



**NATIONAL MALARIA CONTROL PROGRAM
ROTARIANS AGAINST MALARIA
QUARTER ONE FIELD TRIP REPORT
MOROBE PROVINCE
JAN- FEB 2024**



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Date Travelled to Lae: 24.01.24
Date Returned to Port Moresby: 24.02.24
Total nights in the field: 31 nights
Funding Source: Global Fund

OBJECTIVE

This was the first quarter trip of 2024, to carry out the routine Malaria Health Facilities (HF)s visits and Drug Distribution in Morobe Province.

The main objectives;

- Visit all accessible HFs and ensure that there is adequate supply and **NO STOCK OUT** of Rapid Diagnostic Test (RDT) kits, Artemisinin-based Combination Therapy (ACT)s, Primaquines (PQs) and other malaria commodities including Antenatal Care (ANC) nets in all HFs,
- Ensure that all Malaria suspected cases are correctly tested and diagnosed and complete treatment is given to the confirmed positive cases as per National Malaria Treatment Protocol. And that all data is recorded and Reported timely on the National Health Information System (NHIS),
- Ensure that inaccessible HFs still receive their share of malaria commodities based on reports and consumption needs whether visited or not, this includes *Community Malaria Volunteers (CMVs) under Home Management of Malaria (HMM) Program*,
- Provide support and assistance to the Provincial Malaria Control team for efficient program monitoring and evaluation (M&E).
- Strengthen Continuous Quality Improvement (CQI) activities in Morobe Province.

BRIEF BACKGROUND INFORMATION OF MOROBE PROVINCE

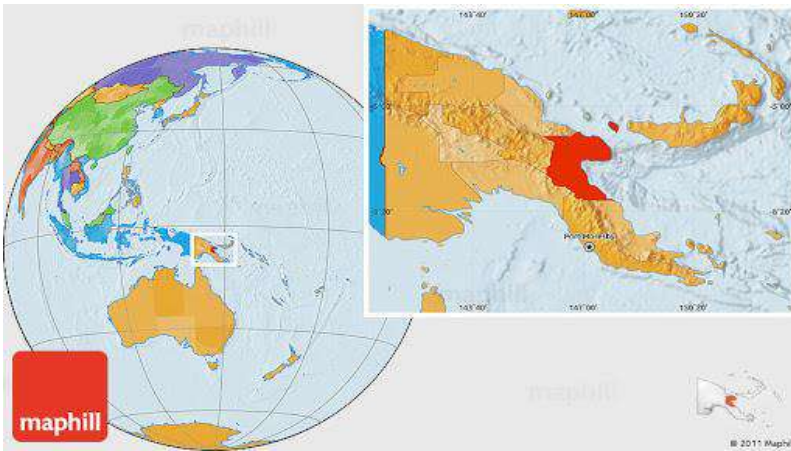
Morobe is the largest Province in Papua New Guinea (PNG) that covers a landmass of 33,705 km². It is also the most populous province in the country. According to **2011 census**, there was a population of **674,810**, and approximately **974, 093** with a **2.00%** growth rate according to **NHIS, June 2023**.

The province is located on the North Eastern part PNG and shares common borders with Madang, Eastern Highlands, Gulf, West New Britain, Central and Oro provinces. Lae City is the Provincial Capital located in the centre of the country and is the second largest after the Nation's capital Port Moresby City.

Morobe province has **10 administrative districts** since 2022 with 55 Registered Reporting HF and 352 Aid Posts (AP)s. As per 2023 NHIS Malaria Report only 53/55 HFs are currently reporting.

The province also has diverse geography, which includes highlands, mountains, valleys, coastal areas and islands. Each of these regions present unique challenges to service delivery, and in this case for quarterly malaria supervisory visits with drugs and ANC nets distribution.

