Quality Improvement at District Scale (QUADS) project - Community Intervention

Implementation and process monitoring

Prepared by QUADS Team

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INTRODUCTION

Maternal and new born health outcomes in Mtwara region in southern Tanzania are particularly poor. Poor health-seeking and health system weaknesses constrain the use of high-quality interventions and community-level behaviors that have been proven to reduce maternal and neonatal morbidity and mortality.

The Government of Tanzania has prioritized the reduction of maternal and new-born mortality through multiple policies, particularly the National Roadmap Strategic Plan to Accelerate the Reduction of Maternal, New-born, and Child Deaths in Tanzania. Two cornerstones of this strategic plan are:

1) Health systems strengthening and capacity development; and 2) community mobilization and participation. However, despite national commitment and a dense network of health facilities in the country, there has been limited progress in reducing maternal and new-born mortality. An increase in uptake of care, particularly at higher level facilities, with improvements in quality of care is essential. Improvements in quality have recently been emphasized by the Government of Tanzania through the Tanzanian National Quality Improvement Framework. *Quality improvement (QI) has shown promising results to improve quality of care[1] and to overcome health system weaknesses[2]. When applied at the community level, QI can also be used to improve care-seeking.*

Tanzania's National Quality Improvement Strategic Task Force has established an accelerated plan for quality improvement, but struggles with a small evidence base. As there are few examples of quality improvement strategies at scale, not only that QUADS will help to build and sustain quality improvement capacity among Tanzanians, but results will provide a much-needed evidence base for policy planning by the Task Force. Here we share experience of implementing community quality improvement with 163 Quality improvements teams across 4 councils of Mtwara Region, Tanzania.

1.1 Learning Collaborative Aim(s)

The general aim of these community level QI collaboratives is to improve key maternal and newborn health process indicator through use of District scale QI operational model. It is expected that the improvements will translate into reduced maternal and newborn mortalities.

Five main improvement areas worked on.

1. Collaboratives to improve the number of pregnant women who starts antenatal care clinics below age of 12 weeks of pregnancy
2. Collaboratives to improve the number of pregnant women who completes 4 or more visits of ANC clinic.

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[1] Jennie Jaribu, Suzanne Penfold, Cathy Green, Fatuma Manzi, Joanna Schellenberg, (2018) "Improving Tanzanian childbirth service quality", International Journal of Health Care Quality Assurance, Vol. 31 Issue: 3, pp.190-202, https://doi.org/10.1108/IJHCQA-10-2015-0122
Permanent link to this document:
https://doi.org/10.1108/IJHCQA-10-2015-0122

[2] Baker, U., Hassan, F., Hanson, C. *et al.* Unpredictability dictates quality of maternal and newborn care provision in rural Tanzania-A qualitative study of health workers' perspectives. *BMC Pregnancy Childbirth* **17,** 55 (2017). https://doi.org/10.1186/s12884-017-1230-y

3. Collaboratives to improve the number of delivered women who completes 4 postnatal care (PNC) check-up visits.
4. Collaboratives to improve (referrals) number of pregnant women who delivered at hospital after they were identified with delivery risk factors
5. Health managers, District community mentors, village leaders and health facility workers to demonstrate the capacity to understand, implement and monitor QI processes

1.2 Intervention Design

Intervention area comprised of 4 District councils where one-third of each is a primary prototype intervention. One division was selected in each council, a division is made up of wards, which are also made up of villages/streets. These selected areas in councils make up a total of 163 villages.

Community mentors, who principally work as community development officers, are ones coordinating community quality improvement activities of the project and they report to council health management team. Mentors, works **with ward executive officers** who leads **village executive officers** who supervise **community health workers (CHW). Health workers** also supervises CHW.

In each project area in a village, two community health volunteers were selected through community-led recruitment approach. This approach involved putting adverts then screening participants by interview and the best two got the chance.

Roles

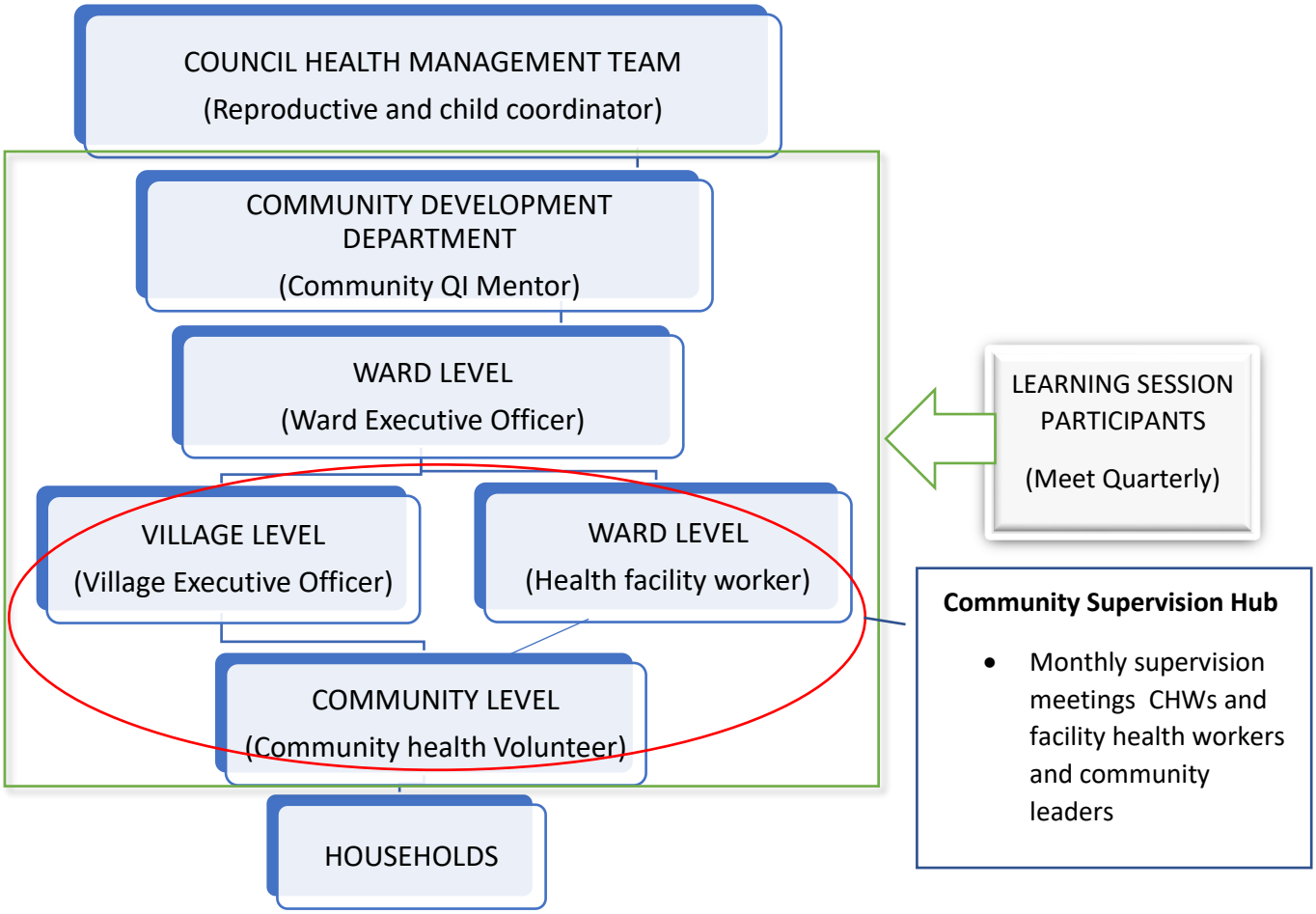
Mentors-Coordinates all activities in the council by doing mentorship and coaching to community leaders. Mentors also link the community work and Council health management team

Ward executive officer- Leads village executive officers in their activities, he also the chairman in learning session meetings. Ward executive officers are the bridge/ Link between District mentors and community.

Village executive officers- These are the immediate supervisors of community health volunteers. They are the first leaders at the lowest level of the intervention. Apart from other things, they have a role to facilitate monthly meeting with community health volunteers to review and reflect on the tasks and help in any community related issues.

Health facility worker- Primary supervisor of Community health volunteers and they also do monthly meetings to review and reflect on technical health messages.

Operational model: Community Intervention



Implementation

These villages, which are individual quality improvement teams forms a ward level collaborative. These collaboratives are the principal and focal learning units where QI dosages are delivered. Implementation within these collaboratives follows Breakthrough series collaborative model which demonstrated success in the same community when applied within EQUIP project, a previous study in the same area which gave birth to QUADS. During learning sessions of these community collaboratives, community QI teams generated and tested change ideas with respect to specific change topic. These change ideas aimed at improving indicators for maternal and newborn care services access and utilization.

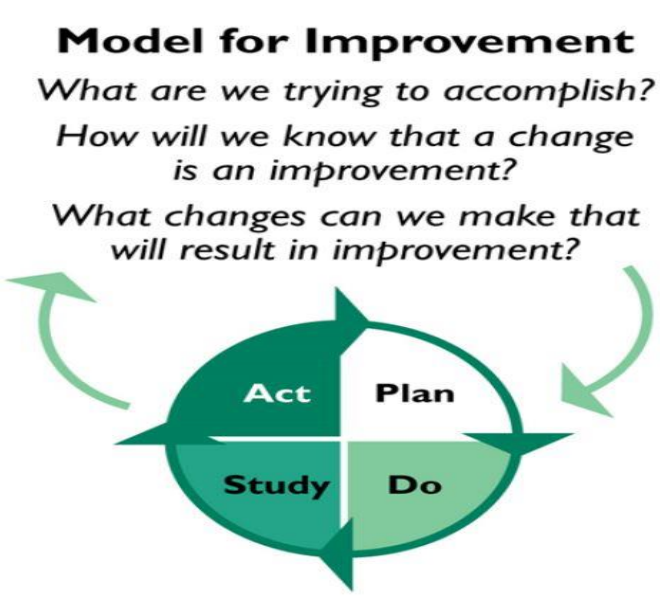
Collaboratives from two councils, Newala and Tandahimba started implementation August 2017, while the rest, Masasi TC and Masasi DC started December 2017.

Over the implementation period, collaboratives convene quarterly in learning sessions, which are structured to be short trainings of about 4 hours at most. In these sessions participants are community health workers (2 from each village), Community leaders (1 village executive officer from each village and ward executive officer), District community quality improvement mentors (who were District community development officers), 1 health facility worker from each health facility . Normally learning session is a collaborative size, means one or two wards together with at most 10 villages combine, this making a session of between 20-35 people at most.

Period between

Learning session's content

Participants were taught about QI methods, and mainly on the model of improvement. Contextualizing the model to fit the community member's perspectives



Also in each learning session a new **change topic** was also introduced and detailed lectures were given by health experts on the role of that change topic to maternal and newborn health as well the current performance of the community on the subject. Through use of fish-born analysis, District QI mentors

facilitated the discussions to identify the bottlenecks and come up with **potential change ideas**. Teams then agree on strategies to implement these change ideas.

This session also is used to evaluate performance of previously introduced change ideas through looking on run-charts and other information from supervision contacts at facility and community.

Motivation boosting is also a key part in these session, songs and different motivational hashtags are taught so as to bold the **why,** apart from knowing what to do and how to do. The session acts also as morale booster.

Different change ideas are tested over time to see if they have impact of run-charts and those with consistent positive effect as per run-charts rules are then qualified as potential change ideas to be included in the change package.

Community QI intervention Design

The design aimed to provide a substantive evidence base of how systems-wide QI at the district, health facility, and community levels can be led by regional managers and integrated into pre-existing government structures, enabling scale-up across Mtwara region to improve maternal and newborn health outcomes.

Furthermore the model will stimulate effective engagement of regional support to districts, and place greater ownership in the hands of district-level staff, and also engage health facility staff and village leaders as supervisors of the village volunteers participating in community-level QI.

STUDY AREA

4 councils were involved

Tandahimba, Newala TC, Masasi DC and Masasi TC

Study Area and Participants				
Districts Councils	Divisions	Wards	Facilities	Villages
4	4	31	25	163
Collaborative Members				
Mentors	Ward Executives Officers	Village executive officers	Health workers	Village health volunteers
8	31	163	25	326

CHANGE TOPICS CHARTERS

Here we describe the 4 main change topics implemented through community arm. We explain the background of the change topics, what was done and outcomes.

Change Topic 1: Pregnant women starting ANC early and completion of 4 visits

Introduction

Antenatal care is the care a pregnant woman receive from healthcare professionals during pregnancy. She will be offered a series of appointments with a midwife, or sometimes with a doctor who specializes in pregnancy and birth (trained health worker). It aims generally to ensure that pregnant women reaches end of her pregnancy healthy and the newborn healthy.

Good care during pregnancy is important for the health of the mother and the development of the unborn baby. Pregnancy is a crucial time to promote healthy behaviors and parenting skills. Good ANC links the woman and her family with the formal health system, increases the chance of using a skilled attendant at birth and contributes to good health through the life cycle. Inadequate care during this time breaks a critical link in the continuum of care, and effects both women and babies.

The World Health Organization recommends at least four visits to an antenatal clinic during pregnancy. Majority of mothers in Mtwara region are not completing at least 4 visits due to many reasons, but major one is late start of ANC clinic attendance.

Why early antenatal visits are important

First ANC visit should be as early as possible below 12 weeks of pregnancy, in the first trimester. Early booking position the woman well to receive essential interventions in ANC to prevent and early manage major risk factors for maternal health. Services include early blood pressure and urine checks and to control hemorrhage and pre-eclampsia and eclampsia. Identification and management of congenital syphilis, control of anaemia, and prevention of malaria complications. Also, HIV can be detected early and they can begin treatment to support their own immune systems and get other interventions to prevent mother to child HIV transmission.

Why mothers do not attend ANC early?

Not in the order of its significance, but these have been major issues hindering early ANC initiation. Women lacking enough knowledge on the importance of starting clinic early, many of them know the general importance for attending antenatal clinics but significance of the timing is not so much clear. Poor quality of care at these clinics has been reported as strong contributing factor. Women who starts early and miss many of the key diagnostic checkups see no value for early visits and they become good ambassadors of bad information based on their service experiences. Long distance to facilities discourage women and lead to delayed first visit and subsequent fewer ANC **visit.**

1. Aims statement – what are we trying to accomplish

While Tanzania has over 98% of pregnant women attending at least one antenatal clinic visit, few attend early (below 12 weeks) and the number of those who complete at least 4 visit is still very low.

Source: MIS, (June, 2017)

Indicator	NATIONAL	REGIONAL	TANDAHIMBA	NEWALA
Early booking (below 12wks)	14.5%	17.6%	19.7%	13.1%
4 visits completed	40%	42.5 %	36.8%	50.4%

With this change topic we aim to increase the number of pregnant women completing 4 or above, number of visits in antenatal clinic in the study Districts.

The region has set an aim of improvement to 60% for at least 4 visits in both Districts and this is what we want to achieve by testing ideas that will show improvements and sustain them to reach improvement target.

2. How do we know that a change is an improvement?

Process measure

Various measures were deployed to see the progress of change ideas implementation

a. Number of pregnant women visited by community health workers
b. Number of Counselling visits pregnant women received before delivery

Outcome measures

Using health facilities ANC registers and woman ANC cards, we will determine the outcome by looking on the trends of number of women completed 4+ ANC/ women and those that started first visit below 12 weeks.

From community volunteer workbooks, Number of pregnant women who completed 4 visits will be plotted against total women delivered.

3. What changes can we make that will lead to improvement?

Here we report the change ideas implemented at community level to improve the community knowledge on importance of ANC

1. Using community health workers to identify pregnant women at early stage and do home counseling visits on importance of early ANC attendance as well as completing the visits

2. Village leaders community sensitization and follow up on the ANC visits
3. Village leaders creating community register to follow up ANC attendance of women and take necessary action when needed
4. Use of women group at community as sensitization and education platform on the importance of ANC

Change Topic 2: **Delivery Place referral advice adherence**

An efficient referral system of good quality plays a crucial role in reduction of maternal mortality. All pregnant women identified during ANC visit that they have delivery risk factors including adolescence, old age or multi-para (over 4 previous pregnancy) or previous C-section are given referral. The referral places include hospital levels or upgraded health centres.

