

Global Trends and Philips Dialogues

Philips publications September 2011



PHILIPS

Global Trends and Philips Dialogues is part of
the series of Philips Publications published by

Philips Professional and Public Affairs
Amstelplein 2
1096 BC Amsterdam
The Netherlands

Editor in Chief

Koen Joosse
koen.joosse@philips.com

Subscription

If you would like to receive future publications,
please register through:
ppa@philips.com

© 2011 Koninklijke Philips Electronics N.V.
All rights reserved.

Aging Well

The issue of Aging Well brings together high-level policymaking and our own personal destinies, in ways that resonate powerfully.

We will each of us grow old – and grow older too with each new generation or medical innovation. So we must address not just the quantity, but the quality of our allotted time.

By working together, we can help change the experience for ourselves and for countless others. The familiar narrative of aging as a process of degenerative change, often involving isolation, dependence, disease and unproductiveness, can and needs to be transformed.

In its place comes Aging Well, an approach to life transition that extends the health autonomy, community engagement and social inclusion of the elderly in ways that make our society better equipped to deal with aging populations and improve the health and well-being of this growing group of inhabitants.

The European Commission's newly-created Innovation Partnership on Active and Healthy Ageing – with Philips President and CEO Frans van Houten on the Steering Group – has set itself a quantifiable challenge: to ensure that by 2020, all EU citizens enjoy an extra “two healthy life years.”

Critical to this transformation is the role of technology. It has the power to keep not just the chronically ill, but the fit and healthy too, away from hospitals or institutions.

That means changing the mindset of clinicians, regulators, policymakers, insurers – each with a role to play to ensure that we improve care in a way that is meaningful and economically sound.

Four meetings of the Active Aging think tank of the Philips Center for Health and Well-being have helped sketch the contours of Aging Well. In this edition of Global Trends and Philips Dialogues, we deliver a “work in progress” report from the think tank and expert members of this panel.

We hope you'll find good ideas that become a part of your own global conversation on aging.



Koen Joosse, Editor-in-Chief

The Age for “Renegotiation”

Identifying the various stages of aging and the life transitions that occur with each is key to charting how policy makers, businesses, families, and individuals themselves can build systems to ease the inevitable march of time.

By Dr. Leonard Marcus

The search for a universal formula that defines “Aging Well” and identifies strategies for successfully managing life’s transitions soon comes up against one incontrovertible fact: everything must be “renegotiated.” Many times, those moments of renegotiation are accompanied by a sense of personal, familial, or societal crisis. There is usually a set of questions that must be asked and the answers often take us to an even a wider scope of queries.

I have the honor and privilege to serve as facilitator for the Philips Center for Health and Well-Being Active Aging Think Tank. I share here some of the intersections with my work at Harvard and that lend perspective to what we are doing and what we might contribute.

Renegotiation

Colleagues Barry C. Dorn, M.D., Eric McNulty and I just published a Second Edition of our book, *Renegotiating Health Care: Resolving Conflict to Build Collaboration* (San Francisco: Jossey-Bass Publishers, 2011). The premise of the book is that much in health care is changing: how those who are part of the system negotiate those changes will determine much about what the system can accomplish, the satisfaction derived from working in it, and the experience getting services from it.

We highlight four developments that are at the heart of many current changes in health care: 1) Changes in the health system overall, prompted in large measure by developments in financing, in the United States with passage in 2010 of the Affordable Care Act; 2) The evolution of technology, the difficulties in integrating new technologies into the system, and the opportunities that new capabilities can provide;

3) The negotiating patient, a better informed, more inquisitive, and therefore more active participant in negotiating the care they expect; and 4) Changing work and a changing work force driven both by the explosion of technical capacity and information as well as shifting demographics: fewer workers and more people expecting service.

Aging and the health care system that often accompanies it often meet at the cusp of the quality of life and life and death itself. Whether in the role of patient, provider, or manager, one’s values, beliefs, and personality are exposed and interlocked with the principles, beliefs, and personalities of others amidst the close interpersonal proximity of health care decision making, negotiation, and conflict.

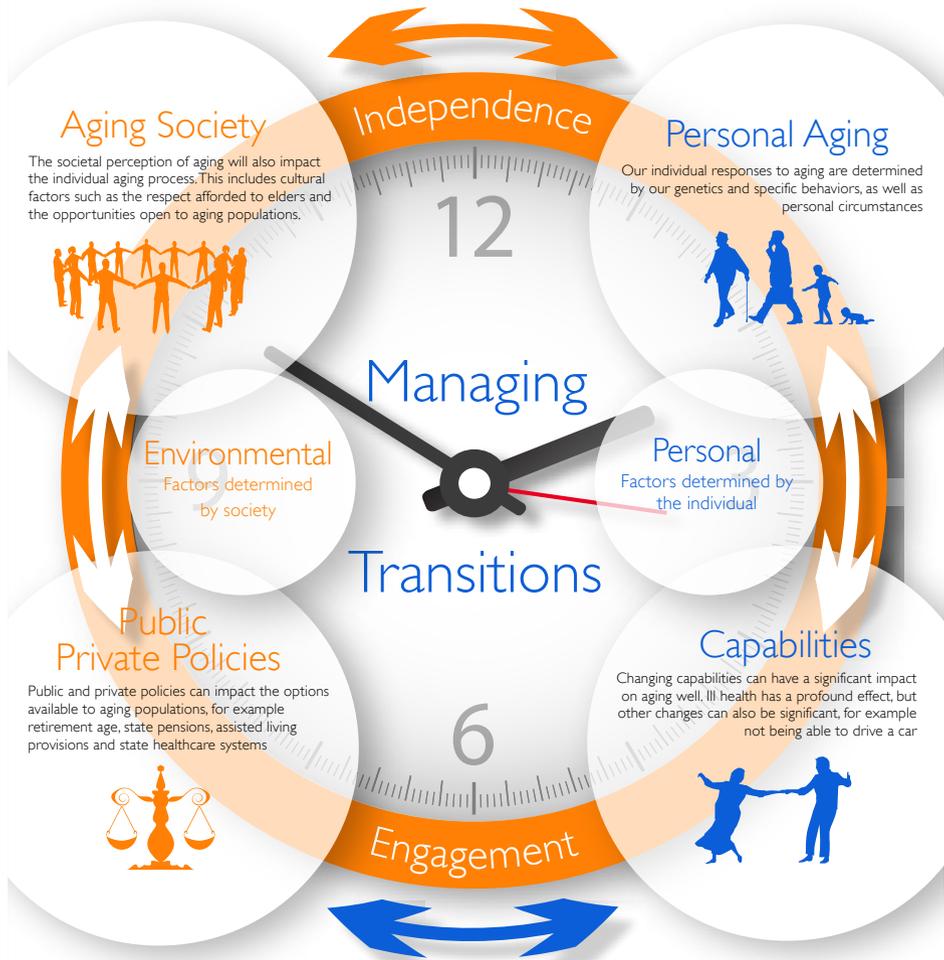
How does this renegotiation pertain to the work of our Think Tank?

