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Preconception and Interconception are intersecting areas that span almost the entire lifespan of women. Preconception (PC) health generally refers to women's pre-pregnancy health status.¹ The goal of PC care is to identify and address physical and mental health issues, and social risk factors to women's health and pregnancy outcomes by providing prevention and management interventions.^{2, 3} Similarly, Interconception (IC) health is women's health status between pregnancies. It is important to note that the distinction between early postpartum and early interconception is not always clear, however IC generally includes the postpartum stage. ^{1, 4} The goal of IC care is similar to that of PC care with the addition of pregnancy spacing.^{2, 5}

PC and IC health care has been at the forefront of the nation's efforts towards improving pregnancy outcomes. Since 2000, national goals have included: ⁶

- 1) Improving the knowledge and attitudes and behaviors of men and women related to preconception health;
- 2) Assuring that all women of childbearing age in the United States receive preconception care services (i.e., evidence-based risk screening, health promotion, and interventions) that will enable them to enter pregnancy in optimal health;
- 3) Reducing risks indicated by a previous adverse pregnanc(w)2 tioeiniough3(n)3() intervention d-5(u(ear6n)5(g)4(

patient advocates, HVs have been found to be effective members of the health care system.^{11, 12} Their roles are usually restricted to the scopes of specific programs or projects. However, with effective training and integration, HVs can help address current gaps in the PC and IC care system resulting from: ^{11, 12}

Short duration of primary care visits, making it difficult for health care providers to spend the time to discuss PC and IC health care;

Limitations of clinician training in addressing behavioral and social risk factors;

Language and cultural differences, especially for the sensitive topic of contraception for many cultures and religions;

Limited ability to affect behavior change that requires much time for discussion and follow-up; Lack of reproductive life plans already developed at the time of PC and IC health care visits; and

Limited access to vulnerable populations who often do not have access to PC and IC health care due to lack of health insurance or other socio-economic barriers.

HV's work with women within communities can be an important way for ensuring that women obtain the additional information, support and guidance for PC and IC care. This report aims to highlight the importance of IC and PC care for communities with high needs, provides an overview of recommendations for the potential role of HV in PC and IC care, and presents evidence of the integration of HVs (from studies, reviews, recommendations, and guidelines) into the delivery of PC and IC care.

In the context of the reproductive life course, PC and IC fall before and between pregnancies. Both stages are crucial as they serve as the foundation for optimum pregnancy outcomes. Women's unhealthy behaviors before they become pregnant have been associated with many poor pregnancy and infant outcomes. Research findings show that women who are healthy before pregnancy have a higher chance of having healthier infants.¹¹ On the other hand, women with pre-pregnancy health conditions such as hypertension, obesity, diabetes, and others, have had higher risk of low birth weight, miscarriages, and small for gestational age, among others. Other risk factors include social (age, income, education, stress, domestic violence, etc.) and behavioral issues (smoking, drug/alcohol use, inactivity, etc.). Overall, study results have shown that women who have received PC care are also more likely to be more overall healthy compared to women without PC care, regardless of the planned status of the pregnancy. PC and IC care interventions have also been found to imprugJE4 healthsuch approach can be used for the PC and IC care of women with disparate outcomes, providing the opportunity to identify individual women's conditions and provide care and assistance based on their needs.

PC and IC care represent the set of interventions that attempt to identify and treat health issues, change behaviors and address social challenges of women before they get pregnant. PC and IC care can help reduce the prevalence of these risk factors and negative health outcomes including ensuring that each pregnancy is planned and intended. HVs are instrumental to this process and have the opportunity to work with women to plan individual or group based interventions for improving PC and IC health. Table 1 (Appendix B) provides examples of PC and IC health research studies exploring the association between HVs or other community health workers on maternal and infant outcomes.

provider in order to select the best method(s) for them. Long Acting Reversible Contraception (LARC) is becoming more common and accepted among teenagers. Information on LARC and where to obtain it can be provided by the HV. It is important for the HV to discuss with the clients that LARC does not protect from sexually transmitted diseases and then provide the client with additional information on protective measures. Older women wishing to prevent pregnancy may also benefit from similar advice on LARC. For women above 50 who wish to get pregnant, HVs can discuss the potential dangers and risks to the infant. Women over 35 may also be at risk, but would have less risk than very young or older women. Similarly sharing information on potential risks might be a task for the HV, however, clients should be encouraged to discuss their desire for children with their physician or health care provider.

The HV can be a support for women dealing with health conditions. Though not trained to screen or diagnose, HVs can work with their clients to identify any previously diagnosed conditions, engage in conversations about treatment status, follow-up appointment for checkups, and provide overall information about screenings and treatment of conditions prior to becoming pregnant. Common health conditions to treat during the PC and IC stages include diabetes, asthma, sexually transmitted infections, thyroid disease, phenylketonuria, seizure disorders, high blood pressure, arthritis, and eating disorders. Screening for potential new conditions and treating them prior to becoming pregnant can greatly improve pregnancy outcomes.

