Facebook fans do worse in exams

Research finds the website is damaging students’ academic performance

Daisy Jones feared the time she spent on Facebook was threatening her studies, so she deactivated her account.

Jonathan Leake and Georgia Warren

FACEBOOK users may feel socially successful in cyberspace but they are more likely to perform poorly in exams, according to new research into the academic impact of the social networking website.

The majority of students who use Facebook every day are underachieving by as much as an entire grade compared with those who shun the site.

Researchers have discovered how students who spend their time accumulating friends, chatting and “poking” others on the site may devote as little as one hour a week to their academic work.

The findings will confirm the worst fears of parents and teachers. They follow the ban on social networking websites in many offices, imposed to prevent workers from wasting time.

About 83% of British 16 to 24-year-olds are thought to use social networking sites such as Facebook, MySpace and Bebo, to keep in touch with friends and organise their social lives.
“Our study shows people who spend more time on Facebook spend less time studying,” said Aryn Karpinski, a researcher in the education department at Ohio State University. “Every generation has its distractions, but I think Facebook is a unique phenomenon.”

Karpinski and a colleague questioned 219 US undergraduates and graduates about their study practices and general internet use, as well as their specific use of Facebook.

They found that 65% of Facebook users accessed their account daily, usually checking it several times to see if they had received new messages. The amount of time spent on Facebook at each log-in varied from just a few minutes to more than an hour.

The Ohio report shows that students who used Facebook had a “significantly” lower grade point average - the marking system used in US universities - than those who did not use the site.

“It is the equivalent of the difference between getting an A and a B,” said Karpinski, who will present her findings this week to the annual meeting of the American Educational Research Association.

She has not yet analysed whether a student’s grades continue to deteriorate the longer he or she spends on Facebook.

Some UK students have already spotted the potential danger. Daisy Jones, 21, an undergraduate in her final year at Loughborough University, realised the time she was spending on Facebook was threatening her grades - prompting her to deactivate her account.

“I was in the library trying to write a 2,000-word essay when I realised my Facebook habit had got out of hand,” she said.

“I couldn’t resist going online. You do that, then someone’s photo catches your eye. Before you know it, a couple of minutes has turned into a couple of hours and you haven’t written a thing.” Jones is among the few to have recognised the risks. According to Karpinski’s research, 79% of Facebook-using students believed the time they spent on the site had no impact on their work.

Facebook said: “There is also academic research that shows the benefits of services like Facebook. It’s in the hands of students, in consultation with their parents, to decide how to spend their time.”
What Facebook Users Share: Lower Grades

By Anita Hamilton

Forget the widely unloved redesign. Facebook has committed a greater offense. According to a new study by doctoral candidate Aryn Karpinski of Ohio State University and her co-author Adam Duberstein of Ohio Dominican University, college students who use the 200 million–member social network have significantly lower grade-point averages (GPAs) than those who do not.

The study, which will be presented at the annual meeting of the American Education Research Association on April 16, surveyed 219 undergraduate and graduate students and found that GPAs of Facebook users typically ranged a full grade point lower than those of nonusers — 3.0 to 3.5 for users versus 3.5 to 4.0 for their non-networking peers. It also found that 79% of Facebook members did not believe there was any link between their GPA and their networking habits. (See the 50 best websites of 2008.)

Karpinski says she isn't surprised by her findings but clarifies that the study does not suggest that Facebook directly causes lower grades, merely that there's some relationship between the two factors. "Maybe [Facebook users] are just prone to distraction. Maybe they are just procrastinators," Karpinski told TIME.com in a phone interview on Monday, April 13.

John Kamin, 23, a student at Hofstra University in New York who uses Facebook, says it's "absurd" to associate the social network with poor grades or lack of aptitude. "It's a networking tool for people," says Kamin, who adds that he spends about an hour a day on Facebook, far less time than he spends playing the addictive game Brick Breaker on his BlackBerry — there's that question of users' distractability and tendency to procrastinate. But, Kamin says, "I don't think someone is more or less intelligent because they sign up for it." (See pictures of the college dorm's evolution.)

Karpinski and Duberstein's study isn't the first to associate Facebook with diminished mental abilities. In February, Oxford University neuroscientist Susan Greenfield cautioned Britain's House of Lords that social networks like Facebook and Bebo were "infantilizing the brain into the state of small children" by shortening the attention span and providing constant instant gratification. And in his new book, iBrain: Surviving the Technological Alteration of the Modern Mind, UCLA neuroscientist Gary Small warns of a decreased ability among devotees of social networks and other modern technology to read real-life facial expressions and understand the emotional context of subtle gestures.
Young people are particularly at risk for these problems, he writes, because "young minds tend to be the most sensitive, as well as the most exposed, to digital technology."

