Workshop

Human Heredity in the Twentieth Century

(A Cultural History of Heredity V)

2-4 September 2010

Centre for Medical History and the ESRC Research Centre for Genomics in Society, University of Exeter, UK

in collaboration with the

Max-Planck-Institute for the History of Science, Berlin, Germany

Organisers:

Staffan Möller-Wille (Exeter), Bernd Gausemeier (Berlin), Edmund Ramsden (Exeter)

The Centre for Medical History and the ESRC Research Centre for Genomics in Society (EGenIS) at the University of Exeter is inviting individual scholars to propose papers for a forthcoming workshop "Human Heredity in the Twentieth Century". This workshop, scheduled for 2-4 September 2010, is part of a series that reflects a long term cooperative research project between the Max-Planck-Institute for the History of Science (MPIWG) in Berlin and the University of Exeter. The project deals with the agricultural, technical, juridical, medical, and scientific practices through which the knowledge of biological

inheritance was developed, embedded, and transferred in successive periods. The overall aim is to arrive at a better understanding of the genesis of present conceptions of human heredity.

Previous workshops in the series took place in Berlin in May 2001, January 2003, and January 2005, and in Exeter in December 2006. They dealt with the *longue durée* of historical processes, tracing the first emergence of the notion of heredity in the eighteenth century, through to the flourishing of concepts and methods in the nineteenth century, and, finally, turning to "the century of the gene" (Evelyn Fox Keller 2000).

With the fifth international workshop, the project is turning its attention specifically to the post war era, up until the 1970s, when the advent of new molecular techniques paved the way to the age of genomics. World War II is often referred to by scientists and historians as a watershed in the history of heredity research. While many of the significant developments of this era originated in the discipline of genetics and its laboratory-based research practices, fields such as medicine, anthropology, and psychology have also developed and maintained their own ways to control and to analyze human heredity. The conference aims to produce a comprehensive picture of these various practices and ideas and the political and social frameworks in which they developed. Participants are encouraged to reflect on the major breaks, shifts, and continuities in this history, especially with respect to the question how the sciences of human heredity have affected modern society and thought. We aim to address these issues from three interrelated perspectives:

Concepts:

Analyzing concepts allows us to identify basic changes in the understanding of human heredity, as well as differences and interrelations between similar notions employed in various fields. Race, for example, is a concept that has persisted in discourses of human heredity throughout the 20th century, but also one that has acquired very different meanings. The distinction between endogenous and exogenous, genetic and environmental factors has similarly been subject to continuous debate. In the realm of medicine, notions such as susceptibility and resistance as well as basic nosological and etiological assumptions have changed significantly in interdependence with the concepts

developed in genetics. More specific elements of genetic terminology, such as linkage, balanced polymorphism, heterosis, cytoplasmic inheritance, or mutation point to the transfer of concepts developed in experimental genetics to the human realm. Finally, scholars are invited to explore how ideas about genetic variation and continuity were received in 'humanist' disciplines such as geography, history, linguistics or social anthropology.

Methods:

Some of the methods that have shaped modern knowledge about human heredity require further attention - epidemiological survey techniques have been a major source of medical ideas about the susceptibility to diseases; twin research has proven similarly fundamental to human genetics. There are numerous anthropological, medical and psychological methods which have developed in close conjunction with the study of human heredity, e.g. intelligence testing or anthropometric measurement techniques. In the post-WWII era, laboratory based techniques were exported into clinical settings and field research, thus changing the landscape of human genetics and generating interdisciplinary connections.

Institutions:

The long-term investigation of institutions allows us to contrast the impact of new approaches and political contexts on the one hand and assess the persistence of structures and habits on the other. The foundations of medical genetics were laid in the framework of clinics and asylums, which combined research with diagnostic practices and genetic counseling. Systematic research in human genetics was primarily initiated by eugenic associations and developed widely in connection with novel techniques of population control. In the post-WWII period, research in human heredity became increasingly prompted by international programs and organizations transgressing boundaries between nations and local populations. In this context, it seems that human heredity has become reshaped by two divergent trends: a globalization and an individualization of research and its applications.

Scholars who wish to contribute to the workshop are requested to send a proposal of 500-1000 words to the following address:

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Submission deadline is 30 April 2010.

We hope to respond to all proposals by early May 2010. Travel and accommodation costs of speakers will be covered.