This edition of the WSSDA Research Blast covers grit’s role in education and student success. The overview looks at the impact grit has on student achievement and preparing students for success, the role it plays in academic performance among minorities and what can be done to foster grit in the classroom.

What is “grit” and how is it measured?
Grit is defined as the “perseverance needed to accomplish long-term goals in the face of challenges and obstacles.” Lately, grit’s role in education has been fiercely debated and has sparked many new ideas of what contributes to student success.

In the studies discussed below, grit was measured using a self-reported “grit scale” developed by University of Pennsylvania associate professor Angela Duckworth. Respondents were asked to rate themselves on eight different statements such as, “I finish whatever I begin” or “I have overcome setbacks” using a scale of 1 (not at all like me) to 5 (very much like me).

Preparing students for the 21st century
Ensuring that students are adequately prepared to succeed in today’s world is one of the most important responsibilities of an educator. Many teachers and education leaders have long considered a child’s intelligence the most important factor to success. As a result, curriculum and materials have been based on standard education methods like content knowledge.

To gain a greater understanding of why some students are better prepared and more successful than others, there is a growing amount of research on non-cognitive traits such as grit, resolve and perseverance. Researchers are looking at what roles these traits play in contributing to and predicting academic success.

The findings indicate that grit, even more so than IQ, plays a vital role in a student’s ability to succeed at challenging, long-term, goals. Grit appears to contribute to academic achievement. The research suggests that students who are considered “smarter” often have less grit than their fellow students who compensate for the gap by working harder and showing more persistence. As a result, the “grittiest”, not the most intelligent, students earn the highest GPAs. The significance of these findings can already be seen on a national level. Persistence has even been added to the Common Core State Standards for Mathematics.
While the US continues to suffer from economic instability, there is a growing interest in fostering traits like grit to prepare younger generations to be resilient in the face of uncertain circumstances. It is becoming increasingly important for educators and leaders to incorporate elements of grit into curriculum and to design learning environments that promote resilience. This will help students meet the challenges that may await them after graduation.

**Grit’s role in urban schools**

A student’s background and socioeconomic status are important factors in evaluating how gritty a student is or can become. Typically, students who come from high-poverty backgrounds face greater challenges and have more limited academic support. These can harm a student’s ability to show resilience when attempting to achieve longer-term goals. This is why grit may play a particularly important role among this demographic.

According to the research, “grit level” is equal to both high school GPA and ACT score in predicting the grades of black, male college students at mostly white universities. Grittier students tend to perform better, receive better grades and are more likely to graduate. These findings suggest if grit is instilled at the elementary, middle and high school levels, black males will have greater academic success in college.

Parents, teachers and guidance counselors should take grit into consideration, reinforcing the worth of perseverance in addition to emphasizing the importance of grades. College admissions counselors may also benefit from creating admissions policies that go beyond established academic criteria and consider non-cognitive evaluations as well.

A teacher’s ability to show grit may be just as important, especially for schools located in urban areas. The neediest schools and school districts have a high number of less effective teachers and nearly 75% of teachers in urban neighborhoods quit within the first five years.

According to a **study** performed by Duckworth and Robertson-Kraft among novice teachers in low-income public schools, “grittier” teachers were more effective in the classroom and less likely to resign mid-year. One of the study’s key findings was that grit was the only predictor to distinguish between effective and less-effective teachers and teacher retention. Teaching is generally considered to be a very demanding profession, but teaching in low-income schools requires an even greater amount of resolve and commitment to succeed.

The need for gritty teachers may be essential to academic success in urban districts and one of many things to consider when searching for candidates to fill teaching positions.

