Scaling up RAS in a community-based initiative in Zambia: Final results from MAM@Scale

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DEVELOPMENT DATA

disacare wheelchair centre

MMV Medicines for Malaria Venture

FIA FOUNDATION

Outline

Scene setting – malaria context

MAM@Scale approach

Results

Q&A

Final comments

Close

Guest Speaker

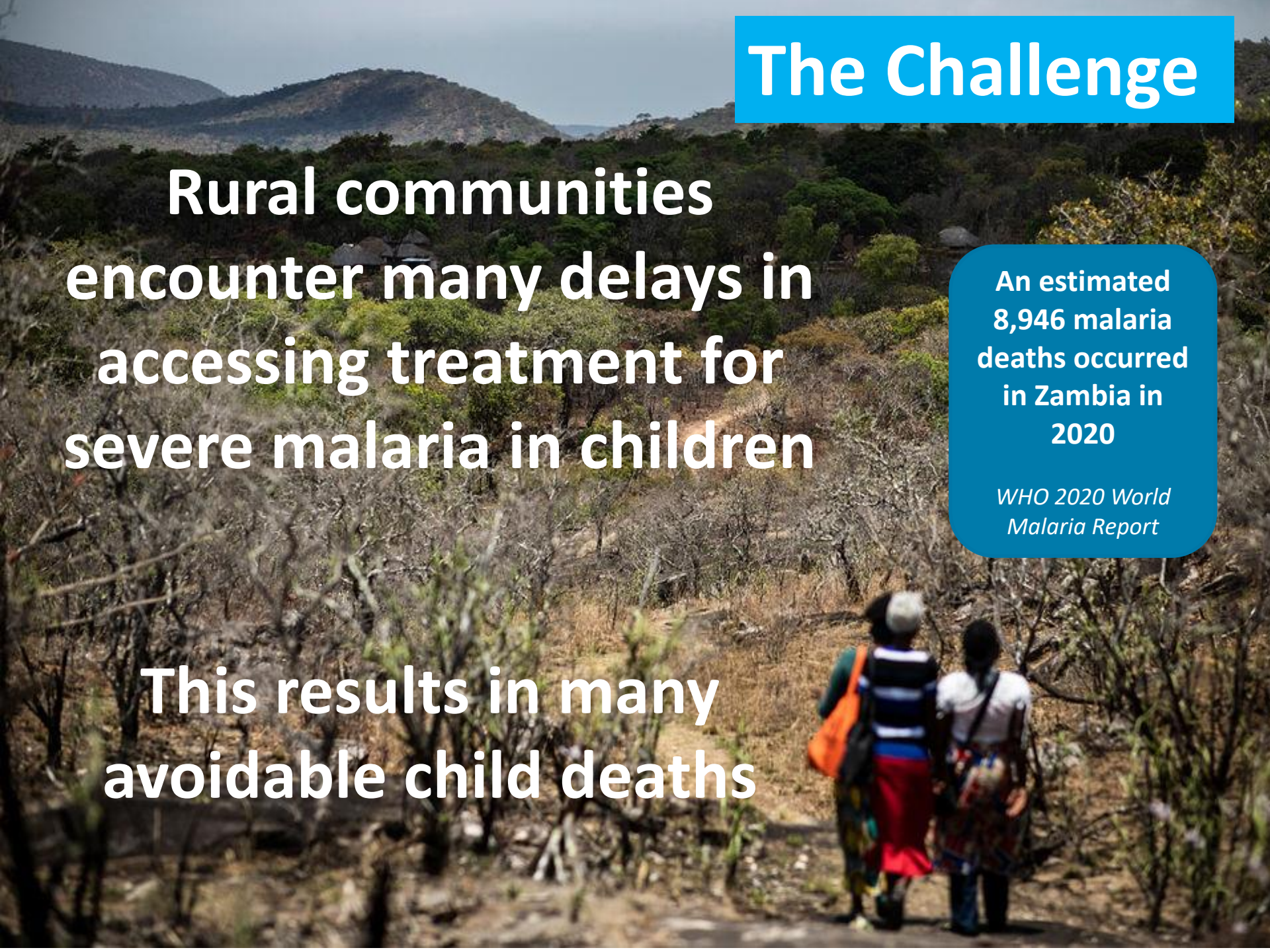
Hans Rietveld

Medicines for Malaria Venture

Overview

- Severe malaria innovation targeted to children aged 2 months – 6yrs
- 4 year intervention (2017-2021)
- Initial pilot (2017-2018); then scale-up to 10 districts (2018-2021)
- Implemented in partnership with NMEC and DHMTs

