

# IN APPRECIATION

## JOHN V. KRUTILLA, 1922–2003



**R**esources for the Future (RFF) recently bid a sad farewell to one of its founding fathers—one of the creators of the modern theory of resource conservation—John V. Krutilla.

Friends and colleagues remember Krutilla as a wise and vigorous man, who passionately loved nature and the study of economics. The impact of Krutilla’s theories on environmental preservation and economics can hardly be overstated. With the publication of his landmark research paper, “Conservation Reconsidered” (*American Economic Review*, Vol. 67, 1967), Krutilla laid the intellectual cornerstone of what today is an international discipline that is central to the assessment and protection of the environment. Over the course of his career, he fundamentally altered the global debate regarding comparisons and choices—both private and public—about the varied uses for undisturbed wild rivers, species, and other natural resources.

Instrumental in establishing the Association of Environmental and Resource Economists (AERE) in 1979, Krutilla received a Ph.D. in Economics from Harvard University in 1952 and an Honorary Doctor of Laws degree from Reed College. He was a central figure at RFF from 1955 through 1988 and served as the president of AERE in 1980. He received the association’s Presidential Citation

in 1981 and the association’s Distinguished Service Award in 1987. He was awarded (along with Allen Kneese) the inaugural Volvo Environment Prize in 1990.

### Innovative Thinker

Krutilla broke new ground by proposing that natural resources have economic values, even when left undisturbed. This idea was contrary to popular thinking at the time, which focused only on the value of goods and services drawn from the natural environment if developed. Krutilla, for the first time, defined an approach to measuring the economic value of undisturbed natural environments.

Krutilla identified undisturbed natural environments as natural assets and defined an approach to measuring their economic value. In an important additional insight, he recognized that the possibility of irreversible changes to these natural resources as a result of actions taken by man—for example, the permanent removal of a wetland as a result of a housing development—required a new approach to economic analysis. In situations where the resources were unique and where there was some chance that society would not appreciate their full value at the time the decisions were made, his framework suggested that conventional practice had to be amended.

# *Putting economics to work on environmental issues is not so hard, once you see that it can be done, and how to get started. That was John Krutilla's key insight and great achievement.*

ROBERT M. SOLOW

Krutilla's theories transformed environmental policy analysis. They not only provided a sound economic basis for including preservation benefits as legitimate components of the policy calculus, they also defined the research agenda for a generation of environmental economists.

## **Prized Colleague**

Krutilla's influence was, in large part, the result of the infectious quality of his ideas. He collaborated with, and was greatly admired by, a number of the nation's leading economists. Kenneth Arrow, Nobel Laureate in Economics and Professor of Economics, Emeritus, at Stanford University, describes Krutilla as a pioneer. "The strength and staying power of his work is due both to its firm grounding in economic theory and to its recognition that the problems of the environment require creativity in economic analysis," Arrow said.

Another of the profession's leading lights, Robert M. Solow, Nobel Laureate in Economics and the Institute Professor of Economics, Emeritus, at the Massachusetts Institute of Technology, believes Krutilla's contributions to natural resource economics stemmed from his unusual passion for both economics and nature, combined with a clear vision. "Putting economics to work on environmental issues is not so hard, once

you see that it can be done, and how to get started," Solow said. "That was John Krutilla's key insight and great achievement. His 1967 article had such tremendous leverage because it showed economists how to think about natural assets, and apply what they knew in this important new context. That was the work of someone who understood economics deeply, and loved nature deeply. We, and not only we, are all in his debt."

Scholars at RFF were greatly influenced by Krutilla's research during the more than three decades he worked at the organization. "Those who care about the environment and see it as a public resource owe an immense debt of gratitude to John Krutilla for teaching us how to think about the economics of resource conservation," said Paul Portney, president of RFF. "Nearly all modern discussions about the value of preserving wilderness areas have their intellectual roots in Krutilla's writings. His ideas provide an irreversible legacy for the theory and the practice of resource and environmental policy."

## **Mentor to Many**

A supportive and insightful advisor, Krutilla nurtured many of the first generation of environmental economists. Charles Cicchetti, V. Kerry Smith, Gardner Brown, Anthony Fisher, A. Myrick Freeman III, and Robert Haveman,

among many others, all acknowledge that it was Krutilla's work and his subsequent encouragement at early stages in their careers that transformed their views about the domain and power of economic analysis. Those fortunate enough to have been part of his research program also joined his professional family.

## **A Lasting Legacy**

V. Kerry Smith, University Distinguished Professor, North Carolina State University, describes his late colleague's ideas as powerful forces in the development of both the theory and the practice of resource and environmental economics. "Philosophers remind us that intellectual life is a conversation linking the present to both past scholars and those to come," Smith said. "Sometimes it is a crowded field with many competing conversations. The power of some people's ideas captures the attention of their generation and those to come. This was certainly the case for John Krutilla. His work will remain a continuing part of all the important conversations about resource conservation and the human condition for the foreseeable future." ■

*For more information on John Krutilla's life and lasting contributions to the field of resource economics, visit [www.rff.org/johnkrutilla.htm](http://www.rff.org/johnkrutilla.htm).*