tech.

Role play answers roll call

U.S. Army trains with vids, games

By DAVID S. COHEN

From the rise of Nazis to Vietnam and beyond, Hollywood and showbiz have lent their talents and skills to the war effort of the day.

Today, all-out flag-waving movies are scarce. Yet the military arguably gets more help from showbiz nowadays than ever. Armed forces around the world, especially the U.S. Army, are using advanced technology from entertainment, particularly videogames, to help train personnel and, say some, save lives.

"About 10 years ago, the Army realized that computer technology and computer simulation was something they'd better start paying a lot of attention to," says Raymond F. DuBois, senior adviser of the Center for Strategic and Intl. Studies.

DuBois says such simulations work in two ways: First, they can put a soldier, a helicopter pilot or a tank commander in battlefield situations. "That's coupled with the fact that the young people entering the military are computer literate to an enormous extent and grew up playing videogames," he adds.

Embracing game tech in addition to field training was an adjustment for many in the armed forces. But graphics have simply become too good to ignore.

The Army even has an office dedicated to "harvesting" such entertainment tech: The U.S. Army Program Executive Office for Simulation, Training and Instrumentation, or PEO STRI. The office is located in central Florida — not coincidentally, in the vicinity of Disney World — which has become one of the world's centers for virtual reality tech.

Roger Smith, chief technology officer for PEO STRI, tells *Variety* the Army has found great success in modifying off-the-shelf vidgames for training.

"We'll license them and give them a makeover so they have a different face. So instead of an alien soldier walking around with a phaser gun, it's a U.S. soldier walking around with standard-issue weapons."

Some games that have been repurposed and renamed: "Unreal" became two simulations, "America's Army" and "Tactical Iraqi"; "Operation Flashpoint" became "Ambush"; and "Far Cry" was turned into "IEWTPT Tactical Questioning."

Sometimes, though, a game is built with the Army in mind, then sold commercially.

The Army cooperated with Sony Pictures Imageworks game developer Pandemic Studios on "Full Spectrum Warrior," investing $4 million.

The game was a hit with consumers but was less successful as a training tool, and the Army was shut out of the profits. Watchdog groups complained it was a waste of tax money.

Repurposing a game can cost from $150,000 to $500,000, depending on how much of the original software is usable by the Army.

In fact, says Smith, an entire industry has grown up around delivering game-based products to the military.

Eric Haseltine, a former chief technical officer who worked in the U.S. Intelligence community and is now president of Haseltine Partners, notes this exchange of knowledge and technology — dubbed by some as "the Entertainment-Military Complex" — has gone on behind the scenes for years.

"Silicon Graphics was a perfect example," he says. "They had as much business with the military as they did with entertainment."

Haseltine notes the entertainment biz and the military have different concerns, so sometimes the tech they share must be adjusted.

Entertainment needs to look realistic, even down to hair and clothing. "Those kind of exquisite details don't matter in the military world," he says. Instead, the military wants to know "How many moving objects can you (handle) at the same time? What kind of physics can you calculate? And, above all, what does the whole thing cost?"

A military or commercial flight simulator need not have perfect visual detail, but it had better mimic the behavior of the real vehicle, Haseltine says, "because lives are at stake."

PEO STRI's efforts extend to the Los Angeles area; the office spent $50 million to set up USC's Institute for Creative Technologies, which goes beyond virtual reality tech and taps into Hollywood's storytelling expertise.

"We refer to them as cognitive training systems," says Kim LeMasters, creative director for the ICT. "We're trying to train the brain."

The ICT recently was asked to create a mobile, interactive training system to teach soldiers how to defend themselves

against roadside bombs — or, in military parlance, improvised explosive devices (IEDs).

Rather than deliver a non-interactive training video that would likely bore 18- 20-year-olds, the ICT created a story told from the p.o.v. of two characters: the bombmaker and a young soldier who had just survived an IED attack.

"To make this a compelling experience, you have to hook 'em," says LeMasters. "You have to have a story."

A small industry has grown up dedicated to turning off-the-shelf vidgames into military training simulations.

Device would zap pirate camcorders

By MARK SCHILLING

TOKYO While increased vigilance and harsher penalties have yet to put a major dent in film piracy, a little bit of high-tech know-how just may do the trick.

Isao Echizen of the National Institute of Informatics, in cooperation with Sharp, a leading Japanese electronics maker, has devised a technology for foiling camcorder pirates at the theater, NII has announced.

Special near-infrared LEDs are set up behind the movie screen and turned on while a film is playing, beaming light through tiny holes in the screen. Pirates who record the pic with camcorders or other devices end up with an image spattered with red and green blotches. Viewers in the theater see nothing, since the light emitted by the LEDs is not in the range of the human visual spectrum.

Sharp aims to commercialize the technology within two or three years.

The Motion Picture Producers Assn. of Japan, or Eiren, estimates that pirates have trimmed 10%, or $220 million, off the $2.2 billion annual local B.O., while taking a similarly large chunk from the DVD biz. And pirates have been steadily improving the quality of their images with better equipment.

Eiren-affiliated theaters now run spots before every screening warning camcorder pirates of possible fines and prison sentences, but results have not yet lived up to expectations.

But there's no doubt blotchy copies would be tough to sell.

Near-Infrared cells smear video with light invisible to the live audience.