

## **U.S. Internet, Health IT Prospects Improving**

George Lauer

May 1, 2008

An international report ranks the United States' Internet infrastructure among the best in the world, tempering dire predictions of Internet traffic jams and suggesting the U.S. system is getting better, not worse.

With a rural broadband health project under way and new political fervor for health IT brewing, prospects for online health applications in the U.S. are looking better as well, some experts say.

The Global Information Technology Report, released last month, ranked the U.S. fourth in the world in Internet readiness. The rankings -- done for the World Economic Forum by INSEAD, a French business school -- assessed 127 economies in its Networked Readiness Index based on variables such as total tax base, collaborations between universities and industry, and availability of venture capital.

This is the seventh year the rankings have been issued. The U.S. moved up three spots from seventh last year.

Although it did not analyze specific Internet activities, the report's findings have important implications for many industries, including health care.

### **Bandwidth Crunch**

U.S. advancement in the global report tempers recent warnings that the U.S. Internet system might not be up to the tasks of the 21st century. Some experts predict traffic jams on information highways as massive amounts of data move online in coming years, especially bandwidth-gobbling video data.

Moving images consume far more bandwidth than words, sound or stationary images, and as more video applications move online -- including data-rich medical imaging systems --available bandwidth diminishes.

One estimate shows the video site YouTube taking up as much bandwidth last year as the entire Internet did in 2000.

A Deloitte & Touche report last year predicted that traffic would soon exceed the Internet's capacity and that data flow would slow to a crawl without new infrastructure investments.

### **Rural Health Broadband Project**

Partly in response to such predictions, the Federal Communications Commission this winter dedicated \$417 million for the construction of 69 statewide and regional broadband telehealth networks in 42 states and three U.S. territories.

FCC officials say one of the commission's top priorities is broadband deployment -- particularly for health care applications in rural America where small, remote clinics and hospitals can tap into advanced technologies and expertise from larger urban medical centers.

"The FCC's rural broadband project dovetails with what HHS is doing," said Mark Wigfield, spokesman for the Wireline Competition Bureau at the FCC. "Both (agencies) are working toward a more robust, farther-reaching system."

Most of HHS' tech efforts are funneled through the Office of the National Coordinator for Health IT, which provides counsel to the secretary and the rest of HHS.

ONC officials said the agency will adapt its programs to fit the infrastructure as the Internet develops.

"The assumption -- for all industries -- is that the Internet will continue to evolve to accommodate new applications, health IT being one of many," Nancy Szemraj, communications and outreach manager for ONC, said.

The Rural Health Care Pilot Program will support the connection of more than 6,000 public and not-for-profit health care providers nationwide to broadband networks. Hospitals, clinics, universities, research centers, behavioral health sites, correctional facility clinics and community health centers will participate in the pilot program.

Providers are eligible for funding to support up to 85% of the costs associated with the design, engineering and construction of broadband health care networks. The rural program's requirements complement HHS' nationwide IT initiatives that support the creation of a nationwide interoperable health IT infrastructure. Networks may connect to the public Internet or to one of the nation's dedicated Internet backbones -- Internet2 or National LambdaRail.

### **Political and Regulatory Environment**

The U.S. political and regulatory environment was not judged one of the country's weaknesses in the World Economic Forum report. The U.S. ranked 22nd among 167 countries.

In the realm of U.S. health care IT, some experts contend government is the answer, some say it's the problem and others say it's both.

David Merritt, project director at the Center for Health Transformation, probably falls into the third category.

“Whenever you bring in government, particularly the federal government, you bring in all the baggage that comes with it -- inefficiencies, transient leadership and intransigent bureaucracy. There’s always the fear of talking any proposal to death,” Merritt said.

He acknowledges, however, that government-led health IT appears to be the way this country is moving. Especially in the realm of interoperability.

“Government has to take the lead because the private sector hasn’t,” Merritt said.

### **State Examples**

Merritt and the Center for Health Transformation -- the Washington, D.C., think tank founded in 2003 by former Speaker of the House Newt Gingrich (R) -- are working with state and local governments on health IT improvements.

They point to Minnesota as a potential model for other states and perhaps the nation as well.

“There has to be an overseeing leadership of some sort to make sure systems are interoperable and states like Minnesota are moving forward with that in a way we think will work,” Merritt said.

“The Minnesota Legislature passed a law saying every health system -- essentially every health care provider -- will have an interoperable system by 2015. They didn’t prescribe how to do it,” Merritt said, adding, “They set up the apparatus to collectively make sure that it got done and they set a deadline. That’s a key. If you don’t have a deadline for things, you could talk about them forever.”

The Massachusetts Legislature is considering a similar approach.

### **Politics Might Catch Up With Technology**

Merritt predicts that politics may soon catch up to health care IT.

In addition to state legislatures embracing health IT, Merritt pointed out that the three major presidential candidates -- Republican John McCain and Democrats Barack Obama and Hillary Rodham Clinton -- all feature IT in their health care proposals.

“I think this country faces technology challenges but not technological problems,” Merritt said. “I have utmost confidence that technology will meet the challenges to come. I think the hurdles in front of us are political, not technological. And I think we’re going to be getting over a lot of them a lot easier than we used to,” Merritt added.