**Fostering perseverance**

According to some of Duckworth’s research, it is possible to learn to be gritty. Personality traits are affected by experience and environment. As a result, they change over time. Educators must design learning environments that promote these traits. Giving students the opportunities to pursue goals that are important to them is a great way to connect with a pursuit that they see as worthy of their efforts. Passion for the pursuit is crucial to their motivation as it gives them the perseverance required to overcome hardships. Students also need a demanding yet supportive
environment to achieve the goals they have set. As is detailed below by the report from the Department of Education, students are more likely to persevere when the learning environment is objective and respectful while still setting high expectations. The emphasis should be on the effort given, not innate intelligence.

In addition to creating goals that students are enthusiastic about, fostering grit requires:

- Building on student strengths rather than always trying to improve student weaknesses
- Challenging students by pushing them to the edge of their comfort zone, but not so far beyond it that their goal is unattainable; the challenge should not be too easy or too hard
- Teaching students that their abilities can develop and grow through hard work and practice while also letting them know that difficulty is part of the learning process
- Evaluating students on their effort and praising them for their action, while reacting positively to mistakes and learning from them

It should be noted, however, that forcing students to become gritty by only emphasizing test scores and grades, can be damaging. Doing so can harm students’ ability to learn and retain information, stifle creativity and hinder their ability to handle everyday problems.

**Education and grit**

In the spirit of this discussion, we have gathered four recent pieces of research and literature.

- “How Important is Grit in Student Achievement?” is an article that introduces readers to the concept of grit, how it may impact student academic achievement and whether it is possible to teach people to be gritty. The author cites research conducted by Angela Duckworth to explain how students with more grit often outperform their “more intelligent” counterparts in the classroom. It offers evidence that gritty tendencies can be learned.
- “The Downside of Grit” offers a contrasting view on grit and perseverance. The author argues that “non-productive” persistence may lead to failure that could have been avoided by using alternatives. This harms the student’s sense of well-being. The author contends that grit can hurt other areas of development in children, such as creativity and independent thinking.
- “What Role Does Grit Play in the Academic Success of Black Male Collegians at Predominantly White Institutions?” is a 2013 study of grit’s ability to predict the grades of black, male college students at largely white universities. The report provides some significant evidence on the performance of “grittier” students and offers suggestions as to how to best instill non-cognitive traits within this particular population.
- “Promoting Grit, Tenacity, and Perseverance: Critical Factors for Success in the 21st Century” is a detailed report from the U.S. Department of Education’s Office of Educational Technology. It provides additional confirmation of the impact of grit on student achievement and recommends the best ways to implement grit, what additional research needs to be completed and how technology can be used to foster grit, are explored.
How Important is Grit in Student Achievement?

By Emily Hanford, American RadioWorks

This article addresses questions on: 1) the role that grit plays in student achievement, 2) how grit may contribute to college completion rates and 3) whether a student has the ability to learn to be gritty.

Many people have long thought a student’s intelligence is the most important contributor to success. The author contends that intelligence alone leaves many factors unexplained. She draws from research conducted by University of Pennsylvania Assistant Professor Angela Duckworth. Citing Duckworth, she demonstrates that students who are considered “smarter” than their fellow classmates exhibit less grit when compared to their peers who received a lower score on an IQ test.

Hanford concludes that students who may not be as innately intelligent as their cohorts compensate by working harder and displaying greater resolve. Ultimately, the pupils who bore the most grit had the highest GPAs.

Grit has also shown to be an important factor in completing community colleges and traditional four-year universities. College is, more often than not, challenging and grit makes a big difference in tough circumstances. Additional research indicates that obtaining an associate’s degree takes more grit than obtaining a bachelor’s degree. The drop-out rate at two-year colleges can be upwards of 50%. This suggests that to beat these odds, a person may need to display grittier tendencies.

Studies have shown that all human qualities, including a person’s intelligence, are affected by an individual’s environment. Since it is possible for traits and environments to change over time, it is reasonable to say that it is also possible to learn to be gritty. According to Duckworth, grit can “wax or wane” over time as a reaction to experiences and/or surroundings.

http://blogs.kqed.org/mindshift/2012/10/how-important-is-grit-in-student-achievement/

The Downside of “Grit”

By Alfie Kohn

The author proposes that grit is not always a positive, beneficial trait for students to hone. Besides feeling that grit is not a new concept, he explores how certain endeavors may not be worth the time and effort.

