

Special  
e-print  
Edition



As seen in



Life

October 3, 2006



By Shawn Spence for USA TODAY

**At Ball State:** A.J. Hunter gets a text message from a friend while checking e-mail. Hunter, 21, represents the always-online-and-in-touch way of life for college students who are never far from their laptops and other wireless devices. Technology is "such a part of life," says Hunter, a junior at Ball State in Muncie, Ind.

# Totally wireless on campus

Today's young 'digital natives' can't live, or study, without technology

By Sharon Jayson  
USA TODAY

MUNCIE, Ind. — A.J. Hunter can't start the day without first pulling out his laptop. Each morning, the 21-year-old Ball State University junior downloads his

schedule onto his Mac Powerbook G4, which — along with his iPod and cellphone — is always close at hand.

Hunter, of Uniondale, Ind., is a typical tech-savvy college student. He can access the social networking site Facebook from his cellphone. He uses e-mail and instant messaging anywhere on the wireless campus. He downloads music to his laptop and his iPod, and he uses a 1-gigabyte flash drive provided by the university to transfer files and songs and to access his digital portfolio.

An elementary-education major with a concentration in technology, he says the portfolio includes lesson plans and other documents illustrating his progress in his field. He transfers files to his folder on the

university's iLocker to save storage space on his computer.

Technology is so second-nature, "I can't even think of when I use it and when I don't. It's such a part of life," he says.

Hunter isn't a techno-geek. He's just a "digital native" — a term that has been used to describe millennials, the first generation who grew up in a world filled with computers, cellphones and cable TV.

These young people think, act and react much differently from how their parents and grandparents did, often because their childhoods were in large part shaped by technology, say tech researchers and those studying this generation.

"This is so core to their social experience — to their identities — to what it



By Shawn Spence for USA TODAY

**Never far from their laptops:** Ball State's Amanda Pollard, left, checks out the social networking website Facebook. Ditto for roommates Jacque Wilson, back left, and Kelly Harlow. They had to wait two "horrible" weeks to get wireless Internet service, Pollard says.

means to be a young person and a student in 2006," says Richard Katz of the non-profit Educause, which promotes the use of information technology in higher education.

But just because young people are comfortable with technology doesn't mean it's always beneficial. Yes, they can manipulate data and do online research, and they may have the kind of computer skills employers want in the global world. But some experts worry they've become so dependent on clicking a mouse, thumb-typing a text message and listening to voice mail that it's taking over their lives.

When the hard drive on his desktop computer crashed during the first week of classes, "I thought I was going to go insane," says Nick Caine, 22, a Ball State senior from Indianapolis. "I was running to the library every two seconds. I didn't even go home to my house for two hours because I knew if I went home, I didn't have a computer."

Ball State junior Amanda Pollard, 20, and her roommates had a two-week wait until the cable company could get wireless Internet installed at their new town house at the beginning of the school year. "It was horrible," recalls Pollard, of Muncie, who has a double major in English literature and Spanish. She says her daily routine at college revolves around the Web.

"When I lived in the dorms, my computer

was literally two feet away from my bed and on my desk. I would literally roll out of bed, sit in my chair, check my Facebook account, check my e-mail account, print off any homework that I had for the day," she says. "It's stuff that you don't necessarily realize that you're doing."

Research shows college students are among the most avid technology users, and this campus's 17,285 mostly white, middle-class students are particularly immersed in technology. The campus is striving to brand itself as a digital innovator.

Ball State first began installing wireless in buildings in 1998 and went campus-wide in 2003. In 2005, Intel Corp. named it the nation's top wireless campus.

Ball State's Wi-Fi goes from buildings to green spaces to the football stadium and other athletic facilities. One campus bus is equipped with wireless; the other buses are in the works. Even doing laundry is Web-based: Five of the seven residence halls have an Internet-linked laundry system to reserve washers and dryers, monitor the wash online and get an e-mail alert when it's done. Full-time students pay a technology fee of \$156 a semester.

Other colleges are following suit: 29% of U.S. campuses provide blanket wireless coverage, and 64% have a strategic plan for wireless, according to a 2005 survey by the non-profit Campus Computing Project, which studies information technology in higher education.

### They want constant connectivity

Student expectations for constant connectivity have prompted Ball State to innovate, says O'Neal Smitherman, vice president for information technology.

"In the world today, we have the potential to know and be able to access any kind of information that has ever existed. While you may not want to have all that information every minute, you do want to be able to access it whenever you need. If you happen to be riding on the campus shuttle bus, you can't afford to be out of touch."

