Protecting elephants to conserve the greater Mara ecosystem
www.maraelephantproject.org

MEP JANUARY 2019 REPORT

Elephants spotted outside the MEP head office on January 19.

We kicked off this year with two notable illegal firearms recoveries and one arrest. MEP intelligence led to the recovery of both firearms at different ends of the Serengeti border area between Kenya and Tanzania. First, 150 rounds of ammunition were recovered then the next day an AK47 and one suspect was arrested by the Tanzania National Parks Authority in the eastern extent of the ecosystem in the Loliondo area. The second firearm was recovered two days later by the Kenya Police based on MEP intelligence near Lolgorian in the western extent of the ecosystem, but, unfortunately, the two suspects escaped. These are two less firearms in circulation which would have been used for poaching wildlife and causing insecurity in the surrounding region.

Currently, in the Mara, there are no crops in the fields; however, in the Mau, there is higher rainfall which leads to two harvest seasons and right now many of the fields have ripe maize crops in them and we are seeing increased human-elephant conflict as a result in the Mau. The David Sheldrick Wildlife Trust (DSWT) Mau De-Snaring Unit rangers based out of the Emitik area have moved to the Olpusimoru forest edge where the elephants were coming out at night to crop raid. They have been using firecrackers, blanks and fires to keep the elephants out of crops. The vehicle cannot get into these areas due to the dense foliage,

which presents a perfect situation where the use of a drone would be ideal if permitted. The helicopter was able to assist once, but most teams are responding to human-elephant conflict at night when the helicopter is grounded.

Elephants crop raiding at night on January 16.

COMMUNICATIONS & FUNDRAISING

Mara Elephant Project started 2019 off with a look back on 2018 by MEP CEO Marc Goss that received a lot of good feedback from supporters. We were also thrilled to announce Dr. Jake Wall officially in his new role as director of conservation and research at MEP. We announced our large ivory bust from December and sent out the Q4 Newsletter to our email list. Marc was featured in his alma mater Evergreen State University's newsletter and MEP rangers received a lot of support on social media for safely escorting a group of kids to school when elephants were blocking the road. The 2019 edition of the Greatest Maasai Mara photo competition began in January and many great submissions were in support of MEP.

A photo entry benefitting MEP from Harman Singh Heer.

We also received an update from Seedballs Kenya that the one million seed balls distributed in November are now starting to sprout in areas destroyed by charcoal.

Photos from Seedballs Kenya of the growth from November.

MEP received around $330 from Facebook donations in January and $3,398 from PayPal. We also received $10,134 from individual donors in January. Finally, in January, MEP was the focus of a video posted on someone's social media feed that falsely claimed to show MEP using the helicopter to separate a baby elephant from its mother. The video in question was actually taken by a ranger at the scene of an incident on July 4, 2018 where the helicopter was used to transport a baby elephant rescued from the Mara to the DSWT orphanage in Nairobi. MEP CEO Marc Goss released a statement giving details of that rescue in order to clarify the false claim. Recently, there have been misleading media reports about conservation efforts in the Mara, and we encourage all media and individuals to not post something until they have thoroughly checked the facts and contacted MEP directly.

RESEARCH

The January 2019 report marks the introduction of a 'research' section to the report that will provide updates on the activities of the collared elephants, the environment and the research team. A research highlight for January is the finalization of MEP's *Individual Collared Elephant Report 2011-2018* that documents in detail the movement patterns of the forty-eight elephants that MEP has tracked since 2011 up until the end of 2018. The 98-page report contains a biography, photo ID, wet and dry season home range maps and statistics plus a movement map and statistics for each elephant. It also provides an estimation of the extent to which each elephant has been crop raiding and how they distribute their time across the landscape, both inside and outside of protected areas. The report generation is almost fully automated using the Python coding language and MEP plans to repeat it every year. Publication of the report, which contains sensitive information, will be made available to the Kenya Wildlife Service (KWS) in February and to other conservation and research partners.