The Challenge



Rural communities encounter many delays in accessing treatment for severe malaria in children

This results in many avoidable child deaths

An estimated 8,946 malaria deaths occurred in Zambia in 2020

WHO 2020 World Malaria Report

Barriers and Delays

Approach

Innovative training for CHVs

Community mobilization

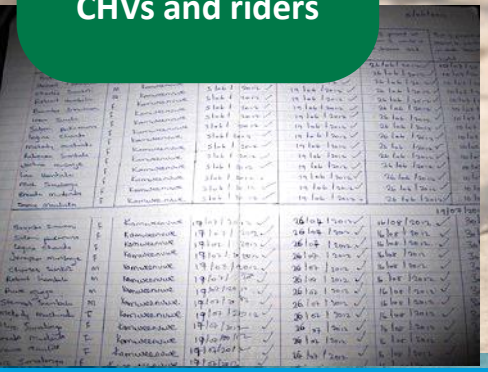
RAS administration

Community Systems

Food Banks
Emergency Savings Schemes

Community Monitoring System

Data collection by CHVs and riders



Emergency Transport System

Bicycle ambulances

CHV training designed for low literacy context

Emphasis on song, dance and communication body tools to relay key messages and actions

Approach

Influencing national scale up

Demonstration district model

Advocacy & dissemination

Malaria TWG

Inputs to drugs quantification

Strengthening linkages between HFs & communities

HWs involved in training CHVs & riders

Supportive supervision for volunteers

Training health providers in severe malaria case management

Including Injectable artesunate

Building sustainable district capacity

DHMT led key activities

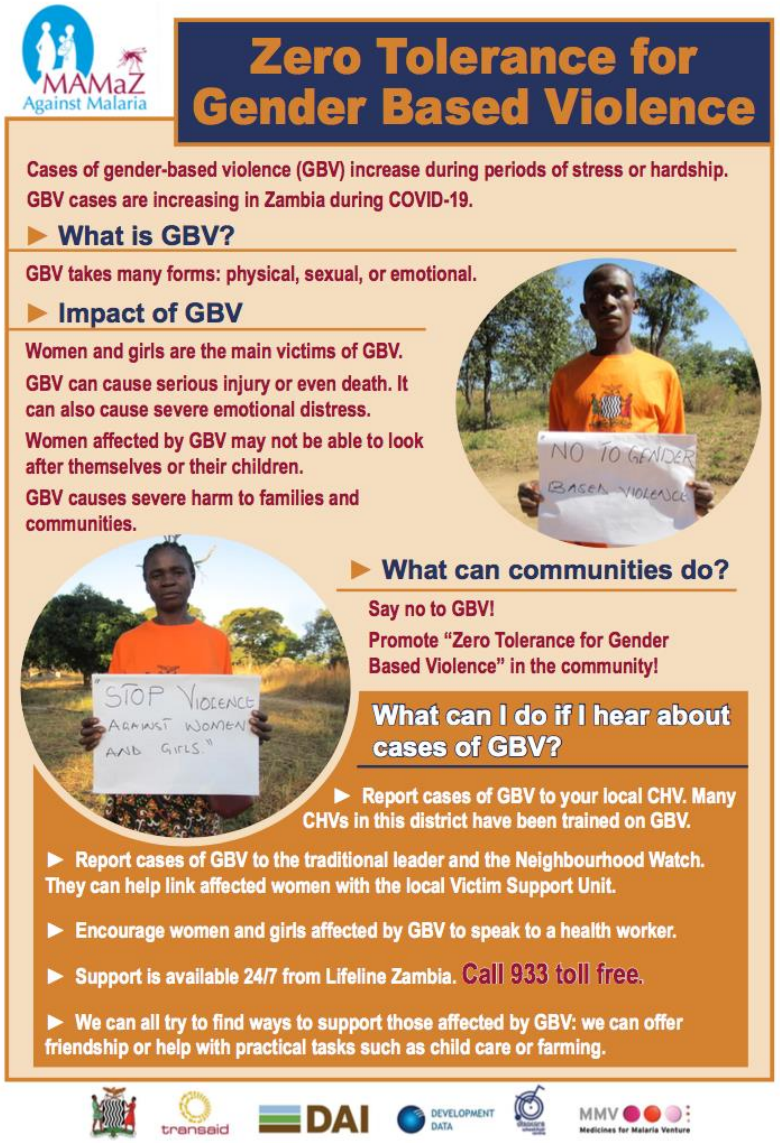
Focal persons identified

Drugs and commodities monitoring

COVID-19 adaptation

- Supported develop of national COVID-19 community engagement guidelines
- Adapted protocols for CHVs, riders to focus on COVID-safety
- Local language posters & community radio: clear, reliable information from trusted sources
- Topped up community food banks
- Installed handwashing stations

Anti-GBV Campaign



- Cases of GBV in danger of rising in context of COVID-19
- Community radio used to deliver anti-GBV campaign
- Local language posters produced
- Live phone in format with Q&A
- Campaign timely as communities needed more guidance on how to survive GBV during the pandemic

