VIRGINIA TELEHEALTH NETWORK

Improving Access To Quality Health Care

Virginia Telehealth Network: The Way Ahead

For

FLEX Program Quality & Strategic Planning Meeting
Staunton, Virginia

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June 13, 2007

Purpose

- To integrate telehealth activities into the FLEX program for Virginia
- Explore opportunities for leveraging the FLEX HIT Grant

Objectives

- Brief overview of telehealth
- Introduce the Virginia Telehealth Network and describe its strategic direction
- Explore opportunities for enhancing rural health systems of care using telehealth

Biography

Cynthia Barrigan, RN, MPH
Fairfax, Virginia
Graduate Education: Johns Hopkins School of Public Health

Specializing in:

- Project Management
- Systems Design & Integration
- Operations & Implementation
- Information Technology

Telehealth/Telemedicine

- Federal Health Sector/Dept of Defense
- Pacific Rim to include rural Alaska
- Ground, Air and Sea-based operations

Research Interests:

- Remote health systems
- Public health informatics
- Health Information Systems in Disasters and Complex Emergencies

Telehealth

- Simply defined as:
  - The use of information and telecommunications technologies to distribute health services and education across the health care system.

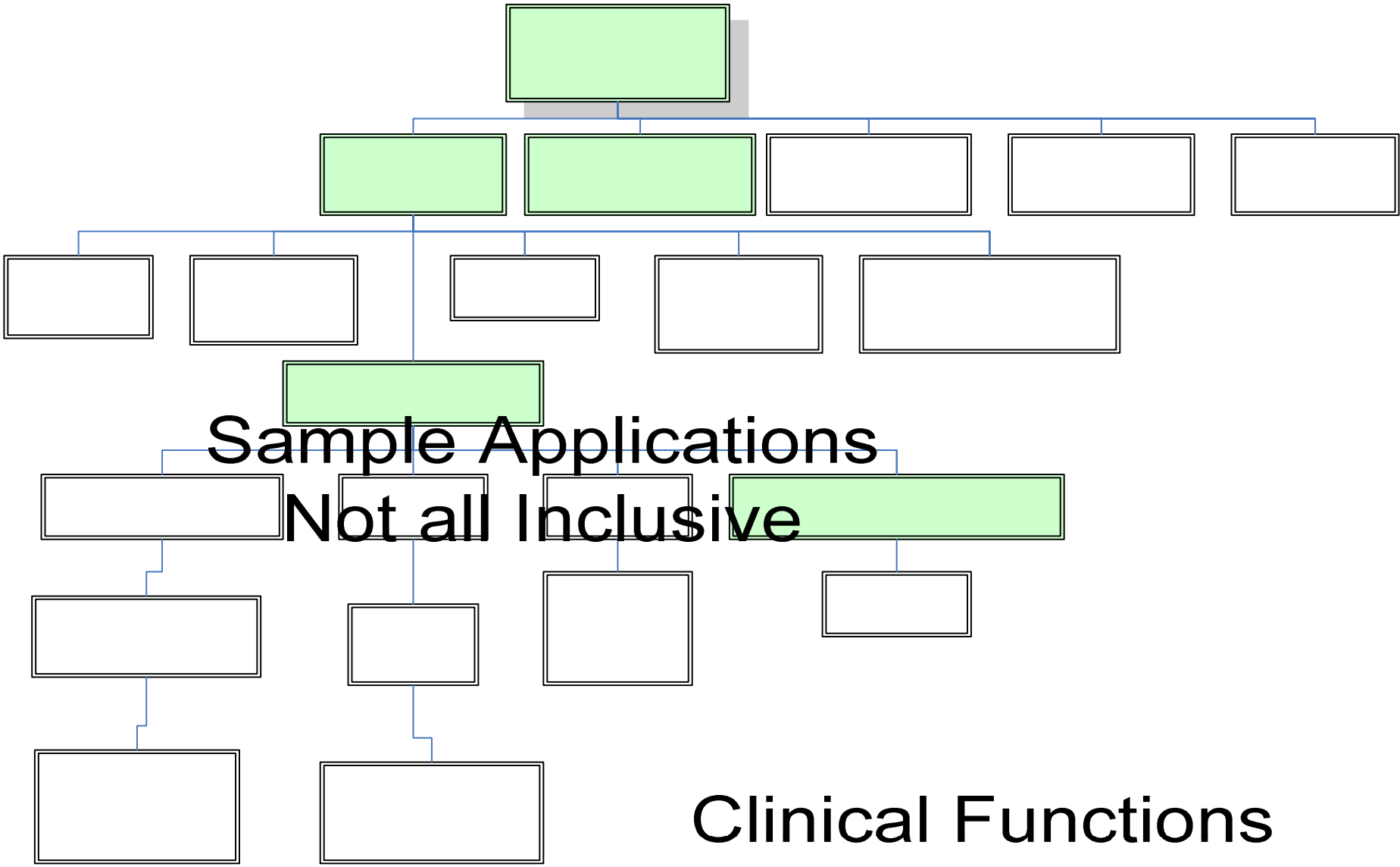
Telehealth Defined

- In reality, slightly more complex…
  - Telehealth is an organizational business practice using a combination of clinical, technical and business processes supported by policy, which enables a health care system to dynamically exchange electronic health information, health services and health education between providers, and/or providers and patients to facilitate the delivery of health care services.

Telehealth Defined

- Ideally, all healthcare encounters should be captured in a longitudinal multi-media electronic health record, however, few exist.
