution of Income and Wealth in the United States,” in Arndt, Helmut (ed.), *Die Konzentration in der Wirtschaft*.
- 1962. “Low-Income Families and Measures of Income Inequality,” *Review of Social Economy* 20.

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1. At that time, women attending Harvard University received their doctorates from Radcliffe College, one of Harvard's affiliated institutions. [Nancy Ruggles](#), another BEA top influencer, also received her doctorate from Radcliffe.
 2. For information about the National Resources Planning Board, see [Encyclopedia.com](#).
 3. Conference on Research in Income and Wealth, "The Use of Income Tax Data in the National Resources Committee Estimate of the Distribution of Income by Size," in *Studies in Income and Wealth, Volume 3* (New York: National Bureau of Economic Research, Inc., 1939): 147–214.
 4. Selma F. Goldsmith, "Statistical Information on the Distribution of Income by Size in the United States," *American Economic Review* 40 (May 1950): 321–341.
 5. For more information on the Bureau of Human Nutrition and Home Economics, see the U.S. Department of Agriculture [website](#).
 6. Conference on Research in Income and Wealth, "Appraisal of Basic Data Available for Constructing Income Size Distributions," in *Studies in Income and Wealth, Volume 13* (New York: National Bureau of Economic Research, Inc., 1951): 266–377.
 7. Dennis Fixler, Marina Gindelsky, and David Johnson, "[Measuring Inequality in the National Accounts](#)" (working paper WP2020-3, Bureau of Economic Analysis, December 2020).
 8. James Cicarelli and Julianne Cicarelli, *Distinguished Women Economists* (Westport, CT: Greenwood Press, 2003).

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