



Linking Engaged Learning, Student Mental Health and Well-being, and Civic Development: A Review of the Literature

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EXECUTIVE OVERVIEW

A growing number of colleges and universities are endorsing the realization of students' full potential – including their well-being and civic development – as central to the mission of higher education. Concurrently, depression and substance abuse have reached crisis levels on the college campus, spurring calls for institutions to develop campus-wide, community-level prevention strategies in response. The Bringing Theory to Practice Project asks whether and how engaged learning, an emergent wave of curricular reform, might both advance the holistic mission of higher education and constitute a strategy for addressing depression and substance abuse on campus. To this end, the present review examines both theoretical and research bases for linking engaged learning, student mental health and well-being, and civic development.

Defining Engaged Learning

Rather than being concretely defined in the literature, the concept of *engaged learning* emerges from multiple theoretical frameworks, academic disciplines, and educational practices. This has resulted in substantial confusion, and in some cases overlap, of terminology in the literature. Thus, a necessary first step is to provide a taxonomy of meaning for engaged learning, which can be accomplished by examining the two concepts of which it is comprised – *learning* and *engagement* – as follows:

• *Learning in college*. From the perspectives of cognitive-structural theory, adult and experiential theory, and psychosocial development theory, optimal learning in college can be conceptualized as involving: increasing cognitive complexity; active processes that are

- integrative of experience and reflection; and multiple domains of self as loci for learning and development.
- Student Engagement. Two distinct perspectives of engagement are evident in the literature. The first, an *involvement perspective*, views student engagement as a function of the effort and activity of students in their learning, as well as the college environment's encouragement of such involvement. The second, a *civic engagement perspective*, views students as developing citizenship capacities necessary for participatory democracy as well as becoming responsible members of community. The use of the term "engagement" by both perspectives but to describe very different types of learning is a considerable source of confusion in the literature as well as in practice, which is further compounded by the growing popularity of the term in higher education.

Although the current state of the literature does not provide a unifying definition of engaged learning, these perspectives of learning and student engagement in college provide starting points for such a definition. In particular, further conceptual work is needed to delineate these two divergent perspectives of engagement that nonetheless use the same terminology. Such conceptual work can help provide a shared framework and language from which further theory, research and practice can proceed.

Pedagogies of Engagement

Specific forms of engaged learning, described as "pedagogies of engagement" in the literature, all share the assumption that knowledge is co-constructed by communities of teachers and learners (Palmer 1998). This is in opposition to the traditional view in the academy, in which knowledge – comprised of static information – is transmitted by expert faculty to novice students. As identified by Edgerton (1997) and Colby et al. (2003), there are four major "strands"

of engaged pedagogy in higher education practice, though particular formulations vary from campus to campus. These strands are:

- service-learning, which combines volunteer experience in the community with academic coursework and structured reflection;
- *community-based research*, which involves faculty, students, and community members in joint research to solve community problems;
- collaborative learning, which actively engages students in learning from peers, as well as faculty; and
- problem-based learning, which structures students' learning around the study of complex, real-world problems.

In addition, several forms of engaged learning are described in the literature that do not correspond fully to these strands. These include intergroup dialogue, co-curricular service, internship and practicum experiences, interdisciplinary team teaching, learning communities, and partnerships between academic and student affairs.

Despite research that points to the effectiveness of these approaches as compared with traditional teaching methods, forms of engaged learning remain counternormative in higher education. This suggests that rather than increasing the amount of engaged learning experiences across higher education, a more fundamental transformation in the way faculty "teach" and students "learn" in higher education is needed. By shifting engaged pedagogy and its philosophical base from the periphery to the center of these activities, institutions move toward establishing *cultures of engagement* that can harness the full promise of engaged learning.

Linkages with Mental Health and Well-being

Mental health and well-being are complex constructs that encompass individuals'

abilities to value their self-worth, realize their potential, cope with stress, work productively, relate positively with others, make healthy decisions, and contribute to community. The breadth of these definitions makes mental health and well-being particularly difficult to operationalize in research. In addressing this problem, the Bringing Theory to Practice Project has chosen to focus its efforts on two issues – depression and substance abuse – that both significantly contribute to students' mental health and well-being and are pressing concerns on the college campus.

The question then becomes what linkages are known to exist between engaged learning and these issues. No instances were found in the literature where engaged learning was identified as a specific means of addressing depression or substance abuse on the college campus.

However, there is preliminary evidence in the literature for considering engaged learning as one approach to these issues. Such possible linkages fall into two categories: those that have some basis in research, but need additional exploration and confirmation; and those that are suggested by the literature, but at present remain theoretical in nature. Linkages that are based in existing research but need further study are:

• Findings from Involvement Measures. Astin (1993) reports that elements of engaged learning (e.g., involvement in group projects and interaction with faculty) are correlated with self-report items like better emotional health and reduced drinking behaviors. Sax, Bryant and Gilmartin (2002) conclude that students' engagement in academic experiences is "not unrelated" (20) to emotional well-being. Wechsler et al. (1995), Jessor et al. (1995), and Fenzel (2005) all describe a correlation between student participation in pro-social activities like community service and lower rates of heavy drinking. For all of these studies, however, causal relationships cannot be fully ascertained between engaged learning and emotional health and related behaviors.

• Stress in Academic Environments. Research has demonstrated that while moderate levels of environmental stress can lead to optimal performance, extreme levels of stress can inhibit learning as well as negatively affect students' emotional health and behavior. From this perspective, engaged learning that facilitates optimal levels of stress in students' experiences may, in turn, potentially reduce mental health problems arising from excessive levels of academic stress.

Additionally, two theoretical linkages suggested by the literature – that will require further research to explore and potentially establish their validity – are:

- Developmental Challenge and Support. One perspective in the literature holds that both depression and substance abuse can result from developmental overchallenge posed by the college environment. Developmental theory posits that such challenges must be counterbalanced with environmental supports, and forms of engaged learning may theoretically provide one such support in students' learning experiences.
- Moral Development and Personal and Social Responsibility. There is some evidence in the literature that students' level of moral development is negatively correlated with substance abuse and other self-injurious behaviors. Theoretically, therefore, learning experiences which promote moral development may help to reduce these behaviors. Forms of engaged learning (e.g., service-learning and community-based research) might do so by requiring students to think more complexly about moral issues and their own behavior, and by providing opportunities for students to craft identities as moral individuals responsible both to self and to larger communities.

Despite these potential linkages, it is unlikely that engaged learning will constitute a "silver bullet" for either depression or substance abuse, given the complex causes and risk factors –

along with the relative lack of success of existing prevention approaches – for both. However, current prevention literature recommends a shift from intervention targeted at specific behaviors toward community-level approaches in addressing students' mental health concerns. There is enough preliminary evidence – as well as theoretical suggestion – in the literature to warrant examination of engaged learning as one such possible approach.

Methodological Perspectives

It is clear that further research is needed to explore possible linkages between engaged learning, mental health and well-being, and civic development. There are several important issues to consider in researching these linkages, however, as such research is likely to be:

- *Multivariate*, in that these linkages involve complex interactions between many variables in students' identities, experiences, and behaviors, and therefore single administration of univariate instruments cannot adequately capture these interactions or support causal inferences;
- *Time-sensitive*, in that such research is subject both to maturation that normally occurs during young adulthood, as well as to the limited timeframe of most forms of engaged learning (e.g., a program that lasts only a semester may have a limited effect on students, and any such effects may extend beyond the experience well into the future); and
- *Contextual*, in that such research must account for both the contexts of students' lives (e.g., past history and mental health concerns, as well as concurrent life events and stressors) and the context of individual forms of engaged learning (which vary widely in their formulation and thus resist generalization of findings).

Taken together, these considerations suggest that generative research designs for exploring potential linkages would be: *multivariate*, by addressing multiple domains through both

quantitative and more in-depth qualitative methods; *longitudinal*, by involving more extensive data collection beyond a simple pre-test/post-test design immediately before and after the experience; and *quasi-experimental*, by using an adequate control or comparison group where at all possible. A first step in advancing this type of research might be to develop a central location – such as a clearinghouse – for a wide range of instruments, which could then be sampled, tested, and reviewed by researchers for their effectiveness.

In addition to research, assessment efforts – whether at the program or course level, or campus-wide – provide opportunities for exploring linkages between engaged learning, student mental health and well-being, and civic development. Both those responsible for specific forms of engaged learning and those in charge of campus-wide assessment should consider building related objectives and assessment measures into such efforts.

Concluding Recommendations

Given the lack of conclusion in the literature as to linkages between engaged learning, student mental health and well-being, and civic development, advancing inquiry along these lines will require the following:

- *interdisciplinary dialogue* that convenes those who address mental health issues (e.g., counseling center staff, prevention staff, psychological researchers) and those concerned with engaged learning and civic development (e.g., faculty, service-learning coordinators, centers for teaching and learning staff) to share perspectives, insights, and possibilities for linking their work;
- inviting and engaging students in this dialogue, as they are the most important stakeholders in any discussion of their learning, engagement in the community, and mental health and well-being;

- broad and meaningful commitments from institutions and higher education as a whole, to develop meaningful and enduring partnerships among constituencies, to devote sufficient resources (whether staff, funding, or time) necessary for complex research adequate to exploring these linkages, and to give priority to such linkages amidst an already crowded educational and research agenda; and
- a community perspective called for by the literature as a whole, whether in relation to the
 most important goals of higher education (engaging students in their learning and in
 community) or the most pressing concerns (prevention efforts for depression and
 substance abuse) on the college campus.

Many questions remain about linkages between engaged learning, student mental health and well-being, and civic development. However, there is sufficient basis in the literature to support further investigation of these linkages. There is also ample consensus that a community approach is a starting point for research exploring these questions, as well as a potential means of addressing them in higher education practice.

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Introduction

In College of the Overwhelmed: The Campus Mental Health Crisis and What to Do About It, Kadison and DiGeronimo (2004) inform readers of the "extraordinary increase in serious mental illness" on the college campus:

If your son or daughter is in college, the chances are almost one in two that he or she will become depressed to the point of being unable to function; one in two that he or she will have regular episodes of binge drinking (with the resulting significant risk of dangerous consequences such as sexual assault and car accidents); and one in ten that he or she will seriously consider suicide. In fact, since 1988, the likelihood of a college student's suffering depression has doubled, suicidal ideation has tripled, and sexual assaults have quadrupled. The information on student mental health... is shocking – yet it is the elephant in the room that no one is talking about (1).

The authors, who describe this campus crisis thoroughly and compellingly in their book, propose solutions that primarily involve expanding mental health services or increasing students' and parents' awareness of mental health issues. While they make valuable suggestions for services that are vital to students' well-being and safety, their focus on just one area of the college – the campus counseling center – hints at a widely-held perspective on the college campus: that students' mental health problems are of concern only to those qualified to address them in clinical settings. It is easy to understand, therefore, why few people outside of the counseling center – such as faculty, administrators, and other educators on campus – would fail to talk about a student crisis for which they believed there was nothing they could do.

And yet, concurrent to the rise of this campus mental health crisis, a transformation of the mission, purpose, and pedagogy of higher education – though still in the early stages – has led precisely to such talk. With expanding research on students' involvement and experiences, the validity of academic knowledge as the singular locus of change during college has been called into question. Issues of student retention and persistence have resulted in conceptualizing the

campus as a community of learners, in which students must be better connected to each other, to faculty, and to society as a whole. Criticisms leveled at the quality of college degrees have led to questions about how colleges create – or fail to create – environments conducive for the best kinds of learning, which in turn has sparked new ways of thinking about how to educate and engage students. When taken together, these changes have led to fundamental questions about the purpose of a college education.

Most institutions, upon re-examining their mission statements, find that their goals address not only intellectual aims, but also the whole development of students as well as the realization of their full potential – both of which encompass students' mental health and well-being. Institutions also identify goals related to students' becoming productive, responsible members of the larger communities to which they will belong – which likewise pertain to students' civic development. It is against this backdrop that the question arises of how *engaged learning*, a central facet of curricular reform in higher education, may be related to both of these goals.

Some important conceptual groundwork must be laid before this question can be answered. First, an understanding of what is meant by the term *engaged learning* is needed. Thus, Part I of the present review *–Theoretical Perspectives of Engaged Learning* – examines which conceptual frameworks are useful in understanding engaged learning in higher education, as well as what strands of meaning in the literature can be identified for the term. Part II of the review *–Pedagogies of Engagement* – expands on this conceptual work by describing the actual forms engaged learning may take in practice.

Part III of the review – *Linkages with Mental Health and Well-being* – begins by defining these two broad concepts, as well as examining depression and substance abuse as issues of

pressing concern that can also be effectively operationalized through research. This section then reviews the currently limited evidence in higher education research for connections between engaged learning, student mental health and well-being, and civic development. Additionally, theoretical connections suggested by the literature – but that are largely unexplored through research – are discussed. Finally, Part IV of the review – *Methodological Perspectives* – considers important issues for future research on potential linkages between engaged learning, student mental health and well-being, and civic development.

I. Theoretical Perspectives of Engaged Learning

In simplified grammatical terms, the compound phrase *engaged learning* is comprised of a noun modified by an adjective. At a basic level, comprehending such a phrase necessitates understanding the meanings of both the noun, *learning*, and the adjective, *engaged*. But it also entails understanding how the noun is delimited, qualified, or transformed by the adjective – in other words, how engaged learning is unique or different from other types of learning. It is apparent from this exercise that understanding the term engaged learning is not a simple task, but rather involves decoding the meaning of two separate words as well as the meaning at the intersection of those words.

This is no less true when considering what is meant by engaged learning in higher education. To this end – and to use this exercise again – a series of questions might be asked of the literature. First, what is known about college students' *learning* or, in other words, how is learning in college described or defined? Secondly, what happens when college students are *engaged*, or to invoke a related term more commonly used in the literature, what is meant by *engagement* in higher education? Finally, when these two concepts merge – when learning in college becomes engaged in nature – how is this kind of learning fundamentally distinct from other kinds of learning?

As the literature of higher education currently stands, these questions cannot be neatly or easily answered. Rather than being concretely defined, the concept of engaged learning emerges from the literature as a theme crisscrossing multiple theoretical frameworks, academic disciplines, and applied practices. Each of these various sources has its own language – or way of talking about engaged learning – and often different languages have disparate meanings for the

same term. The task of this first part of the review, then, is not only to work toward a description of what is meant by engaged learning in higher education, but also to delineate the relationships between individual languages from which such a description is culled. The following taxonomy has been developed from the literature and is detailed in this section of the review:

- Learning in college. Cognitive-structural theory, adult and experiential theory, and
 psychosocial development theory contribute to an understanding of learning in college.
 From these perspectives, optimal learning may be described a dynamic process that
 involves increasing cognitive complexity, an active process that is integrative of
 experience and reflection, and a holistic process that encompasses multiple domains of
 the self.
- Student Engagement. Two distinct perspectives of engagement are evident in the literature, and their common use of the term is a source of considerable confusion. The first, an *involvement perspective*, views student engagement as a function of the effort and activity of students in their learning, as well as the college environment's encouragement of such involvement. The second, a *civic engagement perspective*, views students as developing citizenship capacities necessary for participatory democracy as well as becoming responsible members of community. Although some pedagogical approaches such as service-learning tend to incorporate both definitions in their conceptual base and practice, there is little acknowledgement either in these approaches or the literature itself of these two distinct perspectives.

While the current state of the literature does not permit a unifying definition of engaged learning, the above perspectives of learning and student engagement in college provide starting points for such a definition. The most pressing conceptual work remaining is to resolve the confusion

resulting from the two distinct perspectives of engagement – that nonetheless use the same terminology – in the literature. Such resolution would advance the emergent view of engaged learning discussed in this section, and thereby provide a conceptual framework from which further theory, research and practice might proceed. With this overview in mind, the review now turns to the first area of the taxonomy: learning in college.

Learning in College

As one would expect, learning theory and research accounts for a tremendous proportion of educational literature. The concept of learning has been examined from a dizzying array of theoretical perspectives and orientations, and scholars have asked what learning means for almost every imaginable population and setting. Thus, it is helpful to begin the discussion of learning in college by noting which bodies of theory will *not* be examined by this review – in other words, to describe how this particular section of the review is delimited.

Specifically, the criteria of population, context, and saliency were employed in selecting literature for inclusion. First, a great deal of learning theory focuses solely on child development and, more importantly, assumes that learning (beyond continued accumulation of facts and information) essentially ceases after childhood or early adolescence. Only in recent years has there been recognition that learning and development continue into adulthood, with subsequent theory and research arising in the literature that describe what such processes may look like. While some of this literature has as its foundation theories of learning rooted in childhood (e.g., Piaget) and aims to extend these theories into later years, adult learning and development is described as distinct from that during childhood given adults' abilities, roles, and contexts. Thus, primacy in this review has been given to literature specific to young adults, which is most

germane for examining the experiences of college students. Secondly, preference has been accorded to literature that directly addresses the context of higher education; therefore, theories arising from cognitive science – which often, in positivist terms, separates the learner from the influence of specific contexts – and from other settings like K-12 education or the workplace have been excluded. Finally, the criterion of saliency serves to delimit the literature review. Saliency includes population and context, but goes beyond this to mean literature the field itself has deemed as particularly relevant to the question of engaged learning. To give a specific example, Kolb's (1984) model of experiential learning is cited as the conceptual framework for most pedagogical approaches involving concrete experience in college; thus, Kolb's work is of particular interest in both theory and practice in higher education, and therefore receives greater attention in this review.

Using these criteria, three conceptual frameworks – *cognitive-structural theory*, *adult and experiential learning theory*, and *psychosocial theory* – emerge as generative to the question of what is meant by learning in higher education. All three are relevant to the experiences of traditionally-aged college students, and additionally can be extended to the experience of non-traditional students (in particular, adult and experiential learning theory addresses how such students may learn in academic settings). All three are applicable to descriptions of learning in academic, postsecondary settings. Both cognitive-structural theory and adult and experiential learning theory serve as the theoretical bases for much of the discussion around engaged learning and pedagogy in higher education, and psychosocial theory informs not only the question of engaged learning in higher education, but also potential linkages between such learning and student mental health and well-being.

Cognitive-Structural Theory

Cognitive-structural theory provides an understanding of how students make meaning of both their learning and life experiences. Rather than broader theory that construes learning as a global cognitive function, this theoretical lens presents a framework for examining engaged learning in the situated context of higher education. Much of this theory not only developed through research with young adults, but also yielded valuable applications to educational practice at the college level. The work of Perry, Belenky et al., King and Kitchener, and Baxter Magolda examines students' conceptualizations of knowledge, self and contexts, and thereby provides a cognitive backdrop against and through which engaged learning may occur.

The Perry Scheme of Ethical and Intellectual Development

Among the first theorists to examine intellectual and ethical development during the college years, Perry (1999) identified nine developmental "positions" that "express the locus of a central tendency or dominance" (54) in students' ways of thinking and valuing. As students transition through these positions, they become more capable of recognizing and incorporating diverse perspectives into their worldviews and meaning making. In turn, students become capable of increasingly complex ways of thinking and knowing. The Perry scheme's nine positions are grouped into three segments, each consisting of three positions. According to Perry, in the first three positions "a person modifies an absolutistic right-wrong outlook to make room, in some minimal way, for that simple pluralism we have called Multiplicity" (65). In the next three positions, "a person accords the diversity of human outlook its full problematic stature, [and] next transmutes the simple pluralism of Multiplicity into contextual Relativism" (65). In the final three positions, the individual develops commitments to specific values, beliefs and lifestyles.

Subsequent research and application of the Perry scheme led Knefelkamp (1999) to assert that Positions 2, 3, 4, and 5 (Dualism, Early Multiplicity, Late Multiplicity, and Contextual Relativism, respectively) are the most applicable for examining development in the college years. Knefelkamp and Cornfeld (1979), in providing a detailed analysis of each of these four positions, explain that in Position 2, Dualism, students believe all knowledge is known and that there is definite "right" and "wrong" in the world. Students in this position rely on authorities – such as parents and clergy and, in the classroom, professors – as the absolute source of all knowledge. Students in this position generally seek to acquire and memorize knowledge transmitted by authorities, and are challenged by ambiguity and requests for their personal opinion or interpretation. In Position 3, Early Multiplicity, students believe that if something is not yet known, it can be discovered if the correct process or right way is used to find the answers. The role of authorities is therefore to demonstrate the right processes to find knowledge, and students often will view their role in the classroom as working diligently to apply these processes. In Position 4, Late Multiplicity, students come to believe that most things aren't known for sure or, in other words, they are certain that nothing is certain. As students view all opinions as equally valid and invalid, learning is often seen as a game; thus, they believe professors model the ways they want students to think, and winning the academic game by getting good grades means "giving professors what they want." Students in this position often value individualism and doing their "own thing." Finally, in Position 5, Contextual Relativism, students reject the existence of absolute truth, and instead come to see knowledge as contextual and constructed. In this position, "right" and "wrong" are contextually judged by "rules of adequacy" derived from sound thought processes. Students in this position value a diversity of opinions and experiences of others, and can shift from context to context, applying rules of

adequacy in each learning situation. Although capable of seeing complexity and comfortable with abstraction, students are challenged by the need to make commitments amid multiple and valid alternatives.

Rather than hierarchical progression along the Perry scheme, students are seen as typically in transition between multiple and simultaneous positions. In addition, students can opt for three "alternatives" to growth in "positions of deflection" (Perry 1999, 65): temporizing, or pausing growth for a year or longer; escape, or settling for a later position but denying its implications for growth; and retreat, or returning to earlier positions of development. Individuals can, however, emerge from these alternatives and resume the growth and maturation process.

Women's Ways of Knowing

Although research on Perry's model has been conducted with a wide range of populations, his theory was initially developed through research primarily with male students. Thus, Belenky et al. (1997) sought to expand Perry's work by examining the ways in which women uniquely think about their own knowledge. In *Women's Ways of Knowing: The Development of Self, Voice and Mind*, the authors describe "reconstructions of the Perry positions" (xiv) that seem to be more fully descriptive of women's experiences and meaning making. These reconstructions are represented in "five different perspectives from which women view reality and draw conclusions about truth, knowledge, and authority" (3): Silence; Received Knowledge; Subjective Knowledge; Procedural Knowledge; and Constructed Knowing.

The first perspective of Silence entails "an extreme in denial of self and in dependence on external authority for direction" (25), where these authorities are seen as all-knowing and all-powerful. The authors describe the second perspective of Received Knowledge as parallel to Perry's position of Dualism, in that "things are right or wrong, true or false, good or bad, black

or white" (37). People in this position unquestioningly receive and repeat knowledge communicated by external authorities. This is true of self-knowledge as well, as women often believe they "should devote themselves to the care and empowerment of others while remaining 'selfless'" (46). Women in this perspective often have difficulty dealing with ambiguity, as in the Perry scheme.

In the next perspective, Subjective Knowledge, a shift from external to internal ways of knowing and valuing begins to occur, as women come to view "truth as personal, private, and subjectively known or intuited" (54). While this perspective is still dualistic as women continue to believe in absolute right and wrong, "the fountain of truth simply has shifted locale. Truth now resides within the person..." (54) thereby making women "their own authorities" who are now capable of "self-definition" (54). In the fourth perspective, or Procedural Knowing, women view learning as being based on identifiable procedures and rules which they must master to gain knowledge, which itself is viewed as either impersonal and logical (separate knowing) or personal and empathetic (connected knowing). The authors draw parallels between separate knowing and the Perry scheme's position of Late Multiplicity, as women use reason to "construct arguments powerful enough to meet the standards of an impersonal authority" (101). In connected knowing, however, procedures for gaining knowledge arise out of "a need to understand the opinions of other people" (101).

Finally, in the perspective of Constructed Knowing, women come to view themselves as the creators of knowledge, which itself is understood to vary from context to context. According to the authors, women transition to this perspective as they work to "*integrate* knowledge that they felt intuitively was personally important with knowledge they had learned from others" (134). Thus, women experience a "weaving together" of reason and emotion and of "objective"

and subjective knowing" (134). This perspective is often achieved through "a period of intense self-reflection and self-analysis" (135) and is marked by a passion for learning and posing questions.

The Reflective Judgment Model

A third cognitive-structural theory of student development is that of Kitchener and King (1990), whose work has its theoretical grounding in that of Perry and Belenky et al. The authors' Reflective Judgment Model was developed through longitudinal studies of undergraduates, graduate students, and adults not involved in formal education. Not unlike Perry's positions or the perspectives of Belenky et al., King and Kitchener (1994) describe individuals as having a "lens" constructed of "assumptions about what and how something can be known" which, in turn, "shapes how individuals frame a problem and how they justify their beliefs about it in the face of uncertainty" (xvi). By categorizing the different lenses people employ on a developmental continuum, the Reflective Judgment Model "describes a developmental process... in the ways that people understand the process of knowing and in the corresponding ways that they justify their beliefs about ill-structured problems" (13).

King and Kitchener (1994) describe this developmental process in terms of seven "distinct sets of epistemic assumptions and concepts of justification" (xvi) organized into three major groupings: Pre-Reflective Thinking; Quasi-Reflective Thinking; and Reflective Thinking. Respectively, these groupings are similar to Perry's positions of Dualism, Multiplicity, and Contextual Relativism. In Pre-Reflective Thinking, encompassing the first three stages of the model, "knowledge is gained either by direct, personal observation or through the word of an authority figure... [and] is absolutely correct and certain" (16). In Quasi-Reflective Thinking, comprised of the fourth and fifth stages, students recognize that "ill-structured problems contain

elements of uncertainty . . . [but] are often at a loss when asked to solve ill-structured problems because they don't know how to deal with the inherent ambiguity of such problems" (16). In Reflective Thinking, which includes the last two stages of the model, students accept that "one's understanding of the world is not 'given' but must be actively constructed and that knowledge must be understood in relationship to the context in which it was generated" (17). According to the authors, reflective thinkers recognize "some interpretations or knowledge claims may be judged as more plausible than others. Thus, while absolute truth will never be ascertained with complete certainty, some views may be evaluated as more reasonable explanations" (17). Reflective thinkers use criteria for evaluating knowledge – similar to Perry's rules of adequacy – that include "conceptual soundness, coherence, degree of fit with the data, meaningfulness, usefulness, and parsimony" (17). Kitchener and King (1990) found through their research that later meaning perspectives are more likely to develop in the adult years, and such development is often linked to "participation in advanced education when individuals are involved in the creation of knowledge" (173-7).

Epistemological Reflection and Self-Authorship in College

Drawing on all of the aforementioned models and others, Baxter Magolda (1992) conducted a longitudinal study with college students that led to the development of her Model of Epistemological Reflection. The four stages of the model – Absolute Knowing, Transitional Knowing, Independent Knowing, and Contextual Knowing – bear many similarities to the progression described in the earlier models, but also elaborate on what Baxter Magolda describes as distinct "patterns" of knowing based on gender differences. Her most recent theoretical contribution, however, is a charting of the college years as a journey toward "self authorship." Baxter Magolda (2004) defines self-authorship as the "capacity to internally define a coherent

belief system and identity that coordinates mutual relations with others" (8), and places it at the nexus of epistemological, intrapersonal, and interpersonal development. Each of these developmental domains is itself charted along the route of *external formulas*, *crossroads*, and finally, *self-authorship* (13). In the *external formulas* phase of development, students are reliant on authorities for knowledge, unaware of their own values and identity, and dependent on others similar to them for affirmation and approval. As students transition through the *crossroads* phase, they become increasingly aware of the uncertainty of knowledge, their own values and identity, and the dependent nature of their relationships; in turn, this growing awareness leads students to begin to take responsibility for their knowledge, identity, and relationships. In the *self-authorship* phase, students come to view knowledge as contextual, craft their own values and identity, and engage in interdependent relationships.