- Related terms/fields: E-Health, Telemedicine, Informatics, HIT, and other forms of medical communications

Scope of Telehealth



Fit for Telehealth

- Population-based (seniors, children, immigrants, etc.)
- Disease management (chronic diseases, asthma, melanoma, etc.)
- Emergency Services - focused on urgent and emergent care during a natural disaster or other crisis
- Diagnostic Interpretation & Treatment
- Quality-Improvement Initiative (focused on improving an existing service)
- Cost avoidance or some benefit to the system (decrease travel, reduce medical errors, reduce redundancy of medical tests, improve prescribing practices, etc.)

Anticipated Benefits of Telehealth

Patient

- Enhanced alternatives for accessing health services and educational experiences.
- Increase the real and perceived quality of health services
- Decreased travel for patients
- Reduction in number of missed work/school days
- Improved patient satisfaction with health care team
- Improve subjective quality of life

Primary Care Provider

- Enhanced monitoring and management of patient population
- Gains in efficiencies in their office practices
- Increased collaboration with other providers/decrease professional isolation
- Decision-support for diagnosis and management of complex cases
- Access to continuing medical education

Specialist (doctor, nutritionist, therapist etc)

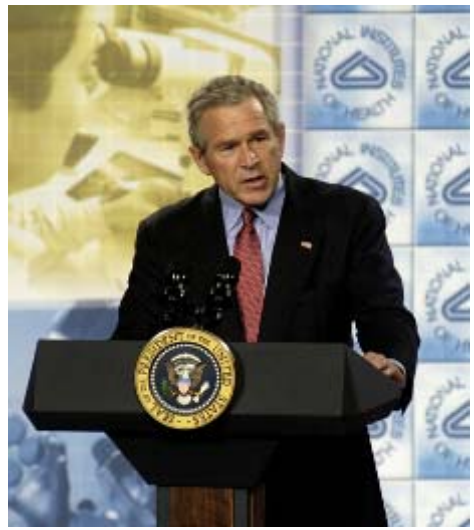
- Creative and convenient alternatives for delivery of specialty services remotely
- Greater continuity for follow-up care
- Collaboration with primary care team
- Expansion of their practice

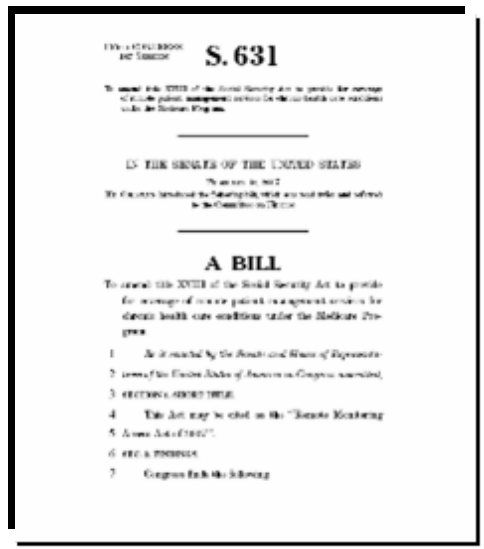
Health System

- Optimization of available resources
- Lower utilization- Fewer ER visits/hospitalizations (cost avoidance, decreased morbidity)
- Cost Savings- averting complications
- Workforce incentives- desirability
- Retain patients locally

