

# **Summary of Proceedings from the Virtual High School Summer Institute 2002**

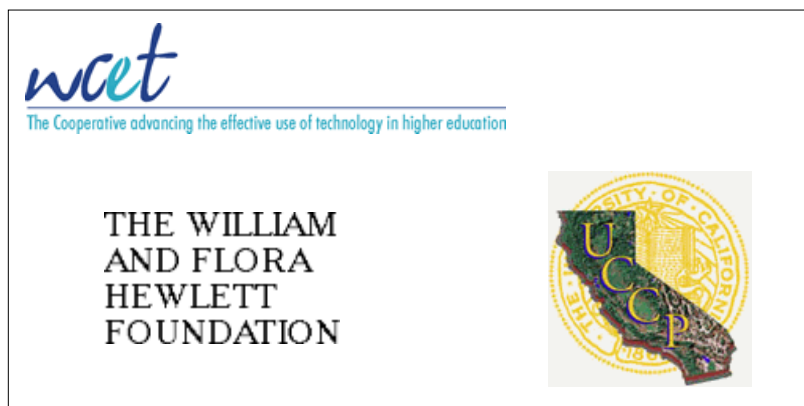
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*“To create an organization to facilitate collaboration, advocacy,  
and research to enhance quality K-12 e-learning.”*

## Table of Contents

Introduction .....	3
I.    Funding and Cost Savings .....	3
II.   Marketing and Public Relations .....	4
III.  Infrastructure Development and Support Systems, Including Uses of Technology and Vendor Issues .....	4
IV.   Course Development .....	4
V.    Faculty Training and Professional Development .....	5
VI.   Student Support and Performance .....	5
VII.  Research and Evaluation .....	5
VIII. Forming a National Organization .....	6
Appendices:	
Appendix A: Institute Objectives .....	8
Appendix B: Funding and Cost Savings .....	9
Appendix C: Marketing and Public Relations .....	13
Appendix D: Infrastructure Development and Support Systems, Including Uses of Technology and Vendor Issues .....	14
Appendix E: Course Development and Leasing .....	16
Appendix F: Faculty Training and Professional Development .....	18
Appendix G: Student Support and Performance .....	20
Appendix H: Research and Evaluation .....	21
Appendix I: Forming a National Organization .....	24

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## **Introduction**

The Virtual High School Summer Institute 2002 hosted more than 50 virtual high school leaders from across the country from Hawaii and Alaska to New Jersey and Massachusetts.

The Institute's objective was to establish a continuing dialogue and sharing of information related to numerous issues surrounding the creation and further development of virtual high schools. Additionally, one of the program's primary goals was to set the stage for the formation of a national virtual high school organization. Within the framework of these objectives, a spirited and unprecedented sharing of knowledge on multiple levels took place over 2.5 days in Santa Cruz, California.

Also in the spirit of sharing, the institute attendees received a copy of a new study titled "The California Virtual School Report: A National Survey of Virtual Education Practice and Policy with Recommendations for the State of California." Authored by Knowledge Base, LLC, and the Clovis Unified School District, the study is currently available in PDF format at [www.uccp.org](http://www.uccp.org).

This summary encapsulates the extensive amount of information that came out of the Institute into eight broad topics that were addressed in great detail:

- I. Funding and Cost Savings**
- II. Marketing and Public Relations**
- III. Infrastructure Development and Support Systems, Including Appropriate Uses of Technology**
- IV. Course Development and Leasing**
- V. Faculty Training and Professional Development**
- VI. Student Support and Performance**
- VII. Research and Evaluation**
- VIII. Forming a National Organization**

In addition to condensing these eight topics, an extensive Appendix section with a digest of notes taken over the course of the entire Institute's proceedings is provided.

*See Appendix A: Introduction*

## **I. Funding and Cost Savings**

### **Funding**

"If you don't have dollars, you can't implement. And nobody has figured out funding," said Southern Regional Education Board (SREB) Director of Technology William Thomas. This was the general sentiment of all Institute attendees.

It was unanimously agreed upon that state legislators must be educated about the benefits of virtual education so that appropriations can be allocated on a more consistent and timely basis. States must embed funds for virtual education into budgets as continuous legislative line items that mirror the funding mechanisms of traditional education.

To help facilitate change in funding policies, more documentation and first-hand testimonials from students and parents about virtual education successes needs to be disseminated to state and federal policy makers. SREB's "Funding Web-Based Courses for K-12 Students to Meet Educational Goals" was cited as an example of documentation related to funding issues.

Julie Young, executive director of the Florida Virtual School (FLVS) program, explained that virtual educators need to clearly define success criteria. Otherwise misinformed policy makers could do it on their own.

One-size funding mechanisms does not fit all; there are a variety of areas for funding. At FLVS, tuition is free to all students (except for out-of-state students) because annual state appropriations in the \$7 million range recover FLVS expenses. At the Michigan Virtual High School (MVHS), a one-year subscription model for tuition makes districts bear part of the cost of delivery. At Kentucky Virtual High School (KVHS), schools pay a portion of tuition costs, but KVHS is struggling with issues of non-sustainability. In Colorado, possibly drawing from Elementary and Secondary Education Act grant funds is being investigated.

Other questions related to cost included when should parents and students bear the cost, and when is virtual education considered part of a core educational experience or a supplemental educational experience?

In general, virtual education is being funded through foundations, partnerships with corporations, federal and state programs and the parents and students who pay tuition. It was suggested that additional funding could come from new tax revenues, such as a tax on e-commerce or telecommunications.

### **Cost Savings**

There is a big need for an open-source or open-community course management system that could help reduce costs and bring more flexibility to virtual education providers.

The cost of technology, in general, can possibly be reduced if virtual education providers can ban together and form a consortium buying arrangement.

Other areas that could bring about cost savings include moving teacher training to higher education, where some in attendance strongly felt it belonged, and reducing costs by sharing in the process of course development.

*See Appendix B: Funding and Cost Savings*

## II. Marketing and Public Relations

It was repeatedly emphasized that there is a great need to sell and build a strong case with legislators that online learning is a viable, important and powerful way of helping students on numerous levels.

Collecting reliable data and regularly communicating the successes of your courses and programs to stakeholders, such as legislators, community and school decision-makers, students and parents, is of the utmost importance.

It was also strongly emphasized that guidance counselors at the school and district levels are a key target audience that virtual education providers must educate and partner with. As one attendee noted, “counselors will keep students out, and they will let them in. They have a tremendous amount of power.”

Additionally, the **No Child Left Behind Act** brings forth an opportunity for virtual educators to spread the message to the federal government that online teachers are typically high caliber teachers offering high quality instruction to the benefit of all children.

*See Appendix C: Marketing and Public Relations*

## III. Infrastructure Development and Support Systems, Including Appropriate Uses of Technology and Vendor Issues

Open sources of software and the establishment of technology and software standards are two issues that educators see as being vitally important as virtual high schools grow across the country and collaborate with each other in the development of courses, authoring tools and learning and course management systems.

The concept of open sources and standards ties into the notion of sharing information about appropriate technologies. Institute attendees want to see a national clearing-house of tools, resources and courses, as well as a course and learning module repository, developed in the very near future. They also want to see learning communities developed around technology issues and the process of building a sustainable and scaleable virtual education infrastructure.

One example of sharing information about student information systems, for instance, was provided by VHS, Inc.’s CEO Liz Pape, who explained that a virtual high school website needs to mirror a school’s regular course handbook and should have both a public view for students and parents and a private view for teachers and administrators.

The practice of providing a variety of infrastructure support, such as technical support, parent support, lab facilitator support, site coordinators and mentors, the right

mix of administrative and management tools, and more, is a challenge that all virtual education providers deal with on a daily basis.

Also, equity and access are two issues that come into play as virtual education providers ramp up their offerings. It was noted that schools need to be fully aware of state and federally mandated equity and access standards and requirements as they build their programs and systems; otherwise, virtual education providers will be faced with the daunting challenge of converting everything they have accomplished after-the-fact.

*See Appendix D: Infrastructure Development and Support Systems, Including Appropriate Uses of Technology*

## IV. Course Development and Leasing

Sharing content, the manner in which courses are built and developed, and leasing virtual courses were the three primary areas of concern that surfaced when Institute attendees discussed the general topic of online courses.

The question of whether institutions really want to share content was raised by attendees. Answers to this question addressed such topics as how do you meet a wide variety of state standards? How do you keep costs down? How do you improve student outcomes? How can we create a unilateral business perspective to drive and distribute courses among partnering institutions?

Several course development models were presented, including the MVHS team approach where a subject matter expert, standards expert, instructional designer and teacher advocate work together. Also, the University of Nebraska, Lincoln’s Independent High School curriculum, which has historically been a paper and pencil model, is converting their courses to the online environment in a limited fashion, with text-based course material still being utilized as a primary mode of delivery. At the University of California College Preparatory Initiative, an AP physics course with multimedia elements was presented as a dynamic method for facilitating enhanced student engagement and interactivity.

With regard to leasing courses, many virtual education providers don’t have the infrastructure to effectively build all of their courses, so it becomes a necessity for them to lease courses from outside providers. However, many attendees noted that the preferable model is for a provider to build their own courses as opposed to leasing.

*See Appendix E: Course Development and Leasing Courses*

## **V. Faculty Training and Professional Development**

Faculty training was a lively topic of discussion at the Institute. In general, faculty need to be trained in how to be a “guide on the side” as opposed to being a “sage on the stage.”

