

A commodity is a relatively inexpensive, widely available product or service.

Modern technologies drive more and more goods and services to become commodities after an initial period in which they are expensive and owned by only a few. Computers, HD televisions, and cell phones are current examples.

Companies in developed countries often attempt to market their products and services as “special” in some way and not as commodities. Only thus can they charge more and earn more profit, since commodities are the source of stiff price competition and low profit margins.

Today most college degrees are commodities. College courses and credits have long been standardized. Colleges can and do distinguish themselves by status. Since courses, credits, and the basic format of a college education are standardized, these high-status colleges can only charge premium prices by claiming their faculty are better and their students are smarter (or richer) or that they have august histories.

Until recently, there were basically two types of colleges: inexpensive but no or low status colleges and expensive but higher status ones. The former were commodities and the latter were special products. There is one wrinkle, though. Thanks to state subsidies, in the past some colleges were inexpensive but high status (e.g., the University of California at Berkeley). Offering special products at commodity prices violates today’s current free market principles (“neo-liberalism”) and, in any case, state after state has raised the cost of all public colleges.

Today, many commodity colleges are over-priced thanks to a loss of state subsidies and the cost of research-based faculty. Let’s call these “old commodity colleges”. Intense competition is occurring and will increase. This competition comes from for-profit colleges, distance degrees, and cut-rate extension programs operated by many colleges far from their home campuses. Let’s call these growing competitors “new commodity colleges”.

To the extent that an old commodity college carries no great distinction and is more expensive or less convenient than a new one, it will eventually lose in competition with new commodity colleges. These latter can be cheaper and can be run more efficiently by evading many of the constraints old commodity colleges face because of lower course loads, higher salaries, and tenure.

Old commodity colleges will be caught in a bind. They already lose top (and top paying) students to specialty colleges that can offer prestige at a high price (and have little need for innovation, since prestige will do). One new threat from such elite colleges is that they will, more and more, offer relatively cut-rate distance or extension versions of their degrees and name. This will allow more students to evade old commodity colleges and gain some (though reduced) prestige.

Old commodity colleges will lose other students to new commodity colleges which offer low cost, flexibility, and customization, though no prestige. Why pay premium for X-State College when you can get the same standardized content and credits—often in a more flexible and customized format—from a cut-rate competitor?

What is an old commodity college to do? Does it have any advantages over the competition? Yes. It has beer nearby in the local college town and it has warm social bodies in the dorms. These are two things e-learning cannot supply. Undergraduates—the people who pay the bills—want socialization with other students. But this is not much of a leg up when it is only coupled with today's standardized courses, credits, lectures, and majors. There are other ways to get beer and bodies.

So, beer and bodies are not near enough. One thing an old commodity college could offer is socialization that goes much deeper than beer and bodies. Such a college could offer learning-centered, collaborative, problem-focused, passion-driven social groups with a shared mission. More on this later.

In my view, many old commodity colleges will survive only if they become specialty products. But they have to become specialty products of a special sort. Since, for the most part, they cannot offer the high prestige of elite colleges, they must either stay close to commodity pricing (while offering more than a commodity) or offer some other type of distinction than the prestige of elite colleges.

As old commodity colleges become new specialty colleges, they must remain place based. Indeed, they must greatly enhance their place-baseness by creating a distinctive and alluring physical and social space devoted to learning. Yet they must also bring the virtual, the imaginary, and the distant world into full interaction with this real place-space. This mixed model, mixing the real with the virtual is a big advantage over new commodity colleges that offer only e-learning or unattractive physical spaces and shallow face-to-face social spaces.

Collaboration and collaborative problem—forms of cognitive socializing, the mixing of minds and not just bodies—have to be at the center of the college. Collaboration can no longer be seen as a form of cheating. Today's young people want to learn and play socially. Today's workplaces want people who can collaborate on teams that are smarter than the smartest person on them.

Finally, and most importantly, standardization must go. Standard courses, credits, disciplines, and majors need to disappear. So do grades. Grades are, in any case, meaningless in an age of grade inflation. One thing that most certainly must change is time. The goal has to be mastery not the time it takes to achieve it. It matters not whether a student with a good head start or lots of time masters something in six

weeks and another student, without such a head start or time, takes six months. What matters is commitment to mastery.

