Pre-View: An Interactive Video Doctor Plus Provider Alert

Principal Investigator: Judith Walsh, MD, MPH

Co-Investigators:

Michael Potter, MD

Ginny Gildengorin PhD

Larry Green DrPH

Rene Salazar, MD

Elizabeth Ozer, PhD

PreView

PreView

* **PRE**ventive **VI**deo **E**ducation in **W**aiting Areas

* Interactive Video Doctor Plus Provider Alert

* Targets all cancer and cancer screening discussions for which a participant is potentially due
  * Men and women aged 50-70
  * Breast, cervical, colorectal and discussion about PSA screening

PreView: An Interactive Video Doctor Plus Provider Alert

* Age-specific cancer screening
    * Breast, cervical, colorectal
    * Prostate cancer screening discussion

* Patient is asked a series of questions about health history, history of cancer screening and reasons why he/she may not be up to date on cancer screenings on an interactive iPad

* Patient receives information that is *individually* tailored to responses

* Provider Alert: printed sheet summarizing patient's screening history, readiness to change and individual road blocks and suggestions for appropriate messages are given to the physician with patient's chart
    * Physician can discuss patient's relevant concerns and can tear off a "Prescription for Prevention"

PreView Components

* Assessment
  * Individual stages of change
  * Individual barriers to screening

* Introduction of Video Doctor
  * Individualized messages based on stages of change and perceived barriers

* Provider Alert
  * Stage of change and perceived barriers
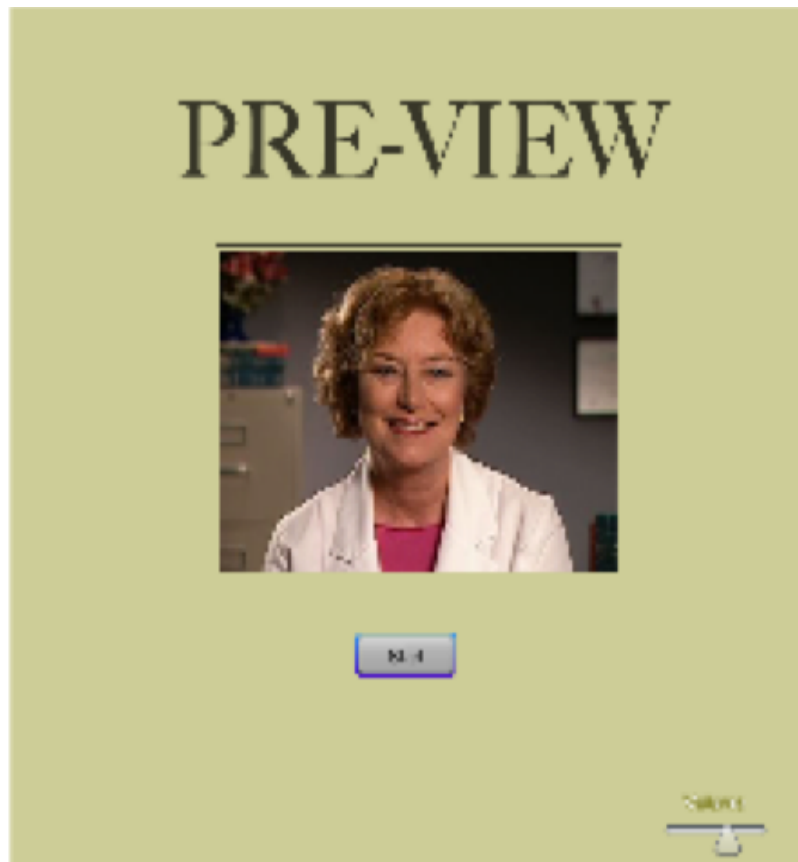 * Paper copy given to provider to be used during the visit

Roadblocks or Barriers to Screening

* Participants are given a list of reasons from which to choose about why they have not been screened