Additionally, teachers need to have a clear understanding of how to use technology. In fact, it was noted that today’s students have a much better grasp and understanding of uses of technology than most teachers do today. To help alleviate this technology gap, the state of Georgia recently phased in a state initiative whereby all teachers to be certified or re-certified must demonstrate specific technology competencies that includes instructional uses of software.

Moreover, attendees stressed that teachers need to thoroughly understand what it is like to be an active online learner and should be trained in an online mode to experience online learning first hand.

Faculty training programs vary in length and content, with Gwinnett County Public Schools in Georgia utilizing a 10-week online class taught by master online teachers, and VHS, Inc., using a 22-week class called the “Teacher’s Learning Conference” that prepares teachers to be both course designers and instructors.

Building community among colleagues is an important facet of faculty training and professional development, with most virtual education providers offering such communication tools as listservs and formal and informal discussion forums for teachers. At MVHS, for instance, there is an “Instructor’s Corner” hosted by their CMS where teachers go to ask questions and share information.

Teaching teachers how to build community inside the virtual classroom is also extremely important. Such topics as learning how to foster team projects and facilitating meaningful online discussions between students were brought up as key elements for building student-to-student and faculty-to-student interactions.

*See Appendix F: Faculty Training and Professional Development*

## **VI. Student Support and Performance**

Students must be oriented to online learning in an online course that shows them how to navigate through and use software and also reinforces time management and learning management skills that are needed for them to succeed. Self assessments that measure a student’s online capabilities have to be inside the online orientation, and parents need to be cognizant of such assessments.

Nancy Davis, executive director of MVHS, led a discussion on improving student performance. She described the

current environment as being one in which virtual education removes the time constraint and places a stronger emphasis on achievement. “We are no longer restricted by the bricks and mortar structure,” she said. “We can look at ways of opening up learning and possibilities in ways that we were never able to do before.”

As virtual education grows, the needs of students are being met on new levels. Initially, the needs of high-end students were seen as the primary place for virtual education, evidenced by the quick development of and enrollments in online Advanced Placement courses. Now, however, we are beginning to see this change as new categories of students, including kids at-risk, homebound students, and students who need help with core courses such as Algebra I start to enroll in online courses. Additionally, in districts such as Los Angeles Unified, where a burgeoning student population stretches the district infrastructure beyond its capacity, online teaching and learning can help alleviate the problem of not enough seats for students. With testing becoming the key to assessing learning outcomes, in tandem with No Child Left Behind, virtual education can also play a greater role in developing online assessment tools that can help students achieve better results on state and federal tests.

Attendees were asked to come up with the top five variables of student success and how online learning will impact these variables. It was noted that online teachers are constantly “under the microscope” because everything they do is recorded electronically. This, in turn, puts the onus on teachers to do a good job as these new sets of online teaching and learning tools assure quality at all times. Additionally, such elements as more immediate testing feedback and the opportunity to provide more individualized learning experiences were seen as controllable variables that can only enhance learning and benefit students.

In short, online learning has a strong tendency to make teachers engage in thinking about their practice on more consistent and different levels. With teachers thinking about their practice more often than ever, kids can only get better educated.

*See Appendix G: Student Support and Performance*

## **VII. Research and Evaluation**

Two primary discussion topics were put forth by Fran Stancavage, managing research scientist at the American Institute for Research: Can you share successful survey questions and how do you measure success?

In general, it was stated that any research and evaluation must be performed by unbiased researchers or your data

will not be defensible or perceived as reliable. Additionally, research should be continually informative and it should continue to build credibility.

It was stressed that a definition for success needs to be established, and it was reiterated that this is a very difficult, if not impossible, order to fulfill.

Regarding successful survey questions, Institute attendees offered a wide variety of solutions that looked at both teacher and student areas of concern, including satisfaction and course quality levels, and comparisons of online to face-to-face instruction.

Regarding measures of success, a wide variety of data points could be utilized, including test success rates and scores, student and faculty turnover rates, data about fiscal success, program growth statistics, measuring increased life skills, and showing increased levels of diversity inside a program.

*See Appendix H: Research and Evaluation*

### **VIII. Forming a National Organization**

The Hewlett Foundation is seeking ways to promote technology in education and is interested in helping to develop a national organization.

“We hope to see if there is clarity in focus and value for the purpose of a national organization that can develop efficiencies and share knowledge on multiple levels,” said Catherine Casserly, who represented the Foundation at the Institute.

WCET, headed by Sally Johnstone, volunteered to serve as a mentoring organization to start a national K-12 organization. Johnstone explained how the experiences of the WCET start-up, which began in 1987, dealt with different issues, “but the framework of what you can begin to do when you start working together is not so different.”

Johnstone emphasized that developing an effective advisory board is of utmost importance, and it is imperative that organization volunteers take steps beyond what they are currently doing at their day jobs.

There is a possibility that seed money provided to WCET could help spin off an incubation period for the start of a national K-12 organization that would eventually form its own non-profit entity.

When Institute attendees were asked what they want out of such an organization and what they are willing to put into it, a relatively long laundry list was created. Many of the elements of this list addressed issues such as ways to lower cost of technology and infrastructure building, establishing effective learning communities, developing ways to share courses and learning modules, establishing

strong advocacy and public relations programs, and basically sharing knowledge through various mechanisms.

Additionally, attendees showed a strong willingness to share information for the development of a course repository they could all draw from, as well as a willingness to share perspectives and best practices about uses of technology and vendor relationships. The possibility of developing revenue streams through a conference or other services was also brought to the discussion table.

All of the attendees seemed willing to put resources behind the development of a national organization. An organizational committee of 16 volunteers was formed and met separately during the course of the Institute program.

Five priorities, in order of performance, concerning what attendees would want out of national organization are listed as follows:

- 1. Facilitate the sharing of courses and course content.**
- 2. Facilitate and disseminate research and identify research needs.**
- 3. Advocate and provide policy advice for legislative efforts.**
- 4. Provide for collection, sharing and dissemination of information and materials.**
- 5. Develop national standards for K-12 online program evaluation.**

Finally, the organizational committee created three definitions for “boards”: A board of directors, an executive committee that is part of the board of directors and selected from within the board, and a senior advisory board that would be comprised of advocates and policy leaders.

A target date of January 2003 was established to accomplish a board identification and recruitment process. Additionally, possible dates for follow-up meetings/gatherings were discussed with two definite meetings to be held: one on October 22 in Denver on the evening before the CiTE Virtual High School Conference, and another on November 15 at the end of the NSBA Teaching and Learning Conference in Dallas.

Karen Middleton, WCET senior project coordinator, has taken the lead in writing the planning grant proposal to be submitted to the Hewlett Foundation. Karen is also establishing a listserv dedicated to facilitating communication between all interested parties concerned about the formation of this organization.

*See Appendix I: Forming a National Organization*

**Summary of Proceedings from the  
Virtual High School Summer Institute 2002**

**Appendices A thru I**

**A compendium of notes taken  
during Institute proceedings held  
August 15-17, 2002**

## **Appendix A: Institute Objectives**

### **Goals**

1. Establish a time and place for continuing dialogue and constructive sharing.
2. Seek opportunities as related to the possibility of forming a national organization.

### **Some Trends and Issues culled from “The California Virtual School Report: A National Survey of Virtual Education Practice and Policy with Recommendations for the State of California”**

- What’s happening with virtual schools is largely unknown. The authors of the report were amazed at the depth of activity going on across the country. Technology is no longer the issue, and there are plenty of proofs of concepts coming out of higher education.
- The development of a statewide California virtual high school might be a case study that could apply to any state.

### **Operational Issues**

- Can’t have tuition alone; need state money as well.
- Legislators want to see demand; who is willing to pay tuition?
- Many state programs were funded during budget surpluses. Today it’s budget cuts.
- Course development costs vary greatly. It’s not how much does it cost, but how much do you have?
- Other models for course development are adopt, adapt and create.
- California has not adopted a budget yet and the State is operating at a large deficit right now.

Educational reform is sneaking out. There needs to be uniform delivery of quality courses, and the issue of course and learning module repositories comes up frequently.

Last but not least, online learning needs to be coordinated to state testing.

### **About the Hewlett Foundation**

Mike Smith is program director, formerly dean of school of Education at Stanford. Smith also worked for Clinton Administration. Two years ago the Foundation stated to explore higher education and K-12.

The Foundation has sponsored the MIT Open Courseware Initiative with the Carnegie Mellon Foundation. Currently funding a project at Carnegie Mellon related to courses being built in module form that will be made available to institutions that don’t have such resources. The idea is to make it sustainable and accessible. Also funding a web-based chemistry course at UC Berkeley that is similar in content to an AP course.

All Hewlett Foundation projects are related to providing open materials. They are also looking at mechanisms for the development of repositories and library journals.

The Foundation is working on an international level, primarily in higher education but it wants to push down into K-12. For example, they are working with the National Academy of Science to create virtual and traditional high school math and science courses that would be open. Also looking at the research on K-12 and higher education use of technology and wants to develop a collective place where people can draw on all the knowledge and come up with economies of scale.

The Foundation is also seeking ways to promote technology in education and is interested in helping to develop a national organization (see Appendix I: Forming a National Organization).

