Exploring the needs of Myanmar migrant women for better accessibility of antenatal care services on the Thailand-Myanmar border

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"Exploring the needs of Myanmar migrant women for better accessibility of antenatal care services on the Thailand-Myanmar border"

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by

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Contents

Acronyms

ANC	Antenatal Care
APOHSP	Asia Pacific Observatory on Health Systems and Policies
CBO	Community-Based Organisation
CME	Continuous Medical Education
CMR	Crude Mortality Rate
FGD	Focus Group Discussion
HISWG	Health Information Systems Working Group
IDI	Individual Depth Interview
IMR	Infant Mortality Rate
IOM	International Organization for Migration
MCH	Maternal and Child Health
MDHS	Myanmar Demographic and Health Survey
MOHS	Ministry of Health and Sports (Myanmar)
MTC	Mae Tao Clinic
NGO	Non-Governmental Organisation
SMRU	Shoklo Malaria Research Unit
TBA	Traditional Birth Attendant
TBC	The Border Consortium
U5MR	Under 5 Mortality Rate
WHO	World Health Organization

Abstract

Thailand hosts one of the biggest populations of migrants in South-East Asia. A large population of migrants from Myanmar lives in Tak province in the Mae Sot – Myawaddy border area. Myanmar migrants moved to this area in search of security, livelihood, education and healthcare. Migrants have a marginalised position in Thai society and access to healthcare is complicated by many factors. Health data from Mae Tao Clinic, the location of this study, show that a large part of Myanmar migrant women in this area access Antenatal Care (ANC) services infrequently or not at all. This study explores the needs of Myanmar migrant women for ANC services in terms of Levesque et al's (2013) five dimensions of accessibility: approachability, acceptability, availability, affordability and appropriateness; to find out why these women do not access ANC services as recommended by the WHO. Data was collected through focus group discussions and individual interviews and analysed using Levesque et al's dimensions. Results show that enabling and inhibiting factors for accessing ANC services can be found under all dimensions, the most prominent ones being lack of knowledge among women and their husbands; (in)direct costs of services; legal documentation issues; transportation; and health workers' attitudes and behaviour. Based on these findings, feasible recommendations are the integration of behavioural and communication training into initial health worker training and continuous medical education programmes, and the provision of health education to women and men of reproductive age in the community.

Key words: **antenatal care, access, Myanmar, Thailand, migrant women**

Word count: 11,555

Introduction

My name is Menno Bakker and I currently live in Mae Sot, Thailand, on the border with Myanmar. I am working in the position of clinical consultant at a Community-Based Organisation (CBO) called Mae Tao Clinic (MTC). MTC is managed by refugees and displaced persons from Myanmar, serving marginalised communities from Myanmar living on either side of the Thai-Myanmar border, by providing them health care free of charge. One of my responsibilities is to assure the quality of delivered care in the reproductive health department through on-the-job training of health workers and implementing standard operating procedures. An ongoing challenge for MTC is to make sure pregnant women attend antenatal care (ANC) services, so that any pregnancy-related problem can be timely detected and treated accordingly. MTC data show that pregnant women on average only visit 2.73 times out of the recommended 4 ANC visits, and are generally late to initiate their first ANC visit. This causes pregnancy-related problems to remain undetected and initiating of preventive measures and provision of health education to be delayed.

It serves both my personal and professional interest to explore the need for and the perspectives of Myanmar migrant women on the accessibility of ANC services, and to seek opportunities on how accessibility of ANC services can be improved. When I will be able to find answers to these questions, they might have the potential to provide insight in how accessibility of ANC services for pregnant women can be improved in general and for MTC specifically, with greater health benefits for mother and child as a consequence.

1. Background Information

Thailand is known as the prime destination for migrants in the greater-Mekong sub-region. In total an estimated 4 million migrants are living in Thailand, with the total population in Thailand being 68 million people. About 80% of the migrant population in Thailand is of Myanmar origin, and less than 50% of the total migrant population are officially documented migrants (IOM factsheet 2015).

Thailand has experienced rapid economic growth and accomplished universal health coverage, leading to a rising life expectancy and reduced mortality ratios (Tangcharoensathien et al, 2018). Its neighbouring country Myanmar has been troubled by ongoing civil conflict. Even though healthcare spending is rising with the percentage of government spending on healthcare increasing from 1.14% to 3.65% between 2011-12 and 2015-16 (MOHS, 2016); the Myanmar Ministry of Health and Sports (MOHS) is said to be spending these funds inefficiently, by disproportionally investing in advanced-level care facilities instead of primary care (APOHSP, 2015). Additionally, it has not prioritised expenses on primary healthcare services in rural and ethnic areas (MOHS, 2016). Nationwide statistics indicate that the disparities in mortality ratios between Myanmar and Thailand are significant (World Bank, 2015; World Bank, 2017). Table 1 compares the available mortality rates for Thailand, Myanmar and Eastern Myanmar, and shows that the gap between Eastern Myanmar (bordering Thailand) and Thailand is even more evident, with the Infant Mortality Rate and Under 5 Mortality Rate being 8.5 times and 11 times higher, respectively (MDHS 2017; HISWG, 2015).

	Thailand	**Myanmar (2015-2016)**	**Eastern Myanmar (2013)**
Crude Mortality Rate (CMR) per 1,000 population	7.6	8.5	9.2
Infant Mortality Rate (IMR) per 1,000 live births	11	40	94.2
Under 5 Mortality Rate (U5MR) per 1,000 live births	13	50 (42 urban area; 80 rural area)	141.9

Table 1: Comparison of key mortality statistics

Additionally, the World Health Organization's (WHO) recommended threshold of 230 health workers per 100,000 population is not reached in Myanmar; with the number of doctors, nurses and midwives, and dental surgeons per 100,000 population being 61, 100, and 7, respectively. Even though the absolute number of health workforce is increasing, the spread of skilful health workers between urban and rural areas is uneven (Nyi Nyi Lat et al, 2016).

Furthermore, the situation on the Thai-Myanmar border is characterised by the protracted conflict between the central Myanmar military and ethnic minorities in Eastern Myanmar, which has caused displacement of hundreds of thousands of people, who either fled to Western Thailand or became Internally Displaced People (IDPs). The Thai side of the Thai-Myanmar border houses 9 recognised refugee camps, where 96,802 Myanmar refugees are living (TBC 2019, see Figure 1). Additionally an estimated 200,000-300,000 Myanmar migrants are living outside the camps in Tak province alone - the location of this research. The Myanmar migrant population outside the camps consists mainly of ethnic Burman and Karen, and they speak Burmese and multiple Karen dialects (White 2016). The refugees live in established refugee camps with access to food, shelter, education and healthcare provided by community-based and non-governmental organisations. The Myanmar migrants outside the camps typically live in rural villages along the border and search for work in agriculture and the manufacturing industry (Felmeth 2018). Officially registered and documented Myanmar migrants have access to Thai public services, although undocumented migrants lack most basic human rights including access to healthcare (Kusakabe 2010). Since a substantial share of migrants from ethnic minority groups do not hold any type of legal identification documents, they are technically stateless people and particularly vulnerable.

This research focuses on Tak Province, Thailand, which is bordering Myanmar and holds a large proportion of the Myanmar migrants in Thailand. Tak Province has one of few official border crossings between Thailand and Myanmar, between the towns of Mae Sot and Myawaddy.

Figure 1: Thailand - Myanmar border area

2. Problem Statement and Justification

One of the key goals of the World Health Organisation (WHO) is for all pregnant women and new-born babies to receive quality care during pregnancy, childbirth and the postnatal period. Antenatal care (ANC) plays an important role within reproductive healthcare, and can provide health promotion, screening and diagnosis, and disease prevention (WHO 2016). It is complicated to prove that ANC can reduce maternal mortality, but it is widely accepted that ANC provides the opportunity to identify pregnancy risks and to monitor and support the general health status of pregnant women (Finlayson 2013). These opportunities provided by regular ANC visits during pregnancy are specifically of importance in areas where pregnant women are in risk of pathologies such as anaemia, malnutrition and diseases such as HIV and AIDS, tuberculosis and malaria that can lead to maternal mortality and morbidity (Finlayson 2015). Worldwide only 64% of pregnant women attended the WHO-recommend minimum of 4 visits of ANC services in the period 2007-2014, with huge disparities between countries and between specific regions within countries (WHO 2016).

Migrants have an increased health risk and are reported to have reduced access to healthcare compared to native populations (Almeida 2014). Migrants are prone to delayed access to healthcare, and often present conditions in an advanced and difficult-to-control stadium (Hayes 2011). Furthermore, undocumented migrants have an increased risk for delayed access to ANC of 11 times, compared to local women (Wolf 2018). Accessing Maternal and Child Health (MCH) services along the Thai-Myanmar border remains difficult, in particular for marginalised and ethnic communities. Cultural, legal and political factors are explanations for the poorer reproductive health indicators compared to the native Thai population (Wichiadit 2011). Migrants from Myanmar in the Mae Sot-Myawaddy border area reported money, transportation, the (lack of) quality of services and fear to expose their illegal status as barriers to access reproductive health services (Sharma 2012). In particular women who come from poor and marginalised groups continue to have a low uptake of ANC services. Research under migrant women in Portugal identified hidden barriers for freely accessible ANC services, such as: awareness of services available, unsatisfactory earlier service visits and different expectations from ANC services. This indicates that more issues are contributing to accessibility of services for migrant women than availability and affordability only (Almeida 2014). In research by Assawapalanggool (2016) in the Thai-Myanmar border area it is acknowledged that in addition to improving the access to prenatal services, the knowledge of pregnant women on ANC and nutritional status should be improved in order to gain better health outcomes. Research by Sharma (2012) reports that migrant women on the Thai-Myanmar border prefer to rely on reproductive services provided by traditional birth attendants (TBAs), and that medical services are seen as needed only for emergency situations.

