IDEA's Teaching Essentials: Quick, Sound Student Feedback



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Abstract

IDEA's Teaching Essentials (TE) is a useful tool for gathering student feedback on how frequently an instructor exhibits each of seven behaviors that correlate most highly with student perceptions of course and teaching excellence. TE is appropriate for instructors who desire quick, sound student feedback on (a) displaying personal interest in students and their learning, (b) finding ways to help students answer their own questions, (c) demonstrating the importance and significance of the subject matter, (d) making it clear how each topic fit into the course, (e) explaining course material clearly and concisely, (f) introducing stimulating ideas about the subject, and (g) inspiring students to set and achieve goals which really challenge them. TE's survey items are based on Chickering and Gamson's Seven Principles for Good Practice in Undergraduate Education (1987), and they align with Hativa's (2014) essential dimensions of effective teaching. Thus the instrument enjoys both empirical and theoretical support.

Keywords: Student ratings of teaching, student evaluations of teaching, course evaluations, college teaching

"Essentially, all models are wrong, but some are useful." —George Box

IDEA's <u>Teaching Essentials</u> (TE) is a 13-item studentratings-of-instruction (SRI) instrument used "to gather feedback from students to inform instructors about suggestions for making improvements" in teaching and courses (Benton & Li, 2015, p. 7). In this paper, I explain why TE was created, how it was developed, how it should be used, and the theory and research supporting it. But first, let's consider why instructors might want to use TE.

Why Use TE?

IDEA's current TE can be found in its entirety at https://www.ideaedu.org/Portals/0/Uploads/Docume nts/IDEA-

CL%20SRI%20Sample%20Instruments/Sample-SRI_teaching-essentials-updated-012419.pdf. The first, most obvious, advantage is TE's brevity. Most students can probably fill out a form with 12 closedended questions and one open-ended question in a few minutes (Hativa, 2014). Short forms are considered sufficient for summative evaluation as long as they include overall summary items and important general teaching behaviors, which TE does (Cashin & Downey, 1992; Hativa). Second, TE's choice of teaching behaviors is theoretically sound, because the selection is based on Chickering and Gamson's *Seven Principles for Good Practice in Undergraduate Education* (1987). Moreover, as I describe in a later

section of this paper, it aligns with a published model (Hativa) of the essential dimensions of effective teaching. Third, the seven teaching behaviors are the ones most highly correlated with student ratings of global measures of teaching and course excellence (Benton, Li, Brown, Guo, & Sullivan, 2015). Frequent use of these methods is positively correlated with average student ratings. Fourth, three of the items control for extraneous student characteristics that influence ratings-typical work habits, background preparation, and motivation to take the course. IDEA statistically adjusts overall summary scores based on student responses to those items, and thus instructors whose students have relatively poor background preparation, poor study skills, or little desire to take the course are not greatly disadvantaged. Fifth, the TE class report provides comparative scores for the overall IDEA database. institution, and discipline grouping. Instructors can thus see how their scores compare to college faculty in general, colleagues at their own institution, and other instructors in their academic field. Sixth, the feedback provided to instructors in the class report includes links to resources for improving their understanding and use of the teaching behaviors.

Why TE Was Created

TE was created in 2014 as a shorter alternative to IDEA's legacy SRI, the Diagnostic Form (DF), which at the time comprised 47 closed-ended items and one open-ended question. On the DF, students rated their progress on 12 learning objectives, their perception of how frequently the instructor exhibited each of 20 teaching behaviors, various student and course characteristics, and two global measures: "Overall, I rate this instructor an excellent teacher" and "Overall, I rate this course as excellent." Amid the ongoing transition from paper- and Web-based platforms to mobile devices, IDEA recognized the need for a shorter instrument. TE fulfilled that need by omitting the 12 learning objectives, along with several student and course characteristics, and retaining only the seven teaching behaviors most strongly correlated to the two global measures. TE remains a useful alternative to the DF's successor, Diagnostic Feedback, which comprises 41 items.