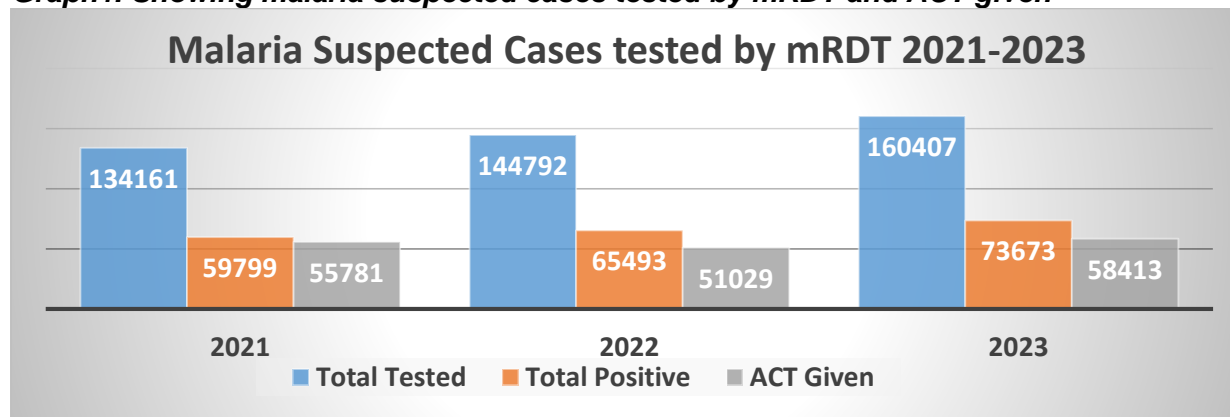
Figure1. Map of showing Morobe province in PNG.



1. MALARIA SITUATION IN MOROBE PROVINCE

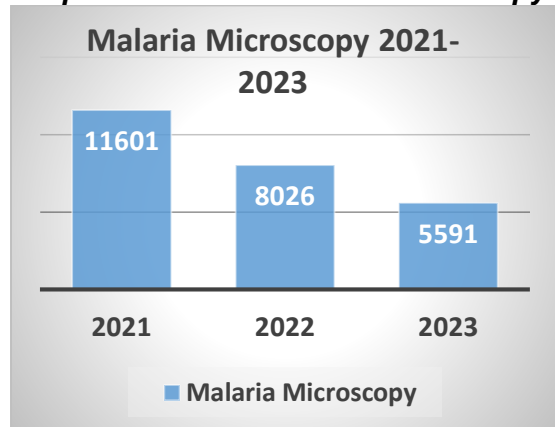
The graphs below highlight the Malaria Situation in the province in the last three years of **Global Fund (GF)- malaria grant cycle (2021-23)**, as per NHIS Reports (23.02.24).

Graph1. Showing malaria suspected cases tested by mRDT and ACT given



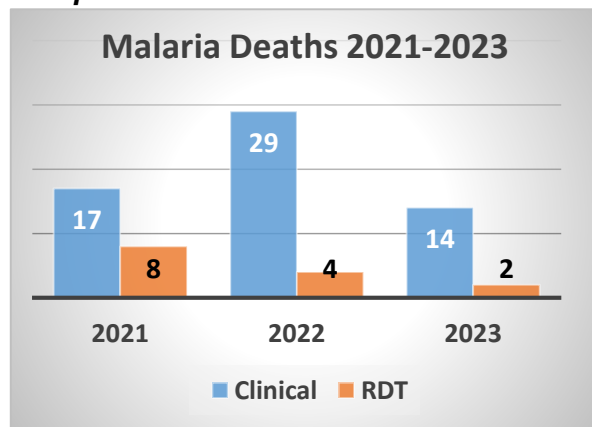
Source: NHIS Malaria Summary Report (23.02.24)

Graph2. Recorded Malaria Microscopy



Source: NHIS Malaria Report (23.02.24)

Graph3. Recorded Malaria Deaths



Source: NHIS Malaria Report (23.02.24)

Graph 1 shows increased number of RDTs done on suspected Malaria cases in 2023 compared to the last 2 years. This may also mean;

- Uninterrupted supply of malaria commodities to all HF's resulting in NO Nil Stock of RDT kits,
- Active case detection activities from HF's and from CMVs and
- Improved reporting coverage, which captures reports from aid-posts and from CMVs that were previously undetected hence unreported,
- **20 additional e-NHIS** reporting tablets given by ADB in April 2023 are well utilized.

However, not all positive cases were given ACTs and this could possibly be from stock outs in remote HF's while awaiting stock replenishment.