The research team, which consists of MEP Director of Research & Conservation Dr. Jake Wall and Tracking Manager Wilson Sairowua, have been working on setting up the new MEP Earth Ranger server that will be MEP's platform for tracking elephants, aircraft, rangers and vehicles. They have also been working on entering field reports for the monitoring of illegally killed elephants (MIKE), elephant collaring and collar failure events into Earth Ranger for future analysis. As of the end of January, MEP has 14 active collars in the Mara and another two in the Mau Forest.

A rare sighting of Mau Forest collared elephant Bettye and her herd in January.

Protecting elephants to conserve the greater Mara ecosystem
www.maraelephantproject.org

Elephant Tracking: Mara

This month we have seen very little increase in range. The exceptions to this are Tressa and Bettye who increased their ranges by 2.5% and 3.5 % respectively. Shorty changed his range and moved north 40 km and established a new range in the second half of the month. Caroline performed a streak which we define as a high-speed linear movement. This is the first time we have recorded this behavior by Caroline. This month the 14 elephants collared in the Mara covered a combined range of 650 km^2 at a relatively low speed of movement (2.9 kph) and the maximum travel distance was Shorty who travelled 286 km in the month.

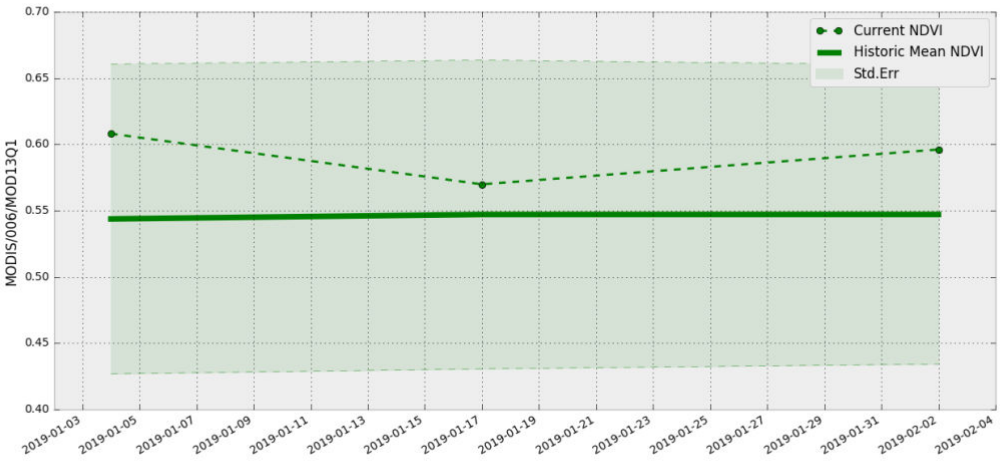
Elephant Tracking: Mau Forest

The two collared elephants in the Mau moved entirely within the forest reserve. Notably Bettye had slower movement of speed compared to Wilbur. Bettye is in an area of thick bamboo forest with more rugged terrain and Wilbur has been in an area of reclaimed forest which is less dense and more open. We recorded and responded to a single crop raiding event on the forest edges by Wilbur. The two collared elephants in the Mau covered an area of 38 km^2 in January and had relatively low speeds of movement and displacement compared to those in the Mara.

