



Leadership Academy

Transcript of Speaker

The Power of Leadership

By: Alan November

Introduction

Hi. We're going to talk about technology and leadership. I bet it's your favorite topic. How much change do you think is coming is basically the only question to ask. My sense, in case you haven't asked this question recently, is we haven't even begun. There's a huge amount in the pipeline that will be in the market in the next couple of years. All books, all video, all radio, all television, essentially every media we now know in a separate box is all going to merge onto the internet – all curriculum, most assessments, kids' textbooks are all going to go to electronic media. It's going to be as big a revolution as the printing press.

The major question out of all this change that's definitely coming is: What's the role of a school leader trying to make sense out of all of this? That's what we're going to talk about.

In the beginning, it's important to sort out what's the vision – Where are we going? Why are we doing this? Is this really a good investment, all this stuff? At the moment, my biggest concern is that it's not a good investment.

There are basically two ways to think about technology from a leadership point of view. The first and most common and least effective is called automating. With automating, you look at what you currently do and you bolt technology on top of it. A



good example is we're using computers as \$2,000 pencils. You send kids down to a word processing lab, and they write a five-paragraph essay, the same one they could have written before the word processing lab was built; and it goes to the teacher with the same assessments, same rubrics, same everything.

Bolting technology on top of existing organization of work in schools actually has been fairly well researched and it only leads to incremental improvement – you can write faster, it might look better, but technology by itself does not improve writing. In fact, this is the good news for the faculty. We're actually going to need more high-quality teaching with technology, not less. The more tools you give somebody and the more information access you have, now you really need to make meaning out of all this massive amount of information. That will be a recurring theme during the presentation. We'll come back to that.

To go on with automating, the test for automating is: Could you deliver that instruction without technology? If you can, chances are it's a low-level use of technology and maybe even quite expensive.

The other way to think about the impact of technology in teaching and learning is called informing. There are three essential questions for leaders to ask to find out whether you're informing or not. One is: Are you giving people access to information they've never had before? The second: Are you giving people access to people? Remember, this is not really technology; it's really a big communication system. The people-to-people part is absolutely essential. The essential question for leaders to ask is: Are there new relationships? New relationships of teachers working together; of



connectivity to family, to the home; of kids working with kids around the world, of online mentors. The relationship question is a really big one.

The third question that comes directly out of the first two. So, if we're giving people access to information they've never had, and if we're giving people access to people, new relationships, then the third question is: Are we empowering people to take more responsibility for managing their own work? I'll give you something to think about. What do you think the trend line is in the 1990s—from 1989 to 1999—of young adults living with their parents? Do you think it went down during the decade – fewer and fewer young adults living with their parents; or do you think it went up? All around the United States, it went way up. We have so many young adults living with their parents that demographers have just named the group the boomerangs. You send them out, they go to college and they come back to live with you. My concern is more and more schools are preparing boomerangs.

Essential Skills for Knowledge Economy

We're going to take a look at the three skills that are probably absolutely essential for survival in the knowledge economy. It's important to keep in mind that we're not just getting new tools. What's really going in our society is we're moving from the industrial economy to the knowledge economy. Here are the skills of survival for the knowledge economy.

Number one, you do have to have access to enormous amounts of information and you've got to be able to get the information you need at the moment you need it. That



requires an understanding of information literacy, which we'll also have to go over in some detail.

The second thing you need to be able to do is work with anybody in the world who needs to be on your team to solve the problem – phenomenal global citizenship skills, understanding different cultures, understanding teamwork, collegiality. Just how do you get things done when you're working with lots of people who are working on different parts of a problem.

The third skill for the knowledge economy is to be able to assess the quality of your own work.

What all of this adds up to is in the industrial economy the whole design of school was to prepare people to get a job. When you get a job, the structure of work is designed for you. You're told this is your schedule, this is where you're going to work, this is how we're going to measure the impact of your work. The discipline, the structure and the rigor of work is embedded in the organization. In fact, if you check this out, most of the design in school creates a dependent relationship on the student to be managed by the teacher. There's actually very little self-directed culture built into learning.

