## BACON'S REBELLION The Op/Ed Page for Virginia's New Economy

## **Education for the 21st Century**

As Virginians embrace lifelong learning, children will no longer progress in chronological lockstep, study a mere nine months a year and confine their education to school buildings.

By James A. Bacon

Talk about misreading your audience!

Early this month, I participated in a panel discussion at a conference of workforce services directors from across the Virginia Community College System. The people in the audience seemed like nice, comfortable, middle-aged folks -- co-opted, I imagined, by Virginia's massive educational bureaucracy and hardly the type to rock the boat. Insofar as they thought about educational reform, I figured, they'd reflect the sincere but cautious sentiments their bosses express in op-ed pieces seen in Virginia's newspapers.

In sum, the workforce services directors seemed just like the type of people I like to set squirming in their seats. So, I gave 'em a dose of the ol' Rebellion. The educational system in Virginia, and the rest of the United States, is a relic of the industrial era, I said. The apparatus is outmoded and poorly adapted to the knowledge economy, I argued. What we need to do, I told them, is reinvent the entire system from top to bottom.

I braced myself for disbelief, even defensive hostility... Instead, I got the biggest applause line of the panel discussion. After the program, several workforce services people came up to chat. As I found much to my surprise, many professionals in the front lines of Virginia's educational system think much the same way that I do. We just don't hear them because they aren't the ones articulating public policy goals .

Maybe it's time we paid attention. Workforce development is



one of the greatest challenges that Virginia faces in a globally competitive economy. Businesses rely upon the productivity, knowledge,

creativity and the problem- solving abilities of their employees to retain their competitive edge. Once upon a time, the U.S. had the best educated workforce in the world. That advantage is fast eroding. As Virginia evolves towards a 4.0 economic development strategy organized around the development, recruitment and retention of human capital, we must scrutinize the institutions entrusted with the task of educating our citizens, preparing them to participate in a civil society and equipping them to contribute to the economy.

Our dominant educational institutions -- K-12 schools and fouryear colleges -- originated decades ago to churn out the workers and managers required to run an industrial economy. No longer are they suited to a fastmoving knowledge economy in which knowledge and skills are rapidly outdated and must be continually upgraded. Educational reformers speak about the need for "life long learning," but the mechanisms to provide that learning have yet to materialize.

The educational reforms we've seen to date are no more likely to improve educational performance than squirting a garden hose will dampen a California wildfire. Virginia's Standards of Quality (the SOQs), which measure and mandate staffing levels and other inputs into public schools, are soaking up prodigious amounts of money with little to show for them. The Standards of Learning (SOLs), which measure test scores, have generated only modest gains at the cost of endless controversy. Gov. Timothy M. Kaine thinks the answer is extending school to pre-K day care, ignoring the fact that the gaps in educational performance between American children and those of other countries is narrowest when they start Kindergarten and widens the longer they stay in school!

I once thought charter schools and vouchers were the solution. No longer. Private schools may provide an escape for a privileged few from the failures of public schools, but they are not a society-wide answer. Private-school tuitions generally run twice the average cost of public schools. The Commonwealth of Virginia cannot possibly afford to double educational spending over current levels. And even if it could, the private school model cries out for an overhaul

almost as much as the public school model does.

Think about it: We segregate children by age cohort, then we march the cohorts through a rigid curriculum in which every child is expected to master the same body of knowledge and achieve the same thinking skills as every other child -- regardless of the fact that children do not develop their cognitive capabilities in chronological lockstep. My five-year-old nephew, taught by his mother to read at a thirdgrade level before entering kindergarten, finds himself bored by a curriculum in which his peers are still mastering their A, B, C's. What a waste. He ought to be progressing to fourthgrade reading, which is no more possible in a private school than a public one.

Think about it: We organize school in school "years," in which children spend three months of intellectual idleness during the summer, forgetting half of what they learned the year before. Why do we still do this? So children can help their parents bring in the harvest? So Kings Dominion and Busch Gardens don't have to hire as many H2-B visa kids from Poland and Romania? So society can provide graduate. Instead of flunking summer work opportunities for day-care providers and camp counselors?

Think about it: We make children spend endless hours sitting I always wondered, why such at attention in classrooms -- a task that little boys especially are manifestly ill equipped to do. Then, when the squirmies disrupt class with their talking and spitballs, we label them as with Attention Deficit and Hyperactivity Disorder -- a phenomenon virtually unknown two generations ago -- and drug them with Ritalin. Well, that's what happens in private schools. In public at an educational model that is schools, kids just fail and repeat fundamentally mal-adapted to

grades until they drop out -unless they're given social promotions, in which case they still fail until they drop out.