Antenatal care services are made available by different providers in the Mae Sot-Myawaddy border area. On the Mae Sot side of the border (Thailand) public health services are provided by the Thai Ministry of Public Health in hospitals and health posts, freely accessible for documented migrants with compulsory health insurance of a US$ 85 annual fee. Different NGOs and CBOs are providing ANC services that are freely accessible for all women, regardless of their legal status. Shoklo Malaria Research Unit (SMRU) is a research institute that is

providing free obstetric and medical care services to the local Myanmar population in the Mae Sot area since 1986 (Rijken 2012). Mae Tao Clinic (MTC) is a CBO running a primary healthcare clinic for migrants and displaced people from Myanmar in Mae Sot, and all services are provided free of charge. MTC is providing ANC services since 1995, and has become one of the major providers of reproductive health services in the area (MTC 2018). On the Myawaddy, Myanmar side of the border migrants can access health services at public hospitals, private clinics and non-government services. The main issue in accessing these services are the related costs and lack of services, causing migrants to frequently cross the border to the Mae Sot area to access affordable health services (IOM 2015).

Although the WHO changed its recommendation from four to at least eight perinatal contacts in 2016 (WHO 2016), primary healthcare providers in the research area still maintain the threshold of four visits – which already shows to be challenging. Between 2007 and 2018, 33,176 women delivered in the reproductive health ward at MTC (MTC 2018). A mere 6.9% of them (2,285 women) reached the locally recommended amount and timeliness of 4 ANC visits before labour, which is significantly lower than the 64% of women attending at least 4 ANC visits worldwide (WHO 2016). The average number of ANC consultations that women attended before delivery at MTC is 2.7 per pregnancy (see Table 2); while 10% of women admitted for delivery never attended ANC at an institution (MTC, unpublished data).

Pregnancy trimester	Locally recommended 4 visits	Average actual visit (MTC 2018)
First trimester	1	0.16
Second trimester	1	0.94
Third trimester	2	1.63
Total	**4**	**2.73**

Table 2: Recommended ANC visits versus actual visits at Mae Tao Clinic, 2007-2018

These figures show that Myanmar migrant women in the Mae Sot area do not access ANC services in a timely and frequent manner. This research is highly relevant for our beneficiaries, as it aims to find out why these Myanmar migrant women do not access ANC services as recommended, resulting in them enrolling in ANC later in pregnancy, infrequently or not at all. We aim to understand which changes, adaptations or additions to the current provision of ANC can be suggested to improve the access to ANC services in the Mae Sot-Myawaddy border area.

As highlighted by Finlayson (Finlayson 2015):

"Successful implementation of global antenatal strategies to reduce maternal deaths need to incorporate contextual and cultural nuances and this can only be achieved if the voices of women are heard."

3. Objectives

The main objective of this research is to explore the need of Myanmar migrant women to access ANC services in the Mae Sot-Myawaddy border area, in order to find out how accessibility of ANC services can be improved. This main objective breaks down in three specific research objectives:

1. Explore why Myanmar migrant women do or do not access ANC services as recommended.
2. Explore the perception of Myanmar migrant women on factors influencing the accessibility of ANC services during their pregnancy.
3. Investigate possible approaches that could improve accessibility of ANC services under Myanmar migrant women.

4. Methodology

4.1. Literature Review

Before collecting qualitative data to answer the research objectives, a literature review was conducted to lay out the theoretical foundations and framework of this study. Relevant articles and publications were searched using Scopus and Medline electronic databases and Google Scholar. The following search terms were used: pregnancy, Myanmar-Thai border, access, antenatal care, prenatal care and healthcare. Citations in selected articles were searched for if deemed of interest for further investigation, a method also known as snowballing. In addition, websites of government institutions and international agencies were searched for relevant information.

4.2. Analytical Framework

In terms of accessibility of services, the model described by Levesque et al (2013) was found to fit best with the research problem, as it encompasses the different types of barriers that women may experience when seeking healthcare services. In Levesque et al's model (2013) accessibility of health services has been divided into five dimensions; 1) Approachability; 2) Acceptability; 3) Availability and accommodation; 4) Affordability and 5) Appropriateness. Five corresponding abilities of the population are identified that correlate to the five dimensions of accessibility; 1) Ability to perceive; 2) Ability to seek; 3) Ability to reach; 4) Ability to pay; and 5) Ability to engage. In the model, access to care is generated by the interaction of the five dimensions of accessibility with the abilities of the population (See fig. 2).

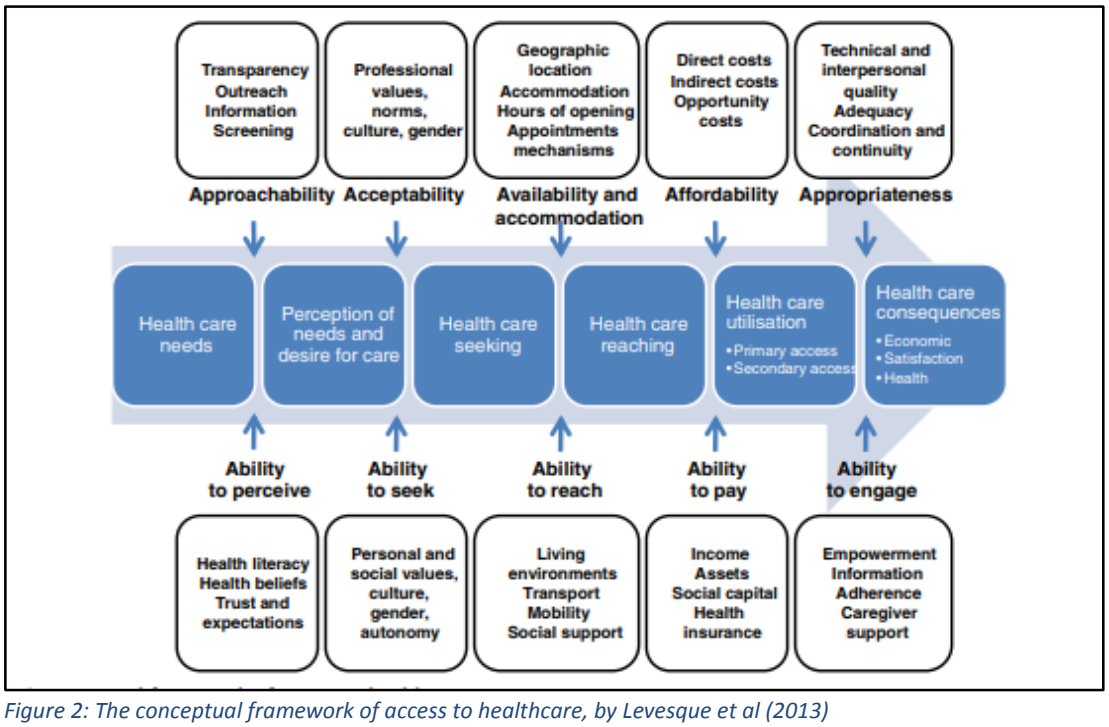

Figure 2: The conceptual framework of access to healthcare, by Levesque et al (2013)

The model of Levesque et al (2013) is selected as leading analytical framework for this research. It is the most inclusive model for researching and analysing access to healthcare, taking into account both providers' and recipients' sides. The model uses a clear structure of five main dimensions that encompass all important elements that affect accessibility to

healthcare services. Including the perspectives and experience of more than one group of stakeholders (i.e. healthcare providers and healthcare recipients), may deepen the understanding of accessibility of ANC services in our target area. Furthermore, the framework fits with the local context of Myanmar migrant women on the Thai-Myanmar border and migrants' barriers to accessing healthcare, such as long distance to facilities, not having an ID card, language difficulties, negative attitude of service providers, high costs, inflexible working hours and employer restricting their movement (Chamchan and Apipornchaisakul, 2012; Sharma, 2016).

4.3. Research Design

This research's aim is to explore the perspectives of Myanmar migrant women on ANC services in order to better understand their views and their reasons to access these services or refrain from accessing these services. The research is based on qualitative data collection, as this is the recommended method for exploring and understanding the perception of individuals or groups about specific problems (Cresswel 2014). Downe et al (2016) concluded that qualitative research is the ideal method for exploring the values and beliefs regarding ANC and to answer questions related to the acceptability of ANC.

The study was conducted with the help of two different tools: Focus group discussions (FGDs) were used to generate information via the interaction within a group (Kitzinger 1995). FGDs have been used as data collection method under Myanmar migrant women in the Mae Sot area before, and have showed to be able to generate valuable data (Rijken 2012). In this study, FGDs were carried out to explore migrant women's perceptions on ANC and the accessibility of ANC in the Mae Sot - Myawaddy area, using the five dimensions of Levesque et al (2013) as guiding principles. Furthermore, migrant women were asked how accessibility to ANC services could be improved. Individual in-depth interviews (IDIs) can be used to research a participant's perception of events and the experiences related to healthcare, such as ANC (DiCicco-Bloom 2006). In this study, IDIs were held to explore the perceptions on accessibility of ANC care for migrant women from health workers working in reproductive healthcare with the target group. These health workers are midwives with long-term experience in MTC's reproductive health department. The interviews have been used as triangulation of the information gathered in the FGDs and help to investigate possible approaches to increase access to ANC for migrant women.

4.4. Data Collection

The first target group of this research were Myanmar migrant women who recently delivered their babies at Mae Tao Clinic. Only women above 18 years old without birth complications were asked to participate. Potential participants for the FGDs were approached, either while being admitted postpartum, or when coming for postpartum check-up. Potential risks of participation in this study such as discomfort for women exposing their socioeconomic background and behaviour were overcome by guaranteeing anonymity and including research assistants of similar communities and backgrounds. Women agreeing on participation were explained about the study's purpose and assured they could leave the FGD at any time without consequence. All participants signed a consent form before starting the FGDs (see Annex III). The FGD topics were derived from the five dimensions of accessibility as

described by Levesque et al (2013): approachability, acceptability, availability, affordability and appropriateness (see Annex IV). After the initial four FGDs, additional FGDs were carried out until data saturation was realised.

