



**indra**

**Press  
Release**

## **INDRA TRIALS SMART WALKER TO HELP ELDERLY PEOPLE MOVE**

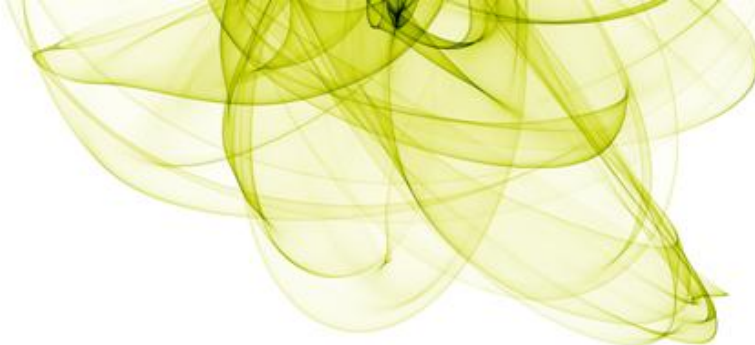
- **The company has successfully completed validation testing for the prototype; the trial took place at the care home NuestraSeñora del Carmen in Ciudad Real (Spain)**
- **This pilot is part of the European R+D+i project DALi. A walker has been developed including various technologies to help elderly people to move around cities, hence increasing their autonomy and confidence**
- **This initiative is led by the University of Trento, and is being completed under the umbrella of the 7th European R+D Framework Program. Indra is responsible for coordinating integration of the prototype and for the visual interface**

By the hands of Indra, elderly people at the care home “Ciudad de MatrimoniosAncianosNuestraSeñora del Carmen” in Ciudad Real (subordinate to the Health and Social Issues Department of Castilla-La Mancha) have been the first to try the prototype of a smart walker. Integrating different technologies, this walker helps to improve elderly people's mobility in city and unstructured environments, hence increasing their autonomy and confidence.

This prototype has been developed under the umbrella of the European R+D+i project DALi (Devices for Assisted Living). In addition to carrying out this pilot, Indra coordinated the integration of the prototype's different systems (e.g. cameras and sensors), which help to address sensorial issues or problems faced by its users. Also, the platform uses several means of interaction (sight, sound and vibration) to try to meet the needs of all users.

Indra selected the care home NuestraSeñoradel Carmen for its pilot in Spain because its residents are couples who moved there when one of the spouses developed autonomy issues. Residents helped to gather the initial requirements with a view of adapting the solution to their real needs; and now they have helped with prototype validation.

During the tests, 22 elderly people with mobility issues or moderate sensorial and/cognitive difficulties used the walker to move in a simulated mall. Results were very positive: very valuable information was gathered to help make final adjustments to the prototype, and users were greatly satisfied.



The project also allows for similar validation tests in Italy and the United Kingdom, with the aim of confirming the results and designs regardless of the environment and cultural conditions.

### **More autonomy and safety**

Integrating different technologies, this smart walker offers elderly people more autonomy in their trips and walks outside their usual environment. It warns them of possible dangerous situations such as obstacles or crowding and guides them to avoid these hazards. However, users are always in control of the walker.

The prototype also includes a camera designed to analyze the user's face and determine his/her mood (a factor considered to be relevant). If signs of sadness or tiredness are detected, the device stops to ask the user if he/she needs rest or assistance. If so, he/she is directed to the nearest assistance site or personnel.

These are some examples of other possible applications for this walker: outdoor navigation or in malls, where help is given when looking for products, for instance; in big hospitals to go to an appointment; and in airports and train stations to find the boarding gate. Given its use of movement, this walker could also be used for rehabilitation and occupational health purposes.

Funded by the European Commission under the 7th Framework Program (EC Grant Agreement no. 288917), DALi is coordinated by University of Trento and ends this year. Indra has been responsible for integrating the prototype and for the visual interface. The multinational has also been a member of a consortium including the Spanish company Visual Tools, the University of Siena, the French company Inria, the Greek research group Forth, the University of Northumbria and Siemens.

Indra, chaired by Javier Monzón, is one of the world's largest consultancy and technology multinationals, a leader in Europe and Latin America and is expanding in other emerging economies. Innovation is the cornerstone of its business, which is highly focussed on the customer and on sustainability. The multinational is one of the leaders in its sector in Europe in terms of investment in R&D and innovation, having invested more than €570M in the last three years. With sales approaching €3,000 million, it employs 43,000 professional and has customers in 138 countries.