The health system in Tanzania is organized in a referral pyramid, starting from the community dispensaries offering basic obstetric care and treatment of minor conditions. At the district level, there are district or district designated hospitals which are first referral level where necessary drugs, equipment's and skilled staff are available to offer comprehensive obstetric care. Then at the regional level, there are regional hospitals and on top at national level, there are national and specialized hospitals.

The reproductive and child health (RCH) card includes guidelines for elective referrals to hospital for assessment or delivery, and emergency referrals during pregnancy, delivery and after delivery. Implementation of these guidelines has resulted to a good number of pregnant women to be referred. However, some studies and practical experience of health workers show that acceptance of referral advice specifically I rural areas is reported to be low contributing to many maternal and perinatal morbidity and mortality.

Why women acceptance to referral is low?

Several factors contributes to this.

- Perceptions of risk and complications in pregnancy and childbirth - The community's own assessment of whether the problem was serious might differ from the health workers' opinion and ANC guidelines. In many cases it is reported that community members do not measure the risk the same weight of importance as health workers and then make wrong decisions like just delivering at lower facility while were given referral due to maternal risk factors.

- Previous experience of referral- Some women previously delivered safely though referred at first place and this tend to suggest to community members that health workers are sometimes just exaggerating situations.

- Other reasons include cost of transport and living at the referral hospital, perceptions of quality of care at hospitals and upgraded health centers, community lack of right understanding about risks associated with pregnancy and importance of referral, great community fear for caesarian section associated with referrals.

1. **Aims statement** – what are we trying to accomplish

   The aim is to increase the number of women who accept referral recommendations by health worker according to guidelines

   At the moment there are no figures to show how bad the situation is, only verbal comments from the health practioners. But we will establish the situation from retrospective data reviews and set baseline and improvement target.

Through use of community set up, community health workers and village executive officers can help a lot in improving community knowledge on referrals and hence improve acceptance rate.

2. How we know that a change is an improvement?

Process measure

Various measures will be deployed to see the progress of change ideas implementation

c. Proportion of women with risk factors against all women visited by volunteer
d. Number of women with danger signs visited by volunteer

Outcome measures

Using ANC registers at health facility and record on delivered mother we will determine the outcome of delivery place with reference to the delivery referral recommended. With these information we will calculate the percentage of mothers accepted referral over a period of time.

3. What changes can we make that will lead to improvement?

These are change ideas to be implemented at community level

I. Using community health workers to identify pregnant women from facility registers who have been advised to deliver at referral health facility and do home counseling visits on importance of referral suggestion given.
II. Village leaders having a community meeting between mother and her husband on the necessity of accepting referral suggestion
III. Use of women economic groups at community as sensitization and education platform on the importance accepting referral advice

Change Topic 3: Completing 4 Post-natal care visits

Introduction

The postnatal period – defined here as the first six weeks after birth – is critical to the health and survival of a mother and her newborn. The most vulnerable time for both is during the first 24 hours after birth. Lack of care in this time period may result in death or disability as well as missed opportunities to promote healthy behaviors, affecting women, newborns, and children.

Effects on women: Almost half of all postnatal maternal deaths occur during the first week after the baby is born, and the majority of these occur during the first 24 hours after childbirth. Hemorrhage, sepsis and infection contributes to the majority of these deaths. Again, this is a stressful time for new mothers, so emotional and psychosocial support should be available to reduce the risk of depression.

Effects on newborns: Sub-Saharan Africa has the highest rates of neonatal mortality in the world and has shown the slowest progress in reducing newborn deaths, especially deaths in the first week of life. Each year, at least 1.16 million African babies die in the first 28 days of life – and 850,000 of these babies do not live past the week they are born. Asphyxia, preterm birth complications, infections contribute the main part of these deaths.

WHAT is routine postnatal care (PNC)?

It includes preventive care and routine assessments to identify and manage or refer complications for both mother and baby. The essential routine PNC may consist of:-

- Assess and check for bleeding, check temperature
- Support breastfeeding, checking the breasts to prevent mastitis
- Manage anaemia, promote nutrition and insecticide treated bed nets, give vitamin A supplementation • Complete tetanus toxoid immunization, if required
- Refer for complications such as bleeding, infections, or postnatal depression
- Counsel on danger signs and home care

Essential routine PNC for all newborns includes:-

- Assessment of danger signs, measure and record weight, and check temperature and feeding
- Support optimal feeding practices, particularly exclusive breastfeeding
- Promote hygiene and good skin, eye, and cord care
- Ensure warmth by delaying the baby's first bath to after the first 24 hours, practicing skin-to-skin care, and putting a hat on the baby
- Encourage and facilitate birth registration
- Refer for routine immunizations
- Counsel on danger signs and home care

At least for 4 post-natal visits are recommended

• First contact - If the mother is in a facility, she and her baby should be assessed within one hour of birth and again before discharge. Encouraging women to stay for 24 hours, especially after a complicated birth, should be considered. If birth occurred at home, the first visit should target the crucial first 24 hours after birth.

• Follow up contacts

- 2nd PNC visit- between 3-7 days after delivery
- 3rd PNC visit – between 7-28 days after delivery
- 4th PNC visit between 28-42 days after delivery

• Extra contacts- for babies needing extra care (LBW or those whose mothers have HIV) should have two or three visits in addition to the routine visits

WHERE should PNC be provided and WHO can provide it?

At a facility: This is more likely if the mother gives birth in the health facility. However, there are challenges, women and babies do not necessarily receive effective PNC before discharge from the health facility, and even if mothers initially come to facilities for birth, they may not return back for PNC.

• Through outreach services: A skilled provider can visit the home to offer PNC to the mother and baby

• Home visits from a community health worker (CHW): Where health systems are not as strong and human resources are limited, certain tasks can be delegated to CHW, linking to health facilities for referral as required.

• Combination of care in the facility and at home: PNC may be provided in the health facility following childbirth. Then, at home during the first crucial two to three days, with subsequent visits to the facility after six to seven days and six weeks when the mother is better able to leave her home.

1. Aims statement – what are we trying to accomplish

Across the continuum of care, significant disruptions occur in the continuity of services from the antenatal period to the postnatal period. For example, 95 % of pregnant women in Tanzania make at least one antenatal visit while 50 % deliver with a skilled birth attendant, yet only 35 % of Tanzanian women receive a postnatal checkup (DHS 2010).

In this community context, community strategies which may include use of community health workers and village leaders are expected to encourage the mother to attend postnatal appointments at the health facility according to the following schedule – i) Within 48 h in case of home deliveries ii) Within seven days iii) At 28 days iv) At 42 days

With this change topic we aim to increase the number of delivered women completing recommended 4 or more postnatal care visits.

2. How do we know that a change is an improvement?

Process measure

Various measures will be deployed to see the progress of change ideas implementation

- Number of delivered women who were visited for PNC knowledge counseling visit

Outcome measures

Using PNC registers at health facility we will determine the outcome by looking on the trends of number of women delivered at the facility/ women who returned or received PNC with respect to each postnatal care visit round (within 48 hrs,7 days, 28 and 42 days).

Measuring at community level, community health workers will have to get information from PNC registers to see if their clients completed PNC visits or not.

3. What changes can we make that will lead to improvement?

These are the change ideas implemented at community level to improve PNC

1. Using community health workers to identify recently delivered women and do home counseling visits on importance of attending PNC attendance as well as completing the visits
2. Village leaders community sensitization and follow up on the PNC visits
3. Use of women group at community as sensitization and education platform on the PNC importance

Change topics implementation timeline

Districts	Tandahimba & Newala TC								Masasi DC & Masasi TC							
Year	2017		2018			2019			2017		2018			2019		
Change Topics	Aug	Dec	Apr	Aug	Dec	Apr	Sept	Dec	Aug	Dec	Apr	Aug	Dec	Apr	Sept	Dec
Early ANC Visit	x								Not started	x						
4+ ANC visits	x									x						
4 PNC Visits			x									x				
Referral Obedience		x									x					
Knowledge on Newborn danger-signs					x								x			
Knowledge on Maternal danger-signs				x										x		
Community champions					x											x
QI Measurements reinforcements							x								x	

Measurements

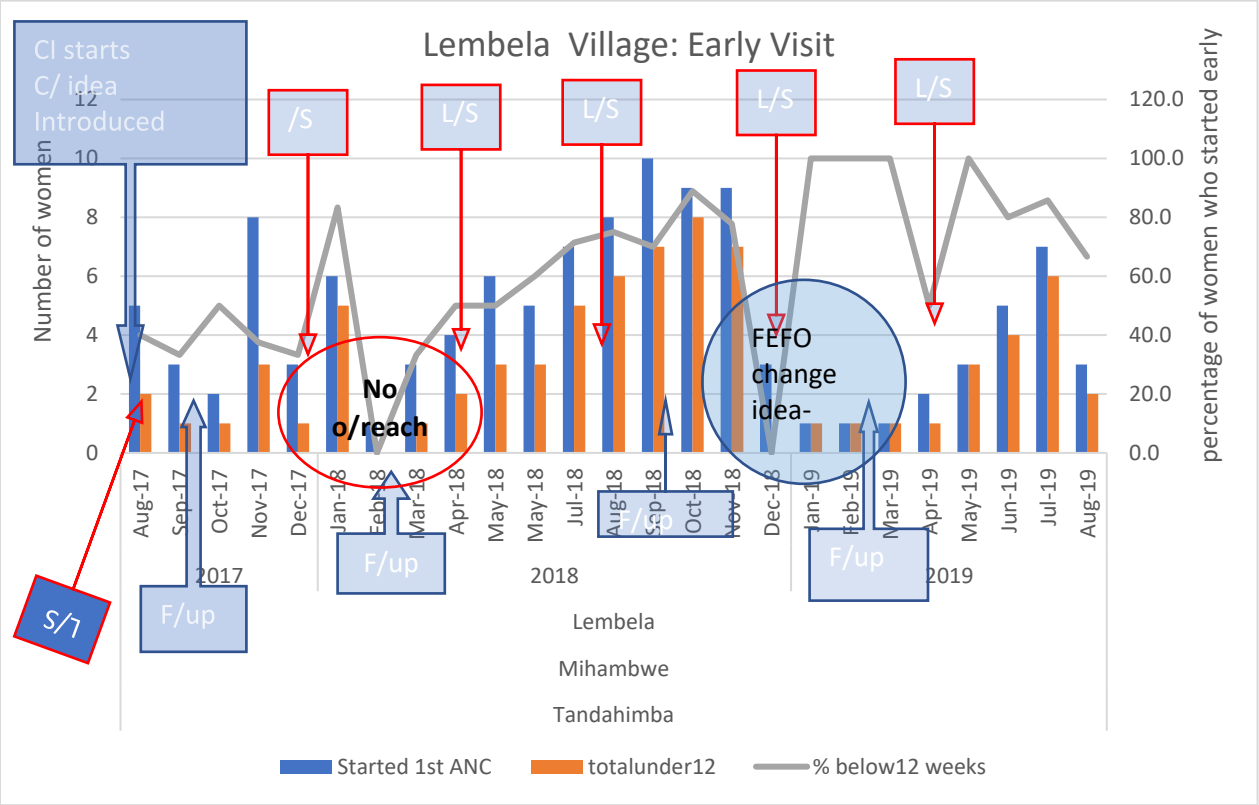
These four change topics were thoroughly measured

Process	Measure	Numerator	Denominator
Early ANC start	Percentage of pregnant women who started ANC with gestation age of below 12 weeks	Number of pregnant women who started 1st ANC Visit at gestation age below than 12 weeks	Number of pregnant women who started 1st ANC visit
ANC visits Completion	Percentage of pregnant women completing at least 4 ANC visits	Number of women who delivered and had 4 or more ANC visits	Number of women who delivered
PNC visits completion	Percentage of delivered mothers who completed 4 PNC visits	Number of Delivered mothers who attended PNC clinics 4 times	Number of women who delivered
Delivery place referral obedience	Percentage of pregnant mothers who delivered at hospital after being referred	Number of women who delivered at hospital among those who were referred	Number of women who were given referral to deliver at hospital due to having delivery risk factors