In total, six FGDs were conducted, each group containing between 4-6 women. One woman left the discussion before it was completed; making the total number of respondents 30. The sample was diverse in terms of age (21-45 years old), ethnicity (Burmese, Karen, Rakhine, Muslim), place of residence (equally distributed between Thailand and Myanmar), number of pregnancies (1-9), number of live births (1-7) and number of ANC consultations (0 - >4 consultations). Each FGD's duration was between 30 and 60 minutes. The discussions were led by the research assistant and conducted in Burmese language, with live translation to English for the main researcher by a second assistant. All FGDs were recorded and notes were taken in both Burmese and English, which were later complemented with information from the transcribed discussion records.

The second target group of this research were health workers employed at Mae Tao Clinic. Two IDIs were conducted, one respondent is the leading midwife at reproductive health department, while the other is a midwife who is now part of the clinic's management team. The topic list is based on Levesque et al's model (2013), complemented by outcomes of the FGDs (see Annex III). Staff were asked for their insights, data verification and additional information needed to answer the research objectives.

The data from the FGDs and IDIs was hand-coded after transcription and analysed simultaneously. During data analysis themes emerged from the rich data, and was grouped accordingly. After which the themes were placed under their corresponding dimensions and abilities following Levesque et al's (2013) framework.

4.5. Methodology Limitations

The chosen research approach implies some aspects that may limit the quality and outcome of this study. Firstly, restrictions in time were the cause of not visiting pregnant migrant women in their communities, to gather their view on accessing ANC services. Through interviewing women postpartum, some women who did not attend any ANC service before delivery were included in this study, and could express their view. Secondly, the perspectives of other community members such as husbands, relatives, TBAs and community leaders, were not researched even though they may influence women's accessibility to healthcare. However, triangulation of the FGD data is, to some extent, achieved via interviewing health workers.

The relation of the research team to the FGD participants and IDI interviewees was another limitation. The researcher, assistants and translator were all MTC staff, so power relations may have been present. In an attempt to minimise this influence, we made sure that the staff involved in the research did not have health provider-patient relationship with the participants. The research team consisted of non-clinical MTC staff. Furthermore, the FGDs and IDIs were carried out in the training complex and not inside the clinical department itself in order to create a physical separation between clinical services and the research performed. All respondents were clearly informed that their refusal to participate would hold no consequences, and those participating were asked to sign a consent form. Finally, a language barrier exists between the lead researcher and respondents in the FGDs. Through the use of

a local research assistant and translator, the lead researcher could be included in the discussions, although some details of the discussion may have been lost in the translation process.

Since the research objectives were well-adjusted to the available time and resources, and FGDs were held until data saturation was met, sufficient information was collected to adequately answer the research objectives. Limitations of the research outcomes will be elaborated in more detail in the section Study Results and Discussion.

5. Study Results and Discussion

In the following chapter the study results will be reviewed in five different sections, based on the theoretical framework by Levesque et al (2013) that was selected and discussed in the previous chapter. Each section will include a discussion in which relevant results will be elaborated on accordingly. Where observed, relations and overlap between different sections of Levesque et al's (2013) framework are described. The results discussed in this chapter are obtained from the six FGDs held with a total of 30 respondents and two IDIs held with health workers.

5.1. Approachability and Ability to perceive

In Levesque et al's conceptual framework (2013), the dimension of approachability entails the visibility of existing health services, including awareness of the available services, the provision of information about available services to the community and the transparency of this information. The ability to perceive encompasses the perspectives of the communities' need for healthcare services and is influenced by factors such as knowledge and beliefs related to health and health literacy of its people.

In the different FGDs and IDIs, the topics belonging to the first dimension and the corresponding approachability and ability to perceive, raised a broad spectrum of ideas and perspectives. During data analysis, two major themes emerged. First, the perceived need for information regarding the available ANC-related services, and second the perception of the benefits of and need for ANC-related services.

5.1.1. Perceived need for information

In all FGDs women stated that information about available services related to ANC in their communities is depending on different factors and coming from different sources. Sources for providing this information identified by the respondents are manifold and can be categorised into different groups. Firstly, few women stated that information can be obtained by self-study and reading information that is available in textbooks or other sources. Secondly, women obtain information from their partners, relatives and community members. Relatives and community members who can provide such information are those with personal experience with ANC services or people who have gained healthcare knowledge prior. Thirdly, information about ANC services is disseminated by reproductive health service providers. Several of such service providers have been identified, from government origin as well as from NGOs/CBOs and faith-based organisations. In some areas there are village nurses or MCH centres providing information. In several FGDs, women reported that NGOs/CBOs or faith-based organisations come to their communities informing about the need to attend ANC services. One woman reported that occasionally a Thai nurse would come to her community to explain about ANC services. One woman reported she was sent to attend ANC at the clinic by the TBA.

> FGD 1 participant: *"We don't know everything about pregnancy and the child, so we want to go to the clinic to get information about the pregnancy, doctor and nurse know well"*

Although part of the women indicated that information about available services and how to access them is generally available, a similar amount of women reported that there is too little

access to information on or knowledge about ANC services among women in their community. In all six FGDs, participants stated women do not know that they should go to ANC for a minimum of four times during their pregnancy, or why this would be beneficial to them. When asked for the reasons for this knowledge gap between different women, lack of knowledge about and experience with reproductive health services were the common answers given. The IDIs with health workers confirmed the perception that pregnant women delay seeking care due to low health knowledge. The health workers believe that investing in Myanmar migrant women's health knowledge, especially about signs and symptoms of pregnancy in the first trimester, can potentially change their perception of need and lead to better access to ANC services. Health workers suggest that options via television, internet or social media (especially Facebook) could work well, now that many Myanmar migrant workers have access to smartphones. Even though providing health education via traditional methods such as outreach and pamphlets is possible and have been used previously. The health workers made a note that in the past, MTC ran a health education programme. In this programme, a health education team provided education on reproductive health, ANC, and other health-related topics in migrant communities and at factories with many female Myanmar migrant workers. However, after funding for this programme was lost, MTC was not longer able to sustain the costs.

An issue identified by the health workers but not mentioned in the FGDs, is the mobility of the migrant workers, which places them in a new social environment frequently. In new environments they cannot easily tap into their social network for information. It can be difficult for them to know where reliable and quality services are provided.

5.1.2. Perception of benefits of and need for ANC services

The majority of the women stated that there is a need for women to enrol in ANC during pregnancy, with a minority of them reporting ANC as not beneficial during pregnancy. When asked what would be the best moment to start ANC at a clinic or hospital, respondents gave a range from two months to six months for the initial ANC visit, with most women suggesting the period from three to four months as the preferred period to seek care. Health workers attribute this perception to lack of women's reproductive health knowledge. Furthermore, several respondents were able to identify factors that could influence women to seek ANC services early in pregnancy. These factors included feeling sick and nauseous in early pregnancy, having their first pregnancy, and because of worrying about the health of mother and child in pregnancy.

When the topic was raised which benefits of ANC services women perceive, the participants reflected on different factors. The most prominent benefit stated among all FGDs was the health of baby and mother, and to be able to gain more knowledge about the health of the baby. Further points raised were to reduce complications during pregnancy by gaining access to vaccinations; and reducing complications during pregnancy observed in women who do not attend ANC services such as low birth weight. Being able to engage with a healthcare worker and learn more about ANC services and follow-up schedules were mentioned as well. On the other hand, a minority of the women provided statements that did not display a need to attend ANC services regularly. From their perspective, attending ANC services more than once could be perceived as a waste of time. Another reason indicated by this group is there is no perceived need among women for ANC services because pregnancy is easy and delivery can take place at home.

5.1.3. Discussion: approachability and ability to perceive

The data related to the first dimension was grouped under two themes, being the perceived need for information on available ANC services, and the perception of the benefits of and need for ANC related services. These two themes together are displaying the view of women and health workers on the approachability and ability to perceive as introduced by Levesque et al (2013) and help us further analysing the results.

Women express that information on pregnancy and available services is a key component needed to make ANC services approachable for migrant women. Although part of the women say this information is made available by different sources, others tell that women frequently lack this knowledge leading to under-utilisation of services. Reasons for the differences in available information among women could be explained by multiple factors such as literacy level, language barriers and others but were not assessed in this research. The data from the IDIs with the health workers show that they agree with women's observation that lack of knowledge is leading to reduced approachability of ANC services. Almeida's (2014) research highlighted similar observations under migrant women in general, with lack of awareness of services being an issue towards approachable ANC services. Knowledge of pregnant women on ANC services was identified by Assawapalanggool (2016) as a factor needing to be improved to reach better health outcomes.

Most women in the FGDs express a need for pregnant women to attend ANC services, but overall the importance of starting ANC in the first trimester is not clear to them. Lack of knowledge of starting ANC in the first trimester has not been described as a barrier in any of the literature found during this study's literature review. However, both Hayes (2011) and Wolff (2018) describe that migrants in general are prone to delayed access to ANC. Gained benefits of attending ANC named are increased health for mother and child and prevention of complications. Though views of ANC as a waste of time and not needed are also expressed by several women. Overall, the results found under the first dimension are in agreement with the ones mentioned in Levesque et al's (2013) framework, and the data did not present issues that cannot be covered within this framework. A need for increased health education and provision of information about available services for Myanmar migrant is prominent. Health education teams going out to communities could be a solution and were used in the past. With available funding, starting similar campaigns could help tackling the knowledge gap. Usages of traditional methods as pamphlets, posters and group health education have been used, and are still used, but the impact has not been proven profound when we look at low utilisation numbers of ANC services under migrant women today. Relatively new communication methods such as television, internet or social media could be taken under consideration as methods to reach beneficiaries more effectively.