Supportive Climate for IT Health Care Applications

- **National Level**
  - 2004 President's Goal: "Every American will have an electronic health record in the next 10 years".
  - Office of the National Coordinator, Health Information Technology (www.hhs.gov/healthIT)
  - Newly Introduced Legislation in 2007
    - *Remote Monitoring Access Act*
    - *Critical Access to Health Information Technology Act*
    - *Rural Medicare Equity Act*
    - *The Stroke Treatment and Ongoing Prevention Act*
    - *Fostering Independence Through Technology Act*
    - *Indian Youth Telemental Health Demonstration Project Act*
    - *Wakefield Act*
    - *Help Establish Access to Local Timely Healthcare for Your Vets Act*





S. 631

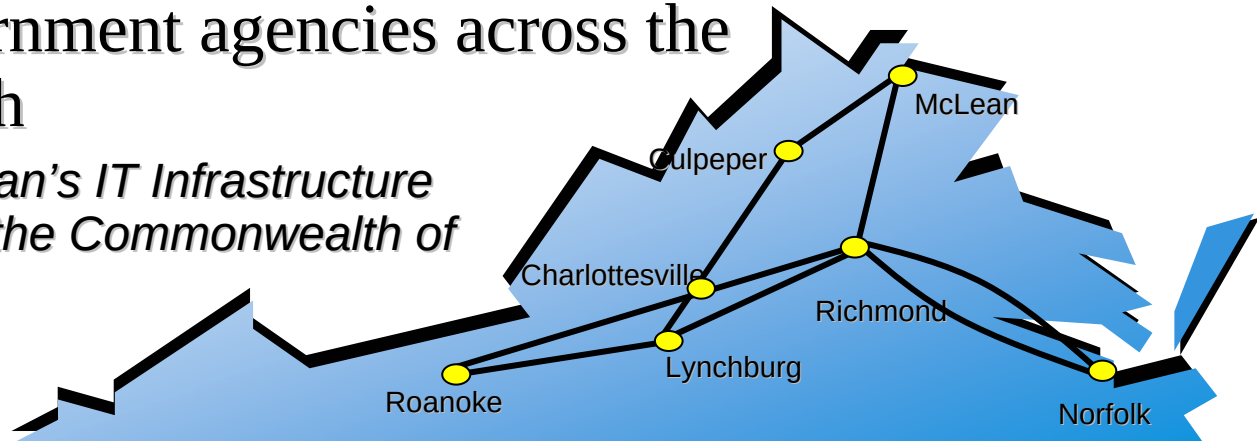
IN THE SENATE OF THE UNITED STATES

A BILL

Supportive Climate for IT Health Care Applications

- **Commonwealth Level**
  - Executive Order 29 issued 20 Jul 06
  - Governor's Health IT Council
  - $500K appropriation in FY06 to fund grants for the acquisition of electronic health records
- **IT Infrastructure Development Initiatives**:
  - VITA was established in 2003 to serve as a central, shared service provider for IT services to other state and local government agencies across the Commonwealth

Northrop Grumman's IT Infrastructure Partnership with the Commonwealth of Virginia



Funding Opportunities

- Medicaid Transformation Grant
- HRSA FLEX HIT Grant
- State Funding
- Office

FOR IMMEDIATE RELEASE
September 26, 2006

FCC ADOPTS PILOT PROGRAM UNDER RURAL HEALTH CARE MECHANISM

Pilot will Enhance Access Health Care Providers' Access to Advanced Telecommunications and Information Services

Washington, D.C. – Today, the Federal Communications Commission (FCC) adopted an Order that establishes a pilot program to help public and non-profit health care providers build state and region-wide broadband networks dedicated to the provision of health care services, and connect those networks to Internet2, a dedicated nationwide backbone…

Virginia Telehealth Network

- **Established November 2002**
  - 80 individuals representing 50 public/private organizations (academic medical centers, VDH, others)
  - Under the auspices of VDH/OHHP
  - All volunteer
- **VTN Mission**
  - As a volunteer consortium of health care providers and organizations across Virginia, we advance the adoption, implementation and integration of information and telecommunication technologies into mainstream health systems statewide to improve access to quality healthcare for all Virginians

VTN VIRGINIA TELEHEALTH NETWORK

VTN Accomplishments

- Infrastructure work group & survey 2003
- Regional efforts in telemedicine 2004
- Consensus meeting 2005
- Strategic Plan (version 1) published April, 2006
- Dedicated VTN resource hired in Jan 2007 by VDH OHHP
- Submission of the first state-wide telehealth network grant to the FCC Rural Health Care Pilot Program on May 2007
- Revised strategic framework for telehealth
- Governance structure being formed and 501c3 application underway- June 2007
- Launch of the VTN website