RUNCHARTS FOR SELECTED VILLAGES ACROSS COUNCILS

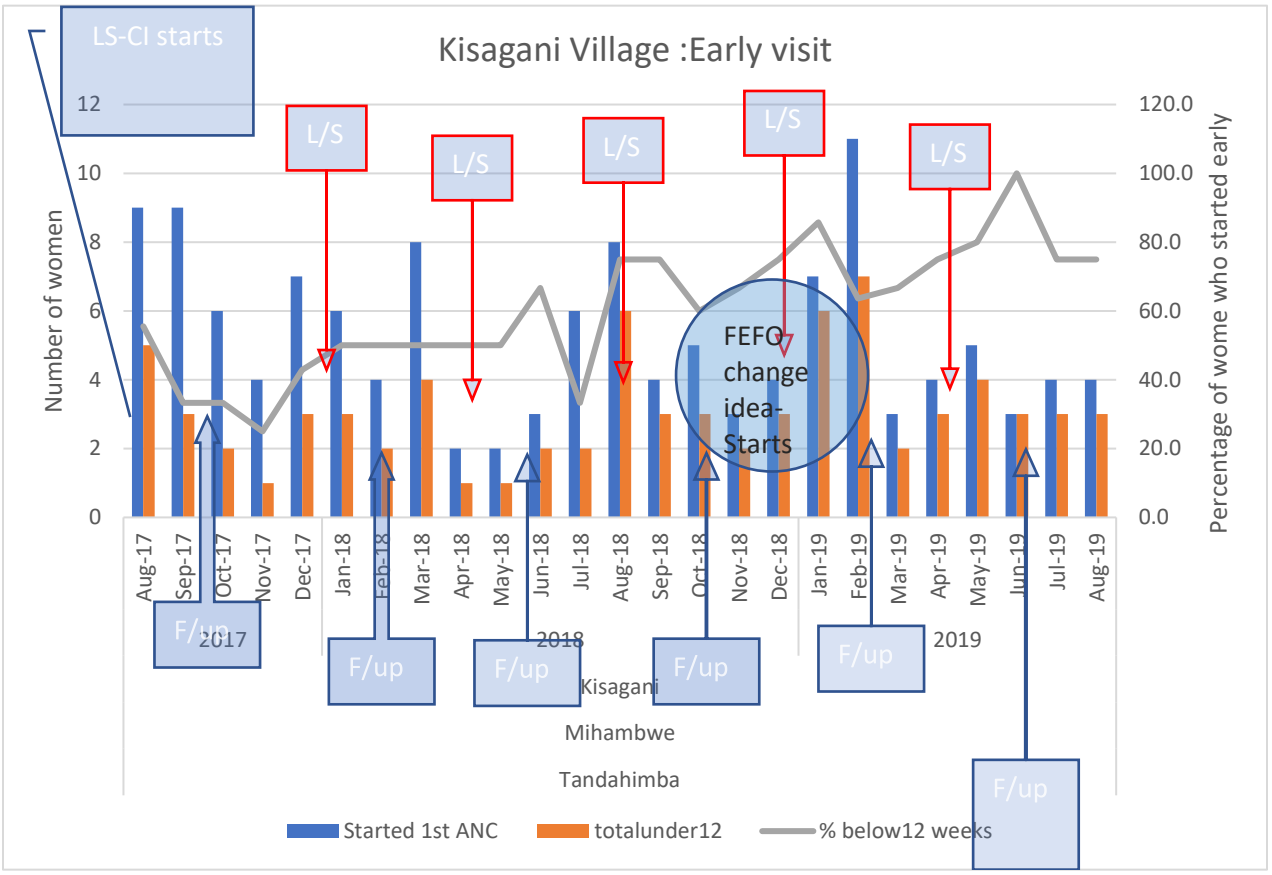
CHANGE TOPIC: EARLY ANC ATTENDANCE

Tandahimba District



Change Ideas at the start

- CHWs Early home identification of women who are pregnant and have not started ANC through
  - Home visits
  - Women group sensitization
  - Village meeting sensitization
- FEFO leaflet- A leaflet that in a very simplified and smoothly flowing, contained a message that educated the community the relationship between Early ANC start, Early Iron and folic acid use has a potential to reduce chance of malformed babies . This in general was designed to bold the reasons for starting Early.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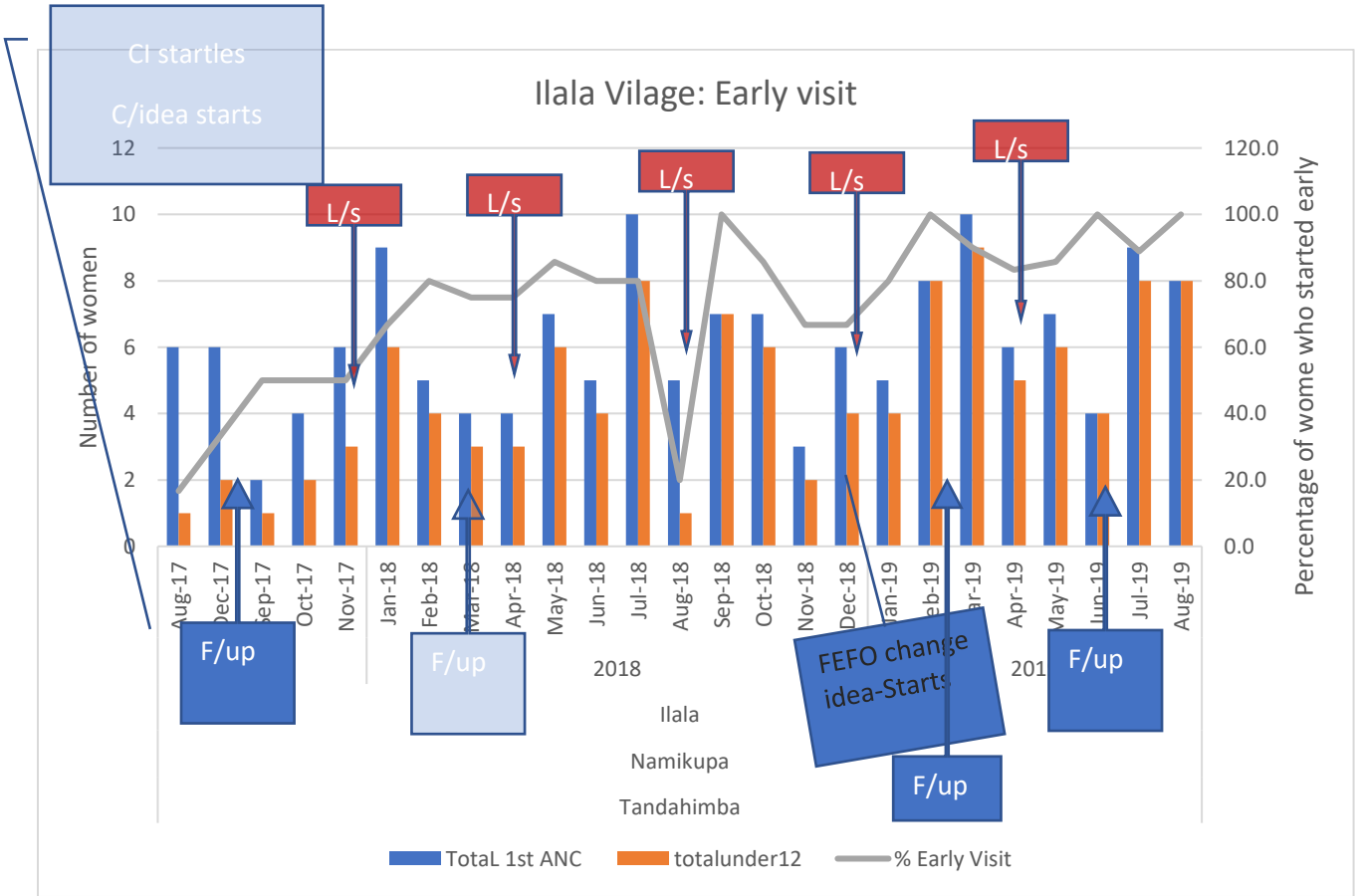