5.2. Acceptability and Ability to seek

The dimension of acceptability in the conceptual framework of Levesque et al (2013) enlightens social and cultural factors that influence the acceptance of services available, and the perceived appropriateness to seek care, for example based on gender, cultural groups and beliefs. The related ability to seek care directs to personal autonomy, one's capacity to

seek care when desired and the basic rights to do so in the embedded cultural and social environment.

During analysis of the gathered data, three major themes emerged that are connected to the dimension of acceptability and the ability to seek: social cultural environment, occupational context and legal issues.

5.2.1. Socio-cultural environment

During the FGDs, multiple times Myanmar migrant women made statements that ANC services should be in line with cultural practices. Most women agreed that in general, ANC services available match cultural expectations, although rude or impolite behaviour by healthcare providers is not culturally acceptable but takes place occasionally anyway. The interviewed health workers acknowledged that communication style and behaviour of healthcare workers towards patients is an important factor contributing to acceptability of services. Health education in certain instances is inappropriate in the cultural or religious context according to the respondents. One subject mentioned for example, is family planning information to recently married couples with few children. However, according to the respondents, since this education serves the higher purpose of increasing the health of mother and child, it does not influence the acceptability of these services or the ability to seek.

The partner, family and relatives play an important role in the perceived acceptability of health services and the ability to seek care. The husband is identified as having either a possible negative or positive impact on the ability to seek care. It was reported that women cannot attend services at ANC clinic if they are not sent or allowed by their husband to attend. Additionally, the absence of the husband at home due to work can limit women's ability to leave home to visit the clinic, especially if there are other children in the household that need to be taken care of. Finally, alcohol addiction of the husband can be a constricting factor for the women to attend ANC services due to the unstable household situation an addiction can create. Although other substance addictions are known of in the community, they were not mentioned by the women in this instance.

5.2.2. Occupational context

The second major theme that arose from the data were occupation-related factors enabling or preventing women to reach ANC services. Employers (called 'owner' locally) were identified as having the possibility of sending or bringing women to health services if in need. Though more commonly, the employer is identified both in the FGDs and in the IDIs as a preventing factor in women's ability to seek health services. Employers are restricting women to take leave to attend ANC services, and women feel that there is not enough time allowing them to attend services regularly. Although women know they should attend ANC regularly, they are in fear of losing their job if they are absent too often. According to the respondents, a complicating factor in the occupational environment, is that the local labour market has more job opportunities for women than for men. It is important for women to

> FGD 3 participant: *"Sometimes we can't go to our clinic because of our jobs. In this area there are many jobs for women, but less for men. So women need to work to earn money."*

hold on to their jobs because the family is often depending on their income. This leads to an even higher urgency for women to secure their employment status, withholding them from the possibility to seek services. The health workers interviewed confirm the occupational situation drafted by the women, and state that they do not see a simple solution because of the power imbalance between employee and employer and the dependency of the women on their jobs.

5.2.3. Legal issues

Two main factors regarding legal issues that Myanmar migrant women face in the Thai-Myanmar border area arose from the data. When women attend ANC services and deliver in a hospital or clinic, a main advantage to them is the increased likeliness of obtaining a legal birth certificate for their child. The benefit of a legal birth certificate for their child is the permitted access to education and healthcare in the country of birth. The majority of the Myanmar migrant women lack a legal status themselves, and have vast experience with the issues corresponding with being undocumented. The possibility of obtaining legal documents (i.e. Thai birth registration) for their children is increasing the acceptability of the ANC service providers. At the same time, lacking legal documents and not having a legal status is inhibiting women's ability to reach ANC services. The health workers in the IDIs state that legal issues concerning the undocumented status of women is one of the key preventing factors for women seeking health services. The fear of getting caught and arrested by the police while traveling to an ANC service provider is significant and prevents women to seek ANC services. An additional barrier for seeking care is the border between Myanmar and Thailand. When the border needs to be crossed in either direction on the women's way to reach ANC services, lack of legal documents is causing distress due to fear of being caught, which decreases the ability to seek ANC services.

5.2.4. Discussion: acceptability and ability to seek

The data obtained gave rise to three themes judged to relate to the second dimension in Levesque et al's (2013) framework: social-cultural environment, occupational context and legal issues. These themes have been used to guide the analysis of the results.

Social-cultural issues mentioned by the Myanmar migrant women in the FGDs that can influence acceptability of services are the behaviour and attitude of healthcare professionals. The ability to reach is under the influence of women's social network, most importantly the husband, who is identified as a potential enabling factor as well as preventing factor in reaching services. Health workers in the IDIs acknowledged the importance of the behaviour and attitude of health workers towards acceptability of services. Cultural factors were found to be important influencing factors among marginalised groups in research by Wichiadit (2011) in the Thai-Myanmar border area as well. Although the perspective of the husband has not been part of this research, education aimed at them could have positive impact based in the data gathered in this research, and would be topic worth investigating in further research.

In Levesque et al's (2013) framework, occupational flexibility is placed under the ability to reach services, however in the local situation it is found more applicable to be placed under the ability to seek. In the local context, the power of employers over their employees is high, expressed by the local name of 'owner' as well. This power relation not only interferes with

the ability to reach, but reaches deeper on a personal level because it interferes with women's autonomy, and therefore with their ability to seek. The restrictive power of employer over employee is also mentioned as a barrier to access healthcare services by Chamchan and Apipornschaisakul (2012). Data obtained from the health workers confirm this exceptional power balance in the local situation, and when asked for solutions to change this work situation they see no possibilities.

Legal issues are not discussed separately in Levesque et al's (2013) framework. In this research they are found to be influencing women's autonomy and ability to seek. Though, they could arguably have been discussed under living environment, mobility and ability to reach as well. Legal issues can improve acceptability of services because accessing services at a clinic/hospital can increase the likelihood of obtaining a birth certificate and accompanying legal status for their children. The FGDs show that especially the undocumented status of women has a negative impact on their ability to seek services, due to a fear of getting caught by the police. Data from IDIs confirmed the undocumented status of women as a major factor preventing women seeking services. The fear of getting caught does not seem to influence the perception on the need for ANC, but directly undermines the ability to seek services. In two other studies discussed earlier, being undocumented was also found to be a major confounder in accessing health services (Sharma 2016; Wolf 2018). One of the objectives of this research is to search for possible approaches that lead to increased attendance of ANC services under Myanmar migrant women. While changes in the legal status of women would definitely foster their ability to seek, this research is not judged to have the impact to suggest changes on this level.

5.3. Availability, Accommodation and Ability to reach

Availability, accommodation and the ability to reach health services physically as well as in time are the key concepts of the third dimension in Levesque et al's (2013) framework. The availability of health services are depending on a set of different factors including the characteristics of facilities, the urban spread, the transport system and availability of qualified health personnel at facilities. The ability to reach is influenced by one's personal mobility, the local transportation available and the occupational flexibility.

Analysis of the data lead to emergence of two themes with relationship to the third dimension that will be discussed separately: the availability of ANC services and transportation.

5.3.1. Availability of ANC services

In migrant communities along the border different (in)formal health services are available, including village nurses and TBAs providing birth services. Some women still prefer to attend a TBA at community level, as explained by a woman who delivered all of her six children, including the most recent one, with help of a TBA at home in her village. Though according to most respondents, the majority of women in their environment nowadays prefer to attend ANC services at a clinic or hospital if they are available and within their reach. Thai government's village health posts provide outpatient ANC services including ultrasound and laboratory free of charge to all women regardless of their legal status. And although services are provided in Thai language, translators are regularly available. However, if women cannot reach these services they have to turn to services provided in the community by TBAs.

Furthermore, women state that in certain areas on the Myanmar side of the border, government-supported village nurses have become available who can provide ANC services which they can attend. In most FGDs and in the IDIs, consensus about how opening hours affects women's perception on ANC services was not reached. Some stated that daytime opening hours for ANC services are most suitable since traveling at night time is not preferable and in case of emergency they could go to the hospital. Another share of the women prefers extended opening hours, for example because traveling can take a long time and extended opening hours could increase the ability to reach ANC services. Health workers added that migrant women normally are daily labourers in factories or in agriculture, meaning that taking a day off means one day without income. In the past, MTC used to provide ANC services during outreach in communities that had no services near them. They also believe that these kind of outreach activities could increase the availability of services, and reduce experienced problems such as narrow opening times and long travel distances.

> FGD 5 participant: *"If you are very far from clinic and don't know how to get to the clinic, for those people it would be good if they could be visited by a healthcare provider. Otherwise they can only go to TBA."*

5.3.2. Transportation

Issues concerning transportation are one of the topics most commented on in relation to the accessibility of ANC services among Myanmar migrant women. The ability to reach health services can be hindered profoundly by the available transport, the distance to the health services and the costs associated with transportation. Several women in every FGD stated that if the distance to the health services provider is far, this is a serious limiting factor. Besides the fact that transportation is time-consuming, women fear that being on the road longer will increase the chance of them getting caught by the police. Because women live far from an ANC service provider, they start ANC late in pregnancy, and they can only attend once or twice per pregnancy. Costs related with travelling are a complicating factor: shared cars are cheaper but unreliable, while a private motorbike taxi is quick but too expensive for many women. Respondents in both FGDs and IDIs explain that taxi drivers tend to overcharge Myanmar migrant women because women are unfamiliar with the payment system, forcing them to pay more than the transportation fares should actually be, further reducing the opportunity to travel frequently. Additionally, health workers state that travel becomes more expensive on longer distances for Myanmar migrant women in Thailand because besides transportation fees, additional costs need to be paid to bribe officials at police checkpoints if travel documents are incorrect. Furthermore, when women live in more remote places, transportation can be complicated by the state of the road. As mentioned by one participant, the road in the jungle is bad, leading to long transportation times. During the FGDs, it became clear that Myanmar migrant women frequently request for help from outside with transportation and associated costs. In some communities, a faith-based organisation arranges transport to clinics twice per week. The participants mentioned that if a similar organisation or another NGO/CBO could help with transportation, this could significantly improve Myanmar migrant women's ability to reach ANC services. Another request that was made several times is that if help with transportation is impossible, ANC outreach activities

to hard-to-reach communities would give a part of the Myanmar migrant women the only option to reach ANC services, otherwise these women can only go to a TBA.