Each step in the aging process demands a dynamic re-balance among the many people and factors that comprise one’s immediate social circle. The desire for engaged and independent living must weigh in with financial considerations, the availability of health and social services, and the needs and desires of others. Each renegotiation is stoked with emotion, the search for an appropriate set of options and choices, and implications and consequences for all involved.

There are many social levels at which this and other “renegotiation” must take place. It is personal, familial, community, clinical, organizational and at the societal level as well. At the most fundamental level, this renegotiation occurs within families: expectations, the relationship, and decisions may need to be discussed and readjusted as the aging process

Aging Well

The Active Aging think tank has outlined a number of important factors that impact on our ability to age well. The ability to age well is affected by a number of factors: personal capacity to react to life's transitions; individual behaviours and health status; societal factors (including public policy and cultural expectations of aging); and the individual's ability to engage with their community and remain independent.



Managing Transitions

The challenges associated with aging are very personal to each individual and his circumstances but there are common threads that exist in all societies. The transitions of aging can include circumstances such as changing work role, altering health status or expanding familial role. Each individual's ability to address these transitions will be different and will be impacted by their level of independence and engagement with the broader community.

evolves. At the same time, a parallel renegotiation occurs at the societal level. Payments, policies, and social expectations are very much in transition as an expanding population cashes in on their anticipated golden years.

Aging itself is an active process of managing and renegotiating through the transitions. The framework adopted by the Think Tank takes into account both environmental as well as personal factors that affect the balance of independence and engagement. These operate in the context of an aging society, personal aging, public and private policies, and changing capabilities. Just as simple chronological age is no longer a reliable yardstick to who's "old" and who's not, so too established attitudes about changing personal capabilities and public and private policies that guide the concept of aging are being rethought.



What are the factors that can abet and ease discussions and decision-making to encourage healthy, happy and independent living as well as appropriate support and service during periods of transition? What are the ingredients for productive and constructive negotiation?

1. Options. As we observe different cultures and societies, we find that the options available to the aging population are rapidly changing. The more options available, the higher the likelihood that individuals will find an arrangement suitable to their particular stage of life.

2. The Capacity to Exercise Those Options. Without the finances or access to desired options,

independent and engaged living may very well not be an option. As we consider economic models and factors that face a growing population entering their older years, payment factors will be critical in determining the range of choices an individual and then societies as a whole are able to exercise. Retirement planning, financing systems, medical insurance have grown on the assumptions of a somewhat predictable life expectancy. What happens to the availability of those options when people live significantly longer than expected?

3. An Understanding and Awareness of Options and Implications. The aging process presents individuals, families, and societies with a range of unexpected uncertainties combined with a paucity of knowledge and information. It is a complex societal and policy process, and just as individuals must understand the choices, options, and implications of what they face, so too must the societies in which they live.

The Roadmap we construct in many ways will be a guide for the many levels of negotiation and renegotiation that societies face. What can societies, businesses, families, and individuals do to build options? What can be done to assure the capacity to exercise those options and encourage a broader understanding of what this all means for successful independent living?

Crisis Decision-Making

Shortly after 9/11, I was among a set of faculty at Harvard asked by the U.S. government to engage in the newly critical field of terrorism preparedness and emergency response. Our focus is on leaders and leadership in times of crisis. How would their individual behaviours as leaders affect the behaviours, actions, and attitudes of those in government agencies as well as in the country and world at large? To find answers, we opted to go to the field, often in times of crisis, to be with leaders as they led. What have we learned about leaders in crisis and how does it inform the work of the Think Tank?

The crisis moment often ignites our most primitive survival instincts. Once sparked, our thinking and options often operate within a very limited spectrum: freeze, flight, and fight. We call that process "going to

the basement," that lowermost primal section of the brain that we humans share with the reptiles and the rabbits. We teach leaders how to get themselves up and out of the basement to higher levels of thinking, decision-making, and acting, and then how to lead others to do the same.

Periods of transition for those traversing the aging process are also fraught with moments of crisis. There are personal health crises and financial crises. As countries ponder their baskets of social services amidst economic crises, cutbacks generate broader social crises. And every crisis ignites a transition. Things won't and often simply can't be the same on the other side of a cataclysmic event.

What can be done about this? In our research, we have found that some leaders, organizations, and peoples can be far more resilient than others. What are the distinctions that lend this vibrancy and capacity to bounce back after being hit and sometimes hit hard?

Resilience is often a function of knowing what to expect and being prepared to cope with it. It is enhanced by experience: one can build social immunity to adverse events just as the body can build physical immunity to harmful biological hazards. The more intentional and active people are in putting back in place what can be resurrected, the more likely are they and their social circles to be resilient. Even in light of a catastrophe, these leaders and their followers are able to efficiently and effectively bounce back.