How TE Was Developed

In order to identify only those teaching behaviors that correlate most strongly with the two global measures. regression analyses were performed on aggregated student ratings collected from 490,333 classes in 342 institutions during the years 2002 through 2011 (Benton et al., 2015). Both private (63.7%) and public (36.3%) institutions as well as all major Carnegie classifications (i.e., associate, baccalaureate, master's, and doctoral) were represented. From the regression analyses, seven teaching methods emerged as most strongly correlated with student ratings of one or both of the two global measures that assess excellence of teaching and excellence of courses. The seven teaching behaviors and the two global measures, therefore, account for 9 of the 12 closed-ended TE items (Benton et al., 2015).

In addition to those nine items, three DF items that measure student characteristics were also retained because they were also highly correlated with the two global measures: "As a rule, I put forth more effort than other students on academic work" (work habits); "My background prepared me well for this course's requirements" (background preparation); and "I really wanted to take this course regardless of who taught it" (motivation). Finally, one open-ended question was included to capture students-written comments.

Advantages of TE

All seven TE teaching behaviors emphasize techniques that communicate information meaningfully to students. TE items ask students to rate their instructor on displaying personal interest in students and their learning, finding ways to help students answer their own questions, demonstrating the importance and significance of the subject matter, making it clear how each topic fit into the course, explaining course material clearly and concisely, introducing stimulating ideas about the subject, and inspiring students to set and achieve goals which really challenge them. These are behaviors that all instructors should strive for. A strength of TE is that because the regression analyses were conducted on IDEA's overall SRI database, the results are applicable across a wide variety of content domains and course levels. The database includes both undergraduate

and graduate courses across multiple subject-matter areas and various types of institutions. Furthermore, no meaningful differences are found in average class ratings for the 12 closed-ended questions between courses delivered face-to-face and online (Benton, Webster, Gross, & Pallett, 2010).

In addition to its broad applicability, TE can be administered at any point in the semester (to obtain student feedback on how to improve the present course) or at the end of the semester (to seek input on future modifications). Also, six of the seven teaching behaviors are found on IDEA's <u>Instant</u> <u>Feedback</u> (IF), a tool for collecting student perceptions immediately following a class session. Instructors may use IF as many times as they wish to gather formative feedback about changes they may need to make while the course is still in progress.

Limitations of TE

TE should not be used as the sole basis for decisions about whether an instructor is effective or ineffective, nor is it appropriate as the only source of information for students regarding whether a course is worth taking. No information is provided about student selfreported progress on relevant objectives (PRO), which IDEA considers its most valid indirect measure of student learning. Even more important, although TE contains the seven teaching behaviors that correlate most highly with ratings of its two global measures, the field of evaluation does not advocate a single best teaching model (Hativa, 2014; Svinicki & McKeachie, 2014). IDEA's Diagnostic Feedback is instead based on the assumption that those teaching methods that best serve one learning outcome may not necessarily serve others as well. The perspective that certain teaching methods are indispensible punishes instructors who use other successful strategies. As Hativa puts it, "We cannot claim that any set of behaviors constitutes a necessary-and-sufficient condition for clear teaching" (p. 33).

Theoretical and Empirical Support for the TE Model Although TE was not designed with a theoretical model in mind, it nonetheless aligns with demonstrated effective teaching practices. As mentioned previously, when the TE items were originally developed, IDEA based them on Chickering and Gamson's (1987) research on how teachers teach and students learn. The items also line up with Hativa's (2014) model of the dimensions of effective teaching, shown in Figure 1, in which I indicate how each TE item aligns with an element of Hativa's model.

