

*Health Outcomes Around Pregnancy and
Exposure to HIV/ARV
The HOPE Women's Longitudinal Health Study*

*Discussion with PHACS CAB
October 22, 2020 12:00 p.m. ET*



Outline

- ❑ Review overarching HOPE Study Aims
- ❑ Review Study Visit Schedule and Activities
- ❑ Review Conceptual Framework of the HOPE Study
- ❑ Discuss Questions About HOPE Protocol
- ❑ Discuss Questions about COVID NOSI

Overarching HOPE Study Aims

- ❑ To establish the HOPE Cohort
- ❑ To assess the HIV-related and general health of women living with HIV (WLHIV) in the HOPE cohort over the reproductive life course
- ❑ To assess maternal health of WLHIV as it relates to caregiving and social support of children with and without adverse health conditions/events

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Sources of HOPE Recruitment (N = 1,630)

Nulliparous Women

Non-PHACS
Women living with
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receiving care at a
HOPE-recruiting
SMARTT Study Site
(N=200)

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Postpartum/Parenting Women

SMARTT Women
living with HIV \leq 40
years who enrolled
in the Women's
Health Supplement
(N=466)

Non-Women's
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SMARTT Women
living with HIV \leq 40
years with a
SMARTT child \leq 4
years of age
(N=208)

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AMP Up and AMP Up Lite women living with HIV
(N=340)

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HOPE Study - Visit Schedule and Activities

Activity	Enrollment	Delivery	6 Weeks Postpartum	Annual Follow-Up
Encounter Type	In person	In person	In person	Virtual
Body Measurements, (Anthropometrics/BP)	✓			
On-Line Survey	✓	✓	✓	✓
Data Abstraction	✓	✓	✓	✓
Specimen Collection	✓	✓		
Activity Monitoring	✓			✓

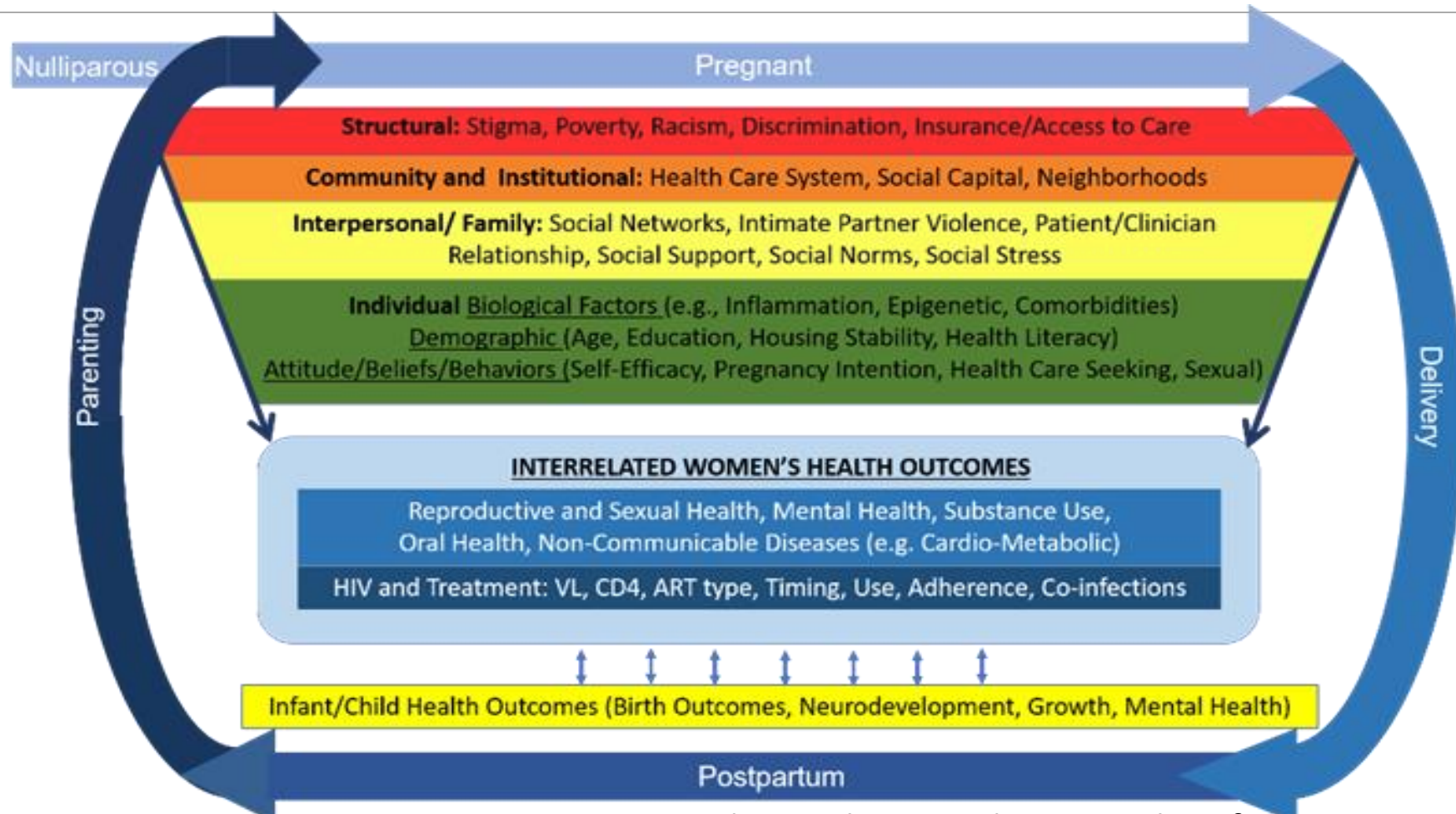
Enrollment
(All participants)

