Competitive Advantage Comes from CTE



By John McGlade, Chairman, President and CEO of the global gases and chemicals company, Air Products. Previously, he was named the CEO Champion of the Year by SkillsUSA for his leadership in supporting America's highly-skilled workforce and promoting Career Technical Education. John also serves on the Board of Directors of the American Chemistry Council and the Executive Committee of the Council on Competitiveness.

Growing up in Bethlehem, Pennsylvania, I spent a good amount of my formative high school years at my local Career Technical Education (CTE) – then called vocational education — school. Now, as president and CEO of a global company, I can testify first hand to how CTE can help equip students with the skills and knowledge to succeed in their careers. Moreover, CTE has

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since evolved, proving to be as dynamic and innovative as the economy for which it is preparing students.

In fact, I believe that CTE can be a source of competitive advantage for the United States, by rebuilding a skilled workforce better trained than ever to compete in the global marketplace.

Demand and supply gap

We know that more scientists and engineers are needed to support the United States economy, but a broader look must be given to the overall demand for skilled workers.

- Skilled, technical positions will represent the largest number of total openings in the United States in the next five years.
- Almost 10 million new, skilled workers will be needed by 2020, according to the Federal Bureau of Labor Statistics.

Air Products employs about 7,500 people in the United States.

- Over 50 percent of those people are skilled workers, including plant operators, drivers, mechanics and maintenance techs.
- We hire approximately 550 new employees in the United States each year and around 90 percent require technical skills.

There is a mismatch between the demand and supply of skilled

workers. Work opportunities exist, but sometimes it is difficult to find people to fill those jobs. Air Products has openings, but we can't always find people with the right skills in the right locations. This situation contributes to the national unemployment rate of over 8 percent.

Creating a new technology workforce

Filling the skills gap will require higher expectations and greater investment in education and job training. Technology continues to evolve at a rapid pace. We need technicians that are not just mechanically trained, but who can operate electronic control systems and sophisticated, predictive maintenance technologies.

That means government must provide more support for CTE, directing additional funding so that schools, community colleges and technical schools can continue their great work and strengthen and expand quality CTE programs.

Our nation's future

I cannot stress enough the importance of CTE to the U.S. economy. Not only do CTE programs help the new generation of workers with developing technical skills, they create well-rounded employees with 21st century employability skills — problem-solving, teamwork and leadership — to help them grow and succeed throughout the lifetime of their entire career.



Industries are eager to collaborate with schools and colleges that help foster the workforce of our next generation. We realize that we must develop strategic partnerships between industry and education to bring the best thinking and most current learning experiences to schools and colleges.

In doing so, we can create future career opportunities for millions of Americans.