Unifying Strategy
Virginia Acute Stroke Telehealth (VAST) Network

- Top Health Priority
- Leverages work being done by the Virginia Stroke Systems Task Force
- Uses the stroke systems of care continuum- comprehensive approach
- Telehealth/Telemedicine has been effective

Continuum of Care

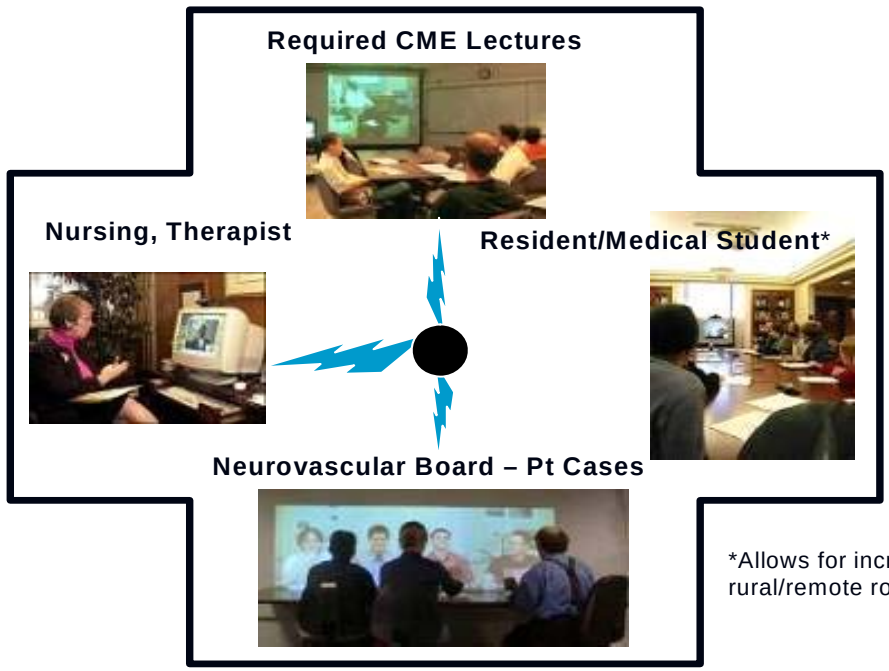
1. Prevention	2. EMS Notification & Response	3. Acute Treatment	4. Sub-Acute Care & Secondary Prevention	5. Rehabilitation	6. Continuous Quality Improvement (CQI)

Associated Telehealth Applications

Distance Learning & Consultation	Remote Monitoring	Telemedicine	Telemedicine	Distance Learning & Consultation	Distance Learning & Consultation

Prevention

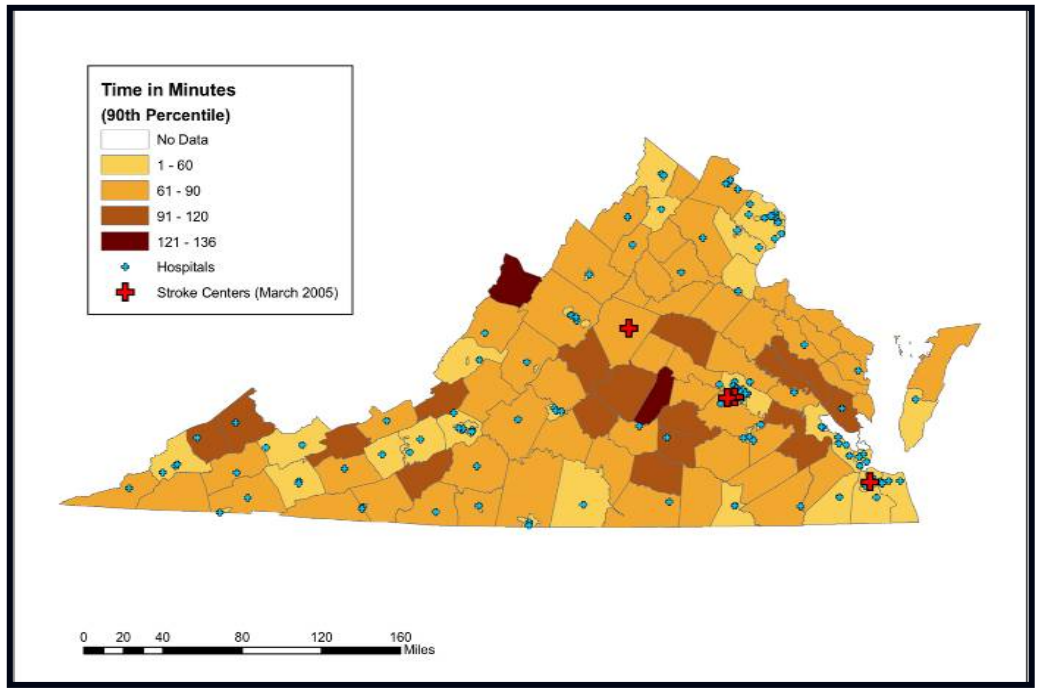
- Public Awareness
- Training & Education
- Teleconsultation w/ Specialists: PCPs need assistance diagnosing and managing co-morbidities (Endocrinology, Cardiology, Neurology)