The Language of Cognitive-Structural Theory

Each cognitive-structural theory described views development as the journey toward increasing complexity, whether in ways of making meaning, viewing self, or forming judgments. Imagined as a narrative of how learning occurs in college, students transitioning through Perry's positions toward greater cognitive complexity might first approach learning by memorizing facts, then by mastering learning processes, then by playing the academic game, then by negotiating contexts to judge the validity of arguments, and finally by forming lifelong commitments. Likewise, through the framework of Belenky et al., students might first rely on external authorities for all self-knowledge, then transition to seeing themselves as authorities, and finally integrate and reconstruct knowledge generated both external to and within the self. Similar developmental movement is also evident in the model of King and Kitchener, as students learn to comprehend and address the complexity inherent in ill-structured problems, and in

Baxter Magolda's model, where students develop a more complex sense of knowledge and self, and then ways of making meaning and being in the world.

Adult and Experiential Learning Theory

Like cognitive-structural theories of development, adult and experiential learning theory constitutes a generative framework for conceptualizing learning in college. Although the field of adult learning is inclusive of experiential learning theory, the term "adult and experiential learning theory" is used in this review to highlight the centrality of experiential learning to the pedagogy of engaged learning. Although this body of theory is not used as extensively in the literature to examine college students' experiences (largely due to its recent expansion as a field of thought and its broader focus that is inclusive of – but not delimited to – the college years), it has quickly become the foundation for what is often considered "engaged" pedagogy and innovation in higher education, such as service-learning, reflective practica, and community-based research. In particular, Kolb, Hutchings and Wutzdorff, Schön, Garvin, Mezirow, and Wenger each provide theories that have been widely used in framing engaged learning at the college level.

Kolb's Model of Experiential Learning

Based on the work of Dewey, Piaget, and Lewin, Kolb's (1984) model of experiential learning is one of the most commonly cited adult and experiential learning theories in the higher education literature. Kolb concurs with Dewey (1938) who, in his treatise on progressive education and the relationship between experience and education, explained that "the belief that all genuine education comes about through experience does not mean that all experiences are genuinely or equally educative. Experience and education cannot be directly equated to each

other" (25). Kolb likewise asserts that learning from experience is not automatic, but rather involves a cyclical process of experience, reflection, integration, and application of knowledge.

Kolb depicts this cycle in his structural model of experiential learning, which is conceptualized in the form of a "wheel" and involves the interplay between four key learning modes: concrete experience (CE); reflective observation (RO); abstract conceptualization (AC); and active experimentation (AE). The author describes students' learning through these modes:

They must be able to involve themselves fully, openly, and without bias in new experiences (CE). They must be able to reflect on and observe their experiences from many perspectives (RO). They must be able to create concepts that integrate their observations into logically sound theories (AC), and they must be able to use these theories to make decisions and solve problems (AE) (30).

Learning from experience thus hinges on the individual's ability to reflect on the experience, to integrate the experience into current understandings, to make new meanings and to put them into daily practice. This cycle of processing new events and integrating the resultant learning does not cease at a set point, however. Merriam and Caffarella (1999) explain that in Kolb's model, "Whatever action is taken in the final phase becomes another set of concrete experiences, which in turn can begin the experiential learning cycle again" (224). Thus, with each new experience, individuals are presented with an opportunity for new learning and an increased knowledge base with which to live – and continue to learn – in the world.

Kolb's model has been used not only as a means of conceptualizing experiential learning, but also as a scheme for understanding individual learning preferences, or "styles" (Kolb 1984, 1999). In this scheme, the four aspects of experiential learning (concrete experience, reflective observation, abstract conceptualization, and active experimentation) are arranged on a wheel that is subdivided into quadrants, each representing a preferred method of learning, or learning style. Kolb (1999) describes the four styles and their typical learning activities as follows: "divergers"

(quadrant bounded by concrete experience/reflective observation) value being imaginative, understanding others, and being open-minded; "assimilators" (quadrant bounded by reflective observation/abstract conceptualization) value creating models, defining problems, and developing theories; "convergers" (quadrant bounded by abstract conceptualization/active experimentation) value solving problems, making decisions, reasoning deductively, and being logical; and "accommodators" (quadrant bounded by active experimentation/concrete experience) value leading, taking risks, initiating, and being adaptable and practical (8).

In drawing parallels with the Perry scheme, Kolb describes a developmental process that underlies both the learning cycle and learning styles he describes. First, Kolb posits that individuals can engage in the learning cycle in more complex and integrated ways:

This process is marked by increasing complexity and relativism in dealing with the world and one's experience and by higher-level integrations of the dialectic conflicts among the four primary learning modes... At the highest stages of development, however, the adaptive commitment to learning and creativity produces a strong need for integration of the four adaptive modes (140).

This developmental dimension of the learning modes is also evident in the four learning styles: although individuals typically have a preferred style with which they approach learning activities, expanding one's repertoire of and facility with different styles can lead to more integrative ways of learning. As in the Perry scheme, this movement toward complexity and integration is not automatic; if individuals choose not to fully involve themselves in new concrete experiences, they may maintain their current worldview and limit their skill repertoires to learn from future experiences.

Integrating "Knowing" and "Doing"

Hutchings and Wutzdorff (1988) present a model of experiential learning similar to that of Kolb. They posit that "as students examine their own and others' learning, they invariably

uncover a process that includes several distinct (although not neatly sequential) stages" which are: observation; actual doing; reflection; trial and error; hypothesizing as to what does and doesn't work; and testing of theories through further experience (6-7). As with Kolb's model, once the cycle is complete, students' learning begins again with the first stage. Throughout this process, the authors claim that by anchoring learning to students' experiences, what "might otherwise seem to be arbitrary, abstract rules can thus be made into concrete personal knowledge with the authority of lived experience behind it" (11).

One of the most applicable aspects of this model in terms of understanding students' learning is the authors' view of the relationship between "knowing" a subject of study and actually "doing" the subject:

[At first] students tend to see knowing and doing as relatively discrete entities... knowing what is in the textbook seems to have little to do with speaking or writing assignments. With sustained effort across the curriculum, however, the dichotomy begins to break down. Students more readily begin to see the applications of the content they are learning. They can test the meaning of their knowledge as they are required to speak and write about it, to connect it to their own experience. In an upward spiral of closer and closer integration, knowing and doing come together in performance (9-10).

The authors depict this process in terms of a "bedspring" or spiral model, in which knowing and doing come closer together with each turn of the spiral. Hutchings and Wutzdorff give the example of a biology student who comes to understand photosynthesis not only as an abstract concept, but also as a concrete process through experience with lab experiments. Through a "dialectical" (8) process between knowing and experience, the student thus comes to integrate this learning into more complex and complete understandings.

Reflection-in-Action

Schön's (1987) theory of adult and experiential learning also views adults' experience as playing a key role in learning, but unlike other theorists, Schön asserts that individuals do not

learn best when reflection and action occur in a cyclical or alternating pattern. Rather, he claims that for optimal learning, reflection and action should happen simultaneously in learning environments. When this type of "reflection-in-action" occurs, students' learning "goes beyond stable rules not only by devising new methods of reasoning... but also by constructing and testing new categories of understanding, strategies of action, and ways of framing problems" (39). Ultimately, through reflection-in-action, students can "make new sense of uncertain, unique or conflicted situations of practice" and realize that neither "knowledge fits every case nor that every problem has a right answer" (40).

Garvin (2000) concurs with Schön's view and states that "for all their power, reflection and review processes have an important weakness: they take place after the fact..." (117). This learning scenario is problematic, according to the Garvin, because "immediate applications are often hard to find, and opportunities for practice are limited... [thus] the lessons of experience are easily lost" (117). Garvin presents a different model of experiential learning, entitled "action learning" (117), in which action and reflection occur simultaneously:

The goal remains the same – to develop practical, applied knowledge by drawing on experience – but with an important twist. Reflection and action are now intimately intertwined... learning is more proactive than in the typical review process, combining three elements: an introduction to relevant concepts, theories, and tools; a carefully selected problem or simulation to test and apply new knowledge; and a process that includes pauses along the way to evaluate progress, share learnings, and make midcourse corrections (117).

According to Garvin, this method of learning is more authentic in that it closely mirrors an actual practice situation; students must make real-time decisions while considering applicable theories of action, utilizing problem-solving resources, and evaluating decisions in vivo.

A key feature of Garvin's theory of action learning is experimentation. Unlike observation, which is passive, experimentation is more of an "intrusive activity" (141), in which

individuals learn in an active learning environment that has changing conditions as its central feature. Learning through experimentation produces more true-to-life experiences from which learners can garner important insights and information about the actual environments in which they will be practicing. This kind of learning, according to Garvin, is "deep" rather than "superficial" in nature:

Such efforts are designed to produce deep understanding, not superficial knowledge. At its simplest, the distinction is between knowing how things are done and knowing why they occur. Knowing how is partial knowledge; it is rooted in norms of behavior, standards of practice, and settings of equipment. Knowing why is more fundamental; it captures underlying cause-and-effect relationships and accommodates exceptions, adaptations, and unforeseen events (143).

Thus, action learning has the potential to produce deeper – or more significant – learning experiences for students, if they are given the opportunity for experimentation in active and authentic learning environments.

Transformative Learning

In addition to involving experience, action, and reflection, adult learning – as described by Mezirow (1991) – has the potential to be "transformative." Mezirow's (1991) theory of transformational learning focuses on how adults come to question their previously "uncritically assimilated habits of expectation or meaning perspectives" (4) through which they understand and act in the world. According to Mezirow, a key process in learning is "overcoming limited, distorted, and arbitrarily selective modes of perception and cognition through reflection on assumptions" (5). As adults experience this type of "reflective learning," the ways in which they make meaning can be fundamentally transformed:

Reflective learning involves assessment or reassessment of assumptions. Reflective learning becomes transformative whenever assumptions or premises are found to be distorting, inauthentic, or otherwise invalid. Transformative learning results in new or transformed meaning (6).

Mezirow asserts that, because not all adult learning is transformative in nature, "the goal becomes one of either confirmation or transformation of ways of interpreting experience" (6) for adult education.

Mezirow also describes a model, or process, by which transformative learning may occur. From studying the experiences of adult women returning to college, Mezirow (1990) identified ten specific phases of perspective transformation, summarized as follows: first, adults experience a disorienting dilemma, where their experiences call into question their assumptions about the world. This dilemma is followed by self-examination, which in turn leads to critical examination of the assumptions in question. Next, individuals come to recognize that transformation of assumptions is a shared human experience – a revelation that can result in confidence in their own ability to navigate this process. This is followed by exploring new options for being in the world, planning a course of action, and acquiring new knowledge and skills to implement this plan. Individuals then try out their new roles, and eventually come to gain confidence in these roles. Finally, adults reintegrate their learning into a new, transformed perspective with which they make meaning of future experiences. This new perspective is subject to further transformation, as adults encounter additional and inevitable disorienting dilemmas.

Learning in Communities of Practice

While each of the theories described to this point have the adult learner's internal development as their principle focus, Wenger (1998) examines learning as primarily occurring in and through specific contexts, namely larger communities of which the individual is a member. Thus, in his discussion of adults as situated in "communities of practice," Wenger applies a social learning approach to the question of how adults learn, and views their learning as a

"fundamentally social phenomenon reflecting our own deeply social nature as human beings"

(3). Communities of practice, such as colleges and universities, are the contexts in which meaning making and learning occurs: "We all have our own theories and ways of understanding the world, and our communities of practice are places where we develop, negotiate, and share them" (48). According to Wenger, the impact of these communities is not limited to individuals' meaning making; rather, participation in communities of practice deeply affects individuals' actions and identities as well: "Such participation shapes not only what we do, but also who we are" (4).

"Practice" is described as the enterprise through which these communities develop shared meanings and, ultimately, the vehicle by which adults learn. Instead of focusing on task completion or abstract consideration of philosophical questions, Wenger claims that "practice is about meaning as an experience of everyday life" (52). Practice involves a dynamic "negotiation" process, or an interaction between the environment and the individual, in the construction of meaning: "By living in the world we do not just make meanings up independently of the world, but neither does the world simply impose meanings on us" (53-4). In a discussion of academic communities of practice, Wenger asserts that educators need to develop "inventive ways of engaging students in meaningful practices" (10), such as enabling students to be self-directed in their "learning trajectories" and "involving them in actions, discussions, and reflections that make a difference to the communities that they value" (10). According to Wenger, experiential learning activities should provide students with opportunities for "legitimate peripheral participation" (11), which – as opposed to focusing solely on skill building or training – involves "changing participation and identity transformation in a community of practice" (11).

The Language of Adult and Experiential Learning Theory

The language of adult and experiential learning theory has thus provided a rich terminology with which to describe how adults learn in and from their experiences. From the theorists reviewed, a general description of optimal adult and experiential learning emerges. First, such learning can be said to involve the *integration of experience*, reflection, and action in a learning cycle that is *iterative* rather than having a definite endpoint. Learning at its best is inherently active, in that it requires ongoing experimentation rather than passive absorption of information. Learning that is *problem-based* – where adults learn by addressing authentic dilemmas within their environment – is deep rather than superficial in nature. Learning also can involve transformation of self, as individuals come to question, test, and reformulate their ways of making meaning and, in doing so, their views of themselves and the world in which they live. Finally, rather than occurring in a vacuum, learning requires that learners be engaged with social contexts, as they construct shared meaning in collaboration with others in their communities. Each of these descriptions of learning is particularly salient to the question of learning in college, as much of the pedagogy that is considered "engaged" in higher education has adult and experiential learning theory as its conceptual framework. The full implications of this perspective for engaged learning are discussed at the end of this section.

Psychosocial Theories

The two theoretical perspectives of learning in college already discussed – *cognitive-structural theory* and *adult and experiential learning theory* – focus primarily on cognitive learning, whether in terms of making meaning, forming judgments, integrating knowledge, questioning assumptions, or transforming perspectives. Some of these theories do touch upon

identity issues, such as those that address self-concept, and certainly students' cognition pervades all other aspects of their learning. However, there is also a perspective in the literature that claims a substantial proportion of student learning in college is *psychosocial* in nature. This type of learning includes the multiple dimensions of identity (e.g., race and ethnicity, gender, sexual orientation, faith and spirituality, and others), as well as social relationships, affect and emotions, moral values, and life goals and purposes.

As compared to cognitive learning, these domains have not traditionally been viewed as a central part of the mission of modern higher education. While the acquisition of knowledge and cognitive skills is easily understood to be linked to the educative purpose of colleges and universities, the same has not been true of learning in other domains – and particularly so for those described in the language of developmental psychology rather than learning theory. However, according to Chickering and Reisser (1993), this has begun to change over the past two decades:

One reason for moderating earlier views that higher education should restrict itself to information transfer and 'cultivating the intellect' lies in the continued accumulation of research into college influences on student learning and development. The research unequivocally demonstrates that college has impact on a wide range of cognitive and affective outcomes (xiii).

Thus, from research on the effects of college attendance, it is evident that students *do* learn in areas outside of the cognitive domain, and substantially so. Along these lines, Pascarella and Terenzini (1991) identify four broad categories of college effects that include not only cognitive skills and intellectual growth, but also psychosocial areas (of identity, self-concept, self-esteem, interpersonal relationships, and societal relationships), attitudes and values, and moral development. The psychosocial domain is of particular concern to students' mental health and well-being, and therefore is even more important to this description of learning in college.

Before outlining the nature of psychosocial learning in college, it is necessary to define the relationship between *learning* and *development*, particularly because psychosocial theories are predominantly framed by developmental language. Mentkowski and Associates (2002) describe a view of this relationship that is commonly held in the literature: "What is learned moves beyond learning processes and complex multidimensional abilities to encompass the integration of learning with the development of the whole person" (11). Thus, individuals' learning in a given domain – whether knowledge-based or skills-based – serves as the impetus and foundation for further development of that domain, as well as of the entire self. Mentkowski and Associates postulate that this learning – which they specifically call "learning that lasts" – is the optimal kind of learning: "enduring learning is a process that involves the whole person: learning is integrative" (8). Similarly, Chickering and Reisser (1993) endorse this kind of developmental learning as central to the educative mission of colleges and universities: "We argue for nothing less than human development, in all its complexity and orneriness, as the unifying purpose for higher education" (xv).

Chickering's Seven Vectors of Development

Widely cited in the higher education literature, Chickering's psychosocial theory attempts to comprehensively describe this development during the college years. Chickering proposes the following seven vectors, or broad "conceptual lenses" of "major constellations of development during adolescence and early adulthood": Developing Competence; Managing Emotions; Moving Through Autonomy Toward Interdependence; Developing Mature Interpersonal Relationships; Establishing Identity; Developing Purpose; and Developing Integrity (Chickering and Reisser 1993, 44). In each of these vectors, Chickering envisions college students as experiencing new learning, which in turn spurs further development in the vector. In addition to

a cataloging of psychosocial change in college, the vectors provide a useful organizing principle for the various psychosocial theories that have been used to describe change in college.

Developing Competence

Developing Competence encompasses students' intellectual, physical, and interpersonal development. Intellectual development includes learning as described by cognitive-structural theories, and primarily involves students' academic experiences. Physical competence refers to learning and skill development in both athletic and artistic activities. Interpersonal development involves students' learning a variety of skills such as listening, communicating, cooperating, and appropriate responding, as well as how to align the self with group goals. As students learn and acquire new skills in this vector they become increasingly confident in their abilities, which in turn enables them to be even more effective when they encounter new learning situations and developmental challenges in college.

Managing Emotions

Both positive and negative emotions are at the focus of the next vector, Managing Emotions. The latter includes anxiety and depression, which are often the basis for mental health concerns in college. Development in this vector includes awareness of emotions, flexible control and appropriate expression of affect, and integration of feelings with responsible action. Chickering and Reisser describe each of these areas of development as accompanied by specific learning and skill acquisition. For example, students gain awareness of emotions when they "learn to identify and accept feelings as normal reactions to life experience, when they can understand and amend outdated assumptions that amplify negative feelings, and when they become well informed about sexuality, interpersonal communication, and personal rights" (97).

The development of flexible control and appropriate expression of affect "involves practicing new skills, learning coping techniques, directing feelings toward constructive action, becoming more flexible and spontaneous, and seeking out rewarding and meaningful experiences" (88). Finally, students come to integrate their emotions with responsible action by "testing through action or symbolic behavior" (107), for which key tasks include learning to "withdraw and reflect on a situation of high drama" and to "exercise conscious choice about when and how to express feelings" (107). Particularly in dealing with negative and potentially self-destructive emotions, such as anxiety and depression, students learn how to "detach from interactions and watch their own self-talk, observing how it leads to irrational or self-deprecating patterns and how it can be changed" as well as "develop new frames of reference that serve as guidelines for behavior and meaningful beliefs that put events into perspective" (107).

Chickering and Reisser describe multiple ways the institution can assist with learning and development in the vector of managing emotions. In addition to providing students with "opportunities to share their stories in supportive groups" and incorporating "reflective writing assignments" (97) into the curriculum, faculty can utilize course content as vehicles for students to learn about emotions. The authors give specific examples of this integration in that "Psychology students may see themselves reflected in discussion of the 'affective domain'" (99) and English majors can learn about emotions through their readings of literature. Chickering and Reisser acknowledge that while faculty may be uncomfortable with attending to the affective domain in class, by doing so they can maximize the depth and power of students' learning: "Whereas many instructors would prefer that feelings be parked outside the door of their classrooms, others look for ways to elicit feelings as well as thoughts, to stir passions, to inspire enthusiasm and enjoyment as natural elements of any learning experience" (99).

Moving Through Autonomy Toward Interdependence

The vector of Moving Through Autonomy Toward Interdependence involves students' development of emotional independence, instrumental independence, and the recognition and acceptance of interdependence. Emotional independence is described as "freedom from continual and pressing needs for reassurance, affection, or approval from others" (107), and as a process that begins with "disengagement from the parents, proceeds through reliance on peers and role models, and moves toward a balance of comfort with one's own company and openness to others" (122). Research demonstrates that, during this transition, identification with and differentiation from the peer group is of particular challenge in college; Astin (1993) found that "peer group is the single most potent source of influence on growth and development during the undergraduate years . . . Students' values, beliefs, and aspirations tend to change in the direction of the dominant values, beliefs, and aspirations of the peer group" (398). According to Chickering and Reisser, instrumental independence is described as "the ability to carry on activities and solve problems in a self-directed manner" (107); in this area, "development involves learning that nonassertive or aggressive behavior affects everyone around them. To reach their goals, they must learn courtesy, engagement, and cooperation" (142). As students' abilities expand in both emotional and instrumental independence, their learning is integrated into a new sense and appreciation of their interdependence with others around them; this culminates in "an awareness of one's place in and commitment to the welfare of the larger community" (117).

Developing Mature Interpersonal Relationships

The vector of Developing Mature Interpersonal Relationships involves two areas of

student learning: tolerance and appreciation of differences; and the capacity for intimacy. For the former, Chickering and Reisser point to Bennett's (1998) Developmental Model of Intercultural Sensitivity as useful for explaining college students' responses to cultural difference. In Bennett's model, which parallels the Perry scheme, students move from an "ethnocentric" stance where they use their "own set of standards and customs to judge all people, often unconsciously" to an "ethnorelative" stance where they are "comfortable with many standards and customs" and have the "ability to adapt behavior and judgments to a variety of interpersonal settings" (26). Students in the initial stance may deny, defend against, or minimize the existence of cultural difference, while those in the latter stance may accept, adapt to, and integrate differences.

Chickering and Reisser assert that in addition to moving toward intercultural sensitivity, students develop increasing capacity for intimacy during college. Students learn how to form intimate relationships that are healthy and balanced through experimentation. Learning that occurs during this process includes: relinquishing control of and dependency on others; "understanding the frames of reference that shape our assumptions – for example, that love has to be earned or expressed in some preordained way" (167); and "building systematic self-examination into the process" so that the needs of self are balanced with needs of the other. The ability to form and maintain intimate relationships provides a foundation for students to establish social networks and families throughout their adult lives.

Establishing Identity

The vectors described to this point all converge in the next vector, Establishing Identity, as identity is a complex and multifaceted concept that encompasses the entire self. Chickering and Reisser explain this relationship between identity and other areas of learning and development:

The primarily element [of identity] is that solid sense of self, that inner feeling of mastery and ownership that takes shape as the developmental tasks for competence, emotions, autonomy, and relationships are undertaken with some success, and that, as it becomes firmer, provides a framework for purpose and integrity, as well as for more progress along the other vectors (181).

The authors point to several specific areas of identity as areas for learning and development in college: comfort with body, appearance, gender, sexual orientation; sense of self in social, historical, and cultural context; clarification of self-concept through roles and lifestyles; sense of self in response to feedback from valued others; self-acceptance and self esteem; and personal stability and integration. In addressing each of these areas, Chickering and Reisser draw on a number of psychosocial theories to describe both general and specific aspects of identity development.

In terms of development of *identity* as a global concept, the work of Erikson (1959), Marcia (1966) and Josselson (1987) converges to suggest that college students may experience identity-related crises – whether related to career, religion, political ideology, or relationships – that require them to make fundamental decisions and commitments about who they are and how the perceive themselves. Loevinger (1976) viewed overall identity development in late adolescence as a function of students' transitioning from being more conformist to family and peers, to a more self-aware stance where they become aware of their own feelings, thoughts, and responsibilities; from their research with Loevinger's model, Reisetter Hart and Mentkowski (1994) report that college students generally exhibit stability in the latter stance of self-awareness.

In terms of specific facets of identity, Chickering and Reisser identify students' becoming comfortable with *gender* and establishing gender roles as a key area of identity development.

The authors cite Chodorow (1978) in describing female identity formation as centered in

ongoing relationship, as women experience themselves as connecting with the gender of their mother (who is typically the primary caregiver). Gender identity formation for men, however, may tend to revolve around issues of autonomy and separation, as their identity involves individuation from their mother's gender. Thus, Kegan (1982) observes that women may have difficulty moving from developmental positions of inclusion and relationship, and men may have difficulty moving from those of autonomy. Chickering and Reisser also discuss the establishment of an individual's sexual orientation, which Cass (1979) and others describe as movement from recognition of one's sexual orientation toward integration of a gay or lesbian identity into one's fundamental sense of self. Additionally, Chickering and Reisser describe racial identity development as a key area of growth and learning in college. As described by Cross (1991), black racial identity development involves a shift in views of self from a white reference group to black reference group. Racial identity development for white students involves first recognizing and rejecting racism, and then constructing a non-racist white racial identity along with a personal commitment to eliminate racism and to take conscientious action (Helms 1990). Although Chickering and Reisser do not specifically discuss the development of faith and spirituality during college, it is a domain that is receiving increased attention in higher education. Fowler (1981) describes such development as movement from an ego-centric faith based in family tradition to a critically reflective faith that is oriented toward community; for college students, this process involves faith as an orienting factor in their widely expanding social spheres and activities, as well as a basis for their assuming responsibility for their actions and developing a cohesive sense of self.

Rather than an extensive cataloguing of identity change, these areas of psychosocial development point to the multiple dimensions – including race and ethnicity, gender and sexual

orientation, faith and spirituality, and others – in which identity-related learning and development may occur in college. Kardia and Sevig (2001) explain the underlying developmental process common to these models:

While terminology and emphasis vary, all these models describe the following process in some fashion. In any early stage, a person is unaware of her or his own identity and/or the impact of this identity on who she or he is as 'a person.' At some point, the person moves into a new phase in which an identity or identities start becoming salient. The person then proceeds through a widening and deepening spiral of new experiences, new insights, and new encounters with others, all of which contribute to making this new identity part of who the person is. Most models then include a phase in which people are very comfortable with the identity, can see connections with other identities... (250).

Thus, while Chickering and Reisser identify several dimensions of identity which undergo development in college, this general process of first awareness, then exploration, and finally integration may hold true for the overall construct of identity development in college as well.

Developing Integrity and Purpose

Chickering conceptualizes the development of both integrity and purpose as flowing out from the individual's sense of identity. The vector of Developing Integrity "involves consciously affirming core values that are socially responsible, bringing beliefs and behavior into greater alignment, and gaining skill and consistency in the use of principled thinking" (20). Chickering conceptualizes development in this vector through "three sequential but overlapping stages" of humanizing values, personalizing values, and developing congruence. Humanizing values refers to a "shifting away from automatic application of uncompromising beliefs and using principled thinking in balancing one's own self-interest with the interests of one's fellow human beings" (51). Personalizing values involves "consciously affirming core values and beliefs while respecting other points of view" (51), as well as the development of individualized "standards by which to flexibly assess personal actions" (52). Finally, developing congruence involves

"matching personal values with socially responsible behavior" (51). In illustrating this vector, Chickering and Reisser draw upon Kohlberg's (1984) and Gilligan's (1982) theories of moral development; these theories can be considered both cognitive-structural in that they address moral reasoning and psychosocial in that they describe the development of the moral dimension of self (both are described later in this section in terms of one view of "engagement" in college, as they provide a basis for understanding students' civic development).

In the final vector of Developing Purpose, students make plans and set priorities for three major areas of their lives: vocational plans; personal interests; and interpersonal commitments. According to Chickering and Reisser, this process involves "an increasing ability to be intentional, to assess interests and options, to clarify goals, to make plans, and to persist despite obstacles" (50). As these skills are developed, individuals expand their "ability to unify one's many different goals within the scope of a larger, more meaningful purpose, and to exercise intentionality on a daily basis" (50), thus bringing all of their learning and development in college into congruence in a focused, lifelong purpose.

The Language of Psychosocial Theory

Psychosocial perspectives extend the view of learning in college beyond the cognitive domain to areas such as students' identities, social interactions, affect and emotions, moral values, and life plans and purposes. While these types of learning are typically not accorded the same primacy as cognitively-based learning in higher education, they nonetheless have been found to occur during the college years. Thus, Chickering and Reisser recommend that colleges and universities intentionally educate for psychosocial learning and development, thereby harnessing their educative potential to affect not only *what students learn* in college but *who students are* as well.

"Engagement" in Higher Education

Having outlined conceptual frameworks useful for describing learning in college, the question of what is meant by the adjective "engaged" in the phrase *engaged learning* can be addressed. The noun "engagement" – which is defined as "the state of being engaged" (Merriam Webster 2005) – appears with greater frequency in the higher education literature than the adjective to which it refers. In this literature, however, engagement does not enjoy a clear a definition. In addition to many individual authors having nuanced views and usages of the term engagement, it is not uncommon to encounter journal articles, book chapters, and even entire books with "engagement" in the title that nonetheless fail to define or – in some cases – even mention the term again. The resultant confusion in the literature as to the meaning of engagement is further compounded by the term's growing popularity among scholars and practitioners. Given this theoretical landscape, the task is not to catalog every usage of the term engagement, but rather to ask whether any major strands of meaning for the term are identifiable.