M&E Framework

Baseline survey: Feb 2019

Midline survey: July 2020

End line survey: Sep 2021

Community monitoring system: 2017-2021

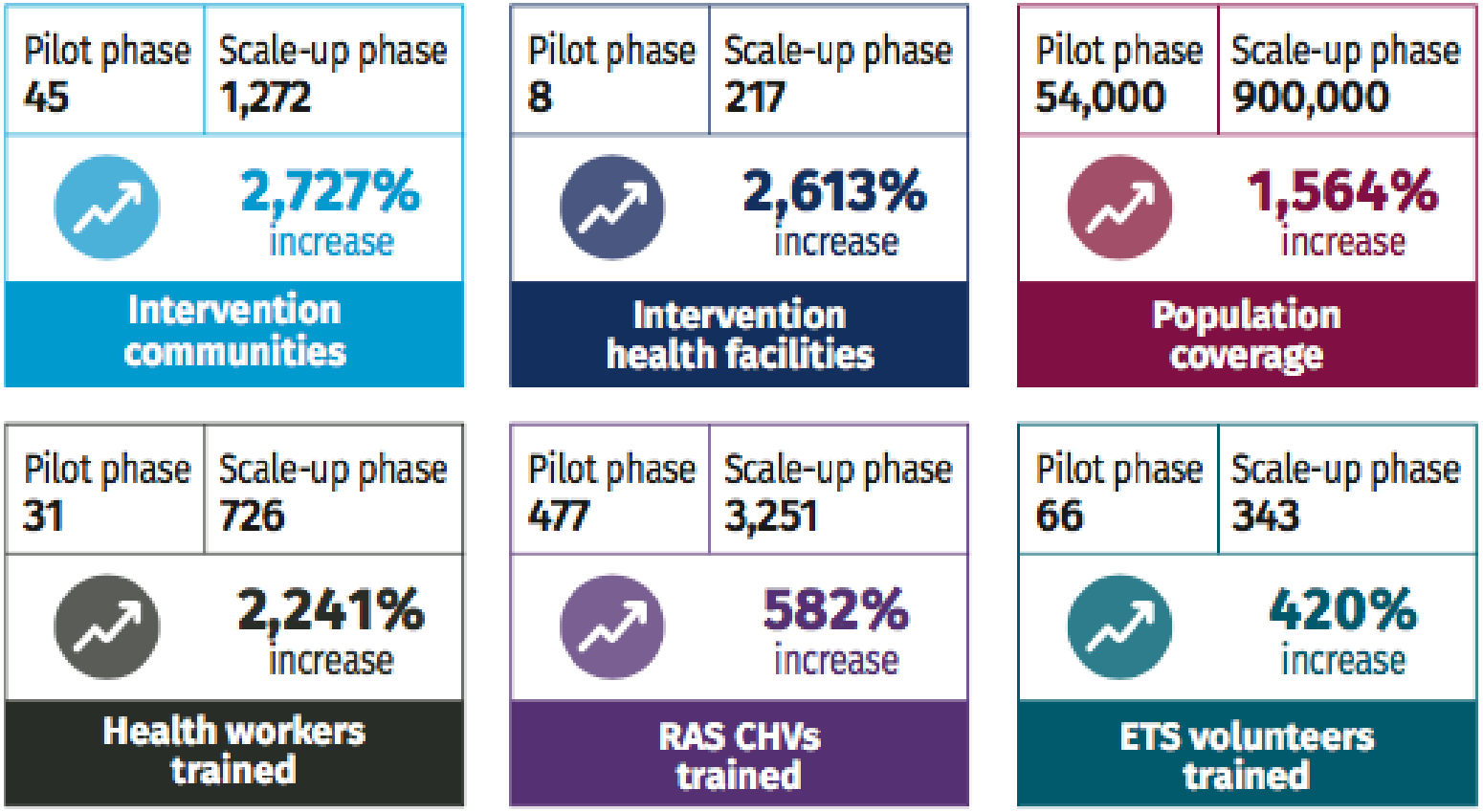
HMIS data: Ongoing

RAS verification exercises: 2018, 2019, 2020

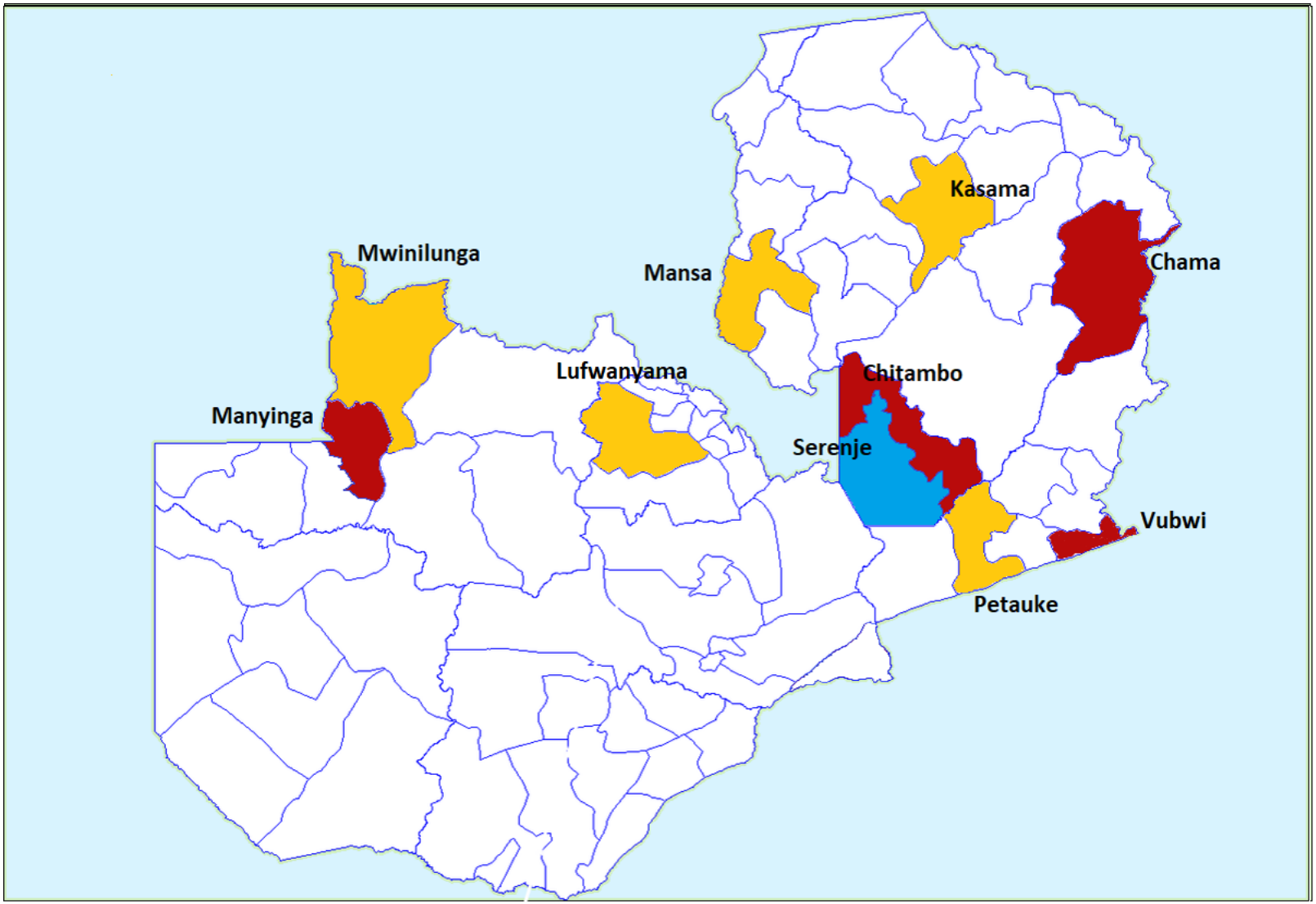
Community Monitoring System

