WHAT ARE THE KEY CRITERIA FOR DECISION-MAKING CONCERNING THE USE OF HOME-CARE ROBOTS? FINDINGS FROM A QUESTIONNAIRE STUDY IN JAPAN

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Background: Faced with rapid population ageing, many stakeholders in Japan have stepped up their efforts to develop and test assistive technologies such as robots to support care for older people. Robotics-aided tools have and will be added to the list of reimbursable items under the Long-Term Care Insurance scheme. However, it remains unclear how people make decisions when considering the use of innovative technologies such as home-care robots. This study aimed to explore and understand the criteria for such decisions, and see if there are differences amongst older people, family caregivers and care professionals.

Methods: As the first step, a questionnaire method was adopted to understand perceptions of three types of participants (older people in receipt of home-care, family caregivers and care professionals). The self-administered questionnaire contained questions such as how a home-care robot is perceived, its usefulness, and the participants’ willingness to engage in research to develop such robots. It was sent to 4,445 people in one populous prefecture with both urban and rural characteristics in Japan. Factor analysis was conducted on 29 items.

Results: 577 respondents consisted of home-care professionals (n = 444, 76.9%), older people (n = 79, 13.7%) and family caregivers (n = 54, 9.4%). Four elements were extracted from the factor analysis. These are: (i) utility, (ii) trust and privacy protection, (iii) respect for one’s will and safety, and (iv) alleviation of loneliness.

Conclusion: To keep up with the fast speed at which assistive technologies for social care have been developed, more research is required to understand users’ perspectives including ethical aspects. The four factors we identified in this study would be the key information in order to provide decision-making assistance for not only older people themselves, but also family caregivers and practitioners.

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