5.3.3. Discussion: availability, accommodation and the ability to reach

Data from the FGDs and IDIs linked to the third dimension of availability, accommodation and the ability to reach as described by Levesque et al (2013), led to the emergence of two themes: the availability of ANC services and transportation.

Women in the FGDs state that a range of available ANC providers are present, which corresponds with Rijken's study on the Thai-Myanmar border (Rijken 2012). The majority of women indicated that most women nowadays prefers to attend ANC services at a clinic or hospital. However, if they cannot reach these facilities, they will instead turn to community-provided services, for example by a TBA. Some women on the other hand do not express a need for ANC at a clinic or hospital and favour community services. The preference for opening hours is depending on multiple factors, including occupational flexibility as mentioned by Levesque et al (2013), and varies widely. The health workers too, identified several available services, and mentioned the availability of Thai village health posts that provide free ANC services that women could attend. These village health posts are probably the same facilities as mentioned in the FGDs using the terms 'village nurse'' or 'MCH centre'. Related to opening times, the health workers expressed the same concerns as the women in the FGDs. Both health workers shared their view that outreach with ANC activities could overcome the issues related to opening times and the distance to facilities by bringing these services closer to women in remote areas.

The second theme, transportation, is another major topic for the respondents. Many women indicated that the distance to ANC services is directly influencing the moment women can initiate attendance and subsequent frequency of visits. Important factors are available transport, the distance to a health facility and the costs associated with transportation. In the IDIs, the health workers have mentioned transportation, and especially far distances and increased cost by transporters and officials, as the most important factors. In research by Sharma (2016), transportation was found to be a major factor affecting accessibility of services among migrant in the border area as well. The migrant women themselves came with a possible solution for the transportation issues, and requested help with transportation as provided in some areas by faith-based organisations. The possibility of arranging transportation for women from hard-to-reach areas to attend services could be a solution that deserves extra attention. Organisations such as MTC could look into setting up a transportation system, and potential donors could be interested of helping underserved women access services if presented well.

Neither of the themes include data that could not be incorporated under the dimension and ability as presented by Levesque et al (2013). The topic of appointment mechanisms that is part of the third dimension was not mentioned at all in the data gathered. This is probably due to the fact that most service providers work on a first-come, first-served basis without appointments, and that this system is generally accepted by the participants.

5.4. Affordability and Ability to pay

The dimension of affordability in Levesque et al's (2013) model focuses on the economic capacity individuals and families have to spend resources such as money and/or time to use appropriate services. The focus is not only on direct services costs, but includes associated costs and the possible loss of income as well. The ability to pay can be enhanced by generating economic resources through income, savings and loans. Poverty, social isolation and indebtedness are preventing people's ability to pay for health services.

During the data analysing process two different themes arose from the data, the first being the direct and indirect costs related to health services and the second the quality of services and health-seeking behaviour.

5.4.1. Direct and indirect costs

In one FGD the point was raised that ANC is important for the health of the mother and baby and that therefore the cost should not be a restriction. In general, the costs related to accessing ANC services were identified as another enabling or inhibiting key factor. Many similar statements were made, indicating that the total costs of services and not having enough money were key reasons for not being able to visit ANC frequently or at all. Although it was reported that free of charge ANC services are available and within reach in different areas, related costs, for example for transportation and food, can still reduce women's ability to pay. Participants explained that during their first ANC visit, women are told to start saving money for the follow-up visits and delivery. Myanmar migrant women acknowledge the need to save money, though external factors such as unexpected family problems have the potential to ruin savings made and reduce the ability to pay. Women specifically stated that it is of utmost importance that free of charge ANC remains available in the coming years in order to keep ANC services affordable to them.

In addition, the health workers in the IDIs explain that visiting Thai village health posts can reduce costs, since the services are free of charge and transportation costs might be lower because travel distances are shorter. A limiting factor is that these health posts do not provide delivery services, hence at time of delivery the women need to seek care elsewhere. The health workers stressed the fact that during the transfer between service providers, it is important for the continuity and quality of care to share documentation about the pregnancy between service providers.

5.4.2. Quality of services and health-seeking behaviour

ANC services related costs and the ability to pay are influencing the care-seeking behaviour of pregnant women. To illustrate, respondents said that care could only be sought at the end of the month, when the ability to pay is temporarily sufficient due to their received pay check. Furthermore, women explained that when money is available, ANC visits can be started at the second or third month of pregnancy, while without money initiation of visits has to be postponed to a later moment in pregnancy.

Women further noticed that the ability to pay is influencing the quality of care that is available. According to their statements, especially when ANC services are sought on the Myanmar side of the border, healthcare providers will not take good care of women when they do not provide them cash incentives. Discrimination takes place based on the amount of money one has, and the quality of services decreases if extra money is not provided. Services that should be provided free of charge by the Myanmar government cannot be obtained

without a supplemental fee, for example when a caesarean section is needed, a payment of at least 300,000 Myanmar Kyat (200 USD) is required.

5.4.3. Discussion: affordability and the ability to pay

The data gathered relating to Levesque et al's (2013) fourth dimension gave rise to two themes: direct and indirect costs and the quality of services and health seeking behaviour.

Women in the different FGDs identify direct and indirect costs of services as a leading factor determining accessibility of ANC services, and many stress that related costs are causing them to underutilise available services. Few women report that though costs are a problem, they should not be of influence on ANC attendance, because of the importance for the health of mother and child. Sharma (2016) reported money needed for accessing health services as a main limiting factor in research among migrant women in the Mae Sot-Myawaddy border area. The health workers confirmed the views about the costs. Complementary, they stated that village health posts are a reliable and affordable option to attend ANC services, and could help reduce ANC-related costs if they would be more approachable and attended. Migrant women further indicated that unexpected events can undermine the ability to pay due to reducing savings made. Overall, the women acknowledged the continuous need for free of charge ANC services in order for them to remain affordable.

Here we can fully appreciate that the different dimensions of Levesque et al's (2013) framework are not free-standing entities but are influencing each other on different levels.

> FGD 6 participant;
> *"The distance to the clinics is far, and sometimes you can't know which way to go. Money for transport is a problem. If we cannot go anywhere we stay at home until we deliver."*

For example, cost are reported most frequently by Myanmar migrant women in the FGDs as limiting factors in access to health services. The ability to reach (e.g. transportation), ability to seek (e.g. legal issues) and ability to perceive (e.g. knowledge on available services) are shown to cause even free ANC services to be underutilised. This highlights that even when service costs are affordable, other remaining factors can prevent access to ANC services. The same causation was found by Almeida (2014) when researching migrant women's access to ANC.

In the FGDs is reported that women's health seeking behaviour is affected by their ability to pay, and can cause delayed or infrequent ANC visits. The ability to pay relates to quality of available care, because women who cannot afford ANC visits, have to remain with the TBA. On the Myanmar side specifically, the ability to make (extra) payments is determining the quality of care. Leading to the perceived need for women from that area to cross the border into Thailand in search of affordable and quality health services, as shown earlier by IOM (2015).

None of the women in the FGDs, nor the health workers, have mentioned health insurance as a factor related to the ability to pay, although having health insurance could influence the ability to pay and is also named in Levesque et al's (2013) model. The fact that health insurance is not spoken of in the research could mean that women may not know about its availability, cannot afford the costs or do not appreciate it much at this moment. A strategy towards making ANC services more accessible could be the promotion of affordable and quality health insurance for migrant women, this approach would need further investigation.

5.5. Appropriateness and Ability to engage

The final dimension of appropriateness in Levesque et al's (2013) model analyses the match between the patients' healthcare needs and the quality of the services received, including the personal and technical qualities of the service provider. The complementing ability to engage in healthcare processes revolves around patients' involvement and participation in decision-making and treatment decisions, which is strongly depending on one's motivation and capacity to participate.

In the course of the data analysis two important themes for the Myanmar migrant women became apparent: perception of the quality of the health services and the personal qualities of service providers.

5.5.1. Perception of the quality of services

The FGD and IDI participants expressed their concerns about the quality of services accessed outside the formal ANC system, compared to the formal system. According to them, services provided by nurses or TBAs at the village level are different from the services in ANC clinics. Quality disparities are due to differences in knowledge, experience, equipment and materials available. At the village level, all examinations are done manually, without ultrasound imaging or laboratory services. In some villages, vaccinations are available, but generally very little health education is provided and there is a lack of materials. A decreasing number of women is nowadays interested in care by the TBA, because TBAs cannot assess the condition of the baby up to women's expectations.

The FGD respondents state that in general, the services available in ANC clinics fit better with their healthcare needs. Important healthcare services preferred by women when attending ANC are getting to know the health status of the mother and child; counselling; learning about do's and don'ts in pregnancy; health education; and availability of materials and vaccinations. A further reason to attend ANC services is the desire to deliver in a clinic or hospital. Attending ANC services is a logical preparation and a chance to learn more about the place where pregnant women plan to deliver. Women in multiple FGDs also expressed they prefer to attend ANC because of the possibility to determine the sex of the foetus, which is unavailable at pregnancy care in the community. In government-operated clinics on both sides of the border, the ability to engage with health workers is sometimes prevented by language barriers and the attitudes of the health workers reducing the appropriateness of these service providers.