* They then receive messages in response to their individual roadblocks

Pre-View Example: Barriers to Mammography

* I have a hard time seeing a doctor

    * I have questions for the doctor

* I do not think I am at risk for breast cancer

    * I need more information about the test

* My doctor did not recommend it

    * Getting a mammogram regularly is a problem

* I have too many other health problems to get tested

    * I don't have a regular doctor

Introductory Screen

* Login screen to complete the assessment/video doctor session

Assessment Question

A mammogram is an x-ray of the breast that looks for signs of cancer. Has your doctor or nurse ever recommended that you have one?
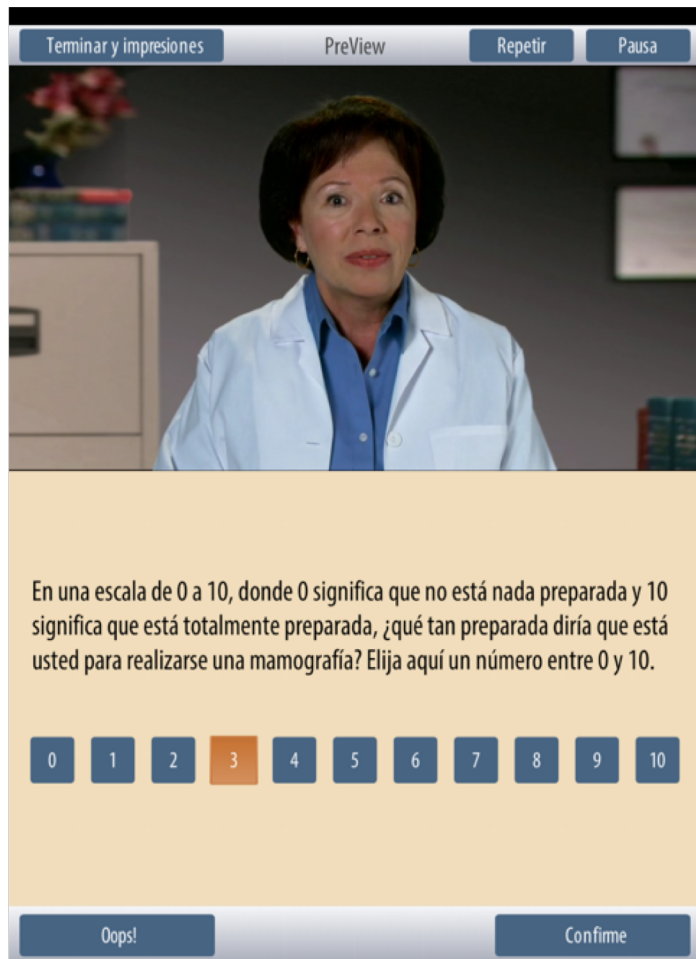
- ☐ Yes

- ☐ No

- ☑ I am not sure

Oops   Confirm

- Participants use touch screen interface to respond to each question

- They can also hear questions and response categories read to them via headphones

Readiness to Change: Spanish

The Spanish version of Preview is identical to the English version, asking the participant to rate their readiness to change on a scale from 1 to 10.

Sample Provider Alert: Colon Cancer Tests

Overview

* Development of PreView

  * Modification with new cancer screening recommendations

* Pilot Study for Feasibility and Acceptability

* Randomized Controlled Trial at 6 Clinical Sites

* PreView in Spanish

* Maintenance

* Dissemination

* PreView as a web based app

Pilot Study

* Usability testing to ensure that individuals were able to use PreView and that branching flowed smoothly
    * 24 individuals
    * No dominant "most preferred" or "least preferred" module
    * All found computer easy to use
* Pilot test for feasibility and acceptability in 5 clinical sites
    * 80 participants (33 men and 47 women)
    * Outcomes were interest in testing or discussion
    * Majority felt the information helped them decide whether or not to be screened

Randomized Controlled Trial

We enrolled 508 participants at 6 clinical sites:

* John Muir

* San Ramon Valley Primary Care (SRVPC)

* Family Care Associates (FCA)

* Highland

* Lifelong Medical Clinic

* Southeast Health Center (SEHC)