“We hope to see if there is clarity in focus and value for the purpose of a national organization that can develop efficiencies and share knowledge on multiple levels,” said Catherine Casserly, who represented the Foundation at the Institute. Plans are to possibly move ahead with a planning grant pending the aforementioned.

### **About WCET**

WCET is willing to serve as a mentoring organization to K-12. It is hoped that as an organization is formed, WCET would be one of many to be affiliated with a K-12 national organization (see Appendix I: Forming a National Organization). K-12 and higher education activities are analogous in many ways.

## **Appendix B: Funding and Cost Savings**

### **General Comments**

In parts of Alaska, rural villages are working with industrial leaders to help fund online learning. For example, industry will help build the infrastructure, but they also need to make a profit.

In Colorado, some state rules have been waved. For instance, a 1998 bill gave virtual high schools in Colorado the ability to collect FTE-PPOR. However, it omitted prior home schoolers. There are currently 16 virtual high schools in the state. Initially the state gave small schools \$10,000 per student, and larger schools collected \$5,000. It's now \$5,419 for all students because smaller schools took advantage of \$10,000 structure. Also, Colorado is hopeful that the state will do more through a newly formed online learning committee.

The state of NJ may build a structure where courses can be brought in that meet state standards, but funding is a big problem. The virtual high school in NJ does not have an inside track on state funding issues.

Maryland has a state visionary panel. Funds are being designated that allow school systems to spend money on technology. So schools in Maryland are seeing multiple funding streams.

Parents can e-mail legislators about success stories during early funding stages.

It really is a question of marketing. If you go to talk about a sustainable funding plan, you need to start thinking about the marketing, and you might as well think about planning early, planning often and consistently revising your plan.

### **Cost Savings**

Do what you do best and outsource the rest; contract out wherever possible instead of hiring full-timers. For example, you can farm out 24 x 7 data center support, or farm out to a file server farm. Instead of having an in-house, full-time training person, contract that out, as it rises and falls according to the number of teachers. Always be aware of outsourcing and always bid it out wherever possible.

A big part of cost is what vendors put on your shoulders. We need to think about alternative models; i.e. barter arrangements or a consortium buyer.

Use business practices wherever possible; i.e. direct and indirect costs.

Teacher training for online education gets moved to education schools where it should be. This would remove one part of the cost because you would not have to do teacher training.

Technology platform costs should be open source. Those who are looking at statewide programs, if you had an open platform, those costs could be reduced. However, expect those costs to rise if you are dealing with a commercial vendor.

Reduce cost of course development by possibly sharing course content. The emphasis is on sharing rather than giving things away. The question is are you sure you want to give away your course content to your competitor?

### **Michigan Subscription Model**

In Michigan, a one-year subscription model makes schools bear cost of delivery and therefore establishes a base of clients who will pay. They established a basic business case to see if they had a scaleable proposition: If we made them pay, would they still come? For two years they were providing 87 schools with free courses. Then they moved from a free to a fee-based model and took their message out to 1,100 high schools. They moved from 87 schools non-paying to 162 schools paying, which currently covers about 50 percent of the cost of delivery. They had 80 to 85 percent conversion of people using the free model move to the fee-based model. This is not the sole generator of revenue, however, given the public policy shifts that Michigan experiences.

The constituent districts participating with money makes them more actively engaged in how to make things work. They have a stake in it. Thus, they want to participate in training teachers and placing the right number of students. Districts are also very concerned about the initial, first experience of the first students in the courses. They want a successful outcome with them.

### **Kentucky Virtual Model**

KVHS opened in Jan. 2000 through a governor's initiative and has seen a very quick ramp up. KVHS is a fee-based program of the Kentucky Department of Education established help local schools and not to compete with them. KVHS is not a credit granting institution. The schools within the state deny or admit students to their courses.

KVHS uses only Kentucky teachers, and all courses must meet state and national standards. The State does not pull money away from schools. ADA/FTE continues to flow to schools, who return a portion of the fee to KVHS. Home schoolers pay 100 percent of fees. The non-free issue has posed some barriers to participation, with some schools completely opting out of sharing their funding. Fees are kept in a non-lapsing trust account. The idea is that KVHS pay its own bills, but this is not a self sustaining program. KVHS is trying to recover a portion of cost in three areas: the cost of running a virtual campus itself (hosting course

management, etc.); the cost of developing content, whether licensed from others or developed internally; and the cost of teachers. The state appropriates \$400,000 per year; by the time salaries are paid, there is little money remaining for operation and development. Thus, it's not a sustainable model.

Currently there are discussions about where the money might be. Do these need to be new monies? Some districts talk about the potential of an e-learning trust fund that would prioritize funding for these programs based upon needs, such as courses needed by smaller schools, poverty, and numbers of students in an achievement gap.

KVHS is growing and it brings in grant money that is helping. Districts are learning to budget for these fees. But long term sustainability is still an issue.

#### **Bill Thompson on Working with State Legislators to Obtain Funding**

Sustainable funding is ultimately going to make or break you. Particularly in the economics we are involved in now.

We need to sell and build a strong case and sell the idea that online learning is a viable, important, potentially powerful way of making student achievement occur in states with students that do not have access to traditional ways of education. The state must make decisions to embed this within their budget and it should not be a one time allocation or one time grant.

We need to educate our governors and legislators and make them fully aware. We need documents to help educate legislators, such as SREB's "Funding Web-Based Courses for K-12 Students to Meet State Educational Goals," available online at <http://www.sreb.org/programs/EdTech/pubs/pubsindex.asp>. However no document is a one size fits all. There are a variety of areas for funding.

The aforementioned SREB document looks at the idea of revisiting the FTE issue and whether some portion of that should be re-allocated. Should there be a special tax created that will be used for a specific period? Should we look at all these federal programs and other relatively stable flows of income coming into the state and getting a piece of them to meet specific goals?

An area of interest to SREB is a program called High Schools that Work, with over 1,000 high schools in 27 states. We looked at a lot of different issues, but one of them is the technical money that flows from the federal government to local states and using some of that to meet specific needs. The point is there is a variety of ways. You can't just assume you can do good work and get funded. You have to take this on as an agenda and work with your legislators and your governor.

#### **General Comments About Dealing with Vendors:**

How do we partner with vendors? We need to be more transparent and have more of a community with vendors. We need to know what we are as a collective so that we can have all the information we need to be able to partner with vendors on more of an equal playing field. We need to become a community that speaks with one another on a regular basis and become a solid voice to the vendors.

A big part of cost is what vendors put on your shoulders. We need to think about alternative models, i.e barter arrangements or a consortium buyer.

It was noted that a big part of the cost of sustainability is driven by the high cost of technology that vendors are more than willing to put on our shoulders, such as courseware development and technology solutions that are not scalable, not stable or not supportable over the long term. There is an opportunity for us as virtual organizations to say wait a minute, in the aggregate, many states are represented here with public funds that are being used to purchase technology solutions. So we need to think about alternative models of distribution and delivery that take the collective experiences and aggregate them inside the vendor community. With regard to course development, we as a group deciding if we can barter this among our selves - maybe through a consortium model or barter model - to share courseware and technology solutions that we have - will help address long term sustainability issues. When we look at our P & L, the biggest cost by far is technology delivery.

#### **The ATA Alliance and RFPs**

There is a new organization that came into being over the last several years called the American TelEd Communications Alliance (ACTA). It is comprised of SREB, MiCTA, MHEC, NEBHE, and WICHE.

ACTA has contracted with a private, for-profit company called MSC, which is really the MiCTA service corporation. This group, under the direction of the alliance, is responsible for the development of RFPs and obtaining contracts that any school or college state education agency across the country can purchase from. According to Bill Thompson, they have developed contracts that are generic enough so that it makes no difference what state you are in.

About 6 months ago a discussion began about e-learning providers and right now ACTA is in the beginning process of developing several RFPs that will go public within the next several months that deal with e-learning providers, both at K-12 and community college level.

It was noted that attendees have an opportunity to participate in this process to help develop what the

services and products are that they may need to have from providers - ultimately they will go out for bid and review, etc. ACTA is hoping to have it all finished by December (see the brochure to get involved). It will force the vendor community to pay greater attention to K-12.

### **Comments from Julie Young, Florida Virtual High School (FLVS)**

This group needs to define success criteria, otherwise it will be defined for us. She referred to a nameless legislator who made a comment that the criteria of measuring schools was simply testing. However, at FLVS they have so many kids who may take one course. So we come up with a lot of ways to measure success. Is it completion, is it grades, is it mastery of standards? Right now we live in a world where it is test scores, so we need to come up with a way to measure our success collectively that we can take to the policy makers even at the USDOE level. We want to say this should be how this venue should be measured because it is different. The more that we can profess to them that we are different, and therefore the measures need to be different, the funding models need to be different, staffing models need to be different, then the better off we are going to be.”

Getting into the funding models I think the most important thing to remember is there is not one right funding model. The Michigan funding model has a tremendous amount of potential. However, in Kentucky that won't work. In Florida, tuition won't work unless they are from out of state. So there are lots of different funding models for lots of different places. FVS is a compliment to the schools; others grant diplomas - two different funding models. VHS is different.

About dealing with legislators, FLVS has done a tremendous amount of work that we have to share. I think if you can get more demand, than you can show what happens and let the parents do some of the work for you. For example, some parents were irritated because their kids can't get into the FLVS classes. They threatened to call the governor, and we politely asked them if we could give them his number. That is grass roots.

