# MEP February 2024 Report

*In February, the MEP "Lima" ranger team deployed a drone to monitor collared elephant Isiah supported by the Royal African Foundation.*

## GENERAL

MEP rangers and researchers take their roles as ambassadors within the communities very seriously. They are not just ambassadors for wildlife, or habitat, but they embody the idea that you can make a living working in a field that ignites your passion. In February, the MEP long-term monitoring (LTM) team visited three Mara schools to present on their elephant monitoring and identification work and, most importantly, the vital role youth play in the future of the Mara's wildlife and wild spaces. The 250 students from Sekenani and Ololchurra schools and the Semadep Foundation's school were enthusiastic learners, and the MEP team was bolstered by their time spent with the next generation of Kenyan conservationists.

## SECURITY, ANTI-POACHING & CONFLICT

On February 5, the MEP mobile ranger team were monitoring elephants when they noticed a bull with a wire snare wrapped around his back leg. Poachers use both rope and wire snares to capture smaller wildlife like antelopes, but they can be equally as harmful to big animals like elephants. MEP rangers immediately called in Kenya Wildlife Service (KWS) Vet Dr. Njoroge from the Sheldrick Wildlife Trust Mobile (SWT) Vet Unit and assisted his team to remove the snare. Luckily, there was minimal damage to the foot, but rangers will continue monitoring him as he recovers.



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Anti-poaching activities remain a focus for MEP rangers. Since the pandemic, the demand for bushmeat has increased, and poachers use snares to injure and kill wildlife for bushmeat. In 2023, MEP rangers alongside our government partners removed the second highest number of snares in organizational history, and their efforts continue in 2024. In February, MEP rangers removed 35 snares in their various areas of operation, preventing further injury and death of wildlife and thwarting poacher's attempts at consuming or selling bushmeat.

Farmers in the Mara are almost ready to harvest their short season crops, increasing the likelihood of conflict with elephants. In February, MEP rangers rapidly responded to conflict day and night using tools both old and new to help safely resolve these escalating incidents.

The Wildlife Research and Training Institute (WRTI), KWS and MEP have tracked elephants in the Marmanet Forest after the first elephant, Vasco, moved from the Mau Forest to the Marmanet Forest alerting us to a security risk for elephants in the area. Since then, we've partnered on the ground to increase protection for the elephants in this forest including collared elephant Lolotoo. Collared in February 2022, this big bull, moves between the forest and Leakey's Farm southwest of the forest bringing him close to settlements. In February, the team of rangers and scouts overseen by MEP used his movements to intervene protecting both Lolotoo and the community as he navigates this complex landscape.

Overall, in February, MEP rangers alongside government partners arrested five habitat destruction suspects, confiscated 18 pieces of timber, 20 posts, destroyed three charcoal kilns, mitigated 17 conflict incidents and covered 1,631 km on foot patrol and 7,989 km by vehicle in GME.



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## HELICOPTER

Bull elephant "Tino" was collared in early January by the WRTI, KWS, and MEP to monitor his location in real-time as he was identified as a frequent crop raider in settlements along the Tana River. Just a week after his collaring, and thanks to the real time tracking, the MEP helicopter responded to an escalating conflict incident to move Tino out of a heavily developed area and his interactions with the community continued to escalate from there. That's why KWS mobilized their capture unit from Nairobi to translocate Tino to the Tsavo East National Park. MEP provided aerial assistance to the ground teams thanks to support from Rob Walker. Today, Tino remains in the protected Tsavo area and has resumed daily life without the frequent interactions with people.

## DRONES FOR CONSERVATION
### Special Projects Manager's Update

In February, MEP rangers monitored three collared elephants using drones and in Fitz's case, when his collar stopped reporting, rangers were able to deploy a drone to check on his collar, which started reporting again. The MEP Lima Team in Mosiro has been regularly monitoring a herd of elephants in the Rift Valley. They have been responding to increased conflict incidents as well. The "Golf" ranger team not only responded when Fitz's collar stopped

reporting but also to conflict incidents when Fitz's group encroached on farms at night. They successfully responded and pushed the herd out of maize farms in all cases. The MEP mobile ranger team deployed the Elephant Cooperation drone to push four bull elephants out of a settlement area. The increase in fencing is disrupting landscape connectivity which results in more mitigation situations for MEP rangers, and drone continue to be a key tool for our rangers to rapidly move elephants out of fences and back to safety.



