

The future of Health in the age of Telehealth



M CHRIS GIBBONS, MD, MPH

MATRC TELEHEALTH SUMMIT

**CHIEF HEALTH INNOVATION OFFICER
CONNECT2HEALTH TASK FORCE
FEDERAL COMMUNICATIONS COMMISSION**

Connect2Health FCC



Vision

- Everyone connected to the people, information and supports they need to get healthy or stay well
- This goes far beyond providing traditional healthcare services via telephone, secure email, video or mobile device.

Connect2Health FCC



FCC Health Programs

- Spectrum regulation (Net Neutrality)
- Device Certification
- Rural Health Care Program
- Lifeline Program
- Catalyzing & enabling the future

Confluence of Challenging Realities



- Prevalence of Chronic Disease
- Burgeoning of the Senior population
- Increasing Longevity
- Rising Healthcare Costs
- Healthcare provider shortages
- Growing populations of Minorities, immigrants & underserved

Is Telehealth The Answer?



If not, what is the answer?

The Technology Opportunity



Information and Communications technologies are transforming society and revolutionizing every facet of American life, including how we shop, bank and even elect our presidents!

➤ *The Pew Internet and American Life Project*

The Technology Opportunity



Technology is having a disruptive
impact on society

Clayten Christensen
The Innovators Dilemma

Define telehealth?



- The use of *telecommunications technologies* to improve or enhance health
 - Clinical tools & Consumer Health tools
 - Internet/Broadband
 - Other

The Telehealth Opportunity



Telehealth will (is) significantly change how healthcare is defined, where it is practiced, who provides it, when it can be provided, the cost of providing it and thereby provide significant opportunities to improve national health and enable us to reach national health goals.

1) Healthcare Providers



- Providers – services delivered by highly trained medical specialists
- Caregivers, Patients
- Avatars
- Virtual Reality/AI
- Robotics

New Robots

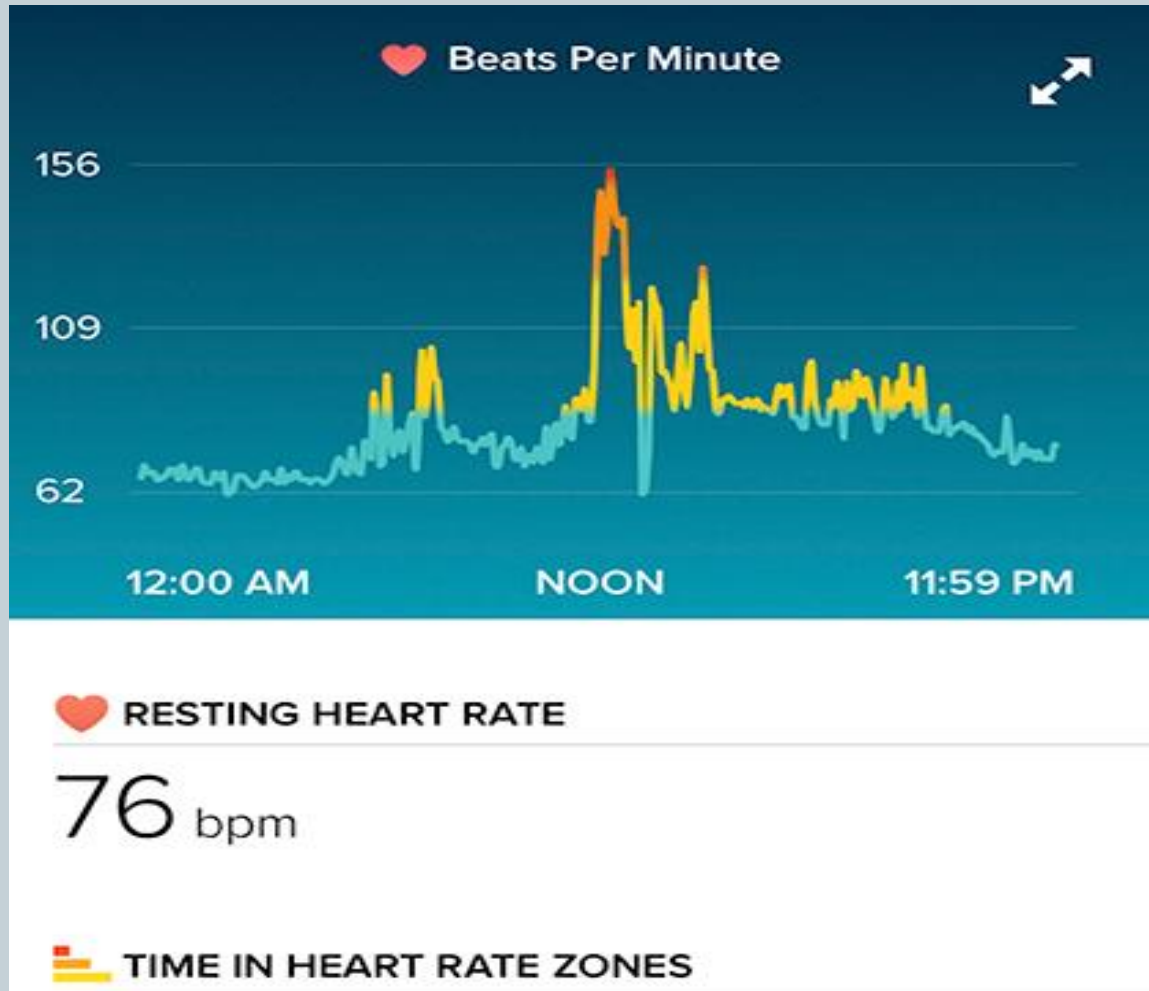


2) The Definition of Healthcare



- Healthcare – the provision of Medical Services
- Dr. Google
- The rise of health Apps
- Wearables, edibles, embeddables

Fitbit...Helps Doctors Decide to Electrically Cardiovert Patient



3) Where healthcare happens



- Historically healthcare happened in hospitals
- Second Life
- Holoportation
- Smart cars, homes, cities – Smart Care
- IoT – The Network Effect

Healthcare Providers



holoportation

<http://research.microsoft.com/holoportation>

Interactive 3D Technologies

<http://research.microsoft.com/groups/i3d>

Microsoft Research

3) Where healthcare happens



Smart Care

Connecting consumers to the information or care they need when they need it wherever they are.

3) Where healthcare happens



Smart Care Systems (IoT)

Networks of care systems that enable healthy environments that are proactive, predictive, personalized and passive.

4) Healthcare Costs and Financing



- Economies of Scale
- Retail Healthcare

The Future



Over time, there exists real potential to make significant impact towards the goal of improving health, lowering healthcare costs and improving access...

If we get it right!

Thank You!



Let's connect

Federal Communications Commission

- E-mail: connect2health@fcc.gov
- Twitter: [#C2HFCC](https://twitter.com/C2HFCC)
- Web: www.FCC.gov/health

- Twitter - @mcgibbons
- LinkedIn - Chris Gibbons, MD, MPH
- FCC – Michael.Gibbons@FCC.gov