Comments

Why Do We Need Emotion Words in the First Place? Commentary on Lakoff (2015)

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Abstract

George Lakoff (2016) discusses how emotion metaphors reflect the discrete bodily states associated with each emotion. The analysis raises questions about the context for and frequency of use of emotion metaphors and, indeed, emotion labels (e.g., "angry"), per se. An assumption implicit to most theories of emotion is that emotion language is just another channel through which people express ongoing emotion states. Drawing from recent evidence that labeling ongoing emotions *reduces* their intensity, we propose that a primary function of emotion language is regulatory rather than expressive.

Keywords

Humans have expressive faces, bodies, and voices. These are the channels for embodying emotion that Lakoff's (2016) study of metaphor vividly documents. In fact, nonverbal communication of emotion is so effective that one could ask why humans possess a linguistic vocabulary for emotion at all. Here, we engage in the intellectual exercise of challenging the assumption that emotion words are merely another means of communicating about on-line affective states to others, or that emotion words and metaphors are constitutive elements of the emotion experience. We propose that humans developed the emotion language in large part to *explain, control*, and ultimately, *inhibit*, theirs and others' affective states. This possibility has broad implications for the future study of emotion.

Facial expressions are rapid, automatic, and have a high signal value (Smith, Cottrell, Gosselin, & Schyns, 2005), making them ideal for conveying emotion. Verbally communicating emotion, on the other hand, requires cognitive resources, does not occur automatically, is typically redundant with nonverbal

expression, and, perhaps surprisingly, is something that many people are not good at (Le, Berenbaum, & Raghavan, 2002). After reviewing analyses of naturalistic emotion word use, Pennebaker, Mehl, and Niederhoffer (2003) conclude, "it is striking how weakly emotion words predict people's emotional state" (p. 571). In the rare instances that people do use words to label their ongoing emotions, what function does it serve?

Evidence for the regulatory role of emotion labeling is supported by research showing that labeling down-regulates emotions, even in the absence of explicit emotion regulation goals. Labeling emotionally charged stimuli with affective (compared to neutral) words reduces amygdala activation (Lieberman et al., 2007). Self-reported distress (Lieberman, Inagaki, Tabibnia, & Crockett, 2011) and skin conductance response (Tabibnia, Lieberman, & Craske, 2008) are reduced when participants generate or view emotion-related labels, but not affectively neutral labels, for aversive images. Participants asked to self-report their emotions showed different cardiovascular responses after an anger induction compared to participants who did not report their emotions (Kassam & Mendes, 2013).

How might language facilitate regulation of emotions? Consider that verbalization is a form of categorization. While our ability to categorize is not limited to nameable entities, any time we label an entity, be it a concrete object, a type of motion, a relation, or an emotional state, we necessarily have to choose a particular label (Lupyan, 2012). In so doing, the mental representation takes on a more categorical form that is more amenable to drawing inferences of, for example, the cause of the mental state (see Lupyan & Clark, 2015, for a more general discussion of words as hypotheses). Just as writing something down acts to dissociate the idea from its current idiosyncratic context, labeling and thus categorizing an emotion may demote it from an immediate, driving urge to an object we can consciously attend to.

Finding the cause of an emotion may also defuse it (Lapate, Rokers, Li, & Davidson, 2014). If emotions evolved to motivate an organism to respond to a stimulus, then consciously reflecting on the emotion and its potential cause could serve as a signal that the challenge has been "dealt with," thus ending (or reducing) the emotion episode.

There are many implications of the relationship between emotion and language. For instance, mood manipulation checks, which draw participants' awareness to their affective states and ask them to label or rate them, may unintentionally weaken a mood manipulation (Kassam & Mendes, 2013). A regulatory function of emotion labeling could explain why most languages have more negative than positive emotion words (Schrauf & Sanchez, 2004): it is *generally* more desirable to regulate negative emotions. Finally, cultural differences in the need to regulate particular emotions should be related to the density and granularity of emotion vocabulary across languages (cf. Barrett, Gross, Christensen, & Benvenuto, 2001).