When we went to the schools - they are the gatekeepers and they will give you the students that they don't want to serve, or the students they think will be successful based on their limited knowledge. But when the legislator said to us that we require that you go out and listen to the whole public of Florida and bypass the schools, it was like someone turned a faucet on - all of a sudden the parents were going into the schools saying I know I have a right for my child to take these courses. They would call the legislator and superintendents; so that whole grassroots movement is really important.

When you get these notes from parents who think you have saved their lives, forward them to the legislators, the governor, the commissioner, etc.

Also send them out within your own community and brag. Find five legislative champions that will do the work for you. In the scheme of things it is not a lot of money.

We're getting 7 million dollars. If you do the math it, comes out to a little over \$2 per student - it's nothing.

Your biggest issue with faculty will be burnout because everyone wants to be cheaper than a traditional classroom and be a hero. We are a tiny bit cheaper and we have teachers that have a 1 to 150 ratio. That is hard work, you have to really maximize practices in order to support them - but that is the only way that you can get your equivalent funding so that you don't look like you are a lot more expensive.

Do the outside evaluations. Bring people in and let them scrutinize you and then listen to them and make changes immediately. So that you are in a constant state of improvement and your teachers know you are doing this.

If one of us can figure out how to fund this so that it lasts more than a year or two than we will be in good shape.

Coming together as one voice is absolutely critical. We need to be a force to be reckoned with.

### **Discussion Question**

Who should bear the cost?

- Need simultaneous models going all the time. FTE and ADA funding, state appropriations, grants, non-public schools, home schoolers, federal dollars via schools.
- Want a continuing legislative line, not one we would have to lobby for every year.
- In what instances would the student/parent bear the cost? When is it part of their core education? When is it supplementary? When do you have the parents bear the costs?
- Put more importance on the value of education to be provided. It is necessary that the schools and students/parents have a financial contribution. For districts or schools that are financially challenged, some scholarships could be established to help them out.
- Who bears the cost of traditional education and why shouldn't online learning be funded through the same sources? It needs to mirror funding mechanisms of traditional courses.
- Separating out the populations and how they should be funded and in what priority would help to look at the issues. There is a matrix that Liz Pape's group developed in Maryland that lists the different

populations and how they should be ranked and marketed.

- Talked about a central distributed education, possibly at a state level, and our funding sources would be federal, state legislative line items, and the schools giving part of their FTE back, as well as times when parents would be charged tuition. So there is not one answer.

### **Discussion Question:**

In terms of funding streams, do we need to find new funding streams, or do we need to redirect them?

- Everyone wants a legislative line item. The regions will get fees from the schools because regions are like partial states with interesting funding streams.
- A regional person from Oregon serves an area of 12 districts over a 10,000 square mile area. He said that smaller districts are always very protective because they don't have the foresight about how to use the services and are very concerned about dollars that may go away. Larger districts don't have those concerns, and can afford to do more. They have district schools and regional schools, and a fee structure for this needs to be taken into consideration.
- If students are allowed to transfer to a school that is higher performing, would you let them transfer to an online school?
- In addition to traditional methods, there are a lot of online programs being funded through foundations and partnerships with corporations and federal grants and programs. One that did not come out was a tax on e-commerce. In Texas they are doing it with a tax on telecommunications. These measures could be seed/start-up funding until you can move toward integrating with the traditional funding model.

### **Colorado Model in the Making Using ESEA Money**

Colorado asked is there some way the Elementary and Secondary Education Act (ESEA) money might be used? So they are using the competitive grant part of the ESEA to provide the foundational funding for their statewide program.

They are requiring that instead of giving grants to districts or other regional agencies, they will be giving single grants that will go to a consortium organization that will write the most successful application for organizing and running the statewide online learning organization.

They are being really specific. Many ideas came from the original RFP that came out for the California online learning organization. They have spelled out a lot of the details about what they want a statewide organization to look like.

The competitive grant will go to who can best put together a consortium to make it happen, and there is a race going on to create as many districts as possible as partners, so that they look like the most effective consortium.

A number of advantages can come out of this. One is that districts will own the statewide organization rather than the state. Another advantage is that it will be a collaborative organization among the districts and the existing online programs (about 16 right now). So rather than having them all competing with each other, there will be collaboration on course development and quality.

Another advantage is that the ESEA has a priority going to high need schools, so we can ensure equity by using that requirement in the grant so that our organization of service goes to the high need/high poverty district. Other districts can participate, but that is how it will build in the fee structure - on some sort of scale. Colorado does have a history of a consortium statewide learning program called the Colorado Online School Consortium, which has been operating for four years.

### **Some Notes About Perceived Fears**

- The online school is going to steal money from the districts. Educating people about the inappropriateness of this fear is difficult.
- Teachers will be lost.
- FTE/ADA dollars are going to go away. The online option is going to become so necessary that kids are going to be stolen.

## **Appendix C: Marketing and Public Relations**

### **A Word About the Message**

As a broader issue, it was noted that face-to-face has not solved many of the larger issues related to quality, access, equity and so forth. So, we need to be mindful of the fact that difficult issues are difficult on both sides. The message then becomes “don’t let such challenges stall your efforts.”

### **Counselors**

It is critical to have the buy-in from counselors. In Florida, regional meetings are held where counselors are educated. Counselors are introduced to how help is available for them to help solve situations at their schools and how the virtual state program can be a partner and a solution. Educating the counselors about successful students is very important. Often, a counselor’s idea of the qualities of a successful online student are much different than what’s real. Six years ago it was the high achieving, computer-savvy student; however, there are plenty of students in all kinds of different categories who can take advantage of online learning. Principals also need to know this. However, counselors are the key. They will keep students out, and they will let them in. They have a tremendous amount of power.

### **General Comments**

Regarding marketing, let your students speak of their successes; don’t market too soon and don’t create too much demand; emphasize your best practices.

Get the counselors to buy-in. Educate counselors on what a successful online student really is.

Negative publicity can bring about change as well.

Let your constituencies speak to the success they have in order to get the message out.

Figure out what your best practices are and emphasize them.

You have to market your program to your stakeholders, such as students, parents, legislators, and the decision-makers in your community. It’s very important that you get their support.

Another idea is to set up local and statewide guidance counseling advisory committees (made up of counselors) and use these people to spread information throughout the state about online learning.

Must communicate the success of your program and collect data that shows that your students are doing as least as well as traditional students, especially with regard to state assessment programs.

One of the pieces of the NCLB is that there be a high quality teacher in every classroom. Most online learning teachers are high quality and here is an opportunity to market that these teachers are able to deliver high quality teaching to your kids - so make sure people know that these are really great teachers that your kids would not have had access to any other way.

## **Appendix D: Infrastructure Development and Support Systems, Including Appropriate Uses of Technology**

### **General Comments**

It is our job to bring instructional technology into the schools to use in both online and traditional classes.

We should try to work ourselves out of a job because online learning should be a part and parcel of what everybody does. In a world where all teachers know how to use technology, that kind of thing will happen.

Should there be one platform that all teachers are trained in using? Most everyone advocates open source, which will engender a lot more use in general. One platform may not be necessary, however, but a universal form is necessary. i.e. html courses that people can grab. So basically we have to look at it from a source perspective that is universal - Linux applications that are free, for instance.

It would be nice for a consortium to come up with one standard for a platform that we could all follow. MIT in collaboration with other universities are working on learning management systems and collaborative tools for authoring that will be open source. For this group, K-12 isn't represented at the table. The need for courses, and the needs for students are different. However there is a need to get to get K-12 involved in this.

### **About Course Facilitators, Mentors and Site Coordinators**

VHS uses site coordinators as first line of defense for tech support issues. It's very important they are trained how to utilize tips and tricks.

Provide parent support through site coordinators. Parents need to know that they can stand over the shoulder of their kids and see what is going on. VHS sends out a packet to site coordinators that they send out to parents that explains what expectations are, etc.

FLVS used regional directors around the state to start a lab facilitator training program. Now, lab facilitators are provided training from FLVS in everything from how to put paper in the printer to making sure they know how to go online and examine the student gradebook. Counselors, for instance, have special passwords so that they see only the grades of the students from their schools. Training of facilitators has helped to make a dramatic improvement in student productivity levels inside labs.

In North Carolina there are four or five alternative programs that support online learning in lab settings with facilitators. Under NC testing, the issue becomes who is accountable for the results of the tests if you deliver them

virtually? Is it the virtual school or the local school district? They felt the virtual school should be held accountable because they deliver the course, so they take a hands on approach to what the local school district must do to help facilitate quality of instruction. They have built in competencies for this. If they are going to make the score, then they are going to have to do this in a way that the virtual school is comfortable with.

Regarding VHS site coordinators, when they started training during first year, even though they had a sense of the site coordinators onsite presence, they did not quite realize that they were not teachers, so they put them in teacher training during the second year. As much as possible you must put the site coordinator or facilitator in the shoes of the student. So site coordinators also take the student orientation, which is followed with additional training that stresses more of the administrative role. The site coordinator is really the go between your virtual organization and their school. They do a lot of communication with parents and with school administrators. Also during that first year, frequent feedback, not only from the teacher, but also from the infrastructure that you build around the students, is important.