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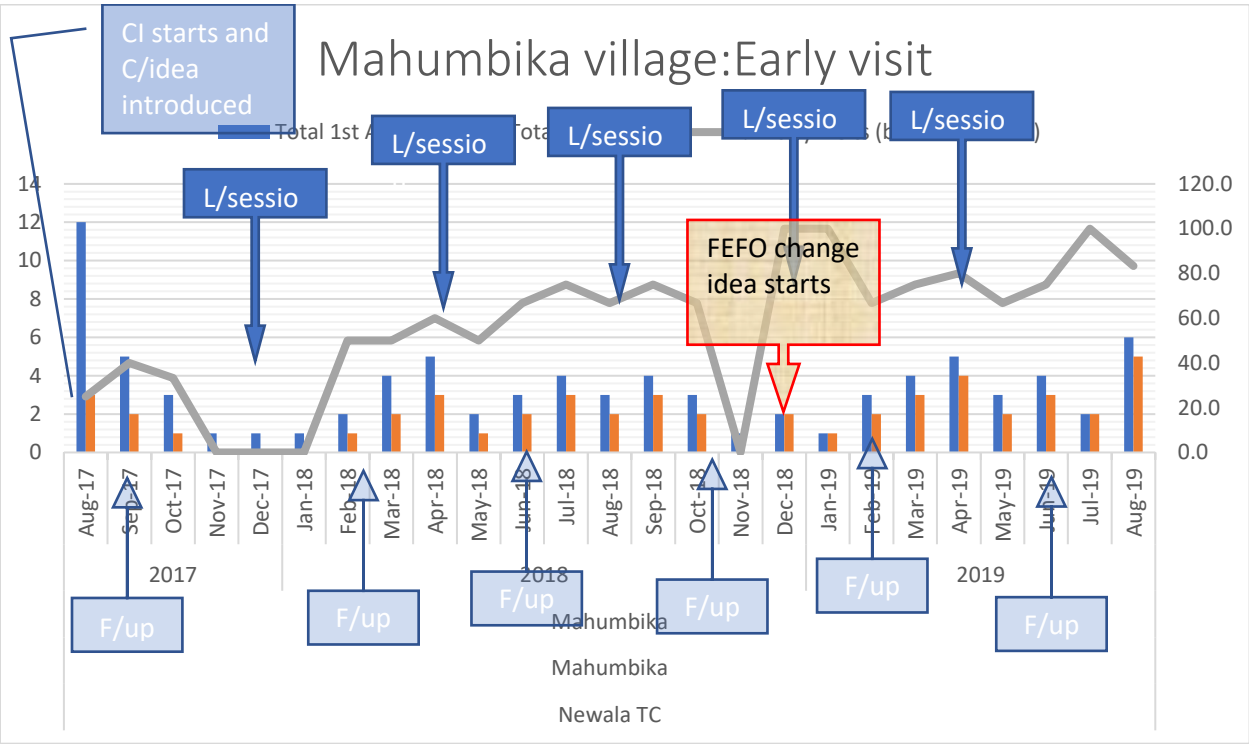
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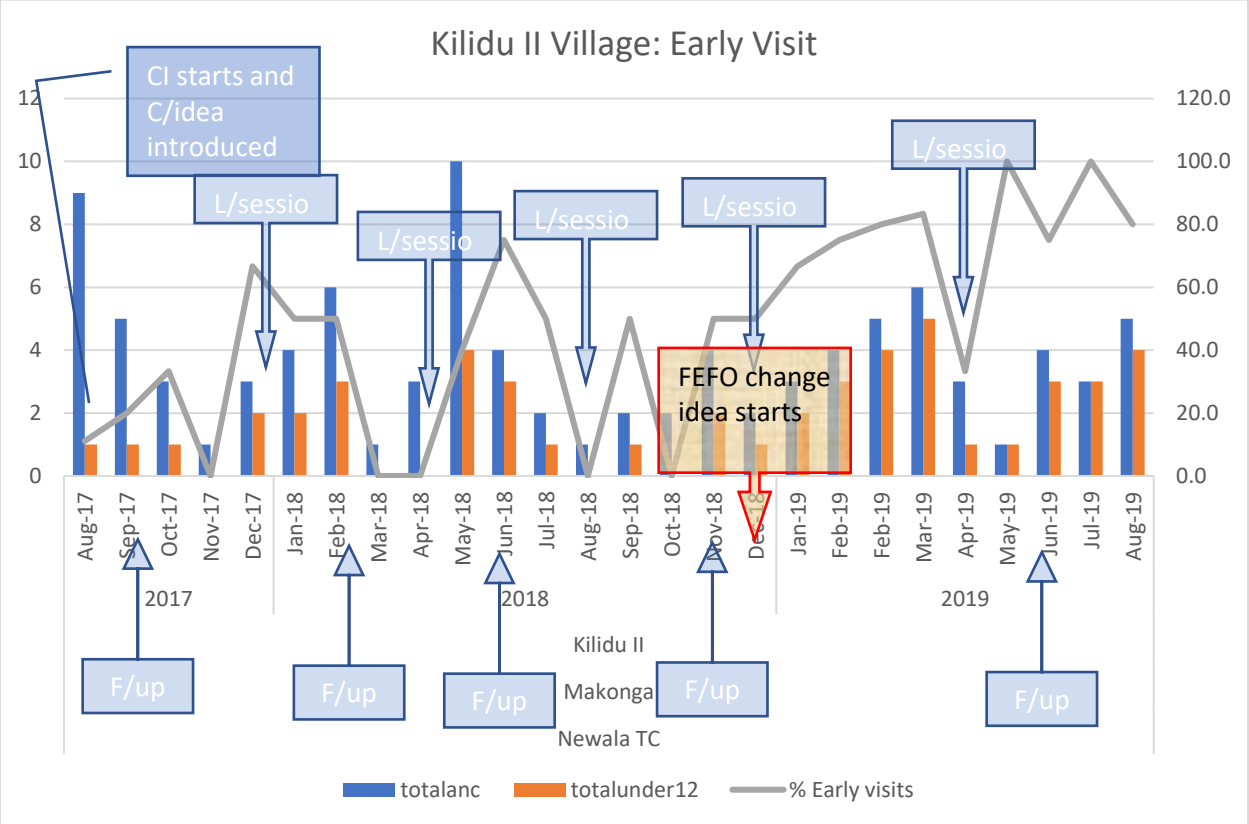
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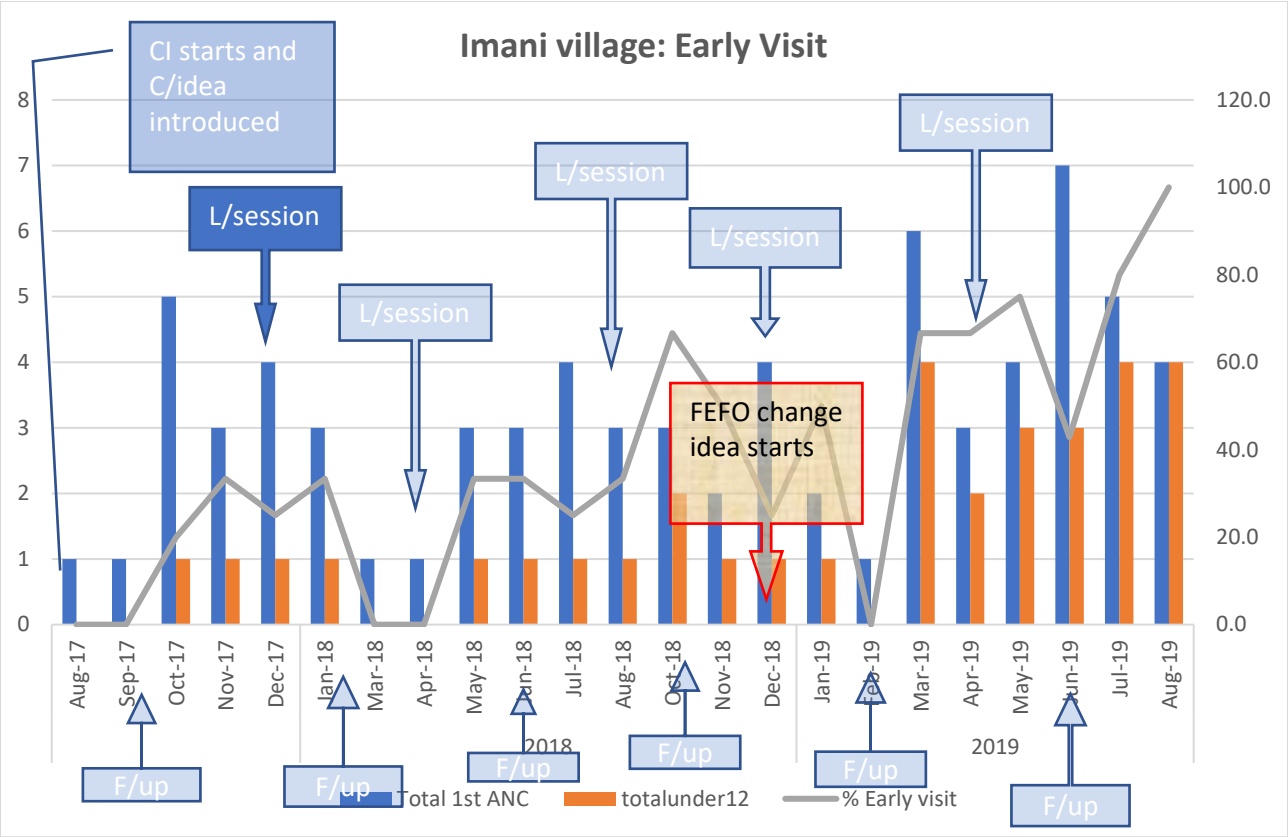
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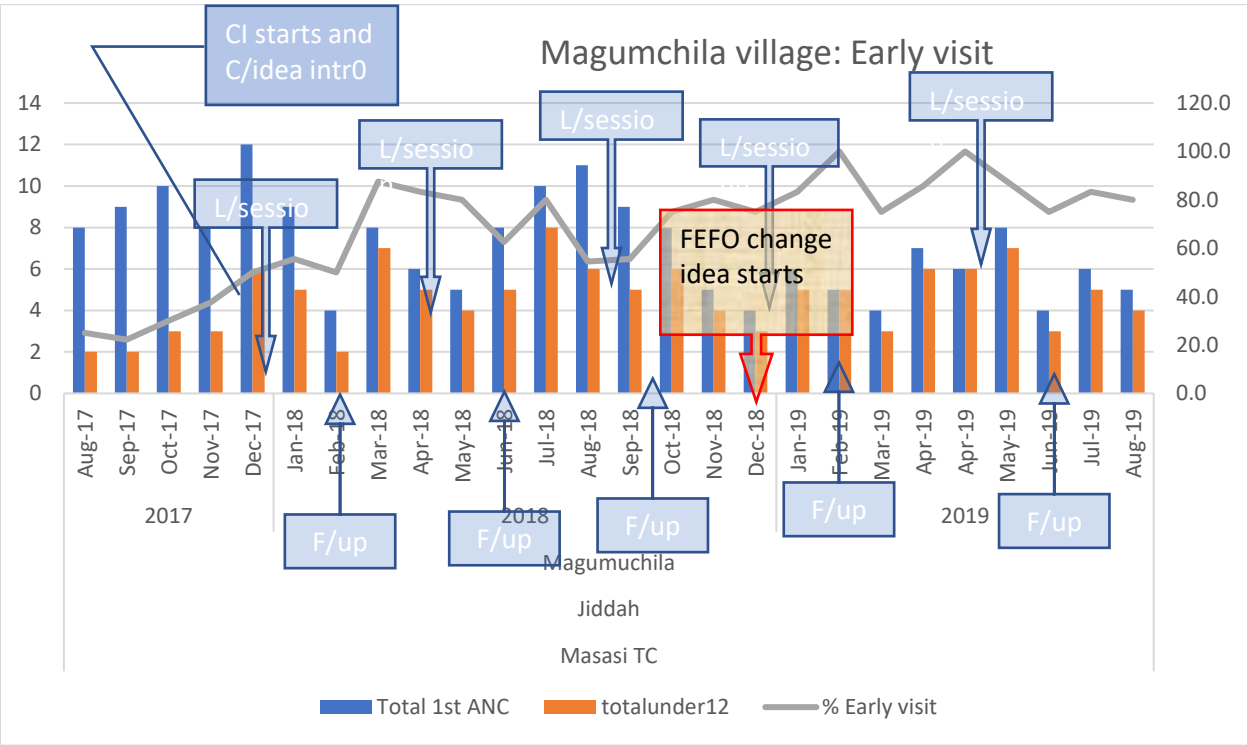
MASASI TC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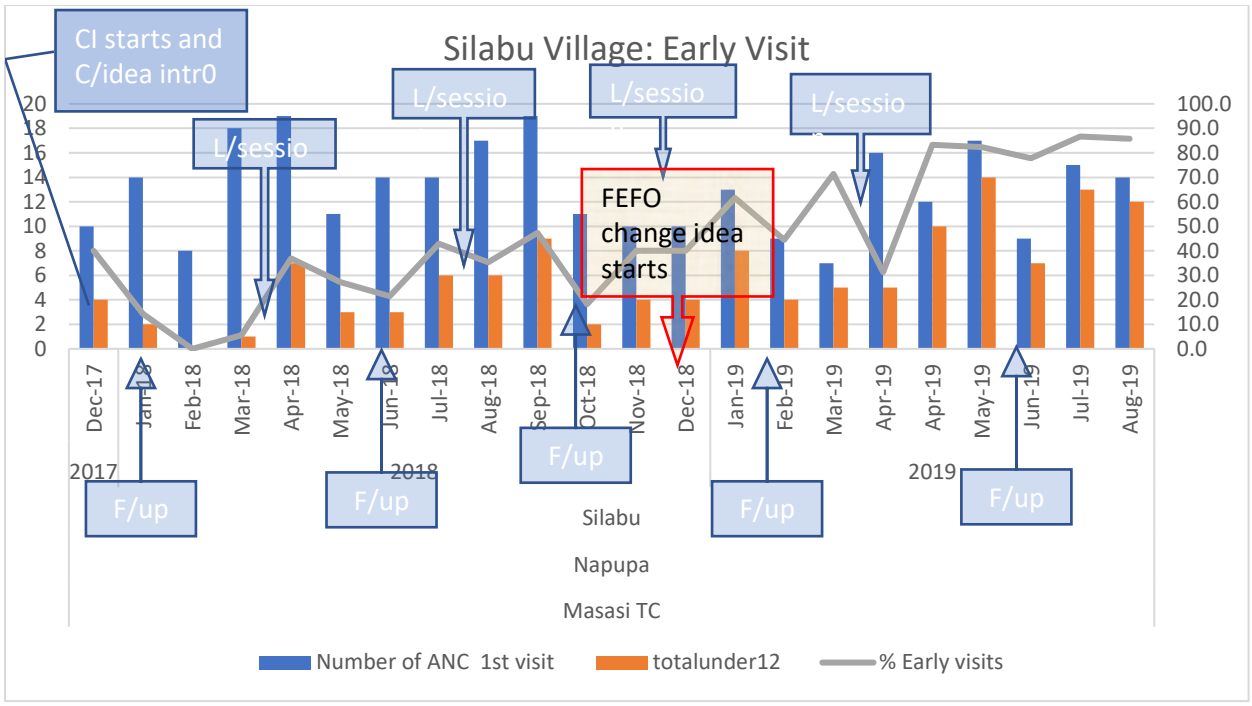
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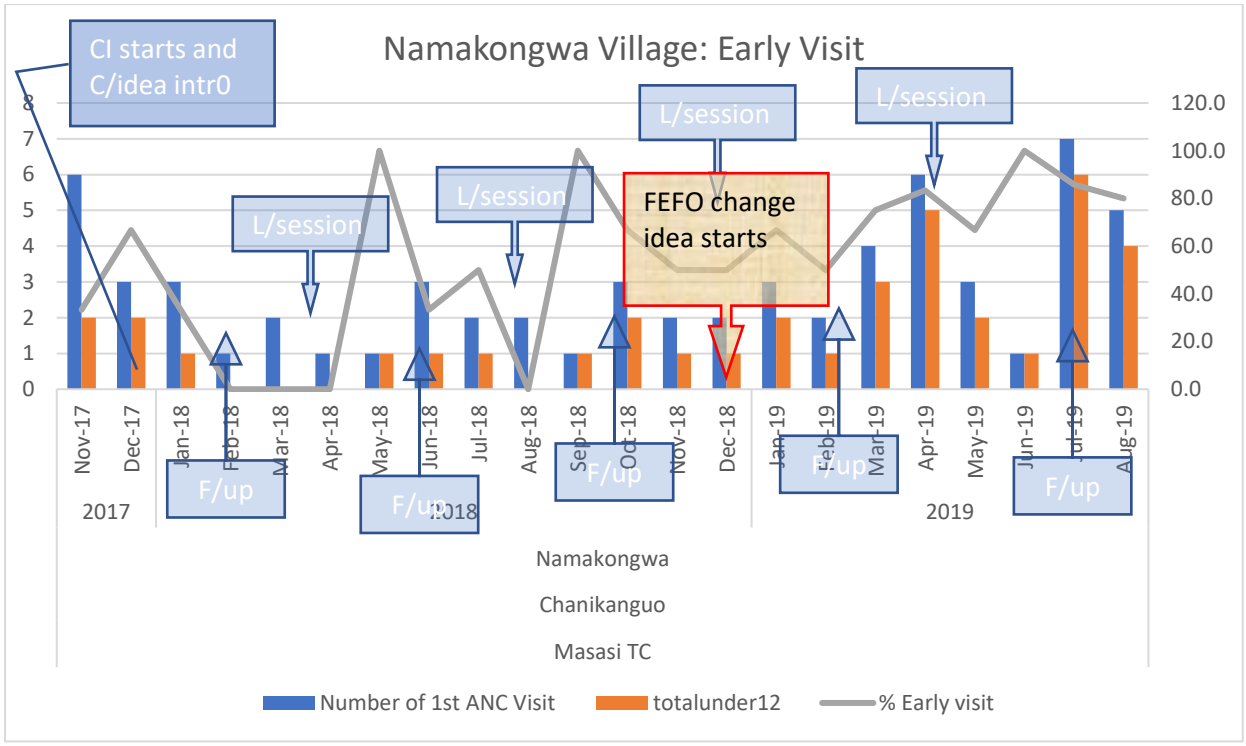
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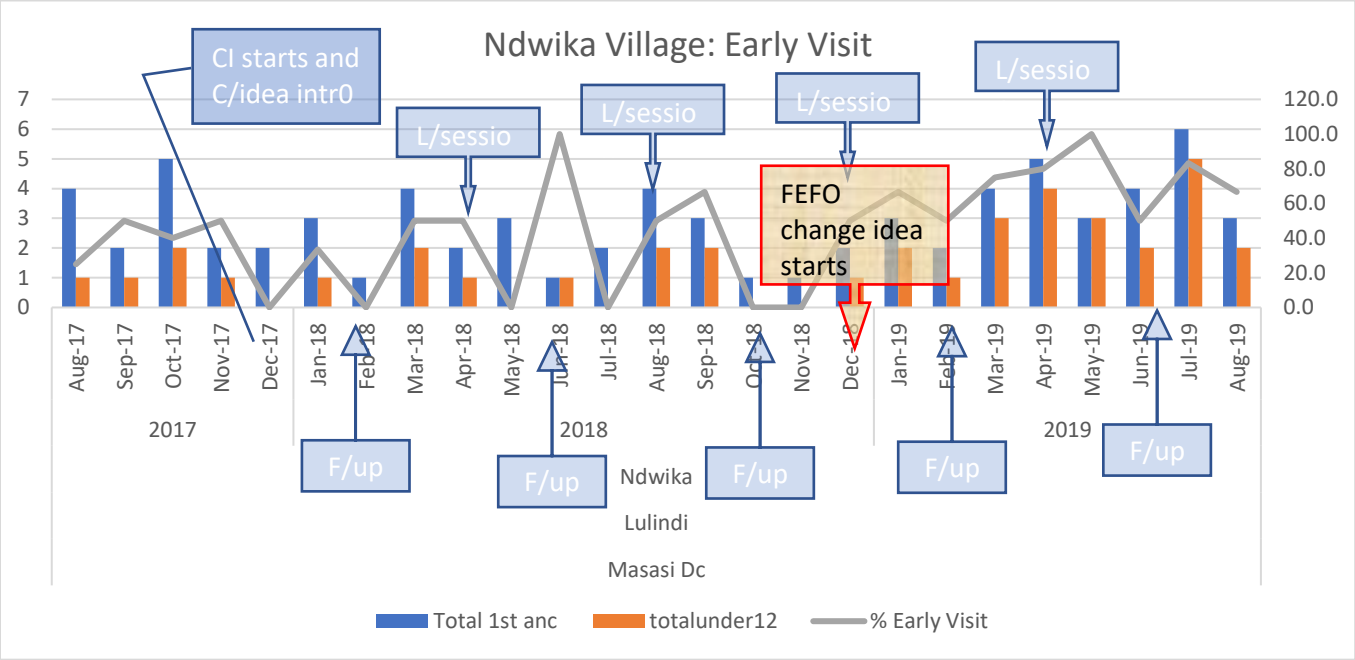
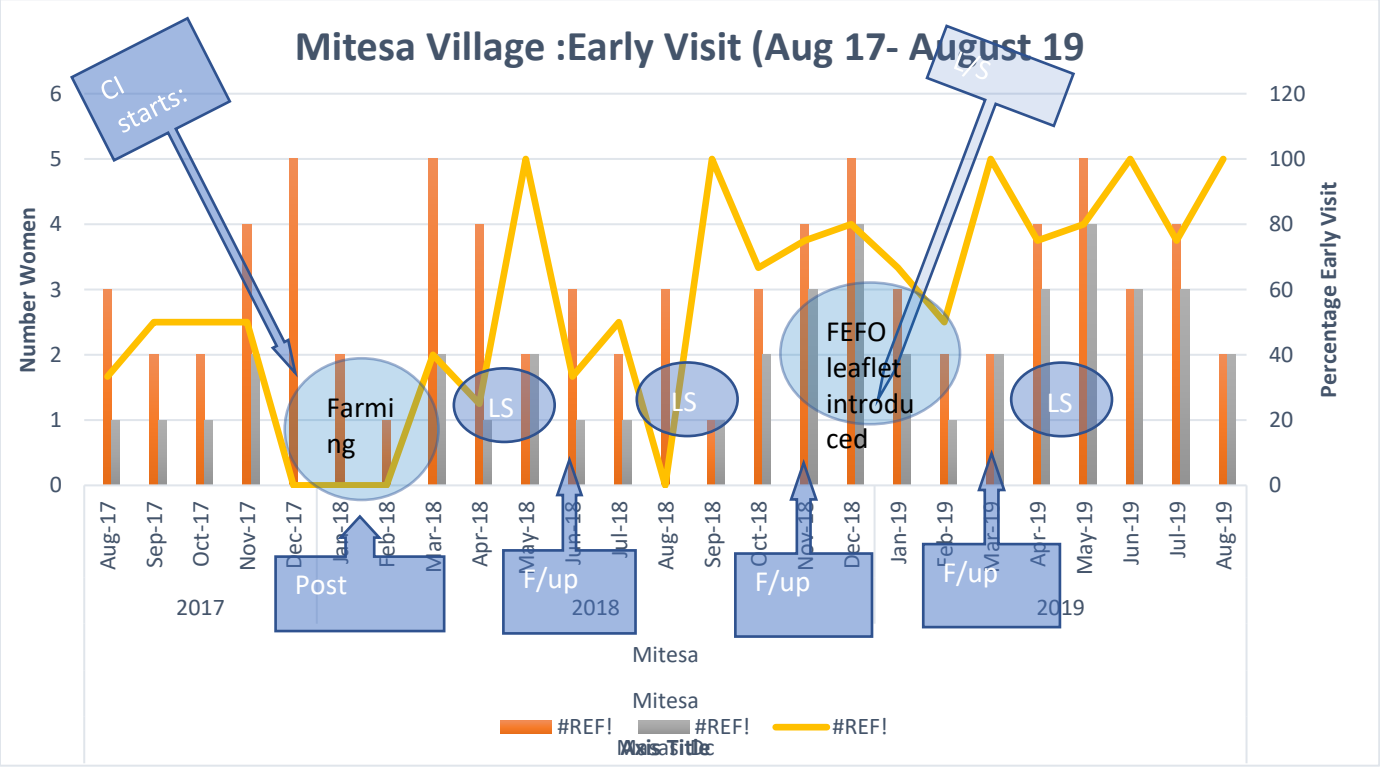
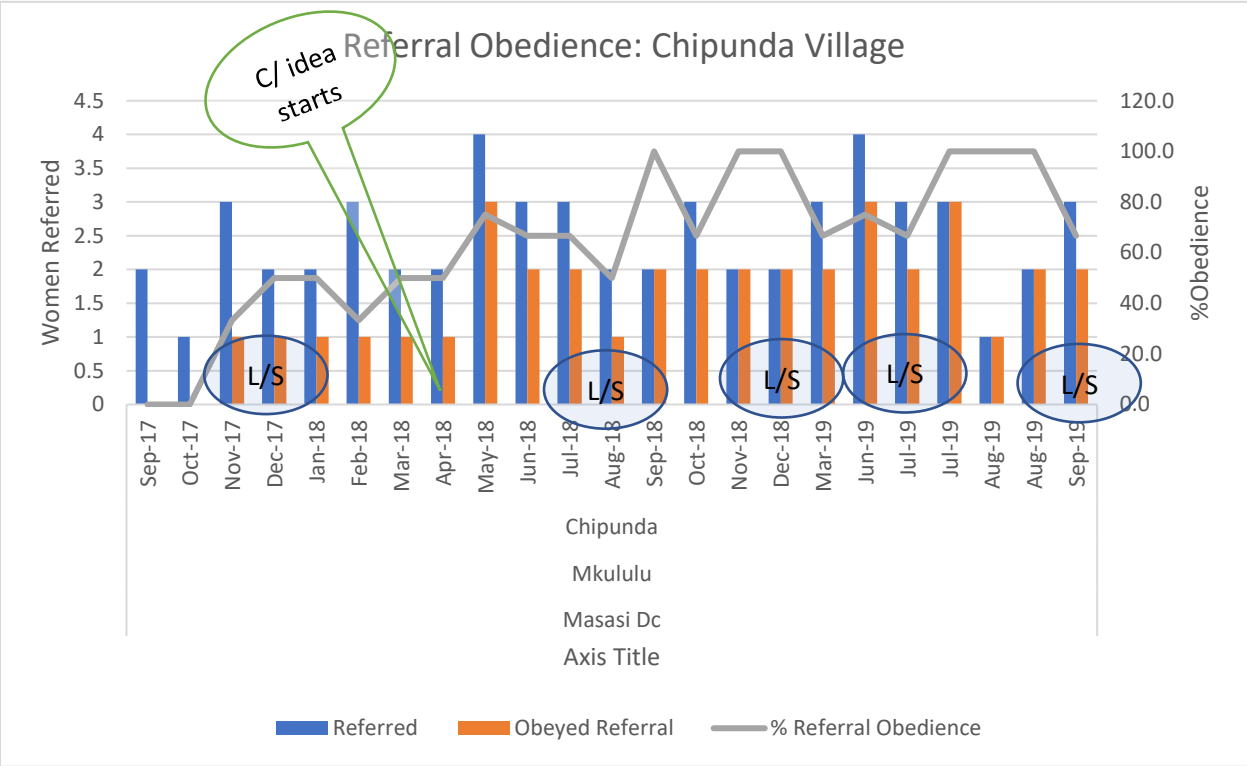
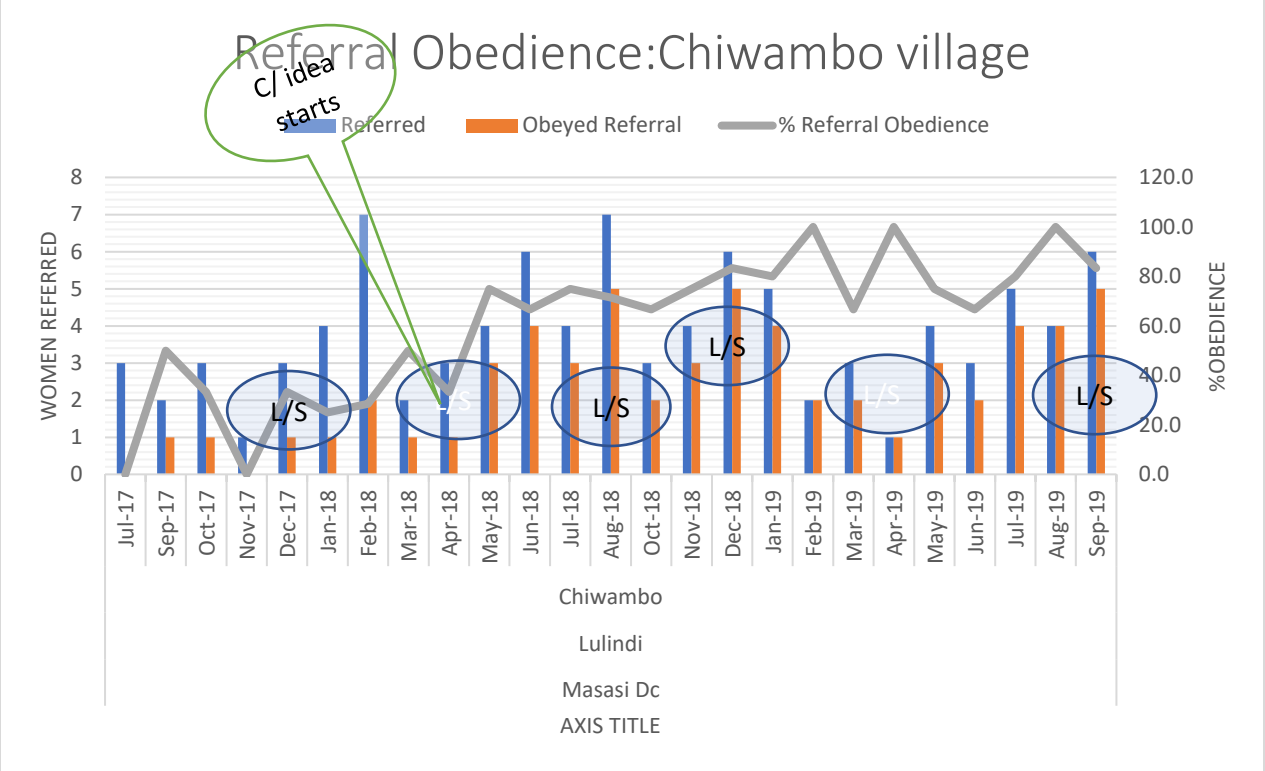
totalunder12
% Early visit