*Allows for increased rural/remote rotations

EMS

- Remote monitoring
- Accelerate time to diagnosis and treatment
- Increase use of t-PA for ischemic strokes

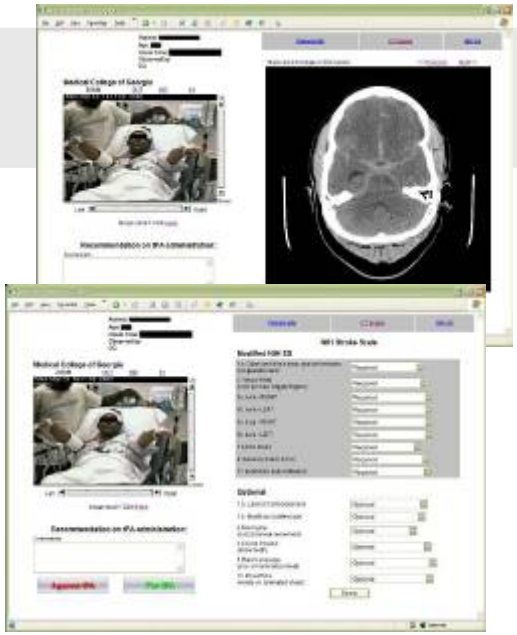


EMS Call Times for Potential Strokes
2003-2006

Acute Stroke

Connect rural sites to stroke centers
- Teleconsultation
- Teleradiology
- Web-based applications

Equipment at Rural Site



Images and Info Received at "Stroke Center"

