



The Role of Well-Being in Learning Recovery

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Précis

The COVID-19 pandemic caused significant learning delays in California children. Efforts to recover from these delays as schools attempt to restore operational normalcy should recognize that many students suffer from the effects of social isolation, economic hardship, and the loss of family or friends; some of those who contracted COVID-19 continue to experience long-term health effects. Establishing within students a foundation of well-being is an essential first step to assuring their academic success. Studies that have examined the influence of well-being on academic performance have found mixed but generally positive results. However, these predate the pandemic and have generally failed to disaggregate the data. They have also adopted a narrow definition of academic success. Interventions that attempt to improve well-being are expected to foster academic success – broadly defined – and may be especially beneficial for students from historically underrepresented groups.

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“Know thyself.”

– Inscription at the Temple of Apollo, Delphi

The pandemic, with its associated school closures and remote instruction, resulted in a learning loss for California children. The decline in student knowledge and skills is notable. According to a PACE report on the impact of COVID-19, students experienced a learning lag of 2.6 months in English Language Arts and 2.5 months in math; the lag was even worse for underserved groups (Pier et al., 2021). Recently released test scores (California Department of Education, 2022) reveal that only 47% of California students meet English language standards (down from 51% in 2019) and 33% meet math standards (down from 40%). Placing children back on their pre-pandemic learning trajectory will require significant efforts that are designed to accelerate the normal pace of learning, enabling students to recover from the learning delays created by the pandemic. These needs may be especially urgent for students in demographic groups that are already characterized by equity and achievement gaps (Dorn et al., 2020).

Systems that support well-being are likely to play a crucial role in counteracting the learning lag. The pandemic forced many children to deal directly with economic hardship or the passing of loved ones; some continue to suffer long-term health effects from COVID. The relationships that adolescents have with family and friends were severely disrupted, triggering increases in negative affect and decreases in positive affect (Rogers et al., 2021). Absences from school were common, impairing social-emotional development. Middle schoolers were especially hard hit, with the increased absences having particularly deleterious effects on development of their mathematics skills (Santibañez & Guarino, 2021). Thus, school districts will need to increase social-emotional support to compensate for setbacks caused by the pandemic.

Can improving well-being support academic recovery?

This report focuses on research that examines the relationship between academic success and *subjective well-being* (SWB), which can be described as judging life positively and feeling good.¹ SWB has both a cognitive component and an affective one. The cognitive component represents a person’s satisfaction with life, and the affective component reflects the balance between positive and negative emotions. SWB can be examined either as a trait – an ongoing attribute of the person – or as a state – how the person feels in the moment.

Seity defines well-being as a state that has four components: energy, direction, belonging, and joy. The research question addressed here is whether supporting these four elements of well-being in students is likely to contribute to academic recovery. When students feel good – when

¹ This brief excludes studies of *academic well-being*, which describes how students perceive their learning environment, including their school, their teachers and peers, and the assignments they are asked to complete for their classes. This narrow definition of well-being can be problematic because the reported perceptions are likely to be shaped by the successes (or not) that students experience in their learning environments.

they experience energy, direction, belonging, and joy – will they perform better at school? Can schools leverage well-being to improve academic achievement? The preliminary answer, based on a critical review of the literature, is a qualified “yes.” According to Wilson and Buttrick (2016), “Successful learning depends not only on the quality of the services but also on what students bring to the classroom” (p. 392).

Numerous studies have documented an association between well-being and school success. For instance, a seminal study of students in southeastern states (Gilman & Huebner, 2006) found a link between well-being and GPA in adolescents. In this research, students with high well-being also reported better attitudes toward teachers and more positive school experiences. Furthermore, none of the students in this group reported psychological distress, whereas 42% of the low well-being group did. The researchers concluded that well-being is associated with good mental health and academic motivation.

Several longitudinal studies have confirmed the link between SWB and academic performance. For example, a study of 5th and 6th grade students in a northeastern city (Quinn & Duckworth, 2007) found a reciprocal link between well-being and school success: Students who experienced high well-being early in the year earned higher final grades, and those with higher grades experienced a subsequent boost in well-being. Likewise, reciprocal relations between life satisfaction and school achievement were evident in studies of 821 middle school students in the southwestern United States (Ng et al., 2015), 290 11th grade students in Germany (Steinmayr et al., 2016), and 189 middle school students in China (Wu et al., 2020). A similar study of mid- to late-adolescents in Sweden (Bortes et al., 2021) had more nuanced findings, revealing an association between well-being and academic achievement only for girls.

