



MASS DRUG
ADMINISTRATION (MDA)
FOR MALARIA DURING
EBOLA OUTBREAK IN
SIERRA LEONE

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## **Outline of Presentation**

- EBOLA EMERGENCY SITUATION
- EFFECTS OF THE EBOLA OUTBREAK
- OBJECTIVE OF THE MASS DRUG ADMINISTRATION OF ASAQ
- MDA CAMPAIGN TARGETS & STRATEGY
- COMMUNICATION/SOCIAL MOBILISATION ACTIVITIES
- RESULTS OF THE CAMPAIGN
- FACILITATING FACTORS FOR ACHIEVEMENT
- CHALLENGES
- IMPACT OF THE MDA
- CONCLUSION

### EBOLA EMERGENCY SITUATION

- Sierra Leone is one of the three West African countries most affected by the Ebola virus disease (EVD).
- The outbreak started in the eastern part (Kailahun district) of the country on 25<sup>th</sup> May, 2014.
- The EVD created numerous challenges for the continuation of routine health delivery services at all levels;
- The EVD had some adverse effects on the malaria program interventions.
- The implementation of the developed Country NMCP Road Map 2014 slowed down;

#### EBOLA EMERGENCY SITUATION

- Across the country, there was a significant decline in the utilization of health facilities;
- Malaria, Pneumonia and Diarrhoea continued to be the primary killers of children under five, and during the Ebola outbreak.
- The linkages between the communities was weakened;
   CHWs no longer played their role as expected by the community.
- Drastic increase in malaria Morbidity and mortality was expected.
- The detection and management of Ebola and malarial had been challenging for Health Workers as the initial clinical presentation of the two diseases is similar.

### EFFECTS OF THE EBOLA OUTBREAK

- Health workers were overstretched, worked longer hours and hard shifts, and worked in fear of falling ill.
- Infection of HWs and CHWs.
- Some CHWs worked as EVD Contact Tracers and Mobilisers
- Public and Private Health Facilities affected by EVD.
- Public facilities mobilized as Ebola Holding centers (preventing patients to access other services).
- Some Private Hospitals closed down.
- The supply chain for commodities under increasing pressure (competing priorities with EVD + travel restrictions).
- Initial reports suggested that communities (particularly pregnant women and children) are not attending health facilities for fear of contracting Ebola.
- Increasing distrust in the health system.

#### **EFFECTS OF THE EBOLA OUTBREAK**

- ■Poor access for malaria patients to health services: malaria morbidity & mortality
- Fever/malaria patients seeking help in informal sector (unsafe injections, gatherings,...)

Malaria patients labeled as « suspect Ebola cases » & insufficient/adequate quarantine chain capacity risk Ebola transmission

delayed quarantine for Ebola patients 7

delayed transfer of Ebola patients to treatment centers 7

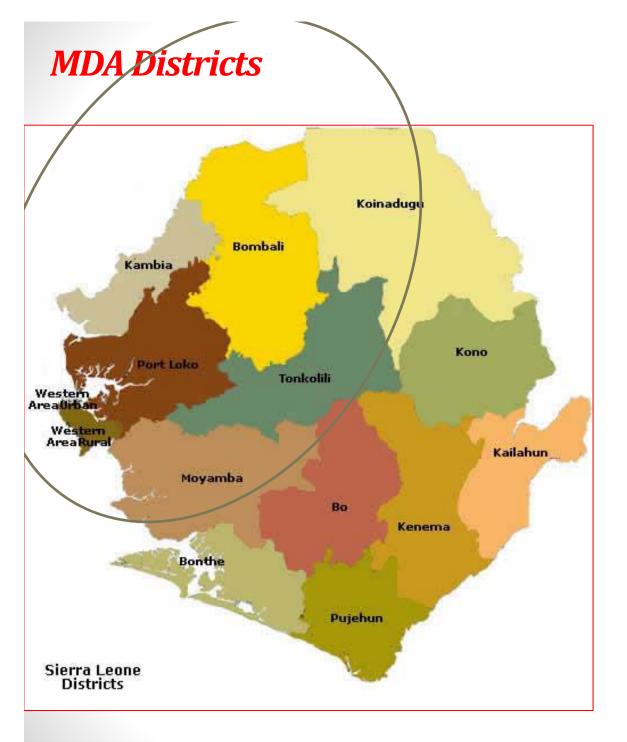
# OBJECTIVE OF THE MASS DRUG ADMINISTRATION OF ASAQ

#### Goal:

 To contribute to the containment of the Ebola outbreak in Sierra Leone thereby reducing morbidity and mortality