5.5.2. Personal qualities of service providers

Myanmar migrant women in the FGDs highlighted multiple desired qualities of service providers, and the health workers in the IDIs were able to express the women's desires independently. Communication is one of the qualities mentioned; shouting, not talking nice to patients and not taking time for their clients are turning them off. Ability of speaking in the same language and making clients feel comfortable are other important personal qualities. Furthermore, empathy, warmth and kindness from health personnel towards clients are preferred personal qualities. Women explained they feel it is important that healthcare staff

> FGD 2 participant: *"During when we are sick we hope clinic and hospital to give warmth, encourage and give good treatment, but in Thai hospitals we cannot find that."*

has sufficient time to attend to them. Staff is sometimes burdened by a high workload, leading to them being hasty and not taking the time to attend to clients properly. Several suggestions were given in different FGDs on how to improve the ability for women to engage. Nurses and midwives can have a wrong attitude and seem not to care much about their clients. The respondents agree that good healthcare staff have time for their clients, are polite and caring; qualities that will increase the ability to engage with them. Participants further stated that more health education about topics unknown to them, explanation about treatment given and vaccinations provided will help improve service quality and the potential to engage.

5.5.3. Discussion: appropriateness and ability to engage

The data linked to the fifth dimension of availability, accommodation and the ability to reach as described by Levesque et al (2013), showed two themes: perception of the quality of the health services and the personal qualities of service providers.

Data obtained from the FGDs indicate that most participants feel that women favour the quality of ANC services provided by a clinic/hospital over the services available on community level. Services that women use to judge the quality of care include knowing the health status of the mother and child; counselling; learning about do's and don'ts in pregnancy; health education; and availability of materials and vaccinations. A study by Sharma (2016), on the other hand, reported that migrant women in the same region prefer to attend TBAs for reproductive health services, and only attend clinical services in case of emergency. This difference in data outcome has multiple possible explanations, for example the restriction on data transferability of both studies. Alternatively, it may be due to the limitation of this study, exploring the perspective of women who reported at clinical level, but not those in the community.

Participants in the FGDs express that the attitude, behaviour and language used by healthcare providers are important values influencing the appropriateness of services and the ability to engage with them. The health workers independently acknowledged that patients require these same values to engage with them. Important needs for women in the FGDs to increase the appropriateness of ANC services are more actual consultation time, health workers' polite and caring attitude, same language spoken, and increased explanation on services provided and health education. The healthcare workers in this research are aware of the influence of healthcare workers' attitudes on patient's ability to engage. Understanding the effect of their own attitude may not be found among all health workers, and existing attitudes can be hard to change. Two other suggestions, increasing the amount of time available for attending a patient and health education and explanation on treatments provided, are factors that could be looked into by health services providers when there is willingness to make changes. Health workers' attitudes and behaviour have not yet been indicated as factors influencing the accessibility of ANC services in the Mae Sot-Myawaddy border area in existing publications found. Since the participants attribute value to health workers attitudes and behaviour, raising awareness for and improvement of health workers' attitudes and behaviour can be recommended to increase patients' ability to engage.

5.6. Discussion: study result limitations

While taking into account the limitations of the study design presented under methodology limitations, the data generated from the FGDs and IDIs provided sufficient information for

answering the research objectives. However, to further verify the data collected in the six FGDs and two IDIs, this research could have included more group discussions and interviews. Moreover, data collection could have included several other stakeholders such as husbands, relatives and community health workers, all of which has not been undertaken due to restriction in time.

Limitations caused by the chosen research method of FGDs cannot be excluded. FGDs have shown to be an effective method under migrant women in the Mae Sot-Myawaddy border area (Rijken 2012), and the main researcher observed that group discussions are a common method of problem-solving and analysis in the community. In the dynamics of the different FGDs, the research team noticed that in some groups, women with strong opinions seemed to influence other members who consequently were less heard. Other groups were differently balanced, and participation was more equal. While the research assistant did his best to engage women equally in the FGDs, group dynamics may have influenced the quality and richness of the data gathered.

Due to the research scope, area and participants, the transferability of the qualitative data in this research is limited. Qualitative data by nature is limited in transferability to other settings and countries. In the case of this research, even within the country and region the results and recommendation are not likely to be transferable. Besides the qualitative study design, the study group is heterogeneous in nature, Myanmar migrant women can have a diverse background, and the living conditions can vary widely, both of which can influence the accessibility of services. The choice was made to keep the research area small, the Mae Sot - Myawaddy border region, and the study group as diverse as possible. Within feasibility, it was aimed to gather data as relevant and diverse as possible, in a specific area, knowing that would further narrow down the possibilities of transferring the results to other settings.

6. Conclusion and Recommendations

This qualitative descriptive study has been carried out to explore the needs of Myanmar migrant women for ANC services in the Mae Sot-Myawaddy border area of Thailand and Myanmar. Levesque et al's (2013) five dimensions of accessibility were used as a framework to explore why Myanmar migrant women do (not) access ANC services as recommended, what their perception is on factors affecting the accessibility of ANC services and how accessibility of ANC services for Myanmar migrant women can be improved.

6.1. Accessibility of ANC services

The Myanmar migrant women and health workers in this study have given insight in why migrant women do or do not access ANC services as recommended, and their perception on the accessibility of ANC services in the Mae Sot - Myawaddy border area. Following Levesque et al's (2013) five dimensions of accessibility, the most important findings are:

Approachability and Ability to perceive: When women do not perceive a need to follow ANC services, or when they lack knowledge, underutilisation of ANC services can occur. On the other hand, women are more likely to access ANC services when it is their first pregnancy, when seeking confirmation about mother and baby's health, or when they experience early pregnancy symptoms. Participants of this study stated that the approachability of ANC services relies on the information about the services that women receive and can understand. The sources providing the information are diverse and the perceived access to the information varies widely. In general, women value the benefits of ANC services and perceive a need to attend ANC.

Acceptability and Ability to seek: Rude and impolite behaviour of health workers can hinder the acceptability of ANC services. The service of facilitating the process of obtaining a Thai legal birth certificate is an important reason for women to access ANC. The ability to seek is influenced by women's social network, most prominently the husband, the occupational context and legal issues. Women's husbands more often prevent rather than encourage their pregnant wives to seek ANC services. Employers have a significant power over their (female) employees and can promote or obstruct the ability to seek. Women's lack of legal documentation and fear of being arrested by Thai government officials has a negative effect on women's ability to seek.

Availability, Accommodation and Ability to reach: Several ANC services are available depending on the local situation of the participants. Women prefer to attend ANC services if they can be reached, both in terms of distance to the health facility and available transportation methods. When the distance to ANC services is too far women cannot attend. Shared transport from remote areas is infrequent and unreliable, while the expense of private transport is too high.

Affordability and Ability to pay: Women consider direct and indirect costs as key factors negatively affecting the affordability of ANC services. The ability to pay influences women's health seeking behaviour and the quality of care they can access. Free of charge services and available household resources enable women to pay for services related to ANC. Unexpected

external factors can reduce savings and thus have a negative effect on the ability to pay. If women expect low quality of services because they do not have the resources to make additional payments for services, they choose not to access them.

Appropriateness and Ability to engage: The appropriateness of services according to the participants depends on the quality of services available. Values influencing the ability of Myanmar migrant women to engage with health service providers are their emphatic attitude, behaviour, having sufficient time to attend to patients, and speaking the same language. Furthermore, the desire to give birth in a hospital adds to the ability to engage. When preferred services are available and women's expectations are likely to be met, the ability to engage increases.

6.2. Recommendations

The outcomes of this study present several indications on how accessibility of ANC services could be improved. The suggested recommendations are ranked based on feasibility, expected costs of implementation and likelihood of implementation based on the local situation. The recommendations are mainly aimed at MTC because this research has taken place at the clinic, and the research team are staff members of MTC. However, these recommendations can be valuable for other organisations organising ANC in the same geographical area as well.

Health workers' attitudes and behaviour

- Develop CME sessions on health workers' attitudes and behaviour
- Educate health workers about positive benefits of attitude and behaviour
- Improve communication skills of healthcare providers

A low-cost strategy to improve accessibility of ANC is integrating elements into the existing continuous medical education (CME) and health worker training programmes at MTC and partner organisations. Elements can focus on the effect of health workers' attitudes and behaviour on patients and building communication skills. The desired outcome is improved appropriateness and acceptability of services, contributing to the ultimate goal of increasing accessibility. Since the health worker training and CME programmes are jointly implemented with partner organisations, they have the potential of reaching health workers and beneficiaries beyond the antenatal care programme and Mae Tao Clinic. This recommendation is likely to be considered for implementation because it aligns with MTC's strategic goal of quality assurance of health care services.

Health education

- Investigate most appropriate health education methods
- Increase awareness among women and men

Women in this research have stated that lack of knowledge is an important factor preventing access to ANC services and indicated a need for health education. Men should receive specific education as well, since they were identified as inhibiting women to access ANC services. Awareness on the importance of early initiation and frequent attendance of ANC services should be raised among men and women of reproductive age before pregnancy. Peer

education by women who understand the importance of ANC could be a viable option, because experienced women in the community are considered as valuable resources for information. Research should be conducted on where the target groups (men and women of reproductive age) reside and which method of health education (traditional or modern) is most effective for this group.
Mae Tao Clinic is operating a school of 850 students and is part of a network of migrant schools in the Mae Sot area. A potential way of reaching part of the target beneficiaries is by integrating elements of reproductive health and ANC into the already existing school health programme, currently implemented in 15 migrant schools in MTC's network. This recommendation is likely to be considered for implementation because the school network already exists and it would be a low-cost strategy to extend the existing programme.