One aspect of successful aging is that capacity for resilience. There will be the falls, the deaths of others, the health set backs, and the disappointments of reduced functioning. One important aspect of successful aging is being able to lead oneself and others through those crises, build a set of viable options on the other side, and then have the way and the will power to exercise them. Resilience is a critical quality for successful aging and continued, engaged living.

Meta-Leadership: The Big Question

How do we describe those unique individuals able to lead through crises, prompt resilience, and capture

that bigger picture of connectivity and purpose? We term such people "Meta-leaders." These people carry the emotional intelligence and the presence of mind to understand and convey what is happening. They are able to engage followers in meaningful and significant activity. They make a difference.

In our work in the Active Aging Think Tank, we have been searching for a "big idea" that can capture what we are doing and engage the thinking and imaginations well beyond our own conversations. What could inspire that sort of big picture thinking, a meta-leadership perspective on the question?

Evolution. Many people think of evolution as something that happened: we were monkeys, now we're humans, end of story. In fact, evolution is very much a continuous, incessant process. And those of us living today are very much a part of that evolution. We are experiencing now something in that march of time that has likely never happened before. We are living through a rare evolutionary moment that we have experienced from its beginnings to its very substantial implications.

There are many who would describe the present time frame as an evolution of technology. This new technology is not itself the significant step in this evolution.



In our lifetime, we have seen the explosion of health capabilities and safety procedures that are significantly extending human life expectancy. This is a phenomenon that took off in the post-World War II period. Fewer die from injuries because we have

greatly enhanced the safeguards of our transport systems, cities, and personal environments. People live longer because of the capabilities of our health care systems.

There are implications for our work lives, economies, relationships, and housing. Basically everything about human life changes if we are living significantly longer. We can only speculate what this could all mean for older adults now and for newborns and their future. How will we have to rethink everything about the life span if centenarians become the norm and years beyond become the possibility? Successful aging becomes a much more complex topic.

Envisioning a different future for aging

What will "aging well" mean for the current generation as well as future generations? Our ThinkTank hopes to help frame the options in very pragmatic terms. What is the value of an extra year of independent living? The Roadmap we are developing will lay out the items and questions.

We can ask what it will take for people to exercise options for independent living in societal terms. How might the discussion be reframed? The current narrative tends to view aging as a process of decline rather than as a time for new opportunities and

possibilities. We need a positive agenda to encourage the creativity of business and industry to provide consumer solutions for seniors that enhance their independence and autonomy, diminish isolation and affirm their value to society.

We are living longer today not because of changes in our physical being. Evolution does not happen that quickly. We are living longer because factors external to our anatomy have changed.

Those hazards that could kill us and those protections that can sustain us are in a new balance.

Pragmatically, it means we are renegotiating our life span and our lives. Emotionally, it manifests as a set of crises, since we are not prepared for all that will become of us.

As we search for the big ideas to inspire policy makers and entrepreneurs, we can certainly reach for an ideal platform upon which personal aging has the greatest likelihood of being successful, for individuals and the societies in which they live and seek support. Can we find such an ideal? Probably the ideal is a picture that will constantly change as shifting demographics, burgeoning technology, and the expectations for aging further evolve.

And that is what renegotiation is all about.



Leonard J. Marcus

Leonard J. Marcus, Ph.D. is founding director of the Program for Health Care Negotiation and Conflict Resolution and founding co-director of the National Preparedness Leadership Initiative at the Harvard School of Public Health. Dr. Marcus is an expert panel member and facilitator of the Active Aging think tank of the Philips Center for Health and Well-being.

Home Healthcare with Technology for Active Aging

The way we live, work and communicate is increasingly influenced by digital products and services. Growing old is no different, writes “Aging in Place” specialist Laurie Orlov.

By Laurie Orlov

Technology is helping the 80% of seniors in the United States who live at home to retain their independence, to stay out of institutions -- and to enrich their life quality and family interactions, using consumer products in sometimes-imaginative ways.

The formally defined global home healthcare equipment market is set to reach US\$ 66 billion by 2016 (according to GBI Research). This includes telehealth and monitoring equipment, respiratory aids and unobtrusive medical technology. But there's an estimated US\$ 20 billion-plus universe of mainstream digital aids, 'apps' and online tools that will ensure baby boomers a safe, quality retirement.

Overall, technology should help reduce the 34 percent share of total healthcare spending racked up by seniors who today account for just 12 percent of the US population. Whether it's working out at home using a Nintendo WiiFit, using smartphones and social media to stay in touch, or reading with an eyesight-saving Kindle tablet, technology is increasingly at the service of seniors.

Technology is a key plank in the Aging in Place phenomenon. The Journal of Housing for the Elderly defines this as not having to move from one's present residence in order to secure necessary support services in response to changing needs.

Simply put, Aging in Place combines the principles of independent living (because older people increasingly want to stay at home rather than in

nursing homes), and aging well (because they retain their social networks).

Because over 70 million people in the US will qualify for this status by 2020, there's a significant market opportunity. Policymakers, insurers and managers of Assisted Living Facilities (where seniors in the US will spend an average of \$51,000 a year by 2015), need to help retirees not living in nursing homes control costs with the help of technology. Meanwhile, the “care gap” caused by shortfalls in the numbers of professional and informal care-givers, rising life expectancy for the elderly, and the macroeconomic squeeze, all push technology-in-home solutions forward.

RAND (http://www.rand.org/pubs/occasional_papers/OP323.html), a non-profit research organization, conducted a survey of home health care in six key countries. Sponsored by Philips, “Health and Well-Being in the Home” found technology helping to transform the current provider-driven model into a patient-centric system that's effective in both clinical and cost terms.



Active aging technologies at home*

Safety and security

Home and personal monitoring can prevent accidents and improve emergency responses.

Home healthcare examples: Medical alert services, fall detection

Health and wellness

Out-of-hospital care for chronic patients and solutions for healthy aging can enhance independence.

Home healthcare examples: Telehealth, medication dispensing systems, activity monitors

Learning and Contributing

Empowering people to keep learning, working and contributing to society can increase patient activation.