CHVs and riders collected CMS data on a monthly basis. Data were reported to the local HF for onwards reporting to the District Health Office

Results: Scale-Up



Scale up from 1 to 10 districts

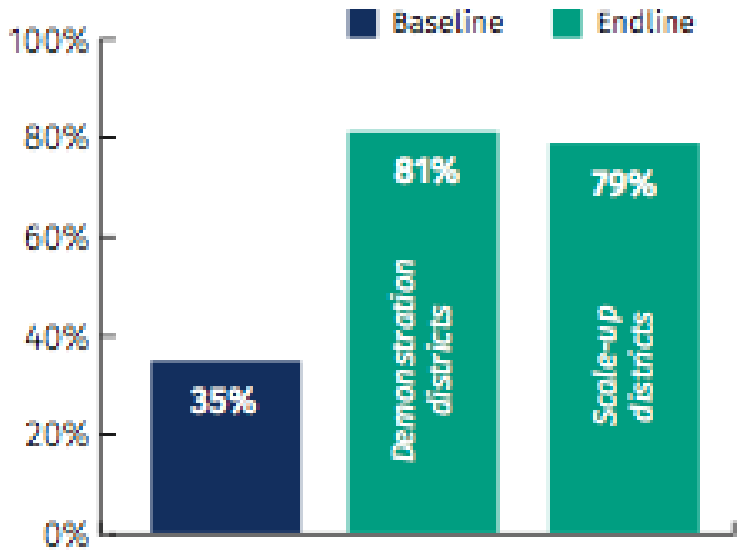


Results: Scale Up

- RAS training has been integrated into national iCCM training programme
- MOH is procuring RAS
- NMEC plans to expand RAS into 26 additional districts

Results: Drug Supply

Fig 1: Health facilities with four main malaria drugs in stock



- Malaria drug supply improved during project
- Some HFs had shortages of Inj AS, especially during 2020
- District WhatsApp groups used to pre-empt drugs shortages