Some experts dismiss all studies of Internet use as flawed, since there is no reasonable way to control for the myriad variables that may affect such research. For its part, Facebook declined to address the specific findings of the new study but issued a statement on Monday, April 13, saying that Facebook isn't the only diversion around; TV and video games can be just as distracting as online social networks. The company also pointed to a study released earlier this month by researchers at the University of Melbourne showing that personal Internet use at work can help focus workers' concentration and increase productivity. Facebook added that "it's in the hands of students, in consultation with their parents, to define priorities and decide how to spend their time." (Read "25 Things I Didn't Want to Know About You on Facebook.")

By most accounts, students spend a heck of a lot of time logged onto Facebook, a circumstance that irks educators, who complain of students messaging friends or posting snarky status updates from their laptops instead of paying attention to lectures. It was this habit that first got Karpinski interested in the topic while she was earning her master's degree in developmental psychology at West Virginia University. "When I became a teacher's assistant, I started noticing my students' using [Facebook] and becoming obsessed with it," says Karpinski — who is not on Facebook, despite her fellow classmates' badgering efforts to get her to join.

She demurred, saying the world of online gossip just did not appeal. "Every day there was some new drama and they would ruminate about it for hours," says Karpinski, who eventually graduated with a GPA of 3.8.
Ohio State Researcher Aryn Karpinski Conducts Study Concluding Facebook Causes Lower Grades [Updated]

Amit Chowdhry | Tuesday April 14, 2009 |

Leave it to a Buckeye to conclude a study about how Facebook causes people to have lower GPA scores. It is pretty obvious that Facebook is a distraction but then again so is partying, TV, beer pong, playing sports, and anything else that college students do in their free time.

Ohio State University Aryn Karpinski student has announced a study that shows that people that use Facebook study less and have lower GPA scores. When Aryn reported this, FOX News and UPI jumped on pointing out Facebook as a culprit.

According to Aryn’s study of about 219 students, 148 Facebook users had a full grade point lower than those who don’t have Facebook. People that didn’t use Facebook reported that they study about 11-15 hours and those who had a Facebook account only studied 1-5 hours per week.

Keep in mind that there are now over 200 million active users on Facebook, many of them are medical students, lawyers, MBA students, PhD doctorates, entrepreneurs, and high school students with perfect SAT scores, etc. This is why I am taking the study conducted by the Ohio State doctorate student with a grain of salt.

Besides, undergraduate students at Ohio State are a small percentage of Facebook’s total user base. And of course they’ll spend a lot of time on Facebook, what else is there to do in Columbus, Ohio? Aryn should conduct the same study at The University of Michigan and Michigan State University. The results will be much different.

Updated April 24, 2009:

I had the chance to talk directly to Aryn about the whole situation and it turns out the media blew the whole story out of proportion. Aryn personally contacted me and gave me the full details of the experiment. When the media referred to the report in their news stories, even I questioned how many people actually read the report and whether they had their facts straight.

Below is e-mail that Aryn sent out. I advise anyone that is interested in how the experiment was conducted to read fully through it. I give Aryn credit for caring about her online reputation by contacting me directly about the situation. Below is the e-mail.
My name is Aryn Karpinski and I just wanted to write to you about my study that you posted on your website. I wanted to thank you for noting that some media outlets had sensationalized the information presented in the study. I appreciate your efforts to help represent research findings accurately.

I also agree with you completely regarding your comments about other “distractions” (e.g., it is pretty obvious that Facebook is a distraction but then again so is partying, TV, beer pong, playing sports, and anything else that college students do in their free time.). Conceivably, anything that takes away from study time could be correlated with GPA. So your assessment of other potential distractions that consume free time or not-so-free-time is spot on. Also, I’m sure that if I conducted this study at any other institution (e.g., Michigan, as you noted), the results would be different.

To explain my reasoning behind the study, I have included a little more information that may help shed light on some things.

As you know, this is a REALLY basic study. I just planned to do this for the conference to get some ideas and network with more experienced and qualified researchers in this area. I really wanted to have a dialogue with others who are looking into similar phenomena. The media completely sensationalized it, as you know. I have never dealt with the media, and did not anticipate this. I obviously know better now.