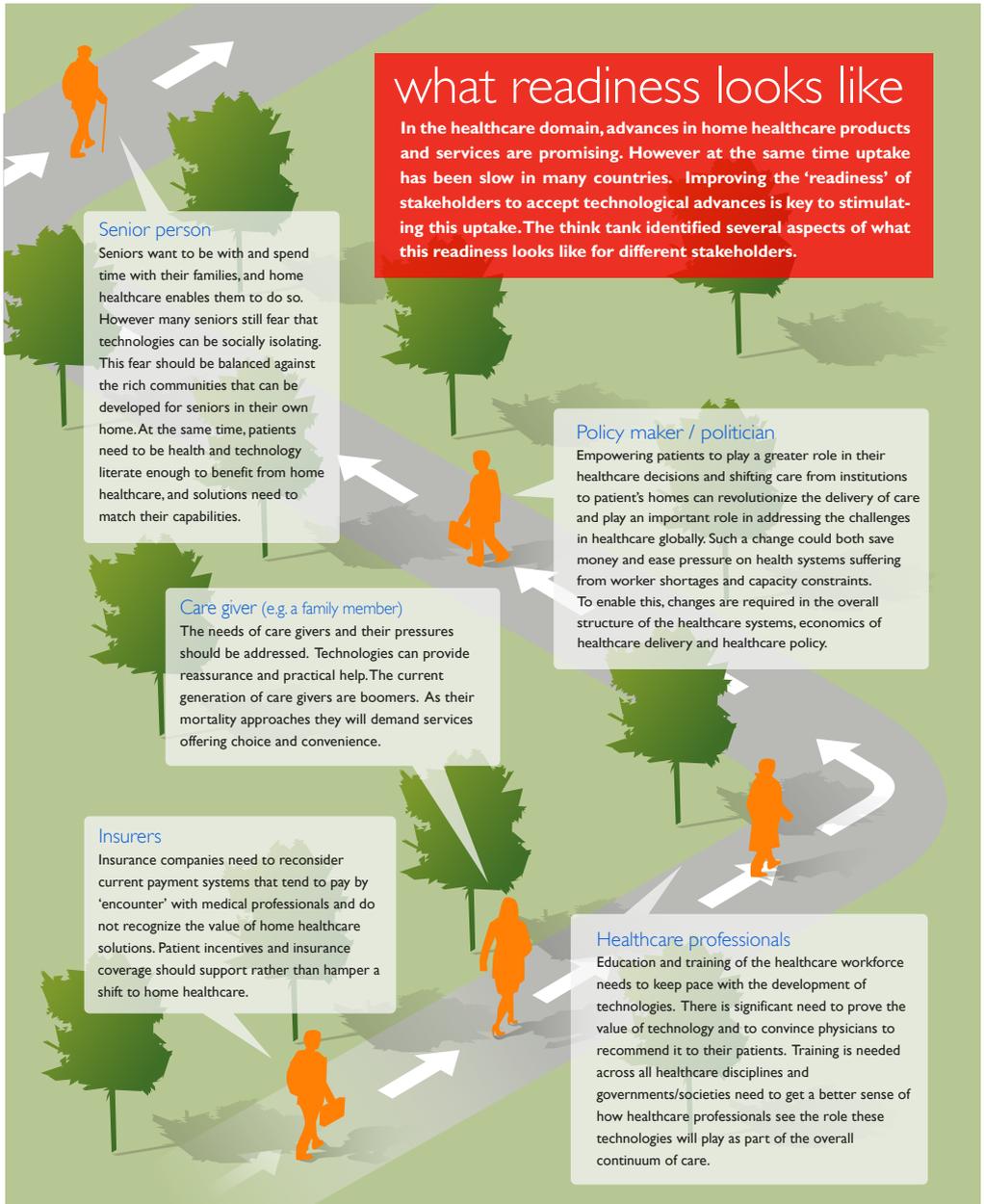
Home healthcare relevance: Technology literacy, educate family care givers

Communication and engagement

ICT and communication solutions can increase social connectivity and engagement.

Home healthcare examples: Online social networks, digital consults with doctors and care givers.

* Based on 2011 Market Overview by Laurie Orlov, www.ageinplacetechnology.com/



what readiness looks like

In the healthcare domain, advances in home healthcare products and services are promising. However at the same time uptake has been slow in many countries. Improving the 'readiness' of stakeholders to accept technological advances is key to stimulating this uptake. The think tank identified several aspects of what this readiness looks like for different stakeholders.

Senior person
 Seniors want to be with and spend time with their families, and home healthcare enables them to do so. However many seniors still fear that technologies can be socially isolating. This fear should be balanced against the rich communities that can be developed for seniors in their own home. At the same time, patients need to be health and technology literate enough to benefit from home healthcare, and solutions need to match their capabilities.

Policy maker / politician
 Empowering patients to play a greater role in their healthcare decisions and shifting care from institutions to patient's homes can revolutionize the delivery of care and play an important role in addressing the challenges in healthcare globally. Such a change could both save money and ease pressure on health systems suffering from worker shortages and capacity constraints. To enable this, changes are required in the overall structure of the healthcare systems, economics of healthcare delivery and healthcare policy.

Care giver (e.g. a family member)
 The needs of care givers and their pressures should be addressed. Technologies can provide reassurance and practical help. The current generation of care givers are boomers. As their mortality approaches they will demand services offering choice and convenience.

Insurers
 Insurance companies need to reconsider current payment systems that tend to pay by 'encounter' with medical professionals and do not recognize the value of home healthcare solutions. Patient incentives and insurance coverage should support rather than hamper a shift to home healthcare.

Healthcare professionals
 Education and training of the healthcare workforce needs to keep pace with the development of technologies. There is significant need to prove the value of technology and to convince physicians to recommend it to their patients. Training is needed across all healthcare disciplines and governments/societies need to get a better sense of how healthcare professionals see the role these technologies will play as part of the overall continuum of care.