Malaria drugs monitored: Coartem (ACTs), RAS, Inj AS, SP/Fansidar, Quinine

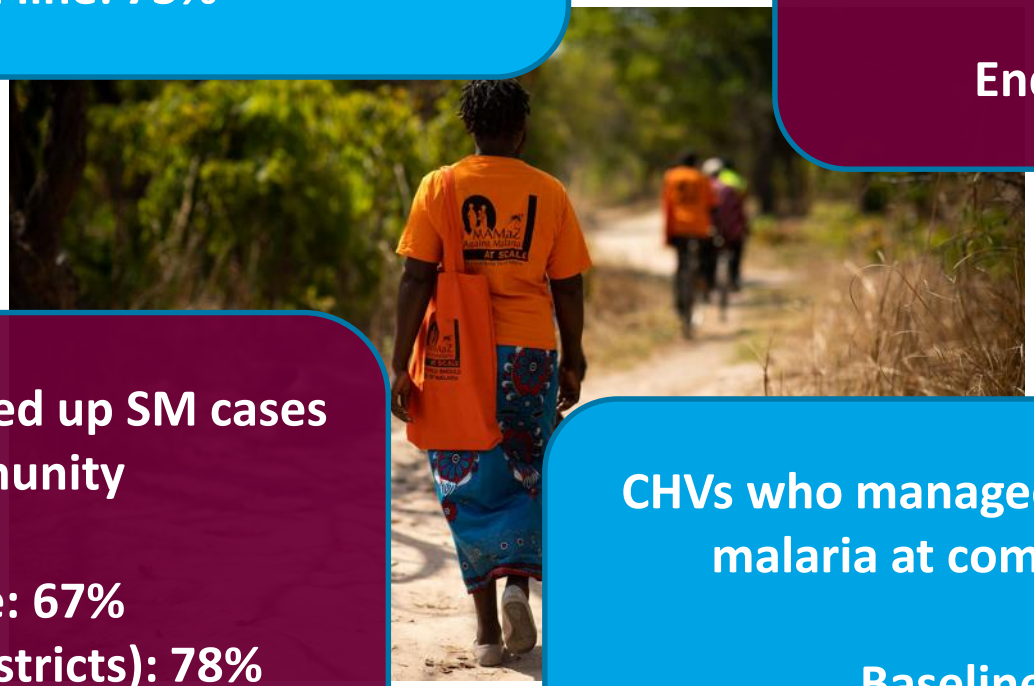
Results: CHVs

CHVs who knew all the main severe malaria danger signs

Baseline: 8.7%
End line: 73%

CHVs who said that they felt confident to administer RAS

End line: 95%



CHVs who followed up SM cases in community

Baseline: 67%
End line (all districts): 78%
End line (demo districts): 94%

CHVs who managed cases of severe malaria at community level

Baseline: 79%
End line: 94%

Results: RAS Verification Exercise

- Exercise (Dec 2020) checked whether CHVs gave RAS correctly and patients received full treatment at HF
- 100 cases reviewed in two demonstration districts

District: SERENJE

Name of Health Facility: KAMENA RHP

Patient code and age	Sex	Date of arrival at HF	RAS given in community (Y/N)	RDT Result (positive = P negative = N)	Where RDT done	Severe malaria danger signs recognised by CHV or child's carers	Time to get to the HF after child given RAS (in minutes)	Child treated for severe malaria at HF (Y/N)	Name all severe malaria/ malaria drugs given at HF	Reason RAS beneficiary not given Inj AS	Child Survived (Y/N)
Case 61 1 yr 10 months	M	23/11/20	Y	P	Community	Fever convulsion	120 MIN	Y	Inj AS		Y
Case 62 3 yrs	F	16/11/20	Y	P	Community	Fever convulsion	210 MIN	Y	Coartem	Low stock of Inj AS	Y
Case 63 3 yrs	F	05/11/20	Y	P	Community	Fever convulsion	No data	Y	Inj AS		Y
Case 64 4 yrs	M	05/11/20	Y	P	Community	Fever vomiting	No data	Y	Inj AS		Y
Case 65 9 months	F	08/10/20	Y	P	Community	Fever, fitting	300 MIN	Y	Coartem	Low stock of Inj AS	Y
Case 66 3 yrs	M	23/11/20	Y	P	Community	Fever convulsion	120 MIN	Y	Inj AS		Y
Case 67 3 yrs 6 months	F	16/05/20	Y	P	Community	Convulsion	120 MIN	Y	Inj AS		Y
Case 68 2 yrs	M	06/06/20	Y	P	Community	Fever	300 MIN	Y	Inj AS		Y
Case 69 4.5 yrs	M	08/06/20	Y	P	Community	Fever	25 MIN	Y	Inj AS		Y
Case 70 1 yr 1 month	F	13/05/20	Y	P	Community	Fever diarrhoea	25 MIN	Y	Inj AS		Y

Results: RAS Verification Exercise

- 95% of RAS recipients had their severe malaria diagnosis confirmed at the HF
- This shows that CHVs trained by project are **closely following the severe malaria protocol**
- 37% of RAS recipients with confirmed severe malaria did not receive Inj AS due to stock outs of this drug
- A similar exercise in Oct 2019 found that only 10% of RAS recipients did not receive Inj AS at the health facility
- Shows the effect of drug stock-outs, which is partly due to COVID-19