Two such strands emerge from the literature, though they are not discrete categories. The first strand arises from the involvement perspective – most recently exemplified in the National Survey of Student Engagement (NSSE) – and construes engagement as students' active involvement in their learning. The second strand – which accounts for the majority of references to engagement in higher education literature – is that of civic engagement, whether in terms of the civic development of students, faculty and the scholarship of engagement, or the engaged campus. Also central to this second strand of meaning is the interconnectedness of civic engagement and diversity.

Engagement as Student Involvement

In conceptualizing engaged learning in higher education, the involvement perspective views students' engagement in learning as a function of their motivation and effort in the educational process, as well as of the degree to which the learning environment is conducive and promoting of student involvement. Although earlier authors writing from this perspective used the term "involvement," a shift in recent years – as exemplified by NSSE – appears to have replaced this word with the term "engagement" without a significant change in meaning; thus, the involvement perspective accounts for the first strand of meaning for the word engagement.

The Study Group on the Conditions of Excellence in Higher Education (1984) describes the dynamic of involvement as "resembl[ing] in certain respects the more familiar psychological concept of motivation. But it implies something more than just a psychological state: it connotes behavior" (18). Astin (1984), one of the first and key proponents of this perspective, defines involvement in terms of the amount of energy students devote to the academic experience; the responsibility for the level of involvement is shared by colleges and universities, however, as they are responsible for providing learning environments that are supportive of student involvement. Astin's five propositions regarding student involvement provide the cornerstone for this perspective of engaged learning. Pascarella and Terenzini (1991) caution that, despite "the attention [these propositions] have attracted from higher educational researchers and administrators, they probably do not meet generally accepted definitions of theory... Astin offers a general dynamic, a principle, rather than any detailed, systemic description..." (51). First, Astin posits that involvement in learning is directly related to the physical and psychological energy invested by students. Second, Astin pictures involvement on a continuum; rather than an all-or-nothing proposition, level of involvement varies by student as well as by each learning

activity or task in which the student is involved. Additionally, involvement has both quantitative aspects (sheer amount of energy exerted) and qualitative aspects (degree to which energy is invested in efficacious learning efforts). This quantity and quality of involvement is proportional to student learning and personal development. And finally, the effectiveness of any given educational approach is linked to its ability to promote student involvement.

Astin's (1993) research on student involvement points to the validity of these propositions. Specifically, Astin describes his finding that "learning, academic performance, and retention are positively associated with academic involvement, involvement with faculty, and involvement with student peer groups" (394). The evidence for this is particularly strong for students' cognitive and intellectual growth; for example, Astin found that "overall academic development is proportional to the amount of time that students devote to studying, while growth in a particular area of knowledge or skill is proportional to the number of courses taken that focus on these same areas of knowledge or skill" (394-5). Student involvement in activities such as note-taking and course discussions also contributed to academic achievement. Pascarella and Terenzini (1991), in their meta-analysis of higher education research, conclude:

A substantial body of evidence exists to suggest that the greater the student's involvement in academic work or in the academic experience of college, the greater his or her level of knowledge acquisition. This evidence is consistent whether extent of involvement is measured at the class level or in terms of broader-based types of involvement (98).

Ultimately, the authors explain, academic development appears to be a function of the degree of the "student's effort in making use of the range of learning opportunities provided by the institution" (110).

Despite the importance of students' exertion of time and energy in their learning, it is clear that – in Kytle's (2004) words – "involvement, alone, is not enough..." (95). The

relationship between student involvement and the environment can be described in terms of the input-output principle popularized by the field of computer technology. Astin introduced this terminology into discussions of student engagement in his "input-environment-outcome (I-E-O) model" for assessing the effects of college attendance: inputs are the students' characteristics upon arrival at college; the environment is comprised of the student's experiences in college; and the outcomes are the student's characteristics "after exposure to the environment" (7). When applied to the larger question of how students learn in college, the input-output principle holds that students' involvement is a function of the time, energy and effort they invest (input), which directly affects the kinds of educational outcomes they will achieve (output). This is apparent in the description of involvement provided by The Study Group on the Conditions of Excellence in Higher Education:

The *more time and effort* students invest in the learning process and the *more intensely* they engage in their own education, *the greater* will be their growth and achievement, their satisfaction with their educational experiences, and their persistence in college, and *the more likely* they are to continue their learning (17, emphases added).

The use of quantitative terms such as "more" and "greater" indicates the underlying input-output dynamic at work in this perspective. In such a view, then, the role of colleges and universities is primarily to increase students' input – by providing environments and effective educational practices that encourage involvement – which should in turn increase educational output, as described by Kuh (2003):

Toward these ends, faculty and administrators would do well to arrange the curriculum and other aspects of the college experience in accord with these good practices, thereby encouraging students *to put forth more effort* (e.g., write *more* papers, read *more* books, meet *more* frequently with faculty and peers, use information technology appropriately) which will result in *greater gains* in such areas as critical thinking, problem solving, effective communication, and responsible citizenship (1, emphases added).

Thus, the quantitative language inherent in an input-output view of involvement is extended

beyond students' motivation and behavior to the function of the campus environment.

The quality of learning experiences in which students are involved is also important to their learning. The Study Group on the Conditions of Excellence in Higher Education explains that the level of student involvement in academics is related to "the extent to which learning is active rather than passive, and colleges clearly can control the conditions of active learning by expecting students to be participants in, rather than spectators of, the learning process" (19). Likewise, Pascarella and Terenzini (1991) conclude that certain "instructional and programmatic interventions" can increase "active engagement in learning and academic work [and] also enhance knowledge acquisition and some dimensions of both cognitive and psychosocial change" (616). According to the authors, these effective interventions include individualized learning strategies, inductive learning based in concrete experience, active student discussion and learning based in problem solving. Recently, Umbach and Wawrzynski (2004), who analyzed two national data sets on the relationship between faculty practices and student engagement, report:

Our findings suggest that students report higher levels of engagement and learning at institutions where faculty members use active and collaborative learning techniques, engage students in experiences, emphasize higher-order cognitive activities in the classroom, interact with students, challenge students academically, and value enriching educational experiences. In general, faculty at liberal arts colleges are the most likely to engage their students (2).

The implications of these and related findings for higher education are extensive. The Study Group on the Conditions of Excellence in Higher Education states that "the power of the campus as an environment for fostering student involvement is crucial...If students are reluctant citizens of a campus, the degree and quality of their involvement in learning will suffer" (24). Kytle (2004) likewise asserts for the whole of higher education that, "In the case of involvement, 'the rich get much, much richer' when learners become active agents in a curriculum of diverse,

lifelong experiences...Such a curriculum encourages involvement at every turn where involvement *qua* involvement is the college's meta purpose" (159). Thus, from an involvement perspective, colleges and universities have the responsibility to create learning environments and curricular elements that promote student involvement.

Although Astin did extend his view of involvement to areas of students' college experiences other than the academic realm, the landmark study of Kuh et al. (1991) of fourteen exemplary institutions – termed "involving colleges" – specifically examined the relationship between student involvement and out-of-class experiences. Of key importance to the question of engaged learning is the authors' expansion of the term "learning" to include areas other than academic development. Kuh et al. explain:

Because we were interested in student learning beyond the boundaries of cognitive or intellectual domains and beyond the parameters of the classroom, we adopted a broad definition of learning...Learning was defined as the acquisition by students of any lasting knowledge or skill consistent with the educational purposes of the institution (6).

The authors thus expand the focus from what they describe as a strictly "academic" perspective of student learning to include other dimensions of student growth and development: "We use the term *educational* to connote a broader set of ideas that embrace moral and social development in addition to development of intellect and reason" (17).

In their study, Kuh et al. found that the quality of students' undergraduate experience was related to students' level of involvement in campus life. Although the authors highlight the critical importance of student responsibility, initiative, and self-directedness in learning, they also point to the role of colleges and universities in nurturing and promoting these qualities through the construction of educational environments. Specifically, the authors identify five characteristics shared by the fourteen institutions which, when taken together, set the institutions apart as "involving colleges." These include: a clearly articulated institutional mission and

educational purpose; a campus environment congruent with this mission and purpose, and that promotes student involvement in learning and personal development activities; an institutional culture that reinforces student involvement; and institutional practices that are in line with the institution's mission.

Just as this perspective holds that exertion of student effort is positively related to educational outcomes, a lack of student involvement is seen as yielding the opposite. Astin (1993) explains, "A wide spectrum of cognitive and affective outcomes is negatively affected by forms of involvement that either isolate the student from peers or remove the student physically from the campus: living at home, commuting, being employed off campus, being employed full-time, and watching television" (395). Similarly, Pascarella and Terenzini (1991) state that while research suggests that activities that connect students to the campus (such as living in residence) increase student involvement, the same research indicates that campus qualities that work against the formation of community (such as large institutional or department size) can inhibit involvement. The Study Group on the Conditions of Excellence in Higher Education (1984) describes this dynamic at work:

Highly involved students demonstrate their commitment in a variety of ways: by devoting considerable energy to studying, by working at on-campus rather than off-campus jobs, by participating actively in student organizations, and by interacting frequently with faculty members and student peers. Conversely, uninvolved students may neglect studies, spend little time on campus, abstain from extracurricular activities, have little contact with faculty members or other students, and otherwise participate little in institutional life (17-8).

In this view, a "zero-sum game" appears to occur between off- and on-campus forces that compete for students' "finite time and energy" (18). Acknowledging that many of the external forces that pull students from campus are nonetheless legitimate, The Study Group on the Conditions of Excellence in Higher Education proposes that students be encouraged to take

advantage of opportunities for "trade-offs" – such as choosing on-campus employment rather than an off-campus job – thereby fulfilling their needs while finding ways to be more engaged in campus life. Pascarella and Terenzini (1991) also point to the necessity of balancing involvement across different learning activities: "Too much involvement may be counterproductive. Intensive involvement in one aspect of college life may insulate a student from the effects of other college experiences by limiting the time and attention available for those experiences" (313).

Although some recent authors (Kytle 2004) continue to use the term "involvement" to describe students' investment of time and effort in their learning, an overall shift in terminology appears to have occurred within the past decade. Specifically, in the work of Kuh and others, the term "engagement" has generally replaced the word "involvement," without an accompanying, considerable shift in meaning. This can be a source of confusion in the literature, since "engagement" – as described in the following section – is most frequently employed in reference to civic development, particularly in the service-learning literature. The primary example in both theory and research of this shift in terminology is in the National Survey of Student Engagement (NSSE). Developed by Kuh and colleagues, NSSE is a measurement of institutional quality that is used by an increasing number of schools, many of which report their results in the US News & World Report annual ranking of colleges and universities (USNews.com 2005). As an instrument that has its theoretical grounding in the involvement perspective, NSSE aims to measure the quality of educational institutions by assessing students' engagement – or, essentially, involvement – in educational activities known to be efficacious. In describing the instrument's conceptual framework, Kuh (2003) explains:

What students do during college counts more in terms of desired outcomes than who they are or even where they go to college. That is, the voluminous research on college student

development shows that the time and energy students devote to educationally purposeful activities is the single best predictor of their learning and personal development...Those institutions that more fully engage their students in the variety of activities that contribute to valued outcomes of college can claim to be of higher quality compared with other colleges and universities where students are less engaged (1).

This view provides the basis for the construction of NSSE, as Kuh describes the instrument as "specifically designed to assess the extent to which students are engaged in empirically derived good educational practices and what they gain from their college experience" (2). From these descriptions, engagement here is taken to mean the level of students' "time and energy" devoted to educational activities, and it is the role of institutions to "more fully engage" students in these activities. Thus the principle underlying NSSE is consistent with the involvement perspective, though the language used to describe the principle uses the term engagement instead of involvement.

And just as involvement theory emphasizes the quality of educational activities in which students are involved – such as active versus passive learning opportunities – NSSE highlights students' engagement in "good educational practice" (Kuh 2003, 1). Kuh explains this as a focus on "empirically derived" educational practices that have been shown to be efficacious in promoting student learning. Among these practices, according to Kuh, are those that – in keeping with the "Seven Principles for Good Practice in Undergraduate Education" proposed by Chickering and Gamson (1991) – encourage student-faculty contact, encourage cooperation among students, encourage active learning, provide prompt feedback, emphasize time on task, communicate high expectations, and respect diverse talents and ways of learning. One notable difference between NSSE and earlier perspectives of student involvement is that the latter initially focused on the degree to which students were involved in efficacious on-campus – versus off-campus – activities. In contrast, NSSE considers activities that physically remove

students from the campus but are also known to be effective ways to actively engage students in learning (e.g., service-learning programs) as positive venues for student involvement.

There are several benefits of considering this perspective for engaged learning. First, it gives primacy to students' motivations, as well as expenditure of energy, in the learning process. This is an important consideration that nonetheless is often missing from other theoretical perspectives. The term "engaged" implies activity and effort on the part of the learner, and the involvement perspective clearly emphasizes this aspect of engaged learning. Additionally, the involvement perspective highlights the key role of learning environments in supporting and encouraging students' motivation and efforts in their learning. Furthermore, the involvement perspective does not view engaged learning as an all-or-nothing process; rather, student engagement in learning occurs on a continuum, and varies both by individual student and by specific activities in which the individual student engages. Finally, the research of Kuh et al. (1991) expanded the notion of students' learning from primarily academic in nature to encompassing multiple domains of growth and development, with such learning occurring both inside and outside the college classroom.

Civic Engagement in Higher Education

The second strand of meaning for "engagement" in higher education refers to civic engagement. This meaning is commonly found in the service-learning literature and, due to the considerable expansion of research on service-learning, comprises the majority of references to engagement. As this review focuses on the learning experiences of students, engagement defined through the lens of students' civic development is of primary concern. However, the literature also addresses faculty and the "scholarship of engagement" as well as the concept of the "engaged campus," and because civic engagement is often described as simultaneously involving

students, faculty, and the campus, all three are included in this review. Finally, the interconnectedness of diversity and civic engagement is also a key theme of this perspective in the literature.

Students' Civic Development

When discussed in terms of students, engagement typically refers to students' *civic development*. This perspective may have the most direct relevancy to the question of "engaged learning," as students' civic engagement is viewed as a desirable educational outcome, particularly in the service-learning literature. Jacoby (2004) offers the following "working" definition of such engagement:

Civic engagement is a heightened sense of responsibility to one's communities that includes a wide range of activities, including developing civic sensitivity, participation in building civil society, and benefiting the common good. Civic engagement encompasses the notions of global citizenship and interdependence where individuals—as citizens of their communities, their nations, and the world—are empowered as agents of positive social change for a more democratic world (10).

Jacoby states that civic engagement generally entails students' involvement in: learning to develop informed perspectives; active participation in civic life; involvement in leadership activities; promotion of social justice; development of empathy, values, and social responsibility; and critical reflection on diversity and democracy (1).

This definition – as does much of the literature – reflects two philosophies at the foundation of this perspective of engaged learning: the civic model and the communitarian model. Hoppe (2004) explains that it is "difficult to distinguish" one from the other (144); this is particularly true because the first model has provided much of the terminology in the literature. However it is helpful to review the tenets of both models, as both contribute significantly to discussions of students' civic development and this perspective of engagement.

The civic model generally focuses on nurturing students' capacities for active participation as citizens in a democracy, and posits that such development is critical in a society where youth involvement in voting, politics, and other aspects of democratic life is minimal. Proponents of this perspective thus view the goal of higher education as enabling students to become active, informed, and empowered citizens of a participatory democracy. Palmer (1998) describes this model of higher education as cultivating "public mutuality" in which people "learn to share a common territory and common resources, to resolve mutual conflicts and mutual problems" (91-2); he explains that this philosophical approach has its rooting in classical thought as, "From Plato onward, the academy has been promoted as a microcosm of the body politic, a setting in which the habits of democratic citizenship can and should be cultivated" (92). This perspective is the predominate one in the literature and – as evident throughout this review – has provided much of the language around "civic" engagement in higher education and "civic" development of students.

The communitarian model, in contrast, places greater emphasis on the responsibilities of individuals to the larger communities of which they are a part. Etzioni (1995) explains, "Communitarians are in the business of defining and promoting societal balances. They recognize that most individual rights have a social responsibility which is their corollary" (20). Similarly, Elshtain (1995) distinguishes between the *contract* orientation of a civic perspective and the *compact* orientation of the communitarian model; the first places emphasis on rights of the individual, and the second on responsibilities of the individual to the community. This is echoed in Etzioni's assertion that communitarianism is an antidote for rampant individualism in society, which "President Kennedy's oft-cited line tried to correct by suggesting that one should give to one's country (meaning society at large) rather than asking incessantly what the country

will do for oneself" (21). Etzioni goes as far as to assert that in "the longer run, cultivation of social responsibilities is the only way to ensure the societal conditions that rights require" (20). From an educational perspective, Boyer (Carnegie Foundation for the Advancement of Teaching 1990) endorses a communitarian model of education by calling for colleges and universities to adopt a community perspective of education, or a "campus compact" (8) whereby "the channels of our common life will be renewed and deepened" (63). Similarly, Palmer (1998) calls for a "model of community... that can embrace, guide, and refine the core mission of education – the mission of knowing, teaching, and learning" (94).

Hoppe (2004) explains that these perspectives co-exist on individual college campuses as well as across the enterprise of higher education. For example, individual faculty members, administrators, and even students may maintain their own orientation and purpose, regardless of the institutional leaning (if there is one) toward a specific perspective. This would certainly appear to be the state of affairs throughout the literature, as most authors readily incorporate language from both perspectives, though again the terminology of the civic model seems to be more prevalent. This would suggest that the concept of students' civic development refers to the development of both democratic participation and social responsibility.

The question becomes, then, how does this civic development occur, or how do students come to be civically engaged? In *Educating Citizens: Preparing America's Undergraduates for Lives of Moral and Civic Responsibility*, Colby et al. (2003) provide a framework for answering this question. The authors point to the linkages between moral development and civic engagement, and they suggest that to understand an individual's moral development is to gain insight into the individual's level and quality of civic engagement as well:

The moral and the civic are inseparable. Because we understand the term *morality* to describe prescriptive judgments about how one ought to act in relation to other people, it

follows that many core democratic principles, including tolerance and respect, impartiality, and concern for both the rights of the individual and the welfare of the group, are grounded in moral principles...The problems that confront civically engaged citizens always include strong moral themes (15).

Thus, as a starting point, theories of moral development – including the development of moral judgment and moral affect – can provide insight into how individuals move toward a moral stance that is engaged with the larger community.

Specifically, two theories of moral development, that of Kohlberg (1984) and Gilligan (1982), describe the developmental path from moral selves in isolation to engaged members of the larger social contexts in which they are situated. Kohlberg's theory – which initially extended Piaget's work on children's moral reasoning into adolescence – has served as the basis for extensive research on college student development. Kohlberg's six-stage scheme—organized into three levels of development, each comprising two stages—charts growth in individuals' moral reasoning. In the first level, preconventional reasoning, moral reasoning focuses on the self and has little regard for or understanding of societal rules. In Stage 1, Heteronomous Morality, children understand actions in absolute terms as either good or bad, and their moral judgments are characterized by obedience and the avoidance of wrong behavior and subsequent punishment. In Stage 2—Individualism, Instrumental Purpose, and Exchange—right behavior is defined as that which meets the needs of the individual, and when the needs of the self conflict with the needs of others, reciprocal behavior and fair exchanges become the basis for moral judgments.

In the second, or conventional, level of moral reasoning, the individual comes to understand self as part of a larger society that has expectations, norms and rules. In Stage 3—Mutual Interpersonal Expectations, Relationships, and Interpersonal Conformity—children strive to be accepted as "good" by living in compliance with others' expectations and attempting to

please authorities closest to them. In Stage 4, Social System and Conscience – which is the beginning of the mature stages of moral reasoning and is typical of progression into and through adulthood – individuals come to understand the need for a social system as well as their responsibility for upholding the order created by this system.

The third, or postconventional, level of moral reasoning is marked by the development of a complex set of moral principles transcending both individual needs and social order (the focus of preconventional and conventional reasoning, respectively). In Stage 5, Social Contract or Utility and Individual Rights, individuals recognize the existence of fundamental human values and act to promote the welfare of the majority. In Stage 6, Universal Ethical Principles, individuals consistently apply moral principles – such as those of "justice, of reciprocity and equality of human action, of universal respect for human rights and for human personality" (Blatt and Kohlberg 1975, 130) – to decide moral dilemmas and take moral action. In Kohlberg's and others' research, these final two stages were not typically evident among adolescents and were rarely identified even among adults.

As the initial research from which Kohlberg's theory developed was conducted with predominantly male participants, theorists such as Carol Gilligan have sought to ask how different ways of moral reasoning may develop among women and diverse populations.

Gilligan's *In a Different Voice* (1982), along with her other works on women's experiences, provides an additional scheme through which to conceptualize moral development. Principally, Gilligan identifies two "voices" – also described as "ethics," or guiding principles for moral reasoning and action – from which research participants spoke of their moral orientations. One voice, that of "justice"—or an emphasis on autonomy, rights and rules—is in keeping with the principles of Kohlberg's view of moral development, while the voice of "care"—or a value of

human relationship and connection—emerges from Gilligan's research and appears to be often characteristic of women's moral reasoning.

The latter voice – that of care – is at the focus of Gilligan's (1977) developmental sequence, which she posits is more fully descriptive of women's moral development. The sequence is comprised of three levels, each characterized by increasing complexity in the individual's understanding of the relationship between the self and others. In between each level is a transitional stage involving the individual's conceptualization of selfishness and responsibility. In the first level, Orientation to Individual Survival, meeting the needs of the self, as well as self-preservation, form the basis of moral reasoning and decision making. The first transition in the model, From Selfishness to Responsibility, occurs when the need to take care of one's self and the need to take care of others come into conflict; this transition is more often characterized by efforts at connection with others than by independence. In the next level, Goodness as Self-Sacrifice, individuals seek the acceptance of others and therefore taking care of the needs of others is of primarily importance, often to the neglect of the individual's needs. The next transition, From Goodness to Truth, involves a questioning of this subordination of self interest to the needs of others, and meeting both sets of needs comes to be seen as the responsible way to act morally. In the third and final level, The Morality of Nonviolence, the principle of avoiding hurt to both self and others becomes the guideline for moral reasoning, with the dichotomy of self and others yielding to more complex thought about moral choices and actions.

As Kohlberg's theory describes the development of moral reasoning toward a mature view of societal justice, Gilligan's conceptualization of the ethic of care highlights the often neglected affective dimension of engagement in community. Rhoads (1997) comments on his observation of students involved in service-learning that, depending on the individual and the

context, "Sometimes service to another reflects a reasoned concern for someone else...[while] other students expressed a more affective dimension of engagement..." (52). Nevertheless, he cites parallels with Noddings' (1992, 2002) assertions that moral emotions are central to moral development, and the experience of being cared for – and caring for others – as the key developmental process. Noddings (1992), who asserts that caring "is a way of being in relation, not a set of specific behaviors" (17), describes educating for moral development as fostering morally healthy relationships with others who care about the individual; likewise, students themselves learn to care through "modeling, dialogue, practice, and confirmation" (148) with caring others.

Thus, from both a justice and a care perspective of moral development, the individual moves from a moral orientation toward the self to an orientation that encompasses the needs of the larger community as well. Essentially, the moral isolation of the self – which is morally *dis*-engaged from the context in which it is situated – gives way to recognition of and engagement with the larger community and society. Some authors also view developing a moral and civic "identity" as central to this process (Blasi 1984, Berkowitz 2002); this is evident in Kytle's (2004) definition of engagement as "a personality trait, a durable disposition extended in time and applied to different behavioral settings, ultimately leading to a life-project of achievement, contributions to community and society, and a high quality of life" (xiii).

The Scholarship of Engagement

In addition to students' civic development, the civic responsibilities and activities of faculty is also a prominent theme in the literature on engagement in higher education.

Specifically, Boyer (1996) proposed the need for faculty to develop a *scholarship of engagement*. Ward (2003) explains that the term engagement, in this case, is used "to define the

connection between faculty service activities and disciplinary expertise, that is, how a faculty member's expertise affects his or her service activities and how these service activities can influence disciplinary expertise and scholarship" (4).

This concept has its origins in Boyer's (1990) *Scholarship Reconsidered*, and specifically in the "scholarship of application," which Boyer explains "moves toward engagement as the scholar asks, 'How can knowledge be responsibly applied to consequential problems? How can it be helpful to individuals as well as institutions?' And further, 'Can social problems *themselves* define an agenda for scholarly investigation?'" (21). Ward (2003) explains that in Boyer's thinking, the scholarship of engagement evolved to eventually transcend the scholarship of application – as well as that of discovery, integration, and teaching – "in that the scholarship of engagement provides a model to integrate all the other aspects of scholarship. That is, it is possible through an integrated view of faculty work to see that all work can be categorized as the scholarship of engagement" (12).

According to Boyer (1996), the impetus for his focus on engagement was dismay at the trend in higher education toward a dual focus of credentialing students and tenuring faculty, rather than on creating an educational enterprise relevant to society. Boyer proposed the scholarship of engagement as a solution to this concern:

At one level, the scholarship of engagement means connecting the rich resources of the university to our most pressing social, civic, and ethical problems... But, at a deeper level, I have this growing conviction that what's also needed is not just more programs, but a larger purpose, a larger sense of mission...The scholarship of engagement also means creating a special climate in which the academic and civic cultures communicate more continuously and more creatively with each other, helping to enlarge what anthropologist Clifford Geertz describes as the universe of human discourse and enriching the quality of life for all of us (18).

This vision has served as the basis for a growing literature that addresses how faculty can enact engaged scholarship. According to the *Wingspread Declaration on Renewing the Civic Mission*

of the American Research University (Campus Compact 1999), faculty teaching that is civically engaged can include community-based learning and undergraduate action research; moreover, faculty who are "engaged in revenant scholarship and work of social significance" (11) can involve students in this work through mentoring and the creation of learning communities.

Like Boyer, almost every author who describes the scholarship of engagement calls for a reconsideration of faculty reward structures and incentives. Recommendations include that faculty be credited for engaged scholarship in addition to traditional research and publication in the tenure process. Similarly, the dedication of university resources, including funding, can provide a tangible expression of institutional valuing of engaged scholarship. Ward explains that when faculty "know that the university's commitment to outreach and community involvement extends beyond rhetoric to reward [they will] accept and embrace a new outlook on service and engagement" (136-7).

The "Engaged Campus"

Battistoni (2002) states that "higher education is currently talking about the 'engaged campus,' and is looking at all areas to accomplish the goal" (9). Ward (2003) explains that the concept of the engaged campus is increasingly serving as a basis both for institutional missions and a response to public challenges to higher education. The growing use of the concept is also readily evident in the literature on civic engagement.

Some authors, such as Kenny et al. (2002), define the engaged campus or institution as one that combines students' civic development with the scholarship of engagement in its priorities: "Through providing opportunities for student civic engagement and through outreach activities, higher education institutions may integratively create a cadre of educated and engaged citizens graduating from community-collaborative, or engaged, universities" (1). Other views,

such as that of Hollander, Saltmarsh and Zlotkowski (2002), portray the engaged campus as one that "reorients its core missions – teaching, scholarship, and service – around community building and neighborhood resource development" (33). According to Ward (2003), in such a scenario the campus and the community work extensively together in mutually beneficent ways, to the point that "the lines between 'us' and 'them' are less clearly defined in a framework of engagement" (13). Such an arrangement reverses the typical one-way flow of knowledge from the campus to the community by creating a "synergy between knowledge in and knowledge out...where the community voice is part of the process" (15).