#### Objectives:

- To rapidly and significantly reduce clinical malaria and the resultant mortality among highest risk target population children and pregnant women;
- To rapidly reduce the number of febrile episodes (suspected Ebola cases) that would otherwise have required screening and isolation to exclude Ebola as the cause of illnesses;
- To Improve diagnostic accuracy in diagnosis of suspected EVD cases by reducing the disease most likely to be mistaken for EVD, while reducing the burden on overloaded Ebola Treatment Units and Health Facilities;



- The MDA was implemented in eight districts
- 18 Chiefdoms (rural 6 districts) and
- 30 zones (two districts of Western Area)

## **MDA Campaign Targets**

#### Age target:

 To cover all ages above 6 months with a total population of 2,386,968

### **Target**

- 85% of targeted total population administered ASAQ tablets;
- 85% of the targeted population comply with the prescribed doses of ASAQ;
- 100 % of the targeted population received IEC and BCC messages during the MDA campaign;
- 100% of the targeted population know the benefits of taking the anti-malarial medicine.

## MDA Strategy

- A stand alone campaign
- Door to door administration as a directly observed treatment (DOT) for 1<sup>st</sup> dose with a 3 day course of Artesunate/Amodiaquine (AS/AQ)
- Distribution with strict adherence to "No Touch" policy
- Exclusion criteria
  - -Pregnant women in 1<sup>st</sup> trimester
  - Malnourished children
  - All persons with fever and looks unwell
  - Infants less than 6months old
  - Anyone who has received AS/AQ within the last month;
  - -Patients taking Zidovudine, Efavirenz or co-trimoxazole;
- Quarantine homes should not be visited
- ❖ 1<sup>st</sup> Cycle 5<sup>th</sup> -8<sup>th</sup> December, 2014
- 2<sup>nd</sup> Cycle 16<sup>th</sup> -19<sup>th</sup> January, 2015

# Communication/Social mobilisation Activities carried out during the MDA

- High Level Planning meeting held with the National Ebola Response Centre (NERC) & District Ebola Response Centres (DERC).
- Met with RBM partners planned & developed the MDA communication plan
- District micro plans were developed with all stakeholders in the districts
- National social mobilisation committee developed communication messages, leaflets: Q & As, Posters, banners
- Advocacy/sensitization meetings with District council team, Paramount/Section/town chiefs, Religious leaders, traditional healers, youth groups and community elders

#### At national level

- Production and airing of campaign jingles in Krio, Madingo, Fula, Limba, Temne, Koranko, and Mende in five radio stations.
- Conduct Radio Panel discussion programmes (Simulcast) using five (5) IRN stations.
- Conduct TV Panel discussion programmes at SLBC Freetown
- Produce IEC/Materials banners (86), flyers 10,000), fact sheets (10,000)
- Press briefing
- Newspaper publication
- Text messages using the Tera messaging system
- Coordination
- Supervision and Monitoring of campaign

