# A mobile, web-based storytelling HPV intervention to promote HPV vaccine uptake among Korean college women

Submission date	<b>Recruitment status</b> No longer recruiting	Prospectively registered		
18/12/2019		Protocol		
Registration date	Overall study status Completed	Statistical analysis plan		
31/12/2019		[X] Results		
<b>Last Edited</b> 06/02/2020	Condition category Infections and Infestations	[] Individual participant data		

# Plain English summary of protocol

Background and study aims

Cervical cancer is related to infection by the human papillomavirus (HPV). Though cervical cancer has decreased in the last 40 years as a result of HPV vaccination and Pap smear screening, it is still high among ethnic minority and foreign-born women in the US. Despite the availability of HPV vaccinations to prevent HPV infection, only about a third of female college students have received a vaccination, which falls far short of the Healthy People 2020 HPV vaccination rate goal of 80%. Furthermore, HPV vaccination and Pap smear rates have been low among Asian American women, especially among Koreans in the U.S. Thus, it is vital to develop prevention strategies for this group. Reducing racial/ethnic differences in immunization rates is an important public health goal.

Storytelling can be a powerful way to raise awareness and reduce health inequalities, since it can expand the listener or viewer's understanding of a subject within their social and cultural context by presenting 'real stories' and 'own voices' in similar life settings in which health decisions are made.

This study aimed to investigate whether culturally-grounded storytelling could increase HPV vaccination uptake by providing health information about this disease and its prevention.

# Who can participate?

University undergraduate or graduate female students in the Northeast region of the USA who identify themselves as Korean or Korean American, are between the ages of 18 and 26 years, who can speak or read English, and have not yet been vaccinated.

#### What does the study involve?

The participants were randomly allocated to one of two groups. One group watched a story-telling video of about 17 min. The other group was given written information about HPV and vaccination. Both groups completed surveys before they received the video or written information, after they had received it and 2 months afterwards.

What are the possible benefits and risks of participating? There were no direct risks to participants. The information learned from this study could help to increase the health and quality of life of the participants.

Where is the study run from? University of Massachusetts Boston

When is the study starting and how long is it expected to run for? September 2016 to December 2016

Who is funding the study? American Cancer Society (USA)

Who is the main contact? MinJin Kim, MinJin.Kim001@umb.edu

# Contact information

# Type(s)

Scientific

#### Contact name

Dr Minjin Kim

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# Additional identifiers

# EudraCT/CTIS number

Nil known

IRAS number

# ClinicalTrials.gov number

Nil known

# Secondary identifying numbers

2016146

# Study information

#### Scientific Title

Acceptability, feasibility, and preliminary effectiveness of a mobile, web-based storytelling HPV intervention to promote HPV vaccine uptakes among Korean college women

## Study objectives

- 1. Women receiving the STN intervention will have greater knowledge and more positive perceptions (cognitive) and feelings (affective) toward the HPV vaccine compared to the control group at post-intervention.
- 2. Women receiving the STN intervention will demonstrate a higher intention to receive the HPV vaccine (conative) compared to the control group at post-intervention and at the 2-month follow-up.
- 3. Women receiving the STN intervention will demonstrate higher HPV vaccine uptake compared to the control group at the 2-month follow-up.

# Ethics approval required

Old ethics approval format

## Ethics approval(s)

Approved 12/09/2016, University of Massachusetts Boston Institutional Review Board (Office of Research and Sponsored Programs, University of Massachusetts Boston, 100 Morrissey Boulevard, Boston, MA 02125, USA; +1 617-287-5374; sharon.wang@umb.edu), ref: #2016146

# Study design

Randomized controlled trial

## Primary study design

Interventional

# Secondary study design

Randomised controlled trial

# Study setting(s)

Internet/virtual

# Study type(s)

Other

# Participant information sheet

No participant information sheet available.

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

Knowledge and attitudes toward HPV vaccination

#### **Interventions**

At the end of the baseline survey, participants were randomly assigned to either the experimental group (a storytelling video intervention) or comparison group (a non-narrative, written statement about HPV and HPV vaccine) by Qualtrics software until each group contained 60 participants.

The experimental group received a theory-led, evidence-based, culturally appropriate storytelling video intervention about HPV and cervical cancer prevention. The video includes

three pairs of Korean American college women's shared thoughts, memories, and ideas about HPV, HPV vaccine and cervical cancer. Additionally, a Korean American physician provides supportive material to fill in gaps not covered by the stories and provide scientific, evidence-based information on HPV, HPV vaccine, and cervical cancer. The video is about 17 minutes in length. The comparison group received written, non-narrative education materials that include a Fact Sheet about HPV infection from the CDC and a HPV vaccine information from the American Cancer Society. Surveys were conducted via an online laboratory at baseline, at post-intervention, and at 2-month follow-up after the intervention.

#### Intervention Type

Behavioural

#### Primary outcome measure

Initiation of HPV vaccine uptake assessed using a self-report of HPV vaccination initiation at the 2-month follow-up after the intervention.

# Secondary outcome measures

- 1. Knowledge about HPV vaccination
- 2. Attitudes toward HPV vaccination
- 3. Intention to receive the HPV vaccine

Surveys were conducted via an online laboratory at baseline, at post-intervention, and at 2-month follow-up after the intervention.

## Overall study start date

12/09/2016

# Completion date

31/12/2016

# **Eligibility**

## Key inclusion criteria

- 1. Current university undergraduate or graduate female students
- 2. Identified themselves as Korean or Korean American
- 3. Resident in the northeast region of the U.S.
- 4. Aged 18-26 years
- 5. Able to speak or read English
- 6. Not yet vaccinated against HPV

#### Participant type(s)

Mixed

#### Age group

Adult

# Lower age limit

18 Years

# Upper age limit

#### Sex

Female

# Target number of participants

100

#### Total final enrolment

104

# Key exclusion criteria

Does not meet inclusion criteria

# Date of first enrolment

12/09/2016

#### Date of final enrolment

31/10/2016

# Locations

# Countries of recruitment

United States of America

# Study participating centre

University of Massachusetts Boston

100 Morrissey Blvd Boston United States of America 02125

# Sponsor information

# Organisation

University of Massachusetts Boston

#### Sponsor details

100 Morrissey Blvd Boston United States of America 02125 +1 6172875000 sharon.wang@umb.edu

#### Sponsor type

University/education

#### Website

https://www.umb.edu/

#### **ROR**

https://ror.org/04ydmy275

# Funder(s)

## Funder type

Charity

#### **Funder Name**

**American Cancer Society** 

#### Alternative Name(s)

American Cancer Society, Inc., Sociedad Americana Contra El Cáncer, ACS

#### **Funding Body Type**

Government organisation

#### **Funding Body Subtype**

Associations and societies (private and public)

#### Location

United States of America

# **Results and Publications**

#### Publication and dissemination plan

Results have been published. Several other articles are in press as of December 2019.

## Intention to publish date

30/06/2020

#### Individual participant data (IPD) sharing plan

The datasets generated and/or analysed during this study will be included in the subsequent results publication.

# IPD sharing plan summary

Data sharing statement to be made available at a later date

# **Study outputs**

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
Other publications	baseline characteristics	01/08/2019	23/12/2019	Yes	No
Results article	acceptability results	01/10/2019	23/12/2019	Yes	No
Results article	results	29/01/2020	06/02/2020	Yes	No