Periodontal Health is an important but often ignored element to optimal PC and IC health. Infections of the teeth or mouth can lead to more severe conditions if left untreated and can impact women's health. Gum disease can increase the risk of clogged arteries, heart disease, and stroke.²² It may also worsen existing conditions such as diabetes, respiratory diseases, and osteoporosis. It has also been identified as a potential preventable cause of premature births and lower birth weight.¹³ The HV can therefore share information about the importance of dental care and the need to address current dental health issues.

Identifying and treating any Mental Health conditions is also essential for ideal PC and IC health. Constant anxiety or stress that interferes with daily life should be treated. HVs can make their clients aware of treatment options and connect them to care, and/or provide information on positive coping mechanisms for reducing stress.

The assessment of pregnancy history is critical to avoid adverse pregnancy outcomes in future pregnancies. Women who previously had a pregnancy with adverse outcomes such as a miscarriage, a stillbirth, or premature delivery, have an increased risk for similar outcomes in future pregnancies. For example, research findings suggest that some women with early onset preeclampsia in her first pregnancy may be more likely to experience more severe preeclampsia in her second pregnancy.²³ HVs are well placed to discuss the history with clients and encourage them to share it with their care provider, especially when trying to conceive.

Folic Acid is a vitamin that has been noted to help prevent major birth defects on the infant brain and spine.²⁴ For it to be effective, it must be taken starting at least one month before pregnancy and continued during pregnancy. Folic Acid may be taken by all women of reproductive ancoT/F2 11.05M0 v

including preterm birth, and low birth weight.^{34, 35} HVs are well placed to work with women to identify risk factors and make the appropriate referrals for services when needed.

Racism and discrimination has been found to be an important factor in poorer birth outcomes among African Americans. Considered both a stressor and a structural barrier (such as neighborhood resources and safety), racial discrimination has been associated with higher risks for preterm birth and low birth weight among African Americans, compared with Caucasian and Hispanic women of the same socio-economic status.^{36, 37} For HVs, awareness of the impact of racism can help with building trust and understanding with African American women. HVs can not only validate the existence of racism the women face, but may address some of the impact of structural racism by referring clients to local resources and stress-related support and care.

Another potential social issue and additional source of stress a HV may need to help a client deal with is domestic violence. Any form of violence (physical, emotional or sexual) against women can impact their PC & IC health, and their pregnancy outcomes. Intimate partner violence has been associated with emotional and physical consequences for women, but also with stillbirth, preterm birth, small for gestational age, and low birth weight.^{38,}

conditions through behavioral health changes and altering environmental exposures, HVs can help fathers to be more proactive in the health of their child. Men may also provide support to women when they are receiving PC and IC care; therefore, the more men know about the necessary steps to improving PC and IC health, the more supportive they may be as their partner makes an effort to improve her health.⁴³

Barriers to accessing care, whether financial (can't afford insurance, can't pay for transportation, etc.), social (lack of support, lack of child care, etc.) or informational (don't know how to complete paperwork, where to access care, etc.), need to be identified and steps taken to ensure women have health insurance and access to the care they need, whether for healthy woman visits of for obstetric care. A role of HVs is to ensure their clients have health insurance and access to health care providers. They also may need to address any additional barriers to accessing care, such as transportation or child care. Individual barriers may include women's motivation to seek health care, a fear of the medical system, or a lack of awareness of the importance of preconception care¹. Structural barriers can include long wait times, location and hours of health care facilities, language and attitudes of staff and provider, cost of services, lack of child-friendly facilities.¹ HVs can connect clients to local resources to address structural barriers, and education and information to address personal barriers. HVs can serve as facilitators by creating open pathways to access to care for all women.¹

How women space their pregnancies can have an impact on both mother and infant. According to research findings, becoming pregnant within the first 6 months after delivery is associated with an

the formal and authoritative nature of the medical setting can impede the ideal PC and IC care for women from high need communities.

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Author, year (Type)	Population	Objectives	Key Findings Related to Preconception and Interconception
Dunlop et al., 2010 (Cross-sectional)	African American and Hispanic females and males (N=144)	Explore the acceptability and utility of integrating an assessment of reproductive plans into primary care encountem	

Author, year (type) Key Findings on Preconception and Interconception Care

Berg et al., 2013 (Policy strategies and recommendations)

Author, year (type)	Key Findings on Preconception and Interconception Care
	 Consideration of behavioral intentions Consideration of the relationships between preconception health knowledge intentions, and behavior
Wahabi et al., 2010 (Systematic/Meta- analysis)	 Preconception care is effective in reducing diabetes related congenital malformations, preterm delivery, perinatal mortality, and maternal hyperglycemia in the first trimester of pregnancy. Preconception care lowers HbA1c in the first trimester of pregnancy.
Johnson et al., 2006 (Recommendations)	 Recommendations aim at achieving four goals Improve the knowledge and attitudes and behaviors of men and women related to preconception health Assure that all women of childbearing age in the United States receive preconception care services Reduce risks indicated by a previous adverse pregnancy outcome through interventions during the interconception period, which can prevent or minimize health problems for a mother and her future children Reduce the disparities in adverse pregnancy outcomes The recommendations focus on changes in: Access to care Continuity of care Risk screening Appropriate delivery of interventions Health behaviors of men and women of childbearing age A series of specific action steps are provided for implementing each recommendation.