You have to build administrative and management tools around your course delivery. Some of the things that work effectively include a regular grading process, warning notices early on (need to turn around students' false notions about online learning right away). You also should maintain current grade averages that are no more than two weeks old. The more infrastructure you can build around students, through site coordinators, the higher chances of success students will have.

Finally, if you really want to address equity at low achieving schools, mentoring becomes extraordinarily important.

### **About Access and Equity**

State legislation requires an equity focus, and frequently this is not talked about. The issue of equity and access needs to be addressed early on, otherwise you will have problems down the road when you don't meet state requirements.

An economics issue comes into play with access and equity. Access and equity varies from state to state. Some schools, for instance, have put it off as they deal with technology.

Maryland is looking at it from an instructional design perspective, culturally as well as disability wise.

It was noted that we work on the fly, and the term used to describe this was that we are "pioneers driving through pot holes." Those who come in later in the game can drive

around the pot holes that we went into. Basically, however, we have the opportunity to do some transformational work.

We are also providing access and equity to soft skills that are needed for students to succeed. Students need to be web and computer savvy. Those who are not exposed are being deprived, so teaching life skills is very important.

Access and equity can also be seen as being simply presenting knowledge, and we need to plan how to provide the ability to have access to it over a lifetime.

#### **About the KVHS Website**

This is a simple technology. There is a lot of information on the KVHS website, but KVHS was never happy about the way it was being accessed or used. It still seemed to be invisible. So KVHS started sending things out in hard copy inside a red folder. This information has been sent in hard-copy format to every superintendent, high school principal, high school guidance counselor, HSE, RSC Director, Gear-Up Middle School and KVHS teacher in the state of Kentucky. A graphic representation of the red folder is now on the website, and it has made a huge difference. It has all kinds of information written at a very simple level. People print it out and buy red folders to hold the printed information. Parents relate to it.

See <http://www.kvhs.org/index.real?action=Welcome>

#### **About VHS, Inc.'s Student Information System**

<http://www.govhs.org>

It is important that the website be somewhat similar to brick and mortar schools and that it has a public view and a private view of the school and shows what is in the program and what is in the course.

It is important to mirror regular course handbook.

Some levels are available for students, and some levels are available for administrators.

Students create their own account first. Then, the online mentors enroll students into a course.

Teachers have an area where they input grades, and site coordinators can filter grades of students, by school, etc.

A course Demo is provided online.

Teachers use a weekly overview to set up the expectations for the kids and then they have a whole bunch of different assignments during the week. It describes objectives and course tie-ins and grading expectations. Another area within the course is the student profiles.

Students get feedback on how they are doing in their courses. VHS maintains current grade averages no more than 14 days old.

Students go into a portfolio area and see assignment, point value and what points they received, as well as comments.

#### **Discussion Question:**

How can virtual schools share information about appropriate technologies with each other?

- Create a listserv.
- Create a knowledge data-base driven tool.
- Create a clearinghouse of tools, resources, courses, etc.
- Create a bartering system.
- Create learning communities.
- Share registration. The tracking and collection of data about a student from the time he or she enters a program till the point in which he or she leaves. Also, sharing content at the object level - not just courses, but you could go in and pick and select from numerous courses and chose particular objects within them.
- Technology must support a learning outcome or objective. With regard to sharing product, would we have similar educational outcomes if we did share based on the populations that we each develop for?
- Sharing appropriate technologies might not be high in the rankings of what we need to immediately address. Form a technology subcommittee that can focus on best practices and what is going on in trend development.
- A website could provide a forum to share information both formally and informally.
- Whatever we do in this organization will serve those that follow us.
- How would you address problems, and how would a system be created so that they could be looked into? Answers to this include creating a website, and an open listserv or a moderated listserv that categorizes everything. Can also create an email (e-community) list to share information with.
- We should establish an annual forum, like Educause does, where we come together in a setting such as this and address problems inside workgroups who then pose solutions. This would be an ongoing structure that can address problems as they come up.
- Sharing RFPs could give people ideas without having to reinvent the wheel.
- Conference calls can be set up by leadership or by a national organization.

## **Appendix E: Course Development and Leasing**

### **General Comments**

What is the best way to deliver instruction? Is it text? Is it something they are going to have to read and refer to? Is it interactive? Is it a power point? Is it a Web Quest? What are the different ways you can deliver instruction?

### **Course Development Team at Michigan**

Michigan includes a standards “police” in addition to a content expert and instructional designer. Basically the Michigan course development team has four roles: subject matter expert, with a master teacher; standards person; teacher advocate, who is like a peacekeeper who makes sure everyone stays on task and gets along; and the instructional designer, who is not an educator but has a different way of looking at instruction and learning and teaching. The instructional designers can butt heads with subject matter experts, which is also where the teacher advocate comes in to play (works through personality issues that may come up.) One example is when sophisticated, mature and experienced classroom teachers must be told by an instructional designer that what works in a classroom with 20 kids does not necessarily work in the online learning environment.

### **About Sharing Content**

The majority of people here say they are building courses, and everyone is saying let’s have everyone share in course design. But are you willing to share with your competitor? For example, some virtual schools are operating outside their state jurisdictions, so there is the possibility of perceived competition.

In response to this question, Florida says that as late as only a few years ago you almost had to go out and create your own courses because there was not a lot out there other than textbook-on-the web courses. Down the road, the fiscal side of this business will promote sharing of courses, however. For example, in West Virginia middle schools now have to offer a foreign language, and the fiscal realities have made WV collaborate with Florida to create such courses online.

When you are sharing courses, one of the problems from state to state, is whether or not the content can be agreed on. An example was presented where several states could not agree on what constituted a proper Algebra I courses. So, if you are sharing content, how much needs to be modified before a receiving state will accept it?

Oregon likes to share and their intention is to post syllabi and eligible content linked to units of student and lessons plans and resources and make it available to all teachers in the state, not just online learners.

There are common themes in regard to sharing: we want standards involved with what we share; we want to keep costs down; we want to expand access; we want to improve student outcomes. We as an organization can investigate what a sharing construct looks like. What we don’t have is a business perspective unilaterally that could drive the sales and distribution of what we can put into a pot and share commercially. We do know that if we don’t establish some kind of a construct, for-profit ventures will.

If we do not do this, than the natural outcome is we turn it over to other people, such as people who do it for profit as opposed to doing it for the sake of education. If you can’t do something that is really important than “shame on you.” If the people in this room can’t find a way to do this for everyone’s welfare, then “shame on us.”

### **Should You Buy or Build Your Courses?**

It really boils down to what is your core business? One virtual school is really a service to the districts; and part of this service is maintaining and providing high quality courses. Developing courses is not its core business. Its educational service center cannot compete with developing a \$600,000 dollar course. They don’t have the staffing, resources or budget, so they have to make a decision. Do they buy or build? The answer is they build only those courses that are not being built by others, such as in subject areas like fine arts.

### **Course Content Development at University of Nebraska, Lincoln, Independent High School**

First thing they do is develop content based on farming it out to teachers, professors, subject area experts and then come up with a good course before putting it online and in print-based forms. The course must also pass muster with instructional design specialists. UNL builds courses that allow students to be self-guided. They have taken their pencil and paper courses and converted them to the online learning environment, and they have created commonality within these courses by utilizing a template-driven technology. Courses, however, are still text-based; they are not using CDs or digitized course materials. They have taken the syllabus and made it an electronic resource where students self-pace themselves through the courses. All the courses point students to electronic resources online, and students submit works electronically for teacher grading and evaluation and feedback or computer grading. There is minimum contact between student and teacher. The teachers are available if needed.

UNL is selling their pencil and paper courses to other states, such as in South Carolina. They are hoping to make their online courses also available to others in a site license agreement.

### **Creating a Dynamic Multimedia Enhanced Physics Course at UCCP**

UCCP has developed AP Physics courses designed through a collaboration with the Center for Digital Innovation at UCLA. This team was comprised of AP teachers in Physics, UCLA faculty, instructional designers and multimedia designers.

UCCP does not currently have a CMS, so it is a self-contained course with course management functionality. The course has a calendar of content and a chat room. Learning is a social experience, so they incorporated opportunities for students to communicate with each other and work on group projects together. The course has a forum and whiteboard (not with voice over IP). It has a gradebook and quizzes that are automatically graded.

The idea was to create a course that would keep students engaged and provide interactivity. For example, software is designed so that the minute students come in there is an interesting fast fact that changes everyday that they can click on.

Lessons incorporate video streaming examples of Physics concepts. Each lesson is broken up into sections. Lessons

are very multimedia rich. Students can interact with videos, which is not typical of a course management system. Sections have concentrations of knowledge that students need to remember that include video, audio and animations. Most course management systems don't allow you to try different metaphors. Here students can manipulate sections by going back or forward, stopping etc. The idea is to maintain constant interaction. The course development team thought of strategies where students would be able to keep notes electronically or with a regular notebook.

The primary focus is how do you maintain engagement? Also must take into consider learning styles.

### **Free Courses Available Online**

[www.xyalgebra.org](http://www.xyalgebra.org) - A free courses built using Java Script. Kids in Hawaii love this course. Doing class.com algebra course but also having fun with this one. There is an xyalgebra network for teachers.

[www.bbc.co.uk/schools](http://www.bbc.co.uk/schools) - This BBC site has great courses using Flash. They have drama courses that are free, and others.

## Appendix F: Faculty Training and Professional Development

### General Comments

Regarding teacher support, how do you support teachers in course development and how do you bring teachers' ideas into the online learning environment?

