Is Technology a Core Service?

by Andrew Tompkins, CTO

There has been some recent debate on the role of Data Acquisition Sites and technology as an educational "core service."   Consider the following scenario in response to this debate:

Students arrive for school. From busses to lockers and into my classroom, this scheduling of students was determined using software provided and supported by my DA Site. I take attendance and record it electronically. As I press the enter key, my classroom attendance data is sent to the attendance office and the parental access page on our district portal. I reflect that we have come a long way from recording attendance on paper. This saves so much time, thanks to software and services provided by my DA Site.

I begin my lesson, parts of which I have developed from resources available on web sites supported by my DA Site or available through Internet access made available by my DA Site. I have determined a focus for this lesson after studying the strengths and weaknesses of the students in this class using decision support software provided and supported by my DA Site. During this class we link to a remote location using video distance learning services provided and supported by my DA Site. I assign homework for my students, suggesting that they take advantage of INFOhio electronic resources and INFOhio library resources, both provided and supported by my DA Site. They may also access the Internet through the school network, and I know they will be safe as they surf because of filtering and other controls provided and supported by my DA Site.

My students work on computers that were purchased taking advantage of group purchase incentives coordinated by my DA Site. I help a few students with problems on Word and Excel, and I feel confident in answering these questions because I have participated in professional development on these tools that was coordinated by my DA Site. As the class ends, the students save their work to our network file system that is supported by my DA Site.

Between classes, I receive an email from my principal. The message is regarding a purchase request I submitted using fiscal services software provided by my DA Site. After responding, I quickly review my payroll stub, noting that my pay has already been deposited into my bank account. I review past homework and record grades for my class. In a few weeks, the students will be receiving an interim progress report. All of these activities – electronic mail, fiscal services, payroll, and grade reporting – are services provided by my Data Acquisition Site.

Technology provides a foundation for today's classroom and the education of tomorrow's citizen. From administrative support functions to the delivery of educational content, Ohio's Data Acquisition Sites provide key core services to Ohio schools and Ohio students.

WE WANT TO HEAR FROM YOU!

Do you think services such as these provided by DA Sites to schools should be considered an "educational core service"? Please email hawkins@mcoecn.org with your comments.

The SPARCC Vision of Data Driven Decision Support

In this issue of Connections we are highlighting a project from the Stark Portage Area Computer Consortium (SPARCC) as an example of the kinds of services provided by the Data Acquisition Sites.

THE VALUE OF DATA

At SPARCC we believe that there is no longer a question of whether schools should use data to make decisions. We know that we have to deliver the right data to the right person at the right time in order to make the best educational decisions. The new questions ask what information is needed to improve teaching and what new relationships can improve learning. What follows are our thoughts and ideas gathered from conversations with our districts, professionals in the Ohio Education Computer Network and noted authorities in education. They represent a beginning of our journey on the path to improving education.

For years, schools have been 'data rich' yet 'information poor'. District personnel have dutifully recorded traditional student administrative data including grades, attendance, demographics, and discipline. Beyond the individual data are policies, procedures, test results, lesson plans and electronic resources. This data has always had the potential to be used to make substantive improvement, but has been virtually inaccessible to the stakeholders who have needed the information.

A KNOWLEDGE BASED SYSTEM FOR EDUCATION

Given this set of needs, SPARCC has embarked on a mission to develop a dynamic knowledge management system. In this system, the data will be collected, stored, managed, and analyzed using state-of-the-art database technology. In addition, the system will manage content resources aligned to state standards and provide access to shared lesson content, assessments, and course materials. The structure will have the capacity to grow through the integration of additional software components that are either locally developed or purchased through third party vendors. Although the system is comprehensive and complex, stakeholders will be able to easily access the information anywhere or anytime using industry standard software tools.

The Data for Student Learning (DaSL) software package serves as the foundation of our knowledge management system. It is a comprehensive web-enabled database providing access to multi-year data from various sources including student demographics, attendance, EMIS, proficiency and off-year tests. Our migration to this package has already begun and will continue for several years. We are working to incorporate additional functionality into this system including curriculum support tools, an electronic grade book, special education software, and access to electronic resources.