In the knowledge economy, it turns out that it's absolutely essential to be self-directed, self-motivated and to be a team player. By the way, technical skills are not as essential as these three other higher-order skills. Technology is going to change so fast over the next 10 to 20 years that you'll just have to be relearning technology anyway; so the essential skill isn't your technology prowess at the moment, it's your ability to learn



new things over time. By the way, that would suggest that we're spending too much time teaching kids technology and too much time training teachers how to use technology.

For leaders, it's absolutely essential to keep in mind the real revolution is not the boxes and the wires – that's just the infrastructure. The real revolution is access to phenomenal amounts of information, and we need to teach kids to be information literate, and phenomenal, cheap global communication capacity which we haven't even begun to unleash yet.

Capacity for Learning

The opportunity for a leader is to connect kids and teachers and parents into a stronger community of learners. That's where we're going – building community, building capacity for learning. At the moment, the saddest part of the entire story is that the technology is building capacity for the digital divide. In the United States, the rich are getting richer and the poor are getting poorer. At the heart of it are the schools. My concern as somebody who has seen a lot of different programs around equity is that the only way to get to equity is to make sure every family has access to the internet and the skills of how to use the internet right in the home.

Right now there's an amazing movement of home schooling. For a long time, it was underneath the radar, and over the next 10 years my concern is that home schooling is absolutely going to boom because universities like Stanford and various companies are going to provide the entire curriculum online, and parents who can afford it will opt for that solution. In fact, you may already want to check what's happening in your area.



One of the essential leadership skills, again, is to break the boundaries of schooling as the place where learning happens. Learning is going to happen anywhere, and the faster we organize our culture to value that, the better we'll be as an organization to help ameliorate the digital divide. For example, I would set a goal that every single student in high school ought to take an online course. Sending kids out into the world who can't manage online learning isn't fair. It will be the dominant way in which people learn. Whether you're going to Stanford or the Army or a high-tech company or a bank, online learning is going to be delivered right to your desktop, and that will separate you from people who can't manage it.

In fact, that would be essential for leaders too. In fact, you may want to take a course online like this one and encourage lots of your colleagues to do the same, because we have a whole generation of leaders who probably haven't taken an online course. Glad to see you're on.

You might want to encourage this for your teachers as well. Unless we begin to experience this online learning, it will be difficult for us to realize how powerful and liberating it can be.

Build Teacher Collegiality

The other essential skill to give our teachers is collegiality. In the industrial age, the organization of work is by job description and everyone has their own and you do your job. In the knowledge economy, job descriptions blur and people move in and out of helping one another. Education is probably the only business in the United States where people got computers before they got telephones. In every other profession they



got a telephone first. Teaching is probably the loneliest, most isolated job of college-educated people, and it will be the role of a leader to build a sense of team.

For example, for a long time I did at-risk kids, sort of my career in Island Prison School, and for 10 years designed various schools that tried to help kids who were at risk. One of the things I've learned, especially with online learning, is that kids who are school failures—and, by the way, we know that they know this by the time they're in middle school—are much more willing to accept criticism from an anonymous review than their own teacher. If you believe this—and I certainly do; I've seen lots of evidence of this—then it will become more and more essential for teachers to share student work so that the teacher in the classroom is not the one actually directly assessing an essay but that the essay is sent to a colleague who assesses it, and that means the teacher in the classroom becomes the student's advocate so they can make meaning together on the assessment structure of that essay.

That's going to be a very important role of leaders; helping teachers to work together developing a sense of trust. What I'm trying to say is your technical skill, while it's essential that you do email and understand the web, is really only basic. The really important leadership skills of using technology have nothing to do with technology; they're all about changing the culture of learning from a relatively isolated environment to one that's based on the value of people working together.

Information Literacy

Let me breakdown a specific curricula based on information literacy and then communication literacy.



With information literacy, there's actually a grammar to the internet. It's not just information mashed together on the worldwide web. The structure of web addresses; the idea of backward links, forward links; being able to understand the logic of different search engines; knowing how to do a complete analysis of traffic through your own website – these are absolutely basic skills.