Post-Acute Stroke

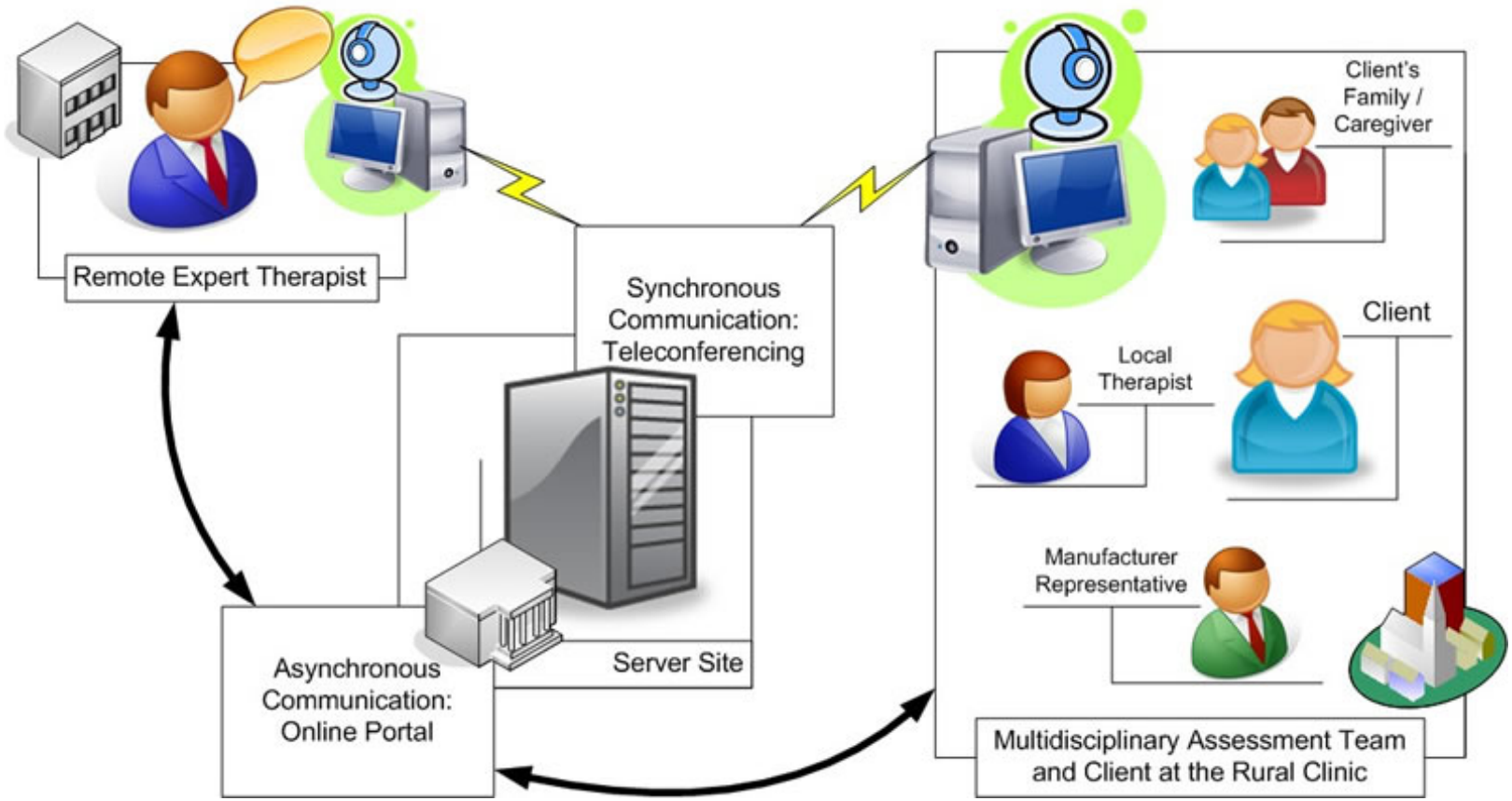
Transition to Home Care

Follow, observe and consult

Tele-rehabilitation

- Intake/Interview
- Physical Motor Assessment
- Mobility Related ADLs
- Goals
- Clinical Trials
- Home Assessment
- Final Specifications
- Documentation
- Funding Approval
- Fitting & Delivery
- Follow-up / Outcome

Tele-rehabilitation



WCC - Logitech Microphone (Pro 5000)
RST

Telerehabilitation at University of Pittsburgh

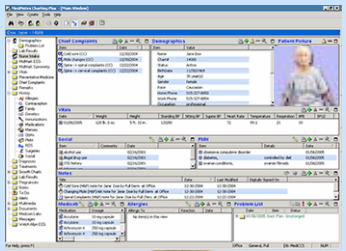
Continuous Quality Improvement

- Monitoring & evaluation of VAST business practices
- Fine-tuning protocols and procedures
- Peer review
- Supervision
- Sharing lessons learned

Spectrum of Capabilities for Diabetes Care

BASIC

Electronic Health Records
Automated CPGs



Retinal Imaging

Public Service
Announcements

Basic Websites

Podiatry Care

Internet-based
Interactive Disease
Management Portals w/
wide range of functionality

Nurse
Call Centers

Digital Glucometers
(and BP monitors)