The Philips Center for Health & Well-being is focused on improving the lives of people around the world. The Insight Series shares the work-in-progress of the think tanks operating within The Philips Center for Health & Well-being. Through illustrating a snapshot or a concept, they are aimed at stimulating discussion and debate around critical challenges in improving health & well-being worldwide.

www.philips-thecenter.org

@philipscenter

Yet the survey found potential technology uptake is limited due to obstacles including: “techno-literacy”, affordability, provider skepticism, regulation, and above all lack of insurance reimbursement.

To break this deadlock policymakers, industry and providers must jointly agree an integrated approach to technology-enabled home healthcare.

We define four key categories (see infographic) of Active aging technologies at home:

- **Communication and engagement.** Chat, e-mail, web surfing, Facebook, and smartphones form part of daily life. But many older people are intimidated by PCs and complex cell phones. The answer is simplified tech: Cisco’s Valet wireless router or simple cell phones from Great Call or Clarity, or Android, Apple or BlackBerry smartphones. Once online, seniors and their long-distance grandchildren can enjoy reading books together through a video book-reading service like Readeo, or chatting with Skype.
- **Safety and Security.** In the US, certified Aging in Place specialists install security systems from ADT, mobile personal emergency response systems like MobileHelp, or PERS (Personal Emergency Response Systems) with passive fall detection from Halo Monitoring, ActiveCare, or Philips; sensor-based home monitors (BeClose, WellAWARE, AFrameDigital and GrandCare), and web cameras (an option with Alarm.com). All these tools monitor and reassure seniors and their caregivers.
- **Health and Wellness.** Products designed for younger users, like Nintendo’s WiiFit, have become popular with seniors. The Microsoft X-Box Kinect combined with Skype has similar potential. For chronic disease management, vendors like CareInnovations, Philips, Bosch or Ideal Life offer systems for remotely monitoring diabetes or congestive heart failure. Over time, integration of these with health systems’ EMR will become standard.

- **Learning and Contributing.** With basic security and health assured through home healthcare, more seniors focus on reading and learning (with Kindle or iPad, for example). They remain active in and knowledgeable about society, contribute to it through volunteering or by leaving a legacy of stories and shared genealogy for those who love them. Seniors seek out SeniorNet.org, New York Times Knowledge Network, Dorot University without Walls or look for work on RetirementJobs.com or RetiredBrains.com.

Across these four categories, customers are demanding that vendors follow the following principles of design or use:

- Technologies must be more intuitive., easy-to-use, and well-supported. Most people, at every age, have a laundry list of frustrations with technology. Service (online, telephone, remote) is an essential ingredient in a go-to-market strategy. Easy set-up, remote or zero configuration and exception management will be a major part of the offering. And focus groups and home trials reveal greater technology resistance than any ‘what-if’ surveys.



- Vendors must be capable of integration and extension. Many of today’s gadgets don’t communicate – into or out of the home, but especially with each other. So a medication reminder device is useful, but touches a tiny aspect of the whole person. Software needs

common network standards to communicate to caregivers and providers, if it's to provide valuable integrated solutions.

- Costs to consumers must be affordable. As tech becomes more usable and useful, consumers and their families will look for ways to acquire it. Higher income consumers will come to realize that services associated with technologies like webcams and chronic disease monitors that provide value are just as essential as cell phone plans, GPS services, cable TV and many other monthly fees that are now part of their discretionary technology budget. Before long, technologies linked to more formal aspects of home healthcare will become eligible for reimbursement.
- Products must be available on widely adopted platforms. A growing number of retirement communities are adopting Nintendo's Wii; and

cognitive fitness technologies are making their way into both retirement and seniors' homes. Meanwhile, consumers will gravitate towards applications that work with ones they already use, including Facebook. Perhaps even a single device like a smartphone will drive interaction and content, and other devices in the home (like TV, video) to simply act as displays.

So, out of the looming budgeting crisis for healthcare in institutions, a myriad of Aging in Place solutions are emerging, based upon technology for people. Far from displacing the human element, technology can grow care provider relationships and improve the ability to age successfully.



Laurie M. Orlov

Laurie M. Orlov, a tech industry veteran, writer, speaker and elder care advocate, is the founder of Aging in Place Technology Watch (www.ageinplacetech.com), a market research firm that provides thought leadership, analysis and guidance about technologies and related services that enable boomers and seniors to remain longer in their home of choice.

Toward a Healthy 2020: Transforming our Bodies and our Lifestyles

Rod Falcon leads the Health Horizons Program at the Institute For The Future. He is an expert member of the Philips Center for Health and Wellbeing's Active Aging think-tank who studies the social forces that will shape the future of health and health care.

By Rod Falcon

All over the world, the spectrum of human health is increasingly broad, ranging from the sicker-than-ever to the better-than-well. How will we maintain, treat, and improve our collective health in the coming decade?

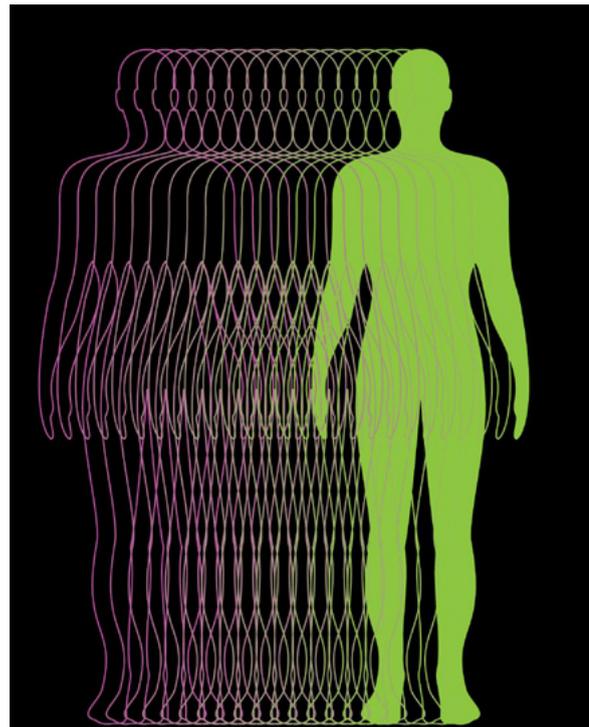
Whatever the causes of ill-health—age, lifestyle or disease—we at the Institute For The Future (IFFT), believe that scientific discovery and technological innovation offer us the resources to intervene and transform our bodies and our lives.