Results: COVID-19

A midline survey undertaken in July 2020, three months into the COVID-19 response, found the following:

More than **80%** of CHVs knew the three main danger signs of COVID-19

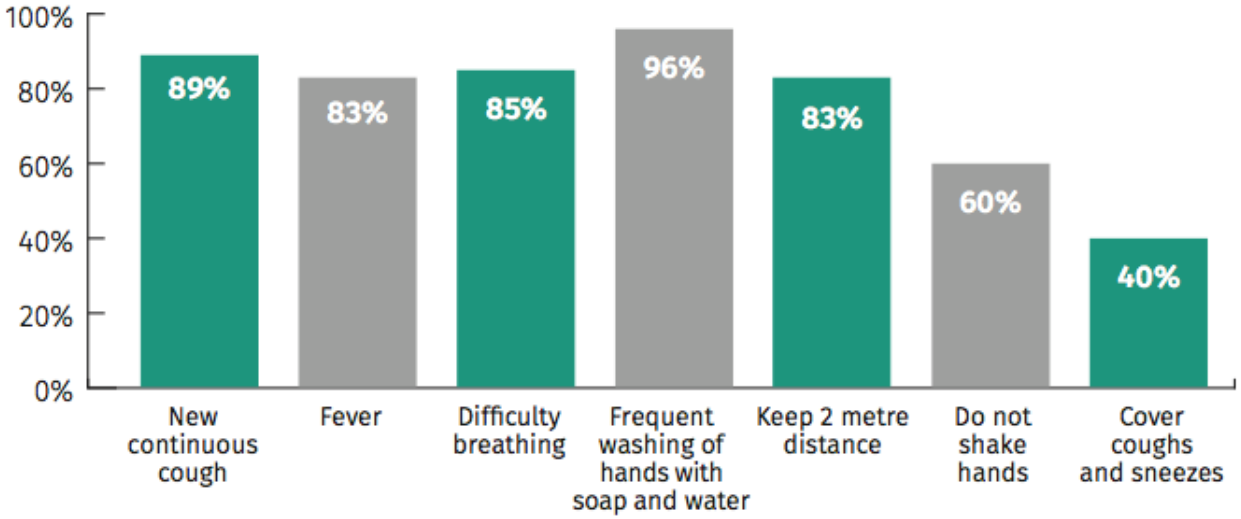
Only **1%** of CHVs indicated that they lacked formal training on COVID-19

79% of CHVs reported that GBV had disappeared or reduced a lot in recent years

5% of CHVs reported that GBV had increased because of COVID-19

Less than 4% of CHVs indicated that they lacked PPE

CHVs who knew COVID-19 signs and symptoms and preventive actions



Source: MAM@Scale Midline Survey, July 2020

At end line 52% of CHVs had COVID-19 vaccination

(national vaccine coverage was 3.1% at 31 October 2021)

Results: Gender empowerment & social inclusion

CHVs who said they had a stronger voice at community level due to their training

End line: 95%

CHVs who said that GBV had reduced a lot or disappeared over last few years

End line: 84%

CHVs who had taken actions to assist the least-supported women

End line: 90%

CHVs who thought women in the community had more scope for independent decision-making as a result of project activities