RCT Process

* Potential participants with upcoming appointments identified in advance
* MD gave approval to contact
* Phone call to ask if they would be willing to come early to do PreView
* Complete consent and do PreView before MD appointment
* Randomized to intervention or control
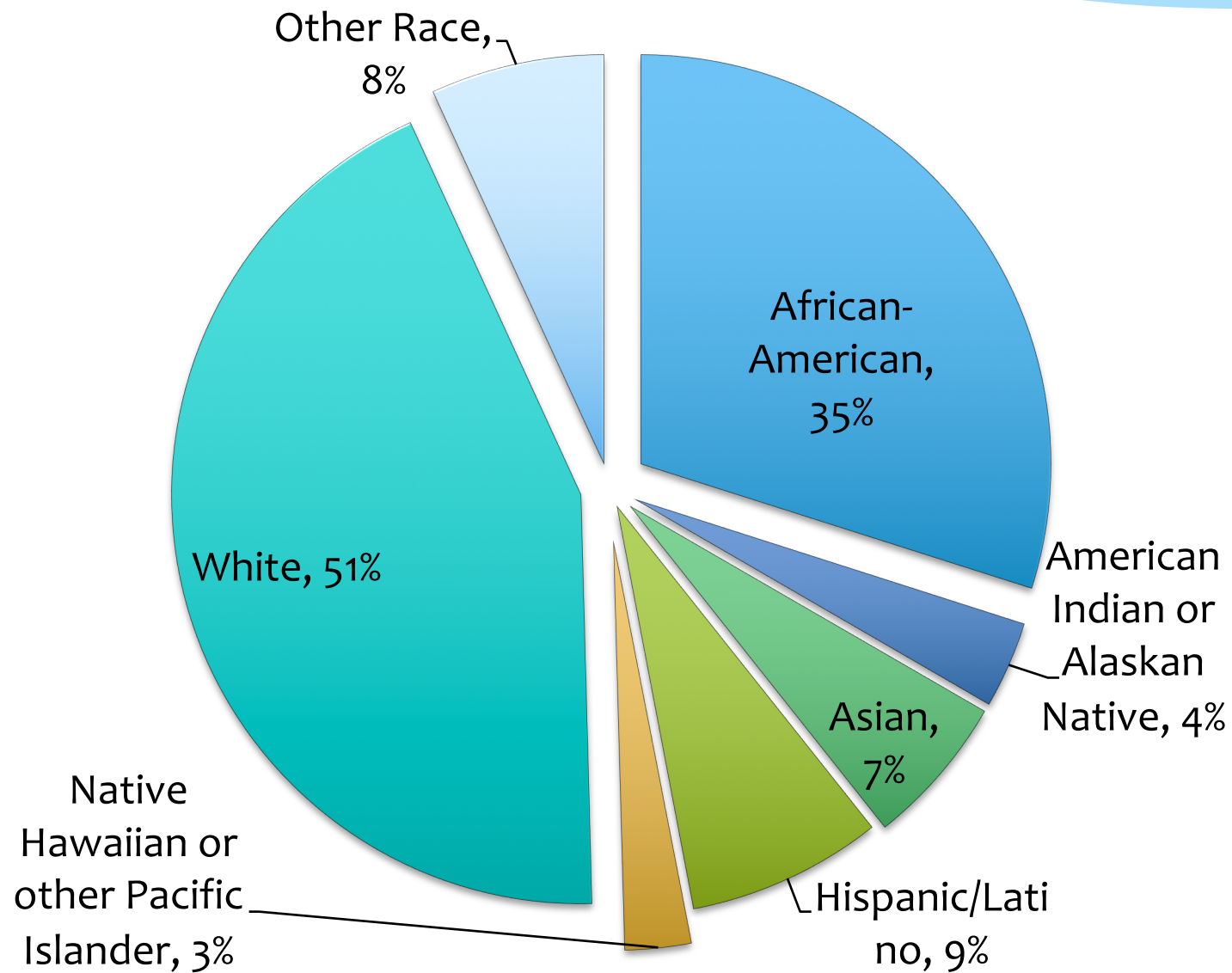* Return to iPad for post-visit assessment

RCT Outcomes

* Main outcome is cancer screening test or discussion done up to 14 months after PreVIew Intervention

Baseline Characteristics	Control (n=257)	Intervention (n=251)
Gender Female	156 (60.7%)	150 (59.8%)
Race * American Indian or Alaskan Native Asian or other Pacific Islander Black or African-American White Some Other Race	9 (3.5%) 26 (10.1%) 93 (36.2%) 127 (49.4%) 22 (8.6%)	11 (4.4%) 23 (9.2%) 83 (33.1%) 137 (54.6%) 21 (8.4%)
Language English Spanish Other	236 (91.8%) 7 (2.7%) 14 (5.4%)	230 (91.6%) 9 (3.6%) 12 (4.8%)
Mean Age	58.8	58.9