Graph 2 shows the microscopy diagnosis drastically dropped since 2021 (*however expected to gradually increase in 2023 as more pending reports are approved*). And for **graph 3**, there was a drastic increase in clinically diagnosed deaths in 2022 and then a drastic drop in 2023. While for RDT confirmed deaths, there been a steady decline since 2021.

It is hoped that this steady decline is maintained or NO MALARIA DEATHS to be reported starting this year as a way forward to **(National Malaria Strategic Plan 2021-2025). National Mortality (cases/100,000 pop) to reduce to ≤0.40 % by 2024.**

NOTE: It is important to also note the percentage of reports in which the 3-years' data is obtained from:

- 564/636 expected monthly reports for 53 active Reporting HF's in **2021= 89%**
- 566/624 expected monthly reports for 52 active Reporting HF's in **2022= 91%**
- 420/636 expected monthly reports for 53 active Reporting HF's in **2023= 66%**

Therefore, malaria data presented above may vary as more outstanding reports get captured.

2. STOCK SITUATION- mRDT, ACT and PRIMAQUINE

Table1. Indicates quantities of commodities received from NDoH, GF and MoPHA for Q1,2024.

Malaria Commodity	Total	Batch Numbers	Funding Source
RDTs	7000 boxes/ 25 test kits	H006C007D	NDoH
RDTs	312 boxes /25 test kits	75C0822S	GF
ACT6	248 boxes/ 30 blisters	7254175	GF
ACT 12	476 boxes/ 30 blisters	7254177	GF
ACT 18	312 boxes/ 30 blisters	7254367/805	GF
ACT 24	801 boxes/ 30 blisters	7254203	GF
PQ	6000 containers/100 tabs	15112	NDoH
PQ	1000 containers/packets per 100 tabs	251031/KE23434	MoPHA
ANC Nets	80 bales x50= 4000 ANC nets		GF

There was sufficient stock of RDT and ACT since Q4-2023, as these commodities were received early from both Area Medical Stores (AMS)s Lae (NDoH) and RAM Office (GF) in preparation for Q1-2024 distribution.

However, for PQ stock, there was a temporary stock out since both NDoH and GF didn't have supply to issue on time.

Fortunately, Morobe PHA quickly intervened by purchasing, (1000 x100 tablets) of PQ to support early Q1 distribution while awaiting additional stock from AMS Hagen (NDoH).

These stock were used to ensure that there was **NO STOCK OUT**, and for all HFs to receive Q1 malaria commodities whether visited or not, based on their monthly reports and consumption needs.

Note: Remaining stock after Q1 distribution are being kept as buffer in the Provincial Transit Store for any HFs that may face stock outs before Q2 distribution.

Table 2. Buffer stock as of 22.02.24

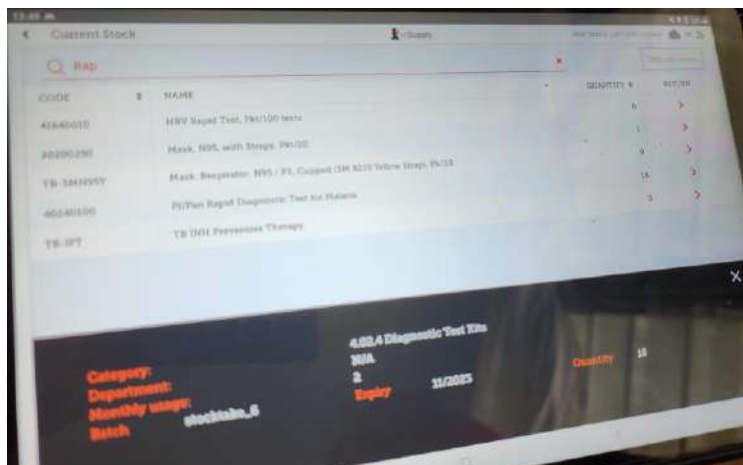
Malaria Commodity	Quantity in provincial transit store	Source
RDT	3250 boxes/25 test kits	NDoH (AMS Lae)
ACT 12	86 boxes/ 30 blisters	Global Fund (RAM)
ACT 18	19 boxes/ 30 blisters	Global Fund (RAM)
ACT 24	218 boxes/ 30 blisters	Global Fund (RAM)
PQ	4450 containers/ 100 tablets	NDoH (AMS Hagen)
ANC Nets	27 bales/ 50 nets	Global Fund (RAM)

STOCK MANAGEMENT AT HF LEVEL- Stock cards

Stock Cards are paper based stock inventory system for monitoring daily movement of malaria commodities at the HF level. Some HFs also have their own manual stock management books and Stock cards are not always utilized.

m-Supply tablets which were also introduced to manage inventory of medical supplies issued through AMSs are also used to manage malaria commodities, as done by Buang HC (Bulolo district).

