for many veterans, EBPs have allowed for unprecedented improvements—gains for some not previously achieved over decades of suffering. These individual stories are powerful and gripping and should be celebrated. However, the work is not done. The quest to refine and continuously improve the effectiveness of clinical approaches and promote their use in routine clinical settings must continue and expand. Our nation's veterans and others with mental illness deserve the most effective care we have today and that we can realize for tomorrow.

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The opinions expressed in this comment do not necessarily represent the official policy position of the Department of Veterans Affairs (VA).

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Individual Expertise Versus Domain Expertise

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It is certainly flattering to have one's research cited 20 years after publication. The danger, however, is that views can become outmoded. Tracey, Wampold, Lichtenberg, and Goodyear (April 2014) addressed the question of whether "psychotherapy is a profession without any expertise" (p. 218). They answered affirmatively, citing the suggested criterion that experts ought to profit from experience (Shanteau, 1992) and supporting earlier speculations that therapists do not. Two possible reasons are offered: (a) lack of access to reliable outcome feedback and (b) use of inappropriate information-processing strategies. We do not disagree with either the authors' assessment of the expertise of individual psychotherapists or their reasoning as to why. In the past two decades, however, new insights have emerged on expertise in various domains, including psychotherapy. In particular, we have developed a general, relativistic perspective on expertise that invokes performance-based criteria (Weiss & Shanteau, 2003, 2014). In this commentary, we wish to highlight three distinctions that have emerged from recent research on expertise.

Diagnosis Versus Treatment

Psychotherapists in particular and medical practitioners in general engage in two levels of decision making. Diagnosis, a purely judgmental task, is challenging because there are hundreds of possible conditions described in the 947 pages of the *DSM-5* (American Psychiatric Association, 2013). Diagnosis is what is usually examined in expertise studies. Treatment involves not only judgment but also the additional skills needed for implementation. For treatment, however, there are far fewer options (Shanteau, Edwards, & Weiss, 2009).

For the patient's well-being, the key is to select a therapy that works regardless of the diagnosis. It is analogous to medical doctors telling a feverish patient with an unknown ailment to "take two aspirin and call me in the morning" because that remedy often works. Effectiveness of treatment is often independent of accuracy of diagnosis. Expertise is highly task specific; a practitioner could be good at diagnosis and weak on treatment, or vice-versa.

Individual Versus Domain Expertise

Hammond (1996) argued for two types of criteria for assessing judgmental competence: *Coherence* refers to agreement with a theory. *Correspondence* refers to agreement with an external reality. "Modern scientific reasoning advocates using both coherence in the form of rationalism and correspondence in the form of empiricism" (Dunwoody, 2009, p. 117).

Applied to expertise, correspondence is a sufficient condition for establishing the credibility of individual experts. For many domains in which experts work, unfortunately, correct answers are seldom known (at least in a timely fashion). In particular, for psychotherapy, outcomes are delayed and often distorted (Tracey et al., 2014). In such situations, we have argued for assessment using a coherence criterion that is built on two necessary conditions for expert judgment (Weiss, Shanteau, & Harries, 2006).

Most of our recent research on expertise uses an index, the CWS (Cochran-Weiss-Shanteau), which incorporates two abilities: discrimination and consistency (Weiss & Shanteau, 2003). To be effective,

an expert must be able to discriminate between cases in a consistent fashion. Our research reveals that length of experience rarely predicts expertise except during the early period of training. Using the CWS criterion, experienced counselors were able to diagnose depression better than novices; however, master's-level students were even better (Witteman, Weiss, & Metzmacher, 2012). This pattern has been repeatedly observed across domains. Experts do not necessarily keep improving with experience. From our current performance-based perspective, experience and improvement over time are both irrelevant to determining extent of expertise.

We suggest that coherence criteria can be applied at the individual level, whereas correspondence criteria can be applied at the domain level. Thus, individual therapists may or may not demonstrate expertise in diagnosis and treatment. The key questions are (a) Can the therapist consistently diagnose according to recommended guidelines? and (b) Can the therapist identify and apply the requisite treatment?

Whether the diagnoses and treatments that constitute the collective wisdom of the field produce better health outcomes is a different question. The evidence cited by Tracey et al. (2014) suggests that psychotherapy, as a whole, does possess expertise. The expertise of a field progresses as more effective procedures are developed, where effectiveness is assessed by correspondence criteria.

Consider two purported experts, one in medicine and one in astrology. If the doctor and astrologer both follow conventional practice, then they have demonstrated individual expertise; they have correctly followed the standards of their fields. It is a separate question whether following those procedures produces useful results; medicine usually does, astrology usually does not.

Outcome Versus Process

Ward Edwards, founder of research on decision making, highlighted a vital distinction between decision-making process and decision outcome. The former refers to what the decision maker actually does, whereas the latter depends on factors often unrelated to the decision, including environmental influences and chance occurrences (Vlek, 1984).

Tracey et al. (2014) recognized this distinction, although they related process to psychotherapeutic protocol. We concur with Edwards and colleagues (Vlek, 1984) that process depends on internal weights and subjective values, along with processing rules.

Suppose a therapist processes the information about a patient appropriately but a bad outcome ensues because of external influences on the patient unrelated to therapy. We would regard this as positive evidence regarding the therapist's expertise even though the outcome was a "failure."

Conclusions

Research on expertise is providing important insights into many fields of study, including psychotherapy. Given the unstable environment of a psychotherapeutic encounter, it should not be surprising to find that therapists fail to meet the high standards set by experts in other fields such as weather forecasting. That is not the fault of the therapists; rather, it reflects the difficulty of psychotherapy.

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Supervision, a Nonelusive Component of Deliberate Practice Toward Expertise

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Tracey, Wampold, Lichtenberg, and Goodyear (April 2014) provided a thoughtful discussion regarding the difficulty of achieving expertise in psychotherapy and offered suggestions about approaches toward psychotherapeutic work that may increase expertise, including deliberate practice. While very helpful, these suggestions appear to neglect acknowledgement of one of the most widely used modes of improving practice and facilitating specific feedback regarding psychotherapeutic work: supervision. It could be argued that deliberate practice, and therefore expertise, is most effectively and efficiently advanced through supervision of psychotherapeutic work.

Deliberate practice, defined by the authors as "the explicit setting aside of private time to review one's behavior and outcome feedback, developing plans for improvement, and then following through on these" (Tracey et al., 2014, p. 225), is precisely what quality supervision accomplishes. It may be that integration of components which the authors emphasized as additionally important for the development of expertise, such as better quality outcome data, specific feedback on important components of psychotherapy, feedback relative to other professionals, a priori hypothesis testing, and disconfirmatory approaches, is only really feasible through the objectivity and accountability enabled by a supervisory process.

It is perhaps self-evident that without objectivity and accountability these processes cannot be effective in improving practice, and given the inherent bias and subjectivity of psychotherapy, the independent engagement of these processes to improve expertise is a significant challenge. Additionally, it may be particularly useful to consider the integration of these elements into supervision processes, as has been previously proposed in the supervi-

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