Hollander, Saltmarsh and Zlotkowski identify ten indicators of engagement that, when present in any combination or number, suggest "wider institutional engagement and the emergence of an 'engaged campus'" (35). The indicator of pedagogy and epistemology refers to engaged campuses as places where courses have community-based components and gaining knowledge through experience is "an academically credible method of creating meaning and understanding" (35). Faculty development as an indicator refers to the encouragement of a "reflective teaching methodology" (35) that is student-centered. Additionally, enabling mechanisms – or institutional structures that "broker" relationships between campus and community – are indicators of engagement, as is the allocation of internal resources, the development of external resources, and a faculty reward structure that promotes engagement. On the engaged campus, community-based education cuts across disciplinary and departmental lines, so that engagement is "embedded" in the "academic core" rather than pushed to the "margins" of the curriculum (35). In addition, visible administrative and academic leadership are combined with an institutional mission and purpose that is not just "rhetoric" but reflects a true "commitment to the public purposes of higher education and higher education's civic

responsibility to educate for democratic participation" (36). Finally, in a shared decision-making process, the voice of the community helps to "shape institutional involvement" (36) in that community.

Diversity and Civic Engagement

Colby et al. (2003) explain that – reflective of widespread demographic change toward greater diversity in the United States – "student demographics have undergone dramatic shifts as well. Compared with students of any prior generation, undergraduates today are much more diverse in every dimension – age, race, ethnic background, and economic status" (38). Despite this trend on the college campus, Hurtado (2001) asserts that most students attend public schools that are essentially segregated by race, which "often results in students' holding distinct perspectives about the world, harboring stereotypical views of groups outside of their own racial or socioeconomic group, and having very little experience in interacting with diverse peers" (23). Thus, many students enter college ill-prepared to deal with the diversity they will encounter there and in society at large.

This scenario sets the context for connecting diversity with civic engagement in higher education. As Edgerton (1997) explains:

These trends mean that American citizens are confronting new issues of cultural pluralism. Feeling at home in America requires a kind of active engagement with diversity that is new for many Americans. As citizens of an increasingly multicultural nation, we face the increasingly difficult task of appreciating the human concerns and bonds that underlie diverse people's ways. Acquiring a sense of how the world looks when perceived and pondered in another language, and how different ways of living each have their own integrity represent yet another new set of requirements for being an effective American citizen.

Thus, as college and universities seek to foster civic engagement and development among students, they necessarily must educate for diversity as well. Colby et al. (2003) explain that to

this end in higher education, "The movement toward incorporating a focus on cultural diversity has grown quickly, creating new impetus for engagement with moral and civic questions" (44).

Several authors conceptualize the ways in which higher education can educate students for civic engagement with diversity. Hurtado (2001) explains that in order for students to participate in a diverse democracy, higher education must provide them opportunities to learn how to "handle complex problems, engage in ethical decision-making, communicate across social differences, seek commonality, and build community with individuals who come from diverse social identity groups" (23-4). This learning extends beyond skill acquisition, however; as students encounter diversity on campus, their understanding of others different from them – as well as of their own identities – can begin to shift. As described earlier, Bennett (1998) outlines the process by which students' ways of dealing with difference can transition from an "ethnocentric" to "ethnorelative" stance. Erickson and O'Connor (2000) explain how this process can result in fundamental differences in the self, as changing "deeply held beliefs is a very difficult enterprise that is linked to factors necessary to our recognition and maintenance of our sense of self. Changing prejudice involves no less than a change in a person's recognition and organization of their ego" (68). Additionally, both Cross (1991) and Helms (1990) describe how black and white racial identity formation occurs through encounters with one's own referent group and with diverse others.

This learning and development in college can provide students with an understanding of diversity that leads to engagement in civic action. O'Grady (2000) explains that college students "need to be able to see the world through a variety of lenses, without cultural blinders, and to be able to critically reflect on and analyze what they are learning and doing... and ultimately – if they choose to – to transform oppressive situations through action" (5). Erickson and O'Connor

(2000) give an example of how this may occur in service-learning, as "engagement programs try to push students beyond 'feeling badly' and toward understanding issues related to the imbalance of power" (61). This understanding serves not only to counter what Langseth (2000) calls "the old tradition of 'noblesse oblige'" (253) and O'Grady terms "paternalism on the part of the server" (12), but also to propel students toward action for social justice. Colby et al. (2003) describe working toward social justice – which they also call *systemic social responsibility* – as "contributing to social change and public policies that will increase gender and racial equality, end discrimination of various kinds, and reduce the stark income inequalities that characterize this country and most of the world" (65).

Many authors assert that this kind of civic engagement – with diverse others, with self and one's own beliefs, and with action for social justice – is essential to what Colby et al. describe as education "for participation in a pluralist and multicultural society and a world that extends beyond the boundaries of the United States" (51).

Toward a Description of Engaged Learning

To return to the grammatical exercise with which this discussion began, the meaning of the noun "learning" and the adjective "engaged" that comprise the phrase *engaged learning* have been explored. Now the question of the meaning of the entire phrase – or in other words, how learning in college can be engaged – can be considered. As engaged learning is a relatively new concept in the literature, it is helpful to situate its potential meanings in the contexts from which they have emerged. Specifically, engaged learning has developed in response to fundamental challenges to both the *quality* and *relevancy* of higher education.

A Crisis of Quality

Throughout the literature there are references to a crisis of quality in the educational experiences colleges and universities provide for students. The Association of American Colleges and Universities (AAC&U), in the report entitled *Greater Expectations: A New Vision for Learning as a Nation Goes to College* (2002), issues a call for "a dramatic reorganization of undergraduate education to ensure that all college aspirants receive not just access to college, but an education of *lasting value*" (vii, emphasis added). Reviewing the current state of higher education, the report concludes that "change is urgently needed. Even as college attendance is rising, the performance of too many students is faltering...Broad, meaningful reform in higher education is long overdue" (vii).

But what is the source of this crisis of quality? According to Edgerton (1997), the central problem involves student learning and ineffective educational practices:

Held to a standard of learning for understanding and acquiring the literacies needed for our changing society, there are pervasive issues of quality throughout the entire system. Throughout the whole enterprise, the core issue, in my view, is the mode of teaching and learning that is practiced. Learning "about" things does not enable students to acquire the abilities and understanding they will need for the 21st century. We need new pedagogies of engagement that will turn out the kinds of resourceful, engaged workers and citizens that America now requires.

This focus on student learning proposed by Edgerton has been adopted by many colleges and universities that are seeking to address the issue of educational quality. This crisis of quality in higher education begs the question of the literature, what are the *best* kinds of learning for which institutions can strive? This question can be answered by drawing upon the three perspectives of learning in college examined in this review: cognitive-structural theory; adult and experiential learning theory; and psychosocial theory. Cognitive-structural theory describes such learning as promoting complexity in students' ways of making meaning, understanding the self, making

judgments about ill-structured problems, and taking responsibility for their own learning. Adult and experiential learning theory points to learning that integrates experience, reflection, and action, and that is active, iterative, problem-based, transformative, and situated in social contexts. And psychosocial theory views optimal learning in college as extending beyond cognition to encompass all domains – including affective, social, and moral – of the self, thereby ultimately leading to development of the whole student.

The definition of "engagement" in higher education with which these insights are most readily juxtaposed is the involvement perspective, which is used widely in discussions of quality in higher education (the principle underlying NSSE is that engagement in learning is a proxy for institutional quality). When comparing the literature on student learning with an involvement perspective of student engagement, a good deal of overlap is evident between the optimal kinds of learning described by each. An involvement perspective cites student engagement in learning that is active, experiential, and integrative, as well as dependent upon interactions with the campus environment and extending beyond cognition into other domains (Kuh et al. 1991). As these are points at which the involvement perspective of engagement converges with perspectives of learning in college (specifically adult and experiential learning theory, and psychosocial theory), they represent significant possibilities for advancing a definition of engaged learning.

However, there are two issues that preclude limiting such a definition to these points of convergence. The first is the relative disconnect between the involvement perspective of engagement and cognitive-structural theories of learning in college. A repeated emphasis in the involvement perspective is on students' investment of more time and effort in their learning, provided that the learning activities in which they are involved are empirically deemed to be

efficacious. Thus, where the input-output perspective of involvement diverges from cognitive structural theory is the latter's emphasis on the degree of complexity – rather than exertion of time and effort – in students' learning. Cognitive-structural theory essentially calls into question engagement as a function of activity, motivation, or attention in learning, even if in educationally sound experiences. By way of illustration, students can be diligently and actively involved in a collaborative research project, but their learning approach primarily consists of memorizing facts and processes or trying to "give professors what they want" in assignments. In comparison, other students in the same research project may critically reflect on their own assumptions about knowledge, actively seek to evaluate multiple perspectives, and routinely consider the role of contexts in their learning. There is little doubt that most educators would view the latter group of students to be more "engaged" in learning, and their learning could be said to be of higher quality, particularly if it were characteristic of their overall educational experience in college. For this example, the effectiveness of the instructor's teaching and mentoring of students may certainly be a factor in how students approach their learning. But as described by cognitivestructural theory, students also bring cognitive standpoints of varying complexity to their learning that fundamentally shape how they interact with and make meaning of educational experiences.

This example is reminiscent of questions Kuh (2003) describes as unresolved by and for NSSE. Kuh (2003) explains that in keeping with the "need to know more about what promotes engagement," Edgerton and Shulman assert that "students can be engaged in a range of effective practices and still not be learning with understanding" (31). It is possible that cognitive-structural theory – which gives primacy to qualitatively complex interactions with learning, rather than mere (or even intensive) involvement – may well hold the answer for this particular question.

The dimension of complexity in learning should therefore be considered in a description of engaged learning and, arguably, in discussions of quality in higher education.

The second issue that suggests there may be an additional definition for engaged learning is the existence of another strand of meaning for "engagement" in higher education – that of civic engagement. This meaning is most adequately situated and described within the context of the second crisis facing higher education – that of relevancy.

A Crisis of Relevancy

Boyer (1996) describes "a growing feeling in this country that higher education is, in fact, part of the problem rather than the solution... [that] the overall work of the academy does not seem particularly relevant to the nation's most pressing civic, social, economic, and moral problems" (247). Hollander, Saltmarsh and Zlotkowski (2002) describe this sentiment in terms of a "crisis in our civic life" (33) that is driving institutions toward rethinking their educative purpose and practice:

The ethos of professionalism and expertise that defined higher education's response to the national crisis of the cold war now contributes to public disillusionment with institutions that represent and legitimize a system that no longer addresses our most pressing national needs... For this reason, many higher education institutions, in their struggle to meet our need for civic renewal, have found themselves returning to their founding missions, which in some part express the aim of serving American democracy by educating students for productive citizenship (33).

This move toward educating for democratic participation has provided the foundation for much of the literature on civic engagement in higher education. As Ward (2003) explains, "The term *engagement* is used as a response to the general uneasiness many in higher education are feeling about the nexus of higher education's past, present, and future and how this composite history plays a role in society" (12).

The question, then, becomes what connections might there be between learning in college

and civic engagement in higher education? In other words, what are the implications of this meaning for the term "engagement" for the concept of engaged learning? The most explicit linkages occur in places where civic engagement draws upon theory used to describe learning in college; for example, moral development theory often frames discussions of students' civic development, and psychosocial theories – such as Bennett's model of intercultural sensitivity and theories of racial identity development – provide a means of describing the interconnectedness of diversity and civic engagement.

But perhaps the larger and more important connection between civic engagement and learning in college – and therefore to the question of engaged learning – is its potential to define what the *Greater Expectations* report calls the "kind of learning students need to meet emerging challenges in the workplace, in a diverse democracy, and in an interconnected world" (vii). This perspective of engagement holds that the best kind of learning in college is that which addresses authentic, salient issues in the community and society at large, and that prepares and equips students for civic participation in American democracy. Edgerton (1997) explains the link between learning in college and civic engagement:

Higher education can be much better than it now is... Being better means not just offering courses and providing instruction, but taking responsibility to produce student learning. This, in turn, entails thinking harder about the kinds of learning that students and society need in the 21st century... learning that entails real understanding, and learning that includes the literacies now required for our changing society, especially the literacies related to leading a life of engaged citizenship.

A civic engagement perspective therefore asks the question with *what* are learners actually engaged, and answers that students are engaged with learning that promotes civic responsibility and activity in a diverse democracy. This vision of engaged learning can serve not only as a basis for institutional missions, but also as a potentially unifying purpose in higher education. To this end, Colby et al. (2003) assert that for "U.S. institutions of higher education… principles and

ideals that have a place in a common core of values can also be derived from educational institutions' obligation to educate students for responsible democratic citizenship" (12-3).

Emerging Definitions

As mentioned at the beginning of this review, the current state of the literature does not permit a unifying definition of engaged learning. However, the literature on student learning and engagement does point to two possible conceptual starting points for such a definition. First, arising from the intersection of theories addressing learning in college and the involvement perspective of engagement, engaged learning might be described as *optimal learning that is inherently active and integrative of experience, marked by increasingly complex ways of knowing and doing, interactive with social contexts, and holistic in its encompassment of multiple domains of self.* Secondly, from a civic engagement perspective of learning in college, engaged learning might be described as *learning that has as its purpose development of students' civic capacities for democratic participation and engagement in community life.*

These two descriptions are not mutually exclusive; rather, as described earlier, they are both necessary for higher education to meet fundamental challenges related to quality and relevancy in its purpose and mission. However, they are reflective of confusion over the term "engagement" in the literature that is in need of resolution before a definition can emerge. At issue is not just clarifying terminology, but whether higher education can meaningfully integrate these two conceptual views into a unified definition of engaged learning, or whether the two will remain conceptually apart as they are largely now. There is promising evidence of a movement toward integration in the literature, particularly in calls for fundamental and systemic reform in higher education. For example, the *Greater Expectations* report cites the need for higher education to help students become "intentional learners" who are "integrative thinkers who can

see connections in seemingly disparate information and draw on a wide range of knowledge to make decisions," which reflects engaged learning based in the involvement perspective of engagement, *and* are "responsible for personal actions and civic values," which reflects engaged learning based in the civic engagement perspective of learning (22-3). In this both/and process, "intellectual study connects to personal life, formal education to work, and knowledge to social responsibility" (22).

Pedagogy at the Crossroads

At the crossroads of these two descriptions of engaged learning is pedagogy that draws upon both. As mentioned earlier, adult and experiential learning theory has provided the conceptual basis for pedagogy for both an involvement perspective and a civic engagement perspective of learning in college. As a result, many of the same approaches – such as action or collaborative research, reflective practicum experiences, service-learning, and other experiential learning activities – are cited in the literature as exemplary pedagogy for both perspectives. On one level this is encouraging, in that even though conceptual issues persist, scholars and practitioners may be able to take a both/and approach to engaged learning through pedagogy. For example, Benson and Harkavy (2002) describe service-learning as one of "a handful of creative, active pedagogies...that enhance a student's capacity to think critically, problem solve, and function as a citizen in a democratic society" (362, emphasis added). On the other hand, there is a temptation for those in higher education to focus solely on developing pedagogy (about which there is relative consensus) and neglect conceptual work that is still in need of attention. With both this promise and caveat in mind, the review now turns to describing specific pedagogical approaches for engaged learning.

II. Pedagogies of Engagement

Edgerton (1997) proposes the concept of *pedagogies of engagement* – which he synonymously calls *pedagogies for engaged learning* – in his *Higher Education White Paper* developed for the Pew Charitable Trusts. In Edgerton's view, these pedagogies may be seen as standing at the crossroads between the two meanings of engagement in the literature:

The dominant mode of teaching and learning in higher education [is] 'teaching as telling; learning as recall.' As we have seen, this mode of instruction fails to help students acquire two kinds of learning that are now crucial to their individual success and critically needed by our society at large. The first is real understanding. The second is 'habits of the heart' that motivate students to be caring citizens. *Both of these qualities are acquired through pedagogies that elicit intense engagement* (emphasis added).

Thus, Edgerton not only describes the dual aims of such pedagogies, but also places them in opposition to much of the teaching and learning that occurs in higher education. This reflects the consensus in the literature that engaged pedagogies, in many ways, are counternormative to the educational practices found at most colleges and universities. Before discussing specific types of engaged pedagogies, it is therefore helpful to first situate them in the broader landscape of teaching and learning in higher education.

Edgerton's description of "teaching as telling; learning as recall" is echoed by many authors in the literature. For example, Battistoni (2002) asserts that the educational reform proposed by Dewey in the early 1900s is equally applicable today:

With all of the new experiments in teaching and learning, we can still question, as John Dewey did more than 80 years ago: 'Why is it, in spite of the fact that teaching by pouring in, learning by a passive absorption, are universally condemned, that they are still entrenched in practice?' (3).

This type of learning is also described by Freire (1970), who portrays most of education as operating on a "banking model" – in which educators deposit information and knowledge into students' minds, and then expect students to draw on and replicate this knowledge on objective

examinations. Howard (1998) similarly describes the "prevailing information-dissemination model in higher education" but also notes the degree to which it is entrenched in all levels of American education: "Through years of elementary and secondary school rehearsal and then higher education reinforcement, classroom roles, relationships, and norms in the traditional model have been powerfully internalized by all parties" (23).

Palmer (1998) describes this prevailing form of education as founded on a "mythical but dominant model of truth-knowing and truth-telling" (100). In this model, objects of knowledge that are "out there" somewhere are placed at the top of the educational hierarchy. The role of experts (faculty) is to know these objects without subjectivity, and to convey the "purity" of these objects to "amateurs" (students). Additionally, there are "baffles at every point of transmission" that "allow objective knowledge to flow downstream while preventing subjectivity from flowing back up" (101). Palmer identifies two key problems with this model: first, "it falsely portrays how we know," in that knowledge is seen as discrete and separate from the human beings who know it; and second, "it has profoundly deformed the way we educate" (101), in that students are prevented from developing personal understanding of or relationship with the object itself, but must instead rely solely on the teacher for knowledge.

Pedagogies of engagement – with their goals of involving students in their learning and fostering civic development of students to be citizens of communities – would be situated in opposition to this dominant model, and therefore aligned with Palmer's descriptions of the "community of truth." According to Palmer, when an educational institution operates as a community of truth, it "represents knowing quite differently... as in real life, there are no pristine objects of knowledge and no ultimate authorities" (101). Instead of an object, a "subject" becomes the center of education, for which "we do not merely hold it at arm's length [but] know

it in and through relationship" (103). In this view, "truth is an eternal conversation about things that matter, conducted with passion and discipline" (104), and education is a communal dialogue about these "great things that call us together – the things that call us to know, to teach, to learn" (107). Palmer describes "great things" as including the symbols of theology, archetypes of literature, artifacts of anthropology, logic of systems, expressions of music and art, and the idea of justice, but he asserts that all of them are best approached by active dialogue and knowing through relationship in community. This alternate view of education is echoed in a National Science Foundation (1996) report entitled *Shaping the Future*, which cites the major improvements in undergraduate education as pedagogies that: focus on the process of inquiry instead of acquiring facts; involve active learning experiences; highlight current issues for which students have personal contexts; address real world problems; and respect students' genuine efforts to learn.

It is against this backdrop of educational philosophy and practice that Edgerton envisions four major "strands of reform" in higher education: service-learning; undergraduate research; collaborative learning; and problem-based learning. Similarly, Colby et al. (2003) identify engaged pedagogies as service-learning; collaborative learning; problem-based learning; and other experiential education (such as internships, fieldwork, action research). By cross-referencing these lists, the following five strands of engaged pedagogy are identified and discussed in this section of the review:

- Service-learning;
- Community-based research;
- Collaborative learning;
- Problem-based learning; and

Other forms of engaged pedagogy.

It is important to note that these strands do not represent an exhaustive cataloguing of pedagogies that might be considered engaged, but rather those that are widely identified and addressed in the higher education literature. They are also not concise categories, owing to an overlap in terminology in the literature, as well as tandem usage of engaged pedagogies in practice (e.g., collaborative learning groups in a service-learning course).

Outcomes of each pedagogy for student learning and development, where they are known and presented in the literature, are summarized as well. The majority of outcomes examined pertain to students' academic learning and cognitive development, and thus – as mentioned earlier – direct linkages between these individual pedagogies and student mental health and well-being have not yet been established. Finally, this section of the review considers the ways known and possible outcomes are limited by isolated use of these pedagogies, and concludes that the potential of individual engaged pedagogies can only be fully realized in a larger *culture of engagement* in higher education.

Service-Learning

Colby et al. (2003) assert that in the past decade, service-learning "has emerged as the most widespread and closely studied of the various student-centered, or engaged, pedagogies. It has become one of the most popular ways to integrate moral and civic learning into academic coursework" (134). In spite of (or perhaps due to) this popularity, there is a lack of consensus in the literature as to the definition of service-learning. There is also dispute as to which terminology best describes the pedagogy, whether academic service-learning, community-based learning, community service, volunteerism, and so forth. Even among those who advocate for the

term service-learning, there is debate as to whether or not it should be hyphenated (the hyphen is used in this review to reflect its preponderance in the literature). As Eyler and Giles (1999) explain, "A lot of energy has been devoted to defining service-learning. In 1990 Jane Kendall wrote that there were 147 definitions in the literature, and there has been no falling away of interest in this endeavor since" (3). Crews (2002) asserts that the dramatic growth of service-learning "as a pedagogy in the past decade... [makes] the task of becoming acquainted with the field and its constituencies a somewhat daunting task" (v); therefore, the purpose of this section of the review is to provide an overview of the service-learning literature.

Defining and Describing Service Learning

Furco (1996) explains that "the term 'service-learning' has been used to characterize a wide array experiential education endeavors... the definitions of service-learning area as varied as the schools in which they operate" (11). Similarly, Crews (2002) remarks, "Given its flexibility and the many different ways in which it is being experimented with in vastly different contexts and communities, service-learning certainly can be seen as a *set* of pedagogies" (viii, emphasis added). For the purpose of this review, definitions and formulations of service-learning that synthesize both perspectives of engaged learning – involvement and civic – are of particular interest. This integrative perspective is in keeping with the assertion of Stanton, Giles and Cruz (1999), that service-learning "joins two complex concepts: community action, the 'service,' and efforts to learn from that action and connect what is learned to existing knowledge, the 'learning'" (2). Similarly, Jacoby (1996) explains: "Service-learning is a form of experiential education in which students engage in activities that address human and community needs together with structured opportunities intentionally designed to promote student learning and development" (5). Regarding the balance of these two activities, Jacoby (1996) and Eyler and

Giles (1999) all endorse Sigmon's (1996) definition of service-learning, in which both words in the term – *service* and *learning* – are given equal weight in students' experiences. And according to Jacoby (1996), "The hyphen in *service-learning* is critical in that it symbolizes the symbiotic relationship between service and learning" (5).

The concept of "service" is linked to this pedagogy's foundation in a civic engagement perspective. In practice, students are generally involved in service through non-paid work in a community setting, though the question of what constitutes "community" has generated considerable discussion in the literature (Jacoby asserts that communities can be both local and global in nature and that student involvement in either should be considered valid for service-learning). Common examples of service-learning settings include homeless shelters, literacy centers, health clinics, legal aide agencies, or community organizations (such as senior citizens' centers, Boys and Girls Clubs, or group-specific – e.g., immigrants – advocacy centers). Students can perform a wide range of duties in these settings, but Eyler and Giles (1999) suggest that the more relevant the service to the student's coursework the more meaningful the learning experience can become.

It is important to note that discussions of "service" in service-learning often reflect distinctions in underlying philosophies for civic engagement, as discussed in Part I of this review. For example, proponents of a philanthropic perspective see the educational goal of service-learning as instilling in students a spirit of charity, which in turn will inspire students to continue to give to those less fortunate over their lifetimes. The civic perspective views service as founded on democratic principles, with students serving as agents of change to help empower community members; calls for service-learning to adopt a social justice orientation – and to challenge existing power structures that lead to disenfranchisement and oppression of the

community being served – are often issued from this perspective. The communitarian view, however, holds that through service, students can become responsible members of communities and work toward shared values that lead to self-governance (Codispoti 2004). Hoppe (2004) asserts that any or all of these philosophies may be operating at a given institution, often depending on the orientation of individual faculty or service-learning programs; additionally, elements of different philosophies can be (and often are) combined to both justify service-learning at the institution and frame students' understanding of their service experiences.

In *The Wingspread Principles of Good Practice for Combining Service and Learning*, Porter Honnet and Poulsen (1989) offer several principles that outline the ideal relationship between the community and the institution in the service-learning partnership, most of which are echoed throughout the literature on service-learning. According to the authors, service learning is defined as responsible action for the common good. Those with needs – the communities being served – must be the ones to define those needs, and the provision of services and providers are continually matched with and adapted to those needs. Not only are clear service and learning goals articulated for students, but so too are the responsibilities of all parties in the service-learning arrangement. Ongoing training, supervision, support, monitoring, and evaluation is provided for both students and the service-learning arrangement in general. There is broad and specific institutional commitment to service-learning (e.g., funding and other resources), as well as dedication to participation by and with diverse populations.

As the name does imply, service-learning is also considered an engaged pedagogy from the involvement perspective of engagement. Throughout the literature, service-learning is described as providing opportunities for active learning that integrate students' experiences in the curriculum with their experiences of service. Zlotkowski (1999) explains that in contrast with

"traditional cocurricular volunteerism" (97) in higher education, there has been a widespread move to integrate service with the academic structure and curricula of institutions: "Currently, almost all service learning programs that seek to have a significant institutional as well as community impact also seek to promote faculty involvement and to establish a reliable curricular base" (98). This type of integrative service-learning has been implemented in a wide range of academic disciplines and professional fields (Madden 2000). An extensive monograph series by the American Association for Higher Education (AAHE) covers formulations of service-learning in fields and disciplines such as biology, composition, engineering, history, management, philosophy, political science, psychology, sociology, women's studies, and others. Regardless of discipline, Zlotkowski (1999) highlights the importance of the faculty's role in articulating the rationale, purpose, and learning goals of service activities, as well as ensuring that the specific tasks of service are relevant to these goals.

One of the hallmarks of service-learning as an engaged pedagogy is the importance placed on structured opportunities for reflection, such as journal writing and group discussion. This emphasis is in keeping with the integrative process of experience, reflection, and action described by adult and experiential learning theory (Kolb 1984). Eyler and Giles (1999) explain that, "At its simplest, reflection is being able to step back and be thoughtful about experience – to monitor one's own reactions and thinking processes" (171). On a more complex level, reflection enables students to not only make connections between their classroom learning and their service experiences, but also consider the meaning of their learning and how it may be applied. From their research, Eyler and Giles note that structured reflection in service-learning is a predictor of positive academic outcomes.

Finally, several authors address the importance of structural components in service-

learning. Although service-learning courses vary in their formulation – such as entire courses based on service, service-oriented discussion sections attached to larger content courses, or small facilitated groups of students engaged in service that meet independently from the class – many authors point to the importance of making service-learning a credit-bearing activity, thereby fully legitimizing as well as valuing students' involvement in service-learning. Additionally, the parties responsible for handling the administrative aspects of service-learning – such as how placements are made, sites are selected, and so forth – can vary greatly, from individual faculty to service-learning centers with dedicated coordinators. The staff responsible for servicelearning at an institution can be drawn from academic affairs or student affairs, though Engstrom (2003) concludes "the literature suggests that most effective programs are based on partnerships between faculty and student affairs professionals" (65). Service-learning experiences can also differ in terms of duration; depending on the degree to which service-learning is integrated in the curriculum, students' involvement can span a few days or weeks, a summer break, a semester, an academic year, or their entire college career (McCarthy 1996). Finally, from a field-level perspective, it would be difficult to overstate the role of service-learning organizations in the promotion of practice and research in higher education. Organizations such as Campus Compact, Campus Outreach Opportunity League (COOL), the National Society for Experiential Education (NSEE), and others continue not only to provide valuable resources to interested institutions and faculty, but also to shape the national dialogue on service-learning.

Known Outcomes of Service-Learning

As compared with other engaged pedagogies, the outcomes of service-learning on student learning and development have been widely studied and described in the literature. Findings related to student mental health and well-being – and specifically the issue of heavy drinking –

are reported by Wechsler et al. (1995), Jessor et al. (1995), and Fenzel (2005); all three describe a correlation between participation in pro-social activities like community service and lower drinking rates, though as Fenzel asserts, "cause and effect cannot be inferred" (136) from these studies. In comparison, much more is known about the academic and social impact of service-learning that relationships with mental health and well-being.

