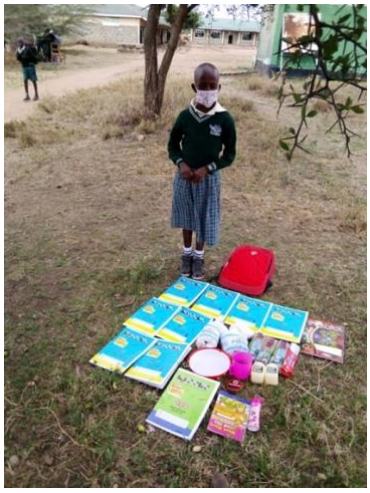
MEP July 2021 Report

MEP celebrated World Ranger Day in July.

GENERAL

The great annual migration of wildebeest and zebra started this month, and the spectacular event is being shared with tourists from around the world. This time last year Kenya was still in lockdown in response to the COVID-19 pandemic. This is a much-needed foreign income generator for Kenya and the Mara.



In November 2017, Seema was thrown by an elephant while out tending to her family's cattle; she was only 6 years old at the time. MEP rangers were first on the scene to administer first aid and move the herd of elephants away from the community. The MEP leased helicopter was called in to airlift Seema to Tenwek Hospital where she made a full recovery. MEP also started paying for her school fees at boarding school as well as her books and uniform to ensure Seema is fully stocked for school every year. Wilson goes back regularly to see Seema at the start of every school year to give her updates on MEP rangers that helped save her. Seema is excited to be back at school in 2021 after such a tough year last year.

SECURITY, ANTI-POACHING & CONFLICT

The MEP intelligence unit alongside Kenya Wildlife Service were involved in a sting operation that resulted in the arrest of two suspects and seizure of 15.8 kg of ivory. On July 26, in the Mabera area, near the Tanzania border the joint team arrested two suspects along with the seized ivory.

On July 19, the MEP / Sheldrick Wildlife Trust (SWT) Mau De-Snaring Unit during their routine patrol of the Mau Forest discovered a temporary camp inside the forest. They arrested two suspects that were illegally logging and making charcoal. In addition, their camp contained 10 snares intended for bushmeat poaching as well as spears and axes. Just a few days after this bust, this team also confiscated 22 snares from the Mau Forest in the Kericho area (*pictured below*). In total in July, MEP rangers alongside government partners arrested two bushmeat poaching suspects, confiscated 2 kg of bushmeat and removed 34 snares.

In total, in July, MEP rangers alongside government partners arrested 11 habitat destruction suspects, recovered one power saw, destroyed 18 kilns and confiscated 14 charcoal sacks, 598 posts and 375 pieces of timber. In July, MEP rangers covered a distance of 1,619.8km on foot, 11,996.4 km by car and 3,696.4 km on motorbike.

HELICOPTER

Elephants residing in the Mau Forest were recently crop raiding potato farms bordering the forest. A herd of 50, which included the formerly collared elephant Max, were raiding nearby potato farms and the MEP leased helicopter was called in on July 16 to push this herd back into the forest and calm the frustrated community. While on the ground, CEO Marc Goss spoke directly with community members and re-directed one of the SWT Mau De-Snaring Units to the area to provide more protection for their crops. After leaving the conflict area, Marc and a KWS officer patrolled the forest from the air and found fresh logging inside the forest. They followed the trail out of the forest and spotted 13 donkeys taking out timber beams. They landed and relieved the donkeys of their loads and contacted a ground team to follow up with the recovery.

COMMUNICATIONS & FUNDRAISING

The 2020 Annual Report was released on July 9 highlighting MEP's work last year. We celebrated World Ranger Day and appreciated everyone's support for our rangers. We received more items from our Amazon Wish List in support of MEP's rangers and research department. Thank you to all of the donors who sent essentials. We had 21 entries in the Greatest Maasai Mara photo competition. Thank you to Fahm Bekele, Clair Nicol, Sophia Balunek, Reana Patel, Aarin Kochhar, Tracy Miller, Mark Boyd, John Spencer, Prakash Sujir, Ritesh Patel, Vijay Harinathan, Thorsten Hanewald, Harshul Thacker, Kian Shah, Krish Hirani, Sushil Chauhan and Fareed Gulamhusein for supporting MEP.