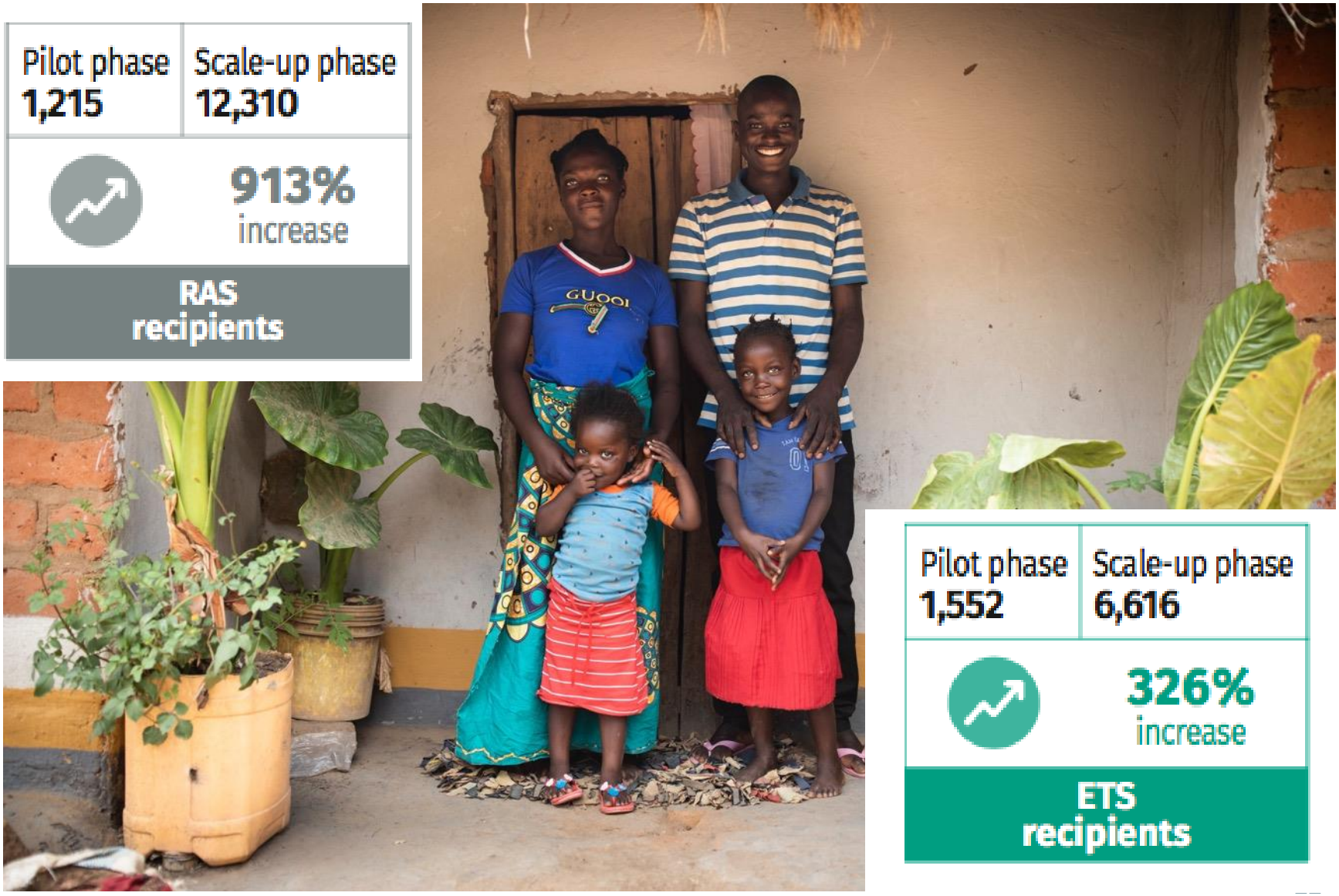
End line: 95%

Results: Project Recipients

Pilot phase	Scale-up phase
1,215	12,310

913% increase

RAS recipients



Pilot phase	Scale-up phase
1,552	6,616

326% increase

ETS recipients

Results: Case Fatality Rates

SEVERE MALARIA CASE FATALITY RATE

Demonstration districts

From: 3.1% To: 0.1%

97% reduction

Scale-up districts

From: 10.7% To: 1.4%

87% reduction

496 estimated lives saved attributable to project

Estimated lives improved attributable to project: **8,025**

Challenges

- Inj AS stockouts, especially during 2020
- Inconsistent supply of drugs for simple malaria (e.g. ACTs) for CHVs in 2020
- ETS is valued by MOH but funding for larger-scale roll-out not yet secured.
- Gender balance among iCCM CHVs skewed towards men due to emphasis on selecting CHWs

Lessons

- Building capacity to manage severe malaria cases at lower level health facilities helped reduce barriers of access for communities
- Training CHVs in community engagement and mobilization just as important as training in case management
- Well trained CHVs working within a strong community health system can integrate new issues (e.g. COVID-19) at speed

Q&A

Please feel free to ask questions using the comments function

Final Comments

Mr Mukumbuta
ICCM Program Officer, National Malaria Elimination Centre, Zambia

Thank you for listening!

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