* Patients could select more than one race

Ethnicity

Other Race, 8%

African-American, 35%

American Indian or Alaskan Native, 4%

Asian, 7%

Hispanic/Latino, 9%

White, 51%

Native Hawaiian or other Pacific Islander, 3%

RCT Main Results

* In clinics with overall high screening rates at baseline, no or nonsignificant increase in mammography, Pap and colorectal screening rates
* PSA discussion significantly increased in intervention group
    * 58% vs 36%: p<0.01
* Significant increases in discussion about mammography, pap and colorectal cancer screening

After the RCT

* Maintenance of PreVIew in existing clinic sites

Maintenance Phase Plan

* Goal of maintenance phase is for PreView to be available to patients in the waiting areas without requiring the presence of a research assistant
* iPad is secured in the waiting room with signs etc directing patients to use it
* Provider Alerts printed behind the counter and given to the doctor by a staff member

Maintenance Phase Challenges

* Getting people to use it
* Patients need to exit if called for their appointment
* Printing has to be done behind the counter and relies on a staff member to get the printouts
* Maintaining Security of the iPad
* Being sure the iPad is charged and ready for use each day
* IT Challenges

Focus Groups and Staff/Provider Interview

* Focus groups in each of the clinic sites
    * English and Spanish
* "What would get you to use PreView?"
* Once patients knew about it, they wanted to use it
* Staff and provider interviews discussed barriers to use

Barriers to patient use

* Losing seat in waiting room
* Not hearing if called for appointment
* Not having enough time
* Personal phones

Focus Group Suggestions

* Bigger, brighter signs
* Simpler words
* Phrases that grab attention
* Using Clinic TVs, newsletters
* Staff involvement
  * Asking staff to hand things out, direct people to PreView

PreView in Exam Room

* Fewer distractions as patient waits
* Relies on staff to bring it in and out
    * Medical assistants have multiple tasks
* Still requires printout

Staff/Provider Barriers

* Trying to fit this in with all the other things they had to do

* Remembering to bring the iPad into the room

* Having to get printouts

Dissemination Phase

* Dissemination to 3 clinics not involved in original RCT
    * No expectation of RA involvement
    * Tried in waiting room and in exam rooms
* Use remained relatively low overall

PreView at Home:

* Many suggestions to have PreView to use at home
* Preview now developed as a web based app
  * https://preview.ucsf.edu
* Patients can do it at home before their appointments
  * Can save as PDF or print
  * In some settings, can send to PCP in advance

https://preview.ucsf.edu

Welcome to PreView! PreView is an easy-to-use program to let you know which cancer screenings and discussions you may need from breast, cervical, colorectal, and prostate cancer.

This is appropriate for those who are aged 50 to 70 and speak Spanish or English.

Please select your language preference to begin learning about important screening tests to discuss with you doctor.

After selecting your language, click "Next" to move forward.

¡Bienvenido a PreView! PreView es un programa fácil de usar que le permite saber qué exámenes y análisis de cáncer puede necesitar de cáncer del seno, cáncer de cuello uterino, cáncer de colon y cáncer de la próstata

Esto es apropiado para quienes tienen entre 50 y 70 años y hablan español o inglés.

Seleccione su preferencia de idioma para comenzar a aprender sobre las pruebas de detección importantes para analizar con su médico.
Después de seleccionar su idioma, haga clic en "Next" para avanzar.
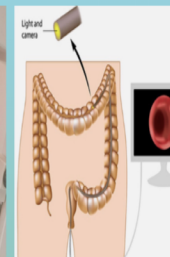
English

Español
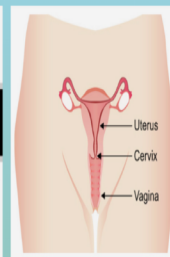
Next ▶

▶ Exit

Please select one

Mammogram ›

A mammogram is a special X-ray of the breasts that looks for early signs of cancer.

Colon tests ›

A colon test is a test done with a sensitive test that looks for signs of cancer in a person's stool (a stool-based test), or with an exam that looks at the colon and rectum (a visual exam) such as a colonoscopy.

