

MONTHLY REPORT:

DECEMBER 2018

SUMMARY - AERIAL & GROUND ACTIVITIES ("Big Tusker Project"):

Activity	Hours Flown	Kilometers Covered
<i>Aerial Reconnaissance</i>	70 (863 for year) Average 117km p/h of low-level flight	8,168 (101,262km for year) Flights carried out jointly with KWS staff
	Field Patrol Days	Kilometers Covered
<i>Ground Activities</i> (Joint KWS / TT)	Protection teams: 62 days (860 to date) Monitoring teams: 5 days (455 to date)	Protection teams: 6,084 km (87,513 to date) Monitoring teams: 1,116 km (63,570 to date)
	No. Observed	
<i>Big "Tuskers"</i>	15 Tuskers - 4 Super Tusker bulls, 8 emerging bulls, 3 iconic cow Tuskers	
	No. Recovered	
<i>Ivory recovered</i>	14 elephant tusks (127 for year to date) – (largest tusk 38kg / 84lbs)	
<i>Elephant carcasses</i>	<i>Fresh</i> (less than 3 weeks old)	<i>Recent</i> (less than 3 months old)
	2 – (c of d: 1 poached, 1 natural)	1 (c of d: natural)
<i>Ele. Carcasses/hrs flown</i>	1 every 23 hours of flight	
<i>Poacher camps/hides</i>	<i>Fresh - 2</i>	<i>Recent - Nil</i>
<i>Arrests</i>	4 – by KWS / TT – (1 ivory dealer, 1 bushmeat, 2 illegal livestock - 42 to date 2018)	
<i>Snares/traps recovered</i>	43 (by Tembo Teams – 841 for year to date)	
<i>Response/support to KWS - armed incidents</i>	Nil	
	8 cattle bomas (10,050 + cows, 700 shoats, 9 people)	
<i>Written reports to KWS</i>	59 (daily email reports, various communications & 1 monthly report)	
<i>General & significant notes</i>	<ul style="list-style-type: none"> • Some decent rain in localized spots in Dec18, but some areas still dry • Ongoing support to KWS / STE in locating collared elephants in TCA • Aerial & ground support to Rhino Program in TWNP & TENP, via ongoing partnership with KWS / ZSL. 11 rhino specific recce flights (27.5hrs) carried out with KWS • 18/12/18: KWS / TT removed a cable snare from IPZ rhino after locating this rhino during aerial recce 	

Photo shows a herd of elephant bulls about to pass through the SGR Mtito Andei underpass. This underpass, even though narrow, is used regularly by elephant, buffalo, lion, leopard and hyena.



WILDLIFE CONSERVATION PROGRAM:

“Big Tusker Project”- aerial and ground mobile teams:

Tsavo Trust’s Big Tusker Project (BTP) recorded the following details in the BTP database:

- Total of 15 different individual Tusker’s were observed from ground and air coverage.
- 4 bull Super Tuskers – 11 different sightings.
- 8 Emerging bull Tuskers – 8 sightings.
- 3 Iconic cow Tusker – 5 sightings.
- **Total sightings – 24** (low number due to T2 & T4 on leave this month).
- **Weather conditions:** TT HQ rainfall: **47mm**. Total rainfall at Tsavo Trust HQ to date: **545mm** in 2018.
- **Elephant mortality: 3 carcasses located (2 fresh, 1 recent):** C of D – 1 poached, 2 natural.
- **Rhino security:** Regular aerial recces in support of KWS over TWNP rhino areas in partnership with ZSL. 11 rhino specific air recces resulted in 3,159km flown over 27.5 hrs (9 TW & 2 TE).
- Following locating a snared rhino in TW IPZ, joint KWS / TT operation successfully removed the cable snare on 18/12/18.
- **Collared Elephant:** Ongoing monitoring from ground and air taking place by KWS / TT teams.

Table 1: Shows “Tusker” code, number of times observed during month and brief remarks.

