

Comment: Constructionism is a Multilevel Framework for Affective Science

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Abstract

We point out that constructionist models from experimental psychology account for the sociocultural, psychological, and neural levels of analysis in emotion. Individual constructionist models form a “metamodel” that integrates the levels of analysis important to a science of emotion. By clarifying the multilevel nature of constructionism, we hope to help lay a strong foundation for future cross-disciplinary collaborations.

Keywords

construction, emotion, psychological construction

In this issue, Rogers, Schroder, and von Scheve (2014) offer the affect control theory (ACT)—an approach from sociology that models how emotions emerge from more fundamental sociocultural, psychological, and neural parts. We applaud the scope of the ACT and point out that constructionist approaches in experimental psychology also address these levels of analysis. In this comment, we clarify the multilevel nature of constructionism with hopes of laying a foundation for future cross-disciplinary collaborations.

Although Rogers et al. (2014) equate constructionist approaches (e.g., Lindquist, Wager, Kober, Bliss-Moreau, & Barrett, 2012) with the neural level of analysis, constructionism is in actuality, a multilevel framework on par with ACT. When linked like ladder rungs, existing constructionist approaches form a powerful “metamodel” that accounts for the levels of analysis important to affective science (Figure 1).

Starting at the top of the ladder, “social constructionist” approaches (e.g., Boiger & Mesquita, 2012; Mesquita, 2010) model how affective responses, and the emotional meanings attributed to those responses, emerge in the context of sociocultural

values and roles (called “shared semantic meaning,” and “identities” by Rogers et al., 2014). Mesquita and colleagues emphasize that emotions are constructed dynamically between people, as opposed to merely inside the head of a single individual.

Moving down a level, “psychological constructionist” approaches (e.g., Barrett, 2009; Clore & Ortony, 2008, 2013; Cunningham, Dunfield, & Stillman, 2013; Lindquist, 2013; Russell, 2003) emphasize how affective responses are made meaningful as instances of emotion (e.g., anger, sadness, etc.) using situation-specific emotion knowledge. A subset of these models (Clore & Ortony, 2008, 2013; Cunningham et al., 2013) focuses on the dimensions of meaning that characterize such emotion knowledge. Unlike the “appraisal” approaches cited by Rogers et al. (2014), these models make no assumptions that dimensions of meaning correspond to literal cognitive *mechanisms* that give rise to emotions. For instance, the appraisal that one lacks control does not necessarily trigger fear, but rather describes the *contents* of what it is like to experience fear (cf. Lindquist, 2013; Lindquist & Barrett, 2008). Emotions are thus considered cognitive “types” that represent the situations that are meaningful within specific cultures (and in some cases, between cultures; Clore & Ortony, 2013)—a notion that seems consistent with the “shared cultural meanings” referenced in ACT.

Finally, our own psychological constructionist approach (Lindquist, 2013; Lindquist & Barrett, 2012; Lindquist et al., 2012) maps basic psychological processes to the neural level of analysis (also see Cunningham et al., 2013). Rather than focusing on localized populations of neurons as Rogers et al. (2014) suggest, we focus on distributed neural networks; complex psychological representations are most likely to emerge from the firing of neurons across multiple regions of the brain, than within single brain regions (Lindquist & Barrett, 2012). We hypothesize that emergence occurs both within and between

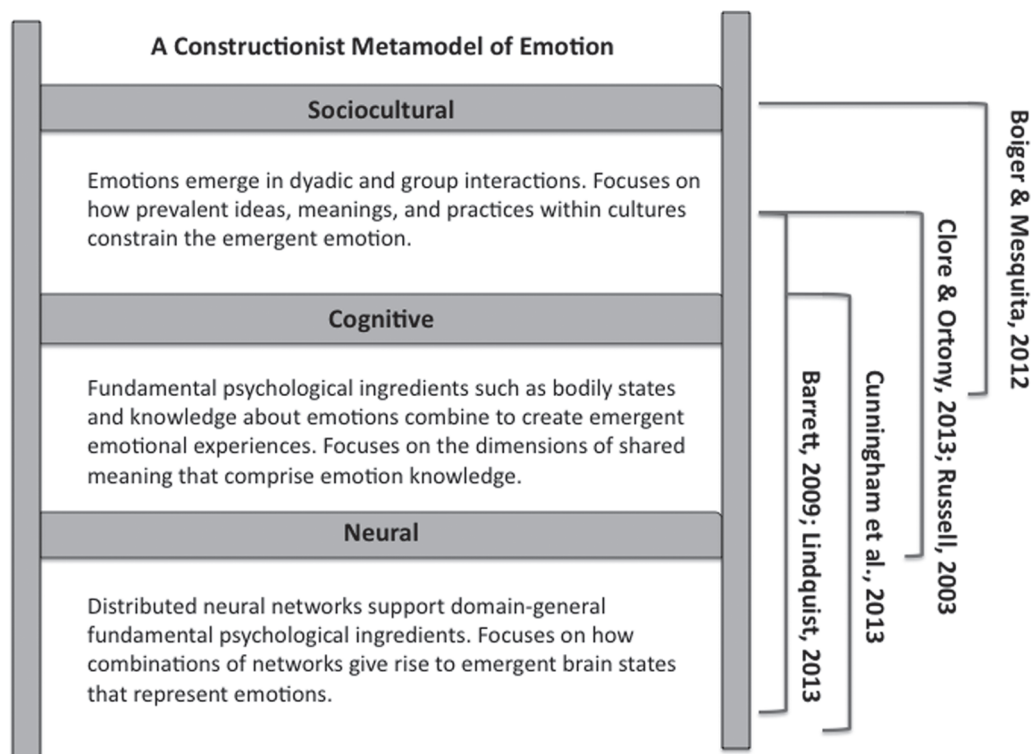


Figure 1. Constructionist approaches spanning the sociocultural, cognitive, and neural levels of analysis can be assembled as ladder rungs in a constructionist “metamodel.”

levels of analysis—basic psychological functions emerge from the firing of neurons and emotions emerge from the combinations of basic psychological functions within a particular sociocultural context. Statistics for modeling emergence appropriately are not yet available (see Barrett, 2011; Coan, 2010), but we caution that any multilevel framework—whether ACT or constructionism—must nonetheless respect it. We hope that the need for an either-or distinction between ACT and constructionism will not exist in the future, since the experimentally validated constructionist framework and ACT’s sophisticated simulations could be profitably combined into a single multilevel framework.

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