

## **The Role of Emerging Technology in Helping Newcomer Children in Social Adjustment | Omar Bani-Taha**

With the ever-increasing number of immigrants and refugees, the economic and social adjustment of newcomers is a significant issue for many countries. While this subject has been studied widely, there are still many open research questions including the role of technology in this adjustment and special needs of newcomer children. We have conducted a literature review to examine the current state of research on newcomer tween children (age 9-12 years), their needs, and in particular how technology has been used to address those needs. We sought to provide interdisciplinary insight into this topic and based on the premise that children have a keen interest in learning via games and other digital media channels. This is shown by previous research, both from a global perspective and in the local Canadian context. As a result, we identified a few gaps in the available literature: First, research on the social adjustment of newcomer children is evolving as children's mobility is increasing dramatically around the world, particularly in Canada. Second, there are few studies on how existing digital technology, game-based learning, and digital storytelling may help to address the enduring needs of this vulnerable population. Third, the literature lacks a well-established digital technology framework in the context of newcomer children's social adjustment.

As a follow-up to our literature review, we developed an educational game called "New Beginning", as a proof of concept, that sought to help newcomer tweens learn more about a few selected behavioural issues. The game includes social behaviour advice with a focus on bullying and how to respond to it. The participating children were assigned randomly to do one of the following activities: 1) playing a computer game that contains behavioural advice about social interaction in the context of a space fantasy story, 2) reading a brochure taken from Canadian school material related to the same topics. After analysing the pre and post questionnaires for both digital game group and brochure group, the data shows improvement of children knowledge of social adjustment for both groups with a significant increase in the numbers of a corrected answer for the game group compared to the brochure group. Though the brochure found to be easy to read, still children found the digital game more useful and enjoyable in comparison to the brochure. The qualitative data collected from participated children parents show that parents

were positive towards using the digital game in the context of our study because of its ability to keep children engaged, connected and it is a safe place to simulate behaviours and adapt to the given situation, which may not be available otherwise.