Clearly, there is substantial synergy between the work of the Philips Center for Health and Wellbeing, and that of IFFT.

The thought leadership being developed by the Center's Active Aging think-tank and research by our own Health Horizons Program has broadly similar objectives: to study enablers of quality of life through transitions as we age; to uncover insights into aging well; and to review the role of technologies to support aging in place.

Specifically, we are studying how science and technology can help create new social structures and help us age how we want to, on our own terms. A recent visit to a Philips Healthcare Call Center in the U.S. reminded us that isolation is a major risk that can be combated by social technology.

In the near future, we see lightweight personal healthcare devices that wrap around the user and will allow consumers – especially the elderly –



2020 FORECAST

The Future of Science,
Technology, and Well-being

to enjoy personal autonomy. There may be much greater use of cooperative systems or sharing networks to provide care and support. We already see this happening with shared transportation networks for seniors.

As a member of the multi-disciplinary panel of experts for the Philips Active Aging think-tank, I've been able to contribute to an active debate that sets these health issues into broad, yet practical and actionable, contexts: How aging populations will live in the cities of the near future. How 'livable' cities will help deliver futures that are both healthier and more fulfilling. How active aging programs can keep people healthier and productive longer.

By 2020, more than 700 million people around the world will be over the age 65. A subset of this older generation will aspire to live longer and avoid or delay the health conditions and difficulties traditionally associated with growing older. They will seek new approaches to extending their health spans and maximize the quality, not just the length of their lives.

consequences of chronic disease and disability are daunting. As more of the world's population adopts a Western diet and a sedentary lifestyle, these problems will continue to spread.

To better understand these larger health trends, as well as the effects of social networks have on them, our Health Horizons team studies the use of information and technology in the home and workplace, as well as technology adoption, workspace and mobility patterns, and personal health technologies.

To combat the varying causes of decline in collective health, people will need to change how they live, eat, and care for themselves and those around them. Framing these choices means examining all aspects of our lives—from the food we eat to the consumer devices we use—and seeing how markets, community groups, and social media bring opportunities to us.

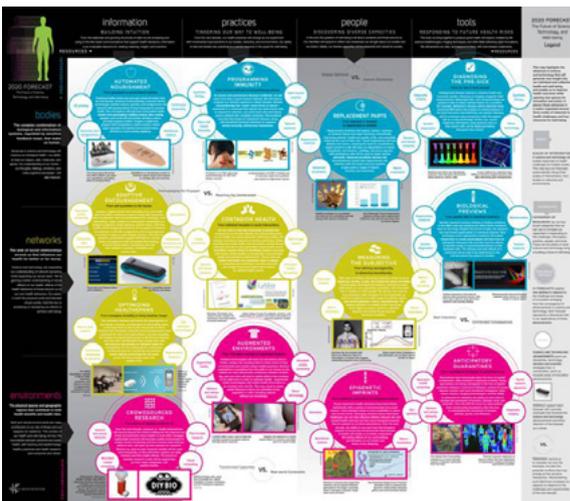
Science and technology offer us several resources that can expand our capacity for well-being:

Information: From the elaborate and growing structures of data we are amassing and using to the bite-sized communications that support health decisions, information is an invaluable resource for creating meaning, insight, and incentives.

Practices: Our health practices will change as we experiment with incremental improvements to our bodies, networks, and environments. Our ability to test and iterate new practices is a central resource in the quest for well-being.

People: Ultimately, the question of well-being is about ourselves and those around us. Our identities will expand to reflect new awareness we will gain about our bodies and our brains.

Tools: The tools we bring together to produce good health will expand, enabled by life science breakthroughs, imaging techniques and other fields delivering rapid innovations. We will perceive our risks, and respond to them, with ever-sharper implements.



For more information about IFTF's 2020 FORECAST, please visit their website: <http://www.iftf.org/>

At the same time, an estimated one billion adults and children are overweight or obese, and the

Each of these four categories will draw on scientific discoveries and technological innovations to maintain, treat, and improve our health in fundamentally new ways. And, of course, developments in these categories will help bring the goal of Active Aging closer to reality for today's and tomorrow's seniors.

More and more, science and technology will become integrated with other responses to the challenge of transforming our bodies and lifestyles. Already we see markets commercializing ideas at ever-faster rates; policymakers can enable or sometimes constrain development and commercialization. End-users find unexpected new uses for technology.

What's coming in terms of developments to help us to shape our bodies and brains in powerful ways?

- Ubiquitous sensing devices, capable of measuring even our mental state, will lead to dramatic improvements in how we monitor and measure health.
- Continuing breakthroughs in epigenetics, neuroscience, nutrition sciences, and bioinformatics will radically improve techniques to understand our biologies.
- Nanotechnology, synthetic biology, and biomanufacturing will lead to new frontiers of regenerative medicine.
- New tools will generate and analyze health data, precisely control environments, and extend independence.

The Philips Active Aging think-tank has also been examining these exciting trends from the seniors' perspective.

Active Aging technology is about enabling people to age well in the place of their choosing and stay connected to and engaged with their communities. But it's also about improving the readiness of seniors and stakeholders to accept technological advances.

Whatever our age, technology promises to enhance our individual and collective well-being. But it raises issues of fairness and equality of opportunity too. Uneven social readiness for adoption and diffusion, appropriateness and unintended consequences are unavoidable in a world of widely-differing economic conditions.