For example, in their meta-analysis of higher education research, Pascarella and Terenzini (2005) found that students involved in community service had a measurable learning advantage over those not involved in service. Furthermore, such students were "significantly more likely than control students to say that they learned to apply principles from the course to new situations" (129). When considering the different formulations of service-oriented activities in higher education, Pascarella and Terenzini found support for the hypothesis that "greater learning will occur in courses or curricula where the service component is an integral part of the course content and activities and where there is a regular reflective component linking the two (that is, service learning) than in courses that simply contain a service component…" (129-30).

In Where's the Learning in Service-Learning?, Eyler and Giles (1999) report their findings from two comprehensive studies of service-learning outcomes, one of which involved extensive surveys of fifteen hundred students and the other intensive student interviews of a smaller sample. The authors issue the following caution regarding the results of their study:

Although the effects of service-learning on students that we found in our studies were often significant, they are not large. They are, however, rather consistent. Service-learning makes a difference, and within the group who experience these programs, higher-quality service-learning makes a bigger difference (xvii).

With this warning in mind, Eyler and Giles identified gains across the areas of students' civic engagement, involvement in learning, and personal and interpersonal development.

In terms of the civic dimension of engagement, Eyler and Giles found that a third of service-learning participants reported gaining a new perspective on social issues. Service-learning was also found to impact students' perceptions of the locus of social problems, valuing of social justice, and desire to personally effect political change. Eyler and Giles claim that these and other identified outcomes of service-learning contribute to "active and effective citizenship," which they describe as comprised of the elements of values, knowledge, skills, efficacy, and commitment (163).

In support of service-learning as an effective pedagogy from the involvement perspective of student engagement, Eyler and Giles report:

Students suggest that this greater learning results because they are more engaged and curious about issues they experience in the community. Students find that they remember and can use material that they learn from the rich and complex community context. Students report that service-learning is powerful because it is rooted in personal relationships and in doing work that makes a difference in people's lives, which helps them connect their learning to personal experience (98).

Specifically, in the area of understanding and applying knowledge, students reported that they were more motivated to work harder in service-learning classes, experienced deeper understanding of subject matter and social issues, and were better able to apply classroom learning to real problems. With regard to critical thinking skills, Eyler and Giles report that students "in service-learning classes where service and learning are well integrated through classroom focus and reflection are more likely to show an increase in their level of critical thinking demonstrated in problem analysis" (127).

Finally, in the realm of personal and interpersonal development, Eyler and Giles found that participation in service-learning led to reduced stereotyping and greater tolerance, as well as student reports of positive impact on their ability to work well with others. Service-learning was a predictor of increased leadership skills and, in affective terms, students reported "greater self-

knowledge, spiritual growth, and finding reward in helping others" (55) as a result of service-learning participation. The authors also point to service-learning as a "predictor of an increased sense of personal efficacy" and "desire to include service to others in one's career plans" (55). Additionally, service-learning was a predictor of students' feeling connected to the community, as well as a means of creating opportunity for close relationships among students and between faculty and students, which are themselves predictors of positive educational outcomes.

In addition to outcomes-based research, there has also been an examination of the actual learning processes that occur within service-learning experiences. From their study of students in service-learning programs, Rockquemore and Schaffer (2003) developed a three-stage "theory of engagement" that answers the question of "how do students learn while they are engaged in service learning" (43). In the first stage of *shock*, students (who mostly came from middle and upper-middle class families in the study) experience "shock and disbelief at the social and economic circumstances they were expected to work within" (43). Similar to the disorienting dilemma described as triggering learning in adult learning theory, this stage provides "a sharp emotional and psychological jolt to students' perceptions of reality [since] college students, like most humans, tend to generalize their own individual experience to the rest of society" (44). In the second stage, normalization, students gain a level of comfort both in their surroundings and role in the community service setting. As personal relationships with people in the setting develop, "the 'other-ness' gives way to personal description" (45), and students no longer "marginalize" and "stereotype" the people with whom they work. Additionally, students tend to "express an understanding of the importance of service... [and] to feel committed to the people and the institutions they served" (45). In the final stage, engagement, "Students began seeking answers to their causal questions...It was in the final stage that students were forced to reconcile

the content of the coursework" (46) with their experiences in the community. Ultimately, the authors explain, "Students became engaged in the learning process because the people and situations they were studying in their course readings were not hypothetical examples, but real people with whom they had developed personal relationships" (46).

Among the engaged pedagogies discussed in the literature, service-learning enjoys the most extensive documentation of outcomes across various dimensions of student learning and development. While there has been some research demonstrating a correlation between lower levels of heavy drinking and involvement in community service activities, the actual relationship underlying this correlation is not clear. This therefore remains an area for future inquiry.

Community-Based Research (CBR)

As with many areas of the literature addressed in this review, there is a wide range of terminology used to describe this form of engaged pedagogy, such as community-based research, collaborative research, participatory action research, and action research. Many of these terms are differentiated by the constituencies involved (e.g., faculty, students, and community members; just faculty and community members; or just community members). For the purpose of this review, community-based research (CBR) seems the most appropriate term to describe research that is anchored in the community and actively involves students, as described by Strand et al. (2003): "CBR is a partnership of students, faculty, and community members who collaboratively engage in research with the purpose of solving a pressing community problem or effecting social change" (3). Thus, CBR employs both perspectives of engagement in that it utilizes an active learning approach and focuses on civic involvement.

Defining and Describing CBR

The use of CBR as a pedagogy to actively engage students in their learning is rooted in the longstanding tradition of involving undergraduates in faculty research projects. In describing widespread use of undergraduate research at strong-performing institutions (defined as those with higher-than-expected graduation rates and student engagement scores on the NSSE), Kuh et al. (2005) assert that "collaborating with faculty on such investigations gave students a better understanding of their teachers [and] deepened their learning" (215). Strand et al. (2003) draw similarities between these benefits of traditional undergraduate research and those of CBR, in that "the basic principles of CBR distinguish it from conventional models of teaching that is classroom based and lecture oriented" (14). Like undergraduate research, CBR utilizes "active learning and problem-centered pedagogy" and employs "the best combination of experiential and intellectual learning strategies" (10). Where CBR differs from undergraduate research in engaging students in active learning is that CBR considers students as equal partners with faculty and community members on the research team. Students are thereby empowered in their learning and ultimately "engage in critical discussions about problems and issues, arrive at solutions mutually, and work together to implement them..." (10).

Additionally, CBR differs from most undergraduate research in that it also has civic engagement at its focus. Strand et al. explain that CBR draws on "diverse historical influences" (8) of popular education (Hull-House and Highlander Research and Education Center, as well as the work of Paulo Freire), action research (Lewin's research on increasing worker productivity and satisfaction through democratic working conditions), and participatory research (conflict-oriented work by non-profit organizations in the 1960s and 70s). These influences converge in the definition of "community" in CBR, in that it involves a wide range of sites such as schools,

community-based organizations, agencies, or issue groups, but in "every case, the community consists of people who are oppressed, powerless, economically deprived, or disenfranchised – that is, who are disadvantaged by existing social, political, or economic arrangements" (3). Thus, owing to its civic orientation, "CBR has as its goal social action and social change for the purpose of achieving social justice" (8). According to Strand et al., students engaged in this type of research must employ "critical analysis of causes of social problems and also must consider solutions and strategies for change... [which] makes CBR a particularly effective pedagogy for helping students acquire knowledge and skills for active citizenship and democratic participation" (15).

Additionally, CBR involves a much different view of "knowledge" than traditional academic research. Nyden (2003) explains, "Collaborative research is distinct from research on the community; rather, it is research with the community" (218). In the traditional model of research, knowledge is "mined by academic 'day laborers' who collect data through interviews, focus groups, surveys, and secondary data analysis" (219). This model presumes that faculty are objective researchers studying subjects in the community, which creates "false boundaries between knowledge that resides in the academy and the knowledge that exists in the community – boundaries typically constructed to protect the illusion of the superiority of academic expertise" (218-9). Community-based research serves to deconstruct these boundaries by valuing both sets of knowledge equally, working to integrate the two, and holding that knowledge "is complex and dynamic and cannot be separated from those who live its realities" (219). As a result, community members are involved in all phases of the research process, including "identifying the research needs and in the design and implementation of the research itself, thus making the outcomes more meaningful and useful" (215).

Stoecker (2002) describes the specific ways in which CBR transforms the traditional steps of research, including "defining a question, organizing a methodology, collecting data, analyzing, and reporting the results" (222). First, the research question arises out of a relationship with community and must fit with community goals. The methodology used in CBR is diverse in terms of qualitative and quantitative approaches, and therefore runs contrary to the traditional, exclusive use of survey research. Depending on the issues at the focus of the research, instrumentation may also be grounded in other areas such as hard science (e.g., assessing air quality in urban areas). Faculty, students and community members all work together collaboratively to gather and analyze research data, and disseminate research results in a variety of formats, from brochures, project reports, websites, to community forums. Stoecker explains that "CBR is not primarily about writing a journal article. In fact, an increasing number of community organizations make academics sign agreements not to publish anything without community permission" (225). Similarly, Reardon (1998) explains that rather than carefully crafting articles for publication, researchers are ultimately focused on "discovery of knowledge that can lead to immediate improvements in local conditions and are willing to act on less-thanperfect information in order to quickly address critical issues" (59).

Stoecker (2002) explains that despite the benefits of CBR for all participants, faculty and institutions face multiple challenges in implementing CBR in a course or curriculum. Due to the complexity of community issues, individual faculty members generally cannot facilitate CBR by themselves but instead must involve colleagues from different disciplines to contribute diverse methodologies and approaches. Faculty must also actively facilitate discussion and reflection among participants under continually changing conditions, as opposed to delivering the traditional and static lecture. They also must contend with the devaluation of applied research –

particularly since CBR can appear to focus on political causes or issues – and the implications for the tenure and promotion process. Another issue in implementing CBR is that the academic timeframe of semesters often does not correspond to the community's timeline; the research process can take longer than a semester or academic year, and deadlines may fall any time in the academic term (as opposed to at final exam week). Finally, background experiences, cultural differences, and language can vary between faculty, students, and community members, thereby necessitating that all participants learn respect and effective communication skills. To this end, project participants may all benefit from diversity training aimed at fostering intercultural communication.

One avenue by which CBR may more easily be implemented in higher education is to partner CBR with existing service-learning programs. Stoecker (2002) explains that as service-learning "has a longer history and more institutional support than CBR" faculty and students interested in CBR can "leverage resources without creating competition and conflict" (234) by collaborating with existing service-learning initiatives. There are several benefits to service-learning programs as well; Lisman (1998) asserts that CBR can increase community receptiveness to service-learning efforts by countering perceptions of service-learning as charity work or of the institution as exploiting the community as a laboratory. Perhaps most importantly, according to Nyden (2003), CBR can help students involved in service-learning "understand the connections among knowledge, service, and social change... [and] to view service as building community capacity rather than dependency and to learn about the dynamics of authentic partnerships" (213).

Known Outcomes of CBR

As an engaged pedagogy, community-based research has the potential to involve students

in the active and collaborative learning characteristic of traditional undergraduate research as well as authentic and powerful opportunities for civic engagement and development. What is not clear from the literature, however, are the effects or outcomes of CBR on student learning and development; this therefore remains an area for future research and assessment.

Collaborative Learning

As a pedagogy that encompasses a wide range of group and peer learning activities in higher education, *collaborative learning* focuses on actively involving students in learning with peers. MacGregor (1990) explains that collaborative learning has been gaining popularity in higher education:

There have always been social dimensions to the learning process, but only in recent decades have specially designed collaborative learning experiences been regarded as an innovative alternative to the lecture-centered and teacher-as-single-authority approaches typical of most college classrooms (20).

Due to its emphasis on involvement in learning, collaborative learning can be described principally as a pedagogy arising from the involvement perspective of student engagement. However, collaborative learning is widely used in conjunction with other engaged pedagogies that focus on civic engagement; for example, many service-learning classrooms will utilize collaborative learning activities and techniques. While distinct from collaborative learning, *cooperative learning* is a related pedagogy for which outcomes have been more widely researched in the literature, and therefore is also addressed in this discussion.

Defining and Describing Collaborative Learning

Bruffee (1993) points to social constructivism as the theoretical foundation for collaborative learning. This view assumes that "knowledge is a consensus among the members of a community of knowledgeable peers – something people construct by talking together and

reaching agreement," rather than a "foundational" view, in which knowledge is perceived as static and transferred from one person to another. As knowledge becomes shared in collaborative learning, so too does authority; Colby et al. (2003) explain that within the framework of collaborative learning, "the locus of authority is shifted from the teacher to the group, and the teacher acts as a coach and resource" (136). Bruffee asserts that as students "learn to depend on one another rather than depending exclusively on the authority of the teacher... they learn the craft of interdependence" (1).

With this framework in mind, Colby et al. (2003) explain that in collaborative learning, students may "work together in teams on projects, group investigations, and other activities aimed at teaching a wide range of skills and improving students' understanding of complex substantive issues..." (135). Bruffee also provides a sense of the diversity of activities that can be characterized as collaborative learning:

In collaborative learning students work on focused but open-ended tasks. They discuss issues in small consensus groups, plan and carry out long-term projects in research teams, tutor one another, analyze and work problems together, puzzle out difficult lab instructions together, read aloud to one another what they have written, and help one another edit and revise research reports and term papers (1).

In particular, Bruffee describes consensus groups at length, which involve "group work toward local consensus plus reports, followed by plenary discussion toward plenary consensus" (30). In this process, small groups are assigned to work on a task, then report their findings back to larger group, and then agreement is negotiated by the whole class. The teacher's role is to referee and then later serve as a judge of student work by comparing groups' findings with "current consensus in the knowledge community that the teacher represents" (30). In addition to consensus groups, collaborative writing experiences can provide students with the same opportunities as academics (e.g., writing and rewriting as part of peer review). Finally, peer

tutors – if working collaboratively with tutees – can help guide and mentor other students into the "conversation" of the tutoring subject so that tutees can eventually "carry it on internally on their own" (85).

Many authors explain that students who experience collaborative learning for the first time may exhibit significant resistance to group work, given the dominant pedagogical models in higher education. In fact, as Bruffee points out, collaborative learning is generally discouraged instead of encouraged in higher education: "Traditional college and university teaching has little use for collaboration, does not teach it, distrusts it, and often penalizes it" (2). MacGregor claims that entering a collaborative learning setting therefore requires students to make several shifts, from: passive to active learning; low to high levels of preparation for class; "a private presence in the classroom to a public one;" attendance "dictated by personal choice to that having to do with community expectation;" competing to collaborating with peers; independent to interdependent learning; and "seeing teachers and texts as the sole sources of authority and knowledge to seeing peers, oneself, and the thinking of the community as additional and important sources of authority and knowledge" (25-6).

According to MacGregor, faculty can help students in making these shifts by providing a common conceptual framework, posing questions or problems to stimulate learning, and outlining clear expectations of group outcomes. Faculty are also responsible for monitoring group dynamics and setting expectations, norms, and ground rules, all of which contribute to a "safe environment for risk taking, where students' offerings, even the most tentative ones, are listened to attentively, and where disagreements are aired with respect" (26). Faculty also may have to overcome their own discomfort with authority-sharing in the collaborative classroom:

As students together begin assuming more responsibility for their learning, and as classroom time is directed more to conversational inquiry, teachers begin to sense subtle

but powerful shifts in their role. As students begin to take up their part in the learning enterprise, teachers begin to see that they are not so much relinquishing control as they are sharing it in new ways. They discover that the lines of authority are not so much blurred as they are reshaped (26).

MacGregor suggests that faculty themselves can use collaborative learning with colleagues (e.g., inquiry groups, faculty peer mentors) to experiment and sharpen their abilities to facilitate this type of learning in their own classrooms.

Collaborative learning can facilitate active and social – as opposed to passive and individual – learning, thereby situating this form of pedagogy in the involvement perspective of student engagement. MacGregor (1990) describes the "myriad" of "active, visible intellectual tasks" in which students in collaborative learning situations are engaged, as well as their implications for student learning:

Students are working with each other, and frequently alongside their teachers, to grasp subject matter or to deepen their understanding of it. In the process, they are developing their social skills, and their intellectual skills as well... [T]his active learning takes place publicly, in partnership with others. Students and their teachers are involved in a common enterprise: the *mutual* seeking of understanding. Because many minds are simultaneously grappling with the material, while working toward a common goal, collaborative learning has the potential to unleash a unique intellectual and social synergy (20).

According to MacGregor, collaborative learning therefore has the potential to inspire "meaningful, lasting learning" for students as they "use what is known to them, and what is becoming known" (24) in integrative ways. Although collaborative learning is similarly described in student involvement terms throughout the literature, MacGregor also mentions ways in which collaborative learning may enhance civic engagement:

As it becomes more widely practiced, collaborative learning has profound implications. It could change the nature of conventional undergraduate classrooms, and it could help to develop a much more civically active populace. Yet, the collaborative learning agenda is really about individual learners, and how it enables them to learn about learning and themselves. While there are larger educational and societal implications, collaborative learning can only begin and grow as a small-scale reform (29).

Although this speaks to the potential of collaborative learning in the future, institutions are currently employing this pedagogy to support civic engagement efforts; for example, faculty frequently implement collaborative learning approaches in service-learning and CBR classrooms and curricula.

Distinctions between Collaborative and Cooperative Learning

Cooperative learning is a related form of engaged pedagogy that, given the greater attention it has received in research evaluating educational outcomes, warrants particular attention. Unfortunately, there are no clear boundaries established between collaborative and cooperative learning in the literature. While historically the term "collaborative" has been most often used in higher education and "cooperative" in K-12 education, Barkley, Cross and Major (2005) explain that "massive confusion reigns in the literature of higher education over terminology" (7) and as such the two are often used interchangeably. In the authors' own view, collaborative and cooperative learning are essentially different in the ways they conceptualize knowledge:

Collaborative learning is based on different epistemological assumptions, and has its home in social constructivism... Rather than assuming that knowledge exists somewhere in reality "out there," and that it is waiting to be discovered by human endeavors, collaborative learning, in its tightest definition, assumes that knowledge is socially produced by consensus among knowledgeable peers (6).

Additionally, the authors claim that in cooperative learning, the teacher "retains the traditional dual role of subject matter expert and authority in the classroom" (5), while authority is shared with students in collaborative learning situations.

In contrast, Millis and Cottell (1998) assert that collaborative and cooperative learning do in fact share the same philosophical framework, including an emphasis on community and view of learning as active, social, and constructed. The authors instead picture collaborative learning

and cooperative learning "as lying on a continuum, with collaborative learning being the least structured and cooperative learning the most structured" (7). Millis and Cottell describe higher education faculty as "varying one end of this theoretically constructed Likert scale to the other" (7) depending on the course or class. The authors clearly favor one end of this spectrum, however, as they claim that degree of structure is directly related to the effectiveness of active learning: "The more organization built into classes, through focused structures and through classroom management techniques, the more meaningful active learning becomes" (70). Specifically, structure in the classroom is seen as enabling "deep learning" which "does not occur simply because students are placed in groups... [but] from the careful, sequenced assignments and activities 'orchestrated' by a teacher committed to student learning" (38).

Although there are a wide range of documented cooperative learning practices (see Millis and Cottell 1998 for detailed examples), a well-known and researched practice is *academic controversy*. In this approach, the instructor chooses a controversy that has two opposing sides and is relevant to the discipline in which the course is situated; for example, the lawfulness of assisted suicide might be chosen for a sociology class, or the issue of whether taxpayers should support controversial public art exhibits might be addressed in an art history class. Students work in partners within larger teams, with each pair of partners taking a side of the controversy. After gathering supporting material and information, the pairs present their sides and then ask each other questions to better understand the controversy. Then, pairs reverse their sides and argue for the other position. Finally, the entire group works together to synthesize findings and produce a report on the controversy, which can then be presented to the larger class.

Known Outcomes of Collaborative and Cooperative Learning

Barkley, Cross and Major (2005) report that the majority of studies described in the

literature examine the outcomes of cooperative – as opposed to collaborative – learning, though it is not certain whether this is due to difference in terminology (e.g., the studies in reality examined collaborative learning scenarios) or that there is a genuine distinction made in the research. Nevertheless, the authors report that in their meta-analysis of such research:

Cooperative arrangements were found superior to either competitive or individualistic structures on a variety of outcome measures, generally showing higher achievement, higher-level reasoning, more frequent generation of new ideas and solutions, and greater transfer of what is learned in one situation to another (17-18).

Similarly, Pascarella and Terenzini (2005) state that extensive research on cooperative learning shows a significant learning advantage over traditional forms of learning, with academic controversy in particular leading to a "demonstrated content knowledge advantage" (105).

Barkley, Cross and Major also assert that the benefits of cooperative learning extend to the domains of attitude, motivation, and satisfaction as well:

The evidence is strong and quite consistent... that students who study under various forms of peer interaction, including class discussion (versus lecture), have more positive attitudes toward the subject matter, increased motivation to learn more about the subject, and are better satisfied with their experience than students who have less opportunity to interact with fellow students and teachers (19).

While these findings attest to the value-added of cooperative learning, more research is needed to understand the outcomes of collaborative learning, as well as the potential relationships between student participation in these pedagogies and other dimensions of student learning and development.

Problem-Based Learning (PBL)

Both Edgerton (1997) and Colby et al. (2003) identify *problem-based learning* as a distinct form of engaged pedagogy. Colby et al. offer the following definition for PBL:

In *problem-based learning*, students' work, occurring either individually or in groups, is organized around studying, evaluating, and often proposing possible solutions for real-

world problems... At the college level, students generally work on rich, complex, and relatively unstructured problems. The teacher services as a resource and guide, helping students find and integrate information from many sources and assisting in their efforts to bridge theory and practice and put knowledge to work in applied settings (135).

Pioneered in the 1960s at McMaster University in Ontario, Canada, this pedagogical approach was originally conceived as the basis for that institution's new medical school curriculum, and stood in sharp contrast to the traditional information-dominated, rote-learning pedagogy used in the field. Problem-based learning has since been implemented at medical schools across the globe, as well as adapted in professional preparation and disciplinary fields such as business, education, science, and math (see Wilkerson and Gijselaers 1996 for formulations in multiple settings).

Defining and Describing PBL

Although problem-based learning generally involves groups of students working together in some form, Wilkerson and Feletti (1989) explain that this approach can also be used in small group discussions with faculty, collaborative learning groups, case method teaching, case-based lectures, inquiry labs, and independent study. But regardless of its exact formulation, the authors claim there are generally three processes involved in problem-based learning: confronting the problem; engaging in independent study; and returning to the problem. In the initial process of confronting the problem, students must identify its nature and procedures to resolve it, formulate hypotheses, and set the agenda for independent study. As they engage in independent study, students locate resources, manage information overload, use technology appropriately, ask questions in lectures and other educational settings, and develop "active study strategies, including peer discussion, note taking, charting" (53). The final process, returning to the problem, involves "sharing new learning and tackling continuing questions with other students;

examining and prioritizing original hypotheses in light of new learning; selecting and critiquing potential solutions; raising new questions for additional study; and summarizing, organizing, and synthesizing what is known" (53). In assessing the effectiveness of student learning, instructional objectives or program competencies are generally used as guides and standards.

Barrows (1996) explains that learning in this approach is student-centered in that "students must take responsibility for their own learning, identifying what they need to know to better understand and manage the problem on which they are working and determining where they will get that information" (5). Although faculty members (called "tutors" in the McMaster model) are available to assist students, they generally function more as facilitators or guides who encourage student inquiry: "The tutor asks students the kinds of questions they should be asking themselves to better understand...Eventually the students take on this role themselves, challenging each other" (5). Problem-based learning thus closely mirrors the conditions of professional practice students will encounter:

Students are expected to learn from the world's knowledge and accumulated expertise by virtue of their own study and research, just as real practitioners do. During this self-directed learning, students work together, discussing, comparing, reviewing, and debating what they have learned (6).

This process is enhanced by employing an authentic set of problems that provide the "curricular linchpin...designed to stimulate student learning in areas relevant to the curriculum" (8).

As opposed to more traditional forms of teaching, problem-based learning is inherently active and, according to Wilkerson and Feletti, "increases student participation in learning tasks" (53). Thus this approach is primarily reflective of the involvement perspective of engaged learning. However, it can be used as a pedagogical approach for civic development when the problems students must address are community-based. For example, Whitfield (1999) describes problem-based learning as a means to help service-learning students connect their academic

learning with what they learn in their service experiences in the community. Students involved in service-learning could therefore use problem-based approaches to study important issues facing the communities in which they are serving, thereby deepening their understanding of the community and their level of involvement in service activities.

Known Outcomes of PBL

In their synthesis of this research, Pascarella and Terenzini (2005) assert that problem-based learning provides students with a "marginally significant advantage" (109) in mastering content knowledge when compared with traditional teaching methods. Research on the effects and outcomes of problem-based learning is thus currently limited to students' content acquisition and mastery.

Other Forms of Engaged Pedagogy

There are several examples of engaged pedagogy that do not fully correspond to the four main strands – service-learning, community-based research, collaborative learning, and problem-based learning – already described. These other forms of engaged pedagogy are:

- Intergroup dialogue;
- Co-curricular service;
- Internship and practicum experiences;
- Interdisciplinary team teaching;
- Learning communities; and
- Partnerships between academic affairs and student affairs.

While this is not an exhaustive list – for example, it excludes larger structural elements such as technology, which is described by Kuh et al. 2005 as potentially enhancing student involvement

in learning – it is representative of other major forms most commonly cited in the literature.

Intergroup Dialogue

As a form of engaged pedagogy, intergroup dialogue is described as both a means of fostering students' civic development for living in a diverse democracy and of actively involving students in learning. Schoem et al. (2001) define intergroup dialogue as "a form of democratic practice, engagement, problem solving, and education involving face-to-face, focused, facilitated, and confidential discussions occurring over time between two or more groups of people defined by their different social identities" (6). According to Treviño (2001), intergroup dialogue has arisen in response to higher education's "erroneous" assumption that merely bringing together diverse groups on the college campus will lead to "interaction, cultural sharing, and intergroup harmony" whereas more often than not, "the exact opposite occurs" (88).

Treviño asserts that for diversity to truly be an "asset," institutions must "harness the power of diverse groups (i.e., languages, cultures, customs, perspectives, talents, skills) in achieving educational outcomes" (89); intergroup dialogue is posited as a form of engaged pedagogy that can accomplish this.

Two examples of intergroup dialogue presented in the literature are the Program on Intergroup Relations, Conflict, and Community at the University of Michigan (Thompson, Brett and Behling 2001) and the Voices of Discovery program at Arizona State University (Treviño 2001). A combined overview of both can provide a general sense of how intergroup dialogues may be structured and conducted in higher education. Thompson, Brett and Behling (2001) explain that at Michigan, "The program constructs the dialogues as meetings between students from different social identity groups defined by ethnicity, race, religion, gender, sexual orientation, ability, class, age, or national origin" (104). As at Arizona State, these groups are

often formulated as white/African American, Latino/white, and men/women, as determined by interest and demographics of interested participants. Dialogues are led by a team of facilitators comprised of a member of each group. At Michigan, facilitators are highly trained and extensively supervised undergraduates, while at Arizona State trained faculty and staff members serve as facilitators.

A detailed curriculum guides each week's session throughout the course of the intergroup dialogue. For example, at Arizona State, the curriculum involves a careful sequencing of icebreakers (to promote group bonding), content on social identity and issues, questions to spark discussion, and – at the end of the dialogue – activities that promote closure and group affirmation. At Michigan, intergroup dialogue involves the following four phases, each lasting approximately a fourth of the semester: introduction (communication and listening skills, ground rules, basic concepts); inter- and intragroup processes (discussion to understand social construction of each group, exploring differences and similarities, multiple group identities); discussion of concrete issues (contemporary issues and questions of social justice); and conclusion (asking the group to consider next steps and the implications of their learning). This corresponds with what Zúñiga and Nadga (2001) propose as the four stages of intergroup dialogue: setting an environment for dialogue; developing a common base; exploring questions, issues, and conflicts; and moving from dialogue to action.