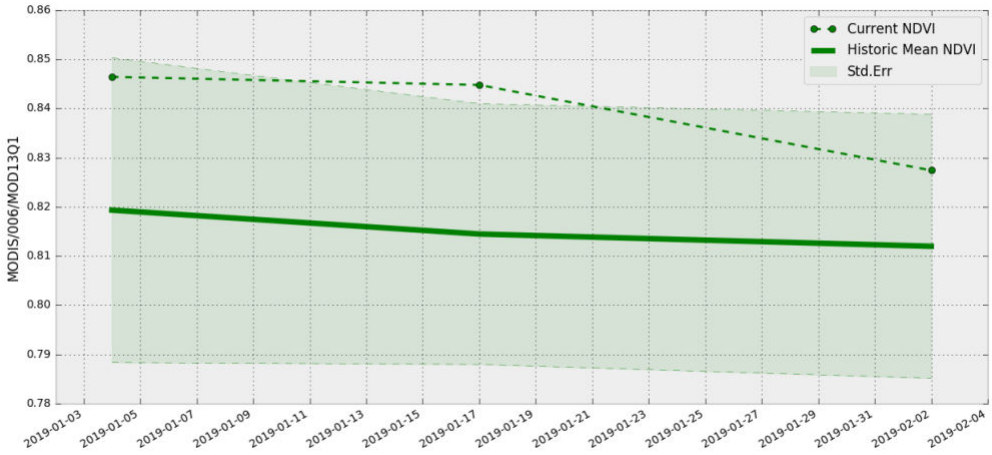
ENVIRONMENT

Using 16-day averaged Normalized Difference Vegetation Index (NDVI) values from NASA's MODIS-Terra satellite, we saw that January was very green and above average in both the Mau and the Mara.

NDVI (Maasai Mara):

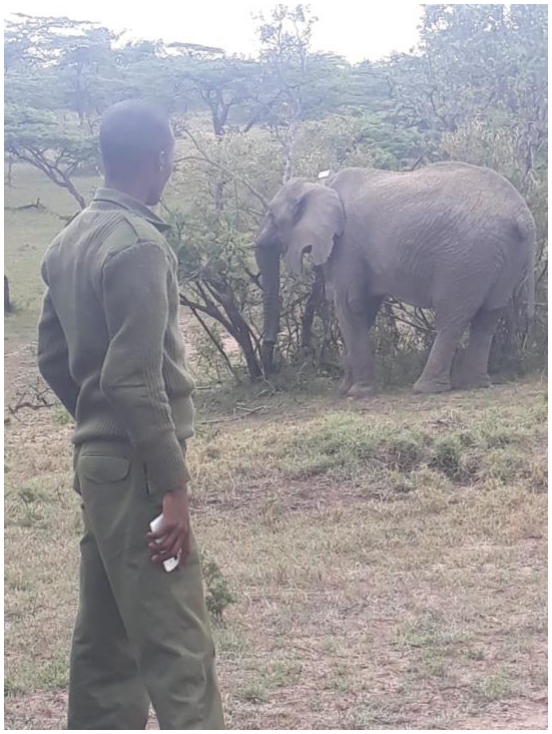


NDVI (Mau Forest):



SECURITY & ANTI-POACHING

In the Siana/Maji Moto area around Olarro Conservancy we are still experiencing elephant deaths from unknown causes. Samples from at least one fresh elephant carcass was collected by KWS scientists from Nairobi to take to their lab. We are waiting eagerly for the results. One suspect was arrested this reporting period with 1 kg of ivory by KWS based on MEP intelligence. Three suspects were arrested, and an illegal logging site was shut down inside the Mau Forest. MEP rangers removed 55 snares and three drop spears inside the Mau Forest and three kilns were destroyed and 20 sacks of charcoal were confiscated in Lemek.



A MEP ranger photographing collared elephant Namunyak while on patrol.

Three suspects arrested for illegal logging in the Mau Forest.

The 20 sacks of charcoal the Enkutoto team confiscated in Lemek.

Protecting elephants to conserve the greater Mara ecosystem
www.maraelephantproject.org

Snares recovered by the DSWT Mau De-Snaring Unit on January 11.

