Paul Churchland (1981) – Eliminative Materialism and the Propositional Attitudes.

0. Summary

Paul Churchland presents the theory of Eliminative Materialism, which has the following claim: Folk Psychology is only based on culture and fundamentally false. A completed neuroscience will one day replace it, such that our understanding of the mind and even our introspection will change as it disappears.

Churchland describes how Folk Psychology has to be understood as a real theory with a rule-based model from which emerges the concept of intentionality (which he identified as one of the last obstacles for materialism before). He then explains where Folk Psychology fails to give proper explanations (mental illness, creativity, learning and others) and that it provides no hope of resolving any of those issues.

Churchland further describes how Functionalism is conserving Folk Psychology because it is an abstract suit that would fit every theory that claims some rules, for example alchemism. The normative character of Folk Psychology that some bring into the field is, according to Churchland, not due to intrinsic features but due to us valuing its patterns. The rationality described by it is far from ideal and the (human) language it is based upon may not be adequate for understanding mind processes that occur in deeper levels.

In the last section, Churchland describes three future scenarios in which he imagines neurobiological findings that might make Folk Psychology vanish one day.

I oppose Churchlands thesis in the following point: I don't think that Folk Psychology could disappear from our society because it is not from a cultural origin, but from a natural.

1. Intentional Concepts in human society lie in human nature

It is true that our culture is based upon Folk Psychology and its intentional propositions. How would it look like if we, hypothetically, substracted this concept from our minds? How were we to understand all the stories, tales and legends that make up our culture, let alone the political comment in the newspaper, arguing, for example, why Schröder might want to propose new elections? To bring up an example that shows how strong our culture is build on the intentional concepts of Folk Psychology I cite the Sermon On The Mount: "Judge not, that ye be not judged. For with what judgment ye judge, ye shall be judged: and with what measure ye mete, it shall be

measured to you again." This has become a basic concept of our society. Intentionality and beliefs are also what anthropologists found in cultures all over the world. The anthropologist Donald E. Brown has reviewed literature of his field and came up with a list of human universals that include a lot of those topics. ²

I claim that this deep entrenchment of intentional concepts in our culture is not a sign for culture as the reason, but as a consequence. This way of thinking is what nature wired into our brains so that we build up societies just like ours to compete successfully in our environment.

This can be shown very well in a field that Churchland (correctly) identifies as a topic that Folk Psychology cannot really explain: learning. Churchland states that Folk Psychology has "no unique functions that make it irreplaceable". But a study on learning in infants by Carpenter, Akhtar & Tomasello (1998) showed that if "an adult fiddles with a gadget but indicates that the action was an accident (by saying 'Whoops!'), a baby will not even bother trying to imitate him. But if the adult

does the same thing but indicates that he intended the action, the baby will imitate him." Babies are

¹ Matthew 7:1,2

² http://condor.depaul.edu/~mfiddler/hyphen/humunivers.htm

³ Steven Pinker "The Blank Slate (2002), p. 62

not told to use intentional concepts of Folk Psychology to learn, they simply do it out of their human nature.

2. Natural selection is a force to decide on certain mechanisms and discard others

I think that our minds may not be equipped for thinking in totally different terms. For natural resources are limited, natural selection did not build into the human mind what was of no use in the environment. This is why we all have to go to school to learn advanced algebra and we are not doing very well in thinking in the fourth dimension.

It's not for the use of a limited protocol, the human language, that we may never grasp at once exactly how the opponent is thinking (or calculating, specifically). I think it is due to the natural limitation to the capacity and plasticity of our mind that we estimate what could be the case in the specific terms that have been classified as Folk Psychology. The theory of evolution does not only teach us what were the best mechanisms in the past, but also that we are only here today because our ancestors used their capacities to apply them and not any others.

3. Folk Psychology vs Alchemism

The "impotence" of Folk Psychology to explain certain phenomena has certainly been correctly described by Churchland. Nevertheless I see a significant difference between Folk Psychology and Alchemism in terms of empirical success. There was no really successful way for mankind to explain the properties of different materials before suitable scientific discoveries and methods were at hand (and from the view of nature, there has not been a reason to, either). Alchemists seldom did anything else than try-and-error and never made good predictions about their results (see the case of Johann Friedrich Böttger). But Folk Psychology is a tool that has proven, over a evolutionary relevant time span, to guarantee some success and reasonable good predictions (given the complex human behavior one could call every planned alliance that lasts over years, like a marriage, a predicted success). This is why babies use it intrinsically and literature that influences our very society uses intentional concepts significantly more often than alchemistic concepts.

4. On successful replacements of theories

I want to make a remark concerning Churchlands examples of presumably successful replacements of theories. It is true that scientific discoveries change the way we think about the world and discuss it. But does it really replace the old? Since we all believe in what Galilei, Kopernikus and the like found out about the movements of the planets: Have people stopped talking about a rising sun? No, they haven't. Educated people can -on an abstract level- be very well informed about the physical theories concerning planet movements, but on the level of daily conversation, nearly everyone stays with the description that fits his perception of a moving sun: The sun rises. Other terms may be a better candidate for discussion on new theoretical grounds. We say that something is located "behind the horizon". Now this is a term that lacked a good explanation why there is something it refers to – until the theory of a round earth came into play. It may be similar with the mind: some new terms will be coined, but most old terms will be used as before. And some of those old terms will never describe exactly what we (then) know is true, but that doesn't mean we refuse the new knowledge. It's just that we behave naturally in everyday life.

5. Conclusion

I see a problem in comparing a bottom-up method like neurobiology with a top-down-method that Folk Psychology certainly is. Each of them has a particular reason to be and to stay and I hope I made clear what reasons I think Folk Psychology has. It will definitely be interesting to see the impacts of neurobiological findings on the way we discuss the mind (I do not deny that there will be some). But I expect these impacts to be more on scientific grounds than on personal life, introspection even, because that would mean that we ourselves, our nature, had to change. On scientific grounds, Churchlands argument might be the right one: The influence of Folk Psychology on scientific research could be misleading.