#### At district level

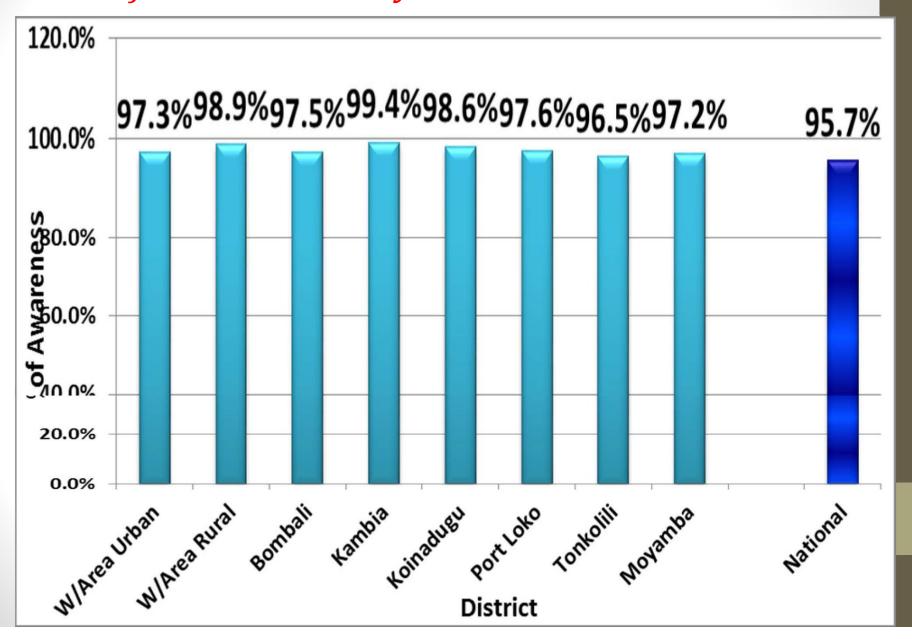
- Airing of jingles three times daily for ten (10) days in 14 community radio stations in the eight districts (Moyamba, Bombali, Tonkolili, Koinadugu, Port Loko, Kambia, Western Area-Urban & Rural).
- Radio Panel discussion programme using community radio stations
- Advocacy meetings with key stakeholders including Paramount chiefs, local councils, Religious leaders, line Ministries, Civil society, NGOs, CBOs, Women leaders at district level
- Chiefdom level orientation with key stakeholders including Paramount chiefs, local councils, Traditional leaders, town chiefs, town criers, ward councilors, religious leaders, youth leaders, Traditional healers, and CBOs.
- Street to street /house to house announcements by town criers

## **RESULTS**

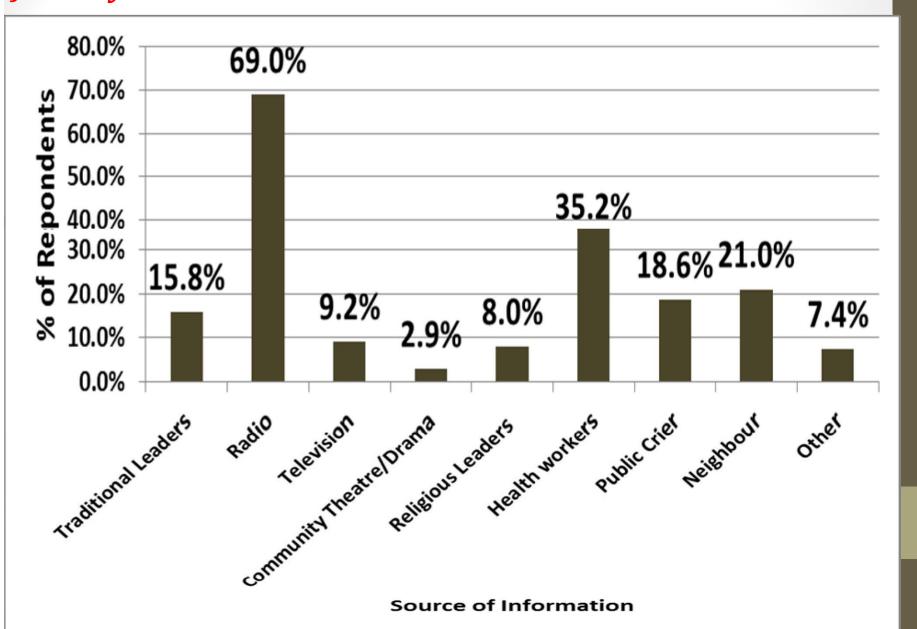
1st Cycle-87% coverage

• 2nd Cycle-**96.4**%(DOTs-71.2%)