General instructional skills						
Overall, I rate this instructor an excellent teacher.						
Overall, I rate this course as excellent.						
Cognitive dimension =			Affective dimension =			
communication of the material			interpersonal rapport			
Lesson clarity	Course and lesson organization	Engaging/interesting presentations	Interactions, questioning, and answering	Rapport with students		
Explained course	Made it clear how	Introduced	Found ways to help	Displayed a personal		
material clearly	each topic fit into	stimulating ideas	students answer their own	interest in students and		
and concisely	the course	about the subject	questions	their learning		
		Inspired students to set and achieve goals which really challenged them				
		Demonstrated the importance and significance of the subject matter				

Figure 1. Alignment of Hativa's dimensions of effective teaching with IDEA's TE.

After reviewing several factor analytic studies, Hativa proposed a three-tiered model, with general instructional skills at the top level, subordinated by two midlevel dimensions: cognitive and affective. The cognitive dimension, which concerns methods that instructors employ to meaningfully communicate subject matter, consists of three lower-level elements: lesson clarity, course and lesson organization, and engaging/interesting presentations. On the affective side, instruction is bolstered by the instructor's interpersonal characteristics: interactions, questioning, and answering, and rapport with students.

General Instructional Skills

TE's two global measures seem to fit within the top tier of Hativa's general instructional skills because they assess student perceptions of the general quality of teaching and the course. Neither global measure is strongly correlated with extraneous factors such as class size, instructor gender, or student perceptions of course difficulty (Benton & Li, 2015; Li & Benton, 2017). Even so, controversy exists regarding whether global measures should be used in student ratings instruments. Some believe that they should (e.g., d'Apollonia & Abrami, 1997; Benton et al., 2015; Cashin & Downey, 1992; Hativa, 2014), because they are highly correlated with widely accepted effective teaching behaviors, students' self-reported progress on important or essential learning objectives (Benton & Li), and multidimensional measures of teaching (Abrami, 2001; Hativa). In addition, faculty and administrators find global measures useful for decision making because they are easy to interpret (Beran, Violato, & Kline, 2005).

However, although there may be sufficient evidence for the validity of single-item global measures, these tend to exhibit lower reliability than do weighted averages of multiple items. If global measures are to be employed, Berk (2013) recommends using only those with reliability coefficients in at least the mid-.80s. Indeed, the reliability coefficients of both TE global measures meet this standard (Li et al., 2016). Students within the same class rating the same teacher are very consistent, and ratings for the same instructor across multiple courses are highly stable (Benton et al., 2015).

The TE Teaching Behaviors

When IDEA SRI was first created in 1969, the teaching behaviors were chosen with specific criteria in mind (Hoyt & Cashin, 1977). First, each behavior had to represent a meaningful teaching strategy in which college instructors' performance might vary. It was assumed that instructors would differ, for example, in their capacity to display personal interest in students. Second, only strategies for which there was substantial evidence of effectiveness were selected. Educators and researchers had long known, for instance, that lesson clarity and subject-matter relevance were important hallmarks of successful instruction. Third, each method had to be described in specific enough terms that instructors could alter precise behaviors. Rather than just saying, "The instructor set goals for the course," the pertinent SRI item specifically states, "Inspired students to set and achieve goals which really challenged them." Instructors thus know that they must first inspire students to set goals and then assess whether or not students achieve them. Moreover, the goal must be challenging enough to motivate students to pursue it.

With these aims in mind, the teaching behaviors assessed in TE were developed in multiple phases across three decades, as shown in Table 1. Two items first appeared in 1969, with one modified to its current form in 1972 and the other in 1988. Four more were added in 1972, with two undergoing slight changes in wording in 1988. Finally, one item was added in 1988.

Table 1Progression in Wording of TE Items Across Time

1969	1972	1988
 He explained course material clearly, and explanations were to the point He introduced stimulating ideas about the subject 	 Explained course material clearly, and explanations were to the point Introduced stimulating ideas about the subject Displayed a personal interest in me and my learning Found ways to help students answer their own questions Demonstrated the importance and significance of his subject matter Made it clear how each topic fit into the course 	 Explained course material clearly and concisely Introduced stimulating ideas about the subject Displayed a personal interest in students and their learning Found ways to help students answer their own questions Demonstrated the importance and significance of the subject matter Made it clear how each topic fit into the course Inspired students to set and achieve goals which really challenged them

Table 2 presents two reliability coefficients for each item. The first is the within-group reliability coefficient, which measures consistency in ratings at the class level. All coefficients are high, which indicates that students within the same class are very consistent in their ratings (Li et al., 2016). The second is the interclass reliability coefficient, which measures consistency in ratings for the same instructor across multiple courses. All coefficients are above .90 when at least four classes have been rated, which demonstrates very high stability (Benton et al., 2015). Table 3 shows which of TE's seven teaching behaviors are significantly related to each of the two global measures, along with their correlation coefficients.