From the IFTF perspective, transforming our bodies and our lifestyles by putting technology at the service of well-being, is a lifelong pursuit. By focusing on the latter phase of life, the promise of Active Aging opens up rich new perspectives.



Rod Falcon

Rod Falcon leads the Health Horizons Program at the Institute For The Future. He is an expert member of the Philips Center for Health and Wellbeing's Active Aging think-tank who studies the social forces that will shape the future of health and health care.

IFTF (www.iftf.org) is an independent, nonprofit strategic research group with more than 40 years of forecasting experience. Located in Palo Alto, California, IFTF probes megatrends, from health and health care to technology, the workplace, and human identity. The Health Horizons Program reviews innovations in consumer behavior and social media; health and medical technologies; health care delivery systems; and food, nutrition, and sustainability. Rod Falcon's insights are taken from the IFTF's 2020 Forecast: The Future of Science, Technology, and Well-Being.

The Patient Perspective

In the healthcare debate about policy, finance, technology, or resources, where is the patient? Nicola Bedlington of the European Patient's Forum advances the arguments for a new approach to Aging Well.

By Nicola Bedlington

In a healthcare world that's ever more driven by metrics and value, can quality of care and above all "time to care" contribute to the empowerment of older patients?

Across Europe, the conversation between patients of all types and other healthcare stakeholders is shifting from monologue to dialogue. And in this process older patients are gaining a voice to articulate their own definition and vision of Aging Well.



Individually, patients are playing a more active role in managing their own care and selecting treatments and supports. Collectively, patient organizations are mobilizing to bring change, and have won seats at the table where the European Commission develops policies to be unfolded in 2012, the year of Active Aging.

As a member of the Steering Group of the European Innovation Partnership on Active and Healthy Aging, the European Patients Forum (EPF) is proactively contributing to the Partnership's target of ensuring all EU citizens enjoy two extra "healthy life years" by the year 2020.

At the same time, EPF is undertaking its own research into Health Technology Assessment across the EU to understand exactly how the evolution of new technologies in healthcare will benefit patients, informal carers and patient groups.

Of course, all these initiatives rest upon an effective and universally shared definition of what "Aging Well" really is. Older patients constantly stress that health should be addressed in a holistic fashion. For patients with chronic diseases, active and healthy aging rests on the cornerstone of equitable access to good quality, patient-centered healthcare.

The work of the Active Aging think tank of the Philips Center for Health and Well-being makes a positive contribution to this wider debate, by bringing together external independent experts to provide insights into how people in different countries and continents approach their health and well-being in later years. From the patient perspective, it is vital to take a critical look at the traditionally accepted definitions of aging and calling for newer and more comprehensive definitions of the transitions that this stage of life brings.

The readiness of society to accept that more widespread use of Active Aging technologies in the home might lead to better aging experiences for people around the globe, requires rigorous analysis. The Philips think tank is addressing the 'road to home healthcare' to see what readiness might look like for different stakeholders and what some of the barriers really are.

Our own focus at EPF is not just on reaching the EU's "hard target" of two extra healthy years, but on

ensuring the rights and needs of older patients and their carers are respected, as they fit into the current political discourse on Active and Healthy Aging.

In July 2011, EPF and the Federation of Polish Patients organized a conference in Warsaw under Polish EU presidency. We examined how NGOs like EPF can help to ensure patient autonomy by linking health and social care in self-management.

In keynotes and breakouts, the conference delegates emphasized the need for shared decision-making and empowerment for elder patients. To spread awareness of best practice, NGOs can play a role in changing public perceptions, increasing health literacy.

Above all, the focus needs to shift to a patient-centered approach that moves away from the concept that aging is invariably associated with illness.

In the field of care, patients should be seen as experts working in partnership with health professionals and other stakeholders. Nor should we overlook the rights of patients and carers, who deserve greater acknowledgement and resources for support.

Beyond the field of care, Active Aging means that older people should benefit from participation in the labor markets, and play an active role in community life where their wisdom and experience are esteemed.

As the Warsaw conference heard, it is still the case that much of the care older patients receive is determined by the ability and willingness of individual care professionals to deliver this, rather than being based upon widely-accepted standards of best practice. Therefore a shift in the attitudes and behavior in interactions with older patients is part of the policy mix that EPF is seeking.

In terms of healthcare, the two extra healthy life years the EC envisions are really the tip of the iceberg. From the patient perspective, Aging Well involves a broader approach that needs innovative solutions right across the field of sociology, psychology, rights, access to work and fair juridical status.

EPF believes that patients and their caregivers will play an essential role in helping the European Innovation Partnership to meet its tangible goals. We also believe that – whatever the economic weather – EPF will help in reframing the Aging Well debate to ensure that quality of care, self care and above all “time to care,” lie at the centre of the patient experience.



Nicola Bedlington

Nicola Bedlington is the Executive Director of The European Patients' Forum (EPF). This umbrella organization of EU patient organizations represents the interests of over 150 million European patients. Its role is to provide a strong and influential patients' voice in EU health policy development. www.eu-patient.eu. Ms Bedlington is also an expert member of the Active Aging think tank panel of the Philips Center for Health and Well-being.

The Future of America's Healthy Vibrant Cities

America's city leaders don't just view older citizens as consumers of urban services and resources. They make up a rapidly-growing population segment with much to offer the community. And they're reliable voters too, says Greg Sebasky.

By Greg Sebasky

Over the next two decades, America's cities will experience one of the largest-ever lifestyle shifts in the history of the country, as up to 78 million U.S. baby boomers reach the 65-year milestone and many will choose to enjoy the rest of their lives in urban environments.



In an aging America, how will policymakers confront the urban challenges of health and well-being, to insure the nation is dotted with healthy, vibrant cities that continue to attract residents of all ages?

This was one of the topics addressed by the U.S. Conference of Mayors (USCM) annual meeting held in Baltimore, Maryland, in June 2011. The Healthy Vibrant Cities panel, which was proudly hosted by Philips, brought together mayors from leading cities for a high-quality debate.