The evidence reported here, and much more, suggests the intriguing hypothesis that emotion language does not primarily function as a read-out of internal states, but instead serves a more complex (and more interesting) regulatory function. Empirical attention to this view has the potential to inform our understanding of the structure of emotion and its interaction with conscious thought.

References

Barrett, L. F., Gross, J., Christensen, T. C., & Benvenuto, M. (2001). Knowing what you're feeling and knowing what to do about it: Mapping the relation between emotion differentiation and emotion regulation. *Cognition and Emotion*, *15*, 713–724. doi:10.1080/02699930143000239

Kassam, K. S., & Mendes, W. B. (2013). The effects of measuring emotion: Physiological reactions to emotional situations depend on whether someone is asking. *PLoS ONE*, *8*, e64959. doi:10.1371/journal.pone.0064959

Lakoff, G. (2016). Language and emotion. *Emotion Review*, *8*(3), 269–273.

Lapate, R. C., Rokers, B., Li, T., & Davidson, R. J. (2014). Nonconscious emotional activation colors first impressions a regulatory role for conscious awareness. *Psychological Science*, *25*, 349–357. doi:10.1177/0956797613503175

Le, H. N., Berenbaum, H., & Raghavan, C. (2002). Culture and alexithymia: Mean levels, correlates and the role of parental socialization of emotions. *Emotion*, *2*, 341–360. doi:10.1037//1528-3542.2.4.341

Lieberman, M. D., Eisenberger, N. I., Crockett, M. J., Tom, S. M., Pfeifer, J. H., & Way, B. M. (2007). Putting feelings into words: Affect labeling disrupts amygdala activity in response to affective stimuli. *Psychological Science*, *18*, 421–428. doi:10.1111/j.1467-9280.2007.01916.x

Lieberman, M. D., Inagaki, T. K., Tabibnia, G., & Crockett, M. J. (2011). Subjective responses to emotional stimuli during labeling, reappraisal, and distraction. *Emotion*, *11*, 468–480. doi:10.1037/a0023503

Lupyan, G. (2012). What do words do? Toward a theory of language-augmented thought. In B. H. Ross (Ed.), *Psychology of learning and motivation* (Vol. 57, pp. 255–297). Waltham, MA: Academic Press.

Lupyan, G., & Clark, A. (2015). Words and the world: Predictive coding and the language-perception-cognition interface. *Current Directions in Psychological Science*. doi:10.1177/0963721415570732

Pennebaker, J. W., Mehl, M. R., & Niederhoffer, K. G. (2003). Psychological aspects of natural language use: Our words, our selves. *Annual Review of Psychology*, *54*, 547–577. doi:10.1146/annurev.psych.54.101601.145041

Schrauf, R. W., & Sanchez, J. (2004). The preponderance of negative emotion words in the emotion lexicon: A cross-generational and cross-linguistic study. *Journal of Multilingual and Multicultural Development*, *25*, 266–284. doi:10.1080/01434630408666532

Smith, M. L., Cottrell, G. W., Gosselin, F., & Schyns, P. G. (2005). Transmitting and decoding facial expressions. *Psychological Science*, *16*, 184–189. doi:10.1111/j.0956–7976.2005.00801.x

Tabibnia, G., Lieberman, M. D., & Craske, M. G. (2008). The lasting effect of words on feelings: Words may facilitate exposure effects to threatening images. *Emotion*, *8*, 307–317. doi:10.1037/1528-3542.8.3.307

Comment: The Interaction Between Metaphor and Emotion Processing in the Brain

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Abstract

It has been argued that metaphor and emotion processing are tightly linked together. Here we explore whether neuroscientific evidence supports this claim.

Keywords

George Lakoff, in his article, "Language and Emotion," (2016) makes a strong case for the important link between language and emotion processing. Is there any neuroscientific support for this? To date, most neuroscience studies on embodied semantics have focused on whether or not motor regions are active during the process of language related to actions. This is largely due to the fact that we have a good deal of scientific knowledge about motor brain regions and thus we can better predict expected