Tusker Code	No. Times Seen / Month	Brief Remarks
BULLS		
LU1	8	In good health, moved location
WS1	1	Moving big distances with rain, to areas not seen before over last 5 years
MU1	1	Normal location
SL1	1	Back to original area found
SH1	1	Moving to unsafe location
SO1	1	Back to original location
BL1	2	Normal location
MM1	1	Normal location
GO1	1	Normal location
KM2	1	Moves around a lot
LA1	1	Back to original location
NG2	1	Normal location
COWS		
F-DI1	1	Moves some big distances with recent rains
F-XT1	2	Normal location
F-AR1	2	New cow Tusker added to data base on 5/12/18
TOTAL	12 bulls & 3 cows: 24 different sightings	
Close working relationship between KWS and Tsavo Trust (aerial and ground units combined) is without doubt adding to elephant security and safety of the big Tuskers and other elephants within the TCA through meaningful collaboration alongside KWS Security and Research & Monitoring Departments.		

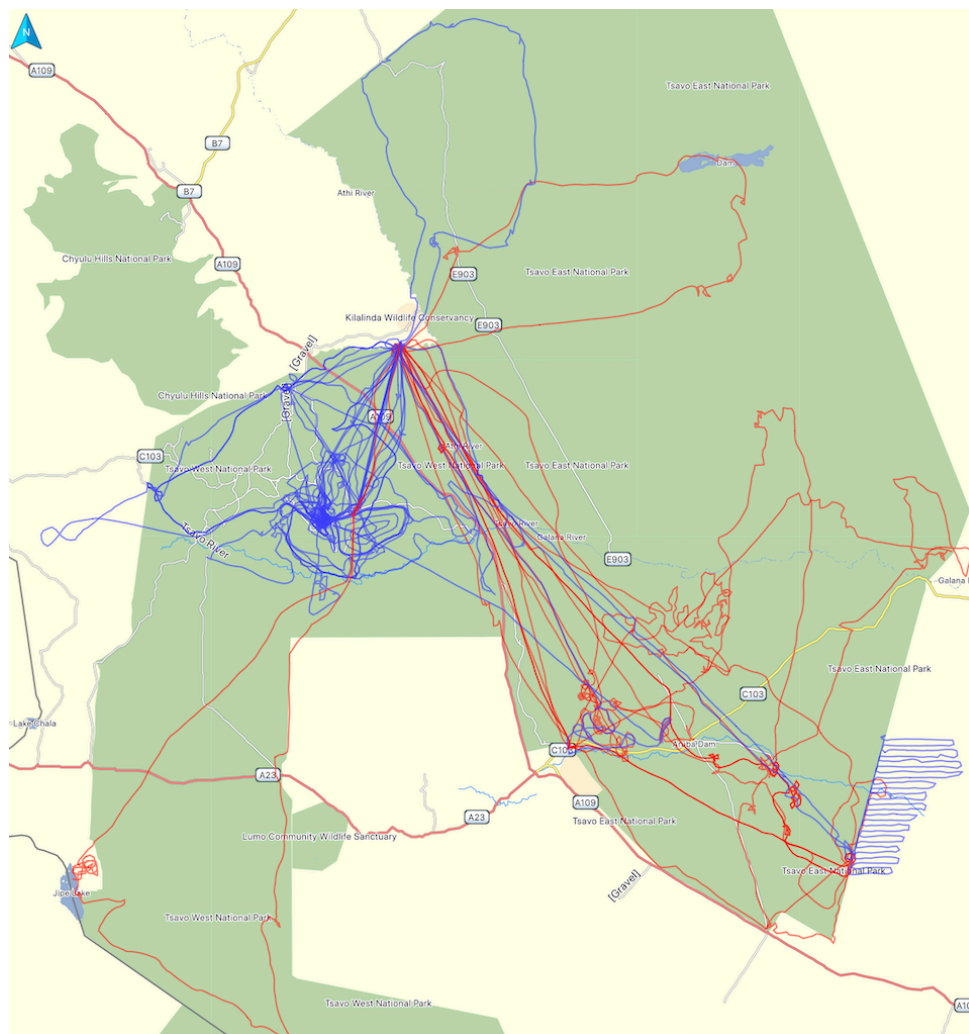


Photo shows iconic cow Tusker coded as F-AR1 (far left) added to the Tusker data base on 5th December 2018, here with her herd of 16.