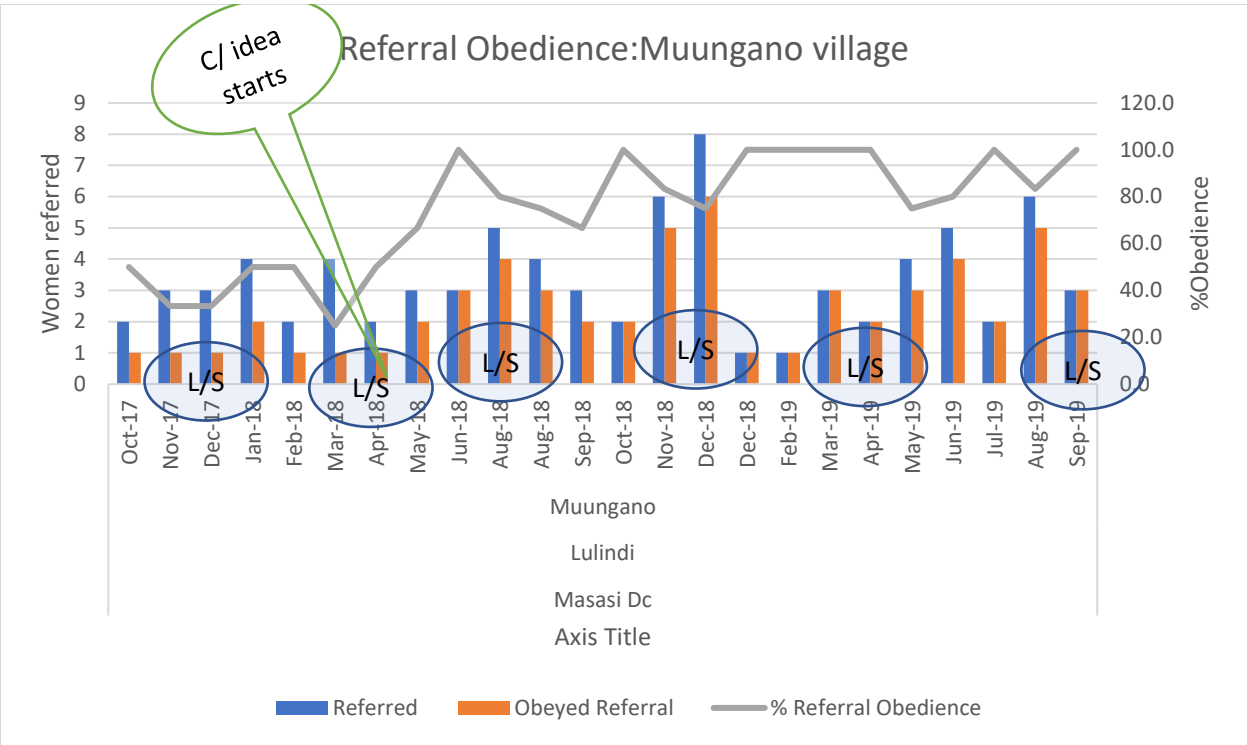

Ndwika Village: Early Visit
CI starts and C/idea intr0
L/sessio
L/sessio
L/sessio
L/sessio
FEFO change idea starts
F/up
F/up
F/up
F/up
F/up
2017
2018
2019
Ndwika
Lulindi
Masasi Dc
Total 1st anc
totalunder12
% Early Visit


Mitesa Village :Early Visit (Aug 17- August 19
CI starts:
Farmi ng
LS
LS
LS
FEFO leaflet introdu ced
Post
F/up
F/up
F/up
2017
2018
2019
Number Women
Percentage Early Visit
Mitesa
Mitesa
#REF!
#REF!
#REF!

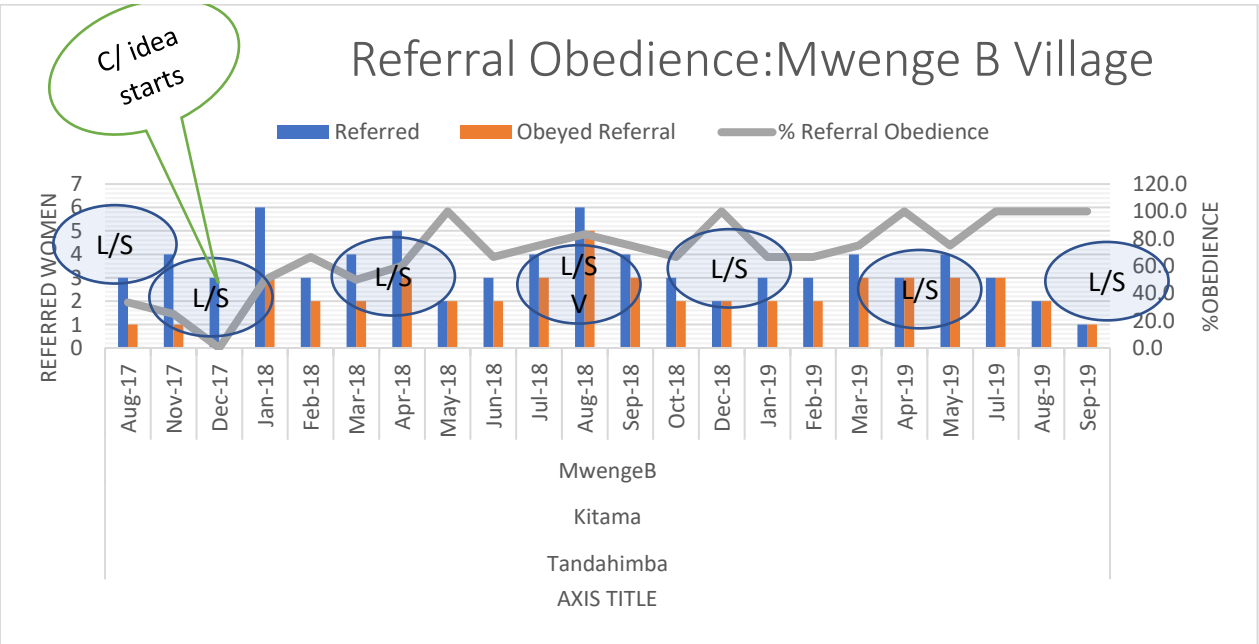
REFERRAL OBEDIENCE

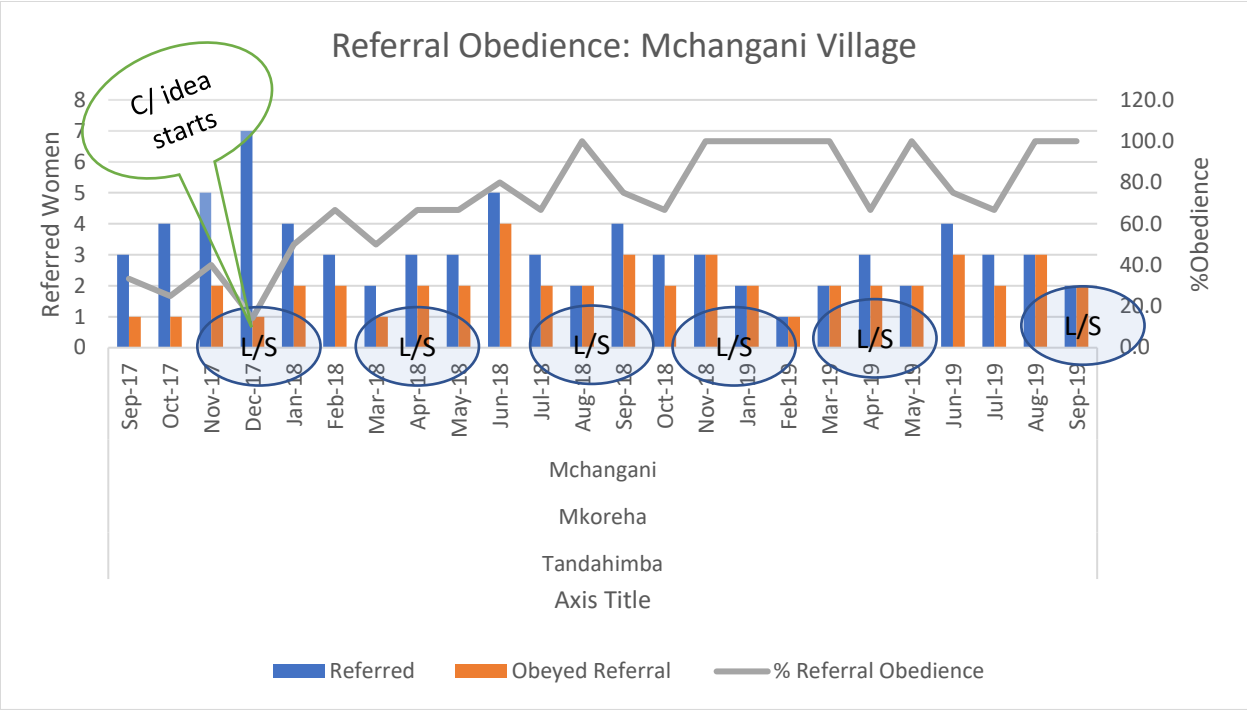


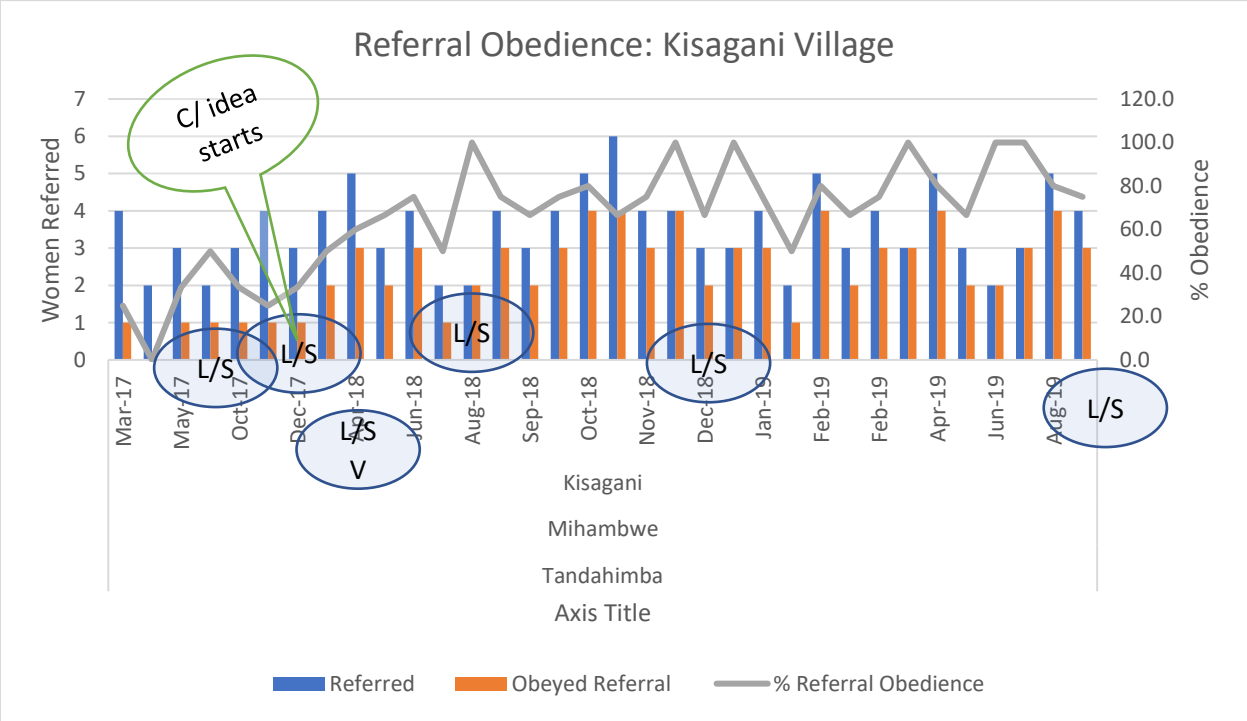


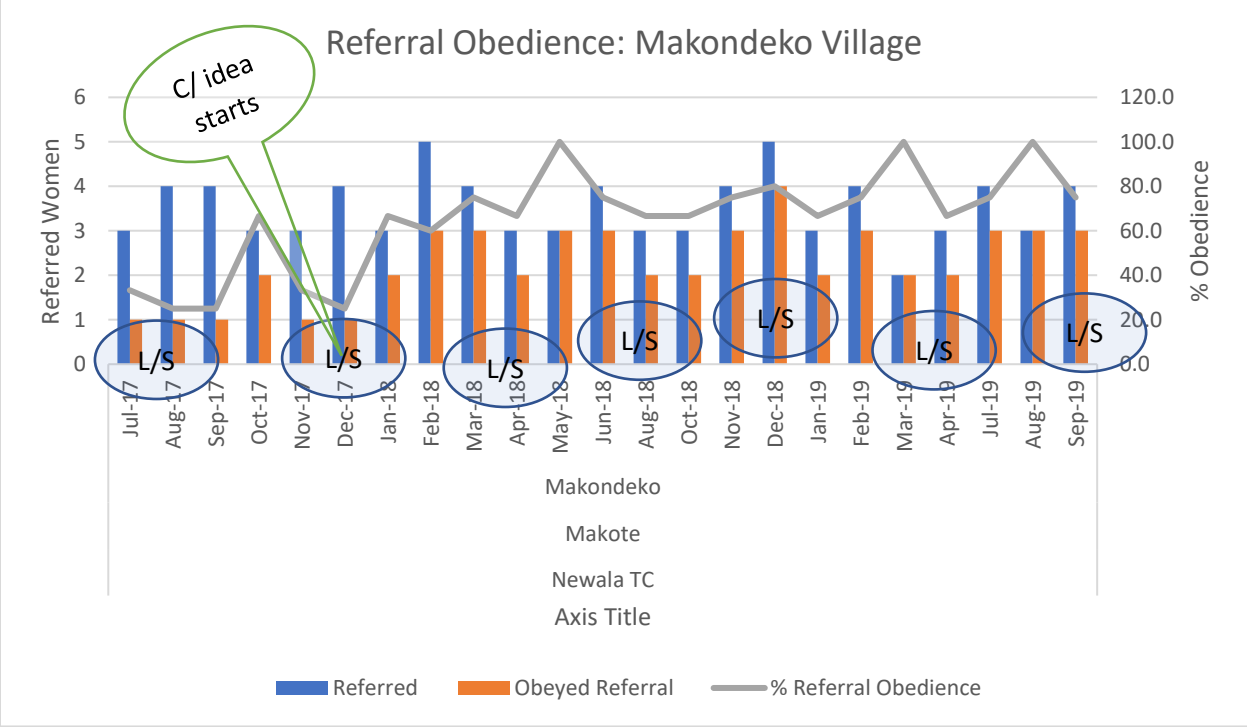

C/ idea starts
Referral Obedience:Muungano village
Women referred
%Obedience
L/S
Muungano
Lulindi
Masasi Dc
Axis Title
Referred
Obeyed Referral
% Referral Obedience