Assure access to affordable ANC services

- Advocate for affordable ANC services
- Provide affordable ANC services

MTC and other ANC service providers in the area should continue to advocate for and provide affordable ANC services. Women require affordable ANC services in order to access them. Affordable and free of charge ANC services are currently provided by different health services providers. Maintaining free of charge services by MTC is relying on continuous external funding, and can be difficult to maintain. Although MTC has been able to do so in the past 30 years, the programme has always been depending on outside funding and thus sustainability can never be guaranteed. In addition, it is important that women have knowledge about the availability of affordable services including obtaining low-cost health insurance. Hence, how to access affordable services can be an integrated topic of health education for the target groups.

Antenatal Care in the Community

- Resume antenatal care services in migrant communities
- Prepare concept note for potential donors

Bringing ANC services to remote migrant communities can overcome the barrier of distance to health facilities, available transportation and the costs for transportation. A team of health workers used to visit migrant communities along the border to provide ANC care, but this service was ceased due to lack of available funds. Resuming this service is a recommendation that should be considered. Reproductive and child health are themes that donors generally take interest in, and evidence-based recommendations may encourage them to support this activity. Hence, MTC's grants team is recommended to develop a concept note of this activity and present it to potential donors who are interested in improving the accessibility of ANC services for Myanmar migrant women. The implementation of this recommendation depends on whether a donor can be found that is specifically interested in funding ANC services in migrant communities.

Transportation from remote areas

- Investigate feasibility of different transport support options
- Arranging transport support options

Arranging transportation or covering the costs of transportation for women in remote areas to nearby health facilities is a method to overcome challenges related to distance, transportation and costs, and can improve accessibility of ANC services. Different support options could be considered, such as free transportation from certain remote places on specific days and providing transport fees or coupons to pregnant women. Research should be conducted on both the feasibility and the costs of different transport support options and the previous recommendation on providing ANC in the community. Based on the results, either of the options could be given priority or could be discarded.

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Annex I: Decision Research Ethics Committee

KIT | Health

Contact
Meta Willems
Telephone +31 (0)20 568 8514
m.willems@kit.nl

KIT Health| P.O. Box 95001, 1090 HA Amsterdam, The Netherlands
BY E-MAIL:
mspbakker@gmail.com

Our reference KIT Health Amsterdam, 21 January 2019

Subject Decision Research Ethics Committee on Proposal S94

Dear Menno,

The Research Ethics Committee of the Royal Tropical Institute (REC) has reviewed your application for ethical clearance for the proposal "Perceived need for antenatal care services of Myanmar". The REC is pleased to see that you have addressed our concerns and questions to our full satisfaction.

Kind regards,

Prisca Zwanikken
Research Ethics Committee, KIT

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Royal Tropical Institute

Annex II: Letter of approval Community Ethics Advisory Board

Community Ethics Advisory Board
Mae Tao Clinic, PO Box 67, Mae Sot, Tak 63110, Thailand
ms.ethicsboard@gmail.com

Feb 26, 2019

To : **Dr Menno Bakker**
Bantung soi 2, 149-2 | Mae Sot | Tak 63110 | Thailand
mspbakker@gmail.com

Subject: Letter of approval to conduct the study "Exploring the needs of Myanmar migrant women for better accessibility of antenatal care services on the Thailand-Myanmar border."

Dear Dr Menno,

This letter serves as an approval for the study "Exploring the needs of Myanmar migrant women for better accessibility of antenatal care services on the Thailand-Myanmar border."

We have found that the research looked well designed and that the research objectives were clear. The Community Ethics Advisory Board (CAB) has no concern about the ethical and community aspects of the study.

We are glad that you have explained in detail the study to the CAB and answered all the questions raised. Therefore, we are happy to let you proceed further with your study.

You are requested to strictly adhere to the protocol outlined in the proposal that was submitted to the CAB. Any changes in objectives, research questions, methodology, procedures, or implementation of the proposed surveys can only be made after prior approval from the CAB.

We hope that valuable information will come out of the study. Please submit the final report to the CAB.

CAB review members:
1. Dr Cynthia Maung
2. Dr Nyunt Naing Thein
2. Nwe Ni
3. Saw Than Lwin
4. Sophia
5. Nway Nway Oo

Sincerely,

Saw Than Lwin,
Coordinator,
Community Ethics Advisory Board, Mae Sot.

Annex III: Consent forms

Informed Consent form - FGD

Informed Consent Form for Myanmar migrant women in the Mae Sot - Myawaddy border area who we are inviting to participate in the research "Exploring the needs of Myanmar migrant women for better accessibility of antenatal care services on the Thailand-Myanmar border."

Name of Principle Investigator: Menno Bakker
Name of Organization: Royal Tropical Institute (KIT) Amsterdam

This Informed Consent Form has two parts:

- **Information Sheet (to share information about the study with you)**
- **Certificate of Consent (for signatures if you choose to participate)**

You will be given a copy of the full Informed Consent Form

Part I: Information Sheet

Introduction
I am Menno Bakker and I am working for Mae Tao Clinic. I am doing this research about Antenatal Care (ANC) as part of my master program in International Health at Royal Tropical Institute (KIT) Amsterdam. We will provide you with information about the research and are asking you to participate in this research. You do not have to decide about your participation in the research immediately, and you can ask questions or talk with anybody you prefer before you make a decision about participating in this study. If there is anything that you don't understand, please ask any of the researchers about it before we continue.

Purpose of the research
Antenatal care is the care women receive during pregnancy if they visit a health care clinic. The aim for this research is to find out how migrant women from Myanmar think about ANC and why they attend or not attend ANC.

Type of Research Intervention
This research will involve your participation in a group discussion that will take about 1 hour.

Participant Selection
You have been chosen to join the research because you have attended the RH department at MTC today and we will ask all women that come today to join the research.

Voluntary Participation
Your participation in this research is entirely voluntary. It is your choice whether to participate or not. If you choose not to participate all the services you receive at MTC will continue and nothing will change.

Procedures
A. We are asking you to help us explore the needs of Myanmar migrant women for ANC services in terms of accessibility in order to find out why these women do not access ANC services as recommended.

B. Focus Group Discussion: You will be part of a focus group discussion of 4-8 women that have visited this facility. The discussion will be guided by me (Menno) with help of the translator named Eh Gay Wah. The focus group discussion will start with explanation on why we are conducting this research and why you are an important actor in this. We will ask questions about migrant women from Myanmar seeking antenatal care services in a health facility, and their reasons for doing so or refraining from doing so. We would appreciate if you can share your knowledge on this topic, either from personal experience or experience of women in your environment.

The questions we ask are about different aspects that affect women's access to antenatal care, such as: information on the availability of ANC services; the quality and content of delivered services; cultural fit of delivered services; geographic location and accommodation of services; costs of services, etc.
The location of the focus group discussion is Mae Tao Clinic. Only myself, the translator and the other participants will be present. We will record the discussion for later analysis, but none of the participants will be identified by name on record. The recorded audio will be kept for the duration of the research and destroyed within 2 months after the data is collected.
Please remember that all information is confidential, participation is completely voluntary and you can leave the discussion at any time.

Duration
The FDG will take about 1 hour. Collecting the data for this study will take place over 4 weeks. During this time, we will conduct focus group discussions with migrant women and talk individually with health workers.

Risks
We will ask some questions about attending antenatal care and the reasons and barriers for accessing these services. There may be some risks attached to this, such as sharing personal information and experiences in a group discussion and with the research team; and discussing topics that are sensitive.

Benefits
There are no direct benefits from participating in this research. In the long-term perspective, when more women access and appreciate ANC services, maternal and child health status of the target group can improve.

Reimbursements
You will receive a small token of appreciation for taking part in the research.

Confidentiality
You will participate in focus group discussion in this research, which means that the information you share, will be shared with the other focus group participants too. We would like you to not share information about what was said in the discussion with people outside the research. We ask the other participants the same but cannot guarantee full confidentiality from them. The research team will keep the information confidential by all means. We will record the discussion, but your name will not be recorded so everything you say will not be traced back to you. Data will be kept under lock and key, only accessible for the research team. The data records will be destroyed when the research project has been finished.

Sharing the Results
Study results will be made available at MTC in pre-natal and post-natal clinic for staff and patients in order to inform the community, a mechanism to inform the participants will not specifically be set up. Results of this study will be presented in a research thesis and disseminated to health service providers in the Mae Sot-Myawaddy border area for recommendation.

In addition, there may be the possibility to present the research results at a Border Health Conference in Mae Sot in June, 2019.

Right to Refuse or Withdraw
You are free to join or to refuse taking part in this research. You can still use Mae Tao Clinic's services as before if you choose not to participate. We will not tell the staff at MTC whether you refuse or join the discussion. You can leave the research at any time, before during or after the discussion, if you no longer want to take part.

Who to Contact
The research assistant will be female and speaks Burmese and Karen. You can contact her when you have any questions or want to add anything to the discussion.

This proposal has been reviewed and approved by the Community Advisory Board (CAB), which is a committee whose task it is to make sure that research participants are protected from harm. If you wish to find about more about the CAB, contact Saw Than Lwin on ms.ethicsboard@gmail.com or +66872052963. It has also been reviewed by the Ethics Review Committee of the Royal Tropical Institute (KIT), which is supervising and supporting the study.

You can ask me any more questions about any part of the research study, if you wish to. Do you have any questions?

Part II: Certificate of Consent

I agree on participating in a focus group discussion that aims to find out how Myanmar migrant women think about antenatal care services and why they decide to attend or not attend such services.

The topics of the discussion have been shared with me and I agree to share my views and experience on these topics.

I will not share the items discussed with people outside the focus group. However, I am aware of the fact that complete confidentiality cannot be guaranteed.