HF such as Milfordhaven HC, Haikost HC, Mary Queen of Peace Clinic, and Centre of Mercy clinics in Lae, and Aseki HC and Kwaplalim HC in Menyamya district and now Sialum HC in Tewai Siassi district are constantly maintaining stock-cards along with mSupply tablets.



m-Supply tablet being used to monitor current stock of mRDT at Buang HC, Bulolo district. 12.02.24

ANTENATAL CARE NETS

Distribution of ANC nets is also supported by GF; where treated mosquito nets are issued to pregnant women upon their first visit to the ANC clinic.

For 2024, a total of 8 bales x 50 (400 ANC nets) brought forward from 2023 were distributed to HFs that provide ANC services in Jan 2024. After few weeks of STOCK OUT, RAM supplied 80 bales x 50 (4000 ANC nets) to the province on 16.02.24, of which 1350 nets were distributed on the same day.

ANC nets distribution is still ongoing and will be coordinated by the Provincial Malaria team, and this shall cater for the pregnant women who may have missed out during the stock out period based on records in respective clinics. **Thus NO ONE should be left out.**

3. INTERMITTENT PREVENTATIVE TREATMENT in PREGNANCY (IPTp)

IPTp is when Fansidar is given to Pregnant women as a malaria prophylaxis. Fansidar is procured by NDoH and supplied by AMSs through routine HF supply. According to the World Health Organization (WHO), a pregnant woman should take at least 3 doses (3 tablets/dose) of fansidar in a 1-month interval starting from second trimester of pregnancy. However, only the first dose is captured in the ANC Care Register book in the clinic while remaining doses are registered in their respective clinic books. This is the same finding observed during each HF quarterly visit.

4. SUMMARY OF Q1-2024 HF SUPERVISORY VISIT & DRUG DISTRIBUTION

Q1 HF Visit and drug distribution took place between January- February 2024. All road accessible HFs were visited except for Boana, Torowa and Wantoat HCs due to current road conditions. As always, malaria reports collected and stock distributed/replenished based on consumption assessments as per reports, and onsite refresher trainings held with staff present based on needs identified at the time of visit.

There was NO STOCK OUT in general, and all HFs had received Q1 malaria commodities whether visited or not.

In this quarter, 2 inaccessible HFs in Huon Gulf (Zaka and Morobe HC) were physically visited by Provincial Malaria Coordinator (PMC) Lucy Dally, while others in parts of Finschaffen and Tewai Siassi districts, malaria supplies were delivered by the HMMO Mr. Misek Melkio during his visit.

The remaining inaccessible HFs, consignments will be made via Lutheran Shipping Services, while those officers that travel in Lae to submit monthly reports or for other

business, this will also be an opportunity to collect their Q1 supplies, as there is no reliable airline operator at the moment with fixed schedule to deliver supplies on time.

This is the similar approach taken each quarter to ensure 100% distribution coverage of malaria commodities throughout the province whether physically visited or not and that physical HF visits to inaccessible HFs are also expended based on local assessments each quarter.