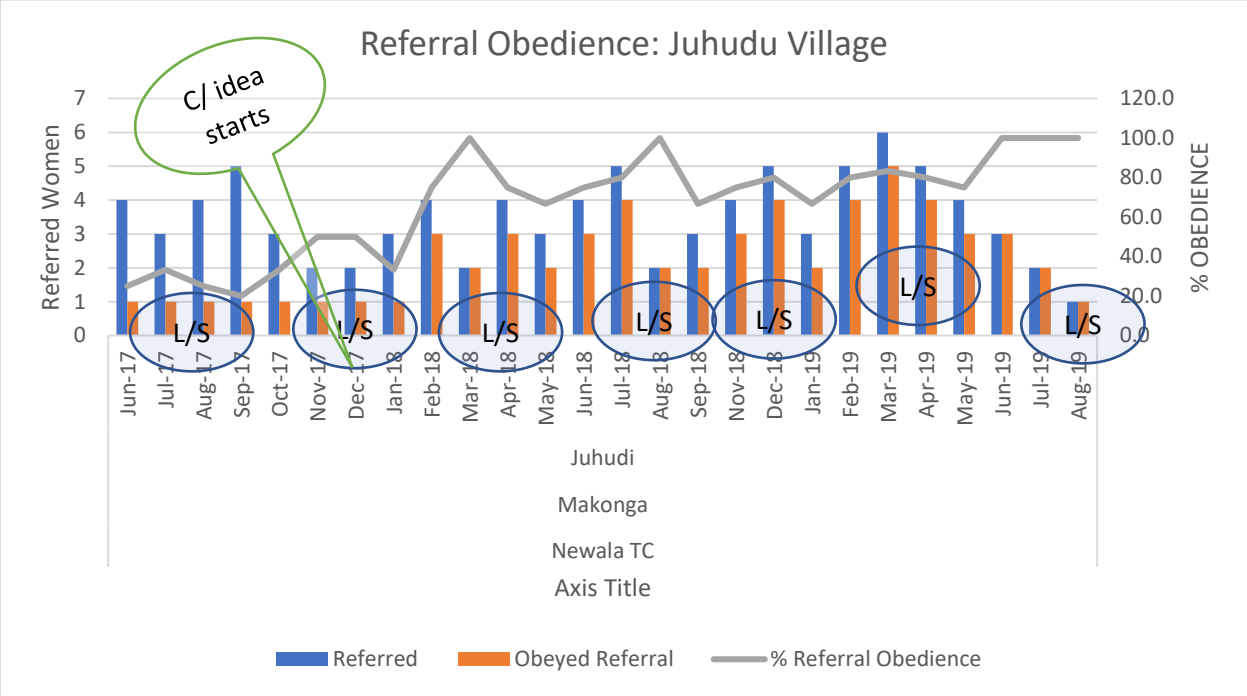
Tandahimba

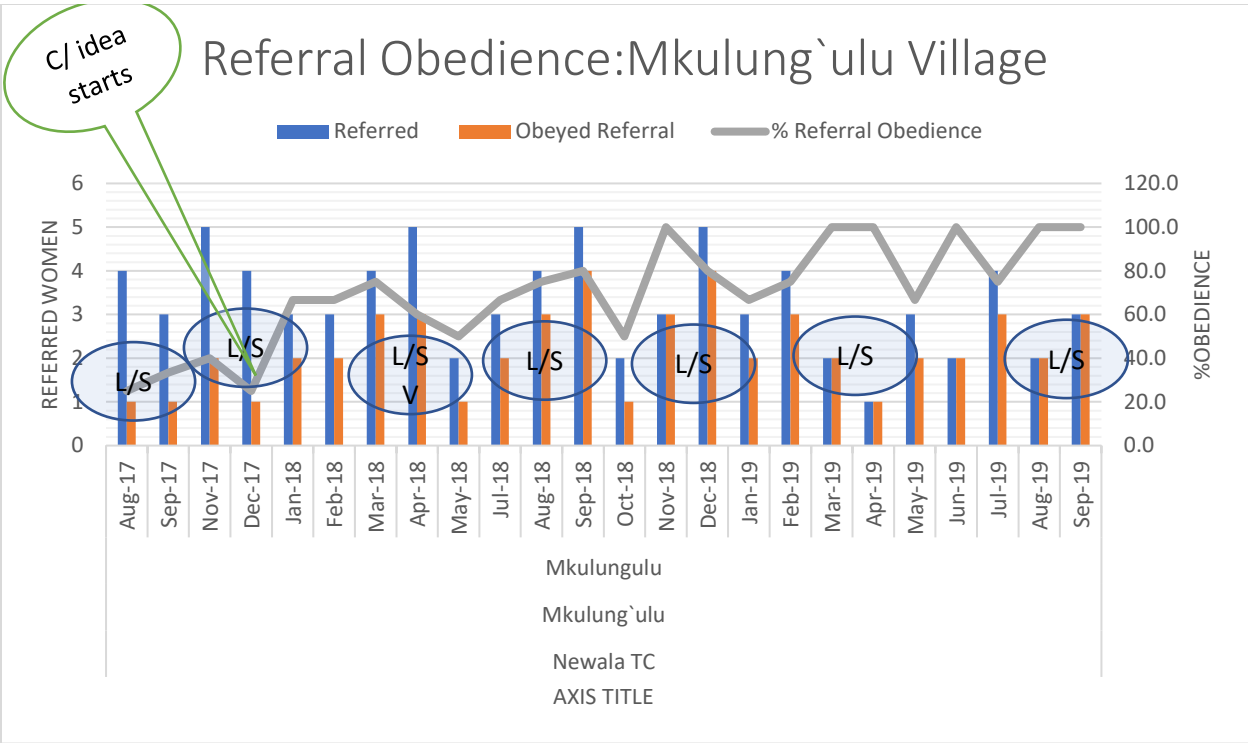

C/ idea starts
Referral Obedience:Mwenge B Village
Referred
Obeyed Referral
% Referral Obedience
REFERRED WOMEN
%OBEDIENCE
L/S
V
MwengeB
Kitama
Tandahimba
AXIS TITLE


Referral Obedience: Mchangani Village
C/ idea starts
Referred Women
%Obedience
L/S
Mchangani
Mkoreha
Tandahimba
Axis Title
Referred
Obeyed Referral
% Referral Obedience


Referral Obedience: Kisagani Village
C/ idea starts
Women Referred
% Obedience
L/S
V
Kisagani
Mihambwe
Tandahimba
Axis Title
Referred
Obeyed Referral
% Referral Obedience

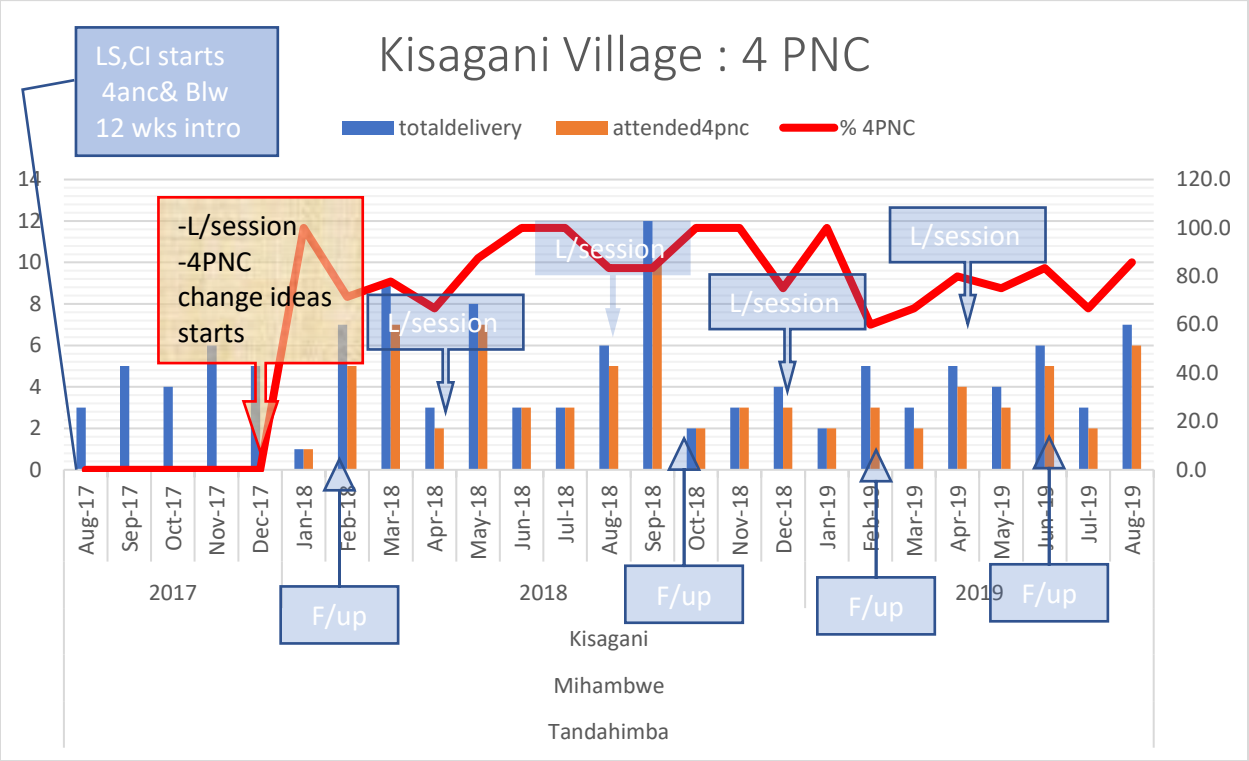

Referral Obedience: Makondeko Village
C/ idea starts
Referred Women
% Obedience
L/S
Makondeko
Makote
Newala TC
Axis Title
Referred
Obeyed Referral
% Referral Obedience

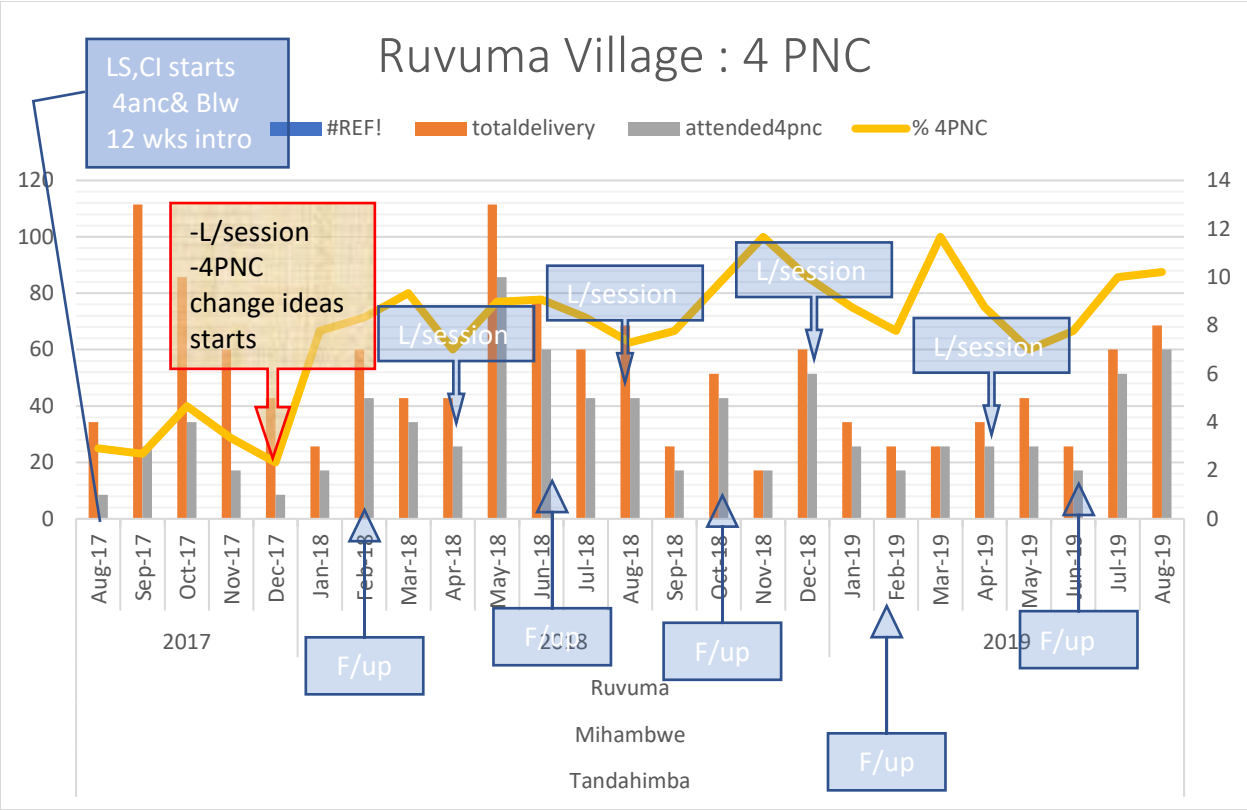

Referral Obedience: Juhudu Village
C/ idea starts
Referred Women
% OBEDIENCE
L/S
Juhudi
Makonga
Newala TC
Axis Title
Referred
Obeyed Referral
% Referral Obedience