DATA INTERFACE SCHEMATIC
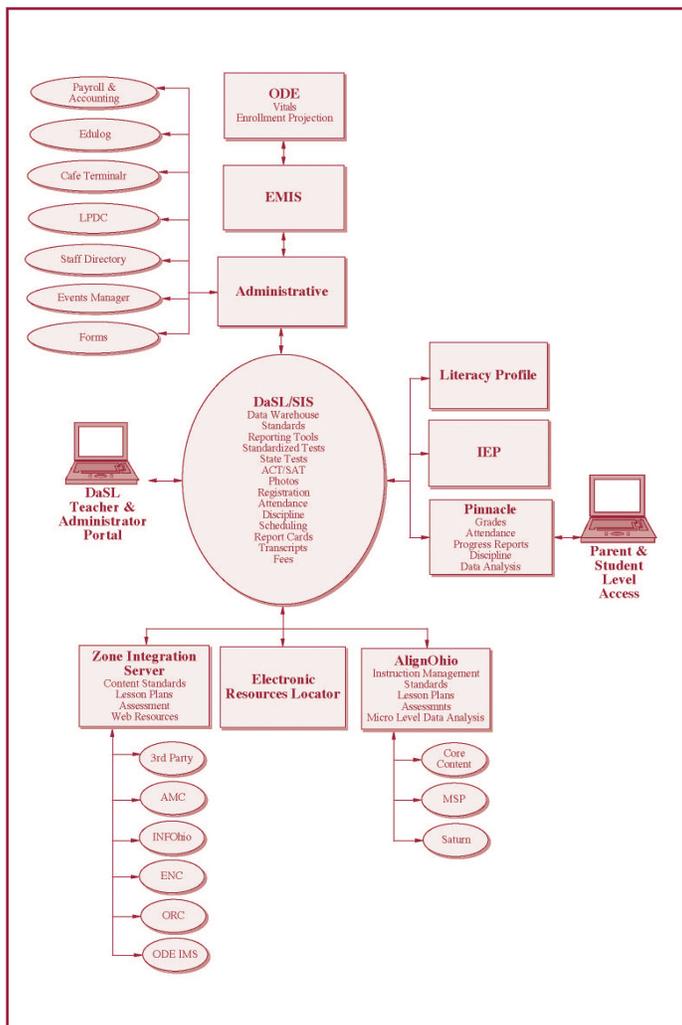
ADJUNCT SOFTWARE MODULES

The Excelsior Pinnacle software was chosen for use as an electronic grade book because of its functionality and its capability of sharing data with other applications (such as DaSL). A wide range of stakeholders including teachers, principals, parents, and students now have access to grades, attendance, and related data on a real-time basis. Schools can track standards attainment and communicate this to those who need this information. Of particular note, this company is partnering with ASCD to incorporate Bob Marzano's Power Theory into the grading process.

AlignOhio is our access point for lesson plans, content standards and student assessments. This software module promotes the online design and distribution of curriculum. It allows the development of instructional materials aligned to standards and permits dissemination of exemplary lessons and resources within and among districts. Teachers have the ability to customize instruction and tailor individual learning plans for students.

The resources within AlignOhio are aligned to Ohio Academic Content Standards. A number of organizations lead by the Ohio Partners in Promoting Student Academic Achievement (including SPARCC, the Ohio SchoolNet office, and INFOHIO) have collaborated for the purpose of creating a common coding system. This system enables resources from multiple sources to be shared in a standards based environment.

The MCOECN, DaSL Development Team, SPARCC and Software Answers are collaborating in the creation of a new special education software module which will function seamlessly within DaSL. This package enables the electronic development of IEP's and MFE's. Student demographic data will automatically populate from the DaSL database and data will be extracted to meet EMIS reporting requirements. The initial version became available in September 2003 and the full version is scheduled for completion in January 2004.

CONCLUSIONS

Our vision extends well beyond the traditional boundaries of education. While separate pieces of software have been available for some time, it is only when the modules become incorporated into a system that it becomes truly useful. We anticipate that development will continue to reflect the best ideas of delivering education services.