

To: Vody Herrmann, Colorado Department of Education  
From: Justin Silverstein, Tracie Rainey and Mark Fermanich  
Subject: Statewide Data System Cost Addendum  
Date: February 1<sup>st</sup>, 2011

This letter acts as an addendum to the “Colorado Average Daily Membership” study done by Augenblick Palaich and Associates (APA), Colorado School Finance Project, (CSFP) and the University of Colorado Denver (UCD). As part of the study a recommendation was made that the state should adopt a real-time student data system that would “pull” data from school districts rather than having data pushed up to the Colorado Department of Education (CDE). One of the requirements of the RFP for the ADM study was a cost estimate for any such recommendation. Due to the very tight timeline of the original study the consultants were unable to provide this estimate and have the report completed on time. Since the completion of the report, we have continued to examine this issue and this addendum letter will provide information on this cost estimate.

Since the study completion, the consultants have done two things in order to better understand the possible costs of implementing the type of data system mentioned above. We spoke with to Dan Domagala, the Chief Information Officer at the CDE to understand what the department is currently doing as part of its effort to update the student data system. Representatives of Infinite Campus, a student information system provider, were also kind enough to take the time to be interviewed to understand the potential costs of a statewide student information system.

In the spring of 2010 the CDE received a \$17.4 million federal Statewide Longitudinal Data Systems (SLDS) grant. The grant is being targeted to three main programs areas:

1. Streamlining the current data collections
2. Strengthen linkages across education levels – PreK, K-12 and post-secondary
3. Improve current data presentation and analysis portals (such as Schoolview)

The first program area, streamlining data collections, entails moving the department’s student data systems closer to the ultimate goal of real-time pulling of data by the CDE from district level student information systems. Roughly half, or about \$8 million of the grant will be targeted to this work.

It is the CDE’s expectation that these funds may not be sufficient to move their systems from the current “batch” processes under which for each student data collection districts must submit, or “push” their entire student data files to the CDE to a true real time “pull” system. Under the department’s current system, districts are submitting much of the same data about a student to the department multiple times every year. This leads to additional resource use in terms of time and money at CDE and for school districts. It also demands greater computer processing resources at the CDE, leading to system slowdowns and lost connectivity as districts are trying to transfer data.

The CDE believes the resources from this grant will allow them to create a system that is close to real time. Districts will only be required to submit full data on a student to the CDE. After that, only updates on students will need to be sent to the CDE. The CDE also hopes that these grant funds will get their system to the point where they can pull data from districts, maybe not in continuous real time, but on a regular basis, nightly for example.

The SLDS grant did not originally include funding for supporting district systems upgrades. District funds were anticipated to come from the Race to the Top grant. However, the department will not be able to fully implement the systems upgrades planned under the SLDS grant unless the districts without modern data systems are also able to upgrade. The department is currently seeking permission from the U.S. Department of Education to reallocate some of the funds through the SLDS grant for providing a state sponsored student data system to these school districts.

The department is not sure of what the ultimate total cost may be to achieve a true, real time “pull” system, but they think the current grant will get them close to this goal. The timeline is to start piloting a new system in a few school districts next school year with the intent to expand further the following year.

In our interviews with other states we found that South Dakota currently has a real-time pull data system. The system was designed by the state in the late 1990s in collaboration with Infinite Campus® (IC), a student data system provider. IC is currently used by nearly half of the districts in Colorado and those districts enroll about 75% of the students in the state. We turned to representatives of IC to help us better understand the potential costs of implementing a statewide system. (We are not recommending any one provider but with IC being used in South Dakota and its prevalence in Colorado districts we felt they were an appropriate vendor to talk to.)

IC’s state edition allows states to aggregate data from districts that use the IC district edition or that use legacy systems. The state edition includes unique student IDs (which the state currently has), student locator, enrollment overlap, statewide operational data store, NCLB report card, and district-to-district data transfer functionality. IC recently examined three models for implementing the IC state edition in Colorado. The three approaches to implementation range from the state simply purchasing the state edition and letting districts keep their own system to the state purchasing the state edition and purchasing a corresponding district level edition for every district in the state. In between is a state subsidized system for districts using the preferred vendor.

For each of the three options there are both implementation and ongoing costs. The implementation costs for the state system are the same regardless of which implementation approach is chosen. The cost of state implementation is around \$400,000. The ongoing costs for the state edition range from a low of around \$700,000 per year for the state only implementation to around \$2 million if every district is offered the corresponding district edition. The cost difference is reflected in a lowering of the cost per student to school districts. The implementation costs for the district edition are around \$850,000 over three years. The ongoing costs could be around \$5.5 million if the state was paying for all districts to use

the district edition. It is important to remember that the \$5.5 million would offset dollars currently being spent by school districts to purchase similar services.

Some of the expected benefits of a uniform statewide system include:

- The ability to implement any new statewide definitions uniformly.
- The statewide systems ability to quickly identify enrollment overlaps.
- The potential to lower state and district burden by having a true real time data system with data being pulled from districts.

We would like to thank Dan Domagala from CDE and Steve Bohlender and Mark Richardson from Computer Information Concepts, the IC representatives, for the time they took in helping us over the past few weeks.