

SPECIAL SERIES

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Accountability Is More Than a Test Score*Stephan Turnipseed*

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Abstract: The number one quality business leaders look for in employees is creativity and yet the U.S. education system undermines the development of the higher-order skills that promote creativity by its dogged focus on multiple-choice tests. Stephan Turnipseed and Linda Darling-Hammond discuss the kind of rich accountability system that will help students develop into the skilled adults that modern business and industry require.

Keywords: accountability; business leaders; testing; creativity.

La responsabilidad educativa es más que una calificación en los exámenes

Resumen: La primera cualidad que los líderes de negocios de calidad buscan en sus empleados es la creatividad y sin embargo el sistema educativo de Estados Unidos socava el desarrollo de las habilidades de orden superior que promueven la creatividad por su enfoque prioritario en pruebas de selección múltiple. Stephan Turnipseed y Linda Darling-Hammond discuten un sistema de

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responsabilidad educativa que ayudará a los estudiantes a desarrollar como adultos las capacidades que los negocios y las industrias modernas requieren.

Palabras clave: responsabilidad educativa; líderes de negocio; exámenes; creatividad.

A responsabilidade educativa é mais do que os resultados dos testes

Resumo: A primeira qualidade que os líderes empresariais procuram em seus funcionários é a criatividade, embora o sistema de ensino dos EUA prejudique o desenvolvimento de habilidades de ordem superior que promovem a criatividade porque o seu objectivo prioritário é obter bons resultados em testes de múltipla escolha. Stephan Turnipseed e Linda Darling-Hammond discutem um sistema de responsabilidade educativa que irá ajudar aos alunos a desenvolver como adultos as capacidades que as empresas e indústrias modernas exigem.

Palavras-chave: responsabilidade educativa; líderes empresariais; exames; criatividade.

Accountability Is More Than a Test Score

The Department of Labor estimates that nearly 65% of the jobs today's elementary students will hold during their careers have not yet been invented. To be ready for this future, our young people will need analytic and creative abilities that enable them to constantly inquire, explore, and learn both on their own and with others. Yet our education system undermines the development of these higher-order skills by its dogged focus on multiple-choice tests, which discourage critical and creative thinking, as the ultimate measure of student achievement and teacher and school accountability.

A study by George Land and Beth Jarman (which spun off from NASA's efforts to find creative employees) found that 98 percent of children test as creative geniuses at age 5, but that number decreases to only 30 percent by age 10 and a mere 12 percent by age 15. Only 2 percent of adults still test as creative geniuses by age 25. These adults are the product of an education system that increasingly emphasizes students' ability to identify the "right" pre-determined answer to narrowly defined questions over posing new questions, developing ways to investigate them, and designing new answers. This kind of test-taking ability, however, is not what modern industry needs.

A 2010 IBM survey of global business leaders confirms this: The number one quality business leaders look for in employees is creativity. They also look for learning ability, problem solving skills, collaboration, communication, resourcefulness, and resilience, often called "grit."

Yet our education policies continue to put a premium on passive learning through rote memorization and the recognition of answers on tests that allow for only one right answer. Right now, millions of students across the country are beginning the school year knowing that their year will end, in effect, with standardized exams in the spring. Because state tests are increasingly attached to high-stakes decisions (student advancement, teacher and principal firings, school closures), test prep demands more and more classroom time. And because the tests emphasize lower-level skills, they drive instruction in that direction. There are few incentives in the system for teachers and students to explore subjects in deep, meaningful, and engaging ways that would develop critical thinking, communication, and creative abilities.

This is a serious problem for industry in the United States.

In our global economy, creativity is the engine that drives innovation. Innovation drives product creation. Product creation drives manufacturing and service delivery, which, in turn, drive job creation. And jobs drive the economy. If U.S. businesses can not find the creative people they need, they will go where those people are.

For many years, developing creative individuals and entrepreneurs has been the American education system's strong suit. However, this historic strength has been jeopardized since 2002, when the federal No Child Left Behind Act tripled the amount of required state testing, attached punishments to scores, and encouraged states to abandon the performance assessments many of them had created to involve students in research, writing, and complex problem solving.

Other countries have long looked to the U.S. for insights about how to educate for creativity, and many have re-focused their systems to consciously develop the abilities to think critically and design new products and ideas. In the late 1990s, for example, Singapore and Hong Kong launched reforms to prepare students for "21st century skills." Both transformed their curriculum and examination systems to include long-term research projects that require students to define and investigate questions; find, develop, and analyze data; design solutions; and explain, test, revise and defend their ideas – strategies they learned from U.S. practices we have now substantially abandoned. Ironically, their students are learning to become creative scientists and engineers while most of ours are now learning merely to pick one answer out of five.

To foster teaching that will develop highly skilled, creative, and innovative adults, we need a much more meaningful and rich accountability system.

We can no longer rely on a year-end test – especially one that simplifies the measure of educational attainment to a single score that measures recall and recognition.

When we reduce children to a single number, it negates all that they are and can do. And that's simply not how modern industry works. We assess our workforce on knowledge, and skills, and dispositions. We test them on outcomes. We assess them on critical thinking, communication, collaboration, and their ability to solve problems.

Some schools in the United States do this as well. Through portfolios and performance assessments, they engage students in designing and conducting their own investigations; finding and using resources in creative ways; presenting and defending their work in writing, orally, and using technology tools; seeking feedback and revising their efforts to improve the outcomes.

When this kind of assessment is applied as a tool of learning, it is powerful. Students learn to use feedback, to constantly learn from mistakes, and improve their mastery of 21st century skills and dispositions. Teachers continuously assess students' understanding and progress and adapt instruction based on the rich information they get from the assessments. Not incidentally, students who graduate from these schools are far more likely to attend and succeed in college, because they have developed the skills they really need.

These schools reflect the real world our students will step into, and they develop the creative and innovative minds that modern industry needs. We can keep asking our students, teachers, and school leaders to increase test scores that do not develop their talents, or we can make the policy changes that allow them to develop and strengthen the creative genius they were born with and our nation's future demands.

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Stephan Turnipseed is President Emeritus of LEGO Education, North America. Before joining LEGO Education, Turnipseed served as president of the Tourette Syndrome Association, owned a leadership consulting practice, led business units in the oil exploration industry, and served in the U.S. Air Force.

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