



The shifting patient paradigm: embedding healthcare in everyday lives

Maarten Barmantlo
Consumer Healthcare Solutions
Personal Health Systems, Brussels
February 12, 2007

Europe anno 2007: telemedicine today or tomorrow?

- Europe is well positioned to become the world leader in telemedicine
 - Future demographic challenges will drive change in delivery of (health)care
 - Powerful assistive technologies exist and are evolving
 - Medical science is advancing in new and exciting ways
 - Citizens and government recognizes the need for a new paradigm of care



Philips Consumer Healthcare Solutions

We know

- Advances in technology and medicine are enabling people to grow older, healthier.
- Chronic disease is on the rise
- Healthcare costs are increasing and the economic burden of caring for the aging population is growing

We believe

- That technology is a means to enhance healthcare and wellbeing in society and offers opportunities to serve patients in new ways and in new settings.
- That responsible self management of health will eventually decrease the burden of chronic disease.
- That sustainable good health is a global right, not a privilege, independent of time or place

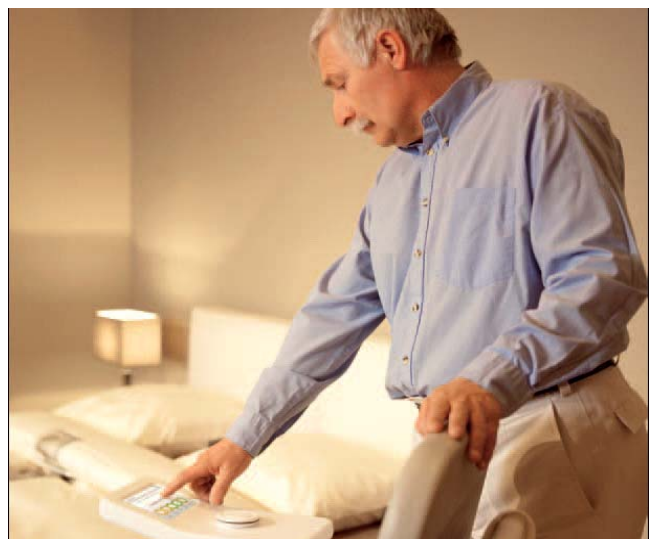
Development of telemedicine today



- Development being driven by all these stakeholders: independently, collaboratively, and with support and partnership from the EC
- Technology solutions exist and are being refined thanks to these developments
- Europe is ready for the next phase of development but needs to be stimulated



- Industry
- Healthcare providers
- Academia
- Payers
- Government

MyHeart Initiative investigating solutions for cardiovascular health



- Research project funded by the EC and led by Philips with 33 academic and industry partners (2003-2007)
- Periodic or continual vital signs monitoring in order to gain knowledge about a person's health status.
- Functional clothing with on-body sensors (textile and non-textile) and electronics into intelligent biomedical clothes.
- Results sent via personal wireless network to a mobile phone and/or PDA and **NOKIA** hospital or other healthcare provider.  

MyHeart Application Concepts

preventative healthy living

Health condition spectrum

living with chronic condition

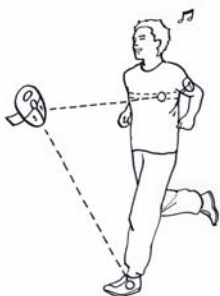
Staying
Healthy

Healthy
at Risk

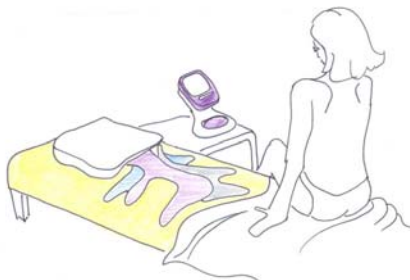
Post
Event

Chronically Ill
(AF, CHF,..)