In a nutshell, the main purpose of my study was to EXPLORE (pilot study!) the demographic composition of a Facebook user at the college level. I also wanted to investigate academic achievement in relation to Facebook use. The demographic details were not the focus of the media’s attention, as you know. For the academic performance variables, I did a MANOVA with Facebook and Student Status (i.e., Undergraduate vs. Graduate) as the factors, and GPA and Hours Spent Studying as the dependent variables. I found that there was not a significant interaction between FB use and student status. This was important to rule out as a confound. As you know, graduate GPAs are typically inflated meaning that it is rare to see a graduate GPA less than 3.5. It was found that there were significant differences between users and nonusers in that users had GPAs in the 3.0 - 3.5 range and also studied in the 1 to 5 hour range per week. Nonusers had GPAs in the 3.5 - 4.0 range and studied 11 to 15 hours per week. These differences were also significant in each individual population (i.e., in the separate undergraduate and graduate populations; p < .001 for the combined sample and p < .025, .01, and .001 for the separate undergraduate and graduate groups for the DVs). This is an interesting finding because graduate GPAs rarely are that low (this part was not in my poster as well, but probably should have been!).

This research is correlational, which the media does not seem to understand. I have pushed the correlation versus causation aspect in all my interviews, and most media sources seem to get that in the article somewhere (at least lately). I am not saying that Facebook CAUSES poor academic performance. I am saying that the research shows that there is a RELATIONSHIP between Facebook use and academic performance. There are a host of third variables that need to be examined that are potentially influencing this
relationship such as personality, work, extracurricular involvement, other activities, etc. Also, I’m sure that if it was not Facebook, it would be another activity (as you noted in your post).

Also, just because a correlation was found, does not mean we know anything specific. For example, anyone could easily argue that the latter predicts the former not the other way around (i.e., those who tend to get worse grades end up spending more time on Facebook).

I am fully aware of the limitations of my study, and merely want people, personnel at universities, researchers, parents, students, and tech-saavy people like yourselves to think about this intricate relationship (and start a dialogue).

I initially wanted to just gather some information about the topic, since this is not my specialization or even my dissertation topic. I thought a pilot study format/exploratory survey would be the best option. I created a 6 page survey for students (and faculty) to complete. The surveys were slightly different for the students and faculty (e.g., GPA obviously was not a question on the faculty survey). I had many open-ended questions on the survey, and it took a while to complete. Thus, I am quite proud of my 219-student sample and the other 100 + faculty and staff surveys that I have yet to analyze. I know it’s not a large sample, but I did not have research assistants or undergrads helping me. I physically collected all the data myself. Also, this study was not funded (obviously). Some other critics were asking, “Who would fund this?” Well, no one did.

I chose the traditional paper and pencil format to increase the response rate (i.e., me personally recruiting students from classes and waiting patiently for them to finish the survey). I used Likert scaling for some information to decrease the potential for missing data. I read some research out there that states if you leave “blanks,” there is a higher chance of missing data. So, for this FIRST exploratory venture, I used this format. I know that categorical/ordinal data are more difficult to work with, but I weighed the pros and cons and that was the decision that I made. I would love to do more sophisticated analyses (e.g., multiple regression comes to mind) where it is easier to control for other variables or examine models. However, there are problems, as you know, in doing that with the types of data that I have. Plus, I think it would be virtually impossible to control for/examine the myriad of variables that are a part of this huge, intricate network of related concepts. This is a very difficult area to research (i.e., social networking sites), and I can see how researchers and professors may dedicate their lives to examining phenomena this like.

I have not even looked at the rest of my data, which I think will be the more interesting information. I have a huge amount of qualitative data to examine from the open-ended questions. I know open-ended questions are not considered qualitative data by some researchers, but I am referring to it that way for now. I have faculty and staff surveys that need to be examined. I took a peek at their responses and saw some interesting things compared to the student responses. I do not intend to submit what I have for publication
as is. I definitely need to add some more things to it or even take a completely new angle! Probably the latter.

My study is easy to criticize statistically and methodologically, obviously. But know that I am fully aware of what the problems are. I acknowledge the limitations of doing this research (especially survey research). Please know that I know there are many other people more qualified to speak on this topic (including you), who have dedicated their lives to this topic or the general field of technology research. I know this. I am learning along with everyone else.

-Aryn