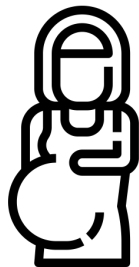


---

**From the time of her first cycle to menopause, the average American woman will have around 450 periods in her lifetime.**

---



---

## Women's Health

- **Total Addressable Market:** Globally valued at USD 41.35B in 2022 and is expected to grow at an annual growth rate of 5.4% from 2023 to 2030.
  - **Three Main Focuses**
    - a. **Menopause:** a point in time 12 months after a woman's last period.
    - b. **Menstruation:** is the monthly shedding of the lining of your uterus.
    - c. **Contraception:** is the use of medicines, devices, or surgery to prevent pregnancy.
-

---

# Meet the Team!



**Shreya**  
Coterm in CS



**Allie**  
BS in CS



**Emily**  
Coterm in CS



**Eric**  
Bs in CS

---

# Roadmap

Needfinding  
Methodology



Analysis



Interview Results



# Roadmap

Needfinding  
Methodology



Analysis

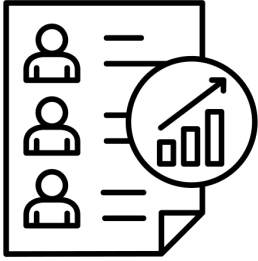


Interview Results



---

# Needfinding Methodology



---

# Participants

- **Dr. Marcia Stephanick** (*Domain Expert*)

Professor of Medicine Professor of Obstetrics and Gynecology. She is currently the Principal Investigator of the Women's Health Initiative.

- **Prakriti Garima**

45 year old woman going through pre-menopause, Friend's mom

- **Raagavi Ragothaman** (*Extreme User*)

23 year old woman with PCOS (Extreme User), Acquaintance

- **Rosann**

62 year old woman





---

## Questions

1. In an ideal world, what **technology** in women's health would you like to see?
  2. What are your **biggest worries as you age** with your women's health?
  3. How do you feel about the use of **technology and telehealth services** in women's health?
  4. Do you have any **specific questions or concerns** related to women's health that you'd like to see addressed or discussed more frequently?
-





---

## Interview 1: Dr. Stefanick (Domain Expert)

- **Who?** A domain expert who runs the Women's Health Initiative, a study following 4,500 post-menopausal women aged 50-75 since 1994. OB-GYN and Professor of Medicine at Stanford, pioneered research in post-menopausal hormones
- **How?** Conducted by Emily and Eric over Zoom
- **Why?** Chosen for expertise in women's health problems and treatments
- **What?** Women's health needs change over time, but impersonal treatments are often used irrespective of their individual symptoms





---

## Interview 2: Prakriti

- **Who?** Prakriti is a friend's mom who is going through pre-menopause
- **Where?** Conducted by Allie and Shreya over Zoom
- **Why?** Chosen for her age and pre-menopause
- **What?** Prakriti is frustrated because she had no idea that late periods and hot flashes relating to pre-menopause start at 45. Since everyone's symptoms are different, she doesn't feel like she knows what's normal and abnormal





---

## Interview 3: Rosann

- **Who?** Rosann is a friend's mother who is post-menopausal
- **Where?** Interview conducted by Allie and Shreya in person
- **Why?** Chosen for her age, phase in her menstrual cycle, and personal experiences in the healthcare industry
- **What?** Rosann has become frustrated with having to frequently be her own healthcare advocate with her endometriosis as she ages, and feels that she essentially has to help herself.





## Interview 4: Raagavi (Extreme User)

- **Who?** Raagavi is a friendly acquaintance who has mentioned concerns about her menstrual health and experiences with PCOS
- **Where?** Conducted by Allie, Eric, and Shreya in person
- **Why?** Chosen for her PCOS diagnosis
- **What?** Treatment and diagnosis for PCOS and other period disorders is extremely tedious. Since symptoms are so varied for women, it's hard for both menstruators and gynecologists to pinpoint diagnosis just based off of symptoms. Suggested treatments are often really unhelpful for PCOS.



---

# Interview Results

---

“There are **hundreds of possible hormone treatments** available to women that a primary care physician doesn’t even know about.”

Dr. Stefanick

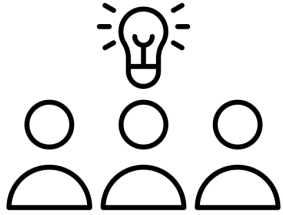
“Treatment options for **PCOS** that are not prescribed are extremely **generic and include information** such as ‘eat healthier’ and ‘maintain a low carb diet.’ This is pretty damaging to someone’s understanding of their condition and themselves.”