Schoem et al. (2001) describe the benefits of participation in intergroup dialogue for students' civic development. According to the authors, intergroup dialogue assumes that "members who come together in a dialogue likely will have different sociohistorical legacies steeped in intergroup antagonism" (2). Rather than glossing over these differences, intergroup dialogue gives students opportunities to practice constructive ways of encountering them. The

authors assert that, through the experience of intergroup dialogue, students can develop "skills to bridge the spectrum of social differences... [and] deal comfortably with conflict, social differences, and sociohistorical legacies that shape their daily interactions" (1). Beyond the learning that occurs in college, intergroup dialogue can ultimately prepare students for roles as active citizens and change agents, as "engagement that represents good dialogue provides the best opportunity to engage in the practice of deliberative democracy in order to address our institutional and national concerns" (5).

In addition to the civic engagement perspective, intergroup dialogue is portrayed as an effective means of involving students in their learning. Schoem and Saunders (2001) describe intergroup dialogue as a pedagogy that engages students in integrating academic and experiential learning: "Dialogue processes are all about good learning practice, and the opportunity to emphasize substantial analytical reading and writing assignments in conjunction with close conversations about personal experience" (338). Similarly, Treviño (2001) explains that "the theoretical material presented in the classroom comes to life in the intergroup dialogues and takes on greater meaning for the students" (95). Moreover, students themselves may readily view intergroup dialogue to be a more effective way of learning, as it "represents a break from the monotony of the traditional pedagogical approach: lectures. The dialogue process is much more participatory, dynamic, and democratic" (95).

In describing research and evaluation on intergroup dialogue, Hurtado (2001) asserts that interaction with diverse peers "enhances learning, civic outcomes, and a broad range of skills" (24) as well as leads to "increased personal and social awareness regarding the importance of identity, affiliation, and difference" (30). According to Hurtado, students who participate in such interaction also demonstrate increased knowledge about different groups, intercultural

communication skills, and comfort in dealing with diversity, as well as a reduction of stereotypes and anxiety regarding diversity. Hurtado states that "the most compelling evidence of program impact," however, may be individual students' increased "commitment to take action and participation in social justice issues after the dialogue experience" (30) as well as expressed interest in pursuing careers related to social justice work.

Co-Curricular Service

Volunteer service opportunities offered by institutions that are not situated in an academic context – such as those offered through student affairs – are still valuable opportunities for both active and civic learning. In addition to community-based research and service-learning, Checkoway (2002) identifies volunteer activities as an opportunity for student engagement:

A third way of preparing students for active participation in a democratic society is by involving them in co-curricular activities with a strong civic purpose... Although most of these students provide direct services, such as tutoring children in reading or serving meals in a homeless shelter, other students seek social and political changes... For some students these co-curricular activities are their most intensive learning experiences (273).

Checkoway explains that students at research universities will often volunteer in communities during the school year, academic breaks or the summer, and that such volunteer opportunities may either be sought by individual students or coordinated by professional staff or campus office.

There is a substantial body of evidence that supports the benefits of volunteering as an engaged pedagogy. Astin and Sax (1998), in their study of undergraduate volunteerism (which did not distinguish service-learning from co-curricular service), found that involvement in volunteer opportunities positively affected students' academic development in terms of knowledge, grades, degrees pursued, and time devoted to academics. Volunteering also enhanced students' commitments to their communities and to helping others in difficulty, as well as

promoted racial understanding, influenced social values, and helped students develop leadership ability, critical thinking, conflict resolution, and social self-confidence. In extending this study to the post-college years, Astin, Sax and Avalos (1999) report that volunteerism is positively associated with a greater sense of empowerment, attending graduate school, donating money to one's alma mater, socializing with people from diverse groups, and volunteering after college. The researchers also found that volunteering during college was positively associated with values such as helping others and developing a meaningful philosophy of life.

The major drawback of these studies is in fact the lack of distinction between service-learning and co-curricular volunteering. Vogelgesang and Astin (2000) account for this difference in further research, which found that service-learning was a stronger predictor than community service for all academic outcomes and for a few affective, values-related, and belief-related outcomes (e.g., racial understanding and activism). While these findings do not diminish the positive effects of volunteerism, they present a compelling case for linking and integrating these activities with the curriculum, thereby enhancing student learning and development.

Internships and Practicum Experiences

Internships and practicum experiences are often considered a form of engaged pedagogy, particularly from the involvement perspective of engaged learning. Jones (2002) explains that internships "ideally are integrative experiences encouraging students to be active in their own learning" and "can provide students with meaningful experiences to connect theory with practice" (66). Schön (1987) posits that it is in experiential learning settings, such as internships, that students come to understand the actual practice in the field:

In a context that approximates a practice world, students learn by doing, although their doing usually falls short of real-world work. They learn by undertaking projects that simulate and simplify practice; or they can take on real-world projects under close

supervision. The practicum is a virtual world, relatively free of the pressures, distractions, and risks of the real one, to which, nevertheless, it refers. It stands in an intermediate space between the practice world, the 'lay' world of ordinary life, and the esoteric world of the academy (37).

Since internships and practicum experiences are common across many disciplines in higher education and vary greatly in their formulation, it is helpful to distinguish which types of experiences may be considered engaged in nature. To this end, Schön (1987) provides a seminal discussion of the "reflective practicum," or a "practicum aimed at helping students acquire the kinds of artistry essential to competence in the indeterminate zones of practice" (18).

Schön principally delineates the reflective practicum from other internship approaches by its endorsement of the most complex of three views of professional knowledge. The first view is when knowledge is conceptualized "in terms of facts, rules, and procedures applied nonproblematically to instrumental problems, [in which] we will see the practicum in its entirety as a form of technical training" (40). In the second perspective, acquisition of professional knowledge is viewed "in terms of 'thinking like a' manager, lawyer, or teacher... [and] there is presumed to be a right answer for every situation" (40). In this perspective, the traditional drills used in law or medical school are aimed at teaching the correct "forms of inquiry by which competent practitioners reason their way, in problematic instances, to clear connections between general knowledge and particular cases" (40). The final view of knowledge – which according to Schön serves as the foundation of the reflective practicum – focuses on the "reflection-in-action" through which practitioners sometimes make new sense of uncertain, unique or conflicted situations of practice," and assumes "neither that existing professional knowledge fits every case nor that every problem has a right answer" (40). In such a practicum, Schön states that students' learning "goes beyond stable rules not only by devising new methods of reasoning...but also by constructing and testing new categories of understanding, strategies of action, and ways of

framing problems" (39).

Schön (1987) gives an illustration of this type of practicum in his description of teacher training. The practicum would begin "by engaging teachers in tasks where they can explore their own learning" (322), in the midst of which "they would reflect on their own processes of inquiry, examine their own shifting understandings" (323). Then, learners would "compare their actual learning experiences with the formal theories of learning built into standard pedagogies" (323). This process involves students exploring their own learning experiences, comparing those with theory, and then "reflect[ing] on the ways in which they frame their own teaching practice" (323).

According to Schön, the reflective practicum also differs from more traditional internships in that it "demands intensity and duration far beyond the normal requirements of a course... Students do not so much attend these events as live in them" (311). Ideally, the reflective practicum would therefore be integrated throughout the curriculum and "most appropriately occur, not at the beginning of a student's professional career, but in the midst of it, as a form of continuing education" (342). As internship and practicum experience with these qualities can deeply engage students in their learning, Jones (2002) concludes that they have "the potential to enhance undergraduates' intellectual, personal, and ethical growth" (66).

Interdisciplinary Team Teaching

Davis (1995) describes the use of interdisciplinary team teaching as an engaged pedagogy that can enhance student involvement in learning and lead to more complex learning necessary for meeting pressing needs in society. By "interdisciplinary" Davis means "the work that scholars do together in two or more disciplines, subdisciplines, or professions, by bringing together and to some extent synthesizing their perspectives" (4), and interdisciplinary team

teaching is "done in interdisciplinary courses by the several faculty members who have joined together to produce that course" (6).

According to Davis, the connected view of academic knowledge inherent in interdisciplinary approaches can reduce the isolation of the disciplines, as well as counter the "reductionistic" (37) tendencies of academics to construe knowledge solely through their own perspectives. Davis explains that "disciplinary specialization tends to ignore or downplay broader issues and holistic perspectives... missing is the integration of knowledge that leads to a more comprehensive description of reality" (37). By virtue of incorporating different perspectives, interdisciplinary courses can help students answer the question of "Who puts Humpty-Dumpty back together again?" (37) in their academic learning.

When this interdisciplinary view of knowledge is operationalized through the pedagogy of team teaching, it reflects both an involvement perspective and a civic engagement perspective of engaged learning. Regarding the first, Davis claims that interdisciplinary team teaching focuses not on the traditional transmission of academic knowledge, but rather on helping students "retrieve the right information, to analyze it critically, to synthesize it, to relate it to other appropriate information, and apply it to a given situation" (38). Davis argues that by virtue of involving a "larger conceptual framework than the concerns of a specific discipline" (38), interdisciplinary team teaching requires students to engage in this kind of connective learning. Regarding the civic engagement perspective, Davis highlights the potential of interdisciplinary team teaching for equipping students to address pressing societal problems:

Urban decay, crime, hunger, disease, ethnic warfare, and environmental pollution [are] the beginning items on a long list of growing problems that seem to defy solution. Unfortunately, none of these problems come in the tidy packages of disciplines.... Ultimate solutions require people who are skilled in using many kinds of knowledge in a problem-solving context... Thus, interdisciplinary courses, it can be argued, are well-suited to developing the problem-solving skills most needed in today's society because

they emphasize the development of comprehensive perspectives (39).

And it is within the context of these courses, Davis argues, that "team teaching demonstrates how specialists work together in teams...capable of creating the broad understanding needed for solving problems" (39). Thus, this engaged pedagogy may both actively involve students in their learning and equip them for addressing critical problems in the communities in which they live.

Learning Communities

Davis and Murrell (1993) assert that to enhance student involvement in learning, there have been two approaches to reform in undergraduate education: "The first initiative is best reflected in the 'active learning' approach and suggests a set of *pedagogical* activities that maximize student involvement in learning with other students. The other is the 'learning community' model and affects the *structure* of the curriculum and the organization of delivery systems" (72). In practice, learning community structures vary by curricular sequence and level of integration, incorporation of a residential component, and use of a thematic focus (e.g. environmental issues, social justice). Additionally, the duration of participation in learning communities can vary by campus; for example, Tinto and Goodsell (1993) describe first-year interest groups (FIGs) which operate on a learning community model and facilitate connections with peers and faculty for new students.

Pascarella and Terenzini (2005) explain that regardless of their particular formulation, the "the purpose of structured learning communities is to facilitate active over passive learning, collaboration and cooperation as opposed to competition, and community instead of isolation" (109). Specifically, the authors describe learning communities as attempting to "move collaborative learning beyond the classroom and into broader aspects of a college student's life" (109), as well as provide connective learning that integrates knowledge in the curriculum:

[Learning communities] appear to have two common elements: shared or collaborative learning, and connected learning. Shared or collaborative learning comes from the learning communities' enrollment of the same students in several common courses, thereby increasing the likelihood of an integrated social and academic experience. Connected learning comes from the shared courses' organization or link around a theme or single large topic... (109).

Thus, learning communities take a set of engaged pedagogies and effectively institutionalize them in the collegiate structure. There is evidence in the research to suggest the effectiveness of this approach; Pascarella and Terenzini state that "participation in learning communities is linked with student perceptions that they are deriving greater benefit from their academic experiences during college" (109). Learning communities also appear to have positive indirect effects on general education gains, as they "enhanced students' involvement in art, music, and theater; their interaction with peers; and the intellectual content of their peer interactions" (110). Thus, as a means of facilitating student engagement in their education, learning communities do appear to be successful in indirectly affecting these "involvement and interaction dimensions" (110) in college.

In addition to the capacity of learning communities to foster student involvement in learning, they have significant potential for enhancing students' civic development as well. By enabling social and intellectual bonds between members of the learning community, colleges and universities can reduce the isolation that students may feel on campus. This in turn has the potential to increase students' commitment to the institution and to the educational process. A communitarian view of education would posit that as students see themselves as part of a genuine community of peers and mentors, they can (and will be motivated to) learn to function as responsible members of that community. In turn, they will later be able to apply this learning in relationships they encounter in the larger communities of society. Along these lines, Zhao and Kuh (2004) report that participation in learning communities enhances not only academic

outcomes, but also integration of academic and social experiences as well as positive perceptions of the college environment. Although for several variables these effects were found to be generally stronger for first-year students, they were also non-trivial for seniors, thereby suggesting that the positive influence of learning communities persists throughout college.

Academic Affairs and Student Affairs Partnerships

There is a growing literature on effective practices in partnerships between academic affairs and student affairs and the ways in which they can promote engaged learning. In a joint statement entitled *Powerful Partnerships: A Shared Responsibility for Learning*, the American Association for Higher Education, American College Personnel Association, and National Association of Student Personnel Administrators (1998) call for collaborative action and campus environments that support active, developmental, social, and integrative forms of learning. Schroeder (1999) observes that in recent years, many institutions have responded to this call and "have begun to focus more attention on reinvigorating undergraduate education by fostering collaboration and cross-functional dialogue between personnel in student affairs and academic affairs" (6).

The conceptual basis for many of these partnerships is Kuh's (1996) notion of "seamless learning environments" that integrate students' learning in different areas of the campus (such as the curricular and co-curricular). Schroeder (1999) explains that "because new student learning patterns respond to active modes of teaching and learning, partnerships that connect, in a seamless fashion, formal curricular experiences with informal cocurricular experiences can be particularly effective in promoting student success" (14). According to Kuh, principles for establishing these types of environments include: enthusiasm for institutional renewal; a common vision of learning; a shared language; collaboration and cross-functional dialogue, an

examination of the role of student cultures in learning; and an emphasis on systematic change.

Examples of partnerships between academic affairs and student affairs are many and varied. After surveying such partnerships, Kezar (2001a) reports that the most successful collaboration occurs in the areas of counseling, first-year experience programs, orientation, and recruitment. She also reports that student learning was by far the most important reason cited for engaging in collaboration, followed by encouragement of campus leaders. And in regard to Kuh's principles for a seamless learning environment, Kezar (2001b) reports "a relationship between use of Kuh strategies and number of very successful collaborations; campuses that tended to have greater numbers of very successful collaborations tended to use more Kuh strategies" (70). As mentioned earlier, service-learning is routinely described in the literature as a generative area for such partnerships. Engstrom (2003) states that when collaborative partnerships are used to support an engaged pedagogy like service-learning, they "have the power to transform our institutions into learning-centered organizations... that promote civic responsibility" (66).

Toward A Culture of Engagement

Regarding the strands of reform he identifies in higher education, Edgerton (1997) writes that "all remain marginalized pedagogies that operate on the sidelines of the dominant mode of lecture-based, didactic instruction." Thus, despite their potential both for involving students in their learning and fostering civic engagement, these pedagogies are atypical in students' learning experiences in college. As a result, too few students have the opportunity to participate in engaged learning settings (as they are offered on a limited and elective basis on most campuses), and those that are able to participate may only do so once or a few times during college. The question therefore becomes how the value-added of these pedagogies may be limited by their

isolated use in higher education. This is reflected in Eyler and Giles' (1999) description of the small though positive gains they found for service-learning participation: "The learning goals in higher education are complex, and students are affected by many of life's experiences; no single intervention, particularly over the course of a semester, can be expected to have a dramatic impact on student outcomes" (xvii).

Individual pedagogies of engagement could have greater impact for more students if relocated from the margin to the center of teaching and learning. By translating engagement — defined by both perspectives of student involvement in learning and of civic development — from their mission statements into their dominant models of teaching and learning, institutions might effectively move toward *cultures of engagement*. Kuh and Whitt (1988) define "cultures" in higher education as "patterns of norms, values, practices, beliefs, and assumptions that shape the behavior of individuals and groups in a college or university and provide a frame of reference within which to interpret the meaning of events and actions on and off the campus" (iv). Applying this definition, a culture of engagement would involve establishing engaged learning as: a normative experience for students; a shared value among members of the campus community; a common practice across all sites of learning; and an affirmed belief and assumption in the curriculum. Such a reordering would have profound implications for the "frame of reference" with which all members of the campus community view education and its purposes.

There appear to be some colleges and universities that have been successful in moving toward this goal. For example, Kuh et al. (2005) name twenty institutions that are high performers from an involvement perspective of student engagement, and Colby et al. (2003) identify twelve institutions as "building moral and civic education into the heart of their

undergraduates' learning" (49). These colleges and universities are working to make engaged pedagogy, in Edgerton's words, "part of their overall institutional identity." As more campuses follow suit, the specific engaged pedagogies described in this review may shift from exceptions in teaching and learning to the building blocks for cultures of engagement in higher education.

Part III: Linkages with Mental Health and Well-being

Like many of the concepts discussed in this review, *mental health* and *well-being* are complex terms that require definition. To this end, it is helpful to review the definitions offered by both national and international health agencies. First, the Substance Abuse and Mental Health Services Administration (SAMHSA 2005) of the U.S. Department of Health and Human Services defines mental health as:

How a person thinks, feels, and acts when faced with life's situations. *Mental health* is how people look at themselves, their lives, and the other people in their lives; evaluate their challenges and problems; and explore choices. This includes handling stress, relating to other people, and making decisions.

Secondly, the World Health Organization (WHO 2005) offers a similar definition that incorporates the term well-being as a near synonym for mental health:

Mental health... is a state of well-being in which the individual realises his or her own abilities, can cope with the normal stresses of life, can work productively and fruitfully, and is able to make a contribution to his or her community.

It is also interesting to note that this definition also includes the individual's ability to actively engage in work and to positively function as a member of society, both of which are not unrelated to the involvement and civic development perspectives of student engagement, respectively.

It is clear from these definitions that mental health and well-being encompass an individual's perspectives, beliefs, judgments, behaviors, skills, relationships, and potential, among other human attributes and abilities. The breadth of these definitions accurately portrays the complexity of these constructs, but also makes operationalizing them in research very difficult. This is reflected in Pascarella and Terenzini's (2005) meta-analysis of higher education research, in which they found that "the causal relationship between formal education and

different measures of subjective well-being, overall happiness, or satisfaction with life is complex" (553). The approach of the Bringing Theory to Practice Project in addressing two issues related to mental health and well-being – namely, depression and substance abuse – serves to provide researchers and practitioners with more focused points of reference, as well as reflects the prevalence and pressing nature of these two issues on the college campus. Delimiting mental health and well-being in this way does not mean that depression and substance abuse can be conflated with the larger concepts of which they are a part, as the World Health Organization asserts that mental health is "a state of complete...well-being and not merely the absence of disease or infirmity." At the foundation of the Project's efforts, however, is the belief that reducing the occurrence of depression and substance abuse in college would significantly serve to improve students' overall mental health and well-being. With this focus in mind, it is helpful to briefly describe the prevalence of depression and substance abuse on the college campus, as well as prevention approaches that have been widely used in higher education.

Depression and Substance Abuse in College: An Overview

In a literature review produced for the Bringing Theory to Practice Project, the National Center on Addiction and Substance Abuse (CASA) at Columbia University (2003) provides a comprehensive picture of the crises posed by depression and substance abuse in college. CASA reports that depression, as well as feelings of stress and being overwhelmed, appears to be more prevalent among college students than in the general population. Students who are depressed experience academic problems, decreased quality of life, departure from college, risky sexual behavior, and illness more frequently; moreover, depression is also considered a major factor in suicide among college students. Kadison and DiGeronimo (2004) describe depression as "rampant" (92) on college campuses and go as far as to identify it as an "epidemic" (95). In

terms of the severity of substance abuse on campus, CASA reports that a higher percentage of college students drink alcohol, drink more frequently, and binge drink than peers who do not attend college. Regarding binge drinking (defined as consuming five drinks at one sitting for men and four for women), Wechsler and Wuethrich (2002) report that over 70 percent of unmarried college students between the ages of 18 and 23 binge drink and that approximately 1400 college students die each year from alcohol-related injuries. CASA also reports that, on a yearly basis on college campuses, 600,000 assaults occur that involve alcohol, 110,000 alcohol-related violations are committed, and 70,000 students are victims of sexual assault or rape linked to alcohol. Wechsler and Wuethrich estimate the economic impact of binge drinking in 1995 alone to be around \$167 billion, approximately \$57 billion higher than the costs associated with drug abuse.

Despite the critical nature of these problems, their solutions are far from clear. This is perhaps due to the complex and multivariate causes of both depression and substance abuse. For example, in the case of depression, CASA identifies gender, ethnicity, genetics, family environment, negative attributional style, poor problem solving skills, loneliness, stress, lifestyle change, and the college transition itself as potential contributing factors. For substance abuse, CASA reports that pathways to risk include such variables as genetics, family history, parental attitudes/behaviors, high school substance use, personality and motivational characteristics, anxiety disorders, religious beliefs, and social influences. Additionally, students who live in college residences, are members of fraternities and sororities, or are male are more likely to use substances and are more susceptible to binge drinking behaviors. Notably, there is also a significant degree of co-occurrence between depression and substance abuse, with possibility causality in both directions.

Although there are no proven answers to the problems of depression and substance abuse in college, most institutions have implemented a range of prevention programs with varying degrees of success. In the case of depression (and mental health in general), a great deal of the literature focuses on clinical treatment approaches as provided by the campus counseling center (c.f. Farnsworth and Blaine 1970, Talley and Rockwell 1986, Whitaker 1988, Amada 2001). In practice, however, a growing number of campus counseling centers conduct outreach and educational initiatives such as helping to train resident advisors (RAs) or holding workshops in residence halls to increase awareness of the symptoms of depression (Kadiman and DiGeronimo 2004). Some campuses also participate in national awareness campaigns that often offer mass screening for depression. Although not specific to the issue of depression, Kuh et al. (1991, 2005) also describe the use of "safety nets" – comprised of student affairs staff, faculty, support staff, and others – to identify students in academic or social trouble and refer them for appropriate services and interventions. However, the majority of suggestions for improving prevention efforts aimed at depression involve strengthening and expanding colleges' mental health services.

In comparison, substance abuse – and in particular, alcohol use – has been the target of a wide range of programming and policy efforts on college campuses. Wechsler et al. (2004), in a survey of 747 colleges nationwide, found that:

The most popular actions included providing counseling and treatment services for students with abuse problems; conducting alcohol education targeted to freshmen; providing alcohol-free residences; employing a substance abuse official; restricting alcohol use at home athletic events; and conducting alcohol education targeted toward fraternity members, sorority members, or athletes (166).

Additionally, Wechsler et al. found that many institutions conducted social norms marketing campaigns aimed at reducing student misperceptions about the prevalence of drinking on

campus. The authors assert however that "there is no evidence from scientifically rigorous evaluations support the effectiveness of such student-oriented approaches as alcohol education and social norms marketing campaigns" (167), while there is such evidence to support the effectiveness of restrictions on students' access to alcohol.

Gonzalez (2002) describes the majority of existing substance abuse programs in higher education as founded "on the assumption that increasing students' knowledge about alcohol and other drugs would lead to an attitude change, resulting in a behavioral change precluding the use of these substances" (14). Gonzalez claims that this assumption is both "antitheoretical" and does not bear out in research or practice, and as a result:

One growing realization in the prevention field, especially on the college campus, is that comprehensive, communitywide approaches are needed...It appears that a long-term, systems approach that addresses the relationships among individual and social factors is necessary for effective prevention (14).

This call for a community-wide approach is similar to Kuh's (2002) recommendations for an environmental perspective of substance abuse prevention. Kuh claims that "small, 'human-scale' environments encourage responsible, health-enhancing behavior," in which:

Health-enhancing attitudes and behaviors are fostered when faculty, staff, and students have frequent contact with one another. By providing small residences and classes, maintaining effective communication networks, and widely disseminating information, a college or university encourages its members to know each other, a precursor to caring for one another (59).

In order to establish these types of environments, Kuh explains that campuses "should examine whether the ways in which students spend their time are consistent with the institution's philosophy," as well as the influence of peer cultures and academic competition in "the hazardous use of alcohol" (61).

No instances were found in the literature where engaged learning was identified as a specific means of addressing depression or substance abuse on the college campus. However, on

a theoretical level, there appears to be a potential fit between notions of engaged learning and calls for community-wide and environmental approaches to prevention. This leads to the fundamental question underlying this review: whether, on an empirical level, there are any known or suggested links between engaged learning and student mental health and well-being, as delimited to depression and substance abuse on the college campus. Two specific areas of the literature – research on students' involvement in learning, and research on environmental stress and learning – provide a preliminary *research basis* for such linkages. An additional two areas of the literature – developmental perspectives of challenge and support, and perspectives of moral development and personal and social responsibility – provide *theoretical rationales* for linking engaged learning, student mental health and well-being, and civic development, though research is needed to determine their validity.

Research-Based Linkages: Involvement in Learning

In the higher education literature, research from an involvement perspective of student learning has generated the greatest number of possible linkages between engaged learning and student mental health and well-being. As mentioned earlier, this research operates on Astin's (1993) "input-environment-outcome (I-E-O) model" for assessing the effects of college attendance, where: inputs are the students' characteristics upon arrival at college; the environment is comprised of the student's experiences in college; and the outcomes are the student's characteristics "after exposure to the environment" (7). It is important to reiterate that such research is typically correlational in nature and therefore does not indicate causal relationships.

Astin's (1993) own research – which involved analysis of the Cooperative Institutional Research Program (CIRP) survey of entering freshmen in 1985 and a follow-up questionnaire

four years later – identifies three areas of self-rating germane to the question of student mental health and well-being: *self-concept*, which includes physical and emotional health; *psychological well-being*, comprised of two items – "felt depressed" and "felt overwhelmed by all I had to do" (132); and *hedonism*, defined by the behaviors of drinking beer, smoking cigarettes, and staying up all night. Although Astin's research does not provide correlations with these areas and engaged learning per se, his findings do indicate relationships with some aspects of student involvement in learning.

In the area of self-concept, Astin reports that self-ratings on emotional health "show a modest decline after college entry" (129) that cannot be attributed to maturational processes. Although Astin explains that "the role of the college experience" in this decline is "unclear...students who interact frequently with faculty or with fellow students showed the smallest declines" (130). Interestingly, self-ratings on emotional health were positively associated not only with exercise, participation in intramural sports, socializing with friends, and attending religious services, but also with "working on a group project for a class" (132). These findings seem to suggest that engaged pedagogy – which typically involves such interaction with faculty and peers, and includes collaborative learning approaches – may be positively related to students' self-ratings of emotional health. Conversely, evidence was found that lack of student community, hours spent watching television, alcohol consumption, leaving college, and scientific orientation of peers (which Astin hypothesizes might be a source of additional stress for students) were all negatively correlated with self-ratings of emotional health. Causal relationships again remain unclear, as Astin explains that "these measures could be the result of poor emotional health, but they could also be a *cause* of it" (132).

Sax, Bryant and Gilmartin (2002) provide an update to Astin's findings in this area with data from the Fall 2000 CIRP Freshman Survey and 2001 Your First College Year survey. Like Astin, the authors report declines in emotional health for both men and women, but also found lower levels of emotional health for women. The authors explain this finding may either be based in reality or simply attributable to women's greater willingness to disclose feelings of depression, loneliness, and isolation. Most interestingly, however, they describe "evidence that academic factors contribute directly to emotional health...academic performance and self-confidence exerted a positive, albeit weak, effect on emotional health for both men and women" (20). Additionally, "feeling bored in class" was negatively related to women's emotional health, though not to men's. This might suggest that feeling disengaged from one's studies is correlated with lower levels of emotional health. However, the authors caution that this finding "raises the 'chicken and egg' question since boredom in class may in fact result from feelings of depression, isolation or other indicators of emotional stress" (19); furthermore, it is unclear why this finding applies only to women. While not providing any definitive conclusions, the authors explain that in general: "Academic experiences are not unrelated to emotional well-being either, a critical point for educators to keep in mind as they determine why and how some students succeed...The need for additional research is pressing, however" (20).

