

Israel Academy of Sciences and Humanities

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Science Policy

The Israel Academy is a national leader in defining Israel's scientific needs and ensuring their appropriate national coordination and funding.

Many Academy initiatives, such as those related to synchrotron radiation, the CERN Large Hadron Collider, nanotechnology, clinical research and the Human Genome Project, have been ad hoc responses to perceived national research needs. Others have resulted in major new national initiatives and organizations, such as the ISF, FIRST, TELEM and the NCRD.

The former often lead to the latter. For example, the Academy's seminal analysis of Israel's basic research needs and its Masterplan for Basic Research were presented to the government of Israel in 1986. Both won the support of the Planning and Budgeting Committee (PBC) of the Israel Council for Higher Education, the Charles H. Revson Foundation, and other partners, and eventually led to the formation of today's [Israel Science Foundation](#)

As part of its mandate "to advise the government on activities related to research and scientific planning of national significance," the Israel Academy convenes a wide variety of specialized committees to provide expert advice and guidance on contemporary issues involving science and technology. Examples include the Academy's [Bioethics Advisory Committee](#) (which issued influential guidelines for human stem-cell research), National Nanotechnology Committee (which resulted in today's \$45 million Israel National Nanotechnology Initiative), and [Committee for Applied Research in Education](#). In 2004 the Israel government formed a 13-person committee, chaired by the Academy's president, Prof. Menahem Yaari, to assess the operation of its new Welfare-to-Work (MEHALEV) program. A joint study of bioterror and dual-use research (with the Israel National Security Council) has made several important recommendations for preventing abuse without compromising academic freedom. A new Israel Research Council (IRC) is being formed to systematize the Academy's science-based advice to the Israeli government and other public institutions.

The Academy actively participates in the international dialogue on contemporary science policy issues, hosting major conferences for world science leaders on post-Cold War science (1994), the future of the research university (1999), and the national academy-government-society relationship (2004). At the latter, present and former presidents of the U.S. National Academies of Sciences (NAS), the Academy of France, the Swedish and Dutch National Academies, and the European Federation of National Academies of Science (ALLEA), reiterated the crucial role of academic independence in ensuring that science can properly contribute to major national goals.

The Academy also sponsors smaller meetings and day-long seminars on topics of importance to Israeli science policy. Periodic meetings of the Academy's informal, high-level Dead Sea Working Group (DSWG) bring together senior Israeli scientists and science administrators in a relaxed setting to discuss major issues in contemporary science policy and their implications for Israel's future. DSWG-inspired initiatives include a study of the changing industry-academia relationship and the establishment of a Forum on the Future of the Humanities in Israel's Research Universities. A special Academy committee has been formed to monitor the implementation of the Forum's final report. The Academy also provides a panel of advisors to the [Batsheva de Rothschild Fund](#), chaired by the Academy's President, Prof. Menahem Yaari. The fund supports seminars, interdisciplinary workshops and visiting

scientists to initiate highly targeted, innovative pilot projects which address critical Israeli needs in the natural sciences

Finally, the Israel Academy undertakes assessments of individual scientific fields in Israel and studies of broader science policy issues, often making specific recommendations for the future. [Astronomy](#), astrophysics, [immunology, the neurosciences](#), and [history](#) have been topics of previous analyses. More recently, the Charles H. Revson Foundation (USA) generously supported the Israel Academy's efforts to carry out a comprehensive [Assessment of the State of Biomedical Research in Israel: Its Current Support and Future Needs](#). One of their major recommendations was to establish an Israeli equivalent of the U.S. National Institutes of Health. An Eli and Marilyn Goldfarb grant, funded by prominent U.S. molecular biologist Prof. David S. Goldfarb in honor of his parents, is supporting a separate status report on Israeli clinical research

An analysis of Israeli scientific cooperation with the U.S. and Europe has revealed major geographical shifts over the past two decades, partly due to major new inputs from Israeli (ISF) and European (FP) competitive-funding sources. European contributions to Israeli competitive research, only half the U.S. total in 1995, were over twice the U.S. total by 2002. Within Europe, Israeli researchers collaborate most with Europe's largest countries (Germany, U.K., France, and Italy). However, on a per capita basis, Israel's most intense scientific relationships are with Europe's other small, technologically advanced countries (Switzerland, Denmark, the Netherlands and Belgium).