I do not have to answer questions if I do not feel comfortable answering.

I am aware that I can withdraw from the research or focus group discussion at any time without repercussions from the researcher or Mae Tao Clinic.

I have read the foregoing information, or it has been read to me. I have had the opportunity to ask questions about it and any questions I have been asked have been answered to my satisfaction. I consent voluntarily to be a participant in this study

Print Name of Participant_____
Signature of Participant _____
Date _____
Day/month/year

If illiterate [1]

I have witnessed the accurate reading of the consent form to the potential participant, and the individual has had the opportunity to ask questions. I confirm that the individual has given consent freely.

Print name of witness_____ **Thumb print of participant**

Signature of witness _____

Date _____
Day/month/year

Statement by the researcher/person taking consent

[1] A literate witness must sign (if possible, this person should be selected by the participant and should have no connection to the research team). Participants who are illiterate should include their thumb print as well.

I have accurately read out the information sheet to the potential participant, and to the best of my ability made sure that the participant understands the procedure.
I confirm that the participant was given an opportunity to ask questions about the study, and all the questions asked by the participant have been answered correctly and to the best of my ability. I confirm that the individual has not been coerced into giving consent, and the consent has been given freely and voluntarily.

A copy of this ICF has been provided to the participant.
Print Name of Researcher/person taking the consent_____

Signature of Researcher /person taking the consent_____

Date _____
Day/month/year

Informed Consent form - IDI

Informed Consent Form for Myanmar migrant women in the Mae Sot - Myawaddy border area who we are inviting to participate in the research "Exploring the needs of Myanmar migrant women for better accessibility of antenatal care services on the Thailand-Myanmar border."

Name of Principle Investigator: Menno Bakker
Name of Organization: Royal Tropical Institute (KIT) Amsterdam

This Informed Consent Form has two parts:

- **Information Sheet (to share information about the study with you)**
- **Certificate of Consent (for signatures if you choose to participate)**

You will be given a copy of the full Informed Consent Form

Part I: Information Sheet

Introduction
I am Menno Bakker and I am working for Mae Tao Clinic. I am doing this research about Antenatal Care (ANC) as part of my master program in International Health at Royal Tropical Institute (KIT) Amsterdam. We will provide you with information about the research and are asking you to participate in this research. You do not have to decide about your participation in the research immediately, and you can ask questions or talk with anybody you prefer before you make a decision about participating in this study. If there is anything that you don't understand, please ask any of the researchers about it before we continue.

Purpose of the research
Antenatal care is the care women receive during pregnancy if they visit a health care clinic. The aim for this research is to find out how migrant women from Myanmar think about ANC and why they attend or not attend ANC.

Type of Research Intervention
This research will involve your participation in an individual interview that will take about 1 hour.

Participant Selection
You have been chosen to join the research because you are affiliated with reproductive health. We will talk about access to ANC services with several other health workers.

Voluntary Participation
Your participation in this research is entirely voluntary. It is your choice whether to participate or not. If you choose not to participate, we will not notify your supervisor.

Procedures
A. We are asking you to help us explore the needs of Myanmar migrant women for ANC services in terms of accessibility in order to find out why these women do not access ANC services as recommended.

B. <u>One-on-one interview with health worker:</u> We would like to conduct an interview with you on the reasons for pregnant migrant women from Myanmar to access antenatal care, or what reasons they may have to not access this type of care. The interview will take place at Mae Tao Clinic, or a different location if you prefer that. Participation in this interview is voluntary and you are not obliged to answer any question you feel uncomfortable with. We will record the discussion for later analysis, but you will not be identified by name on record. The recorded audio will be kept for the duration of the research and destroyed within 2 months after the data collection.
The questions we ask are about different aspects that affect women's access to antenatal care, such as: information on the availability of ANC services; the content of delivered services; cultural fit of delivered

services; location and accommodation of services; costs of services, etc. We will ask you for your professional opinion and to share your experience with us on these topics.

Duration
The interview will take about 1 hour. Collecting the data for this study will take place over 4 weeks. During this time, we will conduct focus group discussions with migrant women and talk individually with health workers.

Risks
We will ask some questions about attending antenatal care and the reasons and barriers for accessing these services. There may be some risks attached to this, such as sharing personal information and experiences with the research team; and discussing topics that are sensitive.

Benefits
There are no direct benefits from participating in this research. In the long-term perspective, when more women access and appreciate ANC services, maternal and child health status of the target group can improve.

Reimbursements
You will receive a small token of appreciation for taking part in the research.

Confidentiality
You will participate in an individual interview for this research, which means that the information you share, will be known to the researcher and the research assistant. We will not be sharing information about you to anyone outside the research team. The interview will be recorded for transcribing and analyses, but your name will not be recorded so everything you say cannot be traced back to you. Data will be kept under lock and key, only accessible for the research team. The data records will be destroyed when the research project has been finished.

Sharing the Results
Study results will be made available at MTC in pre-natal and post-natal clinic for staff and patients in order to inform the community, a mechanism to inform the participants will not specifically be set up. Results of this study will be presented in a research thesis and disseminated to health service providers in the Mae Sot-Myawaddy border area for recommendation.

In addition, there may be the possibility to present the research results at a Border Health Conference in Mae Sot in June, 2019.

Right to Refuse or Withdraw
You are free to join or to refuse taking part in this research. We will not tell your colleagues or supervisor whether you refuse or join the interview, as to make sure there will be no behavioral changes from MTC staff towards you. You can leave the research at any time, before during or after the interview, if you no longer want to take part.

Who to Contact
The research assistant will be female and speaks Burmese and Karen. You can contact her when you have any questions or want to add anything to the discussion.

This proposal has been reviewed and approved by the Community Advisory Board (CAB), which is a committee whose task it is to make sure that research participants are protected from harm. If you wish to find about more about the CAB, contact Saw Than Lwin on ms.ethicsboard@gmail.com or +66872052963. It has also been reviewed by the Ethics Review Committee of the Royal Tropical Institute (KIT), which is supervising and supporting the study.

You can ask me any more questions about any part of the research study, if you wish to. Do you have any questions?

Part II: Certificate of Consent

I agree on being interviewed in a research that aims to find out how Myanmar migrant women think about antenatal care services and why they decide to attend or not attend such services.

The topics of the interview have been shared with me and I agree to share my views and experience on these topics.

I do not have to answer questions if I do not feel comfortable answering.

I am aware that I can withdraw from the research or focus group discussion at any time without repercussions from the researcher or Mae Tao Clinic.

I have read the foregoing information, or it has been read to me. I have had the opportunity to ask questions about it and any questions I have been asked have been answered to my satisfaction. I consent voluntarily to be a participant in this study

Print Name of Participant_____
Signature of Participant _____
Date _____
Day/month/year

If illiterate [2]

I have witnessed the accurate reading of the consent form to the potential participant, and the individual has had the opportunity to ask questions. I confirm that the individual has given consent freely.

Print name of witness_____ **Thumb print of participant**

Signature of witness _____

Date _____
Day/month/year

Statement by the researcher/person taking consent

I have accurately read out the information sheet to the potential participant, and to the best of my ability made sure that the participant understands the procedure.
I confirm that the participant was given an opportunity to ask questions about the study, and all the questions asked by the participant have been answered correctly and to the best of my ability. I confirm that the individual has not been coerced into giving consent, and the consent has been given freely and voluntarily.

A copy of this ICF has been provided to the participant.
Print Name of Researcher/person taking the consent_____

Signature of Researcher /person taking the consent_____

Date _____

[2] A literate witness must sign (if possible, this person should be selected by the participant and should have no connection to the research team). Participants who are illiterate should include their thumb print as well.

Annex IV: Instruments

FDGs with Myanmar migrant women

- What are the usual steps taken for finding health services or support when a woman finds out that she is pregnant?
- When is the first time in pregnancy that a woman looks for support, and why?
- Where and to who do women go for care during pregnancy?
- How do pregnant women select the place or person to receive ANC services?
- Where do migrant women prefer to find support during pregnancy?
- What are the difficulties in accessing ANC services at a health facility that women face?
- What information is supplied in your community about ANC? And by whom?
- What kind of support do pregnant women expect when attending ANC?
- To what extent do the ANC services delivered align with your needs?
- What kind of services could be included in ANC to make it more attractive for women to attend?
- What do you think of the location and opening hours of health facilities?
- What is important for you in a relationship with a health worker providing ANC services?
- Are there any social or cultural issues in consultations with these providers?
- What role do costs for accessing ANC services (health service fees, transportation, etc) play in ANC attendance?
- If any, what are the differences between ANC services in the clinic and support in the community?
- What other reasons can explain why women do not attend ANC services for the recommended 4 visits?
- What changes can be implemented to make sure more women timely attend ANC at a health facility; and more frequently?

Interviews with health workers

- What are the usual steps taken for finding health services or support when a woman finds out she is pregnant?
- When is the first time in pregnancy that a woman looks for support, and why?
- How do pregnant women select the place or person to receive ANC services?
- What type of women seek ANC at your facility?
- Why do pregnant women choose to seek ANC services in a health facility?
- What are the difficulties in accessing ANC services at a health facility that women face?
- What information is supplied to communities about ANC? Where? And by whom?
- What kind of support do pregnant women expect when attending ANC?
- What kind of services could be included in ANC to make it more attractive for women to attend?
- What do you think of the location and opening hours of health facilities?
- Are there any social or cultural issues for women consulting for ANC services?
- What role do costs for accessing ANC services (health service fees, transportation, etc) play in ANC attendance?
- If any, what are the differences between ANC services in the clinic and support in the community?
- What other reasons can explain why women do not attend ANC services for the recommended 4 visits?
- What changes can be implemented to make sure more women timely attend ANC; and more frequently?