New Developments in Biotechnology: Patenting Life—Special Report

April 1989

NTIS order #PB89-196612

New Developments in Biotechnology









Patenting Life



Recommended Citation:

U.S. Congress, Office of Technology Assessment, New *Developments in Biotechnology: Patenting Life--Special Report, OTA-BA-370* (Washington, DC: U.S. Government Printing Office, April 1989).

Library of Congress Catalog Card Number 88-600596

For sale by the Superintendent of Documents U.S. Government Printing Office, Washington, DC 20402-9325 (order form can be found in the back of this report.)

Foreword

Since the discovery of recombinant DNA technology in the early 1970s, biotechnology has become an essential tool for many researchers and industries. The potential of biotechnology has spurred the creative genius of inventors seeking to improve the Nation's health, food supply, and environment. In 1980, the Supreme Court ruled that a living micro-organism could be patented. Subsequently, the U.S. Patent and Trademark Office held that certain types of plant and animal life constituted patentable subject matter.

This special report is the fifth in a series of OTA studies being carried out under an assessment of "New Developments in Biotechnology," requested by the House Committee on Energy and Commerce and the House Committee on Science, Space, and Technology. This report reviews U.S. patent law as it relates to the patentability of micro-organisms, cells, plants, and animals; as well as specific areas of concern, including deposit requirements and international considerations. The report includes a range of options for congressional action related to the patenting of animals, intellectual property protection for plants, and enablement of patents involving biological material.

The first publication in OTA's assessment of "New Developments in Biotechnology" was *Ownership of Human Tissues and Cells*, the second was *Public Perceptions of Biotechnology*, the third was *Field-Testing Engineered Organisms*, and the fourth was *U.S. Investment in Biotechnology*. OTA was assisted in preparing this study by a panel of advisors, a workshop group, and reviewers selected for their expertise and diverse points of view on the issues covered by the assessment. OTA gratefully acknowledges the contribution of each of these individuals. As with all OTA reports, responsibility for the content of the special report is OTA's alone. The special report does not necessarily constitute the consensus or endorsement of the advisory panel, the workshop group, or the Technology Assessment Board.

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NOTE: OTA is grateful for the valuable assistance and thoughtful critiques provided by the Advisory Panel members. The views expressed in this OTA report, however, are the sole responsibility of the Office of Technology Assessment.

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Through January 1989.

²Through May 1988.