Table 2

Within-Group Reliability Coefficients and Interclass Reliability Coefficients for TE Closed-Ended Items

Reliability coefficient					
Item	Within same class ^a	Same instructor across courses ^b			
Displayed a personal interest in students and their learning	.89	.90			
Found ways to help students answer their own questions	.88	.90			
Demonstrated the importance and significance of the subject matter	.91	.89			
Made it clear how each topic fit into the course	.81	.89			
Explained course material clearly and concisely	.84	.90			
Introduced stimulating ideas about the subject	.87	.89			
Inspired students to set and achieve goals which really challenged them	.85	.89			

^aWithin-group reliability coefficient. ^bInterclass reliability coefficient.

Table 3
TE Items Related to Global Measures

	Global measure		
Teaching behavior category	Excellence of instructor	Excellence of course	
Lesson clarity	Explained course material clearly and concisely (<i>r</i> = .90)	Explained course material clearly and concisely (<i>r</i> = .80)	
Course and lesson organization		Made it clear how each topic fit into the course $(r = .81)$	
Engaging/interesting presentations	Introduced stimulating ideas about the subject (<i>r</i> = .84)	Introduced stimulating ideas about the subject (r = .83) Inspired students to set and achieve goals which really challenged them (r = .76) Demonstrated the importance and significance of the subject matter $(r = .80)$	
Interactions, questioning, and answering	Found ways to help students answer their own questions (r = .78)		
Rapport with students	Displayed personal interest in students and their learning (<i>r</i> = .85)		

Cognitive Dimension

Two elements of Hativa's cognitive dimension aid students' storage and recall of information in memory—lesson clarity and course and lesson organization. Lesson clarity, which helps students fully understand the subject matter, is assessed with the TE item "Explained course material clearly and concisely." Course and lesson organization is important because it helps students make connections among new pieces of information, thus providing a structure to facilitate retrieval (Kiewra, 2012). The corresponding TE item related to organization is "Made it clear how each topic fit into the course."

Lesson clarity: "Explained course material clearly and

concisely. "Lesson clarity, which has been the subject of substantial research in the field of education (e.g., Chesebro, 2003; Hativa, Barak, & Simhi, 2001), is the process of "communicating subject matter to students in a way that makes the content intelligible and thus enables their learning" (Sorcinelli, n.d.). Its importance is demonstrated by the positive correlation between student ratings of instructor clarity and exam performance (Beleche, Fairris, & Marks, 2012). Several teacher behaviors have been associated with clarity, such as explaining course goals and requirements, teaching in an organized manner, using examples or illustrations to explain difficult material (Ribera, BrckaLorenz, Cole, & Laird, 2012), previewing the main ideas of a presentation for students, creating links between the current and next topic, reviewing previously discussed content, and providing skeletal notes for student note taking (Chesebro).

Student ratings of clarity (i.e., how well the instructor "explained course material clearly and concisely") are the most important predictor of high ratings on excellence of the teacher and the second most important on excellence of the course, regardless of class size (Benton et al., 2015). Thus, consistent with previous research (Pascarella & Blaich, 2013), clarity remains an essential quality of effective instruction. For specific suggestions on how to explain course content so that students understand it, see Sorcinelli (n.d.)