Now claiming that the goal is mastery is controversial. We are all aware that many students today view college more as a social and networking experience than a cognitive one. So, it will be tempting for old commodity colleges to offer “camps” for young people, with college work a not too serious side attraction. Indeed, many colleges for many students today are just this. But this is neither a moral thing to do, nor one that will lead to much profit for most colleges, since setting up good camps is actually another business altogether. Creating good camp colleges can be—and will be—done better by entertainment organizations.

Here is a well-kept secret: deep learning is a drug for humans. It is as attractive and addicting as real drugs and sex. It fills a primal need in humans. Schools have obscured this by making learning noxious, as they would with sex if they taught that. However, out of school, popular culture has learned that learning is sexy and sells. Popular culture activities like the card game Yu-Gi-Oh and the video game Civilization are as complicated and hard as anything most kids see in school these days. They require effort, commitment, persistence past failure, lots of practice, and eventual mastery. They also make tons of money.

Now this is the new product old commodity colleges could offer: Allow students to recover from what schools have done to them. Allow them to engage in learning and mastery as addictive as good video games. Allow students to rediscover their learning muscles and rediscover (something they knew as babies) that learning is, along with sex and food, a primary need. Allow them to find new identities as producers, knowers, and movers and shakers in the world. This is a different sort of camp.

Old commodity colleges cannot offer the prestige of elite colleges. But they can offer a “specialty” customized education that elite colleges need not. And then they can beat the e-learning colleges through building a face-to-face community worth being in that still draws fully on the virtual, the digital, and the distant. Let’s call such colleges of the future “new specialty colleges” to separate them from the old specialty colleges like Harvard, Smith, and Vassar.

This niche is virtually unfilled. So, the first colleges into it will thrive. However, given the inertia of colleges and the lure of standardization, the niche may never be filled. In that case, the day may come where Kaplan (new commodity colleges) and Williams (old specialty colleges), and their respective ilk, will be the last colleges standing.

There are lots of ways colleges could innovate and we should encourage lots of experimentation. I do not want to propose one standard way to engage in innovation. I will, however, make some suggestions about one shape innovation could take. But first

let me say that like most innovation, there is an initial high cost to development and implementation. After that, costs go down and will, indeed, be significantly less than today's old commodity colleges, especially those with lots of research-based faculty.

Let's call the college I propose "New College". It could be any old commodity college with vision and guts. First New College tells its students that there are billions of things worth knowing and studying in the modern world. Furthermore, information and knowledge transform rapidly in the modern world. The old model of education is based around everyone knowing the same things: "What every educated person should know". This model is profoundly out of date and never worked that well anyway (All Americans do know the same thing about science, for example, namely nothing).

At New College, every student must find his or her passion or passions. In the domain of their passion, students will work with others to achieve mastery. This will require "grit": passion plus persistence. Students must also demonstrate that can teach others in their domain of passion and that they can create new learning tools for people in that domain.

They must demonstrate, as well, that they are prepared to learn new things from others who have mastered other domains of passion when they need to. That is, they must show they are expert learners and well prepared not just for future learning but a lifetime of new learning and mastery. Finally, they must demonstrate that they can pool their expertise and mastery with other people to engage in collaborative problem solving that requires a team with different specialties but the ability to integrate skills and domains of passion (areas of expertise).

The old model was about everyone knowing the same things so that people could share some common ground as citizens. The new model is about people sharing abilities to learn, teach, listen, and collaborate. Arguably these are the foundations for national and global citizenship in the 21st Century.

New College will ban classes or courses. It was never the case that everything worth learning could or should be taught in the same time-frame and format. Courses are based on professors giving students information they can now look up in minutes on the Internet (and often find out, in the process, that there is more controversy than the professor told them). Courses are based on the idea that because a group of students is sitting together in the classroom they all need the same thing and can proceed to learn in the same way. This is next to never true.

New College will ban majors. Majors are usually named by discipline labels like anthropology and biology. These labels now name only budgetary departments, not coherent fields of study. Real disciplines are lower-level units (e.g., medical anthropology or genetics) than academic departments.

Furthermore, as we all know, there are today a great many new disciplines and sub-disciplines arising all the time (in part caused by changes in technology). And a great many of the most productive faculty do not work “in their discipline” alone but as part of teams that do not just pool different disciplines but integrate them into new forms of shared language and methods of inquiry.

New College will ban grades or make transcripts with grades on them only for the convenience of students seeking to go on to traditional graduate programs. People do not develop “grit” (passion + persistence) because of grades and grades can kill passion. Mendel was in the monastery garden growing peas and discovering the foundations for modern genetics because he had failed the qualifying examination for teacher certification.