The table below shows summary and the mode of distribution used

Table3. HF Visit coverage

Q1	
26	HFs which were physically visited and distributed
12	HFs not physically visited but commodities were picked up at PHO
7	HFs not visited but commodities left held in trust at Malaria Transit Store
2	HFs Closed
27	Total Accessible HFs
26	Total Inaccessible HFs
53	Total HFs open
6	Air Drop off HF sites
96.3	Coverage Percentage of Accessible HFs Visited
49.057	Coverage Percentage of Total HFs

Table4. HFs physically visited

No	Date Visited	District	Health Facility	No	Date Visited	District	Health Facility
1	29.01.24	Lae	Tent City	16	14.02.24	Bulolo	Mumeng HC
2	29.01.24	Lae	Igam Clinic	17	29.01.24	Nawaeb	Situm HC
3	01.02.24	Lae	Center of Mercy	18	26.01.24	Huon Gulf	Wampar HC
4	01.02.24	Lae	Buimo	19	21.02.24	Huon Gulf	Morobe HC- Visited by PMC
5	05.02.24	Lae	Haikost	20	21.92.24	Huon Gulf	Zaka HC- visited by PMC
6	05.02.24	Lae	West Taraka	21	19.02.24	Markham	Mutzing HC
7	05.02.24	Lae	Milfordhaven	22	19.02.24	Markham	Tsuia HC
8	07.02.24	Lae	Malahang	23	13.02.24	Menyamyama	Aseki HC
9	08.02.24	Lae	Butibum	24	13.02.24	Menyamyama	Kapo HC
10	21.02.24	Lae	Unitech	25	13.02.24	Menyamyama	Menyamyama HC
11	20.02.24	Lae	Angau Hospital	26	13.02.24	Menyamyama	Kwaplaim HC
12	12.02.24	Bulolo	Buang	27	13.02.24	Menyamyama	LHS-Menyamyama mobile clinic
13	12.02.24	Wau/Waria	Wau	28	05.02.24	Lae	Sir Bob Sinclair U/Clinic
14	12.02.24	Bulolo	Watut	29	29.01.24	Lae	Mary Queen of Peace U/C
15	14.02.24	Bulolo	Bulolo Hospital	30	19.02.24	Markham	Sirasira AP

The highlighted HFs are not registered NHIS reporting HFs, however were visited and commodities supplied to them based on their reporting and consumption rates.

Malaria team made HF supervisory visits to at least 7/10 districts in quarter 1 as sea and air accessible HFs were unable to be visited.

CONTINUOUS QUALITY IMPROVEMENT (CQI) ACTIVITIES

As part of CQI, Malaria Refresher Trainings are held at the supervising HFs that are physically visited by the Malaria team during quarterly supervisory visits, and the information is expected to be disseminated by AP supervisors to the respective APs in their catchment.

However, this is not always practical for various reasons, resulting in most AP staff not upskilled on updated information. Therefore, in order to ensure uniformity, these trainings were extended to include AP staff.

In Q1, two CQI trainings were held at Wampar HC on 31.01.24 and at Situm HC on 07.02.24 with 28 and 19 participants respectively.

CQI Training at Wampar HC was co-facilitated by the PMC Ms. Lucy Dally with Assistant, Sr. Rose Aisuk along with Provincial Health Information and M&E officers Wattie. Wando (PHA) and Joshua Gewasa (PATH).

The CQI training covered:

- Basic Malaria Testing and Diagnosis with different brands of mRDT, and correct treatment according to test results,
- brief history of malaria treatment from mono therapy of Chloroquine since the 1940s to the Malaria Treatment Protocol current since 2009, including the two new updates; 1. PQ stat dose in Plasmodium falciparum (PF) malaria, and 2. ACT in first trimester of pregnancy.
- IPTP-Malaria prophylaxis with fansidar in pregnant women,
- Malaria Data collecting tools at HF level and how to report correctly at the end of the month,
- Regional malaria situation and HFs based reporting updates

Mr. Wando and Mr. Gewasa further elaborated on importance of quality data using all reporting tools including e-NHIS tablet, and also the consequences involved in noncompliance.

Wampar HC is one of the largest reporting HFs in the province that has a large AP catchment including CMVs, thus it was encouraging to have participants from these catchment APs participate and now be in uniformity with their supervising HF. One of the resolutions included, AP staff submitting monthly reports early and entering this data in the e-NHIS tablet so as to share workload with existing data entry officer.

The 28 participants were from Wampar HC (Supervising HF) including staff from 8 APs: *Zifasing, Muya, Bubia, Babuaf, Bishop Henry, Tsilitsili, Uruf and EBC Clinics.*

CQI training at Situm HC was co-facilitated by Sr. Rose Aisuk and Mr. Gewasa with the same content covered but with more HF specific data.