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As part of the MEP's support to our partners and being the only UAS training organization in the Mara, we conducted comprehensive day and night operation training at MEP HQ for rangers from the Mara Triangle in February.

*Collared elephants Isiah and Polaris all monitored in the month of February be MEP rangers using drones.*

## COMMUNICATIONS & FUNDRAISING

Mara Elephant Project is delighted to have hosted the first ever UK event on February 5th at the new Broadwick SoHo that saw 50 attendees including MEP's donors, partners and friends come together for a night full of networking and fun. MEP CEO Marc Goss addressed the attendees, sharing more about MEP's operations and impact over the years. The reaction was positive, and the networking sessions proved to be engaging. MEP expresses deep appreciation for the unwavering support and as we look to increase our presence in the UK, we reiterate our firm commitment to protecting Africa's wildlife, wild spaces and communities.

Mara Elephant Project Trust in Kenya received $13,466 in donations in February. Thank you to Ol Tome Safaris limited, Jeffrey Wu and Basecamp Explorer Foundation for your support. Mara Elephant Project USA received $147,331 in support of MEP's efforts. Thank you to Burt Family Foundation, Sharon Lee Butcher, Mary Ball Howkins, Henningsen Proano Family Giving Fund, Sandra Muscillo, Hart Family Fund, Richard Leirer, David Stulb, Mancini Giving Fund, Terry DeMaria, Joseph Davidson, John and Erica Dillow, Helena Van Dierendnonck, Mary Love, Derly Sanosuosso, Susan Carter, Joy Davenport, Maria Forte, Michael Johnson, Scott Wallace, Jo Priest, Douglas Philip, Karen Thompson, Ann Rankin, Elizabeth Peyton and Sandra de Roulet for your support.

## RESEARCH & CONSERVATION

### Director's Update

We started out the month by planning a major data cleaning exercise and developing an associated SOP around how we review data being fed into EarthRanger. Eric Gitonga is working



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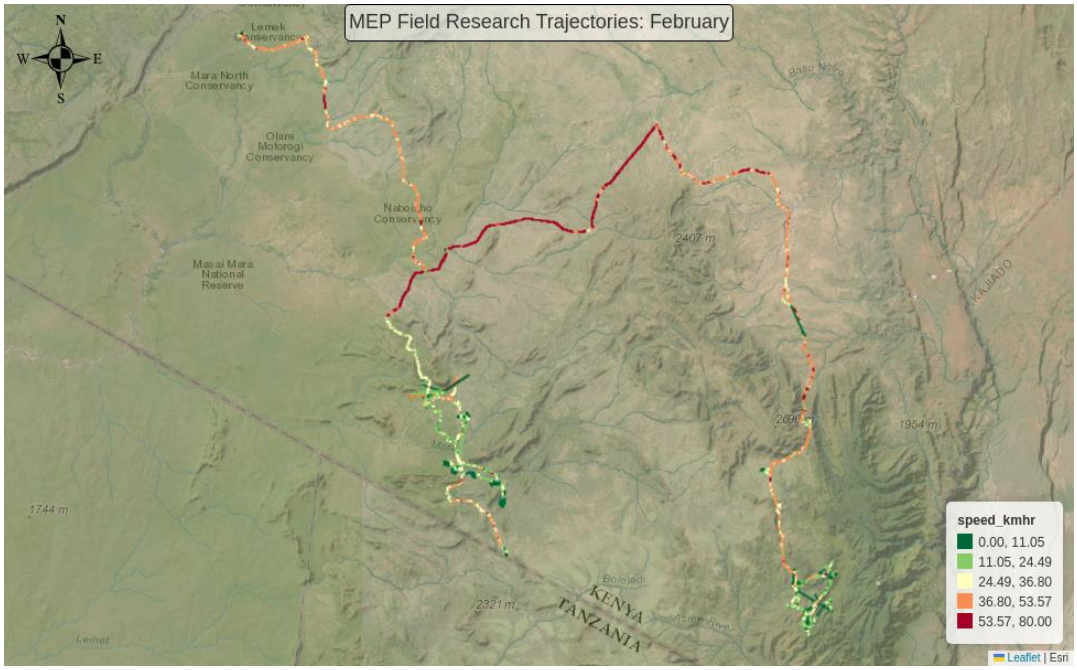
on an Ecoscope Workflow that will help us check all datasets MEP is storing in EarthRanger and this workflow will be useful to other organizations as well once ready. In the middle of February, I hosted Jared Stabach from the Smithsonian Institute at MEP. We spent several days planning the upcoming NASA grant to implement ground-based distance counts and MEP's role within the grant.

