Telemedicine: Extending Specialist Care to Rural Areas

The urgency of delivering healthcare in rural areas is accelerating, as record numbers of veterans return home. “It’s neither practical nor cost-effective for veterans or wounded warriors to travel hours to see a specialist,” says Linda Boles, business development manager for public sector healthcare at Cisco.

**Bringing the Specialist to Local Clinics or the Patient’s Home**

Now federal and state healthcare providers are turning to Cisco® HealthPresence™, a high-definition video telemedicine solution, to cost-effectively deliver specialist care to rural areas. A patient who visits a clinic near home can interact with a doctor or nurse anywhere in the country using video and integrated medical devices. And patients who face difficulty traveling to the clinic can be seen from home if provided with Cisco TANDBERG Movi software for high-definition (720p) video on a home PC.

**From Promise to Reality**

There are several reasons why telemedicine has graduated from a promised solution to real-world use. “More rural communities have broadband networks to support video,” Boles explains. “And CMS [the Centers for Medicare and Medicaid Services] now reimburses for telemedicine visits.” More than a dozen state health departments have received grants to strengthen healthcare in rural communities through the American Recovery and Reinvestment Act (ARRA), and telemedicine is a part of many of these grants.

**Range of Investments Aligned to the Medical Need**

Rural and mobile healthcare clinics can choose from a range of Cisco Care-at-a-Distance video solutions, because “one size does not fit all for telemedicine,” according to Boles. For example:

- A dermatologist evaluating a returning soldier with a skin lesion will want Cisco HealthPresence, which includes high-definition video, high-fidelity audio, and an integrated, high-resolution general-examination camera, telephonic stethoscope, ear-nose-throat (ENT) scope, and vital signs monitor for blood pressure, temperature, pulse rate, and pulse oximetry.

- A psychologist or psychiatrist treating a patient with post-traumatic stress disorder (PTSD) or traumatic brain injuries needs high-definition video to see subtle facial expressions, but does not necessarily need a vital signs monitor. In this case, the patient can use a Cisco Clinical Presence System.

- A nurse conducting a routine checkup with a chronic diabetes patient at home can use standard-definition video, such as Cisco WebEx™, with little more than a US$50 investment to provide the patient with a PC camera.

Telehealth video solutions are especially useful for mobile healthcare clinics. “Some clinic operators need a mobile solution that they can set up quickly and just as quickly pack up when they move to the next location,” Boles says. Cisco provides a suitcase-sized kit for this purpose.

**Reducing Costs, Engaging Patients in Care**

Bringing specialist care into rural communities using telemedicine solutions can reduce healthcare costs at the same time that it improves government service. For example, diagnosing and treating skin lesions a few days earlier can avoid infections and complications. And caregivers are reporting that diabetes patients more often keep video conferencing appointments than phone appointments, perhaps because the convenience of staying at home and more frequent visits help them feel more comfortable with their clinician and more engaged in their treatment.

During a Cisco HealthPresence study at the Scottish Centre for Telehealth in Aberdeen, the majority of patients said they actually preferred the video experience to in-person visits, an unexpected finding. “Patients liked being able to see the physician eye to eye, seeing their vitals, and watching as the physician filled out the electronic medical record,” Boles says.

To read more about Cisco HealthPresence, visit [www.cisco.com/web/strategy/healthcare/care_at_a_distance.html](http://www.cisco.com/web/strategy/healthcare/care_at_a_distance.html).

To read more about Cisco Clinical Presence System, visit [www.tandberg.com/video-conferencing-industry-applications/telemedicine-clinical-presence-video-system.jsp](http://www.tandberg.com/video-conferencing-industry-applications/telemedicine-clinical-presence-video-system.jsp).

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