Similar to Wampar HC, Situm HC is also one of the largest reporting HFs that generates monthly data from APs and CMVs as well.

Buhalu Clinic also has CMVs under its catchment, however due to geographic challenges, monthly reports are sometimes submitted late to Situm HC and as a result, data being missed out. However, since receiving an additional e-NHIS tablets from ADB in April 2023, Buhalu staff now enters data directly from his HF.

Since then, there has been a significant increase in malaria data generated under Situm HC catchment; i.e. mRDT reports increased from **11281 in 2022 to 16445 in 2023**.

This is a clear indication that additional reporting tools and trained staff can surely improve timely reporting and hence produce more realistic data.

The 18 Participants were from Situm (Supervising HF) and staff from 5 APs: Hobu, Widiru, Appo, Musom and Buhalu clinics.

*Both Wampar and Situm HC report for a large population catchment. And with collaborative team effort, both HFs maintained commendable **zero malaria clinical reports in 2023**; Wampar HC with 46.6% positivity rate and Situm HC with 51.4% positivity rate.*

PHIO talking to Wampar CQI participants 31.01.24



CQI Participant at Situm 07.02.24



HOME-BASED MANAGEMENT OF MALARIA (HMM)

HMM Program has been in the province since 2020 where it is serving the rural communities with basic malaria testing and treatment through trained CMVs. This program is currently being implemented in the high malaria burden communities of Markham, Nawaeb, Huon Gulf, Finschaffen and Tewai Siassi Districts.

Since 2020, a total of 275 CMVs were trained. 225 CMVs are currently active and serving in the communities, and additional 93 CMVs expected to be trained this year.

There are two Provincial based HMM Officers (Ms. Elizabeth Agena and Mr. Misek Melkio) who are employed by RAM through Global Fund, that oversee the HMM program and are closely supported by the PMC Ms. Dally and Assistant Sr. Aisuk.

VEHICLE SUPPORT

There are 6 program vehicles currently stationed in Lae to support Malaria Program Activities:

- LBI 466, LBI 467, CAW 761, GAC 677 and the recently purchased MAH 897 under RAM and,

- PAH 410 under MoPHA.

- In November 2023, a new vehicle for Therapeutic Efficacy Study (TES) program was purchased and is currently stationed at NCI yard in West Taraka.

CAW 761, LBI 466/467 and PAH 410 are currently undergoing repair and maintenance work funded by RAM through Global Fund.

SUCCESS

1. NO Major Stock outs of malaria commodities at the provincial and HF level.
2. Additional Program Vehicle for HMM Program (MAH 897)
3. Completed 2 CQI Trainings in Situm and Wampar HFs
4. Partnership with PHA and other partners

CHALLENGES

- Angau Hospital data collection and reporting remains a challenge.
- Very challenging to visit fly out areas as NCA doesn't have a fixed flight schedule, and PHA assistance is needed for charter flights

WAY FORWARD

- Leadership and Intention needed from Angau Hospital Sectional heads to address chronic data collection and reporting issues
- Liaise with DHAs and Local MPs on how best to support logistics assistance for HFs in fly out areas.
- CQI Activities to be extended to all districts

ACKNOWLEDGMENTS

- Rotarians Against Malaria- Global Fund
- Morobe Provincial Health Authority (Mo-PHA)
- Morobe Provincial Malaria Coordinator (PMC) and Assistant
- Provincial Health Information Office team
- PATH team
- Mo-PHA Drivers
- HMM Officers
- Officer in Charge and staff of all health facilities visited
- AMS Lae- supplying RDTs (80+60) cartons
- AMS Hagen- supplying PQ (20 cartons)
- District Health Managers, and Staff in all 10 districts
- Lutheran Shipping Services staff- transporting Malaria supplies

PHOTOGRAPHS

HMM Officers with new HMM program fleet MAH 897 30.01.24



Dr. Munir meeting with Morobe Malaria Team 30.01.24



Situm CQI session 07.02.24



Madang HMM fleet MAH 898 delivered to team at Ramu 01.02.24



ANC first visit women with husbands after health education on use of ANC nets during pregnancy (Situm HC 19.02.24)

Stock card update with Sirasira clinic staff (Markham district) 19.02.24