Teachers must be oriented online, and they must demonstrate the same competencies that are required of students. They must understand what it means to be an online learner. They should have a clear understanding of the platform, pedagogy, pacing and chunking of modules.

Both content and technology experts are important.

The guide on the side as opposed to the sage on the stage is the preferred method. It's important that teachers act as facilitators as opposed to taking a full directive roll.

There are outstanding online teachers who may not be outstanding online course developers. This is an expensive lesson to learn, especially when good teachers think they are also good course developers and you have to tell them that they are not.

Gwinnett has a 10-week online class led by their master teachers who bring their experience in. On the front end, they offer a brief 4-hour face-to-face session where they use the eCollege platforms' etool kit - "to get their feet wet." If they are excited about that and engaged about distance and want to learn more, that's when they bring them into the 10-week course. On the back end, they have an intensive course development course - three weeks including face-to-face that is spread out over 2.5 months time.

In Michigan, advanced training incorporates the sense of building an online community. Once they go through the course, they are allowed to teach online, and while they are teaching online, the Michigan administration is learning that they need a lot of support, monitoring and hand holding. So Michigan built a virtual community through its interactions with them virtually. They have a common Blackboard place called the "Instructor's Corner," like a faculty lounge where they ask questions and share info. Michigan is also now building into its online instructor training as a prerequisite, that new instructors "lurk" in a course that is being taught. This way they have a chance to preview a course and see what it is like. It's like a mini student-teaching experience they go through while they are being trained as an online instructor.

Talked about working to build modules for people who are currently teaching online but want to continue to improve and refine their skills. For instance, a module could look at how online teachers build online communities within their

class. Such areas to be covered include when and how do you use discussion boards, when do you synchronous chats - more on such communication skill areas.

It was noted that students use technology more than the schools use technology. So it means that teachers don't have it together yet. We haven't made the kind of progress we have been hoping to make with teachers. So the question becomes how do we get all the teachers and schools trained?

All teachers must demonstrate technology competencies in Georgia for re-certification - this is being phased in from a state initiative. And its more than just software; it's instructional uses of software.

Gwinnett offers training in an online supplement to face-to-face i.e. a course that introduces teachers to communications tools so that every face-to-face regular school teacher can have online supplements to their classes.

Gwinnett is also working with alternative schools by giving them the courses they developed and showing them that here is how you can possibly manage your time and use some blended courses to help.

In Michigan, the issue of writing/communication skills has come up. Some teachers are great instructors but are poor spellers and don't have good grammar. Virtual classes allows administrators to see how teachers write and interact with students. There are some very significant skills that need to be addressed.

A factor in Florida deals with training teachers how to work in a different environment, such as at home, which is a significant adjustment.

VHS, Inc., does not differentiate much between course developers and course instructors; all of their teachers that go through training are also writing courses, so they catch a lot of the netiquette problems early on. In the actual delivery, it's part of the training but also a part of the delivery monitoring, so they have faculty advisors as an extension of the training, particularly during the first semester. Not only are they watching tone of voice, but also the basics of grammar and how often teachers communicate with students. They let them know that it is not enough to just say "you are doing a good job."

See NEA guide to online courses, which has evaluation criteria and a checklist about professional development. Can be downloaded off NEA site at <http://www.nea.org/technology/onlinecourseguide.html>.

There are many who have extensive training in online teaching. If the new models included a four-hour training on the particular platform that you use, and then allowed the rest of the training done in someone else's program, then you'd have a lot of teachers that were cross trained,

and you'd get the richness of all the different programs and perspectives. So how can we work together to do that?

North Carolina has a competency list for online teachers. See Karen Creech at the Department of Public Instruction in Raleigh, NC. She created the list for online teaching and the quality of online courses. Email Allan Jordon for it at [ajordan@cswebacademy.net](mailto:ajordan@cswebacademy.net).

### **Working with Higher Education for Teaching Teachers**

It was noted that higher education needs to be challenged regarding assumptions. If you pull the numbers on the scale of what's going on with online K-12, higher education takes notice.

FLVS has started to work with two Universities (although they do their own teacher training), Florida A & M out of Tallahassee and also with University of Central Florida. They are working with their senior interns in teaching profession and have created an online teacher component as part of their internship. Their selling pitch to the university was whether this teacher ever teachers online they will be a better teacher because they will see technology as an instructional tool, whether face-to-face or online. FLVS sees this as a benefit to them to create a pool of teachers who understand online learning.

Louisiana Dept of Education, when they were first undertaking distance learning, had a number of staff members take courses at UCLA Extension, which helped them to move their agenda forward.

When you ask universities how they are teaching their faculty to teach online, you might not want to use their model as how you would want to have your teachers taught online.

In Michigan, it was believed they could utilize the university model for teaching faculty how to teach online, but it turned out to be too different from what was needed for K-12, where there is compulsory attendance. Consequently, they developed their own training from scratch that addresses needs of high school classroom, with adolescents, teenagers, compulsory attendance and all the classroom management issues that come into play.

### **Elements of Teacher Training and Professional Development from Liz Pape, VHS, Inc.**

- It's real important to get all the expectations for the training up front. VHS, for instance, has a Learning Support Agreement that trainees sign, so its understood what their commitment is before they go into training, i.e. how many hours, how frequently they attend online, etc. Then they strongly advocate the teacher as an online student (called the "model to model").

- Learn how to facilitate online discussions. For example, how do you do this using a collaborative learning model?
- Learn how to facilitate student-to-student interactions (if the pedagogy calls for this). How do you make sure they are talking to each other and hopefully about their course work?
- Learn how to foster online team activities.
- Learn how do you build effective online communications so that kids can understand what is an appropriate online voice.
- Spend some time dissecting what it is that you have been teaching (while in the training model). VHS has a "See How We Do It" component with a large eye for an icon. Anytime the teacher sees the eye, they know they are going to have a discussion about what it was they were teaching the teachers and why it is important for them to understand to do it well.
- Learn how to use the software. If you need to modify the course, you can do it effectively.
- VHS does two training models. One is A 22-week class called the Teacher's Learning Conference. Here they are learning how to teach as well as building a full semester course. While they are in that process, it is very important that they understand what the course criteria are, what the standards are, etc. They do four evaluations of the courses as well as the teachers, which happens throughout the course. They have to understand what the standards are. They also do a building community unit right at the very beginning as a part of the basic training.
- Understand post-training online support.
- Sometimes during first semester it's wise to limit size of enrollments for first-time teachers.
- Use reflective journals as a part of the training.
- Learn how to work with administration, parents, guidance counselors and students.
- Learn how to recruit students and how to get information out about online courses.
- Learn how to use registration and grading tools and any other tools that may be provided.
- Know where to go for assistance.
- Another way of providing support is to have a faculty lounge (both informal and formal).

## Appendix G: Student Support and Performance

### General Comments

In Michigan, a law is expected to be enacted that will require high school students to take at least one online course.

There's also a growing body of international students taking classes from U.S. based virtual high schools. Developing global citizenry skills by working on an international level is a growing area of concern that needs to be discussed.

Assuming students are accustomed to working in an online environment may not be a correct assumption because in many cases technology can get in the way of learning.

There is a need for a mandatory student orientation that should be conducted online that introduces navigation platforms, requirements for taking the course, and establishes expectations.

VHS, Inc. uses a student orientation during the first week of every course. It covers navigation skills. They recently added modules that teach time management and learning management skills and have built in assessments so that site coordinators or parents can see if students have passed and have all the necessary skills. There is also a self-test for students to see if they are ready for online learning.

Other student support elements include FAQs, help desk support, and a triage process or ability to escalate your help desk questions and tech support issues and set some goals for your triage process. In other workds are you going to try to triage your problem reports every 24 hours? How do you escalate it? You should have it all defined.

### Improving student performance with comments from Nancy Davis, MVHS

The pressure is continually upon us to solve all the ills that families and children face. However, virtual learning should not become the next panacea or cure-all that is going to save everybody and help children most in crisis. Our responsibility is to prevent this from happening and not be the dumping ground for those kids who are not able to succeed in traditional school settings. We are getting these students already, however.

In all states, success for students is now the norm. It's no longer acceptable to let students fail, and we can't afford the luxury of students dropping out and not going on to work or school. Just graduating from high school is not enough; you must have at least two years beyond high school.

So how will technology impact this effort? All kids will learn; all kids can learn; all kids must be successful - and the virtual world provides the opportunity to meet their needs anytime and anyplace.

Time was always the constant and achievement was always the variable. In virtual education, time is not the constant anymore and it can be variable and achievement should become the constant.

We are no longer restricted by the bricks and mortar structure, and we can look at ways of opening up learning possibilities in ways that we were never able to do before.

So, how are we meeting the needs of those populations who are not being met with traditional schools? Many of us got started by addressing the needs of high end students, by expanding AP curriculum to those who did not have AP courses. Now we are seeing the needs at the other end of scale, such as students who are at risk, kids who have flunked Algebra I, which is a baseline requirement for every kid, and many kids don't get it the first time. It's very difficult for some kids to learn and some teachers haven't changed the way they teach Algebra I for years.

We are also seeing an increased interest in homebound students. Other areas of demand include districts that can't meet capacity, such as the Los Angeles Unified School District, for instance, where there aren't enough seats for students, and they are seeking solutions that include online learning. Basically, online learning is becoming a critical element for preparing students for life beyond high school. There are changing needs in the workplace and employees today need to know how to use technology.