We were joined by distinguished speakers including Bill Novelli, a professor at the McDonough School of Business at Georgetown University, and a panel member of the Philips Center for Health and Well-being's Active Aging think-tank.

Michael Nutter, Mayor of Philadelphia (pop 1.6 million) set the tone by reminding his peers: "We have to make sure that within city government, we're addressing issues of challenging concern for our aging population." After all, Mayor Nutter reminded colleagues, older adults "have a tremendous voting record, they are consistent, and they really do pay attention to what's going on."

So for the USCM's elected mayors of more than 1,200 cities across America, addressing the Active Aging needs of an older population makes sound sense. Already, many U.S. cities are sponsoring healthy initiatives. Oklahoma City (Oklahoma) is challenging a culture of obesity; Tucson (Arizona) is focusing on healthy lifestyle and 'healthy housing;' Portland (Oregon) encourages safe active transportation, walking, and cycling, and participates in the Global Network of Age Friendly Cities. In Philadelphia, Mayor Nutter created the position of Deputy Manager for Aging, responsible for representing older people's perspectives at city meetings, and supports the Serve





Philadelphia program to keep them involved through volunteer initiatives such as tutoring school children.

The goal of the 2011 panel was to promote current best practice for successful aging, but the real objective was to inspire new thinking regarding alliances, public-private partnership, social enterprise and innovation that promotes and impacts the health and well-being of city residents. Health is indeed a prerequisite for 'successful' aging, but well-being involves the question of social attitudes too.

Bill Novelli of the Philips Center for Health and Well-being explained that: "We need to turn aging from a concept of negativity, into a positive outcome and take advantage of aging in terms of the volunteerism, innovation and all the good things that older people bring. We need a healthy older population along with a positive environment to achieve successful aging."

We at Philips believe the maintenance of vibrant city environments is intimately linked to that concept of successful aging. Mr. Novelli, a former CEO of AARP (American Association of Retired Persons) and author of the book *50+: Give Meaning and Purpose to the Best Time of Your Life*, has dedicated half a lifetime to meeting the expectations for sustainable and independent living for seniors, supported by

personalized healthcare.

Successful aging, of course, isn't just about health. It's very individual, and is determined in part by genetics, by behavior; and by personal circumstances. Overall, it's about managing those transitions we typically associate with aging. Changing the work role or retirement; changing health status; and changing family roles as givers or receivers of care.

Each individual's ability to manage these and other transitions that come with age will be impacted by the level of independence or engagement with the broader community. And that's where the Healthy Vibrant City comes in.

We at Philips believe that anything that contributes to independence also contributes to aging well. So we want to see America's cities equipped to help people retain that independence.

We believe that care in the home can and must play a critical role in our system of healthcare, by helping people live better, more comfortably and more independently. A recent Department of Veterans Affairs study showed that older people who are monitored by doctors are 30 percent less likely to enter nursing home.

A survey of six nations by RAND Corporation found consensus that home healthcare technologies are a solution where clinical resources or finance are scarce, and are an attractive route to solving healthcare challenges. Moving patients from hospital to home, will help transform current systems for healthcare delivery and payment for service that were not truly designed for the needs or desires of an aging population.

But as USCM delegates agreed, a holistic perspective on successful aging in the city calls for other things, too. Better lighting and modifications to homes that enable independence. Monitoring for home safety and reassurance. Better connectivity to family and friends. A culture of respect and inclusion. And opportunities to share the accumulated wisdom of a lifetime through active participation in the community.

At a time of strong competition for scant resources, how can mayors take this conversation out to baby boomers and regular voters in their cities? The healthcare debate is a national one, but at local level, citizens need educating about the benefits of new technologies for improving care.

Mayors are already backing more support for patients and caregivers, while private companies need encouragement in their efforts to serve an aging workforce. And, of course, by promoting more social and active lifestyles to develop 'livable cities.'

Industry and healthcare providers must play their part too. Philips Healthcare is committed to models of care that place the patient right at the center, so we



develop products and services using simple designs that are effective and affordable. Philips adopts evidence-driven models that focus on value-for-money (See article 3 on Health Economics).

In fact, Philips has responded to the changing economics of the global healthcare market by adopting rigorous standards of clinical efficacy and positive financial impact. This approach to healthcare economics and reimbursement drives our efforts.

For mayors looking for new opportunities to address the concerns and benefits of the electorally important constituency of the baby boomers, we believe the Healthy/Vibrant City is an attractive and viable location in which to enjoy the fulfilling life-phase known as Active Aging.



Greg Sebasky

Greg Sebasky is CEO of Philips North America. He is also General Manager, Executive Vice President of Global Customer Services for Philips Healthcare in the US. He has global responsibility for Philips Consumer Healthcare businesses. He has more than 26 years of experience of the US healthcare market.

**This is a booklet in the series of Philips Publications,
published by Philips Professional and Public Affairs.**

Selection of previous publications:

- 'Energy management as a challenge for CEOs in the 21st century',
May 2007
- 'Addressing healthier lifestyles today and for tomorrow',
November 2007
- 'Collaboration and innovation as key to improve healthcare access',
December 2007
- 'Towards Vision 2010 - Focusing on people's needs in Health and Well-being',
April 2008
- 'Vision 2010 - Building the leading brand in Health and Well-being',
June 2008
- 'Driving development in China through harmony and cooperation',
September 2008
- 'Livable Cities – Innovation and collaboration for health and well-being in the
urban environment, April 2010
- 'Home Healthcare – enabling healthy, independent living at home',
July 2010
- 'Strategies for retaining older and experienced employees in the active work force',
November 2010
- Global Trends and Philips Dialogues', Edition January 2011
- Global Trends and Philips Dialogues', Edition June 2011

These publications can be found at

<http://www.newscenter.philips.com/main/standard/news/speeches>

**If you would like to know more about Philips, please visit www.philips.com
Published by Philips Professional and Public Affairs, September 2011**