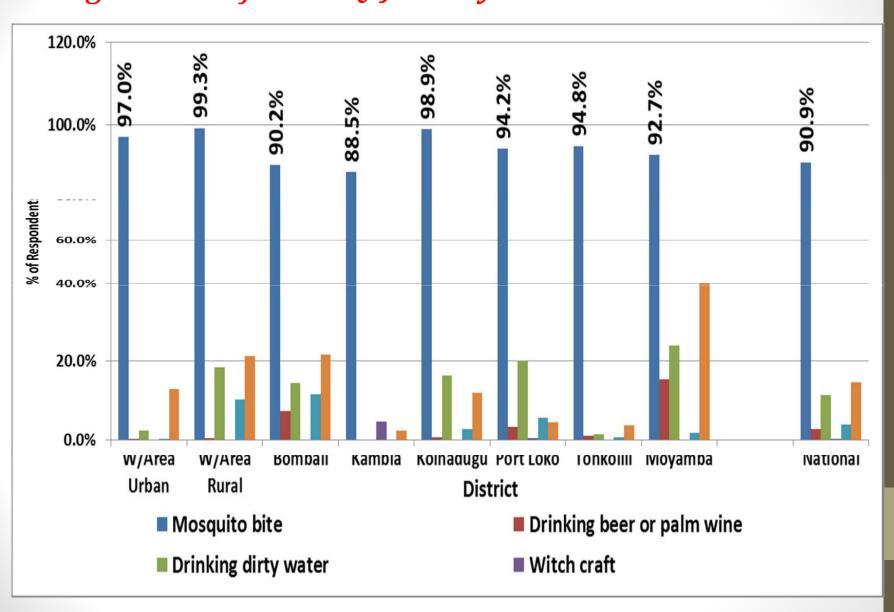
# Respondents Awareness of the Malaria MDA for ASAQ before the Arrival of the Distributors by District



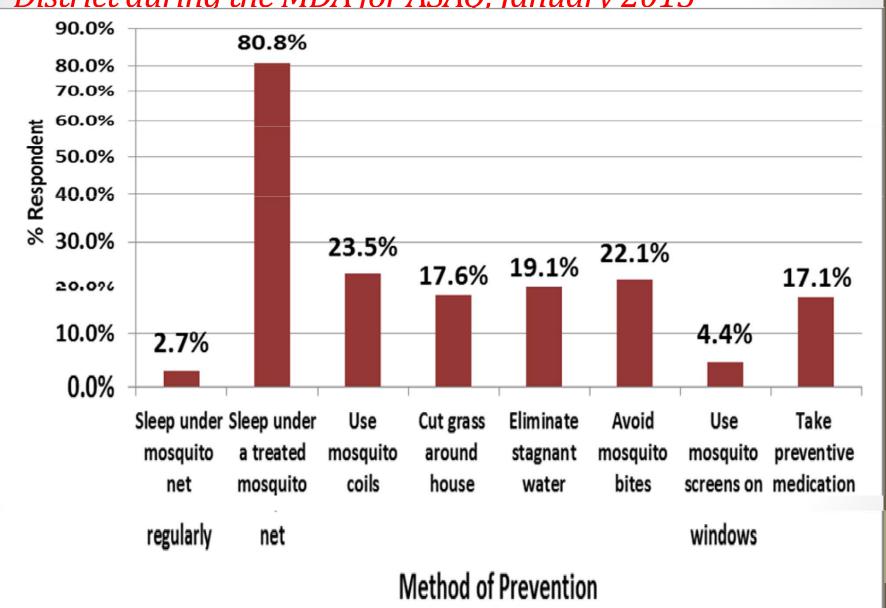
# Source of Information for the Malaria MDA for ASAQ National, January 2015



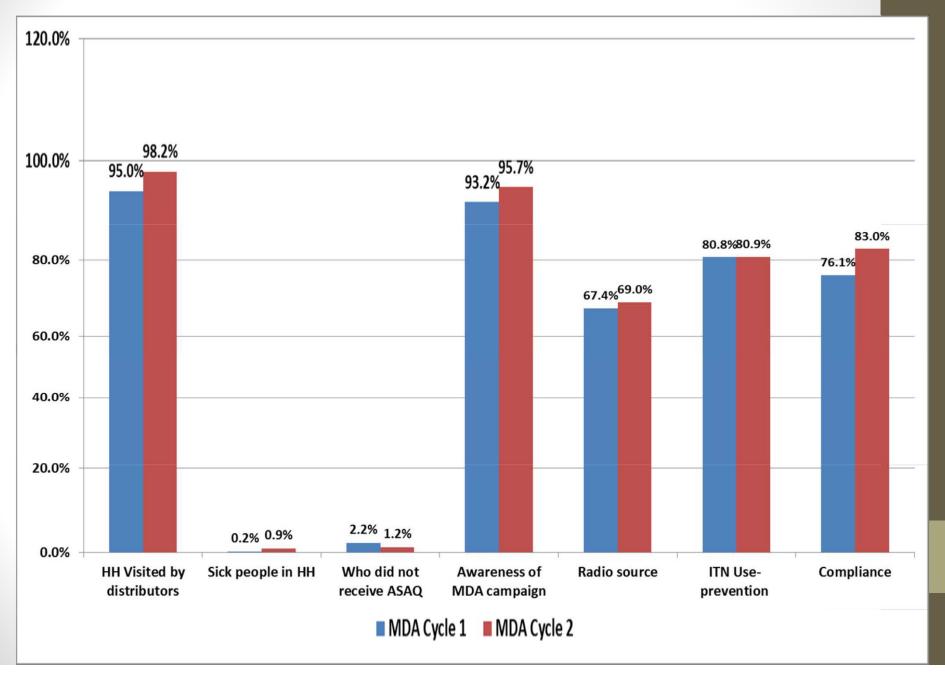
## Respondents Knowledge of Cause of Malaria by District During the MDA for ASAQ January 2015



