

WHY SARs CAN IMPROVE QUALITY OF LIFE IN OLDER ADULTS

Socially Assistive Robots (SARs) have great potential to improve the quality of life for residents in Life Plan Communities. They can help combat loneliness—one of the greatest health risks facing older adults – by engaging and interacting with residents, facilitating games, playing music, and reading books. Further, they can give caregivers more time for human touch by handling non-core caregiver jobs. And, they can respond to alarms, identify and report security or safety hazards, and alert caregivers of residents in need of immediate attention. These robotic companions may keep residents happier, healthier, and safer.

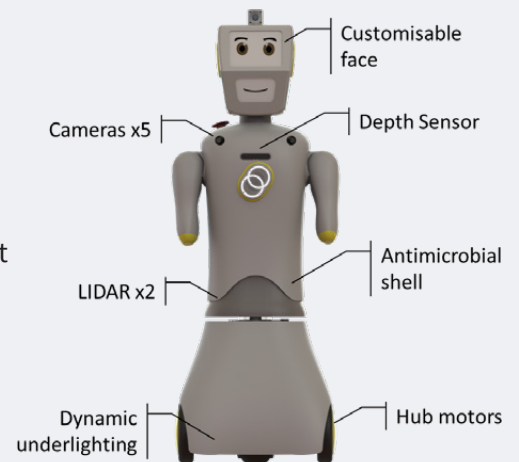
KNOLLWOOD RESPONDS WITH PIONEERING SAR STUDY

We partnered with a leading international robotics research group from Trinity College Dublin, Ireland on a pioneering research study to determine the impact and benefits of SARs in Life Plan Communities.

- A multi-disciplinary team produced a working SAR prototype, named Stevie, that was tested and initially evaluated at Knollwood in September 2018 and February 2019, validating the concept
- An intelligent, customized, Knollwood-specific prototype will be developed, tested, evaluated, and refined in 2019
- In 2020, a finished robot will be deployed at Knollwood for ongoing use
- Study results will be documented and published in leading academic journals and conferences

STEVIE: UNIQUELY AND INTELLIGENTLY DESIGNED

- Aims to be the world’s most advanced social robot
- Leverages state-of-the-art in robotics and artificial intelligence
- Developed using an innovative user-centered approach known as ‘design thinking’
- Developed over the course of several years, through on-going engagement with older adults and caregivers in both Europe and the US
- Designed to be modular, fully customizable and adaptive to address a wide range of user needs and wants, not generically designed for one-size-fits-all
- Being developed to be compliant with ISO 13482, the gold standard in care robot design



**STEVIE AIMS TO BE THE MOST ADVANCED SOCIAL ROBOT IN THE WORLD
KNOLLWOOD IS THE PRIMARY GLOBAL TEST SITE FOR THIS TECHNOLOGY**



IMPACT ON RESIDENTS OF CUTTING-EDGE SAR TECHNOLOGY



SOME KEY FUNCTIONAL CAPABILITIES

- ➔ Perform range of non-core caregiver tasks so caregivers have more time for 'human touch'
- ➔ Offer easy-to-use video call functionality for residents to stay socially connected to friends/family
- ➔ Controllable remotely by Knollwood staff to enable rapid response in the event of an accident
- ➔ Enhance Bingo, Karaoke, and other popular resident-led activities
- ➔ Roam unsupervised to perform safety and security checks
- ➔ Enable caregivers to provide innovative new therapies (e.g., reminiscence therapy)



POTENTIAL RESIDENT IMPACT

- ➔ More human touch from caregivers, who are freed from non-core duties
- ➔ A safer, more secure community through early detection and reporting of environmental hazards
- ➔ New opportunities for social engagement and interaction, helping to reduce boredom, isolation, loneliness, and depression
- ➔ Improvements in personal safety through observation and monitoring of residents at higher risk of injury
- ➔ New opportunities for intellectual stimulation through games and curiosity
- ➔ A therapeutic presence for residents with dementia

YOUR PARTNERSHIP IS CRITICAL TO SUCCESS

While this research study is well underway, your financial investment is critical to bring it to completion. Your financial investment will:

- Enable development of Stevie's complex Artificial Intelligence (AI) and software systems interfaces, completing an advanced prototype
- Perform extensive on-site advanced prototype testing at Knollwood to identify and remedy any functionality gaps
- Deliver an intelligent, fully customized, Knollwood-specific robot for ongoing use in March 2020



BENEFITS OUR PARTNERS RECEIVE

By partnering with us, you will help bring needed solutions to our nation's aging crisis. Your partnership will:

- Support pioneering research on the use of SARs to help improve quality of life for older adults—an area of study with enormous global interest and potential
- Create opportunities to convey through web and social media your support and commitment for both the military community as well as the advancement of health and wellness for all older Americans
- Differentiate your organization and business, attract new clients and customers, and build brand recognition and loyalty by including social purpose in your business strategy
- Build opportunities to promote your organization's social investment strategy internally to rally employees and increase morale