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Learning Agility Requires Proper Action Identification

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As stated in the focal article, learning agility refers to ''the ability to come up to speed quickly in one's understanding of a situation, and move across ideas flexibly in service of learning both within and across experiences'' (DeRue, Ashford, & Myers, 2012). A critical element of learning agility, then, is making connections between experiences, especially experiences that occur in seemingly distinct and unrelated situations. DeRue et al. highlight three cognitive processes as being important for making such connections: cognitive simulations, counterfactual thinking, and pattern recognition. Together, these three processes capture, respectively, individuals' abilities to imagine possible future situations, consider how past situations may have differed, and to ''connect the dots'' between past and future situations.

Although the above cognitive processes are likely important components of learning agility, they fail to adequately capture the level at which an individual understands a given situation. Drawing from action identification theory (Vallacher & Wegner, 1987), we propose that *action identification*, defined as the extent to which individuals understand action in a situation along a hierarchy of specificity versus abstractness, is an additional yet essential cognitive process that underlies and facilitates learning agility, especially learning across experiences.

Transferring relevant knowledge and behavior from one situation to another requires that people recognize the underlying meaning in a given situation. Put simply, people need to not only know what they are doing but why they are doing it (Vallacher & Wegner, 1987). Knowledge of specific contextual cues (e.g., being in the presence of subordinates) and the specific actions taken in those contexts (e.g., providing feedback) offer little insight into making connections between disparate situations. Take, for example, the case of a supervisor providing positive feedback to his or her subordinate during a meeting. For the supervisor to transfer knowledge gleaned from this experience to subsequent situations, it is imperative for him or her to understand, at a higher level, what the intended purpose was for providing the positive feedback (e.g., to enhance the subordinate's confidence, improve supervisor–subordinate relations,

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or motivate other subordinates who are present at the meeting). If the purpose was to improve supervisor–subordinate relations, and assuming the behavior had the desired effect, then the strategy of providing positive feedback can more easily transfer to other situations that involve the same underlying purpose (i.e., improving interpersonal relations) yet different contextual cues (e.g., interactions with clients outside the office).

Understanding the underlying purpose in a given situation involves action identification within goal hierarchies. Self-regulation scholars (e.g., Johnson, Chang, & Lord, 2006; Powers, 1973) propose that goals are arranged hierarchically, such that abstract, self-referenced, and long-term goals that give meaning to behavior exist at the top of the hierarchy (e.g., the goal of being a successful leader), whereas concrete, behavioral, and short-term goals exist at the bottom of the hierarchy (e.g., communicating a desirable vision to subordinates). The goals at the top of the hierarchy constrain the goals that emerge at lower levels, so movement down the hierarchy indicates how goals are accomplished, whereas movement up the hierarchy indicates why behaviors are performed (Johnson et al., 2006). Thus, a given action can be identified in a variety of ways, depending on what level it is construed within the goal hierarchy (Vallacher & Wegner, 1987). Consider the activity of ''writing an article,'' which could be accurately identified as ''being a successful researcher,'' ''earning tenure,'' ''fulfilling a job duty,'' or simply as ''using word processing software'' or ''typing on a keyboard.'' However, the latter descriptions (''using word processing software'' and ''typing on a keyboard'') fail to give higher, abstract meaning to the activity and, thus, stifle any learning from transferring to novel situations.

Our central thesis in this commentary is that learning agility requires people to identify actions at the upper levels of goal hierarchies to generalize from one situation to another. By linking actions to upper level goals, it becomes possible to transcend idiosyncratic cues and details that are unique to specific situations, which potentially interfere with knowledge transfer. For example, suppose a supervisor learns that using inclusive, group-oriented language (e.g., ''we'' and ''us'') and by referencing company values she is able to lessen interpersonal conflict among subordinates during team meetings. If she identifies this behavior with low-level goals (e.g., reducing subordinate conflict during meetings), then it is unlikely that the supervisor will learn to apply this experience to different situations. If, however, she identifies this behavior with high-level goals (e.g., enhancing cooperation), then it becomes much easier to see how learning in this particular instance can be applied to other situations that also involve cooperation (e.g., using inclusive language and referencing company values when managing cross-functional teams comprised of equal status peers or when requesting favors from other people or leading organizational change initiatives).

Let us be clear: Learning agility is not only about pattern recognition, it also requires people to decipher events based on their underlying meaning rather than more obvious concrete characteristics (e.g., specific actions, settings, and people). Indeed, pattern recognition may reduce learning agility in some cases, such as when people rely on exemplars (i.e., specific examples of a given category). Doing so limits transfer of learning only to those situations that are exact matches to the exemplars stored in memory. In this way, recognition via exemplars does not allow for variation in situations unless there are exemplars for each variation. In contrast, identifying situations and actions according to the higher ideals in people's goal hierarchies facilitates effective pattern recognition across diverse situations. We believe high-level identification is the key to learning agility.

Note that our treatment of action identification up to this point has focused on the process of moving from low-level actions to the high-level goals to which those actions are tied. Not only is it necessary to have the

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capacity to make this transition, but people's goal hierarchies must reflect accurate means–ends linkages between low-level actions and high-level goals (e.g., ''If I publish an article, then I move closer towards my goal of being a successful researcher''; Anderson, 1983). In this way, not all goal hierarchies are created equal; they may differ in the number and types of goals that are included as well as the number and pattern of linkages among goals. Having an accurate understanding of the linkages between low-level actions and high-level goals is particularly important because the value of actions derives from such linkages: A low-level action that has positive ties to multiple high-level goals is more valuable than an action with ties to a single goal (Carver & Scheier, 1998). Although the underlying structure of goal-based knowledge is important (Cropanzano, James, & Citera, 1993), employees must still be able to identify the high-level goals that drive low-level actions to develop learning agility.

Although a rather large literature exists concerning the implications of adopting high- versus low-level construals (e.g., Trope & Liberman, 2010; Vallacher & Wegner, 1987), less is known about the antecedents of such construals. If, indeed, learning agility is facilitated by identifying actions and situations at high levels, then it would be beneficial to cultivate such perspectives in employees. DeRue et al. posit that cognitive ability and Openness to Experience are associated with learning agility, and these individual differences may affect action identification as well, given that abstract, higher level comprehension is more difficult and requires considering multiple interpretations of a given situation. Their model could be extended further by taking into account other individual differences such as temporal orientation and need for cognition, which may affect the adoption of not only high- versus low-level action identification but also other cognitive processes underlying learning agility (e.g., counterfactual thinking).

Beyond selecting based on individual differences that predispose people to adopt high levels of action identification, it may be possible to train high levels of action identification by, for example, drawing people's attention to the values and ideals that underlie behavior rather than the concrete actions. In addition, because actions that have become habitual and automated through repeated experience are more likely to be understood at higher levels compared with actions that are novel and infrequent (Vallacher & Wegner, 1987), frequent exposure to a given action (e.g., through multiple training sessions) should promote such understanding. For example, once typing on a keyboard becomes routinized, the activity ''writing an article'' can be more easily comprehended as ''being a successful researcher'' as opposed to ''pressing the correct key.'' Thus, we view action identification as a trainable skill that involves recognizing the connections between low-level, specific actions and high-level, abstract goals and being able to move from low- to high-level construals when appropriate. Ultimately, our discussions of the antecedents of action identification are empirical questions that await testing, the results of which may be leveraged to improve learning agility in employees, which, consistent with DeRue et al., we believe is important for successfully operating within complex and dynamic environments.

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