An entry from John Spencer in the GMM photo competition that is one of the finalists for July.

MEP Kenya Trust received a $1,657.50 donation. The Sidekick Foundation, Inc. received $87,685.85 in donations for MEP. This included a new jump in our direct mail payment to $50,000. We also received $5,000 donations from the F. Patrick Kehoe Trust, Wofford Family Charitable Fund and Ameritrade. Additional thanks to the Wilson Sexton Foundation, Mary Jo Mish Keefe, Jan Bell, Gail Peek, Jim Koenigsaecher, Helena van Dierendonck, Geoffrey Peters, Ann Johnson, Robin Poppe, Valerie Doyle, Catherine Balton, Anna Bernhard, Molly Bundyt-Toral, Judy Frank, Michael Johnson and Andrew Wiselogle for your support in July.

RESEARCH & CONSERVATION

Director's Update

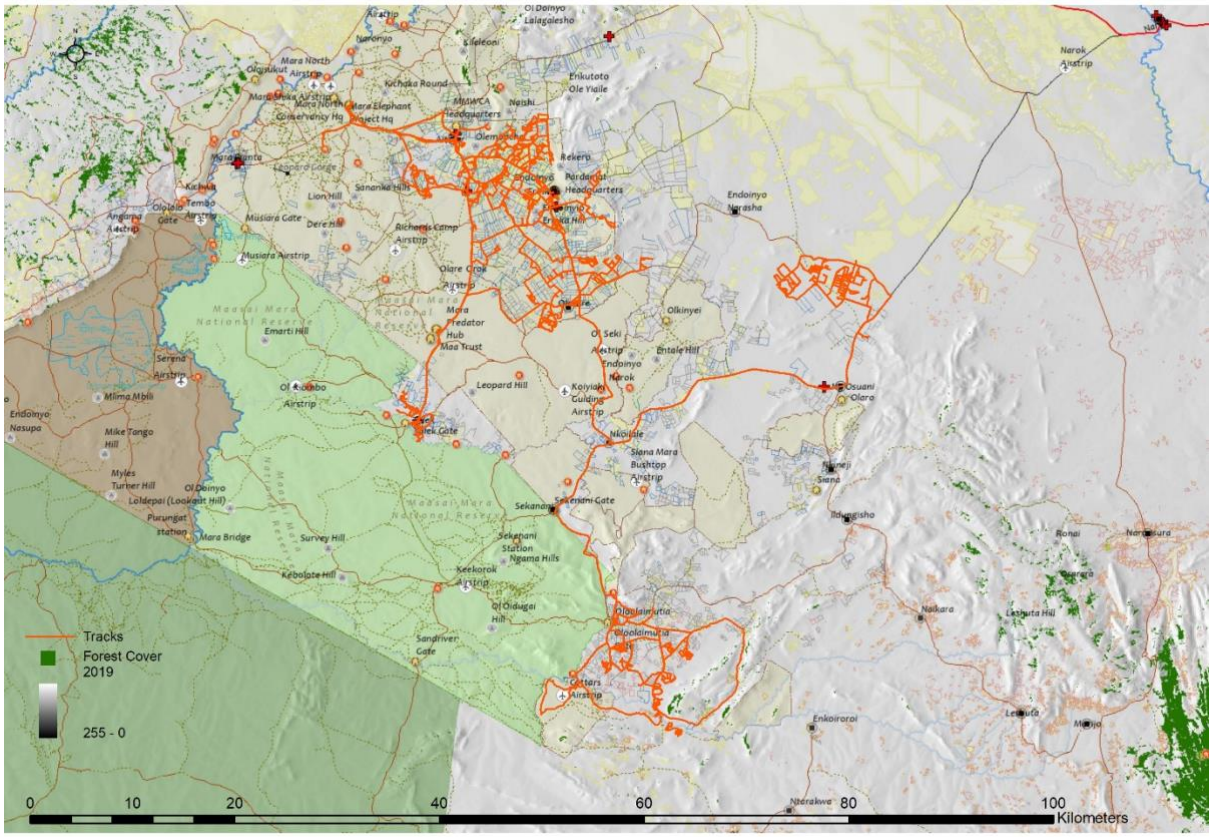
In early July we published a conference paper (*ElephantBook: A Semi-Automated Human-in-the-Loop System for Elephant Re-Identification*) about the ElephantBook platform we have been working on since April 2020. MEP's Long-Term Monitoring team is using EB to catalogue the ~2500 elephants that inhabit the Mara. So far, we've recorded 250 individuals across 410 sightings within Mara North, Lemek and Naibosho conservancies. We've made the code behind ElephantBook opensource: https://github.com/kulits/ElephantBook.