We hosted team members from the Kenya Birds of Prey Trust (KBOPT) at MEP for a workshop on EarthRanger and how we could best support raptor-nest site monitoring across the Mara. We had a successful follow-up meeting with the Directorate of Resource Surveys and Remote Sensing (DRSRS). MEP is helping DRSRS to load historic aerial survey data into EarthRanger and develop an Ecoscope workflow for processing the data. Both the DRSRS and KBOPT work are being supported by the Basecamp Explorer Foundation.

I attended a workshop hosted by the One Mara Carbon Project at the Mara Training Centre. We discussed and learned more about the ecosystem level monitoring required by the carbon project and also about the landscape degradation Surveillance Framework (LDSF) developed by scientists at ICRAF in Nairobi. The LDSF provides a very robust framework for monitoring changes in landcover and soil health across the world. MEP will likely be adopting the LDSF tool as part of our work with the MMWCA through their USAID GDA award.




*Movements of MEP's two field assistants during February. All of our field assistants are working on mapping fences, roads and landcover ground-truthing points using motorbikes and our TerraChart app. They recorded 1,364 km of fences and 0 LCC points in February.*



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## MEP Co-Existence Farm
### General Update

In February, the rainfall continued from the second half of the month. The neighboring farms were visited by elephants ready to crop raid and the farmers were busy night guarding their farms throughout the season. The MEP Farm staff were taught how to use various mitigation tools and helped farmers move elephants from their farms before they harvested their crops.

We are happy to receive Linda Whelihan, who will spend six months working with Mara Elephant Project to develop a curriculum for local schools which supports MEP's educational initiative. The Coexistence Farm is focusing on the five crops that have been identified with low predation levels, rosemary, French lavender, chili, tea tree and citriodora, which will now be grown in larger quantities at the farm alongside the economic study.

*Harvested Chili*

*Sugarcane Predated on by elephants*

*Sage affected by heavy rains*

### Co-Existence Farm SITREP: *February 2024*

| Date Time | Plot Id | Type of Crop | Details |
|---|---|---|---|
| 2024_02_25 | 3-11.1 | Sukuma | 4kgs of sukuma was harvested and the farm workers took to their homes |
| 2024_02_25 | 3-11.1 | Sukuma | Goats from neighboring homes invaded the farm and eat sukuma after it was harvested |
| 2024_02_25 | 6-7.2 | Sugarcane | The two plots of sugarcane were predated on by Elephants one plot more than the other |
| 2024_02_25 | 11-13.1 | Sugarcane | |
| 2024_02_25 | 1-3.1 | Sukuma | A total of 3kgs was harvested this plot of sukuma |
| 2024_02_25 | 1-5.1 | Chili | A total of 13 kilograms of fresh chili were harvested in the four plots of chili. |
| 2024_02_25 | 4-11.1 | Chili | |
| 2024_02_25 | 7-3.1 | Chili | |
| 2024_02_25 | 10-11.1 | Chili | |
| 2024_02_25 | 1-6.1 | Capsicum | A total of 4kgs of Capsicum was harvested and taken to the HQ from this plot of capsicum |
| 2024_02_25 | 7-1.1 | Sukuma | Yields of 14kgs was harvested in three sukuma plots, this were consumed by farm workers |
| 2024_02_25 | 9-4.1 | Sukuma | |



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| | | | |
|---|---|---|---|
| 2024_02_25 | 11-9.1 | Sukuma | |
| 2024_02_25 | S2-1-5.1 | Maize/Sunflower/intercrop | A total of 14kgs of chili were harvested in this plot intercropped with maize |

## Climate Report

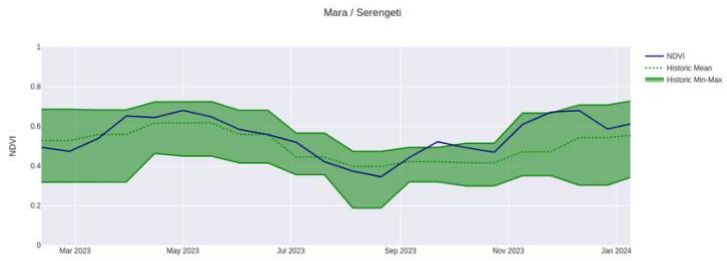
*Table 2: 1 MEP's Experimental Farm Rainfall Recording February 2024*

| Date | Precipitation | |
|---|---|---|
| | Rain gauge 1 (ml) | Rain gauge 2 (200m2) |
| 2024_02_15 | 20 | 13 |
| 2024_02_20 | 25 | 27 |
| 2024_02_21 | 6 | 5 |
| 2024_02_27 | 25 | 18 |
| 2024_02_28 | 40 | 32 |
| 2024_03_01 | 20 | 14 |

