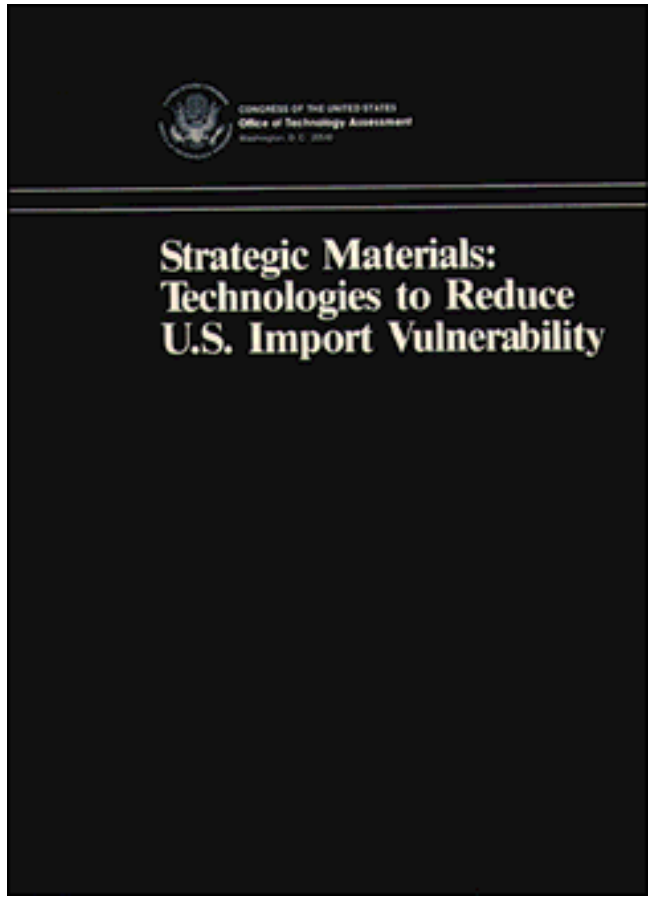
Strategic Materials: Technologies To Reduce U.S. Import Vulnerability

May 1985

NTIS order #PB86-115367



Recommended Citation:

Strategic Materials: Technologies to Reduce U.S. Import Vulnerability (Washington, DC: U.S. Congress, Office of Technology Assessment, OTA-ITE-248, May 1985).

Library of Congress Catalog Card Number 84-601153

For sale by the Superintendent of Documents
U.S. Government Printing Office, Washington, DC *20402*

Foreword

This report presents the findings of OTA's assessment of *Strategic Materials: Technologies to Reduce U.S. Import Vulnerability*. The study was requested by the House Committee on Science and Technology and the Senate Committee on Commerce, Science, and Transportation.

The United States imports well over *$1* billion worth of chromium, cobalt, manganese, and platinum group metals annually. Many of the uses of these metals are essential to the industrial economy and the national defense. The United States imports virtually all of its requirements for these metals; their production is highly concentrated in two regions of the world: the Soviet Union and southern Africa. The potential for interruption of supplies from these sources has heightened congressional interest in alternatives to continued import dependence,

This study assesses the technical alternatives to continued reliance on southern Africa and the U.S.S.R, for strategic metals. Promising opportunities for domestic and diversified foreign production and for conservation and substitution are identified for each metal. Technical, economic, and institutional barriers to the implementation of the alternatives are reviewed and governmental options to overcome those barriers are identified and analyzed.

We are grateful for the assistance of the project advisory panel, workshop participants, contractors, and the advice of many government agencies in the United States and Canada. As with all of our studies, however, the content of the report is the sole responsibility of the Office of Technology Assessment.

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Acknowledgments

OTA also wishes to acknowledge the contributions and cooperation of' the following agencies and organizations:

Allison Division, General Motors Corp.
Amax, Inc.
American Society for Metals
Automotive Dismantles & Recyclers Association
The Broken Hill Proprietary Co., Ltd.
Elkem ,Metals Co.
The Ferroalloy Association
Garrett Turbine Engine Co.
General Electric Co.
Interlake, Inc.
  Globe Metallurgical Division
Government of Canada
  Energy, Mines and Resources Canada
  National Defence College
Gulf Chemical & Metallurgical Co.
GTE Corp.
Hal] Chemical
Inco, Ltd.
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Metal Properties Council, Inc.
National Science Foundation
National Materials Advisory Board
North Atlantic Treaty Organization
  Advisory Group for Aerospace Research and Development
Oak Ridge National Laboratory
Pratt & Whitney Aircraft Co.
Union Carbide
U.S. Congress
  Congressional Research Service
  General Accounting Office
U.S. Department of Commerce
  International Trade Administration
  National Bureau of Standards
U.S. Department of Defense
  Office of the Secretary
  U.S. Air Force
  Army Materials and Mechanics Research Center
U.S. Department of Energy
U.S. Department of the Interior
  Bureau of Mines
  Geological Survey

In addition, OTA wishes to express its appreciation to the many individuals, organizations, and companies who acted as reviewers for all or part of this report.