Activity
Coach



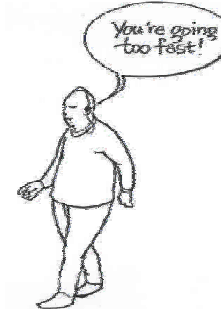
Take
Care



Neuro
Rehab



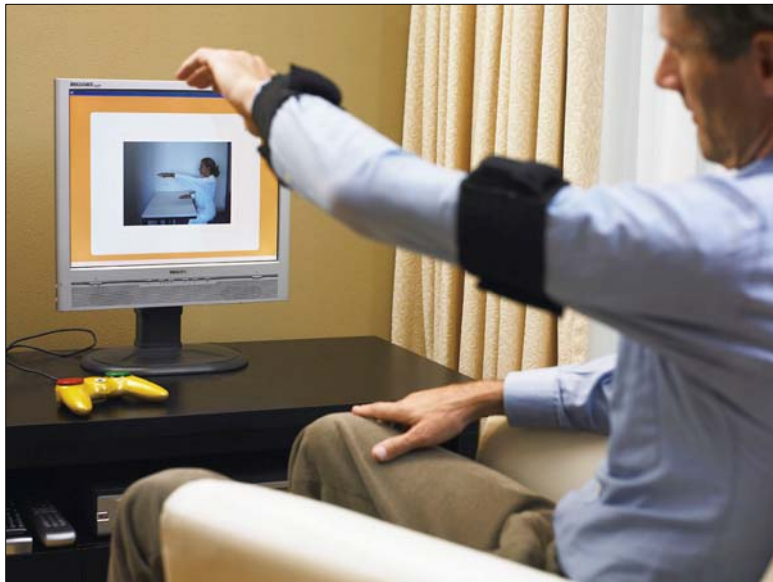
Heart Failure
Management



Stroke Rehabilitation Exerciser

Providing patients with the rehabilitation they need:

- Deliver remote motor therapy by coaching and monitoring
- Support and maintain an efficient recovery by increasing the patient's training intensity.



Exercising at home – under professional supervision



With our clinical partners, the Stroke Rehabilitation Exerciser enables novel approaches in motor home therapy.

Philips *motiva*

interactive telemonitoring healthcare platform

- Providing an interactive care bridge between patients and their healthcare providers

- Better patient health

- Tailor-made care

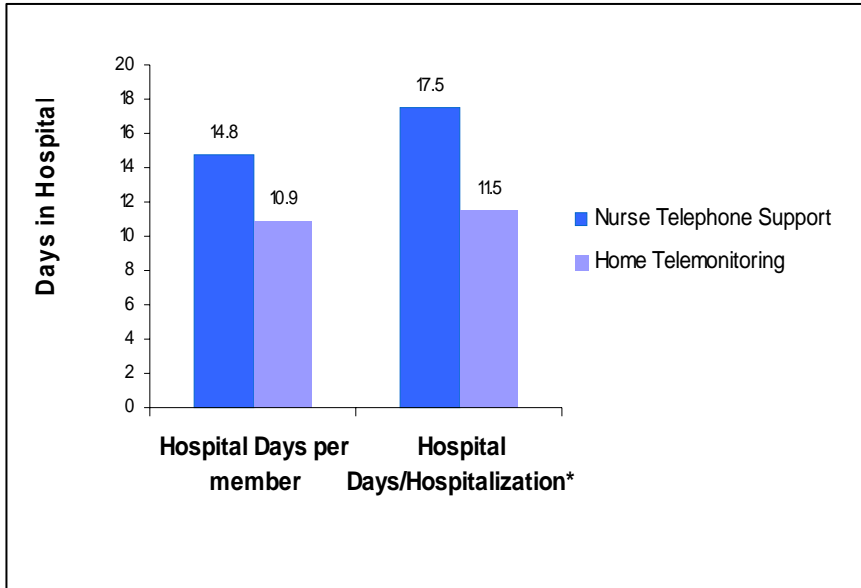
- Patient satisfaction



Remote patient management via telemonitoring

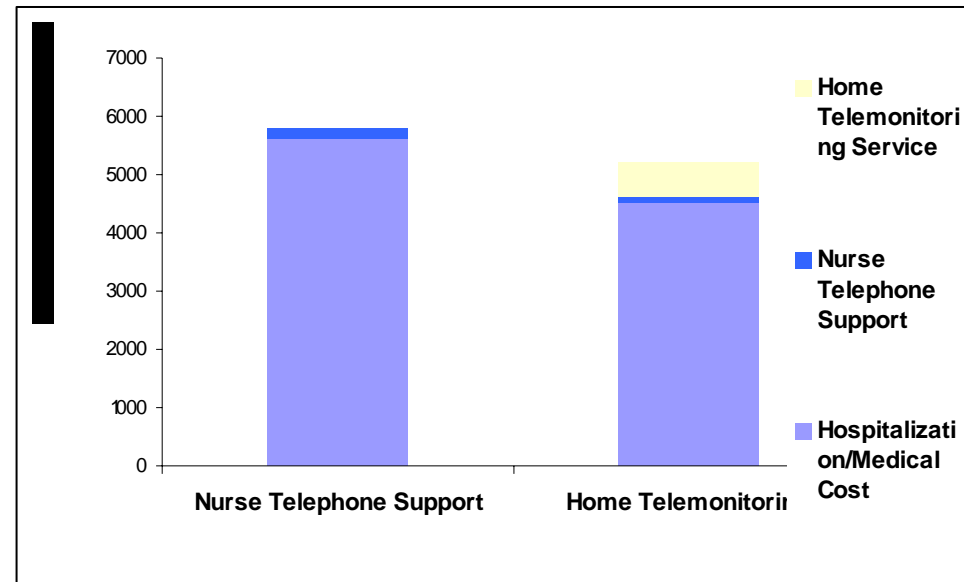
Improved clinical and financial outcomes