Think about it: Virginia's elite public universities are incredibly selective about who they admit. Only a small fraction of applicants are offered a slot. But what do college administrators do to ensure that the best and full advantage of their education? Virtually nothing. Offered unlimited freedom with minimal supervision, many students treat their college years as a four-year bacchanalia.

I'll never forget taking a course in West Indian history during my ter one level, they will move to fourth year at The University. The class, taught by Barry Gaspar, a West Indian professor, was a fascinating seminar on the faster in some subjects, some interaction of race, culture, the sugar trade, plantation slavery and early capitalism. There were two frat boys who didn't take the class seriously, attended only a few classes -- usually hung over -- and miserably flunked their final exam. Dr. Gaspar gave them F's, which they richly deserved. But the frat boys pleaded for mercy: If they received F's, they wouldn't their miserable, privileged white asses, the kind-hearted Gaspar gave them D's -- good enough to collect their sheepskin.

derelicts should take up scarce space at U.Va. How many kids were rejected from U.Va. who would have made so much more of the opportunity to learn? There seemed to be no sense in a college experience where kids went to party for four years rather than study.

Rather than throw more money

the demands of the 21st century, we need to radically restructure the way we educate both children and adults in Virginia.

I'm not an educational theorist, so I can't tell you what the educational system of the Knowledge Economy will look like, much less how we'll transition to it from the dysfunctional morass brightest of Virginia's youth take that we have now. But I suspect it will entail some of the following:

> The end of age cohorts parading through 12 distinct grades. Children will be required to master specified fields of knowledge. When they masthe next. Individuals will progress according to their individual abilities and aptitudes, some slower. Grades comprised of students all the same age will become a relic of the past. Classes will be comprised of students, regardless of age, at roughly the same level of academic mastery of the subject matter. Brighter students might meet their high school requirements by age 16 or 17. Slower students will take longer.

> The end of nine-month school years. There is absolutely no reason that children should call a halt to learning for one quarter of the calendar year. That idea might have made sense 200 years ago when the corpus of knowledge was more limited and children were needed in the fields. There is no justification for such cognitive time-off today when there is so much to learn and so many skills to acquire in order to compete in the global economy.

The end of "schools." The obsolescence of chronological grades and nine-month school years suggests that there may

be a limited future for focusing all educational activities in a single geographical location known as a "school." The future can be glimpsed in two-plus-two programs in which students supplement their high school classes with community college work; in In the future, people will learn home schooling, which is increasingly a misnomer as parents engage in collaborative schooling; and in long-distance learning, in which teachers interact with students over teleconference-enabled PCs.

The rise of free-lance teachers and professors. The Internet can connect teachers and students without regard to physical location. Not only will students break free of geographic limitations, so will teachers, professors and other instructors of defined fields of study. As educational free agents, the best teachers will enroll their own classes: teaching over the Internet perhaps, or in their own homes, or in public spaces like the ancient Greek athenaeum.

We can get a glimpse of the future from companies like The Teaching Company, which sells great academic lectures on DVDs. For \$99.95, you can buy a set of DVDs containing 36 lectures by Kenneth Harl, Tulane University, on the topic of the Peloponnesian War. Other featured courses on the company's home page include, "Understanding the Brain," "Zero to Infinity: A History of Numbers," and "How to Listen to We need more freedom for stu-And Understand Great Music."

Just-in-time education. Given the rate of knowledge obsolescence, people will get serious about life-long learning. At the same time, people will acknowledge that much of what students learn in college today is utterly wasted. They learn languages, read books and master

bodies of knowledge which they will never apply for the rest of their lives. (I, for one, have a sublimely useless degree: a Master's degree in African history!)

the competencies they need, either to succeed in the marketplace or to pursue personal fulfillment. The border between school and non-school will blur. Those who seek to improve themselves will always be learning something. But time and money are scarce, so they won't necessarily master knowledge in three credit-hour chunks and 60 credit-hour degrees. People will learn what we need to know, when they need to know it.

There will still be a role for government in this vision of the educational future. Some entity will have to define minimum levels of competency for all citizens, and some entity will have to ensure that all citizens have the means to obtain an appropriate education regardless of their family circumstance. But government does not have to be -- indeed, should *not* be -- in the business of delivering educational services.

Virginia needs more educational freedom, more liberty, more creativity in teaching methods, more technology, and more innovation in organizational models. We need more entrepreneurs and fewer bureaucrats running our educational system. dents to choose what, when and how they learn, and less toptown diktat by politicians and bureaucrats. In sum, we need to free the educational sector to evolve in radical new directions and the wisdom to see which ones work best.

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