Human-Wildlife Conflict Incidents:

	DATE	REGION	Property Damage	Crops Lost	Details	Action
1	2-Jan-19	Rekero	Fence	None	Wildlife in settlement area	Firecrackers
2	3-Jan-19	Olpusimoru	Crops	Maize	Wildlife in farms	Helicopter
3	3-Jan-19	Olpusimoru	Crops	Maize	Wildlife in farms	Car & firecrackers
4	5-Jan-19	Mau	Crops	Maize	Wildlife in farms	Car & firecrackers
5	7-Jan-19	Olpusimoru	Crops	Maize	Wildlife in farms	Car & firecrackers
6	9-Jan-19	Olpusimoru	Crops	Maize	Wildlife in farms	Car & firecrackers
7	11-Jan-19	Mau	Crops	Maize	Wildlife in farms	Helicopter
8	12-Jan-19	Kishermoruak	Fence	None	Wildlife in settlement area	Car & firecrackers
9	13-Jan-19	Ngosuani	None	None	Wildlife near settlement area	Car & firecrackers
10	15-Jan-19	Rekero	Fence	None	Wildlife in settlement area	Blanks
11	19-Jan-19	Ngosuani	Fence	None	Wildlife in settlement area	Car & firecrackers
12	25-Jan-19	Ngosuani	None	None	Wildlife near settlement area	Vehicle
13	30-Jan-19	Olaro	Fence	Tomatoes	Wildlife in farms	Car & firecrackers
14	31-Jan-19	Rekero	Fence	None	Wildlife in settlement area	Car & firecrackers

Vehicle Tracking:
The vehicles did a combined distance of 11,645 kilometers.

MEP rangers monitoring elephants while on patrol in January.

Ranger Tracking:
The rangers patrolled a combined 1,145 hours and covered a distance of 907 km.

Helicopter Tracking:
The helicopter was extremely helpful this month in the Mau to move elephants away from the crop areas in the Olengurone area of the Mau. Unfortunately, in mid-January, the helicopter suffered an incident that will require several months to repair.

Date	Time	Mission	Source
09/01/2019	1	Return Mara from Nairobi	MEP
01/09/2019	2	Patrol monitoring Mau	MEP
11/01/2019	3.5	HEC in Mau	MEP
12/01/2019	3	Loita patrol and visiting rangers at Naroosura	MEP
14/01/2019	3.5	Lewa to collect donor	Other
15/01/2019	3.5	Nairobi via Suswa and Loita with donor	Other
15/01/2019	1	Meet Mike Prettejohn re BSP	MEP

16/01/2019	3.5	Mara to Nairobi return Marato Pick Karen Blixen guest	Other
17/01/2019	3.5	Patrol Olaro two carcass reported search for more carcasses	MEP
18/01/2019	1.5	Mara to Mau.	MEP
Total	26		

TRAINING & OUTREACH

On January 27, 10 of our rangers and a further 10 rangers from local conservancies attended a three-day forensic crime scene training course held at MEP headquarters all funded by MEP core funder, the Sidekick Foundation. The objective of this course was to enhance the prosecution of wildlife crimes through the forensic crime scene training of first responders. The training will help to ensure the correct collection of biological evidence imperative to effectively prosecuting wildlife offenders.

During the three-day course rangers attended sessions on law and wildlife crime, the investigation of wildlife crime, the handling of witnesses and court decorum. During these sessions, rangers learned the importance of how to determine if a crime has been committed and define what the crime may be. This will enable the ranger to decide on the correct response and provide the reason for further investigation into an incident. Rangers were also given an overview of CITES to gain a sufficient understanding of the different appendices and the categories different species fall into. They also learned the principles of the investigation of a crime which enabled the trainee to understand their task pertaining to enforcement of the law. During the handling of witness's session, they learned how to use the correct method to get information from a suspect or witness and put the information into written format correctly. Finally, using the forensic collection kits invented by Wildlife Traxx Consultancy, rangers learned how to properly gather evidence at the scene of a crime.

The rangers during the forensic crime scene training at MEP HQ.

STAFF

This year we have increased all staff wages by 10% as per our annual increase policy which was implemented at inception to adjust to reflect inflation and also ensure that the job profession as a ranger continues to be competitive and appealing in terms of basic salary. We are also happy to report that we have implemented a new policy for staff, which is to provide school fees allowances for up to two children for each staff member.