If there's one thing that I've learned about kids on the internet, here it is: If it's on the internet, it's true. That's a very dangerous environment to be in. I've watched lots of kids cut and paste stuff off the internet, shmush it together into a paper and hand it in without the critical thinking that's needed when you access the information. Of all the things to teach, even more important than PowerPoint, is information literacy. I would suggest a website to start with, if not mine. In fact, let me give you mine too. That's www.anovember.com where lots is written about information literacy. But you also might want to go to a website called www.searchenginewatch.com where you can learn about the structure and the grammar of the internet—absolutely basic. In fact, imagine teaching people words without teaching them the grammar that hold all the words together. You might know the words, but if you don't know the rules of reading, it's very, very difficult to begin critical thinking.

Information literacy, by the way, I believe should start in 1st grade. 1st, 2nd, 3rd grade. By the time kids are finished with elementary school, they ought to understand the structure and the grammar of the internet. That means that every kid really needs to understand how to design websites. Designing a website is going to be an absolute basic skill.



What worries me today, in fact, is that there are lots of policies that prevent kids from designing websites. If your school has such a policy, at least teach them to design a website within the safety of your own internal network. If you don't feel comfortable that kids work should be exposed to the world, I can appreciate that. But it's absolutely essential to teach kids the basic skills because when they go out into this world of the knowledge economy, your ability to express yourself around the world is going to be absolutely critical.

To give you a sense of this, the boomerang thing I mentioned earlier, web design basically starts at \$100 an hour. Writing a five paragraph essay doesn't start at that level. We're just going to need to build in these technical skills. But the real work of designing web pages isn't technical, it's clear writing and understanding of graphic design and an ability to measure the impact of your website, as I said earlier, through the grammar and the structure of the internet.

It's absolutely essential that leaders identify the family and the information that families need to be the most successful partner they can be in the education of their children. There has been research since the 1960s that indicate family involvement is the number one predictor of student success. In my own kids' school—I've got two middle school kids—they're just beginning to move information to the web that I as a parent need. I need a complete schedule, all homework assignments, results of every test, examples of high-quality student work so I know what we're supposed to do at home, access to the teachers' website to understand their values and their rules, and my expectations should be clearly articulated.



It is an amazing opportunity to use the web to strengthen parent involvement. And if you're in a district that has low socioeconomic neighborhoods, people who don't have the internet at home, we just have to work ever harder to make sure they have access. Whether it's a partnership through the town library, youth groups, churches, any organization where people go, there should be access around town to the school district's website.

Take a look at who's linked to you. By the way, it's a really, really opportunity for school leaders. Essentially every school and every district will have a website, and eventually these websites will become the important marketing that you do to explain to the community and to legislators the important work of your kids and your teachers.

On the other hand, sometimes people will link to a website without telling you, and it will be absolutely essential for leaders to know who is linked into your website. I'm going to give you an example of information literacy that might tie some things together. Copy the address of your website. Go to AltaVista, the search engine, www.altavista.com. Type the word link in the search box with a colon. Paste your web address after the colon. Hit the search command. You will now find every website around the world that is linked to you. Take a look at kids' websites. It's almost inevitable that there are kids in your community who have a website, and some of them are not saying flattering things.

It will be absolutely essential for leaders to be able to, in a sense, read the writing on the wall, the voices of kids. Tracking which kids and which organizations are linked to your school website is an example of leaders applying information literacy to



understand the relationships on your own site. That same skill of doing a link command is absolutely essential for any teacher and any kid using the internet. Knowing which websites are connected into a website gives you enormous perspective on the value and the importance of a website.

Communication Literacy

Enough said for information literacy. Let's take a quick look at communication literacy. One of the things I've learned about kids—and I already said if it's on the internet it's true—but there are two other things. One of them is kids will generally work hard for an authentic audience than the teacher in the room. I've seen this all over the country with kids of all ages. It's absolutely amazing what happens when you use the internet to build authentic audience for kids to present their work.

