



Recommendation 934 (1982)¹

Genetic engineering

Parliamentary Assembly

The Assembly,

1. Aware of public concern about the use of new scientific techniques for artificially recombining genetic material from living organisms, referred to as "genetic engineering" ;
2. Considering that these concerns fall into two distinct categories :
 - those arising from uncertainty as to the health, safety and environmental implications of experimental research ;*
 - those arising from the longer-term legal, social and ethical issues raised by the prospect of knowing and interfering with a person's inheritable genetic pattern ;*
3. Having regard, in respect of the health, safety and environmental implications of experimental research, to the following considerations :
 - 3.1. the techniques of genetic engineering present an immense industrial and agricultural potential which in coming decades could help to solve world problems of food production, energy and raw materials ;
 - 3.2. radical breakthroughs in scientific and medical understanding (university of the genetic code) are associated with the discovery and development of these techniques ;
 - 3.3. freedom of scientific enquiry- a basic value of our societies and a condition of their adaptability to the changing world environment- carries with it duties and responsibilities, notably in regard to the health and safety of the general public and of fellow scientific workers and to the non-contamination of the environment ;
 - 3.4. in the light of the then existing scientific knowledge and experience, uncertainties about the health, safety and environmental implications of experiments in genetic engineering were a legitimate cause for concern in the early 1970s- to the point of giving rise to requests, at that time, from within the scientific community, for certain types of experiment not to be made ;
 - 3.5. in the light of new scientific knowledge and experience, uncertainties in regard to experimental research have in recent years been largely clarified and resolved- to the point of allowing substantial relaxation of the control and containment measures initially instituted or envisaged ;
 - 3.6. strict and comparable levels of protection should be provided in all countries for the general public and for laboratory workers against risks involved in the handling of pathogenic microorganisms in general, irrespective of whether techniques of genetic engineering are used ;

1. Assembly debate on 26 January 1982 (21st and 22nd Sittings) (see [Doc. 4832](#) and [Doc. 4833](#), reports of the Legal Affairs Committee, and of the Committee on Science and Technology). Text adopted by the Assembly on 26 January 1982 (22nd Sitting).



4. Having regard, in respect of the legal, social and ethical issues, to the following considerations inspired by the Council of Europe's 7th Public Parliamentary Hearing (Copenhagen, 25 and 26 May 1981) on genetic engineering and human rights :
 - a. the rights to life and to human dignity protected by Articles 2 and 3 of the European Convention on Human Rights imply the right to inherit a genetic pattern which has not been artificially changed ;
 - b. this right should be made explicit in the context of the European Convention on Human Rights ;
 - c. the explicit recognition of this right must not impede development of the therapeutic applications of genetic engineering (gene therapy), which holds great promise for the treatment and eradication of certain diseases which are genetically transmitted ;
 - d. gene therapy must not be used or experimented with except with the free and informed consent of the person(s) concerned, or in cases of experiment with embryos, fetuses or minors with the free and informed consent of the parent(s) or legal guardian(s) ;
 - e. the boundaries of legitimate therapeutic application of genetic engineering techniques need to be clearly drawn, brought to the attention of research workers and experimentalists, and subjected to periodical re-appraisal ;
 - f. outline regulations should be drawn up to protect individuals against non-therapeutic applications of these techniques ;
5. Expressing the wish that the European Science Foundation should keep under review :
 - 5.1. procedures and criteria for licensing the use of products of recombinant DNA techniques in medicine, in agriculture and industry ;
 - 5.2. the effects of the commercialisation of recombinant DNA techniques on the funding and orientations of fundamental research in molecular biology.
6. Invites member governments :
 - a. to take note of the reassessments which have taken place in recent years within the scientific community concerning levels of risk from research involving recombinant DNA techniques, and to adjust, in the light of these reassessments, their systems of supervision and control ;
 - b. to provide for the periodical reassessment of levels of risk from research involving recombinant DNA techniques within the regulatory frameworks for assessing the risks from research involving the handling of micro-organisms in general ;
7. Recommends that the Committee of Ministers:
 - a. draw up a European agreement on what constitutes legitimate application to human beings (including future generations) of the techniques of genetic engineering, align domestic regulations accordingly, and work towards similar agreements at world level ;
 - b. provide for explicit recognition in the European Convention on Human Rights of the right to a genetic inheritance which has not been artificially interfered with, except in accordance with certain principles which are recognised as being fully compatible with respect for human rights (as, for example, in the field of therapeutic applications) ;
 - c. provide for the drawing up of a list of serious diseases which may properly, with the consent of the person concerned, be treated by gene therapy (though certain uses without consent, in line with existing practice for other forms of medical treatment, may be recognised as compatible with respect for human rights in the probability of a very serious disease being transmitted to a person's offspring) ;
 - d. lay down principles governing the preparation, storage, safeguarding and use of genetic information on individuals, with particular reference to protecting the rights to privacy of the persons concerned in accordance with the Council of Europe conventions and resolutions on data protection ;
 - e. examine whether levels of protection of the health and safety of the general public and of laboratory workers engaged in experiments or industrial applications involving micro-organisms, including micro-organisms subject to recombinant DNA techniques, are adequate and comparable throughout Europe, and whether existing legislation and institutional machinery offer an adequate framework for their periodical verification and revision to this end ;

- f.* ensure, by periodic reviews in liaison with the European Science Foundation, that national containment measures for recombinant DNA research and required laboratory safety practice continue to converge and to evolve (albeit by different routes) towards harmonisation in Europe, in the light of new research findings and risk evaluations ;
- g.* examine the draft recommendation of the Council of the European Communities on the registration and notification to appropriate national and regional authorities of experiments involving recombinant DNA, with a view to the concerted implementation of its provisions in the countries of the Council of Europe ;
- h.* examine the patentability of microorganisms genetically altered by recombinant DNA techniques.