Meta-analysis, an approach that statistically combines the results of a group of similar studies, has also contributed to the research literature on well-being and academic performance. One such analysis of 22 articles (Amholt et al., 2020) suggested that positive associations between well-being and academic performance are found most strongly in younger children and in studies that focus on social relationships as an element of well-being (Seity’s “belonging” component). Another review of 47 studies (Bücker et al., 2018) concluded that the correlation between well-being and academic performance is positive but generally small to medium in size: Some students who are low in well-being demonstrate high academic achievement, and vice versa.

Limitations of the literature and a research proposal

The literature examining the relationship between SWB and academic achievement is characterized by several significant shortcomings. One is that all peer-reviewed studies published to date utilize correlational, rather than experimental, designs (Conesa et al., 2022). This creates multiple challenges, including determining whether the observed relationship between SWB and academic achievement is moderated, obscured, or distorted by other variables. Correlational designs also render indeterminate the direction of causality: If a relationship is found, this could signify that well-being *leads to* academic achievement or is the

result of academic achievement – or both. Studies that utilize longitudinal designs attempt to answer this question but remain fundamentally limited in doing so by their correlational nature.

Another problem is that the literature has not “unpacked” well-being into its constituent elements (energy, direction, belonging, and joy in the Seity model) and examined how each of these may relate individually to academic achievement. This oversight is potentially important (Obermeier et al., 2021). For example, numerous studies have shown that targeting sense of belonging can improve retention and persistence in post-secondary students (e.g., see Figure 1, adapted from Stanislaw et al., 2021). This effect is especially prominent among students from historically underrepresented demographic groups, including students who identify with a racial or ethnic minority or are the first in their family to attend college.

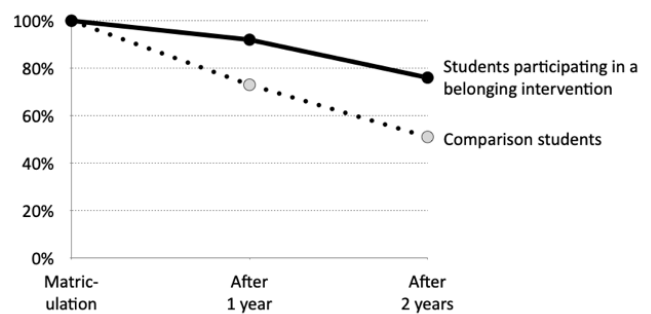


Figure 1. Percentage of entering students who remained enrolled and in a STEM major.

The issue of diverse student groups benefitting differentially from interventions is an important one that has not been adequately addressed in the literature. Students whose families place a strong emphasis on education, and who enjoy access to critical resources that support educational development (such as books in the home and a distraction-free space to complete homework), are less likely to benefit from interventions designed to improve their academic performance than students who lack these supports. However, most studies of the relationship between SWB and academic achievement disaggregate their findings only by gender – or not at all – potentially overlooking significant factors that contribute to equity gaps. Furthermore, all studies included in meta-analyses predate the pandemic. As a result, they are likely to underestimate the importance of well-being for academic recovery in the current context (Gaxiola Romero et al., 2022), especially in the underserved communities that have been disproportionately impacted by COVID-19 (Dorn et al., 2020).

A final shortcoming of the literature is that academic achievement has typically been defined in terms of grades or performance on standardized tests; other indicators of academic success have been largely ignored. For example, an intervention that reduces absenteeism or behavior referrals among students would likely be viewed as promoting academic success (Santibañez & Guarino, 2021), but few studies have examined how SWB relates to these outcomes. Considering outcomes other than grades is also essential if instructors use norm-based grading (“grading on a curve”), which guarantees stable grade distributions even if students improve their mastery of course material.

These concerns argue strongly for research that examines how academic success is impacted by taking steps to actively *improve* SWB as opposed to simply *measuring* SWB. Academic success should be broadly defined, considering metrics beyond grades and test scores to include attendance and behavior referrals. Furthermore, this research should examine the various

components of SWB and determine how each relates to indicators of academic success, and the findings should be disaggregated to determine whether some student groups benefit more than others. The expectation is that interventions designed to support and improve SWB will be particularly impactful for students who are from historically underrepresented groups.

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