Joint Action and the Emergence of Mindreading

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Short Abstract

How can we explain the emergence, in evolution or development, of mindreading? Some conjecture that its emergence involves joint action (Knoblich & Sebanz 2006; Moll & Tomasello 2007). Reflection on objections to this conjecture reveals mistakes in leading philosophical accounts of both mindreading and joint action. These lectures aim to identify the mistakes and provide fixes. The fixes involve two steps: the construction of a minimal theory of mind; and an account of the distinct roles for shared intention and social motor representation in explaining what joint action is.

Long Abstract

How can we explain the emergence, in evolution or development, of mindreading? Some conjecture is that its emergence involves joint action (Knoblich & Sebanz 2006; Moll & Tomasello 2007). This conjecture faces two objections. First, doesn't recent research show that mindreading appears in development long before joint action? Second, don't abilities to engage in joint action presuppose sophisticated mindreading (as the leading accounts entail)? In these lectures I will explicate the conjecture and reply to both objections. I will also attempt to answer a further question raised by the conjecture: How could abilities to engage in joint action be involved in the emergence of mindreading?

The first objection is informed by recent findings that infants, chimpanzees and scrub-jays all act in ways whose success is contingent on facts about what others perceive, know or believe. It is sometimes assumed, further, that they are able to do this by virtue of representing perceptions,

knowledge states or beliefs as such. But since there is converging evidence against this assumption, it is useful to ask: What else could individuals represent that would enable them to track, at least within limits, others' mental states? I will answer this question by describing the construction of a minimal theory of mind. Minimal theory of mind is sufficient for success on some false belief tasks and explains how relying entirely on efficient but relatively inflexible cognitive mechanisms it is possible to solve a limited but useful range of tasks involving perception, knowledge and belief. Minimal theory of mind may be what enables those with limited cognitive resources or little conceptual sophistication, such as infants, to track others' perceptions, knowledge states and beliefs. If so, the first objection to the conjecture that abilities to engage in joint action partially explain the emergence of mindreading is at most half right. Some form of mindreading may appear earlier in development than joint action, but this does not involve representing perceptions, knowledge states or beliefs as such.

On the second objection, it is often held that all joint action involves shared intention. This is problematic for the conjecture that abilities to engage in joint action partially explain the emergence of mindreading if, as I will argue, shared intention presupposes mindreading of a sophistication approaching the limits of what humans are capable of. The problem can be avoided by rejecting the assumption that all joint action involves shared intention. By drawing on research on intention and motor representation, I shall defend an account of joint action without shared intention. On this account, joint action presupposes only minimal theory of mind.

On the final question, I shall explain how abilities to engage in joint action provide a route to knowledge of others' goals distinct from ordinary third-person interpretation. This allows us to explain how humans are able to break into the Gricean circle and understand communicative intention. Because communicative intention is a foundation of communication by language, and because communication by language in turn plays a role in the emergence of full-blown mindreading (Astington & Baird 2005), this may amount to one (indirect) way in which the combination of joint action with minimal theory of mind cognition partially explains the emergence of full-blown mindreading.

References

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