## Respondents Knowledge on prevention of Malaria by District during the MDA for ASAO: Ianuary 2015



### Summary Comparison of MDA Cycle 1 and Cycle 2



### FACILITATING FACTORS FOR ACHIEVEMENT

- Social mobilization played a key role in sensitizing communities about the MDA;
- Pre-campaign advocacy/sensitization meeting with all relevant stakeholders at all levels.
- Joint planning and advocacy meetings with stakeholders and partners;
- Use of Paramount chiefs (local leaders) and existing CHWs who are part of the communities gave confidence to beneficiaries for acceptance of the MDA and high uptake of the medicines;

#### FACILITATING FACTORS FOR ACHIEVEMENT

- Traditional Leaders, and Religious Leaders among others helped to sensitized communities before and during the campaign;
- Daily airing of Radio jingles using the local languages;
- Daily radio discussions and phone in programmes comprising of MOHS, NGOs, Civil Society Councilors, Paramount chiefs
- Social mobilization teams moving from community to community to conduct sensitization activities;
- In process and end process monitoring by independent monitors

## **Challenges**

- Messaging challenging to do MDA in a time when the community has apprehension and mistrust on the health system;
- Access to some hard-to-reach areas (mountainous, islands, riverine and slums areas) and shanty towns and new establishments;
- Pop density and overcrowding, census pop underestimated particularly in the Western Areas
- People from non-MDA chiefdoms moving to the MDA chiefdoms to benefit from the MDA contributed to the shortage of medicines;
- Poor implementation of the DOTs strategy in some densely populated areas particularly in the Western areas (Urban) while DOTs in the rural communities was good;
- Mild adverse drug reactions reported (ADR);

## Impact of the MDA

- Objectives of the MDA were met.
- The two cycles of the MDA resulted in reduction of the following key malaria related indicators during the 3rd week post -1st MDA (\*when the reduction is statistically significant)

#### **Outpatient (OPD)**

- Outpatient (OPD) consultancies declined by 31%\* in the MDA PHUs;
   whereas there was no change in the non-MDA PHUs
- RDT Tested cases significantly decreased by 40%\* in the MDA, 37% in
- the non-MDA PHUs
- RDT positive cases significantly decreased by 55%\*in MDA PHUs, 38%\* in the non-MDA PHUs
- Proportion of malaria of all OPD cases decreased by 47%\* in MDA, 22% in non-MDA PHUs
- Total malaria (clinical + confirmed) cases decreased by 44%\* in MDA,
   23% in non-MDA PHUs >70%\* in the MDA, increase in the non-MDA
   PHUs

## Impact of the MDA

## Inpatient (IPD)

- Malaria inpatient cases decreased by 29% in the MDA PHUs
- Proportion of malaria admission of all inpatient cases decreased by 49%\* in MDA PHUs, decrease after the 2nd MDA was stronger
- I Ebola alerts (\*significant decrease only after the 2nd MDA):
- During the 3rd week post -1st MDA trends in Ebola alerts reduced 28% in the 1st MDA and 73%\* the 2nd MDA, 7% in the non-MDA PHUs
- During the 1st-4rd week post -2nd MDA trends in Ebola alerts decreased
- High malaria test positivity rate during the pre-MDA weeks (74% in MDA and 61% in non-MDA chiefdoms)

## In Conclusion

- \*EVD outbreak was an unprecedented crisis, posing enormous challenges on Malaria activities in particular and the Health System in general;
- This activity acted as a complimentary approach to contain the Ebola epidemic in this country while contributing to decrease in mortality and morbidity linked to malaria;
- This experience can provide an interesting experience, useful for other future outbreaks where quick reduction of malaria burden is needed.



