Telephonic support by
Case Managers armed
with protocols/CPGS

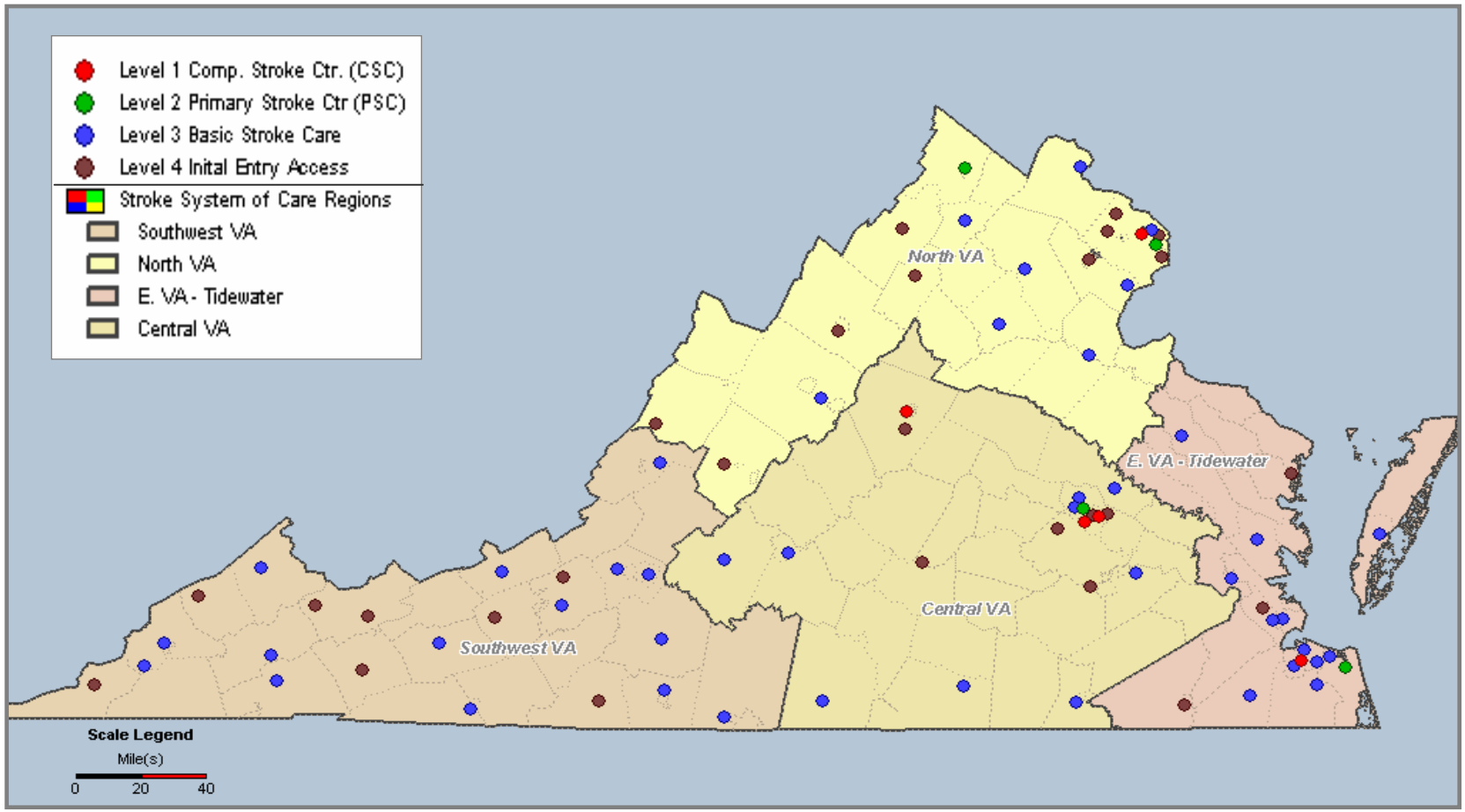
Distance Learning w
Video-conferencing for
Providers/Students

Video-phones

Patient Education/Counseling
via Video-conferencing
Nutritional counseling

SOPHISTICATED

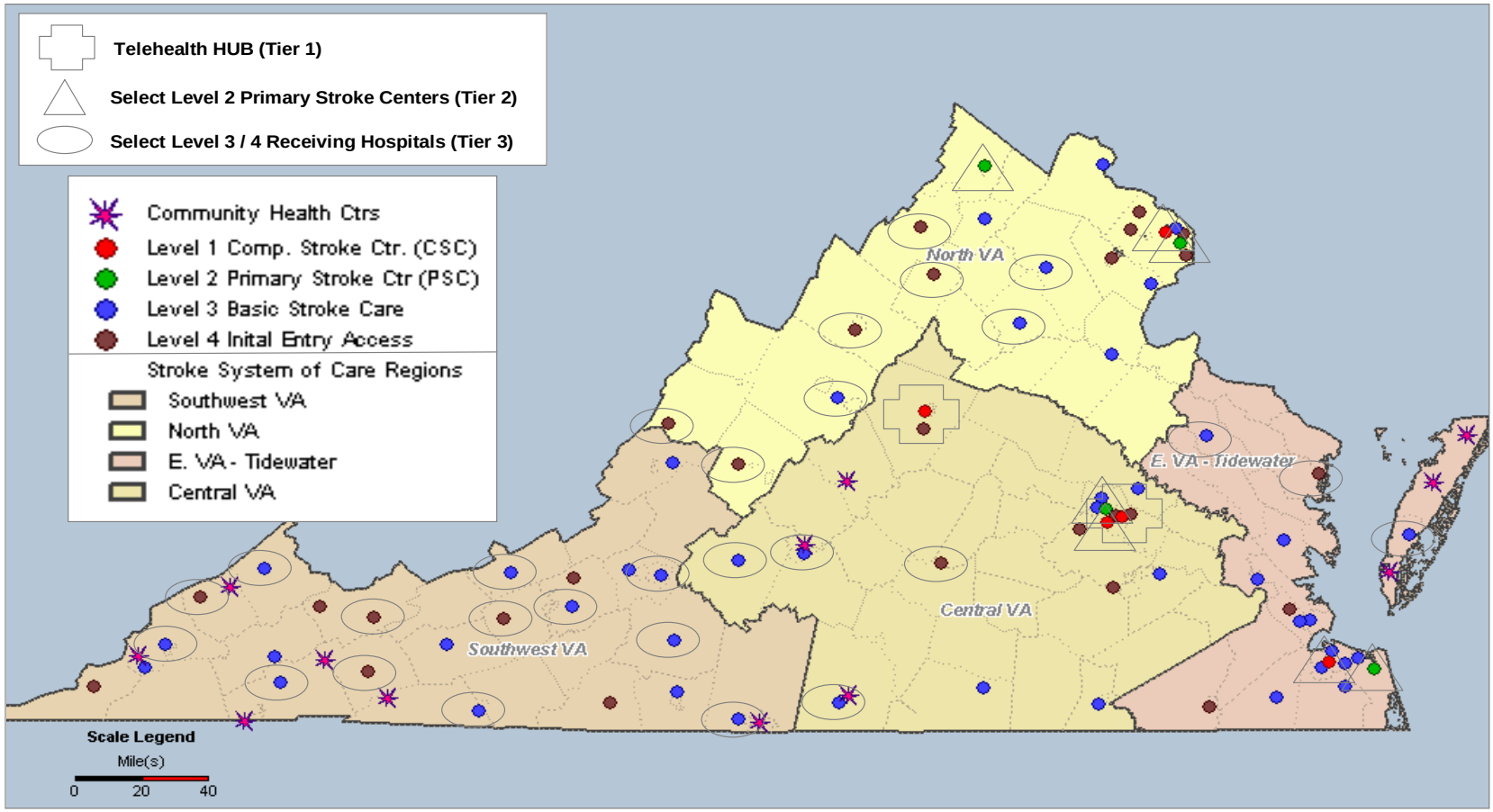
Virginia Hospitals by Stroke Center Designation