Delivery
(Pregnant
participants)

6 Weeks Postpartum
(Pregnant
participants)

Annual Follow-Up
(All participants)

HOPE Study – Conceptual Framework



Note: WLHIV may enter HOPE during the period prior to their first pregnancy, during pregnancy, or during postpartum/parenting periods

Research Domains

Reproductive
Health

HIV Disease
Progression &
Care Engagement

Mental and
Psychosocial
Determinants

Cardiometabolic
Health

Co-Infections
(COVID-19)

Substance
Use

Questions for CAB on HOPE

1. We will be inviting women who are not mothers and who have not given birth to participate in the HOPE study. What do you suggest re: making the study something they would want to join and be retained in? What suggestions do you have for making them feel welcome?
2. Do you think there will be women who would want to join HOPE but might not be interested in joining SMARTT?
3. Annual follow up visits for HOPE will be remote visits, meaning they will not need to come to the clinic and will be asked to complete an online recorded survey once a year. How do you feel about the remote visits? What challenges should we expect? What suggestions do you have for addressing them? What would be good about this design? How will women feel about completing the on line survey and not having in person visits?

Questions for CAB on HOPE, (Cont.)

4. One part of the remote assessments involves wearing a device like a fitbit to assess sleep, physical activity and heart rate. What do you think about this? What concerns you most about this?
5. Considering the aims for HOPE, what are your top 3 questions about women's health that you'd like us to be exploring in HOPE?
6. We'd like to understand the impact of structural racism on women living with HIV. We are interested in your thoughts on how structural racism affects women and seek your input on ways to measure this in our study. We have identified some questionnaires to assess aspects of this and would like to convene a small group call to look at those assessments. Who would be interested in volunteering for this effort?
7. For women who enroll into HOPE during pregnancy, we will be asking women to self-collect vaginal and rectal swab specimens at the clinic, which will be important for studying aspects of the infant microbiome. What would be easy or difficult about doing this, especially considering the time close to giving birth?

Questions for CAB re: NOSI on COVID-related stress and birth outcomes for WLHIV who are pregnant

1.If we asked pregnant women to report on their COVID-19 symptoms in pregnancy, exposure to anyone with COVID-19, and ability to social distance, wear mask, etc since the last survey they completed, is asking every two weeks in pregnancy too much? Should it be once monthly?

2.How much should we pay a person for these interviews? Should we pay at the beginning and at the end?

Thank you for contributing to the HOPE Study design



Additional Slides re: HOPE Domain-Specific Aims (not for presentation)

HIV Disease Progression & Care Engagement

Proposed Aims

- ❑ To investigate the prevalence, changes in, and HIV history-related predictors of HIV care continuum outcome components (e.g., linkage to HIV care, retention in HIV care, adherence, viral suppression, immune status), across the reproductive life course among WLHIV.
- ❑ To investigate individual, interpersonal, social and structural determinants of HIV care continuum-related outcomes (linkage to HIV care, retention in HIV care, adherence, viral suppression, immune status) across the reproductive life course among WLHIV.
- ❑ To describe the transition from OB to postpartum HIV care, and barriers and facilitators to successful transition.

Stigma, Racism and Social Determinants of Health

Proposed Aims

- ❑ To describe predictors and health related sequelae of internalized HIV stigma and racism among women living with HIV across the reproductive life course
- ❑ To assess the relationship of structural racism and individual experiences of racism to the health of women living with HIV
- ❑ To identify predictors and health consequences of disclosure of HIV status to intimate partners and women's wider social networks

Reproductive Health (Continued)

Proposed Aims

- To describe and determine factors associated with:
 - Pregnancy outcomes
 - Pregnancy complications

- To assess knowledge and awareness of HIV prevention practices and safer conception practices

- To determine prevalence of sexually transmitted infections (STIs) and determine factors associated with STI acquisition

Cardiometabolic Health

Proposed Aims

- Assess associations between ARV use and weight change
- Assess associations between mode of HIV acquisition, immune status, viral control, ART regimen and the occurrence of hypertension
- Assess associations of ART use with gestational diabetes
- Evaluate the influence of sleep and activity on cardiometabolic health among women living with HIV

Mental Health and Psychosocial Determinants

Proposed Aims

- Describe the prevalence, onset, remission, and/or recurrence of psychiatric disorders and substance use disorders among women living with HIV
- To identify individual, HIV disease, treatment, pregnancy-related, and psychosocial factors associated with the presence and chronicity of psychiatric disorders and substance use disorders among women living with HIV
- To determine the relationship of psychiatric and substance use disorders to adherence and HIV disease outcomes among women living with HIV
- To examine the relative contribution of violence exposure, psychiatric and substance use disorders and HIV disease factors to a) hypertension; b) adverse pregnancy outcomes; c) adverse children neurodevelopmental outcomes

Substance Use

Proposed Aims

- ❑ Assess changes in substance use behavior among women living with HIV over time and explore patterns unique to individuals who experience reproductive life events such as pregnancy, the first year postpartum, and early years of parenting
- ❑ Assess the relationship of substance use among pregnant and postpartum women living with HIV with child health outcomes, including child neurodevelopment.
- ❑ Assess the relationship of substance use among women living with HIV across the reproductive trajectory on HIV-related outcomes, including virologic control and the HIV cascade of care
- ❑ Determine predictors of substance use among women living with HIV across the reproductive trajectory, including mental health, geopolitical/public health, social determinants of health, and health care systems/processes

Co-Infections

Proposed Aims

- Investigate the incidence, hospitalization rates, other characteristics of, and factors associated with SARS-CoV-2 infection among women living with HIV or reproductive age