Raagavi

“Since everyone’s **symptoms for menopause** are so different, I wish there was a way to figure out what symptoms are considered normal.”

Prakriti

---



---

## Tensions

- **The Same Drugs are Prescribed:** There are hundreds of possible drug formulations, but only 1 or 2 are prescribed for most women.
- **Period disorders are barely understood by both field experts and menstruators:** Disorders such as PCOS and endometriosis don't have clear cut treatments and the lifestyle recommendations to treat them are pretty frustrating.
- **Older women going through menopause might not understand all of their symptoms:** Different phases of menopause have very different symptoms that are not necessarily widely talked about.



---

# Analysis



# Empathy Map: Dr. Marcia Stefanick

## SAY

Public thought post-menopausal hormonal treatment was ineffective for a while	Menstruating women already have the apps they need	Hormonal treatment is becoming more popular for treatment	Menstruating women have plenty of apps	Women need information about their treatment options	Menstruating women care most about contraception	Post-menopausal women don't get specialized or individualized care	The tech gap still exists for older women seeking healthcare
Older women don't use apps for health	Stigma is not contributing to lack of care	Women have plenty of information at their disposal but don't get it	Women aren't given enough options for treatment by doctors	Primary care physicians aren't always enough	Telehealth and tech are helpful for younger women	Menopausal women have changing needs that go untracked	Older women are less targeted by new tech and apps
Different age groups have very different needs	Women generally only see primary care physicians	Hormonal treatments are worse than IUDs for menstruating women	Different hormones have very different side effects	Women have questions they want answered about symptoms and treatments	Treatments are general and not patient specific	The women's health industry is mostly reactionary waiting for something to go wrong	Women are not aware of all the options for hormones and contraception

## THINK

## DO

Runs longitudinal study following 4500 women	Talks to women annually	Interacts with patients as OBGYN	Questions women on symptoms and needs	Frustrated by lack of physician knowledge	Cynical about tech for menstruating women due to oversaturated market	Saddened by limited number of treatments offered	Hopeful about personalized hormonal care
Stays up to date with colleagues about newest tech	Conducts research in post-menopausal hormones	Adjusts research with new trends	Includes gender and sex minorities in research and treatment	Proud of starting WHI	Connected to the 4,500 women in the study	Concerned about women's lack of knowledge about their health	Angry about struggle for abortion rights
Trying to learn to anticipate hot flashes in women with colleagues	Consistently cites colleagues and others in relevant fields	Principal Investigator of the Stanford Clinical Center of the WHI Clinical Trials	co-leader of the Population Sciences Program of the <a href="#">Stanford Cancer Institute</a>	Skeptical about reaching older women through tech	Curious about the information gathered for treatment plan	Skeptical about the supposed difficulty understanding menopause	Annoyed that drugs are just automatically prescribed without optimizing for the right fit <small>mimo</small>

## FEEL



# Rosann

## SAY



## THINK



## DO



## FEEL





---

## Key Insights

- Navigating menstrual health as an older woman seems ***daunting***, especially because menopause has many phases and conditions
- Women have ***specific symptoms*** depending on their age and treatment, but this information is not used to inform better treatment as they age.
- Period disorders are ***not widely understood***, causing a lot of uncertainty and lack of clarity for those who experience them



---

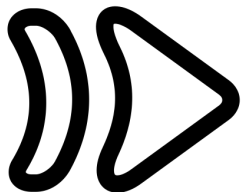
# Summary



---

## Key Learnings

- There is a **lack of drug personalization** for contraception, and menopause hormone therapy.
  - There is **inefficiency in determining whether a woman has a period disorder**, as they are not well-understood.
  - Having women's health issues can be extremely disempowering because many times **women have to be their own advocate**.
  - Many women find it difficult to **recognize their symptoms** as menopause, as symptoms can vary widely.
-



---

## What's next?

- **Four Interviews Lined Up**

Unpack additional interviews and understand the women's health landscape more deeply.

- **Brainstorm Solutions**

Synthesize the interview insights to begin brainstorming potential solutions.

- **Testing Solutions**

Construct potential low-fi prototypes before selecting a final concept.

---

---

**Any Questions?**

---