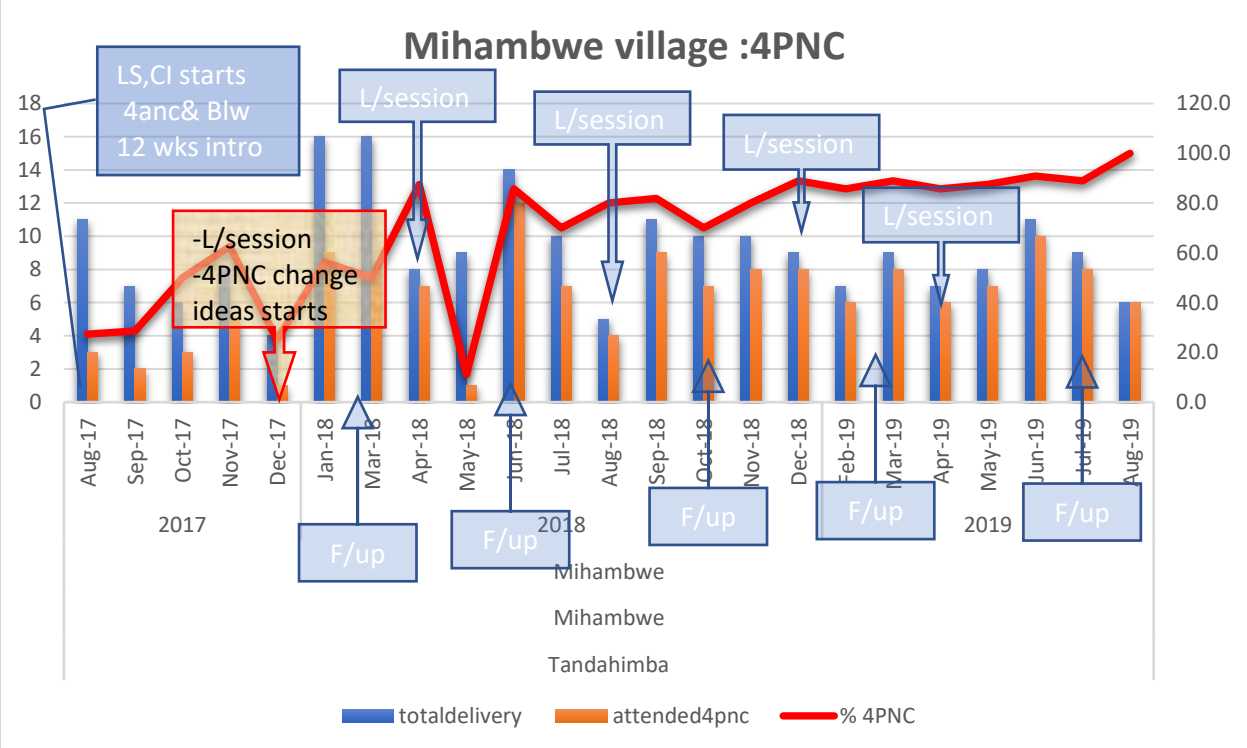

C/ idea starts
Referral Obedience:Mkulung`ulu Village
Referred
Obeyed Referral
% Referral Obedience
REFERRED WOMEN
%OBEDIENCE
L/S
L/S
L/S
V
L/S
L/S
L/S
L/S
L/S
Aug-17
Sep-17
Nov-17
Dec-17
Jan-18
Feb-18
Mar-18
Apr-18
May-18
Jul-18
Aug-18
Sep-18
Oct-18
Nov-18
Dec-18
Jan-19
Feb-19
Mar-19
Apr-19
May-19
Jun-19
Jul-19
Aug-19
Sep-19
Mkulungulu
Mkulung`ulu
Newala TC
AXIS TITLE

CHANGE TOPIC: 4 POST-NATAL CARE ATTENDANCE

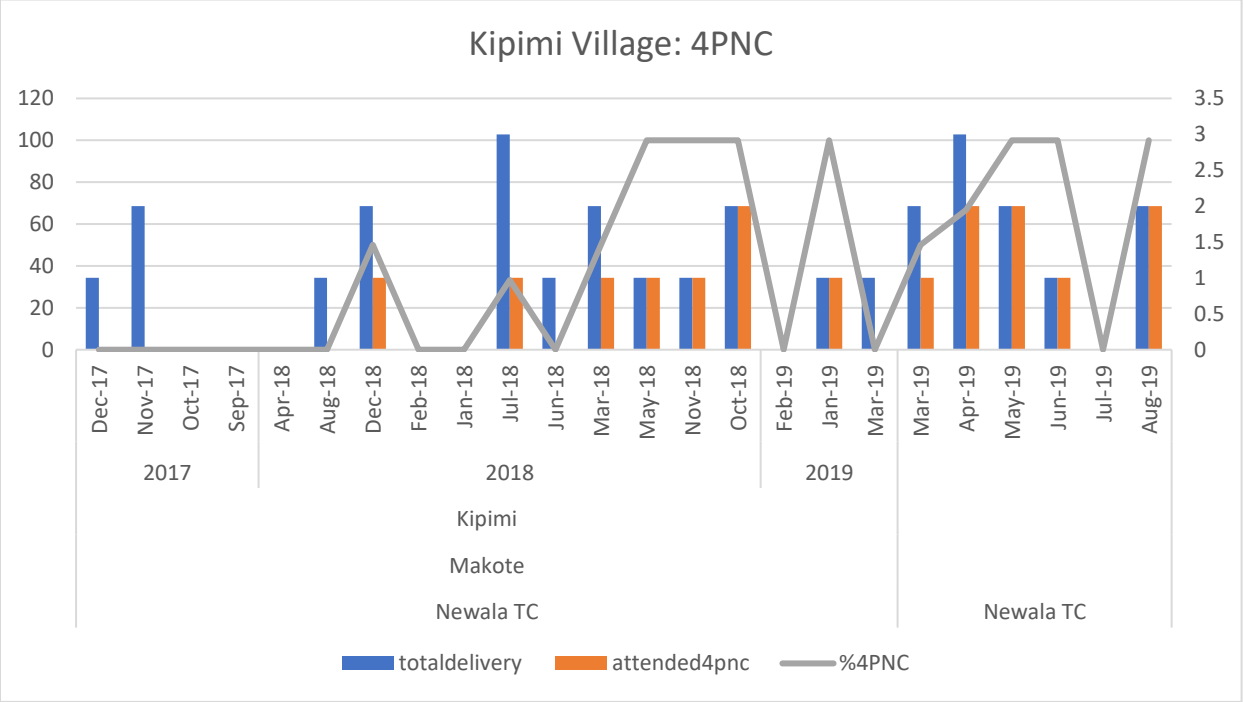
TANDAHIMBA DISTRICT

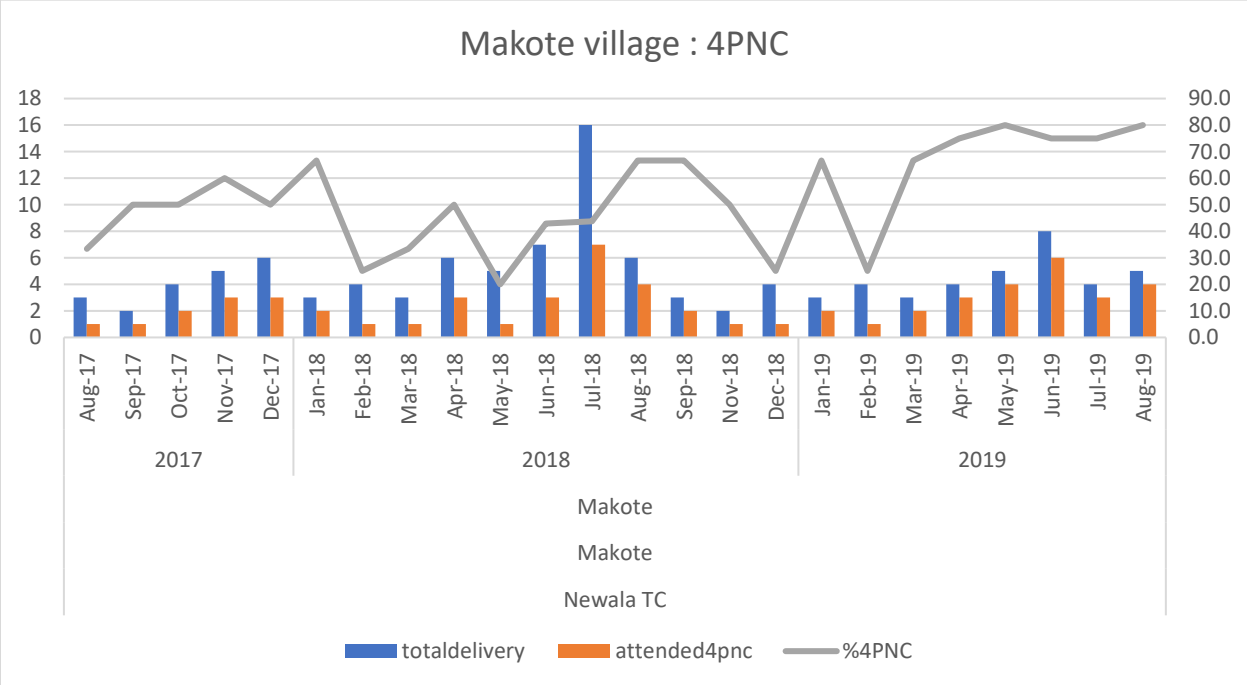



Ruvuma Village : 4 PNC
LS,CI starts 4anc& Blw 12 wks intro
#REF!
totaldelivery
attended4pnc
% 4PNC
-L/session -4PNC change ideas starts
L/session
F/up
2017
2018
2019
Ruvuma
Mihambwe
Tandahimba


Mihambwe village :4PNC
LS,CI starts 4anc& Blw 12 wks intro
-L/session -4PNC change ideas starts
L/session
F/up
2017
2018
2019
Mihambwe
Mihambwe
Tandahimba
totaldelivery
attended4pnc
% 4PNC

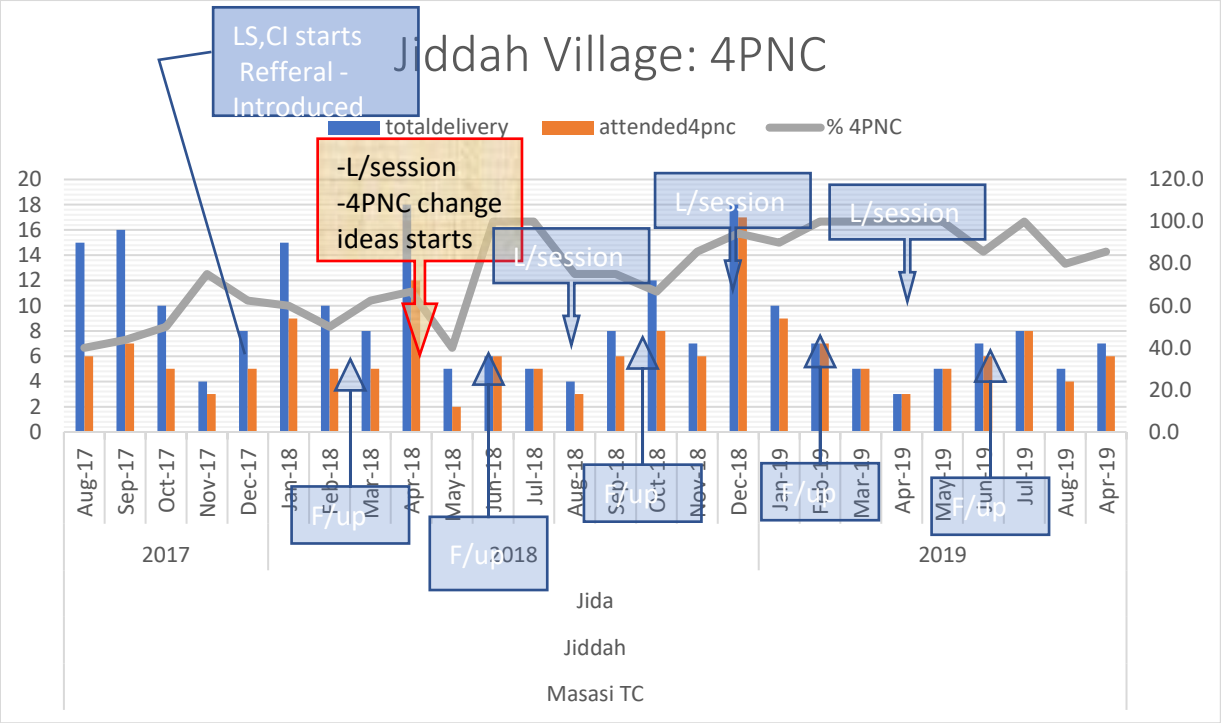
NEWALA TC

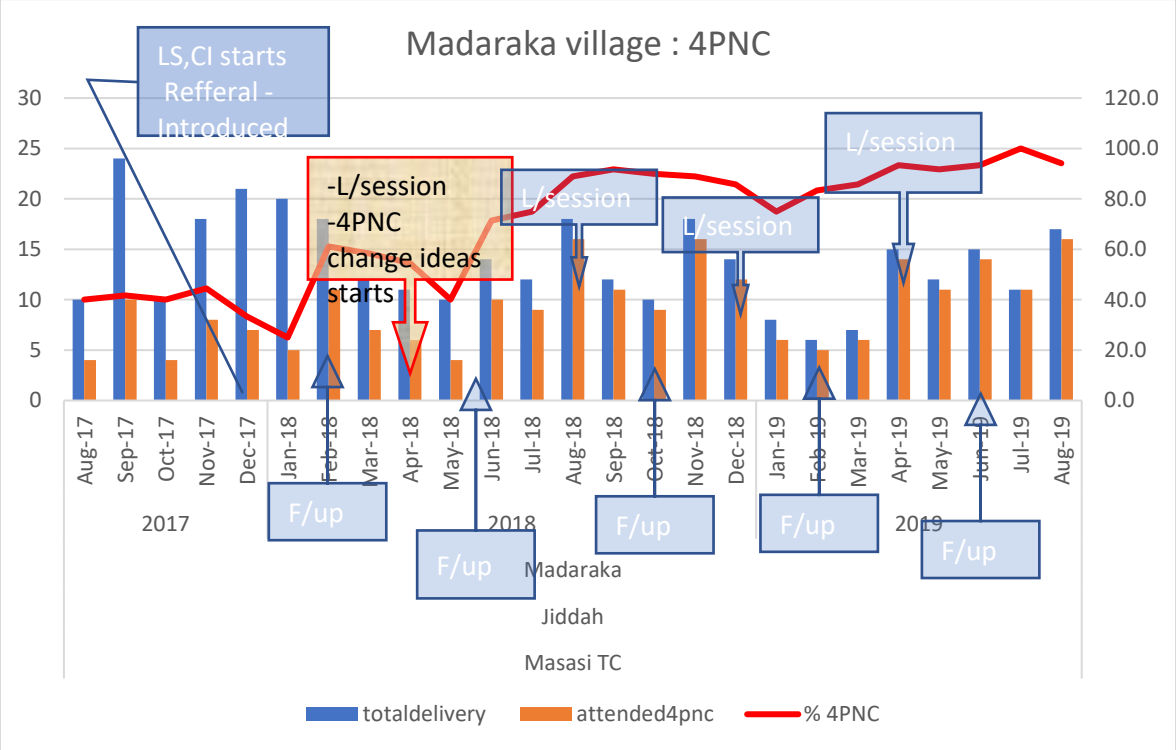

Kipimi Village: 4PNC
120
100
80
60
40
20
0
3.5
3
2.5
2
1.5
1
0.5
0
Dec-17
Nov-17
Oct-17
Sep-17
Apr-18
Aug-18
Dec-18
Feb-18
Jan-18
Jul-18
Jun-18
Mar-18
May-18
Nov-18
Oct-18
Feb-19
Jan-19
Mar-19
Mar-19
Apr-19
May-19
Jun-19
Jul-19
Aug-19
2017
2018
2019
Kipimi
Makote
Newala TC
Newala TC
totaldelivery
attended4pnc
%4PNC


Makote village : 4PNC
18
16
14
12
10
8
6
4
2
0
90.0
80.0
70.0
60.0
50.0
40.0
30.0
20.0
10.0
0.0
Aug-17
Sep-17
Oct-17
Nov-17
Dec-17
Jan-18
Feb-18
Mar-18
Apr-18
May-18
Jun-18
Jul-18
Aug-18
Sep-18
Nov-18
Dec-18
Jan-19
Feb-19
Mar-19
Apr-19
May-19
Jun-19
Jul-19
Aug-19
2017
2018
2019
Makote
Makote
Newala TC
totaldelivery
attended4pnc
%4PNC