New College will know that failure is necessary to learning; it is often something to seek; and never failing is a sign of a domain not worth learning. A low cost of failure encourages risk taking, exploration, and hypotheses testing. All are necessary for innovation, as well as for deep learning and mastery. New College will never punish failure. It will only punish a lack of persistence past failure, a lack of effort, a lack of being proactive about more learning (including at times seeking more failure), and a lack of collaboration. In turn, facile successes will not be rewarded at New College.

Courses will be replaced by Missions. A Mission is a large challenge that requires learning new specialist knowledge and skills. It is centered on problem solving. Each Mission is made up of a series of Quests. A Quest is a specific demand to collect information and knowledge and to develop skills in order to solve a sub-problem that is part of the challenge of the Mission.

There are Missions in many different areas. Missions are meant to expose students to areas where they may develop a passion for learning. Missions do not have to be “academic”, though, of course, they can. All of the following could be Missions: Design a 3D video game that could teach someone something important. Develop a new professional urban plan for a part of one’s city and defend it to real urban planners. Develop a functional approach to grammar that is theoretically correct but could be used by teachers in school. Use mathematics and programming to ensure that a virtual car is programmed to race on any track of any shape. Develop a simulation that both reflects scientific knowledge and also teaches the public how to think about a complex issue. Develop art that speaks aesthetically to people but represents mathematical principles that one can explicate using the art. Use different methods, qualitative and quantitative, to analyze a large corpus of talk and text about current politics in the United States. Using multi-media, clearly explicate for a popular audience the changing understanding of genetics from Mendel to contemporary biology, with due regard for controversies, new discoveries, and changes in technologies.

Any Mission would be made up of a number of Quests (some of which would be optional or elective). Quests focus on a specific skill or on knowledge that one needs in order to solve a sub-problem of the big problem that constitutes the Mission. Or a Quest teaches one how to think about or approach parts of the solution of the big problem.

Since Quests involve skills, knowledge, information, and the use of inquiry methods they can and should be shared by a number of Missions. If there are understandings and skills needed across a number of Missions, then these Missions would have some Quests in common. For example, students will need certain technological, technical, artistic, literary, and writing skills across a number of different Missions. Missions on urban planning, the causes of economic recessions, and sustainable agriculture might all require certain common Quests dealing with economics.

Quests would often be carried out collaboratively by a team of students working together. Since many Quests would be shared by different Missions, students in one and the same group may be working on different Missions and have different passions. They may well have done different Quests and Missions from each other and therefore can and should teach each other, as well as learn from each other.

In every Mission, there is one common final Quest. This Quest demands that students upon completing a Mission must design (often collaboratively) a new Quest for that Mission or re-design a current one. As part of this Quest they have to test their designs and use their new or redesigned Quest to effectively teach others by mentoring them in the Quest.

Quests could take many forms and students would be offered different resources to do them. There would be lectures, mentoring, and recommended texts given “just in time” (when students can put them to use) and “on demand” (when students know they need them and why to make progress). Many quests or parts of them would be done digitally through the Internet, artificial tutors, artificial agents, and e-learning. Augmented-reality tools and the full array of social media would be used to get students working face-to-face, at a distance, in the real world and in a virtual reality as part and parcel of one Quest.

Any Quest or Mission could be finished at any time and take as long or short a time as needed. When and how Quests and Missions are completed, time-wise, would be determined by students’ needs, backgrounds, and the demands on their time, as well as social negotiation within collaborative groups students have chosen to join.

When a student finishes a Mission, the student can be given “course credit” if need be. But, more importantly, the student would get a “badge” for each completed Mission and each completed Quest. The badge (much like a boy scout or girl scout badge)

would be labeled to clearly indicate the skill or insight the student has achieved. Each student would have a “passport”. When the passport filled up with badges, the student would be granted a degree.

There would be no majors. Rather, advisors/mentors would work with each student to help them craft a coherent and integrated passport that reflected their passions and how they wanted to display their skills and achievements to the world. Each student would, in that sense, design their own major, not around a disciplinary or department label, but around a coherent and integrated family of Missions and Quests, whose coherence the student can articulate. The passport would also clearly show employers what students had learned to do at a level of real mastery.

Missions are thematic. They are challenges. They are meant to allow students to discover a passion. Missions draw on a large set of often mutually used Quests. Quests could and should take many different pedagogical shapes to speak to the different styles, talents, and needs of students and faculty.