Map of Virginia Acute Care Hospitals Based on Stroke Care Capabilities

VAST Clinical Design

Virginia Hospitals by Stroke Center Designation



Immediate Next Steps

- Select sites for a Pilot program and conduct needs assessments
- Design a pilot program

Summary

- Telehealth is a growing component of the health care process and offers solutions to problems regarding resources and distances.
- VTN has been established to facilitate the growth of telehealth—starting with VAST
- Important to leverage the FLEX program in achieving goals and objectives for VAST
- Assist rural health communities in developing telehealth capabilities that meet local needs.

Conclusion

Important to remember that telehealth is not a new type of care, but rather a way of enhancing and strengthening health systems using tools, processes and people!

New VTN Website: http://Ehealthvirginia.org

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Improving Access To Quality Health Care

Monday, June 11, 2007

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Our Mission

As a volunteer consortium of health care providers and organizations across Virginia, we advance the adoption, implementation and integration of information and telecommunication technologies into mainstream health systems statewide to improve access to quality healthcare for all Virginians.

Who We Are

Initiated in 2002, *The Virginia Telehealth Network (VTN)* is a collaborative network of professionals representing more than 80 organizations from throughout the Commonwealth who have the desire and ingenuity to make quality health care accessible to more Virginians. Acting as their collective voice, the VTN helps set the direction and standards for not only establishing user connectivity, but for the processes and content that ultimately drive telehealth acceptance and usability by both health care providers and patients alike.

During its developmental stages, the VTN has temporarily operated under the auspices of the Virginia Department of Health (VDH). Through the ongoing, strong support of senior government and healthcare leaders and through the dedication of its grass-roots membership, the VTN became an independent corporation in the Commonwealth of Virginia in 2006. It is now in the process of being recognized as a 501(c)(3) not-for-profit organization to signify and facilitate its alignment with public interests.

In The News

- FCC's Rural Health Care Pilot Program Order Officially Released.
  READ MORE >>
- Eight states have telemedicine bills pending in their legislature this year.
  READ MORE >>
- The Agriculture Department makes $153 million available for distance learning and telemedicine in rural communities.
  READ MORE >>
- Telemedicine programs are having an impact in the workplace. One study shows significant savings.
  READ MORE >>

Quick Reference

- **FCC's Rural Health Care Pilot Program Order Officially Released.**
- **VTN Names Board Members**
- **American Telemedicine Association Annual Conference, May 12-15, 2007**

Thank You..

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http://ehealthvirginia.org

"Success is not a place at which one arrives but rather the spirit with which one undertakes and continues the journey."