NCLB presents another opportunity. Where can we insert ourselves in that process? There is a key role for all of us to play in this conversation. NCLB mandates testing for all students in grades three through eight, and good bad or ugly that is coming. We stated in Michigan with the VHS - where there is state assessment program - we do have testing tools that we are offering - partnered with TestU - custom designed an online assessment tool for the Michigan state test called the MEAT test - it got a lot of attention. Three years ago tobacco settlement money was used for scholarships that pass the MEAT test at high school level taken in 11th grade. So kids all benefit from the money by getting \$2,500 if they pass to be used toward higher education.

There will be more needs that get put on our plates as we continue to become more visible to decision makers who are seeking solutions. So in relation to ensuring student success, what are the trends and how is online learning support this effort?

## Discussion Questions 1 and 2

Try to come to a consensus on the top five variables of student success and then ask how will online learning impact these variables?

- It's one thing to prescribe what indicators of success should be, but it is another thing to choose to work on the ones you have control over. One, for instance, is parental involvement, which is one of the strong indicators of student success. But how much control do we really have in this variable? We have some but very little control. So, go the benchmarks of what are the variables that we do have control over. Take that to the online world and how can that translate to indicators of student success?
- The quality of the teacher and the tools and resources available to the teacher is important, and online learning provides a whole new set of tools and quality assurance for teachers because online teachers are under the microscope, which is a plus factor.
- Learning Styles - The ability of the teacher and the learning environment and the curriculum to accommodate different learning styles. Online learning has the capacity to do this, but this promise is yet to be fulfilled. In the future, however, we should be able to do a better job of accommodating different learning styles.
- Learning Community - Students can connect with each other and the teacher is a critically important variable and online learning presents an extraordinary opportunity to create broad learning communities. For example, students from different geographical regions can come together in a virtual environment.
- Tools and content and the curriculum itself bears on student achievement. The very best online classes, such as the AP Physics, have the ability to raise the quality and content and tools available.
- Testing feedback - Online learning provides for more frequent feedback, more testing and new types of feedback and testing.
- Lifelong Learning - Learning is continual can be built into online
- Engagement - How do you keep students engaged? It's still leading edge. You must be an active learner; you can't sit in the back of the classroom. You have more than just a library to access. We open up opportunities for students to become engaged.
- How much time do they spend on task? We can respond quicker to tests and papers, meaning quicker feedback to students, which enhances engagement process.
- Each student can receive an individual education because subject areas can be differentiated with their learning styles very quickly. It's an adaptive technology.
- We should not be so anonymous. We should respond quickly with personalized teaching and make students feel important.
- Delivery and Quality - Teachers are much more accountable. Anybody can do a great evaluation lesson plan once. Online everything you do is logged and you don't have the luxury of preparing for a one day assessment. With this constant oversight and feedback you will have the cream of the crop float to the top.
- We have direct control over content and it is all measurable. We can get quicker assessments and make changes accordingly.

In conclusion, the more we get teachers engaged and thinking about their practice in these ways, the better off our kids and schools will be. You have the design for a classic school improvement plan that every single teacher should follow and adhere to. We are not there, but we can get there. Online learning can change the way teachers think about teaching and the way learners think about learning.

Parents are sending us the best kids they have. They don't keep the good kids home in a closet. We have to deal with them and treat them as individuals, and the variables that we all just described can help you shape, if you haven't yet, the components of a superb online instructor training program. These are the key elements that go into making an online teacher very effective and an online student very successful.

## Appendix H: Research and Evaluation

### Fran Stancavage, American Institute for Research

#### General Comments

Are our programs really improving the quality of education. Do we have an obligation to use our knowledge to raise the bar on education in general?

Should our courses be used as models? Should they be used to teach best practices? Should they be used to train teachers?

Can we be perceived the same as traditional programs but at the same time request to be different? Maybe we are trying to get the best of both worlds. We may not be successful of that.

If you don't have unbiased researchers you will not be able to defend it. You need a partnership between researchers and you. Otherwise the result will not be nearly as effective if they did it alone.

Research should be continually informative and it should continue to build credibility.

We wind up at the end saying again, what is success? So, we need to come with a definition for success.

Fran alluded to the phone survey she conducted with 13 Institute attendees and said she would send everyone a summary of the survey as well as the questionnaire if they would like to add more to it.

#### Discussion Question

Can you share any successful survey questions?

- A number of us are using surveys looking at student satisfaction with courses.
- Teacher surveys look at the quality of instruction by asking teachers what they think is quality instruction.
- Also look at teacher performance, where you look at a teacher's responsiveness to kids and ask questions about the rigor of a course.
- There's a lot of discussion comparing online to face-to-face courses, so you need to draw on these comparison.
- For students, how does taking an online course fit into their overall education plan? What other courses would they like to take online?
- Do a survey at district level where you survey assistant superintendents who are also copying other people in the district, such as directors of special education, etc. Ask what kind of courses do you need to have and other questions of that nature.
- Technical side - what is responsiveness of help desk? How are registration services handled?

- How effective is teacher training, getting feedback from teachers about it and looking at turnover rate.
- Look at quality of teaching going online in relation to your teacher training program. Might have to go back and change your teacher training.
- Are we talking about the success of the program versus the success of the individual?
- Core course exit exams, some of which are state mandated would be applicable to the online courses as well as face-to-face.
- In terms of success of your program, it could be things like what percentage of do you have who have taken an online course have come back and taken another online course?
- What are the qualities you need to have to be a virtual high school versus correspondence distance learning?

#### Discussion Question

How do you want to measure success? What data can you use to support measurements?

- Consistency across states would be great if there was agreement on some of the data that needs to be collected. That could come into a centralized source that provides a national perspective.
- What are the characteristics of learners and instructional design?
- Is any data gathered through some kind of an exit survey when students drop out of courses and getting information on why they drop out?
- Completion rates of individual courses in terms of success of course.
- Feedback instrument would be the national exams, like AP exams.
- For data about fiscal success, are you able to pay your bills from year to year?
- For data about program growth, are you incorporating a more diverse audience? Is access to courses being made more widespread throughout your potential audience?
- In terms of the program, what are your staff retention rates? Are you burning them out?
- Be sure that whoever is collecting your data has an unbiased focus. An in-house person may have a bias toward your own program, and an outside person may have a bias favoring face-to-face classes.
- Know how you are going to use the data before you collect it?
- Look at the distribution of grades and see if that matched classroom data.

- Look at state tests in terms of how online students did and compared to the state in general.
- Look at different segments of your online student population, such as those at risk, those taking AP courses. More than likely they will have different outcomes when compared to the whole population of students. Distinguish what are the different characteristics and learning styles of the various student segments.
- Examples of measurements include open-ended and structured; some are web-based; some use focus groups; some people use mentor surveys.
- Two areas where data has been gathered and information provided for user feedback were in the areas of time commitment (how does the time to complete an OL course compare to the time it takes to complete a face-to-face course; and also what are the obstacles to you taking an OL courses; would they be technology based; would they be school based (is your principal a hard head); does your guidance counselor not want you to do it: does your mom and dad not think it will work - what are those questions.
- This is probably something nobody can answer effectively.
- Obvious answers are integrate tests such as AP exams.
- Are we reaching target audiences or do we have different audiences for OL than you would have in a traditional program? Compare these two could be difficult.
- You can't really answer any of these three questions without answering another question - that is what is success? If we answer it by school or state, we should begin there. Success level might be participation level. Another level of success might be technology exposure. You might not be successful in the course but is it not a level of success if you expose children to technology. For some students, the only time they will be exposed before they go to college is with high schools.
- Can success be defined in terms of access or can it be defined in terms of equity?
- Program measures of success is showing increased diversity.
- Increased buy-in.
- Increased life skills.
- Develop a matrix of stakeholders. We would like to see this, so when you talk about success, depending on whom you are speaking with, you will know which facets of success to cover. Success to a school board member may be totally different than success for a parent.

## Appendix I: Forming a National Organization

### Hewlett Foundation

The Hewlett Foundation is trying to help the community get organized to accomplish things. Cathy Casserly explained that the Foundation would like to enter into a partnership with a national organization.

Next steps would require resources. We would bring a proposal to the Foundation for its October docket. Timeline is early September. The organization must present the proposal. Anticipating this tight timeline, she has been working with Karen Middleton from WCET to lay out the framework in a nebulous form. The organizations input will be included.

Could start out with seed money to plan out how to ultimately finance the organization through a grant to WCET, which would eventually spin off from an incubation period to form it's own non-profit entity.

Basically, the Foundation wants to assist and support the movement and make a powerful impact.

### WCET

Sally Johnstone explained that the formation of a K-12 national organization mirrors what went on about 15 years ago when WCET was started.

The issues are different, but the framework of what you can begin to do when you start working together is not so different.

In 1987 WICHE began planning meetings, and it was founded in 1989.

WCET currently reaches about 1,000 institutions. WCET renders a great deal of services to its constituents, including providing open web resources on technology costing, online student support services, and information on quality assurance and many other online learning topics. They have also formed a consulting service, with a workforce that comes from its membership. WCET is run by a small staff who organizes projects through its membership.

WCET also runs conferences and professional development opportunities, and they host a highly regarded annual conference. The topics they cover are cutting-edge issues that form a framework for bringing its membership and others in the e-learning community together to talk about timely issues.