Reduced Hospitalizations



26% fewer days in hospital than with Nurse Support

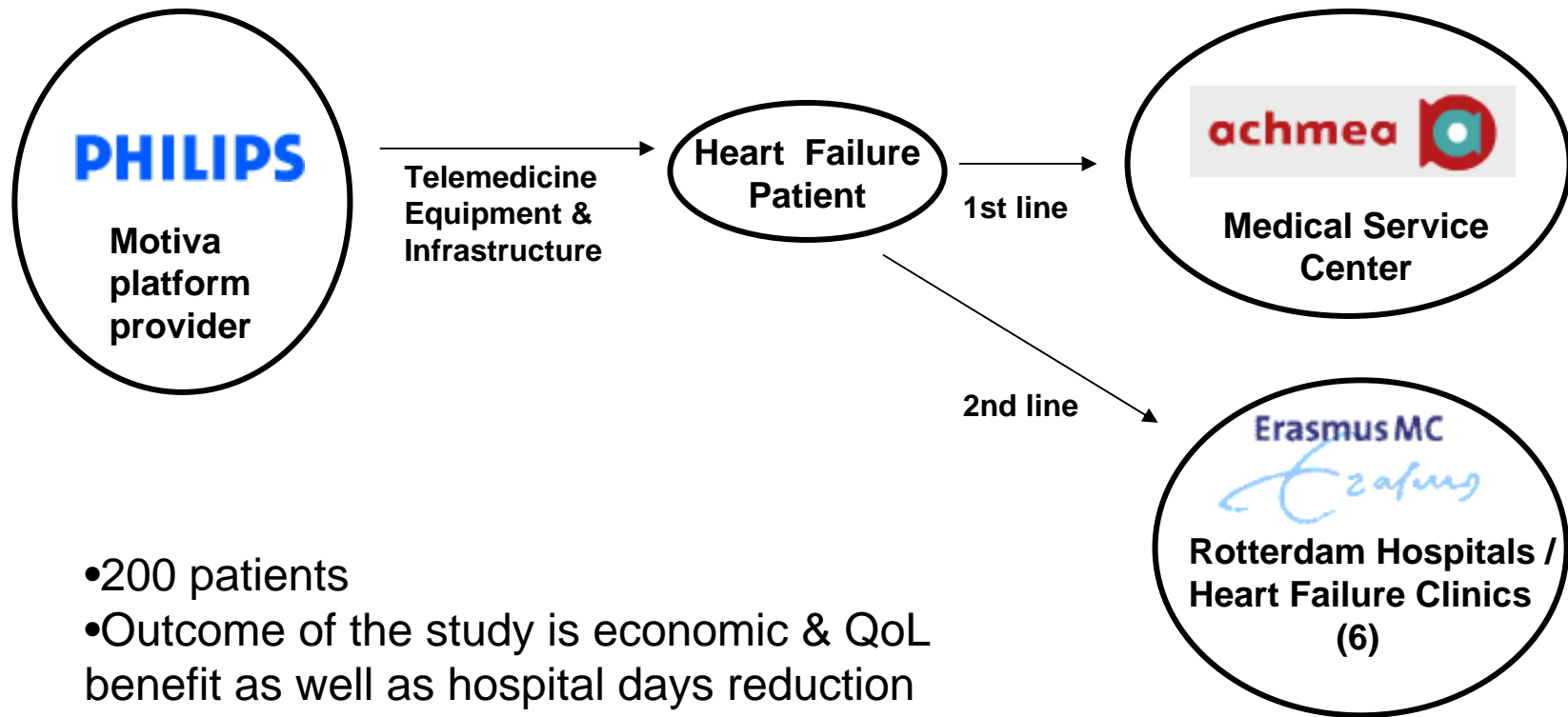
Cost Savings



- 10% cost savings over Nurse Support program
- ROI of 2.1 vs. Nurse Support

Source: TEN-HMS Study, Univ. of Hull, UK

Motiva Telemedicine Pilot (Netherlands)



- 200 patients
- Outcome of the study is economic & QoL benefit as well as hospital days reduction
- Started July 2005