MASASI TC

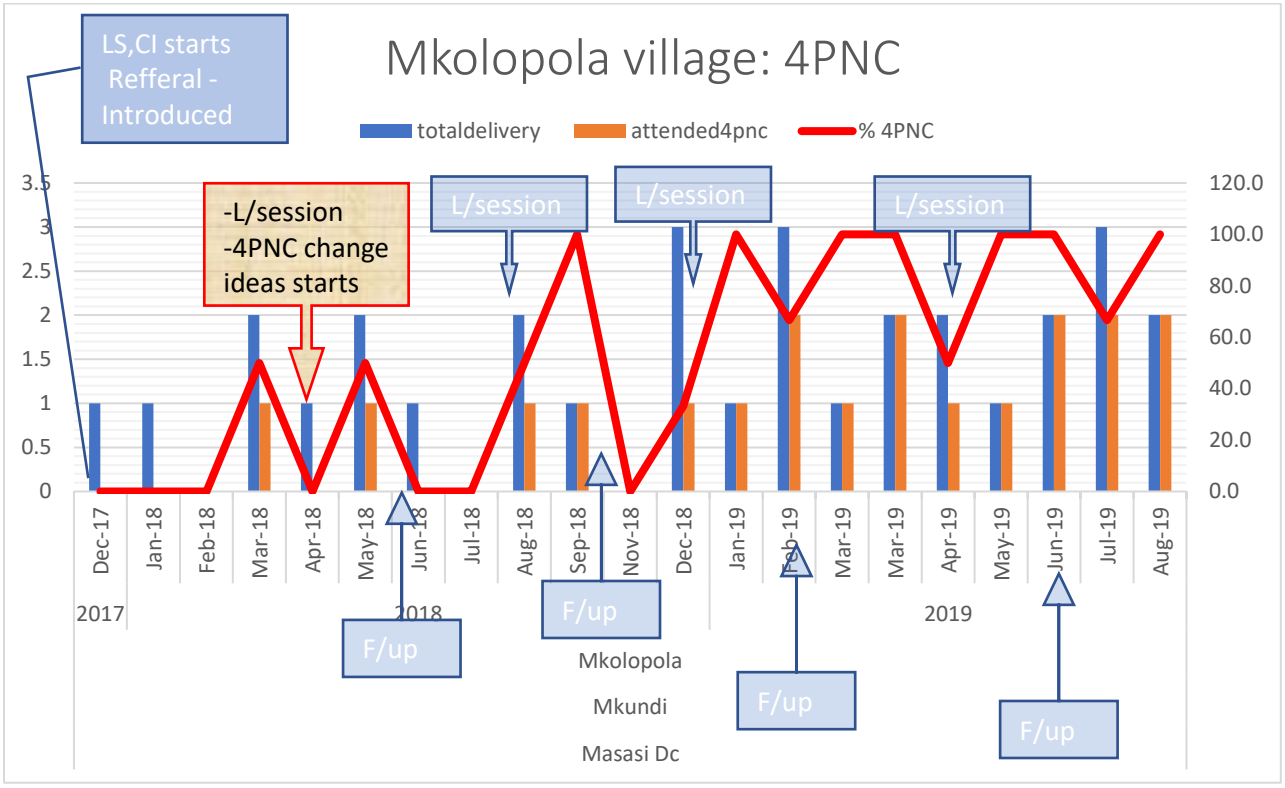
MASASI TC: 4 PNC





MASASI DC

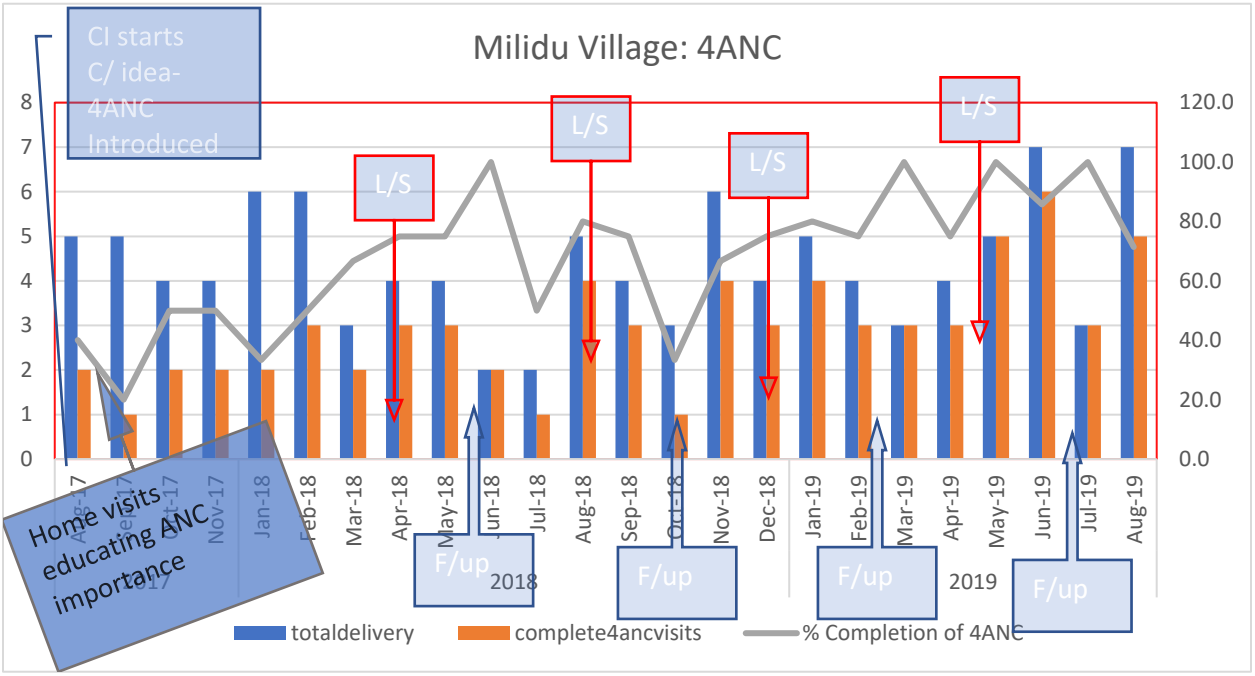
MASASI DC : PNC



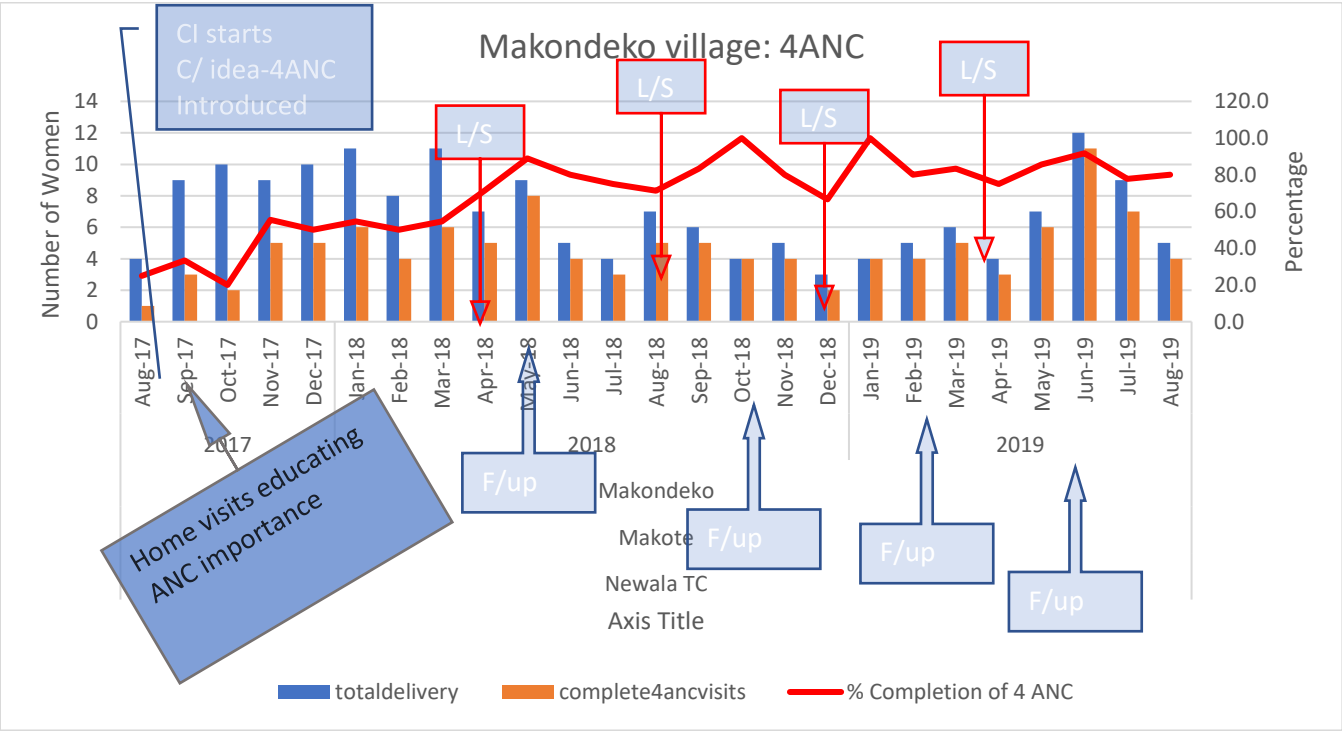
CHANGE TOPIC: 4+ ANC ATTENDANCE

TANDAHIMBA DC

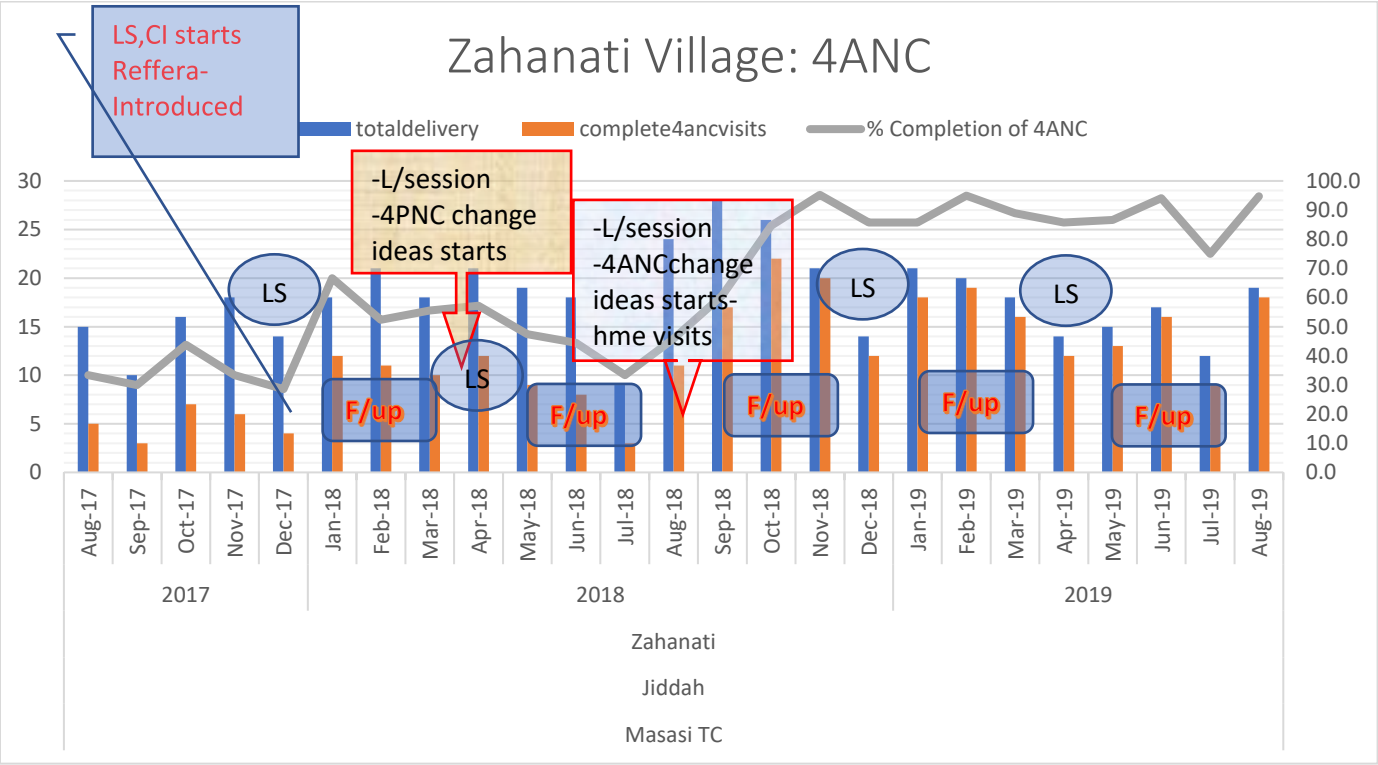
TANDAHIMBA: 4 ANC



NEWALA: 4ANC


Makondeko village: 4ANC
CI starts
C/ idea-4ANC
Introduced
L/S
L/S
L/S
L/S
Home visits educating
ANC importance
F/up
F/up
F/up
F/up
Makondeko
Makote
Newala TC
Axis Title
2017
2018
2019
Number of Women
Percentage
totaldelivery
complete4ancvisits
% Completion of 4 ANC

MASASI TC


Zahanati Village: 4ANC
LS,CI starts Reffera-Introduced
totaldelivery
complete4ancvisits
% Completion of 4ANC
-L/session -4PNC change ideas starts
-L/session -4ANCchange ideas starts-hme visits
LS
F/up
2017
2018
2019
Zahanati
Jiddah
Masasi TC

Summary of Change Ideas Tested

Change Concepts	Change Ideas	Description of Change Ideas
Improving Antenatal Care Clinic early attendance (Below 12 weeks of pregnancy)		
Community Early identification of women with very young pregnancy who have not yet started	Home visits by Community health volunteers	Trained community health volunteers pass in community members talk about importance of early attendance and ask if there is a member who is pregnant for them to make close follow up
	Sensitization meeting to women groups	Community health workers, identify women economic groups in their villages. Then they ask for opportunity to attend at their meetings and use that platform to talk about Early attendance and ask these women if they have relatives of this nature, to go and start ANC early
	Sensitization through village meetings and Outreach Clinics	During Children outreach /at facility , Community health workers do health education and insist for mothers with relatives not yet stared ANC should start
	Use of FEFO leaflet	Community health volunteers using designed leaflet that has message linking early visit, use of Iron and folic acid as a means to reduce chances of getting children with abnormality. Key message is mothers o start ANC early and start using FEFO early.
Improving Coverage of antenatal care coverage: At least 4 or more ANC visit.		
Community Identification of women who have started ANC	Community health workers home visits	Trained community health volunteers pass in community member's talk about importance of ANC and why should they finish all Visits and ask for ANC card to check the reality. Volunteers also check in facility registers to check if there is any women that has started ANC and they did not get in the community directly.
Educating pregnant women and community members importance of completing 4+ANC visit	Community health volunteers home visits	Using their counselling guides, community health volunteers pass by households and offer health education on importance of ANC
	Sensitization through women groups	Community health workers, identify women economic groups in their villages. Then they ask for opportunity to attend at their meetings and use that platform to talk about importance of Completing ANC visits
	Sensitization through village meetings	community health volunteers attends village meetings and offer health education about ANC. Maternal and Newborn health also has been agreed to be permanent agenda in these meetings
Improving Post Natal Care attendance		
Community identification of recently delivered mothers	Community health volunteers home visits	Visiting households and asking for recently delivered mothers

	Community health volunteers facility registers check ups	Visiting facility and checking registers to see if there is a recently delivered women
Educating community on PNC visits importance	Community health volunteers home visits	Using their counselling guides, community health volunteers pass by households and offer health education on importance of PNC
	Sensitization through women groups	Community health workers, identify women economic groups in their villages. Then they ask for opportunity to attend at their meetings and use that platform to talk about importance of Completing PNC visits
	Sensitization through village meetings	Community health volunteers attends village meetings and offer health education about PNC. Maternal and Newborn health also has been agreed to be permanent agenda in these meetings
Improving delivery place referral obedience		
Identification of pregnant women who were referred	Checking women ANC card	Community health volunteers visits households and asks for ANC cards of those women attending ANC. Then looking into the cards and check if the women have been referred or not
Educating women on referral Importance	Home visits follow ups	Community health volunteers with list of women who have been referred, they do pass to their homes and insist on them to prepare to deliver at hospital
	Sensitization through women groups	Community health workers, identify women economic groups in their villages. Then they ask for opportunity to attend at their meetings and use that platform to talk about importance of Obedience to referral
	Sensitization through village meetings	Community health volunteers attends village meetings and offer health education about importance of Obedience to referral. Maternal and Newborn health also has been agreed to be permanent agenda in these meetings