Many of WCET's larger projects are funded by various sources, such as FIPSE, the Mellon Foundation and the Hewlett Foundation. These projects include a costing methodology project; the creation of a number case books, handbooks, and website resources; an online

student services project called "Beyond the Administrative Core;" the development of a web-based course evaluation tool; and a new website called Edu-tools that identifies and compares product and services information related to educational delivery tools.

Johnstone added that these are all resources that anyone can download for free. We try to organize a project that we can find funding for; we create the materials, and then we give them away. . .

WCET co-sponsored a meeting with SREB this past spring in Washington D.C. that looked at financing and costing. A summary article was published in the March/April issue of Change magazine.

### Advice from Sally

Must come up with an agreement and a set of words that create a vision and the structure of an organization and a few other things that need to be defined, including how are you going to select an advisory board - that is probably the most valuable asset. The individuals who serve on that must be people who can really put some time into it. Even though we all have day jobs, we must take the steps beyond what we are doing.

### Discussion Question

What is it that you want out of this organization? What's the vision? What would be of value to you?

- Would like to negotiate national contracts so that we can get low cost providers.
- Standardization of professional development, so that we can cross state boundaries working with teachers. Want teachers with the proper skill sets, so we must agree on what those minimum standards are.
- A repository of information and collecting and summarizing of information.
- Create a rubric that authorizes a course by saying what qualities it contains beyond the core curricular content standards. It could allow people to quickly look at it and compare it to state standards. A database of that type of information would be valuable for people looking for courses.
- There's a lot of intellectual capital in this group that can be exploited. We need to determine, discuss and agree upon alternative means of distribution and sharing of what we collectively develop. Building some sort of construct is economically compelling for all of us.
- Policy advice. PR commentary. Where does a reporter go when he or she is doing a story and they need a quote?

- Need a place to hold conversations; we talk about listservs, but it is broader than that. Need a vehicle for holding conversations.
- Need to do research summaries. For example, what does a research result mean for a practitioner? This kind of information needs to be distilled.
- Certificate online instruction. This would help people perceive online teachers as professionals; however, many argued that certification on the traditional level never ensured good teaching. So, we need to understand what really makes a good teacher and how to hire one based on other standards that a national organization can perhaps help facilitate.
- Collaborate with other professional organizations to share new information and have a greater role in forming policy and addressing key issues.
- Form a test bed of ideas that enables us to share expertise and determine viability before operationalizing.
- Work together on lobbying efforts and become more visible in the political world (national, state levels).
- Identify foundations interested in supporting VHS efforts. Several states working together have a stronger base for gaining funding.
- Create a steady stream of white papers that could be assigned within the group.
- Form a diverse leadership, and have an advisory board that can be replenished.
- It is important to narrow the focus of the organization. Make strategic decisions.
- Facilitate the sharing of academic materials to a repository of information, course materials and training components.
- The idea that a national org such as this could collaborate on federal grant and private grant money.
- We would want the organization to lobby and educate legislators as well as national education organizations.
- Create one pot to save money in designing curriculum and building technology and building platforms.
- Should conduct research into ways how the various groups could share costs for development, distribution and teaching.
- Work as a clearing house together to develop things and maybe cut down costs of vendor purchases. Work with each other instead of having a middle man skimming off the top.
- Play a lead in doing cost benefit analysis and through white papers talk about successes. Then use these kinds of things to support advocacy.

### Discussion Question

What are you willing to put into it?

- Must have competitors working together and recognizing that they are all going to win in the long run. You must hire a small group of people who will help you work with each other.
- Time investment with active participation.
- A willingness to share information for the development of a repository and contribute models for sharing - from both the content and technology perspectives.
- Develop a money-revenue stream through the organization of a conference and meetings that could bring in dollars.
- Work together toward the development of an open source platform.
- Work together to communicate needs to vendors.
- Will become a local advocate. We are will need to sell this idea to stakeholders.
- Collaborate and share costs of presentations at conferences.

### Discussion Question

What is it you think this organization will have accomplished 10 years from now? What is the story this organization will tell?

- Virtual education will be part of mainstream education and not simply an add on.
- Funding for virtual education would be consistent.
- We will have harnessed resources to empower teachers who are leaders in the use of technology.
- We will have established credibility with the general public through our accomplishments.
- Collaboration will be a seamless activity within this organization.
- Online teacher training will be an integral part of teacher education programs.
- We will have demonstrated that we serve a more diverse student body as well as provide access to all.
- A stronger working relationship with higher education will be in place.
- Students will more easily transition from education to business.
- Standards and quality will drive virtual education.
- Face to face instruction will be improved as a result of quality online courses
- Technology will be transparent and education moves to foreground.
- We will be responsible for truly implementing “no child left behind,” including “no teacher left behind.”

## **Start Up of a National Organization**

Everyone conceptually supported the following vision statement:

“To create an organization to facilitate collaboration, advocacy, and research to enhance quality K-12 e-learning.”

An organizational committee of volunteers was formed and met. Karen Middleton from WCET communicated the following progress of the committee meeting:

### **A. Definition of boards**

Based on Friday’s meeting, three definitions for “boards” came up: a board of directors; an executive committee that is part of the board of directors and selected from within the board; and a senior advisory board that would be comprised of advocates, policy leaders, and “the names on the letterhead.”

The decision-making authority rests with the board of directors, while the advisory board plays some advisory or support role that will be clarified at a later date. These terms were agreed upon for the sake of clarity.

### **B. Creating a process for establishing board of directors**

We need to identify a model and create a process for establishing the board of directors. It was agreed that this should be a task of the planning committee. This should include an initial set of bylaws that documents the process and allows the board of directors to become a formal group.

### **C. Three models will be identified and presented**

Need to identify three models for board structure that will be shared that with the planning committee for review and decision. Models will be sought that represent some of the comments from the Friday meeting’s interest in a diverse and representative group. We discussed geographic/ regional diversity, state, district, and school levels among other ideas. We will locate models that reflect several of the comments made to this end.

### **Proposal: Terms to begin January 2003**

We recommended a target of January 2003 to accomplish the board identification and recruitment process, and the Saturday meeting agreed to the idea that we accomplish items B and C in order to have a board in place by January.

### **Next Meeting or Gathering**

Options:

- Session at CiTE VHS (10/2002)
- Day following or preceding CiTE VHS
- NSBA Teaching and Learning (11/2002)
- Coordinate TIMING with CiTE for 2003?

We discussed the options for meeting, and determined which meetings may be well attended.

There will be a meeting on Tuesday, October 22 in Denver. This is the evening before the CiTE Virtual High School Conference begins its pre-conference. A number of attendees in the planning committee and the larger group were planning to be at this conference. We did not determine if this is a meeting of the planning committee, or an opportunity to work with a larger group of interested folks.

There will also be meeting on Friday, November 15 at the end of the NSBA Teaching and Learning Conference in Dallas. This was originally set to share the outcome of the Summer Institute and to build interest in the idea of a national organization.

We did not determine if there are specific meetings of the planning committee at these two locations. We will convene the planning committee with conference calls for the tasks outlined.

Given travel schedules, it was suggested that we use the October and November meetings as opportunities to gather and share ideas, but we limit any decision-making to a conference call or more formal process.

We did announce these dates to the entire Saturday audience.

### **Communication around proposal**

- A. Confirm a core group
- B. E-mail will be the standard

On Friday, we agreed to communicate around the proposal process, and a ‘core’ group had raised their hand on Friday and Saturday.

Due to the timing of the grant submission, Karen is writing the planning grant in a way that allows for all the major decisions about the organization to be decided after the grant is submitted. This appeared reasonable to the Saturday group. It did not seem reasonable to divide the writing of the grant on such short notice.

For the sake of inclusion, Karen will share information about the proposal to the whole planning committee and you can choose to respond based on your interest. Karen will send something out for review shortly.

We will rely on email to share grant information due to the timeline.

### **Building a Communication List**

- A. Attendees and invitees from this group
- B. Refer other interested parties

Karen agreed to establish a listserv as a vehicle for communicating to all interested parties around the creation of this organization.

Update: Karen has taken steps to get this listserv in place within two-three weeks. Karen also received an overall summary of our meeting that will be distributed and shared with all attendees and invitees. There will be a summary report and notes available as well, and they will come from Francisco and UCCP.

**Below is the Planning Committee List for reference purposes:**

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Matthew Wicks	wicks@imsa.edu	Illinois Virtual High School

**Attendees were asked to prioritize what they want from a national organization, which resulted in the following list:**

1. Facilitate the sharing of courses and course content.
2. Facilitate and disseminate research, identify research needs.
3. Advocate and provide policy advice for legislative efforts.
4. Provide for collection, sharing and dissemination of information and materials.
5. Develop national standards for K-12 online program evaluation.
6. Be the voice of K-12 within the larger e-learning community.
7. Convene yearly gathering.
8. Create quality indicators for K12 online courses.
9. Assist with funding opportunities of K-12 virtual education efforts.
10. Facilitate effective professional development for teachers.
11. Provide public relations/commentary/marketing.
12. Identify future directions in K-12 virtual education.
13. Network with other professional K-12 organizations.
14. Develop comparisons of online platforms/ technologies. Contract for group buying opportunities.
15. Provide a test bed for ideas; determine viability before operationalizing.