I'll give you an example. The first time I heard this I was doing some work with the National Archives. By the way, they've got a great website. If you're looking at authentic artifacts of U.S. History, you've got to look at the National Archives website. They have these amazing letters of Jackie Robinson, the baseball player, all dealing with Civil Rights. But he wrote to four different Presidents – Eisenhower, Johnson, Kennedy and Nixon. A teacher encouraged his students to read these letters which really reveal this one man's concept of what was happening with Civil Rights at the time of those four Presidents and to analyze which President had done the most for Civil Rights given the social context of the time.

Rather than assessing his own students' work, the teacher challenged the students to find somebody in the United States who knew more about Civil Rights than the



teacher. In this one classroom, the kids found Rachel Robinson and Rosa Parks, and both of those women agreed to take a look and assess the student work. As you can hear from any teacher who has created authentic assessment, the motivation of kids, their willingness to work hard on documents and assignments that are going to an authentic audience is almost always greater than simply handing it in for a grade.

In fact, we've just underestimated the authentic audience; and more and more teachers will need to understand how to build relationships for kids. The technology skills are important of email, but the really hard work is in building relationships.

Staff Development Design

This will be a good time to take a little segue into the design of staff development. It's my opinion that too much staff development is about technology – how do you turn it on, how do you use the software – and then we're asking you, the teacher, to go back to the classroom and apply what you've just learned in the workshop. Typically what we teach are technical skills. Let's set that aside for a moment.

The important work for staff development again, in my opinion, isn't their technical ability; it's the ability of a teacher to really understand the impact of technology on how kids learn. Here's the emerging model of staff development. We're going to ask teachers to bring two kids with them to staff development. The teacher is going to sit on the side. The kids are going to use the computer. The person running the workshop will actually be teaching the kids. The teacher has a very important role.

Throughout the moments they're in staff development, they're looking at student behavior. Where do students get stuck and what do they do about it? How do students



make their way? How do they navigate through the internet if they're on the internet? What kind of decisions do they make that have to do with creativity? Are they thinking about the information they're asking, they're accessing?

Another thing we want is two kids sitting together because we want teachers to listen to the conversation between them – it's actually very, very important. By the way, another essential observation is gender equity. In this business, there's an overriding bias to support males. Very often, especially at top levels of computer courses, you see women dropping out. All of this starts, by the way, in middle school. It's essential for teachers not only to understand technology but to understand how do we motivate kids who are at risk, how do we help girls access technology in the same way that boys seem to do it naturally, how do we understand learning styles around technology, how do we understand kids with special needs. That's really the work of teaching – understanding children.

My concern as I watch workshops in various schools is there's not as much of that and, instead, we're doing more training. In fact, I would suggest teachers don't even need to learn a lot about technology; eventually you can just send kids to the workshop. Have the kids come back and teach the teacher right in their own classroom. What all of this means is that we have to create trust. The teachers have to trust that kids can learn faster than an adult, and that staff development, teaching teachers technology, should not be a bottleneck of using all this stuff but should really be an opening of understand kids.

One of the things leaders are going to need to ask is: What's our balance in staff development of technical skills—teaching teachers how to turn it on, use it—compared to



pedagogy and understanding kids. I believe those things should be in balance. You might just want to check that out in your own district; what's going on there.

Build in Teacher Pedagogies

By the way, I do think there are two essential pedagogies for teachers that leaders may want to consider building in.

One is the Socratic method. Our kids are going to grow up in a world where they're going to have access to information right on their bodies. The cell phone is eventually going to be the computer accessing the internet. We're not even going to have computers as we know them now. Teachers who can ask kids powerful questions on using the information is going to be an absolutely essential pedagogy. If you can invest in the Socratic method, I would do that.

The other essential pedagogy, as I've been saying, is teamwork - teachers working together and teachers helping kids work together. For example, in New Jersey there is a collaboration going on between some of the wealthiest suburbs and some of the poorer inter-cities around student writing, where kids are writing together. We're going to need to see a lot more of that. When I walked into this school after school, the kids were on live video working together in different schools, producing very powerful writing. That's a sense of expanding the concept of school. Every school ought to have videoconferencing centers that are used when kids work together with other kids around the world. And we'll do the same thing with teachers, as well, in terms of staff development.



