

Towards theoretical integration of naturalised phenomenology and mechanistic explanations in cognitive sciences

One of the key issues in interdisciplinary cognitive sciences is theoretical integration of various disciplines and fields of study. Some philosophers and cognitive scientists claim that such integration can be achieved by applying the mechanistic model of explanations which, in short, aims to search for mechanisms (e.g. neural) underlying phenomenon to be explained. Mechanistic explanations are applied widely in life sciences. In recent years, there have been attempts at introducing mechanistic thought to cognitive sciences, and even social sciences. The main objective of the project is to argue that theoretical integration of mechanistic approach in cognitive sciences and naturalised phenomenology is possible. Phenomenology, in general, is a methodological description and analysis of our experience and cognitive functions.

In cognitive science, mechanistic explanations were proposed for such cognitive phenomena as memory, visual processing, and even consciousness. These attempts, however, often lack an adequate description of conscious experiences, and specifications of phenomena to be explained, are often based on commonsensical intuition. Therefore, in cognitive research, it is important to introduce methodical phenomenology, which will deliver an adequate description of the phenomenon to be explained, and will also guide the search for mechanisms.

The project addresses fundamental issues in cognitive sciences, phenomenology and philosophy of mind and philosophy of science. Besides theoretical integration of cognitive sciences, the project also addresses the problem of naturalisation of phenomenology i.e., including aspects of first-personal description and analysis of experience in the naturalistic project of cognitive sciences. One of the specific research tasks is the issue of naturalistic explanation of consciousness i.e., can the phenomenon of consciousness be explained in purely naturalistic terms, e.g. in terms of physics or neurobiology, or it is impossible and explanation of this phenomenon requires language and methods of psychology and phenomenology.

Results of this research project are important for understanding the mind and human nature. They are also important for interdisciplinary methodology and future development of cognitive sciences and naturalistic study of consciousness.