Course and lesson organization: "Made it clear how each topic fit into the course." As shown in Table 2, student ratings of course and lesson organization are significantly and positively correlated with ratings of excellence of the course (Benton et al., 2015). A welldesigned course provides students with a bird's-eye view so that they get the big picture, which helps them connect new information with prior knowledge (Hardiman, 2003). More specifically, as the relevant TE item indicates, they need to know "how each topic fit[s] into the course." One means for communicating topic fit is to provide an organized syllabus (Svinicki & McKeachie, 2014). A well-thought-out syllabus "can serve as a cognitive map and learning tool for students" that provides them "with a visual layout of the course" (Richmond, 2016, p. 2). In contrast, a hurriedly and poorly designed syllabus may convey, rightly or wrongly, an instructor's lack of concern about whether or not students learn. Providing a learner-centered syllabus (Richmond, p. 2) enables students to track their journeys through the course and ultimately understand what they must do to succeed. To read more about how college teachers can effectively structure and connect course content, see Theall (n.d.a).

Engaging/interesting presentations: "Introduced stimulating ideas about the subject." Introducing stimulating ideas about the subject intensifies both

student engagement and interest, because activities that enhance one also affect the other (Renninger & Hidi, 2011). For example, when a chemistry instructor asks students to make predictions about the colors that will appear when two chemicals are combined, it captures students' interest but also engages them in analyzing the chemical combinations. Students who indicate that their instructors frequently introduce stimulating ideas about the subject also tend to rate them highly on both overall teaching excellence and quality of the course (Benton et al., 2015). In fact, this behavior is the most important predictor of ratings of course excellence. Students who are engaged and interested in the lesson are more likely to be attentive, which helps them hold to-be-learned information temporarily in working memory (Hidi & Renninger, 2006). More about this important teaching behavior can be found in Theall (n.d.b)

Engaging/interesting presentations: "Inspired students to set and achieve goals which really challenged them." Another aspect of making engaging and interesting presentations is inspiring students to set and achieve challenging goals. When students report that their instructor frequently inspires them to set and achieve goals that really challenge them, they tend to assign higher ratings on excellence of the course (Benton et al., 2015). Setting challenging goals for students can trigger interest in the subject matter and engage them in the content. However, how students respond to the goal ultimately determines whether or not they are motivated to achieve it (Dweck, 2006; Svinicki, 2016). If they are anxious about their performance relative to their classmates, the goal may inhibit them and lower their self-efficacy. The best approach is thus to foster in students a growth mind-set, which directs attention toward their own progress rather than toward how others are doing. Students soon discover that they can learn and better themselves with effort, which instills confidence and nurtures growth (Dweck). Todd Zakrajsek (n.d.) offers additional insight into creating learning environments where students set goals that really challenge them. IDEA Paper 59 (Svinicki) also offers good advice about how to motivate students to pursue such goals.

Engaging/interesting presentations: "Demonstrated the importance and significance of the subject

matter," The third element of making an engaging and interesting presentation involves demonstrating the importance and significance of the subject matter. This teaching behavior is positively correlated with students' overall impressions of the course, regardless of class size (Benton et al., 2015). To demonstrate importance, instructors can create expectancies, or beliefs, about the likelihood of success if certain content is learned (Svinicki, 2016). For example, they might have a former student explain how specific subject matter or skills helped them attain a paid position or achieve success in the workplace. They can also provide examples of realworld applications of the subject matter. Students are more likely to be interested in course content if they believe it has personal utility, or relevance to their own lives (Eccles & Wigfield, 2002).

Another way to demonstrate importance is to direct students to use the new information to accomplish a task (Durik & Harackiewicz, 2007). By using the knowledge to achieve or produce something, students find value. *Active learning strategies*, such as case studies, problem solving, and interacting with and asking questions of experts, make it possible for students to apply the material in a meaningful way. Finally, offering students choices of topics to write about, passages to read, or problems to solve makes learning meaningful and therefore more important (McClure & Theall, n.d.).