Teachers will really need to understand the family, another essential skill. How much information should families have? In terms of the development of software, eventually parents will have access to a daily report card instead of one that comes out four times a year. With access to a lot more information about how well their own students are doing and expectations of the teachers—what my own school system is doing nearby—comes a sense of balance. How much information to the family becomes too much? These are going to be essential decisions that leaders make.

Right now there's probably a deficit, but we can go overboard. I'll give you an example. Imagine one day that one of your teachers comes to you and says, I want a live video camera in my classroom so my kids can present their work to other kids in Singapore or Australia. And I also want parents to come in while these kids are presenting, whether they're at work, and actually be able to see their kids in my classroom do the work they're doing. The teacher will tell you, I think that will add motivation.

I happen to think that's a good thing. I want parent involvement. But we have to be very careful that constant access of people around the world into our classrooms crosses a boundary of privacy, and that's going to be the tough decision leaders are going to have to make. When do you balance the need of a teacher who wants to be creative and really motivate kids to do their best work by building relationships, and at what point does a leader say, We have issues of privacy and security and we don't want to cross those boundaries.

The software for this can be very judicious. You can create community, whether it's local or global, by password protection. You can give a password out for a day, for an



hour so that only certain people come in. Don't think of the internet as being totally on or totally off. There's actually all kinds of ways that we can create limited access. By the way, I do think we're going to have lots of teachers who eventually are going to overcome their fear of opening up their classroom, who will start demanding. The very people who are now recalcitrant will start demanding that kids have access to the world.

Managing Fear & Hope

Let's talk about managing fear, because of all of the barriers I've seen of using technology well in the school, there is one. It's not even money. Very often technology won't be used to its own capacity in a school that you already own. The number one barrier that I see is fear. Any adult who has fear probably isn't thinking in the most creative way about using the very expensive tools we're buying. The default of fear is to automate, to do what you always did.

One of the essential leadership skills is going to be to help our colleagues manage fear. I'll tell you what I've learned from the research. It's absolutely essential for a leader to validate fear, which may sound counterintuitive. But if I'm holding fear inside of me about using technology, chances are I'm not going to tell you I'm afraid. I'm just not going to do it when my door closes to my classroom.

Here's an activity you may want to consider doing to get the fear out and validated. I do it with Post-It notes, two colors. Pick green and blue. One day have a meeting. I suggest maybe 25 people in elementary school or a department in a high school and ask your colleagues what is your worst fear about using technology. Let's pick a color, blue, to write down the worst fears. On the other color, what's your best



hope. What do you think technology will do for our kids that is absolutely essential? One of the things I've learned about fear and hope in every school where we've done this, there is more fear than there is hope.

Once the fear comes in on these Post-It notes—and it should be anonymous so people feel safe about expressing their fear—it's the role of a leader to take a look at the pattern of fear and to acknowledge it and discuss it openly.

There are various strategies we can use to minimize fears. For example, perhaps the most common fear of teachers is that kids will lose social skills; they'll get sucked into this box of the computer, they'll go to their room after school, they won't go to the playground, they're going to lose social skills. I have that same fear. I've gotta my own kids off the computer and on the soccer field or just out to the beach, because this is a mesmerizing technology for children even if it's not for adults.

You validate the fear. Typically, in a faculty a hope, a corresponding hope, will be that we'll be able to connect more kids to more relationships around the world than they've ever had before. We have a fear of losing social skills and we have a hope of more connectivity than ever. As you collect the fears and hopes of your faculty, you'll be able to draw these connections, a fear and a corresponding hope.

One suggestion, as you produce this list of fear and a list of hope, make it public to the faculty, and every six months review the list of fears and hopes so that you are promising, making your faculty a guarantee that the fear they have now of all of the things that can go wrong which will slow them down is something that you will review



every six months to make sure that the school is right on top of the deep concerns of the faculty. Absolutely essential.

This is an example of a nontechnical skill for a leader – managing fear and hope. On the other side, you'll have teachers who have no fear. All they want is to take as much risk as possible. They've decided that technology is their kids' future, and that we haven't even begun to tap the promise and now is the time to experiment. Being able to support risk-taking teachers is absolutely essential.

