A partnership to tackle women and mothers with pregnancy-related diabetes in Tanzania, Africa.

Context
Gestational diabetes mellitus (GDM) is diagnosed when women without diabetes develop high blood sugar levels during pregnancy. Babies born to mothers with poorly treated GDM are at increased risk of macrosomia, malformations, low blood sugar after birth, and jaundice. GDM, if untreated, can also result in a stillbirth. According to the World Health Statistics 2016, 28% of the Maternal Mortality is due to pre-existing conditions, including diabetes. GDM is situated at the nexus between sexual and reproductive health, and chronic diseases. In Tanzania, very sparse data suggest that about 10% of pregnant women will show signs of GDM.

The Luzerner Kantonsspital (LUKS), the Lugala Lutheran Hospital (LLH) in Tanzania, and SolidarMed formed this partnership to start tackling GDM in Tanzania, through the transfer of specialized knowledge and practice from Switzerland to LLH and its staff.

Project description
Goal: To improve sexual and reproductive health of women at Lugala Hospital catchment area in rural Tanzania through technical advice, capacity building, experience exchange and the introduction of screening pregnant women for GDM together with a standard algorithm for treatment – thus contributing to reduce morbidity and mortality for women and their newborns.
Objectives:

1. **Capacity building & experience exchange**: Training of nurses on pathophysiology of GDM, prevention and treatment with dietary measures, pharmacological treatment with insulin (treatment goals, and follow-up) through LUKS at LLH, and through a visit at LUKS by the trained nurses from LLH

2. **Introduction and implementation** of a routine screening for GDM in pregnant women at the LLH with the guidance of LUKS

3. **Introduction of a standard long-term algorithm** for diagnosing and treatment including counselling-based on the above results

4. **Establishing a longer-term mutually balanced partnership** for knowledge exchange and specific support

The main target groups of this partnership are therefore:

- Pregnant women with GDM and their newborns are the primary beneficiaries of this project (approximately 4200 pregnant women attend antenatal and maternity services at LLH each year)
- All women in reproductive age in the district are secondary beneficiaries through more comprehensive sexual and reproductive health services (~60,000 women)
- All health personnel (North and South; clinical and non-clinical staff) are tertiary beneficiaries through the additional experiences, and knowledge exchange
Partnership

The Luzerner Kantonsspital (LUKS) is the tertiary hospital center of central Switzerland encompassing a population of about 800,000 people. The division of Endocrinology and Diabetology has one of the largest outpatient clinics in Switzerland. The category for training house officers is labeled A.

Lugala Lutheran Hospital (LLH) is located in Tanzania in the South of Morogoro Region, in the remote District of Malinyi. It covers a population of 164’000 people, has 154 beds and offers a range of medical and operative services, which exceed the common service level of Tanzanian district hospitals. In 2015, the hospital cared for more than 50’000 outpatients and assisted 1700 deliveries.

SolidarMed is the Swiss organization for health in Africa. Closely linked to a variety of medical actors in Switzerland, SolidarMed collaborates with hospitals, research institutions and Governments in 5 Sub-Saharan countries including Tanzania.

LLH and SolidarMed enjoy an active and established partnership since more than 10 years. LUKS and SolidarMed started an exchange on NCDs one year ago. This trilateral partnership seeks to promote technical knowledge and experience exchange which leads to awareness and guided implementation of evidence-based interventions to improve the effectiveness of service delivery, specifically GDM. In line with the SDGs, the partnership among equal actors is seen as specific added value.

This partnership makes a difference because:

a) First, it has the potential to grow further, include more technical areas and catalyze further exchange of skills, capacity building, knowledge and research.

b) Secondly, the results will contribute to the local and international knowledge about women in reproductive age with GDM in rural Tanzania as well as about possibilities to address and manage this potentially threatening condition.

c) Thirdly, it will improve the service delivery and ability to diagnose and manage pregnant women with GDM in Tanzania, as well as increase the potential of LLH to manage other related patients (spill-over effect).

d) And further, the experience for Swiss doctors to be regularly exposed in an African hospital setting can be of uncountable value, personally, but also systemically, affecting the way patients are treated in Switzerland – increasing cost effectiveness, without loss in quality.

Timeframe: April 2017 to March 2018

Contact

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Red line symbolizes district border (estimated); Red circle signals the location of LLH.