In addition to emotional health, an area examined by Astin's research is students' psychological well-being, which was comprised of two self-report items: "felt depressed" and "felt overwhelmed by all I had to do" (132). Astin explains that both items "show substantial increases, suggesting that the student's sense of psychological well-being actually declines during the college years" (132-3), but that the actual "role of the college experience in these declines is unclear" (136). Feeling depressed had "negative partial correlations" with frequent

evidence" (134) of a substantial correlation. Depression was positively correlated with "discussing racial or ethnic issues, consuming alcohol, receiving tutoring in courses, and leaving school or transferring" (135). Astin explains these last two measures in terms of "high depression, in other words, being associated with low grades" (135). Feeling overwhelmed was positively correlated with majoring in engineering and attending an institution with a heavy concentration of engineering majors, as well as with hours spent studying or doing homework, giving presentations in class, and commuting to campus. Astin therefore concludes that time pressures contribute to students' feelings of being overwhelmed; this may potentially signify the negative aspects of being involved in one's learning, as over-engagement may lead to significant levels of stress for students (this possibility is discussed further in the next section on environmental stress and learning).

Finally, Astin reports evidence that college appears to increase "hedonism" among students, which is defined by the behaviors of drinking beer, smoking cigarettes, and staying up all night. Peer interaction, living on campus, and membership in fraternities and sororities were found to be positively correlated with these behaviors, and students who reported high levels of hedonism tended to have lower high school grades, poor study habits in high school, and were "often bored in class" (120). Furthermore, hedonism – and in particular, alcohol consumption and smoking cigarettes – was negatively associated with "hours spent studying or doing homework" (122). This leads Astin to conclude that "hedonistic tendencies may be weakened" by "engaging in academic work" (122). From an involvement perspective, these findings suggest that engagement in learning may be inversely correlated with hedonistic behavior (such as substance use). From a civic engagement perspective, as discussed earlier, Wechsler et al.

(1995), Jessor et al. (1995), and Fenzel (2005) identify a correlation between participation in prosocial activities like community service and lower drinking rates. Effect sizes for these studies is small, and as Fenzel asserts, "cause and effect cannot be inferred" (136) from the findings. Any possible linkages between forms of engaged learning – such as service-learning – and student mental health and well-being are likely limited in comparison to Astin's finding that the "single strongest environmental effect [on hedonism], however, is from the peer group" (122); for example, drinking rates were found to be lower at campuses with a large percentage of bornagain Christians or at a woman's college, and higher at schools where students' peer groups were of a higher socioeconomic status.

These possibilities for links between elements of engaged learning (defined in terms of student involvement in learning) with emotional health, psychological well-being, and hedonistic behavior must be viewed in light of Astin's caution that "issues of causation are, once again, highly ambiguous when it comes to interpreting these findings with involvement measures..." (122). Additionally, the magnitude of these correlations (which are generally weak to moderate) is tempered by Astin's finding that above all other factors, "peer group is the single most potent source of influence on growth and development during the undergraduate years" (398). Thus, research from the involvement perspective points to possible linkages between elements of engaged learning and some aspects of students' mental health and well-being, but the actual nature and relative degree of these linkages cannot be confidently established from existing studies. Further research that would allow for more in-depth examination of these linkages is needed.

On a theoretical level, this perspective brings to the forefront the positive effects of students' involvement in activities that *connect* them to the campus environment, as well as the

negative outcomes that may result from students' involvement in activities that *isolate* them from the campus. Isolation is considered to be one factor in depression and substance abuse as well as other mental health concerns. It is therefore hypothetically possible that there may be an overall link between level of student involvement and mental health and well-being, although causal relationships remain complex. For example, it might be the case that students with mental health concerns may be less able to invest time and energy toward involvement in campus life, thereby reducing their likelihood of positive educational outcomes and increasing their risk for failure in the environment. And/or it might be possible that increasing student involvement would decrease students' feelings of isolation on the campus, and thereby reduce the likelihood of depression and substance abuse. Again, further research is needed to ascertain the relationship between student involvement and these dimensions of mental health and well-being.

Research-Based Linkages: Environmental Stress and Learning

Research conducted from this perspective examines stress in the academic environment, and posits that moderate levels of stress are "necessary and useful, but too much stress is dangerous and even abusive" (Fife 1986, xiii). Specifically, while moderate levels of stress are correlated with effective involvement in learning, extreme levels appear to inhibit learning and negatively affect students' emotional health and behavior. From this perspective, engaged learning may provide one potential means of facilitating optimal levels of stress in students' academic experiences.

Whitman, Spendlove and Clark (1986) provide a comprehensive discussion of research and theory related to stress and learning in higher education. Specifically, the Yerkes-Dodson law, which portrays a curvilinear relationship between stress and learning, holds that a moderate level of stress is optimal in that it "makes students just anxious enough to study for tests and

prepare assignments, thereby challenging them to reach their potential. This 'good stress' correlates with maximum learning" (53). The authors cite Janis's (1982) research on academic environments, in which stress was found to be most useful when it "requires a vigilant coping pattern from students" (12) – in other words, when students respond with heightened attentiveness that motivates them to focus and apply themselves to learning tasks. Whitman, Spendlove and Clark explain that "in the process of learning – preparing papers, studying, taking exams – this definition of vigilance is consistent with the hopes many professors have about how students seriously engage in learning" (12). Thus, at the optimal level of stress, students may be more able to actively engage in their learning.

In contrast to moderate levels of stress, the authors explain that "no stress or extreme stress correlates with little or no learning" (53). Janis (1982) found that higher levels of stress can lead to four negative sets of behaviors: "unconflicted inertia," where students persist in ineffective behaviors despite warnings about failure; "unconflicted change," in which students adopt suggestions for changing their behaviors, but fail to consider contingencies or prepare for setbacks; "defensive avoidance," where students avoid learning activities through procrastination, rationalization, and minimization of negative consequences; and "hypervigilance," which involves a panic-like state where students "rapidly shift back and forth between alternatives to reduce stress and impulsively seize upon hastily contrived solutions that seem to provide immediate relief" (13). Whitman, Spendlove and Clark explain that such behaviors may result in "anger, fatigue, anxiety, fear, depression, or boredom" (10). Thus, at extreme levels of stress, students may not only become *dis*-engaged from their learning, but also experience negative effects in terms of their emotional health and well-being.

Explaining that college faculty largely "set the level of stress to which students are

subjected," Fife (1986) points out that many faculty hold the potentially harmful belief that "if a course does not stressfully challenge students completely, then it cannot be wholly worthwhile. Conversely, a course that is enjoyable and stress-free is lacking in quality" (xiii). This view, if shared among a majority of students' faculty, can compound the environmental stress faced by students across their courses and their experiences in the curriculum. This in turn may lead to extreme levels of stress in the academic environment (and thereby reductions in student learning and increases in stress-related emotional problems). The question therefore becomes how faculty might rather work to optimize the level of stress in the learning environment. It appears that engaged learning may potentially provide one means of accomplishing this goal.

Along these lines, of particular interest is Whitman, Spendlove and Clark's finding that "given the opportunity to participate actively in the learning process [students] report less stress than those forced into a more passive or helpless mode" (20). This would seem to suggest that engaged learning (defined by the involvement perspective of engagement) may lead to lower levels of stress, which in turn might reduce negative, stress-related consequences to students' emotional health and behaviors. The authors describe the principle underlying this dynamic: faculty can provide "stress inoculation" (Meichenbaum 1985) for students by giving them the information, feedback and control necessary to counteract destructive forms of stress that result in learned helplessness and failure (Seligman 1975). Fife (1986) highlights the particular importance of giving students a measure of control over their learning environment:

The difference between positive and negatives stress is one of control. When students feel that they are in control of their lives and their time, they remain eager, curious, and caring. But when they perceive that they are out of control and can no longer make rational decisions about how they spend their time, they become withdrawn, inhibited... (xiii).

Engaged learning may be one means of providing students with these means of reducing stress,

as most engaged pedagogies give students a higher degree of control over their own learning (for example, students share authority, bring their own expertise, and shape course content and process in pedagogies like collaborative learning). An involvement perspective of engaged learning is also congruous with Whitman, Spendlove and Clark's recommendations that faculty give students choices of assignments, provide a rationale for the course, and involve students in exams (e.g., prepare students in advance and ask them to participate in test construction). The authors assert that faculty who implement these kinds of stress-inoculation strategies "report that they can actually feel classroom tension begin to decrease because students have some control and predictability is increased" (25).

Despite these findings related to general faculty approaches and their impact on students' stress levels, Whitman, Spendlove and Clark explain that more research is needed to assess whether explicit interventions might be effective in optimizing stress:

The primary concept associated with stress inoculation appears to be giving people information or educating them as to what is stressful, what to expect, and how best to cope. Yet research in higher education regarding professors' providing information to students in the classroom on how to deal with particular stresses of a course is not available. One thus does not know from the research how helpful it is in terms of reducing students' stress for professors to inform students about what to expect or how best to learn, or how best to recommend, reassure, or warn students about potential stressful aspects of a course (63).

While such research on faculty behaviors could not be identified in the literature, Shiraldi and Brown (2001) conducted a more recent study on the effects of a cognitive-behavioral course based on the stress inoculation training model. The authors report significant reductions in anxiety and depression – as well as improvements in self-esteem – among college students who took the class, which taught students anger management skills as well as preventive measures against anxiety and depression. Although this study involved a stand-alone course rather than a typical class in the curriculum, it suggests that faculty may be able to have some degree of

impact on students' emotional health by attending to issues of stress in the classroom.

Findings from this area of research seem to suggest that elements of engaged learning (e.g., active learning from an involvement perspective) may help to mitigate extreme stress levels in the academic environment, and thereby potentially reduce the negative impact on emotional health associated with extreme stress. Additionally, this perspective might help explain other research findings about the effectiveness of pedagogies of engagement as compared to traditional teaching methods: perhaps by using engaged methods, faculty are able to titrate students' stress to a moderate level (versus low or extreme levels) shown to be optimal for learning. Although there are some promising linkages from this perspective, more research is needed to determine the exact nature and degree of relationships between engaged learning, environmental stress, and emotional health.

Theoretical Linkages: Developmental Challenge and Support

One perspective in the literature identifies mental health concerns – such as depression and substance abuse – as resulting from students' being "overchallenged" by the myriad of developmental tasks they face in college. Underlying this research is the ecological principle that developmental challenges must be balanced with environmental support for optimal growth to occur (Sanford 1966). While not explicitly discussed in the literature or established through research, engaged learning (and pedagogies of engagement) may theoretically provide one means for achieving this balance in students' experiences.

As discussed earlier, college students face many psychosocial developmental challenges (Chickering and Reisser 1993). Rivinus (1992) identifies a host of such developmental issues: rapid change in environment and roles; separation-individuation from family; identity crises; shifts from invulnerability to healthy sense of confidence; establishment of healthy peer

networks; and resolution of vocational choice. In light of all these challenges, many authors claim that the college environment – and society in general – does not provide adequate support and structure for students. Schulenberg et al. (1998) assert:

There is far less institutionally- and culturally-imposed structure on the roles, experiences and expectations of young people when they make the transition out of adolescence... the lack of structure creates a developmental mismatch that adversely influences their health and well-being (1).

In such a scenario, both depression and substance abuse can be negative consequences of developmental overchallenge and lack of environmental counterbalances. Some research in the literature provides this developmental view for both depression and substance abuse.

Regarding depression in college, Mann (1992) views students' depressive symptoms as potentially a function of gender identity development in college (as described in object relations theory and by Chodorow, Gilligan, and Belenky et al.). In Mann's perspective, depression arises from difficulty in the separation-individuation process as students leave their families of origin and begin to establish separate adult identities during the college years. Mann cites as evidence for this view the different "symptomatic orientations" (219) of depression in women and men. For example, women are diagnosed with clinical depression twice as often as men, which Mann asserts may be more reflective of women's "greater willingness to express their emotional distress and also seek treatment" rather than a "true preponderance" of depression in women (216). From a developmental perspective, this vocalization of distress and attempts to resolve it though relationships with helpers (e.g., counselors) is in keeping with women's more connective style and ways of knowing. According to Mann, research demonstrates that males, in contrast, "frequently display their depressive experiences in the form of depressive equivalents, such as alcoholism, drug abuse, and antisocial behavior" (217); this may be reflective of males' orientation toward individuation rather than relationship in gender identity development. Mann

thus describes "the relational focus of women's symptomatic configurations in contrast to men's presentation, which often reveals an ostensible interpersonal disconnection and separateness that is maladaptive in response to their emotional needs" (219), and concludes that "men's and women's separation related depressive symptoms are often manifested within these different developmental lines" (228). For both women and men, therefore, depression in college may result from the developmental challenges of separating from their families of origin and establishing their own adult identities.

A similar developmental view of substance abuse is also described in the literature by Rivinus (1992), who suggests that such abuse during the college years may be a function of "developmental arrest." This concept – which originates in the psychoanalytic literature – holds that "intrapsychic conflicts arising from internal and external events in the development of the child (or adolescent) could set in motion pathological processes resulting in deviations or cessation of development" (144). Rivinus identifies three categories of college students who may experience substance abuse problems as a function of developmental arrest: 1) students with developmental arrest before arriving at college, many of whom (perhaps as a result of family issues) have already begun "to use, and then abuse, substances in attempts at mastery and to find relief from the pain that they bring to college" (145); 2) students who arrive at college without a substance abuse problem, but as a result of peer group pressure start using drugs in addictive ways that lead to developmental arrest; and 3) students who "are vulnerable because they struggle with concurrent normal developmental tasks and who turn to psychoactive substances for a pseudoresolution of these issues" (147). This categorization of students into three groups can help explain why although "some experimentation with psychoactive chemicals is probably part of the typical developmental passage for many psychologically healthy America young

people" (152), it can lead to unhealthy and dangerous outcomes in certain students. For example, the first group of students, who come to college with "preexisting problems... [can] move rapidly from stages of experimentation to substance abuse and dependence" (153) in college. For the second and third groups, it is possible that substance use will decline or cease as students join healthy, non-using peer groups or resolve the development tasks of the college years, respectively. This is supported by the fact that "research suggests that experimenters and frequent users and abusers of chemicals are different groups and that some students 'mature out' of abusive use of substances" (153). From Rivinus's developmental perspective, then, "some psychoactive substance experimentation appears to correspond with the normal rites (if not rights) of adolescent passage," but for those students who turn to substances as a way to cope with developmental challenges, "regular use, abuse, and dependence" is not developmentally healthy or normal (153).

If depression and substance abuse can thus result from developmental overchallenge in the college environment, the solution from this perspective would be to balance such challenges with environmental supports. Although discussing substance abuse in particular, Schulenberg and Maggs (2001) describe equalizing levels of freedom and responsibility during the college years as one such approach:

The balance between freedoms and responsibilities is crucial...The transition from adolescence to young adulthood, and particularly into college, is a time when many individuals have more personal freedom than responsibility, and more peers in the same situation, thus providing some opportunity for previous casual substance use to be transformed into heavier and/or more frequent use (33).

While the authors recommend "slowing down the pace of increased freedoms during the transition" through the use of curfews and other measures, they also suggest that colleges should increase students" "social responsibilities through community work" (33). Similarly, the Robert

Wood Johnson Foundation (1997) asks college presidents seeking to reduce substance abuse on campus to consider whether students should "be expected to undertake a certain number of hours of volunteer work to reduce their free time and to give their educational experience additional meaning" (39).

Thus, one can theorize several connections between engaged learning and a developmental view of depression and substance abuse. Engaged pedagogies (such as service learning and community-based research) require students to take responsibility for their learning and their role in the community; participating in such experiences may provide students with authentic, meaningful, and even mentoring relationships with others (e.g., faculty, community members). This in turn may potentially help students resolve developmental issues like separation-individuation from family which, according to Mann, is a common cause of depression in college. Additionally, the responsibilities conferred on students through these pedagogies may help counter excessive levels of freedom, and therefore opportunity for substance abuse, in college. It should be emphasized again, however, that these possibilities are not fully discussed let alone established in the literature. Therefore, research is needed to explore whether engaged learning can provide needed support in a college environment that is developmentally overchallenging, and thereby reduce the likelihood of depression and substance abuse resulting from such overchallenge.

Theoretical Linkages: Moral Development; Personal and Social Responsibility

There is some evidence in the literature that students' level of moral development is related to substance abuse and other self-injurious behaviors. One implication of this research is that learning experiences which promote moral development may help to reduce such negative behaviors. Theoretically, engaged learning may potentially achieve this goal in two ways: from

an involvement perspective, engaged pedagogies may require students to think more complexly about moral issues and their own behavior; and from a civic development perspective, engaged pedagogies may provide opportunities for students to craft identities as moral individuals responsible both to self and to larger communities.

The research linking moral development with substance abuse and self-injurious behaviors arises primarily from Project Decide, a three-year National Institute on Drug Abuse study of adolescent moral reasoning and drug and alcohol abuse. Berkowitz (2000) reports a correlation between participants' substance use and assessment along Kohlberg's stages of moral reasoning:

We have found a clear relation between one's stage of moral decision-making maturity and one's likelihood to use a range of substances (e.g., tobacco, marijuana, cocaine). The more mature one's ability to make these moral decisions, the less likely one is to use such substances (40).

Drawing from domain theory of moral development – which posits that individuals also differ in the ways they categorize issues as moral, conventional, or personal in nature (Turiel 2002) – the study also examined whether adolescents viewed substance abuse as a moral or personal issue. In this area, Berkowitz claims that "we and others have found that children, adolescents, and adults who consider the use of substances to be a moral issue (that is, a matter of right and wrong) use less than those who consider such use to be a matter of personal lifestyle choice" (40).

Furthermore, Berkowitz et al. (1995) found that "the harder the drug, the more likely it was to be considered a moral issue....smoking cigarettes and occasional drinking were considered to be matters of personal choice" (220). The authors also examined adolescents' perceptions of other self-harm behaviors – such as suicide – and found that "subjects considering a behavior as a moral issue also tended to rate that behavior as more harmful to self and other" (221). A majority of students, however, "felt one has the right to harm oneself" (217), with suicide in particular

being rated equally as a moral or personal matter.

If substance abuse and self-harm are thus linked to students' moral reasoning stages and their views of such issues as moral or personal in nature, it follows that encouraging moral development might reduce such negative behaviors. This is a particularly important possibility for higher education, as college students have been found to be largely ineffective in making moral decisions. For example, Schrader's (1999) research on students' self-reported moral dilemmas (many of which involved substance abuse issues) found that rather than taking decisive moral action, most students "resolved the dilemmas by letting the issue drop, by doing nothing, by going along with the situation or with others in it, and by letting the problem resolve itself somehow" (48). The question becomes, then, how colleges and universities can encourage and facilitate moral development. Two models for doing so presented in the literature – sociomoral discourse and Kohlberg's just-community approach – have elements in common with many of the engaged pedagogies described in this review.

Kohlberg views moral development as occurring primarily through discussion with individuals in different (typically more advanced) stages of moral reasoning; such discussion is called sociomoral discourse in the literature. Berkowitz (1984) describes discourse that helps students analyze, extend, or logically critique others' arguments as being particularly facilitative of moral development and generating greater gains in moral reasoning on Kohlberg's model. From an involvement perspective of engagement, this type of discussion might resemble that found in academic controversy, a form of cooperative learning. Moreover, most of the engaged pedagogies described in this review provide students with opportunities to work with complex, real-world dilemmas; as these pedagogies generally stress integration of learning with students' own experiences, it is theoretically possible that they might come to apply their skills in dealing

with these dilemmas to their own moral issues and behaviors.

In addition to sociomoral discourse, research on Kohlberg's just-community model has shown it to be an effective means of promoting students' moral development. In an experiment of the just-community model, Kohlberg conducted research with students who participated in democratic governance at a public alternative high school, which had as its goal "promoting individual development through building a group-based moral atmosphere" (Reimer, Paolitto, and Hersh 1983, 237). Kohlberg theorized that if students were given opportunities to learn and practice the complex forms of moral reasoning needed to create a morally just learning community, their individual moral development would benefit more than in a traditional educational setting (where adults established and reinforced immutable rules). Thus a central and supported assumption of this approach is that moral development can be enhanced through membership in a moral community in which the individual has a significant role or stake. Engaged pedagogies like service-learning and community-based research bear some resemblances to the just-community model, in that they provide students with opportunities to become members of larger communities, collaborate with other stakeholders to address complex issues, and witness the outcomes of their efforts in real-world environments. Therefore it is theoretically possible that, from a civic development perspective, engaged pedagogies may promote more complex levels of moral development and thereby (as suggested by Berkowitz's research) potentially reduce substance abuse and other self-harm behaviors.

This last theoretical link – between moral development, civic engagement, and student mental health and behavior – is worthy of additional consideration. Principally, in claiming that "the moral and the civic are inseparable" Colby et al. (2003) assert that as "*morality* [describes] prescriptive judgments about how one ought to act in relation to other people, it follows that

many core democratic principles, including tolerance and respect, impartiality, and concern for both the rights of the individual and the welfare of the group, are grounded in moral principles" (9). It is possible that, through opportunities like service-learning or community-based research, students will develop these complex moral principles and capacities, and thereby be better able to examine their own behavior through a principled moral lens. But underlying this perspective is a more fundamental principle: that by becoming active and responsible members of the campus and larger communities through engaged learning, students may develop a moral view of the self that is situated in relationship with a larger moral community. In many ways this reflects the Adlerian view that mental heath and well-being are founded in "social interest," which refers to "an individual's awareness of being a part of the human community and to the individual's attitudes in dealing with the social world; it includes striving for a better future for humanity" of which the self is a part (Corey 1996, 137). An Adlerian perspective holds that as individuals' social interest develops, their feelings of isolation and alienation decrease, while pro-social behaviors increase. Thus, if engaged learning is capable of nurturing students' social interest, it may help mitigate negative feeling states (e.g., depression, and thereby substance abuse related to depression) as well as promote positive behaviors that are beneficial to both the individual and community (e.g., abstinence from or responsible use of substances like alcohol, as individuals seek to be productive and responsible members of society).

This is perhaps the grandest theoretical link between engaged learning, student mental health and well-being, and civic development, but it is also the most encompassing. It embraces a fuller definition of mental health, which the World Health Organization describes in terms of realizing one's potential, coping with life's stressors, working productively, and contributing to community. It also embraces a holistic view of the goals of higher education: to educate students

to reach their potential in all areas of development (such as cognitive, social, moral) and, ultimately, to become personally and socially responsible members of community. Juxtaposed in this way, it becomes clear that such definitions of mental health and well-being are congruous with the highest goals of a college education. It remains to be seen, through future research, whether engaged learning may provide a means toward accomplishing both.

The Possibility of Engaged Learning

As described in this review, linkages between engaged learning and student mental health and well-being essentially fall into two categories: those that have some basis in research, but need additional exploration and confirmation; and those that are suggested by the literature, but at present remain theoretical in nature. Therefore, while the current state of the literature does not provide concrete evidence for such linkages, it does suggest a number of promising leads for future research. These are at the focus of the final section of this review.

Before proceeding to this discussion, however, it is important to issue a cautionary note about potential linkages between engaged learning and student mental health and well-being.

Issues such as depression and substance abuse are complex, multivariate problems, for which the underlying causes are not yet fully understood, let alone how they may be effectively prevented.

Keeling (2001) explains:

Although health behaviors are potentially changeable, it is not at all clear that we know how to make those change happen – at least not in reliable, predictable, consistent ways... we cannot influence all – or even the most important – health behaviors all the time for all students. And being planted in the midst of the fertile fields of higher education does not seem, regrettably, to make health behavior any more susceptible to alteration than it is in any other setting (54).

There is no reason to assume, based on the current literature and research available, that engaged learning is the illusive "silver bullet" for mental health concerns — and as implied by Keeling, it

is unlikely that any such silver bullet exists. However, it is evident from statistics on depression and substance abuse that higher education must continue to seek effective means of prevention, which Berkowitz (2000) asserts "can be thought of as a matter of promoting human development and not merely a matter of preventing a specific behavior or set of behaviors" (38). According to Berkowitz, "Once this shift is made, then the whole person becomes the focus... In other words, an important approach to preventing unhealthy behaviors is building healthy people" (43). There is enough preliminary evidence – as well as theoretical suggestion – in the literature to warrant examination of engaged learning as one such approach.

IV. Methodological Perspectives

As discussed in the preceding section of this review, the literature is largely inconclusive on the linkages between engaged learning, mental health and well-being, and civic development in higher education. Research is both warranted and needed to explore potential linkages suggested by both existing studies and theory. Although the question then becomes what kinds of research might prove fruitful in exploring these connections, the current literature is not particularly generative in this regard either. It is helpful therefore to first examine major issues that may arise in research on these linkages, and then consider useful approaches – though limited in number – described in the literature.

Methodological Issues

There are several considerations for future research that examines potential linkages between engaged learning, student mental health and well-being, and civic development. These issues can be categorized in regard to the *multivariate*, *time-sensitive*, and *contextual* nature of such inquiry.

Multivariate Inquiry

The majority of research on college students' learning and development has primarily addressed the cognitive domain. This is evidenced by the predominance of both published research and assessment instruments that examine students' perspectives, reasoning, judgments, and beliefs, among other aspects of cognition. Waterman (2003) explains that this focus, while essential to studying student learning and development in college, is too limited in examining engaged pedagogies such as service-learning:

With regard to traditional forms of instruction, there is a presumption that the principal area of impact will involve the content of the material presented in the classes and the readings, related problem solving, or other cognitive skills...With regard to service-learning and other forms of experiential education, the range of anticipated, systematic outcomes is considerably broader (75).

Outcomes that might arise from non-cognitive domains involve a range of variables that are: psychological (motivation, self-concept, and self-esteem); affective (empathy and caring); values-related (moral and civic); and social (interpersonal relationships and skills), among others. Additionally, there is the persistent and largely unanswered question of whether and how these outcomes actually influence student behavior.

This is particularly true in the case of student mental health and well-being, as there is still much that is unknown about the interplay between genetic, psychological, and environmental factors in students' experiences of depression and substance abuse in college. When trying to explore these factors against the equally complex backdrop of engaged learning – whether from an involvement perspective or a civic engagement perspective, let alone both – it is clear that any such exploration must necessarily involve more than a traditional focus on one or two research variables. While this raises considerable issues throughout the research process, an initial area that is particularly problematic is that of data collection.

It follows that if research involves a multiplicity of variables in different domains of human learning, experience, and behavior, the use of one or two univariate instruments for data collection will most likely not suffice in assessing these variables adequately. The current state of instrumentation in both cognitive and non-cognitive research, however, reflects exactly this conundrum: most instruments with adequate reliability and validity assess only one variable (e.g. moral reasoning *or* drinking behaviors *or* civic values). As Furco (2003) explains regarding the study of service-learning:

Although there are instruments that have been designed specifically to measure particular service-learning impacts (e.g., increased social involvement, development of a service ethic), these instruments are not designed to capture the full range of potential impacts of a complex, individual program (15).

To counter this, of course, researchers can employ a variety of single-dimension instruments in data collection, in the hopes of creating a composite picture of students' experiences from findings on these instruments. And yet, this creates another set of problems: even if findings can be established for individual variables, what are the specific relationships between those variables – particularly as the researcher moves beyond correlations to larger questions about causal relationships? To generate this deeper insight into the nature of multivariate problems – such as the relationship between depression and substance abuse in college and forms of engaged learning – it is likely that researchers will need to employ a combination of quantitative and qualitative methods. And assuming adequate data were generated from such a comprehensive data collection strategy, data analysis also poses a variety of challenges, namely: how exactly do researchers go about crafting that composite picture of students' experiences?

From this brief discussion, it is evident that the question of linkages between engaged learning, student mental health and well-being, and civic development cannot be examined by administering a single, univariate questionnaire. Rather, such research will likely entail a multivariate approach that employs a range of data collection and subsequent analysis methods. Thus in this case, the complexity of the research problem would appear to necessitate an equally complex research strategy. This is not limited to the different domains in which student learning and development occur, but also involves issues of time sensitivity, as follows.

Time-Sensitive Inquiry

There are two considerations that render research on linkages between forms of engaged

learning, student mental health and well-being, and civic development time-sensitive in nature.