In fact, one of the things you may want to do—because I've learned that very often a risk-taking teacher might be the only one, especially in a small district, a small school. The other faculty members aren't always gung ho about what this one teacher wants to do. What you may want to suggest to this person is to find other school districts' websites where the work they want is already being shown and have them get in touch with these other schools, building a sense of a partner outside of the faculty. That's increasingly going to be important that teachers who see each other every day have a sense that there are lots of teachers in the world and that I can build my supporting community even beyond the district I'm in.

It's a terrific idea for leaders to encourage teachers to do careful research of what's already out there, what schools have already experimented with these new ideas, for example, video in a classroom, so that we can actually talk to people who are doing it and build these relationships. It's also a good way to hook kids up with kids as teachers explore these new risk-taking activities with technology.

Online Learning – Part 1



What I'd like to do now is talk a little bit about online learning. As I mentioned before, I just think online learning is going to be the biggest impact. Today I would set a goal that every high school kid should take an online course. Within two or three years, we're going to be setting that goal for every middle school kid, and eventually we will set this goal for every kid.

You may want to check out a website, as an example. Stanford has a website, kindergarten through university, at www.epgy.org - Education Program for Gifted Youth. If you explore this site, you will see that the entire curriculum, at least in mathematics, is already available in kindergarten. By the way, it's my sense that kindergarten kids don't even need as much training as high school kids; they just seem to take this naturally while high school kids actually need more training. Don't be prevented from thinking that online learning is only for the older kids. Eventually, it's going to go all the way to kindergarten.

This would suggest that we really need to teach parents how to be good tutors and managers of online learning because a lot of it's going to be in the home. Setting up a parent support group, mentorship programs for parents, workshops for parents to come to school to understand online learning. It looks like the role of the family in online learning is even more important than face-to-face, because so much of it is going to be in the home. A list serve for parents is probably not a bad idea.

Identify Best Practices of Teachers

The other way to support the beginning of every teacher moving their curriculum to the web from a leader's position is to think about the opportunity for you to publish



every teacher's best practice on your website. I've learned that teachers who have a district who value their work and identify best practices of teachers and it's on the web, have teachers who are much more willing to use the web in creative ways than a district that doesn't have teachers work on the web. Again, this is a role of a leader. Think about identifying the best practices of every teacher.

I'll give you an example. Recently, I was working with some districts in Missouri. One of the districts did this link command I suggested to you earlier where you find all of the websites in the world linking into yours. One of the websites they found was the United Nations using that district's website as an example of high-quality work of teachers sharing their best practices. By the way, can you imagine discovering that the United Nations is using your district's website as a global example of high quality. Without information literacy, that district wouldn't even know the United Nations is doing that. That's just another plug for leaders to become information literate.

Understand Flow of Information

One of the things that's absolutely essential for leaders is to understand the flow of student information. That's where technology possibly could have the biggest impact within the district as we now know it to be.

The Enterprise software that's now being developed will give you an ability to understand where every student is on every rubric of every standard up-to-the-minute. As we parse this data, you're going to be able to see patterns of which classrooms have the most success in various aspects of the curriculum, and your decisions are going to be



based around how do we help teachers who clearly are not succeeding in certain areas and how do we share knowledge of teachers who are.

The other decisions are going to be based around family access. We talked about this a little bit earlier. How much is too much? My sense now is we're out of balance with not giving parents enough information. I certainly want to know how well my kid is doing every day. That's what I would ask for.

One of the things you want to invest in is Enterprise software. Take a look at packages that give you complete statistical analysis of all of your data.

As we buy textbooks and other curricular resources, things are going to be linked together. Buying a book is going to be linked to assessment, thousands and thousands of exam questions on the web. You're not just buying the book, you're also buying assessment. The analysis of the assessment will lead back to improved curriculum overnight. We're going to be moving from a static paper-based technology that doesn't change—textbooks might change every 10 years, I don't know how often you change textbooks—to one where literally the curriculum, while we're sleeping, will be upgraded based on the results of student work. It's going to be a night-and-day phenomena where technology is really going to work continuously to improve curriculum and instruction.

