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Integration of Mental Health-Nutrition Counselling for Perinatal Women in Primary Care

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Key Messages

Screening for maternal depression to be a component of service delivery during Antenatal Health Care visits and development of low-intensity mental health intervention by the Ministry of Health (MoH)

Nutritional-enhanced mental health counselling guidelines and materials for mental nutrition counselling should be developed by MOH.

Good nutrition for mental health and patients' awareness to be promoted by sensitized/rained Nutritionists in all health facilities.

Specific simple nutrition messages on leaflet/phones to be distributed (to all health facilities) to women living with maternal depression to enhance awareness

Context

Mood disorders affect women of child-bearing during pregnancy up to one year postpartum(Surkan et al. 2011). About 12.5 - 42% of pregnant women and 12 - 50% of mothers of newborns in Low and Middle-Income Countries (LMICs) screen positive for depression (WHO 2008). Simultaneously, many women in Sub-Saharan Africa suffer from chronic energy deficiencies during pregnancy due to insufficient food intake and high energy expenditure (Desyibelew 2019). High demands of nutrients during pregnancy, combined with the inadequate intake and lack of maternal recovery postpartum, leads to nutrient depletion (Bodnar & Wisner 2015).

Adequate nutrition is essential for proper physical and mental development and for the proper regulation of neurotransmitters (serotonin, dopamine, and norepinephrine) hence mood stabilization (Leung & Kaplan, 2009). Deficiencies, mainly Omega-3 fatty acids and certain micronutrients (folate, and B12, iron, zinc, magnesium, vitamin C, Vitamin A) have been linked to increased rates of depression. These nutrients are common in healthy diets that include dark green leafy, orange or red-coloured vegetables, whole-grains, nuts, organ meat, and seafood (Rechenberg & Humphries 2013). Epidemiological studies point to the link between thee quality of diet and depression (Women & Delivery, 2012). Women consuming poor diet during pregnancy suffer nutritional deficiencies, increasing risks of maternal depression (Madeghe et al. 2020). Achieving good nutritional goals is fundamental in achieving Sustainable Development Goals (SDGs). Little is known about how poor nutrition affects women's mental health during pregnancy and postpartum.

Study Approach and Results

An intervention study was carried out to examine the nutritional factors associated with maternal depression among women in urban low-income Nairobi, Kenya: 33.6 % of pregnant women had maternal depression illness, and 32.1 % of the women had Body Mass Index (BMI) <22.8 kg/m^2, and 9.9% had Mid-Upper Arm Circumference (MUAC) >23cm. For pregnant women (BMI) <22.8 kg/m^2, and (MUAC)>23cm indicates the risk of having low baby birth weight. There was a statistically significant association between poor nutrition as measured by MUAC and maternal depression (p<0.001. Also there was a statistically significantly association between maternal depression and inadequate intake of brain food essential (p =0.002). Maternal depression was significantly associated with lower income (p< 0.001). Women in the second trimester (12-24 weeks)(p=0.02) and lower educational levels (P<0.004) were significantly associated with poor nutritional knowledge. Poor nutrition was the main predictor of maternal depression (p< 0.004). (See Figure 1-4).

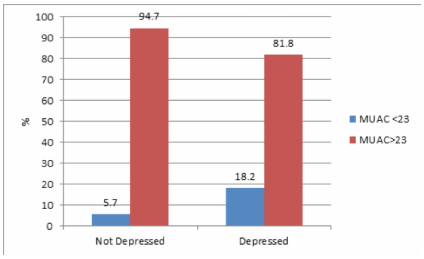

Figure 1-Nutrition status by Mid-Upper Arm Circumference (MUAC)

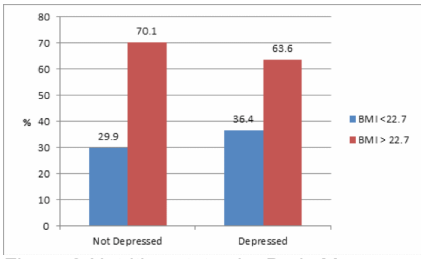

Figure 2-Nutrition status by Body Mass Index (BMI)

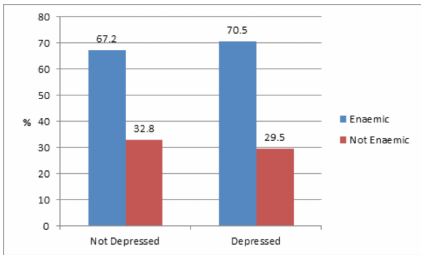

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Figure 3-Nutrition status by Nutritional Anaemia

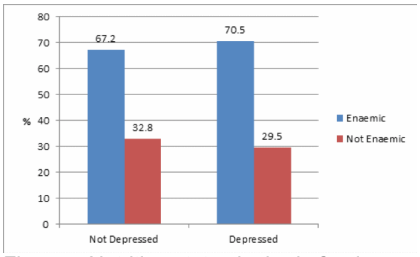

Figure 4-Nutrition status by brain food essential

Current Status of Nutrition Counselling for Pregnant Women with Maternal Depression

A generalized health talk covering various issues concerning pregnant women (including a general nutrition education) is given to all women who come for a check-up in the waiting room as a group as they wait for their turn to be attended to. There is no screening for maternal depression in our primary health care facilities nor dietary screening or individualized nutritional counselling for pregnant women. Only the extremely malnourished cases are referred to the nutritionist, therefore, missing the opportunity for early detection of other pregnant women who may be at high risk for depression and malnutrition (or have obesity, comorbid conditions) requiring timely dietary and nutritional management. The general nutritional counselling may not work for depressed women who need an integrated mental health nutrition counselling to stabilize their mood. A dietary and nutrition plan, combined with mental health counselling, would help prevent depression and malnutrition among pregnant women.

Policy Recommendations

Short-Term

- Include screening of maternal depression and development of low-intensity mental health intervention for women during prenatal visits at the Antenatal Health Clinics (ANC) as a component of care in all primary health facilities by the Ministry of Health (MOH).
- ·Screening of dietary intake among pregnant women in resource-deprived areas to be included during the prenatal visit to identify women needing more intensive dietary monitoring and health interventions.
- ·MOH should focus on Maternal and Child Health (MCH) to develop an integrated nutritional enhanced mental health counselling and psychosocial support for women in distress because there is already existing scholarship, evidence, and expertise in Kenya to do so.
- Inclusion of education on adequate nutrition for mental health to all secondary schools. This will increase awareness and sensitivity from an Early age, by the Ministry of Education and MOH
- ·Production of pamphlets, leaflets, posters, and very brief messages , by MOH, developmental partners, and NGOs, informing all women attending antenatal clinics the signs of depression, nutritious diets, the importance of the antenatal clinic and when to seek medical help.

Medium-Term

- Develop a policy that advocates for screening and counselling of maternal depression and dietary intake during Antenatal Clinics by The Ministry of Health (MOH)
- ·Media campaigns on the increasing rates of maternal depression and create awareness on the association between nutrition and mental health, and promote good nutrition for mental health.
- Include in the curriculum of all health personnel, MSc Nutrition, Public health, Nursing students to keep them abreast of with most recent evidence-based nutrition information on mental health by MOH.
- ·Global funding networks to promote mental health and nutrition research and periodic impact assessment and establish nutrition mental health research grants by MOH, NGOs, Academia developmental partners, and friends from the diaspora.

Acknowledgements

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