Pap test ›

A pap test is a screening test for cervical cancer by taking a sample of cells from the cervix through the vagina.
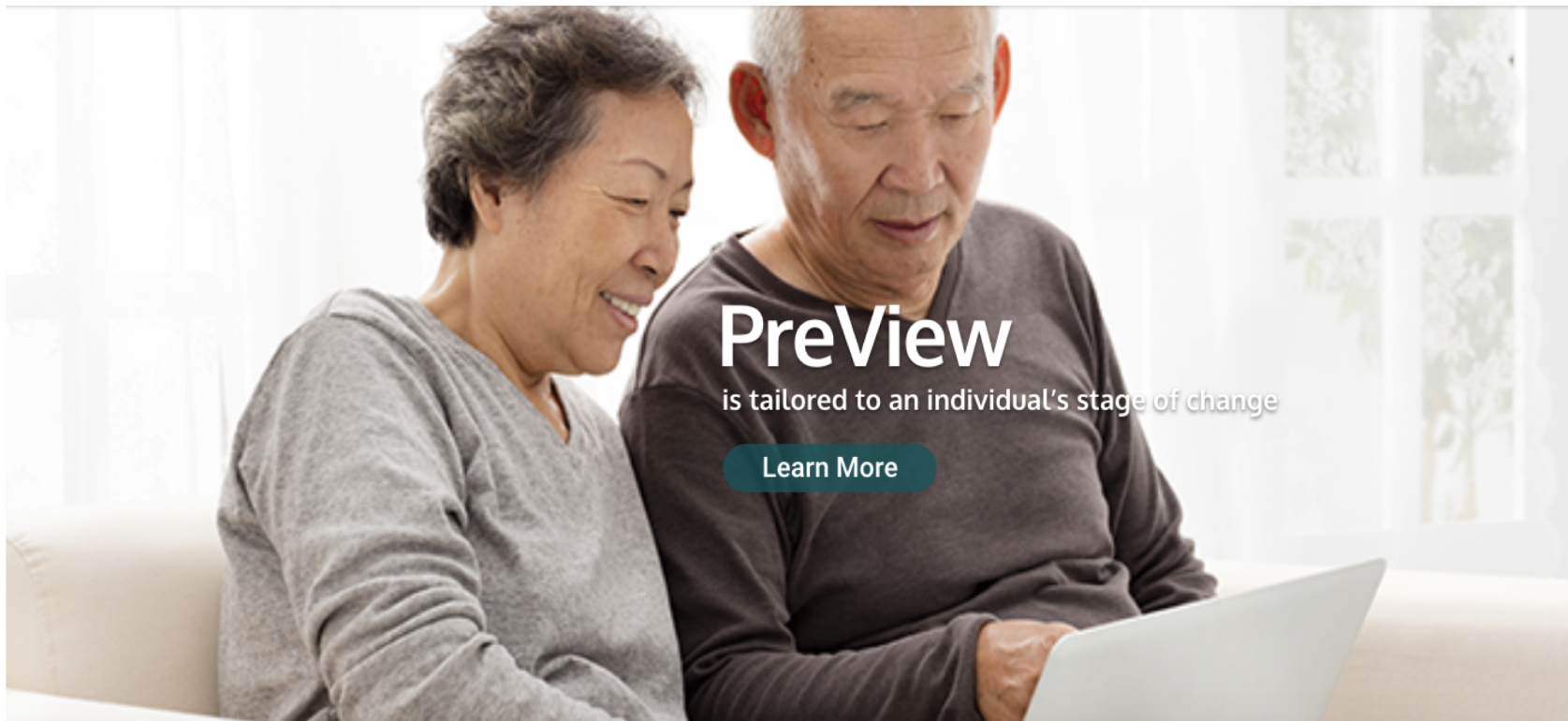
◀ Back   Next ▶

Dissemination Toolkit/Website

* Developed a website to enable others to implement PreView

* Training materials, English and Spanish program materials

* Target cue sheets

* Training webinars

* FAQs

* http://previewvideodoctor.org/

http://previewvideodoctor.org/

Future Directions

* How best to disseminate now that it is a web based application
* PreView in areas where decisions are complex
    * Shared Decision Making for Mammography for women in their forties and over age 75
    * Lung Cancer Screening
* Incorporating PreView responses directly into EHR

Soliciting your Input

* We welcome your input on PreView

* Questions?