Don't forget, all of this is going to be available online as well. Some of the systemic issues that are going to arise is: Do you make every student come to school and sit for every course? Are we going to have very different policies of measuring student impact? State legislators and how schools are funded constrain what some districts can do. I can understand this. But we're going to be in a position where I think state



legislators are soon going to figure out that there might even be a cost savings involved by moving a lot of what we currently do in school to the home – before school, after school centers; summertime; a whole use of time and space is up for grabs.

The essential skills that I'm building up to, to the role of a leader is to determine are the boundaries we have of time and space in our way of delivering the best instruction, or do we want to preserve them. I'm absolutely convinced that the capacity to move curriculum and assessment and analysis to the web is going to mean that we just don't have to be in school.

The downside of this, the default, the worse case, is that schools that don't change and require everyone to be sitting in a chair listening to the same lecture are going to be losing business to the Stanford Universities of the world; they're going to provide on-demand learning in the home. It's a very serious concern. In fact, I'm convinced that one of the counterintuitive ways to protect our value of public education is to actually be building learning; that the public schools do that directly, and that we offer a wide range of learning opportunities for our families rather than cutting out the home schoolers which has been our tradition. I want those people back in the public schools. It's just a value I have. You'll have to decide what your own intuition suggests that you do, but thousands and thousands of people are now opting for home schooling. The upside curve, it could really alienate and divide our culture.

Online Learning – Part 2

The other systemic issue is to offer university courses to high school kids. It would not be unusual today for high school students, on their own, to sign up for



university courses and gather up to two years' of university credit so that you're starting your university with a huge jump compared to what I would have done. I never would have imagined taking a university course online when I was in high school.

You may want to take a look at that boundary also – that high school stops and then university starts. That will be less and less important, and we're going to need leaders who recognize that university experience is something you may want to do while you're in high school. Especially for at-risk kids. Don't do this only for the kids who are highly successful. If I'm an at-risk kid and I don't think I'm going to college because I can't handle it, and I don't do well in high school, obviously, it turns out I might do very well with an online learning course at a university; and now I'm going to want to go to college. Be very broad about your opportunity of giving kids enriched programs – it's not just for the top kids; it could be for a wide range of kids that today we would call at-risk and never imagine they're going to college.

This can be fun, in fact, when you think about the opportunities. Let me reinforce this. The anonymity of the internet where your work is being judged but as a person you're not being judged, that can be a very powerful experience for a kid who has been judged all their life. When you can remove personal judgment with technology, all of the sudden we can see some kids succeeding who wouldn't in our everyday, face-to-face classrooms.

This doesn't suggest that you're going to be only online learning. I think there's going to be a very healthy combination. It's going to be face-to-face where teachers teach us to apply what we've learned, and online learning increasingly will deliver what we



now call content – the basic facts, equations and mathematics, the stories of history. But the application of knowledge is going to be something you go to school for. In this regard, the role of teaching will be more important than ever.

The Vision

The vision that all this leads up to is that we're going to be producing fearless learners – people who can learn anytime, anywhere and with anybody; kids who are self-directed, self-motivated; students who understand how to measure and take increasing responsibility for their own quality. Ultimately, what all of this means is that there's going to be a shift of control from the teacher managing learning, for 25 kids doing the same thing at the same time, to a much broader and deeper learning environment of kids who are self-directed, self-motivated; and where the software built into the internet absolutely knows what different kids need at different times; where parents have access to that quality information; and where teachers are working together rather than in separate classrooms collaborating to help kids in a way we couldn't even dream of today.

The essential skills of the leader aren't technical. They are the skills of changing the culture of teaching from a relatively isolated culture of boxes lined up down a hallway, where time and space are highly prescribed, to a culture that gives you access and freedom beyond anything we could dream today. The essential skills, once again, they are not technical; they're being able to manage this transition from a culture based on success in the industrial economy to one based on success in the knowledge economy.

If you want to check out whether this is a change in culture, just find out how many young adults in your community ages 18 to 30 are living with their parents. That



should be an indicator of how many boomerangs we're producing and whether or not we want to change this culture. It will be an incredible 10 years. Hang on to your seat. Bye for now.