Areas Covered: Table 2: Shows the main areas covered within the TCA for this month:

TSAVO EAST NP	TSAVO WEST NP	RANCHES & DISPERSAL AREAS
<p>Northern Area – Yatta Plateau, Durusikale, Garasamuke, Emusaya, Golf Charlie, Koitu, Sobo, Sangayaya, Dabaduke, Mufupa ya Ndovu, Tiva River, Ndiandaza, Ya Kalicha, Roka, Gazi, Ithumba</p> <p>Southern Area – Voi, Ndololo, Kanderi, Wagalla, Ndara Plains, Buchuma, Maungu, Murondo, Dakota, Voi River, Dika Plains, Satao, power lines, Aruba, Mukuaju, Dika, Konu Moja, Dida Harea, Balguda, Sala, Lali, Sobo, TENP boundary, Koitu, Galana River</p> <p>Central Area – TE R/S, IPZ, Manyani east, Punda Milia, Hatulo Bisani, Lugards, Mbololo lugga, Balguda, Irima, Mudanda, Maka Hill, Man-eaters, Triangle, Mtito Lugga, Zero Delta, Voi north & east, Galana River, Tsavo River and Yatta Central, SGR</p>	<p>Northern Sector – IPZ, Mangalet, Kamboyo, Kisimeka, Chyulu south, Mtito lugga, Mungai Hill, Finch Hattons, Mzima Springs, Shetani volcano, Severin, Kilaguni, Ndawe, Tsavo River</p> <p>Southern Sector – Murka, Maktau, Ziwani, Serengeti plains, Kanjaro, TZ / Kenya border</p> <p>Central Sector – IPZ, Rhino Valley, NRS, Tsavo River, Kinyek, Maji ya Chumvi (north & south), Ziwani, Lesoito, Kyulu, Manda, Kishushe, Murka, Mombasa Highway, Man Easters, Kenani, Kanga, Manyani north and west, SGR line</p>	<p>TENP border – Ngiluni/Kamunyu, Kulalu, Dere, Murondo, Magram/Dakota Ranch, KMC, Ngutuni, Shirango, Kilifi & Galana Ranch</p> <p>TWNP border – Rombo, Ziwani, Salaita</p> <p>Chyulu Hills NP - Nil</p> <p>Taita Ranches - Lualenyi</p>
<ul style="list-style-type: none"> The locations mentioned above is only an indicator of flight paths taken, many other areas in between are also covered and in so doing providing “eyes in the skies” over Tsavo and directional guidance to ground units. All flight paths are logged and recorded with all relevant real-time observations relayed to KWS on a daily basis for their records as well as necessary rapid reaction. 		

- Map below shows Tsavo Trust’s flight paths (2 aircraft) over the TCA in December 2018. The red path is for aircraft 5Y TTZ and the blue for 5Y NRF. 70 hours flown covering 8,168 kilometers over Tsavo in support of KWS: **Air & ground activities; Big Tusker monitoring; Locating illegal activities; Wildlife monitoring; Aerial census and tracking.**



Field Mobile Units:

Tsavo Trust's mobile field teams work alongside KWS, who take the lead role, on a daily basis. **Tembo 1, 3, 5 teams & Kamungi Scouts** are habitat protection / de-snaring focused whilst **Tembo 2 & 4 teams** are wildlife monitoring based. All teams provide further "eyes and ears on the ground".

Habitat Protection / De-snaring teams:

Table 7: Shows outcomes from field activities from Tembo 1, 3, 5 & Kamungi Scouts teams:

De-snaring teams	No. Field days	No. Arrest	No. Ivory recvd.	No. Snare recvd.	Bushmeat recvd.	Poachers equip. recvd.	No. Poacher camps	Vehicle mileage km
Tembo 1 (6 TT Scouts + 3 KWS Rangers)	31	2 1 bushmeat 18kg lesser kudu, 1 dikdik 1 ivory dealer (via informer)	11 (55kg)	26 2 for small game 24 medium game	18kg lesser kudu, 2kg dikdik	1 bicycle, 1 bow, 4 arrows, 1 panga, 1 knife, cooking equip.	Nil	2,908
Tembo 3 (6 TT Scouts + 3 KWS Rangers)	31	Nil	1	17 16 for small game 1 medium game	Nil	Cooking equip	2	3,176
Tembo 5 / Kamungi 14 TT Scouts + 3 KWS Rangers	On leave	Nil	Nil	Nil	Nil	Nil	Nil	-
TOTALS	62	2	12	43	As above	As above	2	6,084
Total 2018	860	31	45	841	-	-	17	87,513