We received another grant from the Esri Conservation Programme for ArcGIS Online and desktop software. We really appreciate the support MEP has received from Esri to date! In July we began trialling the use of a fixed-wing aircraft for elephant monitoring and increasing our capacity for aerial monitoring while reducing costs. I am hopeful that a fixed wing will also increase our capacity for aerial remote sensing and cartography applications.

Our fence team logged another 256 Km of fencing in July, 63 km of which are now defenced areas.

Year	Month	Electric	Other	Wire	De-fenced	Total (kms)

2019	November	48.27	-	18.35		66.62
2019	December	81	-	59		140
2020	January	111.16	4.64	124.71		240.51
2020	February	101.62	1.17	33.99		136.78
2020	March	48.59	0.14	59.76		108.49
2020	April	19.78	0	10.38		30.16
2020	May	24.75	1.88	41.18		67.81
2020	June	15.19	1.48	107.88		124.55
2020	July	37	-	52.76		89.76
2020	August	60.12	7.52	40.08		107.72
2020	September	126.95	7.15	221.44	15.18	370.72
2020	October	109.05	10.57	218.99	1.78	340.39
2020	November	101.2	24.52	153.12	13.88	292.72
2020	December	62.99	9	190		261.99
2021	January	87.9	19.4	121.09	5.2	233.59
2021	February	79.2	22.9	175	-	277.1
2021	March	20.3	7.4	147.92	8.6	184.22
2021	April	80.2	31.05	96.4	2.3	209.95
2021	May	40.3	23.6	296.5		360.4
2021	June	37	44.8	214.2	2.7	298.7
2021	July	21	33.6	138	63.6	256.2
	Total (kms)	**1,313.57**	**250.82**	**2,382.75**	**113.24**	4,060.38



Movements (orange tracks) of MEP's three field assistants during July. All of our field assistants are working on mapping fences, roads and landcover ground-truthing points using motorbikes and our Njia app. They recorded 256.2 km of fences and 14 LCC points in July.

Tracking Manager's Update

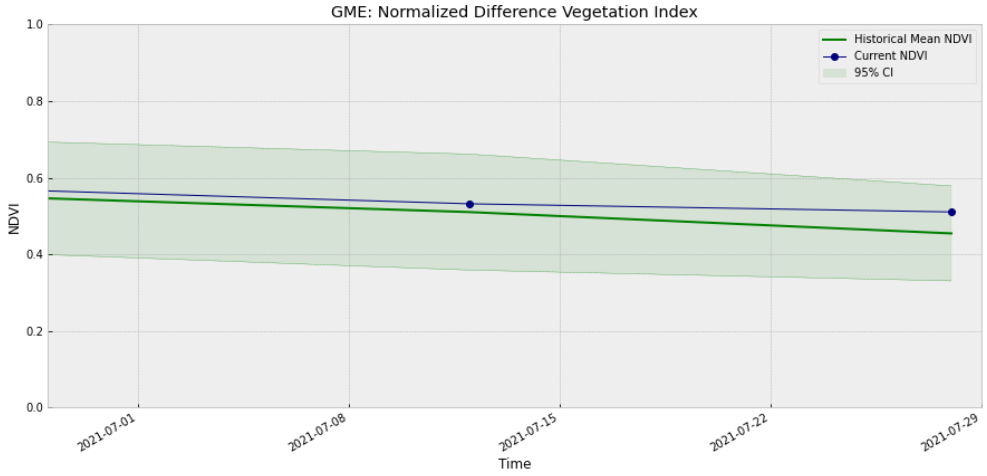
The Mara Elephant Project LTM team along with Conservation Officer Wilson Sairowua spotted collared elephant Kiambi on July 10 in Olkinyei Conservancy while out monitoring elephants in the field.

