

OPP: APPLICATION FIELDS & INNOVATIVE TECHNOLOGIES

Development of a training program to educate care workers utilizing digital transformation in Japan

K. Uchida, E. Kobayashi, M. Watanabe

Purpose Japan, with its rapidly progressing low birth rate and aging population, reached an aging rate of 29.1% in 2023, marking the highest level both in its history and globally. By 2065, approximately one in every 2.6 people is expected to be 65 or older. Simultaneously, the shortage of care workers is expected to reach approximately 690,000 by 2040. To address these challenges, the Japanese government is promoting measures such as improving productivity in care settings by leveraging ICT, utilizing diverse human resources, and creating more conducive working environments. Considering these issues, this study aimed to develop a “Digital Transformation (DX) Care Worker Training Program” to train care workers equipped with ICT skills (Ministry of Health, Labor and Welfare). This program also includes job placement mechanisms to facilitate the smooth transition of trainees to the caregiving profession. **Methods** The program was designed to enable participants to leverage their existing “skills” and “experience” to find employment or transition into the caregiving field, not only by imparting specialized knowledge and skills in caregiving but also by fostering ICT-capable care workers. Initially, surveys were conducted among care workers and educators at care worker training schools. Based on the survey results, a program was developed that integrates three courses, namely: the “Care Worker Induction Course,” which is an introductory course in caregiving; the “Smart Care Worker Course,” which teaches the use of ICT in caregiving settings; and the “Practical Training Program for Care Workers,” which aims to develop leadership, career planning skills, and the ability to utilize ICT and robotics. The impact of the developed “DX Care Worker Training Program” on participants was evaluated through questionnaire surveys and interview surveys. This study was approved by the Research Ethics Committee of the Vocational Education Research and Development Center of Keishin Gakuen (Approval No. 22-04). **Results and Discussion** The questionnaire survey revealed an increase in the average score for “interest in caregiving work” from 3.75 before the course to 4.00 after the course. The average score for “intention to pursue caregiving work” increased from 3.00 before the course to 3.50 after the course. The average score for “subjective caregiving practice ability” increased from 44 points before the course to 65 points after the course. Post-course interview surveys indicated that the program was accessible even for complete beginners. Furthermore, participants learned about diverse fields and professions related to caregiving through advanced caregiving topics and were constantly encouraged to think about what they learned and their future goals, highlighting the importance of reflective thinking. In addition to enhancing caregiving and ICT skills, the program was found to encourage evidence-based thinking and career considerations. Moving forward, the identified issues will be addressed, and follow-up surveys of the participants will be conducted to further improve the program.

References

Ministry of Health, Labor and Welfare. Promoting the Use of ICT in Nursing Care Settings, Available from URL: <https://www.mhlw.go.jp/stf/kaigo-ict.html>. Accessed 27 May 2024.

Keywords: care worker training program, digital transformation, shortage of care workers, new human resources

Address: Development and Innovation Center for Vocational Education and Training, Keishin Gakuen, Japan

Email: kazuhiro.u@toki.waseda.jp

ORCID IDs: <https://orcid.org/0009-0001-4200-745X>

Acknowledgement: This research was supported by the Ministry of Education, Culture, Sports, Science and Technology (MEXT).