Monitoring & Evaluation teams:

Table 8: Shows activities carried out by Tembo 2 & 4 teams – research and monitoring:

Monitoring team	No. Field days	Activities	Endangered species records / sightings	Operating locations	Vehicle mileage km
Tembo 2 (3 TT staff + 2 KWS)	4 On leave	<ul style="list-style-type: none"> Tusker monitoring Hirola monitoring Grevy's zebra monitoring Carnivore monitoring Carnivore scat collection for analysis – hair content Mombasa/Nairobi - Road & SGR kill surveys Camera trap surveys Fixed point photos Collared elephant reporting 	<ul style="list-style-type: none"> Tuskers – 1 sighting Hirola – Nil Grevy's Zebra – 5 sightings Large Carnivores – 3 Road & Rail kills – Nil Elephant carcasses – Nil Rain gauge readings Collared elephants – Nil Carnivore scat collect - Nil 	TENP, Ndololo, Kandechea, Kanderi, Aruba, Satao, Mukuaju, Voi, Kono Moju, Dida Harea, Ndara, Ngutuni, Dika plains, Bachuma, Dakota, Msa – Nbi road between Voi & Bachuma, KMC Ranch, Kupule Nek, Manyani, Irima, Mudanda, Ndi	1,072
Tembo 4 (2 TT staff + 2 KWS)	1 On leave	<ul style="list-style-type: none"> Tusker monitoring Rhino monitoring in IPZ Carnivore monitoring Mombasa/Nairobi - Road & SGR kill surveys Rainfall data collection Camera trap surveys Fixed point photos Collared elephant reporting 	<ul style="list-style-type: none"> Tuskers – Nil sightings Rhino monitoring IPZ NRS night census – Nil Large Carnivores – Nil Road & Rail kills – Nil Elephant mortality - Nil Rain gauge readings Collared elephants – Nil Kamungi Cons. Game census transects – 12 species 	TWNP, Kamboyo, Mangalet, Kilaguni, Mungai, Poachers lookout, Kitani, old Chyulu gate, Mzima, Shetani, Finch H, Ziواني, Tsavo River, Rhodesia Hill, pipe line, Rhino Valley, Ndawe, Ngulia, Kenani, Kyulu, Manyani, IPZ, NRS	44
TOTALS	5	As above	As above	As above	1,116
Total 2018	455	-	-	-	63,570

COMMUNITY CONSERVANCY PROGRAM:

- ✓ **Ongoing partnership between Tsavo Trust and Kamungi Conservancy (KC)** (bordering northern boundary of TENP – Triangle).
- ✓ **Employment:** Between Tsavo Trust and its partners 38 permanent staff and 23 casual staff were employed generating over \$ 10,000 (Ksh. 1,000,000) of income into Kamungi every month.
- ✓ **Kamungi Water Project:** 26,340 litres of water was issued from the water dispensing kiosk at Ngiluni Village. Each family is rationed to 60 litres per day.
- ✓ **Ngiluni Dispensary upgrade:** This project is now complete with new roof, water catchment gutters and 2 x 5,000 litre water tanks, verandah, new glass in all windows, re painting inside and out, new ceiling, electric fence around the 3-acre plot. Solar electrics for power and water pipeline delivery.
- ✓ **HWC – Elephant Bee Fences** – 7 x 1-acre bee fences, total 105 bee hives with 20 currently occupied. Due to the poor rains in this area, the bees have not made the honey we had anticipated, and so selective harvesting will wait until early 2019.
- ✓ **HWC** – 46 cases were recorded around Kamungi Conservancy this month. HWC cases: 12 elephant cases, 3 hyenas, 6 Leopard, 9 lion, 2 venomous snake, 7 zebra and 7 gazelle.
- ✓ **Kamungi Forestry Project** – Seedlings have been re planted and ongoing.
- ✓ **Snake anti-venom** – Supply for venomous snakes – Tsavo Trust partners with the James Ashe Anti-venom Trust (JAAT)/ Bio-Ken Snake Farm, Watamu who are the top-quality anti-venom suppliers. This month there were no cases attended to in our area of operations. (Tsavo Trust currently holds 4 vials for emergency use).
- ✓ **Wildlife Census Transects:** Set transects have been put in place to cover the core Kamungi Conservancy area and give base line data on wildlife trends. This takes place 2 times per month. 16 different species were identified this month.
- ✓ **Community Meetings:**
 - 21st Dec18 – Ngiluni Village – community and TT CLO to discuss how the year has gone and plans for 2019. A Kamungi Conservancy Board Meeting will be called in early 2019.

