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## Reflections

# Is intelligence the power of prediction?

Luiz Ricardo L. Simone

Museu de Zoologia da Universidade de São Paulo lrsimone@usp.br; lrlsimone@gmail.com OrcID: 0000-0002-1397-9823

### Argumentation

In a recent issue of Malacopedia (Simone, 2004), the intriguing question of whether octopuses are sentient beings was explored. One conclusion drawn was that the answer depends on the definition of "sentience." According to the criteria used to determine sentience, both octopuses and other vertebrates qualify. However, under a more stringent criterion, only humans—among all the extant species on this planet—would be considered sentient.

Surprisingly, this controversial theme did not generate extensive discussion or disagreement, as it appears relatively straightforward. However, the provided definition of intelligence in that paper, simply as the "capacity for prediction," did spark debate. Thus, this concise issue seemed necessary.

It is not difficult to argue that sentience and intelligence are correlated. Intelligent beings tend to exhibit sentience, and vice versa. Moreover, both characteristics are subject to diverse, controversial, and wide-ranging definitions.

Focusing to the intelligence, it can be understood from various perspectives. Psychologically, it is defined as the ability to acquire and apply knowledge, solve problems, reason logically, adapt to new situations, and learn from experience, focusing on cognitive abilities. Socially, intelligence refers to the capacity to effectively interact with one's environment, including navigating social relationships, communicating effectively, and achieving personal goals. Additionally, Howard Gardner's Multiple Intelligence Theory (Cherry, 2023) categorizes intelligence into distinct abilities such as linguistic, logical-mathematical, spatial, musical, bodily-kinesthetic, interpersonal, intrapersonal, and naturalistic intelligences. In this vast field of scholars dedicated to exploring this fascinating subject, it is challenging to accept the simplistic notion that intelligence can be solely inferred as the capacity for prediction.

However, it is important to clarify that "prediction" does not carry an esoteric meaning. It does not refer to divination or mere guessing. Rather, in the context of the intelligence definition, "prediction" implies that the individual possesses (1) prior knowledge, wisdom, and understanding of all relevant data, effects, processes, etc., pertaining to the subject; (2) the ability to process this information fully in the present or new scenario; and (3) the capacity to foresee all potential outcomes along any chosen path.

Under the definition of intelligence as the capacity for prediction, intelligence diverges from the commonly preached notion of being the "capacity for solving problems." Instead, intelligence can be understood as the "capacity for averting problems."

The capacity for prediction is the rationale behind seeking advice from wiser individuals regarding future choices. It also explains why companies are willing to invest in experienced consultants, offering high salaries for their opinions on ventures and investments. Additionally, it underscores the responsibility of parents towards their children. Individuals with a strong capacity for prediction are immensely valuable both in our personal lives and within society, guiding us away from potential problems by illuminating paths that our own intelligence may overlook.

While nothing can completely prevent problems from arising, true intelligence is tested in resolving new and unexpected challenges. Even in these situations, the solution relies on the aforementioned three factors, ultimately encompassing the ability for prediction.

#### References

Cherry, K, 2023. Gardner's theory of multiple intelligences. <a href="https://www.verywellmind.com/gardners-theory-of-multiple-intelligences-2795161">https://www.verywellmind.com/gardners-theory-of-multiple-intelligences-2795161</a> (extracted 11/v/2024).

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