Econometrics is a branch of economics that specializes in the study of quantitative relationships between economic variables. It involves the use of mathematical models to express economic theory and then testing these models empirically through statistical research. Econometrics aims to develop accurate economic forecasting models and make possible successful policy planning.

The term econometrics is generally attributed to Norwegian economist Ragnar Frisch, who wrote important studies on the subject in the mid-20th century. Frisch founded the Econometric Society.

In the 1930s, econometrics emerged as an important method of economic study on a national level, as part of a broader field called macroeconomics. In the 1950s, economists such as Lawrence Klein applied Keynesian principles to econometrics and formed macroeconometric models of the economy of the United States. Scholars, economists, and public officials followed Klein's lead and began to use large-scale econometric models in both historical and planning analyses.

With changes in the 1970s from fixed to floating exchange rates and inflation heavily influencing the economy, criticism of econometrics grew considerably. The accuracy of econometric models was also questioned given their failure to predict, for example, the Asian financial failures in 1997–98. In the late 1990s, econometrics began to be used in advertising, where it is also called “market-mix modeling”, in which the models measure and predict sales performance. Econometrics has been significantly aided by advances in computer technology.

See Epstein, R. J., A History of Econometrics (1986);
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