

Chapter 5

What Do We Inherit from Our Parents and Ancestors?

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We are composed of genes and memes. We inherit genes from our parents, and by extension, our ancestors, human and pre-human. Memes are mostly information from our cultural environment that are also inherited from our parents, and ancestors. Some memes are introduced into the environment from other cultures or de novo by creative persons. Memes are dispersed in the environment around us, like chemicals in a petri dish. Some of the memes forcibly penetrate our brains, others are passively absorbed by our brains. This chapter discusses the broad concepts of cultural inheritance and meme's role in it.

5.1 Like Parent, Like Child

What do we inherit from our parents, other than money for those who are lucky? Like father, like son is a commonly accepted idea as is the saying, “the baby has her mother’s eyes and her father’s mouth.” Physical characteristics are obviously passed on to the next generation, much of the time according to Mendelian genetics as discussed in the next chapter. But what about behavior and psychology?

“Like father, like son” may mean both physical characteristics *and* behavior, e.g., if the father is a drunkard, then the son might also be one, too. Does this mean that the father’s habit of driving while intoxicated will pass on to the child as well? What are the cultural influences for such situations? Would the son be a drunkard and drive while intoxicated if he became a Muslim and forswore drinking alcohol? Would he *want to or be able to* stop drinking given his inherited genes from father?

Even for inheritance of property, the rules are not as simple as might be supposed. For example, males historically inherited larger portions of the parents' property in most Western and Eastern cultures, and they still do under Islamic law where the sons get exactly double of what the daughters get. Just how the property was to be divided among heirs was complex depending on culture, for example, the spouse vs. the eldest son vs. the male and female siblings. The net result of just which property (for example, the house and the car) will go to whom and how much of the money would go to whom is, therefore, a result of a complex set of rules that are specific to the situation and culture. And these rules are passed on from generation to generation unless a cultural change occurs.

5.2 How Does Culture Affect Behavior?

It is generally believed that individuals learn to absorb and adapt to the cultural norms through learning, mostly following the reward–punishment paradigm of operant conditioning and the development of representations of cultural values transmitted through parents – the superego.

Culture consists of not only values but also language, modes of dress, food, and recreational activities. Such cultural items are passed on from generation to generation mainly through imitation and identification. For example, longer hairdo for women, men wearing trousers and not skirts. Culture does change – either through exposure to other cultures, or through mutation. Thus sushi became a popular food in the West, and most Japanese wear Western attire. Through mutation, the Greek *era* became *eorthe* in old English, then *earth* today (Merriam-Webster). Our ancestors walked and ran, then rode horses, and now we ride automobiles, ships, and airplanes.

5.3 Memes and Cultural Change

How exactly does culture mutate? Certainly, horses did not mutate into automobiles, and kimonos did not mutate into Western suits. In fact, horses and kimonos still exist side by side with automobiles and Western suits. What changes is inside our brains – what is accepted as desirable or preferable. What changes is the brain's reaction to the cultural information, e.g., kimono and Western suit, what has been perceived. "Sushi is delicious, and eating it is good" defeats the once prevalent idea, "Eating raw fish is disgusting." Richard Dawkins coined the term *Meme* to denote the elements of cultural information that is largely transmitted through imitation (Dawkins, 1976, 2006). As discussed earlier, memes, like genes, are replicators, i.e., they are copied by brains and transmitted to others by means of behavior and language, and nowadays by electronic means and by computers, and reside in books, DVDs, and computer hard drives as well as in human brains. See Chapter 8 for further discussion on this topic.

5.4 Memplexes

Individuals are immersed in the cultural environment consisting of memes. The culture medium in a petri dish affects the bacterial colony in it through the chemical molecules that may be nutrients or poisons. In the same way, the memes in our environment are introduced into our brains by absorption, diffusion, or forced penetration as by incessant TV advertisements or roadside billboards. The term, *memplex*, denotes a complex of memes that tend to travel together and co-evolve. A memplex conjures up often multimodal images and sounds, for example, national anthem, Mona Lisa, self, Christmas. Memplexes have survival advantage just as multicellular organisms do. Consider the strength of the memplex “National Anthem” to the meme “national.” National anthem is copied (sung) each time there is a ceremony, including the opening of sporting events.

References

- Dawkins, R. (1976) *The Selfish Gene*. Oxford University Press, New York.
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