Affective Dimension

Moving from the cognitive to the affective side of Hativa's model (Figure 1) reveals strategies for building interpersonal rapport with students. Doing so keeps them motivated and eager to learn, factors that also influence how well they process information. One aspect involves teacher *interactions, questioning, and answering,* such as encouraging students to ask questions and express their viewpoints (Riggs & Linder, 2016). The corresponding TE item is "Found ways to help students answer their own questions." The second element of the affective dimension speaks to the importance of building *rapport with students.* Teachers create rapport by being available, communicating strong interest in students' learning, and connecting interpersonally (Barr, 2016). The relevant TE item is "Displayed a personal interest in students and their learning."

Interactions, questioning, and answering. "Found ways to help students answer their own questions." The constructivist view of human memory holds that students actually create knowledge and understanding of the world in a way that makes sense to them, through their interaction with it and through their own experiences rather than from only a teacher's presentation (Bransford & Franks, 1971; Meyer, 2009). This perspective envisions learning and development as dynamic processes, requiring students to actively link new observations to the knowledge they already have. One means for fostering such active learning is to find ways to help students answer their own questions, and student ratings of how frequently the instructor exhibits this behavior are positively correlated with overall ratings of the excellence of the instructor, regardless of class size (Benton et al., 2015).

When students pursue their own inquiries, course content becomes not the end goal of education but rather a means to the end of knowing how to ask the right questions, find the answers, and draw conclusions (Weimer, 2010). By searching for answers, students develop strategies for learning how to learn. In truth, throughout their lives, students will more readily retrieve the learning strategies developed in college than they will specific subjectmatter knowledge (Weimer, 2010). The instructor's goal thus becomes one of helping students become lifelong learners rather than making sure all relevant course content is covered. In that way, students become autonomous, self-regulated learners who detect when they have answered questions thoroughly enough (Weimer, 2002). Additional information about finding ways to help students thoroughly answer their own questions can be found in McClure and McWilliams (n.d.).

Rapport with students: "Displayed personal interest in students and their learning." Student ratings of how frequently the instructor displays personal interest are

positively correlated with overall ratings of teaching excellence, regardless of class size (Benton et al., 2015).

The association between displaying personal interest and excellence in teaching is consistent with findings from Gallup's 2013 Student Poll of 30,000 adults. When asked to describe characteristics of the best teacher they ever had, the most common response from adults was "caring" (Busteed, 2014). Among college graduates, those who perceived emotional support in college were twice as likely as those who did not to be engaged and successful in their chosen careers. Graduates perceived emotional support when a professor had instilled excitement about learning and cared about them.

When instructors display enthusiasm about learning and express warmth and empathy, students are, in general, more motivated (Wilson, Ryan, & Pugh, 2010) and attain higher levels of achievement (Wilson & Ryan, 2013). However, not all students respond the same way when an instructor takes a personal interest in their learning; reactions may vary depending upon trust levels and cultural differences. Nonetheless, instructors must be encouraging and positive toward students, regardless of their culture and gender (Svinicki & McKeachie, 2014). More information about building rapport can be found in Fleming (2003) and Barr (2016).

Conclusion

IDEA's Teaching Essentials is a quick and sound way of gathering student feedback about how frequently the instructor exhibits each of the seven teacherrelated behaviors most highly correlated with student perceptions of teaching excellence and course excellence. The instrument enjoys both theoretical and empirical support. Instructors seeking input on employing these behaviors in the service of lesson clarity, course organization, student engagement and interest, student questioning and interaction, and teacher-student rapport should consider adopting it as a useful student ratings instrument.

Author Biography

Steve Benton is Senior Research Officer at the IDEA Center where, since 2008, he has led a research team that designs and conducts reliability and validity studies for IDEA products. He received his PhD in Psychological and Cultural Studies at the University of Nebraska–Lincoln in 1983. He is a Fellow in the American Psychological Association and the American Educational Research Association, as well as an Emeritus Professor and former Chair of Special Education, Counseling, and Student Affairs at Kansas State University, where he served for 25 years. His current research focuses on best practices in faculty development and evaluation.

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