Fred was spotted on July 7 by a MEP ranger unit while on patrol. Then, later in the month, on July 13, collared elephant Kegol was monitored grazing peacefully inside a conservancy.

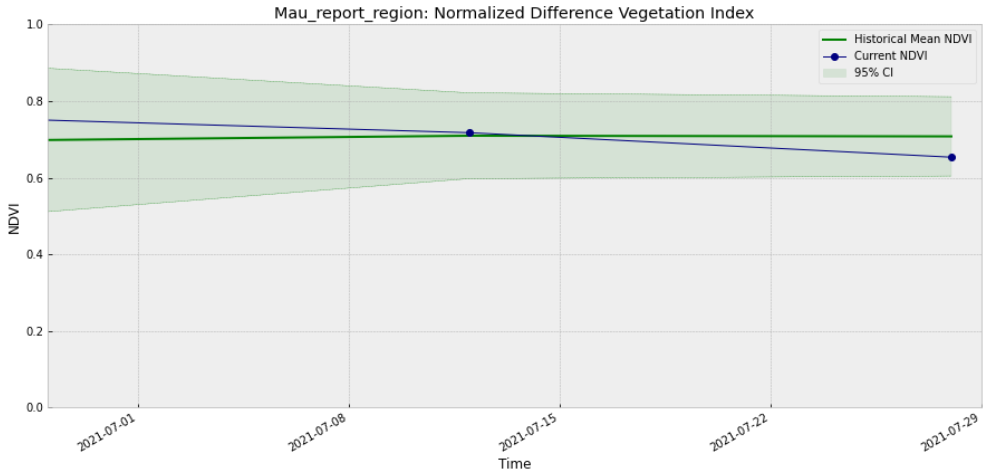
ENVIRONMENT: NDVI

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 area shows the 95% distribution of values centered around the green trend line from values measured back to February 2000.

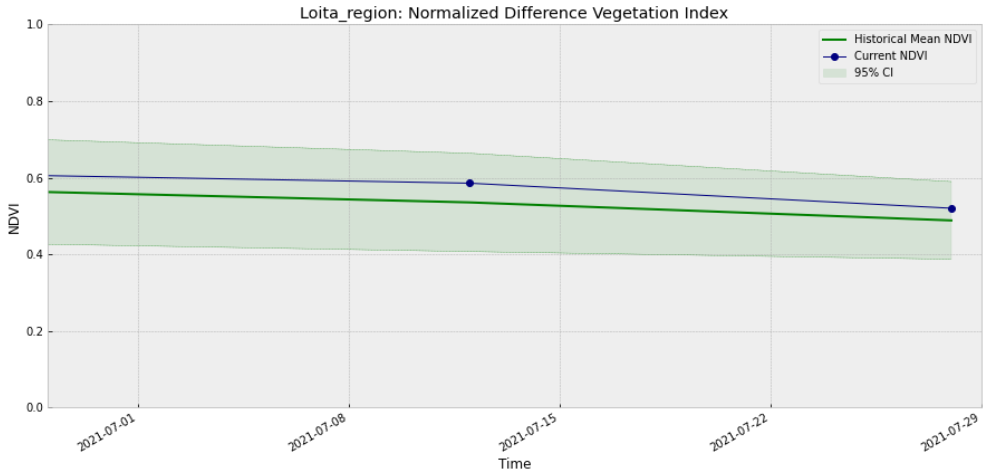
Greater Mara Ecosystem (GME)