The first concerns the time frame over which the impacts of a specific form of engaged pedagogy can be observed, and the second pertains to maturational effects during college that typically occur regardless of students' specific experiences in the college environment.

The first issue of time sensitivity is related to the multivariate nature of student mental health and well-being in college, in that the effects of specific forms of engaged learning may not become evident either during or immediately following student exposure. By way of example, most service-learning experiences only last one semester. If research is conducted during that semester or immediately thereafter, there may not be much observable change in the students involved, for one of two reasons: the impact of an engaged learning experience may extend over a longer period time than just the actual experience itself (e.g., as observed by Astin, Sax and Avalos 1999, in their study of long-term effects of student volunteerism); or it is possible that when students are intensely involved in a learning experience, they may not recognize the value of that experience until well after its conclusion and they have time to reflect (self-report measures administered during or immediately after the experience may be particularly subject to this issue). Secondly, and just as likely, it may be that a program or course that employs engaged learning but that is limited to a single semester may not in fact have tremendous impact on dimensions that develop over time, such as values, beliefs, and behaviors. As discussed earlier, Eyler and Giles (1999) – in describing the small magnitude of significant findings in their study of service-learning – explain: "The learning goals in higher education are complex, and students are affected by many of life's experiences; no single intervention, particularly over the course of a semester, can be expected to have a dramatic impact on student outcomes" (xvii). This last consideration pertains more to program design than to research on outcomes, but it nonetheless

explains why such research may be influenced by the independent variable of time. On both accounts, this issue would suggest that research – and most likely, students' exposure to forms of engaged learning themselves – should be longitudinal, rather than short-term, in nature.

The second issue of time sensitivity arises from the maturational effects experienced by most college students, which can potentially confound any research findings related to the impact of an engaged learning experience. For example, as discussed in Part III, research has demonstrated that a significant number of college students "mature out" of binge drinking over the course of four years in college; hence students in this group may drink more heavily and frequently in their first year as opposed to their senior year. Thus, although longitudinal research has just been recommended, a simple pre-test/post-test design (also known as a value added or talent development approach) in which students are assessed in the first and last year of college (or in some cases, even the first and second year) would likely not distinguish maturational issues from programmatic impact. One solution to this might be to conduct data collection at multiple points through students' entire time at college, and then analyze data from each point as well as aggregate data to monitor student change. This approach is obviously most effective when coupled with a quasi-experimental design, which entails the use of a control or comparison group comprised of students not participating in the engaged learning experience (students participating in the experience would constitute the "treatment" group in such a design). The assumption therefore would be that any gains observed in the treatment group above and beyond normal maturation (as witnessed in the control group) are attributable to the engaged learning experience. This design brings with it some problems, however, as described by Bailis and Melchior (2003):

The evaluation literature often stresses the shortcomings of the so-called quasiexperimental designs that rely on comparison groups, particularly the inability to adequately adjust or control for differences in motivation and outside circumstances affecting the two groups. The concern here is that the measured impacts ultimately reflect some fundamental difference between the participants and comparison group members rather than the program itself (142).

To counter this problem, the authors explain that researchers should work with "program staff to design a comparison group strategy that eliminates as many of the uncontrollable variables as possible" (142). Unfortunately, this is often not possible in higher education settings where forms of engaged learning are employed; returning to the example of service-learning, many such experiences are voluntary and therefore issues of self-selection can confound the establishment of a control group (e.g., students who seek out service-learning experiences are already fundamentally different from other students who do not – at least in terms of interest, and potentially in terms of motivation, civic values, and many other dimensions). Unless higher education institutions are able to devise a way to conduct randomly selected studies – which again are not typical nor in many cases institutionally acceptable, as they can create perceived (and potentially real) educational inequity – this problem of self-selection will likely persist and must be accounted for in future research.

Contextual Inquiry

In addition to being multivariate and time-sensitive in its approach, research on linkages between engaged learning, student mental health and well-being, and civic development needs to be contextual as well. Such research must take account the convergence of two specific contexts: that of the individual student; and that of the form(s) of engaged learning in which the student participates.

First, the context of students' lives – including past life history and concurrent life events – needs to be considered in research. In the specific case of depression and substance abuse, it is

particularly important to account for what Astin (1991) calls *inputs*, or "those personal qualities the student brings initially to the educational program" (18). This includes whether students have any previous history or diagnosis of depression and substance abuse, as both have complex causes that usually extend far back beyond entrance in college (some researchers claim even into childhood, as having a parent with diagnosed depression or substance abuse can potentially increase a child's risk for a similar diagnosis). Ignoring or disregarding these particular inputs – by limiting examination of students' depression and substance abuse to only that experienced during participation in the engaged learning setting – might lead to incorrect attribution of gains or losses in these areas to program impact.

The context of students' lives can also refer to concurrent events and experiences that happen outside of the specific form of engaged learning in which students participate. In most research studies these events or experiences are referred to as "confounding" variables, and in experimental designs researchers generally try to eliminate or otherwise control for them to determine the specific impact of the treatment. As Waterman (2003) explains:

Life events of the students will vary greatly both within and between classrooms. The sources of noncurricular variation will include developmental maturation, collateral events arising within the school, and collateral events arising outside of school, for example with respect to physical health, family circumstances, and social relationships. The challenge becomes trying to identify whether observed changes in educational performance, or psychological functioning, or other outcomes are due to the program under study or to confounding life events. It is also possible that the failure to observe positive changes may be a consequence of confounding life events actively interacting with the outcomes an educational program is designed to promote (80).

In the case of depression and substance abuse, however, these confounding variables are absolutely essential to incorporate into the research process, as in many cases they will be directly related to the effects under investigation. For example, a student in a semester-long service-learning course may concurrently join a fraternity or sorority, and as research has

demonstrated, membership in such an organization is correlated with higher levels of binge drinking. Without taking this collateral event into consideration, researchers may find an increase in the student's drinking during participation in service-learning where they might have hypothesized (or even designed the experience to elicit) a decrease in such behavior. This is potentially true as well for students' depressive symptoms, if they result from concurrent relational problems or other issues that can contribute to depression. And recalling that Astin (1993) reports that, above all other factors, "peer group is the single most potent source of influence on growth and development during the undergraduate years" (398), the "confounding" variables in this research might actually be much more influential than the impact of engaged learning under investigation.

When taken together, these two elements of students' contexts – prior history of depression and substance abuse, and concurrent life events that can influence student mental health and well-being – point to the wide range of individuality that students bring to a given engaged learning experience. Moreover, prior life history and concurrent life events are certainly not the only "outside" elements that contribute to students' experiences in forms of engaged pedagogy. A myriad of other influences – whether other inputs, such as prior experience in that form of engaged learning, or concurrent experiences, such as learning in other courses – can certainly influence outcomes in particular engaged learning experiences. All of these factors lend support to Waterman's (2003) assertion that: "Maximal impacts of effective programs will only be found among those students for whom a program is well-timed to provide developmentally appropriate challenges" (81). Such a contextual approach to the success of a given form of engaged learning (e.g., success as defined by the context of each individual student) necessitates a research design that can accommodate such complexity.

In addition to the context of students' lives, the context of the form of engaged learning under investigation warrants particular consideration. As discussed throughout this review, forms of engaged learning vary greatly in their philosophy, structure, and practice. This places the burden upon researchers to carefully consider the specific elements of engaged learning experiences under investigation. Hecht (2003) relates this problem with regard to service-learning:

Unlike many educational innovations or reform programs, service-learning is not a specific program with identifiable characteristics. Rather, service-learning is an approach to teaching and learning that is given meaning by the school or organization where it is based. It is this challenge that faces researchers: to develop studies that account for the tremendous variability across and even within programs (107).

According to Hecht, this places the responsibility upon each individual researcher for establishing "a definition of service-learning and clearly communicat[ing] this definition when discussing the research" (107). Even with the definitional problem resolved for a particular study, it is still difficult – given the diversity in the field – to make comparisons across engaged learning experiences, let alone generalize a particular study's findings to other settings. Furco (2003) describes this situation, again in the context of service-learning research: "The service-learning research field continues to be a mass of disconnected investigations that have focused on variety of issues related to a broad array of idiosyncratic service activities" (15). These issues are crucial for researchers to consider in their design decisions, particularly as to whether examinations of linkages between forms of engaged learning, student mental health and wellbeing, and civic development can be conducted at a single site or across multiple sites.

Research Approaches

The multivariate, time-sensitive, and contextual issues inherent in research in this area of student learning and development thus pose substantial challenges. Presently, there are no "tried

and true" approaches offered in the literature for examining linkages between engaged learning, mental health and well-being, and civic development. However, there are two general approaches that – while not without their own limitations – might take into account and possibly offset some of the aforementioned challenges. Both the N=1 model and grand-design approach are discussed as promising approaches in the literature on service-learning research, but might be applicable in researching other forms of engaged learning as well.

The N=1 Model

This particular model, as described by Waterman (2003), attempts to account for both multivariate and contextual issues related to service-learning research. Waterman explains the rationale and essence of this approach:

If each student in a service-learning class is starting from a different place with respect to academic, psychosocial, attitudinal, and personal development variables, and if the actual service-learning experiences of each student are different both on the site and in the classroom reflection activities, and if the outcome impacts of those experiences can be expected to vary widely among the students, then it is plausible to consider the evaluation of a service-learning project as a simultaneous series of N=1 research design assessments... Although variations in the nature of what is changing can be expected from participant to participant, across N=1 comparisons, it is still possible to identify regularities in the patterns of change (82).

Waterman describes the implementation of this N=1 approach through a pre-test/post-test, quasi-experimental design that examines both service-learning program students and a comparison group in a traditional curricular experience. For both groups in such a design, the initial assessment of students is "as broad-based as possible, so that it can provide the foundation for identifying a substantial portion of the range of possible changes" (82). Information is collected through a variety of quantitative means, whether "off the shelf" (established) or "homegrown" (program-developed) instruments, such as: teacher evaluations of student performance; attendance records; student self-report of academic ability, aspirations, and future goals; pre-test

scores on tests of academic material related to the course; and "pre-test measures of self-esteem, feelings of efficacy, and psychosocial variables" as well as "any attitudinal variables considered as potentially relevant to the educational experiences the student is to have" (83). The post-test "should mirror as much as possible the initial assessment" (84) and therefore involve readministration of most, if not all, of these measures.

Once both pre-test and post-test data have been gathered, trained raters assess the "overall magnitude of change on a numerical rating scale" (85) for each student; Waterman gives the example of a 1-9 scale, with the high endpoint of 9 equaling dramatic gains during participation; mid-point of 5 equaling neither gains nor declines; and low endpoint of 1 equaling dramatic declines during program participation. As inter-rater reliability is an issue with this design, Waterman explains that "extensive training of the raters would need to be undertaken regarding how to apply a common rating scale across gains and declines occurring across differing aspects of academic, psychosocial, attitudinal, and personal functioning" (84). A substantial benefit of this approach is that ratings of individual students in different programs and across time can be "combined to yield meaningful statistical comparisons regarding the relative frequency of various types of gains" (87-8).

An N=1 design may have several benefits for examining potential linkages between forms of engaged learning (including and beyond service-learning), student mental health and well-being, and civic development. First, such a design assumes the problem under investigation is multivariate, and as such uses a variety of instrumentation to assess multiple dimensions of student learning and development (thus, for example, various instruments could be jointly employed to measure different elements such as students' learning, feelings of depression, substance abuse behaviors, civic engagement values, and so forth). Additionally, a quasi-

experimental approach that examines the experiences of both program students and a non-program comparison group may potentially be able to account for maturational effects.

Waterman also asserts that the N=1 model can account for contextual issues in students' lives, such as collateral events that occur during students' time in the engaged learning program under study: "In most studies of educational impacts, such collateral events are treated as error variance. With the design proposed here, attributions of changes in performance by the students and their teachers can be used as a means to further evaluate the comparative effectiveness of educational programs" (87).

Yet despite these benefits, the N=1 model also has several limitations that extend beyond obvious concerns (e.g., the time consuming nature of data collection, the large amount of data generated, and the need for comprehensive rater training and testing to establish inter-rater reliability). Principally, as it is a pre-test/post-test design that is built around students' immediate experiences in a form of engaged learning, the N=1 model as described by Waterman does not account for the time-sensitivity issue of whether program effects can be observed immediately after the program. Simply extending the post-test over time does not resolve this issue, as maturational effects then become a concern. Additionally, while comparative rating is the hallmark of this approach and allows for cross-student and cross-program comparison, such ratings may not provide much information beyond an estimate of the magnitude of change; in other words, these ratings do not provide insight into reasons underlying these changes or possible causal relationships that may exist in students' experiences. To compensate for this, qualitative measures and in-depth analysis might be used to augment the N=1 design proposed by Waterman. Such an addition – though potentially necessary to generate the kinds of data sought through this research – would further complicate an already elaborate study design. Thus, both the N=1 model and its shortcomings serve to illustrate the high level of complexity necessary in researching linkages between engaged learning, student mental health and wellbeing, and civic development.

Grand-Design Approach

Furco (2003) describes the grand-design approach as a means for overcoming the contextual difficulties posed by research involving forms of engaged pedagogy, and service-learning in particular. Citing the "lack of well-tested instruments and protocols to capture comprehensively the multiple outcomes of service-learning across various school and community sites" (16), Furco proposes the grand-design approach as one means of overcoming this challenge and enabling researchers to conduct multisite studies:

The *grand-design* approach involves the coalescence of a selected set of constructs, instruments, and methodologies that have been utilized successfully in independent studies of service-learning and that, in turn, are streamlined and applied as a package to a new, larger study that includes a multisite cross section of service-learning programs. In the vein of meta-analysis and hierarchical linear modeling, the grand-design approach takes the best service-learning research designs, instruments, data collection strategies, and data analysis techniques and combines them strategically and purposefully into one large design that can comprehensively and simultaneously investigate a variety of issues within and across a set of program sites (25).

Furco provides an in-depth description of instrumentation in the grand-design approach, which involves a process of selecting and applying both quantitative and qualitative measurements together across all participating sites to measure various outcomes. In addition to this "common" group of instruments, a "second set of protocols that allows the researcher to investigate each unique program site in fuller detail" (26) is also developed. Because of this dual set of protocols, Furco asserts that the grand-design approach "strives for comprehensiveness as well as for universality" and is therefore "applicable and relevant" across diverse programs (25).

Though participants were high school rather than college students, Furco describes an

example of this type of study conducted by researchers at the University of California–Berkeley. Students in 19 classrooms that incorporated service-learning programs were assessed in six educational domains: academic; social; personal; career; ethical; and civic. To conduct the study, researchers developed the Evaluation System for Experiential Education (ESEE), comprised of ten quantitative and qualitative instruments and protocols including: a pre-test/post-test attitudinal survey; journal questions with specified prompts; semistructured focus group interviews; content analysis of student work; student placement questionnaire; teachers' program goals and objectives; classroom visits and observations; teacher focus group; community-based organization questionnaire; and formal and information meetings with site administrators.

According to Furco, this design created significant challenges in terms of the volume of data generated; to manage this data, researchers used a meta-matrix approach, described as a "qualitative strategy for analysis that provides a framework for organizing information from all the data sources into recurring themes" (30).

Given the diversity of forms of engaged learning (inclusive of and beyond service-learning) at the present time, it is unlikely that a grand-design approach might be implemented in investigating linkages between such forms, mental health and well-being, and civic development in the immediate future. However, it does represent a direction in which research – and in particular, instrumentation – may begin moving: toward crafting what Furco calls a "package" or "battery" (25) of instruments adequate to such inquiry. Currently, while a number of instruments exist that each address a different variable potentially related to these linkages (e.g., alcohol use, civic values), they are often not readily available to interested researchers for two reasons. First, some are well-established instruments but are only known to a specific research discipline (for example, a researcher whose primary expertise is in service-learning may be unaware of different

instruments available to measure students' depressive symptoms, and vice versa). Second, many instruments appear on a limited basis in the literature as they are "homegrown" or developed for a specific study, but they might very well prove promising if tested and validated through further use in research.

Thus, the first step in any grand-design approach might be to create an annotated bibliography to identify – or ideally, a clearinghouse to store – both quantitative and qualitative instruments applicable to the study of linkages between engaged learning, student mental health and well-being, and civic development. Interested researchers could then access information about the various instruments available, share findings from utilizing these instruments, and also add new instruments as they are developed. In this way, dialogue and exchange of information on instrumentation may help to advance – and perhaps serve as a driver for – further research on these linkages, as well as lay the groundwork for eventual research on the scale of a grand-design approach.

Assessment Approaches

A substantial portion of the literature on higher education research methodology is devoted to assessment approaches. Although there is considerable confusion in the literature as to the differences between research, evaluation, and assessment, the latter appears to be unique in that it is both embedded in the actual learning experience and focuses on providing feedback to students and teachers themselves. Huba (2000) gives the following definition:

Assessment is the process of gathering and discussing information from multiple and diverse sources in order to develop a deep understanding of what students know, understand, and can do with their knowledge as a result of their educational experiences; the process culminates when assessment results are used to improve subsequent learning (8).

Erwin (1991) similarly explains that data from assessment is primarily and explicitly used "to

increase students' learning and development" (15). As many faculty and staff interested in engaged learning, mental health and well-being, and civic development may be involved in program development aimed at linking these three areas, it is helpful to consider ways of building assessment of these linkages into such programs.

Some of the literature on assessment in higher education deals with "course-level" or "program-level" assessment approaches. Such assessment can be either formative (throughout the learning experience) or summative (at the end of the experience), though most authors favor formative assessment as the best means of providing immediately useful feedback to students and to faculty. Assessment generally involves the establishment of learning objectives and then measurement of learning in these objectives through the use of various methods, from different types of objective tests, to portfolio assessment, to performance ratings (Erwin 1991). Gelmon et al. (2001) provide examples of a number of instruments that may be used for assessing servicelearning programs, such as checklists, observation forms, survey instruments, and interview guidelines. Handelsman et al. (2005) describe the development of the Student Course Engagement Questionnaire (SCEQ), which examines the level of student involvement in a specific course, rather than at the campus level (as measured by the NSSE). There is also a range of specific classroom assessment techniques (CATs) that can be used in individual courses, such as the minute paper or diagnostic learning log (Cross 1998). Additionally, some of the literature examines ways of assessing faculty teaching performance (Ryan 2000) in addition to student learning.

Such resources may be helpful for institutions seeking to create individual programs that utilize forms of engaged learning to address student mental health and well-being; these institutions can embed assessment techniques into these programs from the beginning, thereby

generating data on student learning from their inception. It should be kept in mind, though, that these assessment approaches would likely be subject to the same multivariate, time-sensitive, and contextual issues as is research on linkages between engaged learning, student mental health and well-being, and civic development.

The majority of the literature on assessment deals with approaches for implementing campus-wide assessment initiatives, as opposed to assessing individual courses or programs (see Mentkowski and Associates 2000, Maki 2004, and the American Association for Higher Education's 1992 *Nine Principles of Good Practice for Assessing Student Learning*, for detailed discussions of implementing campus-wide assessment). What is particularly interesting about many of the assessment programs on college campuses is that they often do not examine the noncognitive outcomes of the educational experience they provide. As Astin (1991) explains, this is often in contrast with institutional mission statements:

Most colleges claim to be concerned about such affective qualities as good judgment, citizenship, social responsibility, and character. Indeed, most descriptions of the liberally educated person sound at least as affective as they do cognitive... [therefore] no program of student outcomes assessment would seem complete without due consideration for assessment of relevant affective outcomes (43-4).

Among these affective outcomes, Astin lists skills such as "interpersonal competence, leadership ability, and empathy," and most importantly to this review, "motivation for further learning, understanding of other peoples and societies, self-esteem, social responsibility, and even good mental and physical health…" (57). This would suggest that those campuses with an existing institutional assessment program (or that are looking to create one) should seek to incorporate objectives related to student mental health and well-being. And as further research identifies specific ways of linking forms of engaged learning and civic development with these objectives, "best practices" in this area can be implemented on campuses and incorporated into assessment

programs.

Two additional concepts related to campus-wide assessment – and that could potentially be brought to bear on linkages between engaged learning, student mental health and well-being, and civic development – are cultural audits and assessment of community climate. Kuh and Whitt (1988) explain that the purpose of a cultural audit is to "systematically identify artifacts, values, and institutionally relevant assumptions about matters, such as the nature of teaching and learning, the reward structure, students' efforts, relationships between faculty and students..." (103). This approach generally utilizes qualitative methods such as observation, interviews, and focus groups, that all "enable researchers to identify cultural properties and develop an appreciation of the holistic influence of the institution's culture" (110). Using similar terms, McDonald (2002) describes the importance of assessing campus community, or the "policies and practices that mark the distinctive mission of a collegiate institution and that accent the shared values and commitments held in common by institutional constituents" (148). According to McDonald, any assessment of community climate must incorporate students' "voices;" to this end, one specific instrument, the College and University Community Inventory (CUCI), asks students to use a Likert scale to indicate their agreement with a number of items in the areas of: institutional mission and curriculum; membership rights and responsibilities; respect for diversity and individuality; standards and regulations; service to both students and community; and institutional rituals and celebrations.

In practice, both cultural audits and community assessment seem to generally neglect issues of student mental health and well-being, though they often address elements of engaged learning and civic development. Interestingly, some institutions do conduct cultural audits specifically targeted at perceptions and behaviors related to substance use (mostly alcohol) on

campus. Institutions that are interested in conducting such systemic examinations of campus life might consider combining these efforts and examining all three elements – student mental heath and well-being, as well as engaged learning and civic development – simultaneously. Doing so might potentially yield insights into linkages within the context of specific institutional settings.

Toward Generative Research and Assessment

Research on linkages between engaged learning, student mental health and well-being, and civic development will require a level of complexity that accounts for the multivariate, time-sensitive, and contextual nature of such inquiry. Although current literature offers limited though promising leads, this area of research is still very much in its infancy, without a shared conceptual framework or definition of the problem (as described previously in this review), and lacking established instrumentation and methods of analysis. Similarly, those involved in program or course development – as well as those responsible for campus-wide, cultural, or community climate assessment – should incorporate into assessment practices outcomes related not only to engaged learning and students' civic development, but also to elements of student mental health and well-being (such as depression and substance abuse). These are all areas in which much work remains to be done, if much-needed understanding of potential linkages is to advance.

Concluding Recommendations

The question of whether and how engaged learning, student mental health and wellbeing, and civic development many be linked comes at a critical time in higher education. Facing crises of quality and relevancy, institutions are re-examining their missions as well as the fundamental purposes of a college education. And simultaneously, campuses are facing crises – in the truest sense of the word – as increasing rates of depression and substance abuse endanger students' lives and futures. Given the urgency of these concerns, as well as the current state of literature, advancing the inquiry described in this review will require interdisciplinary dialogue, inviting and engaging students, broad and meaningful commitments, and a community perspective.

Interdisciplinary Dialogue

The literature addressing issues of student mental health and well-being is generally separate from that on engaged learning and civic development in higher education. This is representative of the gulf that typically exists on college campuses between those who address mental health issues (e.g., counseling center staff, prevention staff, psychological researchers) and those who are concerned with engaged learning and civic development (e.g., faculty, service-learning coordinators, centers for teaching and learning staff). A crucial first step, then, is to convene these two groups – much as the Bringing Theory to Practice Project has done – to share perspectives, insights, and possibilities for linking their work. This conversation – which is "interdisciplinary" in the broadest sense – can help advance much-needed theory, research, and practice related to linkages between engaged learning, student mental health and well-being, and civic development.

Inviting and Engaging Students

Any such interdisciplinary dialogue is founded on the principle that students' mental health and well-being concerns all members of the campus community, and as such, all stakeholders must be invited to the table. There is simply no more important stakeholder in this area of inquiry than students themselves. Just as institutions are coming to realize the value of engaging students in both their learning and the larger community, they must also recognize students as equal partners in exploring linkages between *their* learning, *their* engagement in the community, and *their* mental health and well-being. To this end, institutions can direct the principles and activities of community-based research internally – toward the campus community itself – by creating interdisciplinary teams of students, faculty, and staff to address critical community issues (such as depression and substance abuse) through research, assessment, education, and programming.

Broad and Meaningful Commitments

Future efforts to explore linkages between engaged learning, student mental health and well-being, and civic development will require broad and meaningful commitment across higher education. Faculty, staff, students, and community members will need to bridge institutional divides to develop meaningful and enduring partnerships that work collaboratively in such efforts. Colleges and universities will need to devote sufficient resources – whether staff, funding, or time – necessary for designing projects complex enough to be generative of the data needed to explore these linkages. And the field of higher education as a whole, including national organizations and foundations, will need to give priority to these linkages amidst an already crowded educational and research agenda.

A Community Perspective

If affirmed through research, linkages between engaged learning, student mental health and well-being, and civic development have far-reaching implications for higher education. There is already substantial evidence in the literature that forms of engaged learning offer significant learning advantages over traditional pedagogical approaches, and yet these forms continue to remain at the periphery of most teaching and learning in colleges and universities. If engaged learning can reduce students' experiences of depression and substance abuse, as well as promote students' responsibility to their communities, one would expect that institutions will have even greater impetus to shift forms of engaged learning toward the center of their efforts.

Increasing the number of engaged learning experiences is a step in the right direction, at least in terms of students' learning and oftentimes civic development; it is potentially a similar step – if confirmed through research – for students' mental health and well-being. And yet, additive approaches to engaged learning do not necessarily lead to the *cultures of engagement* called for in this review. This dynamic is similarly explained by Parker Palmer (2002), but in terms of developing *community* on campus:

To say that community is key to teaching and learning and then translate that into small circles of students engaged in analyzing case studies or solving problems is to diminish the possibilities inherent in the idea...We need a more capacious view of what community in teaching and learning might mean (185-6).

From the prevention literature, it is likewise evident that single interventions targeted at negative behavior are largely unequal to the task of reducing depression and substance abuse on campus, both individually and aggregately. Taken together, then, the literature on engaged learning, student mental health and well-being, and civic development all point to a similar approach that, quite interestingly, is precisely congruous with Palmer's view of community. A community perspective, again in Palmer's words, places students' "capacity for connectedness" (186) at the

heart of the educational enterprise – whether students' connectedness to peers, faculty, staff, campus, and community, and as importantly, to their learning and themselves. As Palmer explains, "If we could ask ourselves critical questions about our own capacity for connectedness and our strategies for developing that capacity in our students, we might discover more and more ways to create community..." (186).

Such critical questions may lead colleges and universities to very interesting places, where ingrained traditions are challenged and new thinking about education is required. It will likely mean a sharing of authority, re-orientation of all campus constituents, and restructuring of the curriculum (beyond distribution requirements and sequencing to fundamental issues of teaching and learning). To this end – though a much abridged list – institutions thinking critically about their capacity to foster connectedness might consider engaging students, faculty, and staff in creating, endorsing, and affirming a shared "campus compact;" such an agreement would outline the kinds of learning, values, and behavior desired and expected by the campus community. Institutions might also consider promoting engagement in the campus community through shared governance (such as Kohlberg's just-community approach), understanding and consensus building (through intergroup dialogue), and service to the campus itself (such as peer education related to depression and substance abuse, collaborative peer tutoring, and beautification projects). Finally, institutions might consider infusing dialogue on engaged learning, mental health and well-being, and civic development into the curriculum; this could be accomplished by making linkages between the subjects of learning, well-being, and community what Palmer (1998) calls a "great thing" around which the entire campus can gather, as: "It is in the act of gathering around them and trying to understand them – as the first humans must have gathered around fire – that we become who we are as knowers, teachers, and learners" (107).

In every sense, colleges and universities are experiments in community: multiple constituencies deliberately gather together around a set of common purposes, share the same physical and intellectual space, and experience together the consequences – both positive and negative – of each other's actions. It makes sense therefore that from multiple perspectives, frameworks, and disciplines, the literature as a whole calls for a community-level approach to the most important goals and pressing concerns of higher education. There are many remaining questions about linkages between engaged learning, student mental health and well-being, and civic development, but the literature suggests that community is simultaneously a place to start in exploring such questions, as well as ultimately where these questions may lead.

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