

## **MILDRED K. CHO**

Mildred Cho (American) is a Senior Research Scholar at the Stanford University Center for Biomedical Ethics. She received her B.S. in Biology in 1984 from the Massachusetts Institute of Technology and her Ph.D. in 1992 from the Stanford University Department of Pharmacology. Her post-doctoral training was in Health Policy as a Pew Fellow at the Institute for Health Policy Studies at the University of California, San Francisco and at the Palo Alto VA Center for Health Care Evaluation. Before coming to Stanford, Dr. Cho was Assistant Professor of Bioethics in the Center for Bioethics and the Department of Molecular and Cellular Engineering at the University of Pennsylvania School of Medicine.

Mildred's major areas of interest are the ethical and social impacts of genetic testing and gene therapy, and how conflicts of interest affect the conduct of academic biomedical research. Her current research projects include: a study of factors affecting patients' and practitioners' use of genetic tests for hereditary breast and ovarian cancer, a study of the roles of heredity and race or ethnicity in the stigmatisation of genetic conditions, ethical issues in pharmacogenetics, a study of the effect of gene patenting on the delivery of clinical genetics services, and an analysis of university policies on academic-industry ties.

## **IMPACTS OF PATENTS ON PROVISION OF CLINICAL GENETIC TESTING SERVICES**

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The growth of patents that include genetic sequences has been accompanied by concern about their impact on the ability of physicians to provide clinical genetic testing services and perform research. Therefore, we conducted a survey of clinical laboratory directors that perform DNA-based genetic tests in order to examine these impacts. We conducted a telephone survey between July and September 2001 of all laboratory directors in the United States who were members of the Association for Molecular Pathology (AMP) or who were listed on the GeneTests.org website.

132/211 (63%) laboratory directors responded. Ten of these were excluded because they did not conduct DNA-based genetic tests. Almost all performed genetic tests for clinical purposes. Half performed tests for research purposes as well. 25% of respondents reported that they had stopped performing a clinical genetic test because of a patent or license. 53% of respondents reported deciding not to develop a new clinical genetic test because of a patent or license. Virtually no respondents felt that the effects of patents on the cost, access, and development of genetic tests had been positive. In contrast, most respondents felt that patents did not have an effect on the quality of testing. We conclude that patents and licenses have had a significant effect on the ability of clinical laboratories to continue to provide and develop genetic tests. Furthermore, our findings suggest that clinical geneticists feel that their research is inhibited by patents and licenses.