However, a large number of the Quests should be implemented in Learning Labs and via digital and computational media. For example, students should be able to come to learning Labs where faculty, graduate students, and various technological tools are present to allow students to engage with their Quests. In this setting, copious data can be collected on the learning trajectories of the students. Some tasks within a Quest can be done on, automated by, and evaluated by a computer or via students networked in a system.

Students today often play video games in LAN parties. They are together in the same space, networked together to play a multiplayer game in competition or collaboration with each other. The game (and mentors) can readily collect information about what each player is doing, how they are performing, and even how they are responding to feedback and failure. When the session is over everyone knows who has done well and who needs to learn more. Surely, we can design LAN parties for other forms of learning.

There is no reason why some Quests—for example aspects of algebra—could not be done via artificial tutors. These today can customize instruction and even sense and respond to several emotions that learners are feeling. Such tutors could be in every dorm and library and students could complete Quests or tasks for Quests on their own time and at their own speed. Artificial mentors, not just tutors, are on the way—for example for using digital storytelling to learn programming. These mentors offer the sorts of suggestions and guidance that good real mentors do.

Besides Learning Labs and artificial tutors and mentors, New College would design and implement, for many Missions or for coherent combinations of Missions, what I have elsewhere called “passionate affinity spaces”. A passionate affinity space is an

interest-driven group organized on the Internet (though members sometimes meet each other face-to-face in the “real world”) where people of different ages and different degrees of expertise organize to produce, participate, and design, not just consume and spectate.

Today passionate affinity spaces are organized around nearly any interest one can name. People with a passion for an endeavor, challenge, or cause come together to teach and learn from each other. Newcomers and people who have not yet or may never develop the passion can also use the site as a resource. Some people use the site only intermittently and for special purposes, others live in it for a long time and see it as an important community to which they belong and contribute.

New College will help design and implement such passionate affinity spaces for students to use as sites for help with Quests and Missions. Such sites would contain a group of people devoted to the knowledge and skills connected to a Mission or a coherent related set of them. Further, students can stay in the site and serve as an advanced teacher or mentor for others. Graduates of New College would be allowed to stay in and contribute to such a site for as long as they wanted. In this way they would become a long term participant in New College.

It is important that an assessment model—a model of evidence for learning—be incorporated into each Quest and Mission. There should be no final tests. Quests and Missions should be built in such a way that finishing them guarantees learning and mastery. Good video games are already built this way.

Good video games are designed in terms of levels. Each level requires players to practice a good deal, deal with failure, and persist until certain skills are mastered. Mastery is displayed by finishing the level. Often a level ends with a “boss fight” that tests whether the player has mastered the skills of the level in a high degree and whether the player is prepared for new learning on the next level. Each level ratchets up skills and integrates them in such a way that by the end of the game one is sure that finishing is a good signing of having mastered the game. This is the model of assessment by “Evidence Centered Design” (ECD) and it has been applied far beyond video games to learning in schools and workplaces.

The role of faculty changes at New College. Faculty design and help run Missions and Quests. They work with each other and students to design more Missions and Quests. They allow students to modify and transform Missions and Quests. And they allow them to teach and mentor each other.

Faculty offer mentoring and help (including over instruction) on a “just in time” and “on demand” basis. So, a given faculty member might be responsible each year for helping



to sustain one or two Missions, a set of Quests, and one passionate affinity space. Graduate students would play the same role.

How is all this cost effective? Though expensive to initially implement, in the end the New College system will be cost effective. Faculty will be able to integrate their research interests closely with their role as mentors, since learning will be based on problem solving. Students will teach and mentor each other. They will also help to design and re-design the curriculum (Missions, Quests, and passionate affinity spaces). Missions and Quests will be used over and over across time with earlier students helping later ones. At the same time, both faculty and students will continually improve the design of the Missions, Quests, and passionate affinity spaces.

Many of the Missions and Quests would be available to off campus students via e-learning, often done with on-campus students. Successful Missions and Quests—as well as passionate affinity spaces connected to them—could be marketed to other colleges. Students from other colleges—even in other countries—could participate with New College students in given Missions, Quests, and passionate affinity spaces.

New College would soon become a specialty brand and no longer a commodity. It would not carry the prestige of old elite colleges. But it would carry a new prestige. This prestige would be connected to students being able to develop and demonstrate passions, problem solving, mastery, innovation, and 21st Century skills all customized to the unique identity the student wants to present to the world as he or she starts on a career and life trajectory.