Digital storytelling in health research knowledge translation: A scoping review protocol Elly Park, PhD University of Alberta, Faculty of Rehabilitation Medicine Elly1@ualberta.ca

BACKGROUND

Digital storytelling has been defined in various ways; the most familiar description including aspects of culture and art alongside technology and media to create a story (Lambert, 2013). Concretely, it is described as short videos (about 3-5 minutes) created with images, narration and music to form multimedia presentation of a story. Although storytelling or narrative methods have been a part of research for many decades, this type of storytelling has begun to develop in more recent years since the 1990s (Lambert, 2013). Drawing on technological advances, this type of storytelling is a compelling and provocative way to disseminate experiential knowledge in an accessible way (Rule, 2010). Participants can be involved in the entire process, contributing their experiential knowledge to address relevant research questions.

Sharing stories of healthcare experiences is a way of gaining deep insight into a person as a whole, more than just the illness or condition that is being treated (Frank, 2013). In healthcare settings, stories are a conduit for learning from patients about patients (Charon & Montello, 2002; Gidman, 2013). Digital storytelling is an effective method for sharing stories in healthcare research and practice (Lal, Donnelly & Shin, 2015). Researchers found it to be a practical and powerful tool for knowledge translation and education, as well as a way to empower patients and participants to advocate for their health-related needs and rights (Hardy & Sumner, 2018). Through digital storytelling patients can provide experiential knowledge to healthcare professionals that may not have been considered.

The accessibility of the videos, as well as the opportunities for knowledge dissemination are two known benefits of using digital stories (Reiger et al., 2018). A recent systematic review protocol for the use of digital storytelling in health research underscores the need for a framework that considers the use, impact and ethical implications of this research method (Rieger et al., 2018). KT is a process that includes knowledge exchange or dissemination to support and improve healthcare practice or care for the knowledge user (Mallidou et al., 2018; Scott et al., 2013). As a new and rapidly growing area, there is a need to assess the available evidence pertaining to digital storytelling in health research KT. Therefore, we chose to conduct a scoping review to examine the extent and range of research on digital storytelling as a KT strategy. Scoping reviews are effective to synthesize research literature and identify gaps to further explore (Arksey & O'Malley, 2005; Daudt et al., 2013). Our purpose was specifically to review the breadth of literature regarding the role of patients/participants as the digital storytellers in the KT process, including if and how this knowledge is taken up by other patients, caregivers, policy makers and healthcare professionals.

OBJECTIVES

- To determine the present role of digital storytelling in health research knowledge translation, specifically focusing on patient perspectives.
- To create recommendations to guide and support the use of digital storytelling as a tool for knowledge translation and dissemination.

METHODS

The scoping review process is based on the steps outlined by Arskey and O'Malley (2005) intended specifically for scoping review studies.

- Step 1: Identify the research question.
- Step 2: Identify relevant studies
- Step 3: Study selection
- Step 4: Charting the data
- Step 5: Collating the results

Step 1 – Research Question

In health research, what is the evidence pertaining to the use of digital storytelling as a KT tool?

Step 2 - Finding relevant studies

Relevant databases:

Health related databases such as CINAHL, Scopus, PubMed, PsycInfo, Medline including grey literature (conference abstracts, theses and dissertations)

Search terms:

Digital storytelling, multimedia, healthcare, patient experience, patient engagement, patient perspective

Search limits: Written in English, within the past 10 years

After determining the relevant databases, an external information specialist will conduct the search.

Step 3 – Study selection

To determine which studies will be selected, I will chart the literature that addresses the research question and meets the criteria below.

	Include	Exclude
Study design	All study designs are included	
Methods	Digital storytelling is used as part of KT in health research	Digital storytelling used as a treatment/intervention, digital storytelling is used for communication enhancement Digital storytelling is a video recording
Focus of study	Healthcare related: hospital, community clinics, allied health	Not healthcare related
Participants	Patients using health services	Healthcare providers, stakeholders, professional film makers
Outcomes	Sharing patient experiences Relaying knowledge to stakeholders and other researchers	

Inclusion/Exclusion Criteria

Step 4 – Charting the Data

Data will be charted on an excel spreadsheet including information about the study itself. This information will then be uploaded into the systematic review management program *Covidence*. Two reviewers will independently screen the titles and abstracts. After initial screening, a full

text review of remaining publications will determine studies to be included in the scoping review.

Step 5- Collating the Data

The PRISMA-ScR guidelines will be used to ensure the review includes key elements and information (Tricco et al., 2018). Quality assessment will include calculation of kappa score, inter-rater agreement and use of quality appraisal tools.

Conclusion

In health research, including patient perspectives using digital storytelling is an effective way to disseminate knowledge to the users and stakeholders. With the growing use of technology within healthcare, and the desire for patients to be involved in the decision-making process, the use of digital storytelling is an excellent tool to ensure patients and healthcare professionals are aware of research outcomes to promote best practice and available options to make informed choices.

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