

# Deja vu all over again? Human genome project has lessons to learn, suggests anthropologist

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Why is the world so full of "morons" and "degenerates" and what, if anything, can be done to fix them?

These are questions that Robert W. Sussman, PhD, a professor of [anthropology](#) in Arts & Sciences at Washington University in St. Louis, will explore Feb. 15 as he addresses the 2013 meeting of the American Association for the Advancement of Science (AAAS) in Boston, Mass.—one of the world's largest gatherings of scientific researchers.

Sussman will deliver a talk on "The Importance of the Concept of Culture to Science and Society" )during a session titled The Whole of Culture: Anthropology Back on Track.

Sussman, author of *Man the Hunted: Primates, Predators and Human Evolution*, says that science has struggled to understand the mysteries of "less-than-human" beings since the late 1400s when the Spanish Inquisition first formalized state persecution of Jews and Muslims.

And while the horrors of Nazi Germany exposed fatal flaws in science's quest to build the master race, the ethical dilemmas posed by the science of eugenics are far from behind us.

As Sussman presents his lecture on the evolution of scientific and cultural explanations for criminality, homosexuality, drunkenness and

other variances in human behavior, scientists elsewhere at the AAAS meeting will be unveiling amazing new techniques for the genetic engineering of humans—tools more powerful than a Nazi's wildest dreams.

Meanwhile, legislation currently being considered in Virginia, North Carolina and other states would provide monetary compensation for the survivors of high-minded efforts to improve the gene pool by forcibly sterilizing some 65,000 mostly poor, minority or disabled Americans. Some of these state-sponsored sterilization programs, which first became common in the 1920s, were still in place as recently as the 1970s.

As recent news reports have detailed, at least nine U.S. states, including California, Florida, Georgia, Iowa, Louisiana, Montana, Oregon, Texas and Wisconsin, still have versions of chemical castration laws on their books, usually as a penalty or "fix" for habitual child sexual predators.

And, while ongoing research suggests genetic testing may one day allow us to identify babies with gene defects that will lead to autism, there is no clear consensus on whether genetic technologies should be used to correct these deficits. As advocates of "neurodiversity" have argued, some high-functioning people with Asperger's syndrome might well prefer that no one goes meddling with their unique gene set.

For Sussman, the key starting point for all these discussions should be the understanding that while all human behaviors are driven in some way by our genetic makeup, the vast majority of individual variances result from a person's social, environmental and cultural exposure.

"The anthropological concept of culture is extremely important and often misunderstood because many of the things that are assumed to be biologically determined, like criminality or homosexuality or IQ, are really behaviorally and societally defined," says Sussman.

"The only reason they are thought to be biologically inherited is because of a misunderstanding and a lack of understanding of the anthropological concept of culture."

In his AAAS lecture, Sussman will show how primitive, quasi-scientific theories were trotted out over the centuries to justify the maltreatment of groups considered less human than the currently prevailing racial, ethnic, religious or social class.

By the early 1500s, he notes, science offered two competing theories for how Africans, Jews and Muslims came to be so inferior to Western European Christians, who were considered to have been created in God's own likeness.

"The germs of racism began even before the Spanish Inquisition," Sussman explains. "Early in European history different peoples were thought of as either Pre-Adamites or as degenerates. Pre-Adamites were biologically fixed in their characteristics and could not be changed by living conditions or by education.

"Those who believed that 'others' were degenerates assumed that these peoples were born of god but could be improved by changing their habits and environment, they could be missionized. These ideas persisted until the time of Darwin and similar ideas persist even today."

Sussman traces how legitimate scientific breakthroughs, such as Mendelian genetics and Darwin's theories of evolution, were often warped and misrepresented to provide support for more politically popular concepts espoused by eugenicists.

Among the most popular pseudo-scientific books of the early 1900s were two that examined the family trees of poor rural families, the Jukes and the Kallikaks. Both books claimed to have documented how heredity

had cursed the families' feeble-minded offspring, causing them to become prostitutes, drunks and delinquents and costing the government millions of dollars in expenses over their degenerate lifetimes. Their sensational stories, eerily similar to those portrayed in modern day reality television and docudramas such as "The Wild and Wonderful Whites of West Virginia," ([www.wildandwonderfulwhites.com/](http://www.wildandwonderfulwhites.com/)) fanned public outrage about the societal burdens imposed by degenerates and whipped up support for sterilization programs.

Meanwhile, as hordes of immigrants streamed into America through Ellis Island, eugenicists played on anti-foreigner biases by using culturally biased IQ tests to "prove" that many of these newcomers were intellectually inferior morons, even though most failed the tests because they did not yet understand the English language.

However, in the early 1900s, some of the more blatant tenets of eugenics began to face challenges from an emerging body of scientific evidence supporting the important role that cultural experience, societal influence and environment play in shaping human behavior.

In 1911, pioneering American anthropologist Franz Boas showed that the skull shapes of some immigrant groups, then considered to be a permanent racial trait, could be changed by their new American environment within a few generations.

Boas' work, along with a re-synthesis of earlier work by Darwin and Mendel, helped build scientific support for a new and powerful anthropological concept of culture—the idea that how and what humans thought mainly was related to their life history, education, and socialization.

Human societies were not inferior or superior to one another, Sussman says, but rather were different because of their different histories.

"Boas's rejection of the traditional view was truly radical," Sussman explains. "That there were observable social differences among peoples was undeniable, but the explanation for those differences was due to the product of different histories, not differences in basic biology."

Sussman buttresses his arguments for the critical importance of culture in understanding human behavior by debunking studies that attempt to identify cultural behaviors in animals.

Monkeys and meerkats may pass along simple learned behaviors, such as the use of primitive tools, from one generation to the next, but these legacies pale in comparison to complex human cultural achievements, such as language, he contends.

Now, more than ever, says Sussman, the anthropological concept of culture must be considered a key variable in any attempt to understand human behavior, both within anthropology and in other areas, such as psychology, economics, medicine and genetic engineering, where we risk repeating the notorious ethical lapses of eugenics-driven science.

"Just as Boas trumped the biological determinism of eugenics and Nazism in the 1940s, the concept of culture should trump neo-biological determinism or genetic determinism currently," he concludes.

**More information:** [aaas.confex.com/aaas/2013/webprogram/paper8433.html](http://aaas.confex.com/aaas/2013/webprogram/paper8433.html)

Provided by Washington University in St. Louis

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