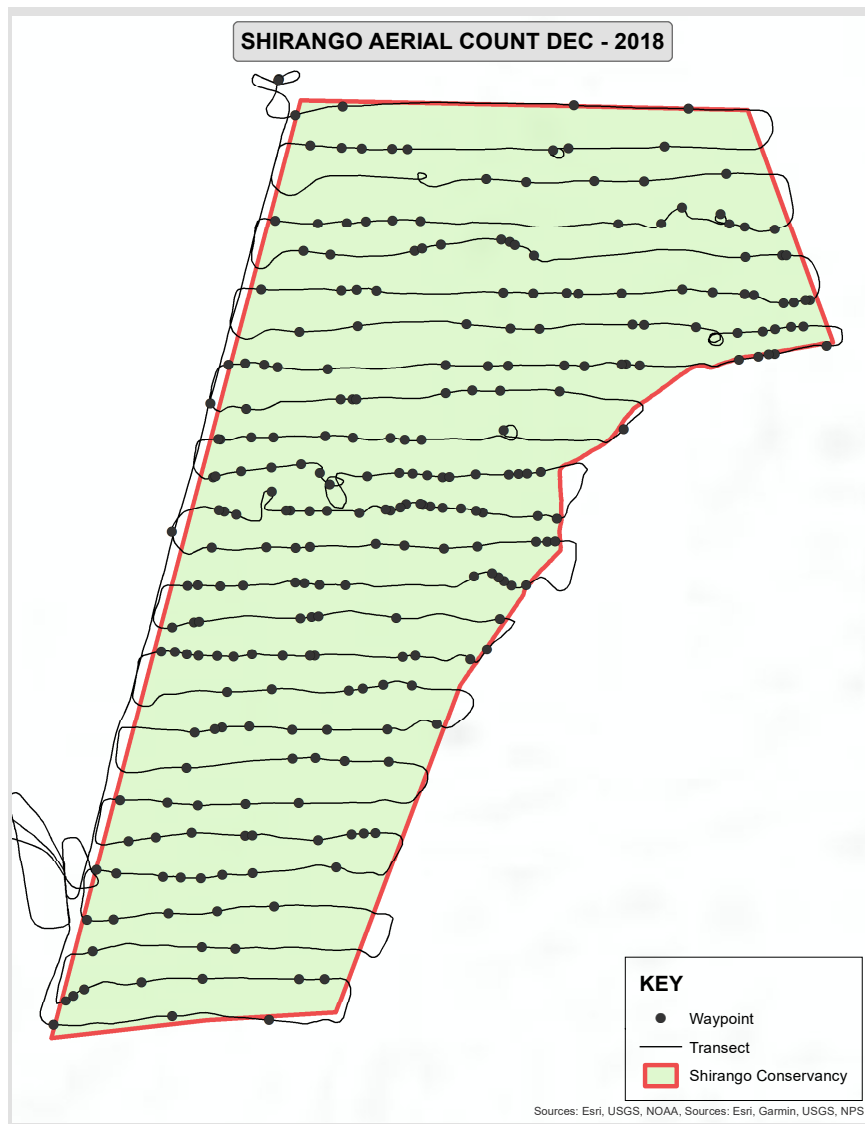


“SHIRANGO CONSERVANCY”:

- ✓ **Ongoing partnership between Tsavo Trust and Shirango Conservancy (SC)** (bordering onto southern boundary of TENP – Tsavo River area).
- ✓ **Employment** – Tsavo Trust employs 8 staff from this community including a Community Liaison Officer (CLO) to spear head activities. This equates to over \$ 1,600 (Ksh. 160,000) of income generation every month to this community as a result.
- ✓ **Shirango Water Project:** Following various meetings, initial phases of a water project (bore hole and solar pump) have taken place. Hydrological surveys took place and EIA carried out. NEMA applications to drill have been lodged. This project is being implemented to assist local people who have historically lived off elephants, bushmeat and other natural resources from the TENP area, but now have an understanding that this water has come to them “from the elephants” and as a result it is hoped that with engagement with the Watha people here, elephant poaching and bushmeat will significantly reduce. In fact, it has already.
- ✓ **Shirango Conservancy land tenure:** The CLO is regularly following this up in the Kilifi County Govt. offices. Currently it is under traditional communal mode of ownership and there are disputes to wade through. It does belong to the Watha people.
- ✓ **Conservancy mapping:** Outer perimeter was GPS mapped by CLO and Watha community elders on 15th November 2018. Total area 270km².
- ✓ **Wet season Aerial Census:** A total aerial census was carried out on 11th December 2018 using 1km transects of Shirango Conservancy with some shocking results: 35 live cattle bomas, 4,660 mixed livestock (mainly cows), 470 fresh charcoal bags, 102 live charcoal kilns, only 1 small farm (slash & burn type), 31 differing wildlife observations (Lesser Kudu 16, zebra 8, buffalo 4, baboons 2 troops, dikdik 2, Eland 4, giraffe 9, warthog 2) and 7 recent/old elephant carcasses.

✓ **Community Meetings:**

- 14th Dec 18 – Shirango community meeting at Chief's Office – Ndaraku Village re bore hole "letter of no objection" for NEMA. All approved by local Govt.



Map showing aerial transects flown over proposed Shirango Conservancy on 11th December 2018.

The vast majority of waypoints taken were of illegal charcoal kilns! These charcoalers are mainly people from outside of this community.

But the Watha people of Shirango want change and they want their land secured and protected.

Shirango Conservancy plans to provide this platform and at the same time secure more land for wildlife which in turn brings economic benefits to the Watha communities living in this area.

Unusual Photo of the Month:

Aerial photo shows a herd of Kongoni and common zebra surrounded by a bed of Ink flowers (*Cynium tubulosum*) in the southern part of TWNP on 21st December 2018. Good rains have fallen in this part of the Park and good numbers of wildlife (and unfortunately illegal livestock as well) are taking advantage of the lushness.



With sincere thanks and appreciation to the Kenya Wildlife Service, Save The Elephants/Wildlife Conservation Network/Elephant Crisis Fund (ECF), US Fish & Wildlife Service, The Oak Foundation, USAid / DOI, Tusk Trust, Cheyenne Mountain Zoo, Leopardess Foundation (Nicole Honegger), JM Foundation Africa, Zoological Society of London (ZSL), Stuart Herd, Sir Colin Southgate, Nick Southgate, Alex Graham, Nick Powell, James Robertson, Markus Jebsen, Paul Block, The Kratt Family, International Fund for Animal Welfare (IFAW), The Davies Family, International Elephant Foundation (IEF), Disney/Wildlife Conservation Society (WCS), Ndovu Trust (UK), Mike Kirkland - Satao Camp & Southern Cross Safaris (Msa), Anita Mishra & Paolo Mapelli, Tropical Ice Ltd, Askari Project – Australia, Salama Fikira, Origins Safaris, Ker & Downey Safaris, Conservation Alpha, Scott Family Fdn., JW Seagon Insurance, The Art of BAS & Oak Furniture Land, Howard Saunders, Sandor Carter, Sean Dundas, Geri Bauer, Karen Laurence-Rowe, James Lewin, OnSafari-Kenya-Anthony Cheffings, Kathy Snowden, Saving the Survivors – Johan Marais, Chris Acreman, Paul & James Wilson, Alex Hunter – Insiders Africa, Spidertracks, Michael Cheffings, Pembroke House School and numerous other individual supporters.

Report compiled by Richard Moller – Chief Executive Officer, Tsavo Trust
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