English 280, Second Place; Professor, Kathleen O'Donnell-Brown

Gaming Our Educational System

Jefferson Gordon

School sucks. That sentiment is one which has come to be widely accepted in America. One can simply turn to the various depictions of education in the media as evidence of how ubiquitous this belief has become. The image of students groaning as they are assigned homework, sighing in disappointment as they turn down an offer to hang out with friends in order to study, and even trembling in dread at an upcoming day at school; all of this is evidence of a system which is outdated and, in many places, outright broken. It is for those reasons that teachers have spent the past several years looking for solutions which could make learning enjoyable, and one of the more recent and promising experiments is to implement a pastime which most students nowadays enjoy every day – a pastime which they can actually look forward to, share with their friends, and which can potentially remove a lot of the fear the current system creates: video games. While games by themselves cannot solve all of the problems education has at the moment, they are most certainly a tool which could prove useful in a future where educators want students who are as enthusiastic about learning as they are about teaching.

In order to understand how games can help improve the learning environment in schools, the first thing which must be examined is what problems actually exist in that environment to begin with. The first of these issues which: vide. Most students enter elementary school with a natural curiosity about how the world works, but all too often, by the end of middle school, we have beaten this out of them. Every eight seconds an American public high school student drops out of school; over the next decade that alone will cost the nation an estimated \$3 trillion in lost wages, productivity and taxes. Forty-six percent of college students fail to graduate with any credential within six years.

Clearly, for many kids, traditional education is neither relevant nor engaging.

The traditional school system is simply not very effective at capturing the audience which it is trying to educate, and the tools currently in place are insufficient to remedy this situation. Trying to revitalize this system using variations of the same practices which have been used for the past couple of centuries is not going to create a significant change in student engagement levels any time soon.

Thus, the search for new tools – ones which have proven themselves capable of, if nothing else, capturing people's attention for hours at a time. Here, games are almost undoubtedly king. Chicago International Charter School's ChicagoQuest demonstrates this by being a game-based middle school – using card games, board games, and video games to encourage students to learn and discover on their own. One example *Polygon* writer Charlie Hall provides is from his time visiting one of the school's algebra classes. The students were loud and energetic, to the point that their instructor eventually had to calm them down a bit. This is in itself nothing out of the ordinary for middle school students. What Hall found remarkable was what had led the students to reach that level of energy in the first place. The students were playing a number game. The instructor said that it was, "Not a sophisticated game, mind you, just a simple game of war using playing cards to create random, negative numbers. But for 15 minutes, they got more repetitions solving arithmetic in their heads than some students will get in an entire week. And they liked it" (Hall). Although games can seem simple when one is playing them, often they take complicated concepts – like algebra for children – and ask their players to master them, creating an entertaining challenge for the individual to overcome.

Even at higher levels of education, games can benefit students. One history professor at the University of Akron took the steps to create a class in which he teaches historical theory through games; the benefits of which can clearly be seen in his students' feedback where they comment, "It is far more involved with the students. The class seems far more invested in the class" and "This course was more open-ended than most courses. It encouraged critical thinking" (Wainwright 602). Even in undergraduate courses, games can be used to get students invested in learning, with this particular instructor placing his students in the game, *Civilization IV*

memorize facts for this week's quiz and forget before the next one is even assigned. And guiding such a large number of individuals with different needs, different skills, and different challenges is rather infeasible.

Fortunately, games could at least reduce some of the guess work teachers would need in order to be the guides their students need. In Extra Credits' "Responsive Learning" episode on using games in education, they provide an example of a student who believes they aren't good at math, arguing that the problem is not the student's inability to master the subject, but the fact that some students will end up getting left behind as the teacher sees the majority of students are ready to move on, and could easily miss that one who has started to have difficulties which will only compound as the class tries to build on previous knowledge. The Extra Credits team reflects that, "This problem could of course be corrected if teachers had both the information they needed so it immediately got noticed by the teacher if the systems within the game weren't enough to help the student through whatever they might be struggling with ("Responsive Learning").

One of the best ways the current educational model could be improved is by giving teachers the tools they need to give students the time and effort they need to flourish while also allowing them to discover things on their own when the direct guidance of an instructor is not really necessary.

Finally, one of the biggest problems with modern education is that it isn't. According to Michael B. Horn and Meg Evans of Journal Sentinel, "The education system in place in urban school districts around the country was created in the early 1900s to serve a different time with different needs. In 1900, only 17% of all jobs required so-called knowledge workers, whereas over 60% do today." The set-up which is currently in place was not designed to meet the needs of students today, and so they are being prepared to work in 20th century factories in a 21st century world. This is especially concerning as education *should* be at the forefront of change and innovation, constantly updating itself to meet the needs of students in a constantly-evolving society. However, schools have been among the slowest to adapt to new technologies and demands, leading to students being less prepared than they should ideally be to face the challenges of the modern world. Some schools have attempted to keep up with changing technologies, but most of these attempts are half-hearted at best. As Joel Rose of The Atlantic puts it, "many of our technological capabilities (which can now support both scale and personalization) are either inaccessible or clumsily grafted on. Three computers added to the back of a classroom may look like a positive step toward bringing that classroom into the advanced technological age. However, smoothly integrating three computers into a daily lesson

is not always easy

Works Cited

- Gershenfeld, Alan. "Mind Games." *Scientific American* 310.2 (2014): n. pag. *Academic Search Complete*. Web. 18 November 2014.
- Hall, Chris. "ChicagoQuest: Teaching with Games in Chicago's Cabrini-Green." Polygon. Vox Media. 12 June 2013. Web. 1 December 2014.