

Myles W. Jackson (2015) *The Genealogy of a Gene. Patent, HIV/AIDS, and Race*

MIT, Cambridge

In *The Genealogy of a Gene*, Myles Jackson uses the story of the CCR5 gene to investigate the interrelationships among science, technology, and society. Mapping the varied “genealogy of CCR5-intellectual property, natural selection, Big and Small Pharma, human diversity studies, personalized medicine, ancestry studies, and race and genomics --Jackson links myriad of diverse topics. The history of CCR5 from the 1990s to the present offers a vivid illustration of how intellectual property law has changed the conducts and content of scientific knowledge, and the social, political, and ethical implications of such a transformation. The CCR5 gene began as a small sequence of DNA, became patented product of a corporation, and then, when it was found to be an AIDS virus co-receptor with a key role in the immune system, it became part of the biomedical research world—a potential moneymaker for the pharmaceutical industry. When it was further discovered that a mutation of the gene found in certain populations conferred near-immunity to the AIDS virus, questions about race and genetics arose. Jackson describes these developments in the context of larger issues, including the rise of “biocapitalism”, the patentability of products of nature, the difference between U.S. and European patenting approaches, and the relevance of race and ethnicity to medical research.

About the Author

Myles W. Jackson is currently the Albert Gallatin Research Excellence Professor of the History of Science at New York University-Gallatin, Professor of History of the Faculty of Arts and Science of New York University, and Director of Science and Society of the College of Arts and Science at NYU. He was the inaugural Dibner Family Professor of the History and Philosophy of Science and Technology at Polytechnic Institute of New York University from 2007 to 2012. The chair is named after Bern Dibner (1897 – 1988), an electrical engineer, industrialist, historian of science and technology and alumnus of Polytechnic Institute of Brooklyn.

He received his Ph.D. in the History and Philosophy of Science from Cambridge University with Simon Schaffer in 1991. He has been a Senior Fellow of the Dibner Institute for the History of Science and Technology at MIT and the Max-Planck-Institute for the History of Science in Berlin, Germany.

He is the author of numerous articles on the history, philosophy, and sociology of science and technology, with a particular emphasis on the cultural history of nineteenth-century German physics. He has also authored two books, *Harmonious Triads: Physicists, Musicians, and Instrument Makers in Nineteenth-Century Germany* and *Spectrum of Belief: Joseph von Fraunhofer and the Craft of Precision Optics*, which won the Paul Bunge Prize of the German Chemical Society for the best work on the history of scientific instruments in 2005 and the Hans Sauer Prize for the best work on the history of inventors and inventions

in 2007. *Spectrum of Belief* has been translated into German, *Fraunhofers Spektren: Die Präzisionsoptik als Handwerkskunst*. He is the editor of *Perspectives on Science: Gene Patenting* (MIT Press, 2015). And his new monograph, *The Genealogy of a Gene: Patents, HIV/AIDS, and Race*, was published by MIT Press in 2015.

He was elected member of the Erfurt Academy of Sciences in 2009. He was elected to the German National Academy of Sciences-Leopoldina in December 2011. In 2012 he was elected corresponding member of the Académie Internationale d'Histoire des Science. He has worked on issues of genetic privacy and the effects of intellectual property law and the patenting of human genes on research in molecular biology and served as an expert for the ACLU in their lawsuit against Myriad Genetics on the BRCA 1 and 2 gene patents. He has been the recipient of an Alexander-von-Humboldt Fellowship, and in 2010 he received the Francis Bacon Prize in the History of Science and Technology from Caltech. And he has published on the theme of race and genomics. He was the Francis Bacon Visiting Professor of History of Science and Technology at Caltech in 2012. In 2014 he received the Reimar Lüst/Humboldt Prize of the Alexander von Humboldt Foundation and was named Bosch Public Policy Fellow of the American Academy in Berlin. He will be a fellow at the Wissenschaftskolleg (Institute for Advanced Study) in Berlin for the academic year 2016-17. He is currently working on an undergraduate text exploring the interrelationships between music, science, and technology from the eighteenth century to the present.