Continuing with a project or problem that withstands solution or persisting at a task that offers little to no satisfaction can result in problems. Kohn argues that “nonproductive persistence” can lead to failure or negative results that may have otherwise been avoided using a different strategy. Stopping and reconsidering alternatives may even lead to better well-being as the student is no longer working towards an unreachable objective.
Grit is being used to enhance academic achievement, but it may hinder children in other areas of development. Students who demonstrate grit by following through with the instructions they have been given, regardless of whether they find it gratifying or stimulating, are rewarded by the adults who told them to do it. This is mirrored in the finding that students with higher grades tend to be less creative and more conformist. While grit is marketed as a way for children to learn to accomplish long-term goals, it is really about getting them to achieve the goals forced on them by adults. This, in turn, may make them less likely to question larger institutions and authority when they are older.

http://nepc.colorado.edu/blog/downside-grit-alfie-kohn

**What Role Does Grit Play in the Academic Success of Black Male Collegians at Predominantly White Institutions?**

*By Terrell L. Strayhorn*

The majority of grit research has been conducted on adult or adolescent white females so this study was designed to test the importance of grit in predicting the grades of black, male college students at predominantly white universities. The majority of these students are first-generation college attendees who grew up in urban neighborhoods. Environmental, social and psychological factors contribute to the high college drop-out rate for black males. It is theorized that grit may be a key component in their ability to overcome these obstacles.

The study concluded that black males who demonstrated “grittier” inclinations earned higher grades than their black male peers, even when compared to those with similar grades in high school, ACT scores and educational goals. Grit’s ability to predict their college grades was almost on par with high school GPA and ACT score. These findings suggest that grit can be a very effective tool to bolster academic success among black males.

The study offers several recommendations when it comes to fostering grit among black males, including:

- Encouraging perseverance in addition to emphasizing grades and test scores
- Implementing non-cognitive assessments alongside the customary criteria for college admissions
- Urging parents and counselors to stress the importance of diligent work and resilience, not just innate ability
- Teaching students time management skills, how to regulate their efforts in order to sustain lengthy projects and to set both short and long-term goals

Among this demographic, one-off attempts at buckling down and studying long hours will not impact their grades. Persistent work over a period of time is the key to their success and ultimately, a college degree.

Promoting Grit, Tenacity, and Perseverance: Critical Factors for Success in the 21st Century
U.S. Department of Education, Office of Educational Technology

This thorough report examines a set of three non-cognitive traits—grit, tenacity, and perseverance—that have emerged as essential elements to a student’s ability to succeed. It also generates recommendations on how to advance and possibly teach these qualities in schools.

Grit can be promoted by offering opportunities to students that are neither too easy nor too difficult, while also being worthy of pursuit. The study suggests that educators and education leaders are responsible for creating environments for students that not only stimulate learning, but further non-cognitive qualities so that students are adequately prepared for the demands of today’s world.

A wide range of recommendations are included regarding how these characteristics should be instilled in learning. The article also includes suggestions for implementation. The most accessible and widely applicable are:

- Grit, tenacity and perseverance must be given priority and integrated with curriculum and teacher development, while also leveraging technology advancement and adoption.
- School schedules should be rearranged to implement longer class periods, school staff should be increased, more professional development and learning materials should be made available and parents should be involved to foster coherence and agreement on objectives.
- Parent involvement is necessary to foster coherence and agreement on objectives and they can contribute to building these predispositions by minimizing distractions at home while homework is being completed.
- Grit researchers should produce reports of their findings that are understandable and accessible to educators.
- Further research should be performed to understand how to best measure a student’s “grittiness” and what methods of application are most effective across different settings and student bodies.