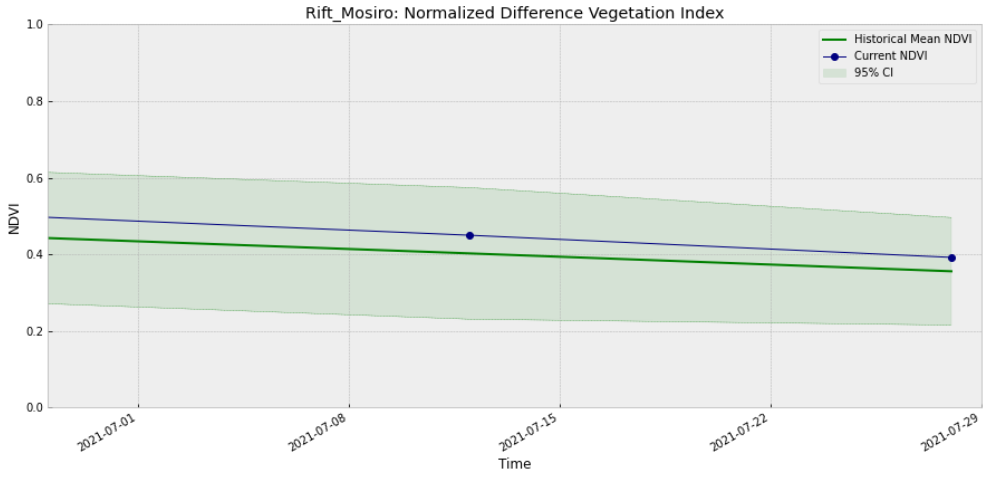
Mau Forest



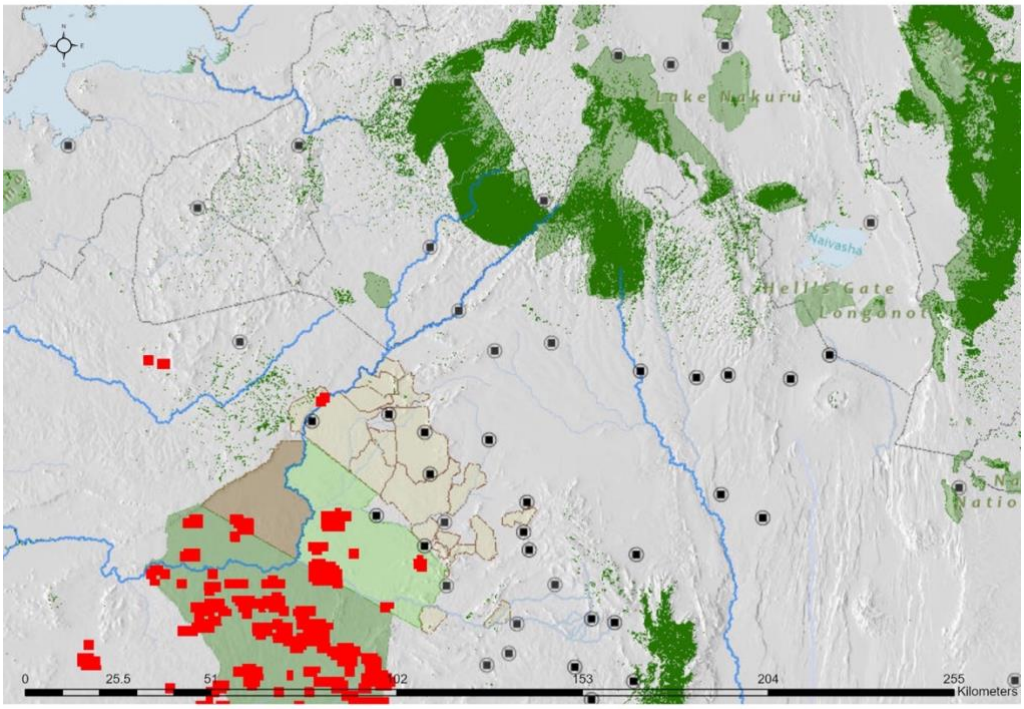
Loita



Rift Valley



ENVIRONMENT: Burn/Fire Areas



Red blocks indicate burn areas as measured by NASA's FIRMS dataset during the period July 1, 2021 – August 1, 2021. Accessed through Google Earth Engine.