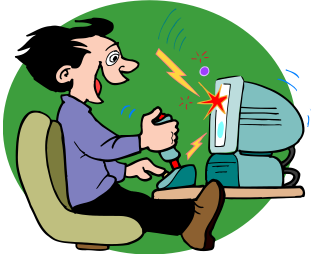


TEN THINGS WE CAN LEARN FROM VIDEO GAMES ABOUT TEACHING BOYS



Boys are scoring lower than girls on literacy assessments all over the world. Although every child is unique, current research on gender and learning is providing us with some interesting generalities about the differences between the way boys and girls learn. Here are some things we can do to engage our boys – without losing our girls.

- **Opportunity for choice**

Rule Number 1 for designing video games is player *agency*: make players feel like they have a choice in what they're doing (even if they don't). Gender research indicates that most boys respond well to opportunities for choice. Of course, we can't offer choice in everything we do in school, but we certainly can – and should – allow students to choose their own books for independent reading and choose their own topics for writing. As well, offering two or three alternatives for literacy tasks such as reading responses just might engage a reluctant reader.

- **Active participation**

Any sort of gaming requires participants to be actively engaged and the most engaging games offer a problem to be solved. Even the connection between the brain and a click of the thumb can activate some neural connections. However, for many students, especially struggling readers, reading is a passive activity. Having students tab jot spots with sticky notes, write notes in the margin or take notes on a real or virtual page, forces them to be more active in their reading. We can also look ways to get active during Language Arts class, such as standing to discuss with a partner or moving across the room to participate in a particular activity.

- **Specific goals and criteria for success**

What's the first thing you need to know when playing any kind of game? How to win! But too often in school, our students don't even know the criteria for success or how they're going to be evaluated on a given task. A simple solution: make it a practice to share grading criteria or rubrics before the students undertake the task.

- **Tasks broken down into chunks**

"Chunking" can make a long or difficult task manageable, especially when there's feedback at the end of each segment. In video games, this often takes the form of a



series of challenges en route to the final goal. In school, it might look more like breaking up a longer reading into shorter passages for struggling readers or assigning deadlines for each section of a longer project (e.g., the plan, the research, first draft, etc.)

- **Controlled level of difficulty**

One rule of game design is to balance difficulty with playability. In other words, the game should pose enough of a challenge to be interesting but not be so difficult that winning is nearly impossible. This is good advice for reading teachers as well. Texts that stretch the reader just a bit beyond where they are forces them to apply their strategies and engage in the “reading work” that takes them to higher levels.

- **Gradual scaffolding to higher levels**

Most video games involve a series of challenges that the player must meet in order to meet the final goal, with each challenge just a bit harder than the last. Players even have the option of replaying a level or going back to an easier level to build their confidence or increase their arsenal. We need to do the same with reading; by providing students with incrementally more challenging texts, we can scaffold them to higher levels of proficiency.

- **Immediate feedback and consequence of actions**

Another key task for game creators is to ensure that there are incentives to encourage players to progress through each task. Players learn quickly whether an action will be rewarded or penalized. Instantaneous feedback is a lot more challenging in school, where the action is more likely to be thirty-to-one than one-to-one. But the feedback doesn't always have to be from the teacher; peer conferences, peer tutors, answer keys and scoring rubrics can provide students with quick feedback about whether they can move on with a task or go back to rethink or revise. Even simple actions like checking off tasks on a list or being able to engage in an activity of choice when a compulsory activity is completed can instill a feeling of accomplishment in the most struggling student.

- **Competition and the element of chance**

In study after study, it's been found that boys respond to competition; in fact, competition actually improves boys' performance (while it makes no difference to girls). In video games, you either win or you don't – and that's a big motivator for many boys. Although we in school tend to value cooperation over competition, we can look for opportunities to foster healthy competition. Some students might respond well to recording pages read or words written – and beating their own records. Others might be motivated by simply injecting an element of chance, such as drawing names for the opportunity to read a particular book or randomly selecting from a series of reader response options.



- **Strong visual component**

Although some games require reading, most are largely, if not totally, visual. An interesting finding of gender research is that boys are more often visual learners while girls tend to be more verbal. That's just one of the reasons why graphic novels and illustrated nonfiction are hits with so many male readers. Most traditional fiction for middle school readers and beyond is not illustrated; however, we can tap into the visual learning mode by having students respond to reading with art, practicing more visualization activities, and using more diagrams, charts, maps and other graphic organizers.

- **Private failure and success**

For many struggling readers, there are few things more important than saving face. That's why they tend to goof off or misbehave during reading time – so no one can see that the work is just too hard. The advantage of a video game is that no one sees when you slip up or fall behind or have to repeat a level. Providing students with tasks in which they can achieve success, books that they can read (that don't look like "baby" books) or tasks where everyone works at his/her own level can build the confidence a struggling reader needs in order to tackle a greater challenge.

Some interesting reading from current research:

Gender and Competition

<http://web.stanford.edu/~niederle/NV.AnnualReview.Print.pdf>

Are Boys More Competitive than Girls because they play in groups? (2013)

http://www.slate.com/blogs/xx_factor/2013/05/17/boys_and_childhood_competition_are_kids_more_competitive_when_they_play.html

Gender, The Brain and Education (2009)

https://dspace.library.uvic.ca/bitstream/handle/1828/1411/magon_project_signatures_removed.pdf?sequence=1

With Boys and Girls in Mind (2004)

<http://www.ascd.org/publications/educational-leadership/nov04/vol62/num03/With-Boys-and-Girls-in-Mind.aspx>

Boys' Literacy Attainment: Research and Related Practice

https://www.edu.gov.on.ca/eng/research/boys_literacy.pdf

