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Effect of storytelling on teledentistry awareness

Submission date
08/11/2021

Recruitment status
No longer recruiting

Registration date
09/11/2021

Overall study status
Completed

Last Edited
19/10/2023

Condition category
Oral Health

[X] Prospectively registered
[_] Protocol
[_] Statistical analysis plan
[X] Results
[_] Individual participant data

Plain English summary of protocol

Background and study aims
There is a global tendency towards improving oral health promotion. One of the methods to achieve that is storytelling. Storytelling encourages learners to create imaginative images and think creatively. Storytelling may lead to the storyteller and audience developing a sense of trust and comfort. On the other hand, teledentistry is an emerging field in dentistry and involves the use of information technology and telecommunications for dental care. However, there is a lack of knowledge regarding this emerging field among the public and dental professionals. The aim of this study is to assess the effect of storytelling on improving the awareness of teledentistry among adults in Saudi Arabia.

Who can participate?
Dental patients and their relatives aged 18 years and over at Umm Al-Qura University Dental Hospital

What does the study involve?
Participants are randomly allocated into the study group or the control group. The study group receive a custom-made story and are then followed up by an assessment questionnaire to evaluate their knowledge of teledentistry, in addition to an experience assessment to evaluate their impression of experiencing teledentistry. The control group receive nothing other than the assessment questionnaire to evaluate their knowledge of teledentistry.

What are the possible benefits and risks of participating?
The main benefit is increased awareness of teledentistry. As an incentive, the participants will also be entered into six separate random prize draws for 50 Saudi Riyal (USD 13.33) in the form of local bookstore gift cards given only to participants who complete all the questionnaires. There are no risks involved.

Where is the study run from?
Umm Al-Qura University (UQU) (Saudi Arabia)

When is the study starting and how long is it expected to run for?
November 2021 to November 2022

Who is funding the study?
Investigator initiated and funded

Who is the main contact?
Dr Khalid Aboalshamat
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Contact information

Type(s)
Scientific

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Additional identifiers

Protocol serial number
HAPO-02-K-012-2021-11-811

Study information

Scientific Title
The effect of storytelling on improving the recognition of teledentistry among adults: a randomized controlled trial

Study objectives
Is it valid to use a story about teledentistry to improve recognition compared to regular written flyers, and what is the level of knowledge, attitude, perceptions and challenges of using teledentistry among adults in Saudi Arabia?

Ethics approval required
Old ethics approval format

Ethics approval(s)

Approved 03/11/2021, Umm Al-Qura University Institutional Review Board (Umm Al-Qura University, Makkah, 24352, Saudi Arabia; +966 (0)125270000; irb.uqudent@uqu.edu.sa), ref: HAPO-02-K-012-2021-11-811

Primary study design
Interventional

Study design
Parallel-group single-blind randomized controlled trial

Study type(s)
Other

Health condition(s) or problem(s) studied
Teledentistry

Interventions
Current intervention as of 01/03/2022:
Participants in the study group read a written educational story created by the research team. An email will be sent to the participants in the study group containing the consent form and T1 questionnaire in an online format. By the end of the questionnaire, there will be a link to download the story intervention as a PDF file, so, the participants will be able to read the story. At the end of the story there will be another link directing the participants to the T2 questionnaire online format. The time of answering the T1 and T2 questionnaires will be recorded. Participants who have a time difference between T1 and T2 of less than 5 minutes will be excluded from the study because it implies that the participants did not read the story in an effective manner. The T3 questionnaire will be sent to the participants in the study group after 1 month. The story was created to assess the knowledge of teledentistry.

The story describes a retired dentist and her journey to use teledentistry in an emotional script. Inside the story there is information about teledentistry that is designed to inform the participants about teledentistry. The story is 1523 words in the Arabic language, four pages that takes between 8 to 10 minutes to read. The story was sent as a 12-minutes video that has all the text with a story telling voice. Participants can speed up the storytelling, if wanted. The story can be requested from this study author. The story went through several phases to be validated in terms of understanding, grammar, syntax and structure via a small pilot of 12 participants.

The participants in the control group will receive the same protocol except that they will receive an educational flyer instead of the story intervention.

Randomization:
Randomization was conducted using computer-generated software to randomly divide the participants into the study and control groups.

Previous intervention:
Participants in the study group read a written educational story created by the research team. An email will be sent to the participants in the study group containing the consent form and T1 questionnaire in an online format. By the end of the questionnaire, there will be a link to download the story intervention as a PDF file, so, the participants will be able to read the story. At the end of the story there will be another link directing the participants to the T2 questionnaire online format. The time of answering the T1 and T2 questionnaires will be

recorded. Participants who have a time difference between T1 and T2 of less than 5 minutes will be excluded from the study because it implies that the participants did not read the story in an effective manner. The T3 questionnaire will be sent to the participants in the study group after 1 month. The story was created to assess the knowledge of teledentistry.

The story describes a retired dentist and her journey to use teledentistry in an emotional script. Inside the story there is information about teledentistry that is designed to inform the participants about teledentistry. The story is 2564 words in the Arabic language, four pages that takes between 8 to 10 minutes to read. The story can be requested from this study author. The story went through several phases to be validated in terms of understanding, grammar, syntax and structure via a small pilot of 12 participants.

The participants in the control group will receive the same protocol except that they will receive an educational flyer instead of the story intervention.

Randomization:
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Intervention Type
Other

Primary outcome(s)
The knowledge and perceptions of using storytelling to improve teledentistry awareness measured using a questionnaire at baseline and follow-up visit (between 1-3 months)

Key secondary outcome(s)
There are no secondary outcome measures

Completion date
15/11/2022

Eligibility

Key inclusion criteria
1. Adults over 18 years of age
2. Arabic speakers living in Saudi Arabia
3. Have a smartphone and social media apps (WhatsApp), with a valid contact number to use for communication during tele-dental consultations
4. Agree to participate in the intervention and answer all the questionnaires

Participant type(s)
Healthy volunteer

Healthy volunteers allowed
No

Age group
Adult

Lower age limit

18 Years

Sex
All

Total final enrolment
89

Key exclusion criteria
Did not agree to sign the consent form

Date of first enrolment
20/11/2021

Date of final enrolment
01/03/2022

Locations

Countries of recruitment
Saudi Arabia

Study participating centre
Umm Al-Qura University Dental Hospital
Taif Road
Makkah
Saudi Arabia
21955

Sponsor information

Organisation
Umm al-Qura University

ROR
https://ror.org/01xjqrm90

Funder(s)

Funder type
Other

Funder Name
Investigator initiated and funded

Results and Publications

Individual participant data (IPD) sharing plan
The datasets generated during and/or analysed during the current study are available from the corresponding author Dr Khalid Aboalshamat (ktaboalshamat@uqu.edu.sa) on reasonable request as an SPSS file (unidentified). The data will be available for 2 years and can be accessed by the journal to which the researchers will submit their article, any Saudi Governmental authority, and researchers after careful consideration of their scientific intention to use. All data are anonymous with no identification.

IPD sharing plan summary
Available on request

Study outputs

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
Results article		10/10/2023	19/10/2023	Yes	No