Axiomatic Method and Deductive Reasoning

Peng Liu (刘鹏), C41-7, 20151910042, Yunnan University

**Abstract**

The essence of the mathematics work of scholars in the classical period was very fortunate in the writings of Euclid. Euclid belongs to the second major period in Greek history, the period of Alexander. Although there are flaws, the writings of Euclid have largely determined the direction of later science. Euclid has established a strict method of reasoning. Scientists in the future are all conceptually elucidated in this way. And this method of argument is also a powerful weapon for falsification. Euclid’s work tells us how to establish a rigorous theoretical system and how to write it so clearly enough that basic people can read it easily. This paper discusses the important points of Euclid's axiomatic approach and deductive reasoning, and also makes a perspective of program from the perspective of machine learning.

**Key words**: axiomatic method; deductive reasoning; machine learning