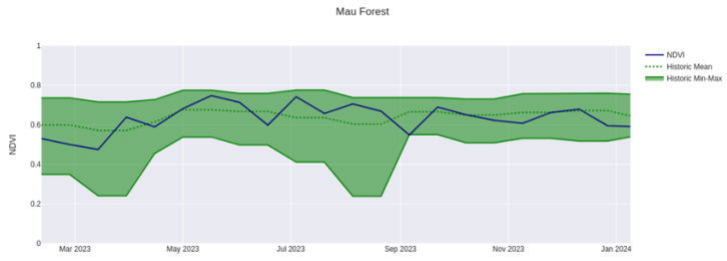
## ENVIRONMENT: NDVI

Normalized Difference Vegetation Index (NDVI) is a measure of plant photosynthetic activity. Higher NDVI indicates the plant is greener. The blue trend line shows the current value while the green shaded area shows the min-max range of values centered around the green trend line from values measured back to February 2000.

### Greater Mara Ecosystem (GME)




### Mau Forest



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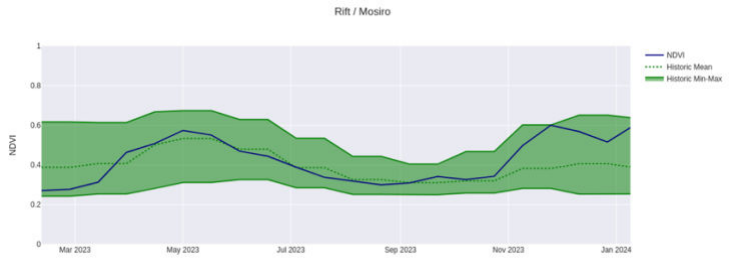
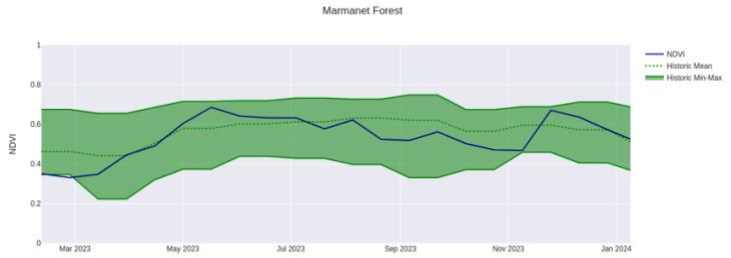
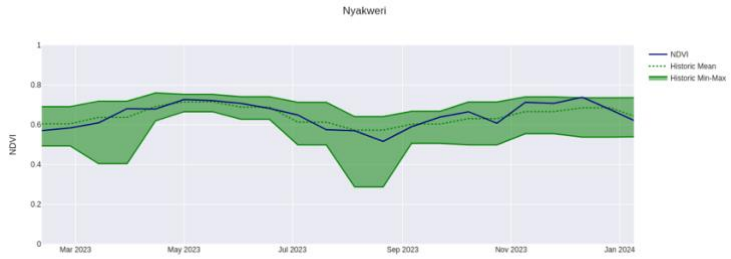
## Rift Valley / Mosiro



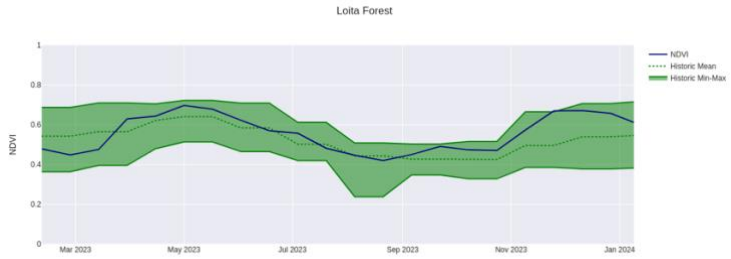

## Marmanet Forest




## Nyakweri Forest




## Loita Forest



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