

## WISCONSIN'S 21<sup>ST</sup> CENTURY SECONDARY SCHOOLS

Over the past five years, reforming and/or redesigning America's high schools has been a major point of debate in most education discussions. Two recent reports summarize the recommendations from prominent task forces pertaining to improving secondary education on the national level, as well as in Wisconsin. In April 2005, the National High School Alliance (NHSA) issued a widely-cited publication entitled: *Call to Action: Transforming High School for All Youth*. The NHSA embraces six core principles and 48 recommended strategies for ensuring that all students are ready for college, careers, and active civic participation. Similarly, the Wisconsin

Department of Public Instruction recently released the *State Superintendent's High School Task Force* report with four major recommendations and 20 strategies for redesigning the high school experience, enhancing student learning and engagement, and strengthening the alignment of high school with postsecondary education and workforce needs. The following chart describes how the key features of the **Project Lead the Way** and **Gateway to Technology** programs are aligned with and supportive of these recommendations for change in middle and high schools.

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	<b>National High School Alliance (2005) Recommended High School Redesign Strategies</b>	<b>Essential Features: PLTW and GTT Curriculum</b>	<b>Wisconsin High School Task Force Recommendations (2006)</b>
<b>(A): Personalized Learning Environments</b>	<p><i>(A2): Develop academically rigorous curricula that meet or exceed standards, are relevant to real-world contexts, and build on student and community assets.</i></p> <p><i>(A6): Work across the school system to address student needs at critical transitions, in particular the transition from the middle grades to high school and from high school to post-secondary education.</i></p>	<p>PLTW curriculum is aligned with the national and State of Wisconsin (DPI) model academic standards for mathematics, science, and technology education.</p> <p>The GTT middle school curriculum consists of five independent units to be taught in conjunction with a rigorous academic curriculum. The units are designed to challenge and engage the exploratory minds of middle school students, and provide a foundation for choosing academic and elective high school courses. Performance objectives and student assessments are included with each unit.</p> <p>Selected colleges and universities are accepting PLTW courses for university credit. For example, at the Milwaukee School of Engineering students from a PLTW certified school may apply for three college credits for any of the PLTW courses, except the capstone course. In addition to graduating from a PLTW certified school, the student must have an average of 85% or better for the course, have a completed course portfolio, and have a grade of 70% or better on the PLTW college exam and pay the required tuition.</p>	<p><i>Ensure that all students have access to a variety of options for learning, including the arts, co-curricular activities, work-based learning, service learning, and accelerated offerings, to fully engage all types of learners (B1)</i></p>



	<b>National High School Alliance (2005) <i>Recommended Strategies for High School Redesign</i></b>	<b>PLTW and GTT Curriculum – Essential Features</b>	<b>Wisconsin High School Task Force Recommendations (2006)</b>
<b>(C): Empowered Educators</b>	<p><i>(C2): Build educators' capacity to use data and research to inform instructional practice and to guide professional learning priorities and needs</i></p> <p><i>(C5): Utilize communities of practice as a mechanism for transforming the way educators are prepared, inducted, and retained</i></p>	<p>Wisconsin Guidebook provides tools and resources for analyzing data to strengthen professional development, generate curriculum change and improve student recruitment and learning.</p> <p>Intensive 2-week summer institutes held at national affiliated universities with strong engineering programs</p> <p>Virtual academy for professional development is available nationally and several state PLTW projects have teacher websites.</p>	<p><i>Provide professional development for educators in the use of multiple assessments, including assessment tools that incorporate hands-on demonstration of knowledge and skills.(B4)</i></p>
<b>(D): Accountable Leaders</b>	<p><i>(D1): Engage state, district, school, community, youth, and municipal leaders in articulating a shared vision for all high-school-age youth and in defining accountability at each level.</i></p> <p><i>(D3): Use data to monitor and communicate progress to all stakeholders</i></p> <p><i>(D4): Assess the impact of any reform or policy practice on all populations of students, particularly those traditionally marginalized such as English-language learners and students with disabilities</i></p>	<p>Each high school maintains a local Partnership Team, which links the school technology program with the community and creates a multidisciplinary support network for teachers and students</p> <p>The PLTW Guidebook provides annual data profiles for each high school documenting changes in: school and community context, course enrollments and program implementation, school and student outcomes, and post-school outcomes for graduates.</p> <p>PLTW strategic priorities focus on improving the participation and success of female and minority students in engineering and engineering technology programs.</p> <p>Guidebook data profiles provide a tool for examining the status and progress of special student populations.</p>	<p><i>Use collaborative partnerships among schools, businesses, and community-based organizations to ease the strain of funding limitations. Involve business members in classroom activities and students in workplace sites. (D1).</i></p>

	<b>National High School Alliance (2005) <i>Recommended Strategies for High School Redesign</i></b>	<b>PLTW and GTT Curriculum – Essential Features</b>	<b>Wisconsin High School Task Force Recommendations (2006)</b>
<b>(E): Engage Community and Youth</b>	<p><i>(E2): Commit community resources and establish partnerships with the school and district to support this vision</i></p> <p><i>(E4): Hold education leaders accountable for communicating data on youth outcomes</i></p>	<p>PLTW certified high schools maintain a Local Partnership team. This team creates community support for the technology program, links the school and community, provides additional resources to students and teachers, and opens pathways for students to career opportunities and further education, and provides professional development resources for educators.</p> <p>PLTW data profiles include annual reports on school and post-school outcomes for all students and recent graduates.</p>	<p><i>Encourage collaboration within the entire education community, including schools, colleges, universities, and technical colleges, to design and deliver programs to meet individual student learning needs and expand course offerings. (A1)</i></p> <p><i>Promote credit-based work experiences, school-business partnerships, and school-to-work opportunities to link 9-12 with post-high school education and employer workforce needs. (D2)</i></p>
<b>(F): Integrated System of High Standards, Curriculum, Instruction, Assessments, and Supports</b>	<p><i>(F1): Establish clear and rigorous standards aligned with curricula and entrance requirements for post-secondary education and careers</i></p> <p><i>(F2): Develop and utilize multiple assessments, including performance-based measures (e.g., portfolios, public exhibitions, capstone projects), that align with standards</i></p> <p><i>(F3): Plan intended outcomes and assessment strategies before initiating a learning activity or project</i></p>	<p>PLTW curriculum is aligned with the national and State of Wisconsin (DPI) standards in mathematics, science, and technology education.</p> <p>The Wisconsin Technical Colleges provide advanced standing and college credit for selected PLTW courses completed in high school.</p> <p>The end-of-course assessments include traditional and constructed response items. For some universities and colleges, the assessments indicate</p> <p>Each of the units in PLTW courses include performance objectives and learner outcomes. Many of the instructional units utilize problem based or project based teaching strategies.</p>	<p><i>Enhance PK-16 partnerships that foster seamless education to prepare students for success after high school, life-long learning expectations and citizenship engagement. (B5)</i></p>

Sources:

National High School Alliance. (2005, April). *A call to action: Transforming high school for all youth*. Washington, DC: Author. Download at: <http://www.hsalliance.org/>

Wisconsin Department of Public Instruction. (2006). *State Superintendent's High school task force report*. Madison: Author. Download at: <http://dpi.state.wi.us/sprntdnt/hstask.html>