This generation has been engaged with technology since middle school or before, according to a study of 18- to 24-year-olds released this summer by international research and consulting firm Greenberg Quinlan Rosner. It found the average age for first Internet use was 12 years, 3 months; 24% of the 1,021 young adults surveyed say they were 10 or younger.

That report found they were spending an average of 21.3 hours online each week. Data from an Educause survey of 28,000 students at 96 colleges and universities, to be released in December, show some young people are spending "literally 10, 12, 14, 16 hours a day online," Katz says.

Though many studies have tried to calculate time spent on the Web, researchers increasingly say it is difficult to quantify

because the Internet has become so interwoven into daily life.

"Basically, they're online always," says Steve Jones, a senior research fellow with the Pew Internet & American Life Project. "It's so integrated into other routines. It's no longer an activity unto itself."

Caine knows that firsthand. "Even if I'm just bored, I'm looking at random websites. It's what I do. Sometimes I'm up until 4 in the morning looking at the Internet. Your time kind of flies."

For most students, checking messages — text, e-mail, phone, IM or messages left on social networking sites — is an almost constant pastime. "The first thing you do in the morning is check your e-mail and see if your classes are canceled," says Amy Whidiger, 22, a senior political science major from Dyer, Ind.

Caine, a psychology major who has instant messaging on his cellphone, says he taught his parents and his grandmother how to IM. Getting a message "kind of brightens your day," he says.

This shift in communication from the more personal to the digital worries some, including John Gardner of the Policy Center on the First Year of College, a non-profit education think tank in Brevard, N.C.

"The communication revolution has certainly improved the frequency of communication, but I'm not persuaded it has improved the quality of it at all," he says. "It certainly does not lend itself to in-depth, face-to-face conversation. If you can e-mail, voice-mail or text-message folks several times a day, you may be less likely to have dinner with them."

Young people say their devices help them socialize. Caine says some bring laptops to parties "because if there's no music around, it becomes a portable stereo."

Chris Allen, 22, a Ball State senior from Anderson, Ind., majoring in religious studies, says text messaging and using cell-phones are a big help in getting together.

"If you do happen upon something fun and cool that's going on, you try to find people to join in, or you call people to avoid it — don't come here."

Sherry Turkle, a psychologist and sociologist at Massachusetts Institute of Technology, still worries about the dominant role of technology in young people's lives.

"It's wonderful to be in touch, to have friends, to feel wanted," she says. "If we now say that's what we get from virtual reality, why not get a little more of that from physical reality?"

Still, the ease with which young people can manipulate data, do online research or even play games may bode well for some types of careers. For example, video games may improve a surgeon's effectiveness in the operating room, according to a study released in April by researchers at Beth Israel Medical Center in New York City in conjunction with the National Institute on Media and the Family in Minneapolis.

The study of 303 surgeons found a 20-minute warm-up of video gaming immediately before laparoscopic surgery improved performance. These findings support a smaller 2003 study by the same researchers that found doctors who spent at least three hours a week playing video games made about 37% fewer mistakes in laparoscopic surgery and were 27% faster than doctors who didn't play.

### Sometimes the 'pull' is too great

There are downsides to too much screen time, however. A study by the American College Health Association

released last month found as many as 18.5% of students at Michigan State University, in East Lansing, reported that time spent on the Internet and playing computer games resulted in low grades or dropping a class. The effect was twice as great for men as women, with 25.2% of men reporting such effects vs. 13% of women.

Ball State junior Ben Mangona, 20, a sociology major, understands the Web's lure. "There's times when I should be doing homework and instead am on MySpace and Facebook or instant messenger. It happens to a lot of us," he says. "It's there at our fingertips and ... sometimes it pulls us away from things we need to do."

Sociology professor Ione DeOllos served on a Ball State task force to help direct technology efforts.

"We felt far too often technology was the tail wagging the dog — that technology was placed in the classrooms, and we have fully technological classrooms, but without really any input from the faculty about what they would need and use," she says.

Michael Bugeja, author of the 2005 book *Interpersonal Divide: The Search for Community in a Technological Age*, questions this gung-ho mentality toward technology.

"Not only are the students addicted — the institutions of learning are addicted." No one is studying its impact on learning, but "we're still operating as if access is going to improve learning."

Smitherman of Ball State says technology has changed the world so quickly that people haven't had a chance to really think through how to best use it.

"I think as time goes by, we will become more sophisticated users and learn when to turn the technology off."