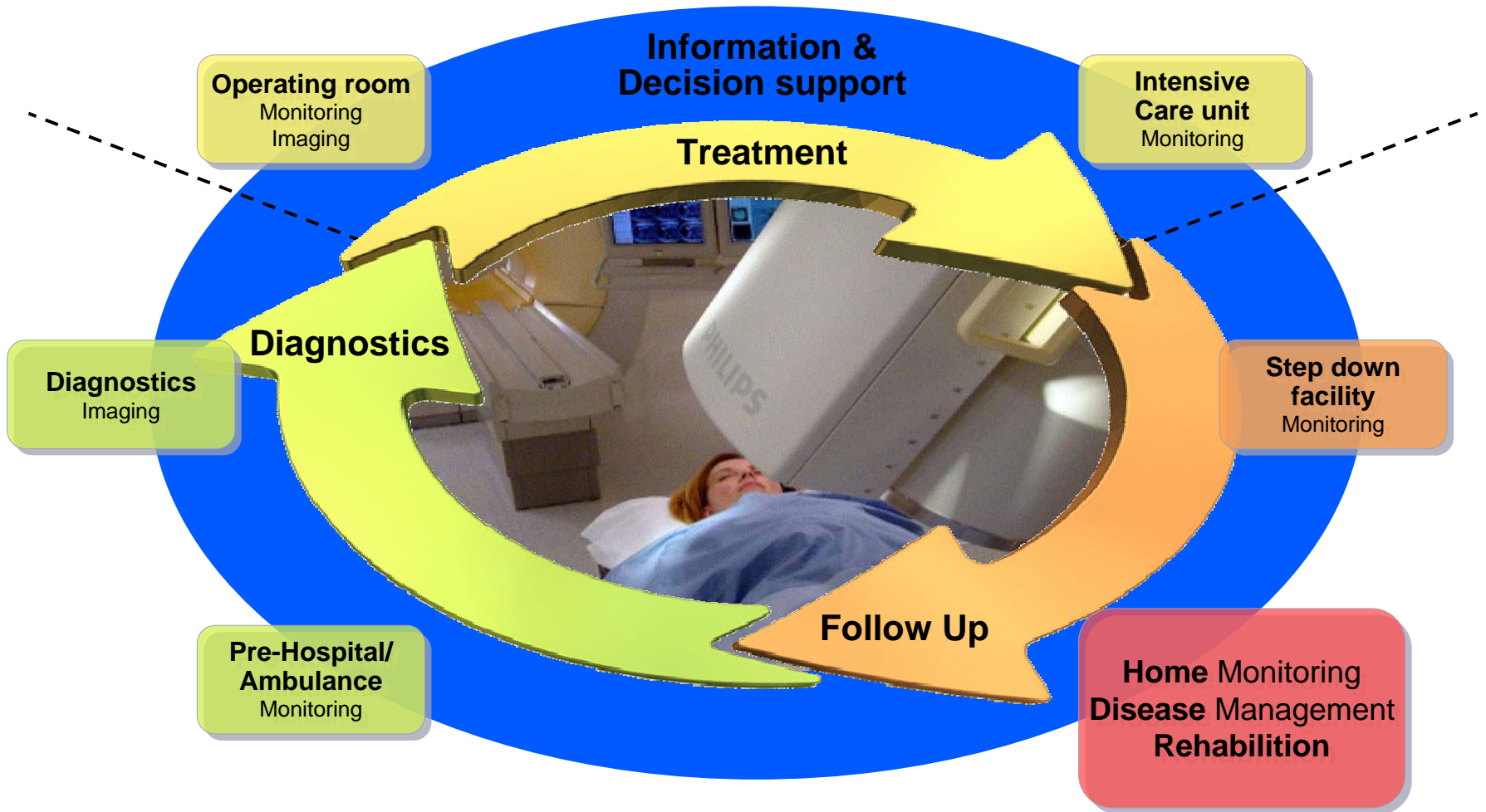


Development of telemedicine tomorrow

- Continue to refine, develop and test current assistive technologies
- Stimulate an environment in Europe for further collaboration through Pan-European initiatives
- Undertake the collection of large scale clinical evidence to define models to optimally integrate telemedicine into existing or new healthcare delivery models
- Develop regulatory, legal and reimbursement infrastructure to support new models of healthcare delivery via telemedicine



Focus on the complete care-cycle



Europe anno 2007: telemedicine today or tomorrow?

- Europe is well positioned to become the world leader in telemedicine
 - Future demographic challenges will drive change in delivery of (health)care
 - Powerful assistive technologies exist and are evolving
 - Medical science is advancing in new and exciting ways
 - Citizens and government recognizes the need for a new paradigm of care





Consumer Healthcare Solutions

Current portfolio of products and services

Supporting independent living

Lifeline



Medical alert services

Supporting remote patient management

PTS



Post-discharge telemonitoring

motiva



Remote patient management