UKPPL IMPACT REPORT 2018 Enhancing Global Impact



Last year was marked by tremendous progress, most importantly in 2018 APOPO developed new skills and capacities, supported many families and brought hope to communities living in danger of landmines and tuberculosis. Yet time is of the essence if we are to ensure the global campaigns for a **landmine free world by 2025** and an **end to TB by 2035** are realised. And to this end, players support is critical. For its part APOPO continues to advance its life saving projects, and expertise to strengthen existing programmes, and deliver transformative, positive change to people and wildlife alike.

Last year you directly helped us achieve many breakthroughs in our work - from

expanding our existing programme in Cambodia and securing independent registration in Angola, to enabling us to reach even more tuberculosis patients in Africa with an incredible expansion from 73 partner hospitals in two countries to 142 partner hospitals in three countries.



TRUST

We are extremely proud of our collective progress and the milestones achieved to date, as they demonstrate the quality of the science, the innovation, and the heart of our organisation which remain centred on our mission to positively impact the trajectory of health and safety for humanity.

The tireless work and achievements of our dedicated staff are a direct result of the support of players of the postcode lottery. Our success is your success and I take this opportunity to thank each and every player of the postcode lottery for the difference you have enabled APOPO to make this past year.

Best wishes, Christophe Cox, CEO APOPO



APOPO is a global non-profit organisation that researches, develops and implements detection rat technology for humanitarian purposes.
HeroPATs, spiff out landmines and detect tuberculosis in developing coup-

Our detection rats, nicknamed HeroRATs, sniff out landmines and detect tuberculosis in developing countries around the world. We clear landmines in Angola and Cambodia and are preparing for operations in Zimbabwe and Colombia. We carry out tuberculosis detection in Ethiopia, Mozambique, and Tanzania. APOPO's operational headquarters and training, research and development centre are based in Tanzania.



ENABLED IMPACT 2018

• Landmines and other explosives destroyed	372
Land given back to communities	1,432,790 m ²
• People freed from the terror of landmines	16,426
Suspect tb patients screened	36,412
Additional TB cases detected	1,414
Potential infections halted	21,210





The global landmine problem

Landmines and explosive remnants of war (ERW) threaten almost a third of the world's countries. They remain dangerous long after conflicts end cause accidents, inflict fear, and impede development. In 2017 landmines and ERW caused 7,239 casualties, the vast majority (87%) civilians and children. Landmines also prevent economic recovery in post-conflict areas, cutting off basic necessities such as water, travel routes and fertile land for agriculture or development.

How player support helps

Through its mine detection rats, APOPO finds landmines and clears land at an accelerated pace. APOPO's HeroRATs are too light to detonate landmines and are quick at finding them making them a perfect 'tool' to fast-track detection and clearance. Our efforts protect civilians and animals and support peace building and development in mine affected areas. When integrated into conventional clearance methods, HeroRATs can triple overall efficiency of land release compared to manual mine clearance alone helping return safe land to vulnerable communities as quickly and cost-effectively as possible.



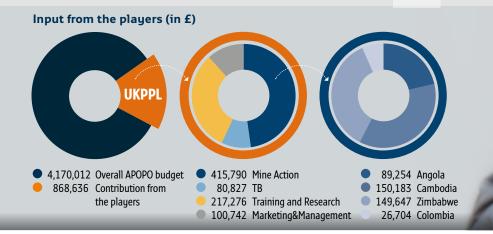
Luisa Manuel

Luisa remembers how terrifying life was during the war.

So much violence, and hatred. We fled for our lives. After it ended in 2002, all we wanted was to go back home to our normal lives. Instead when we returned, we found landmines everywhere. You'd think the war was painful enough, yet we continued living in fear of injury and death until APOPO came to our village to clear the landmines."

For Luisa, the future she dreams of is simple: Angola free of landmines.







Direct impact

Capacity

Clearing landmines – direct strengthening of APOPO capacity through inputs such as equipment, key staff, specialised explosive teams and staff training

- **Angola:** the strongest operational year in Angola to date. Registration with Ministry of Justice permitting APOPO to conduct activities independently.
- Cambodia: expansion of the landmine clearance programme to two provinces in parallel

 Siem Reap and Preah Vihear. Clearing around the Preah Vihear Temple, a UNESCO World Heritage Site.
- Tanzania HQ Research, Development and Training Optimising landmine detection training to enhance HeroRAT performance. High level interest from Permanent Secretary of the UK's Department for International Development and the British High Commissioner to Tanzania.
- **Zimbabwe:** welcomed close talks and a site visit from the U.S. Office of Weapons Removal and Abatement (WRA), the largest global mine action donor which could lead to a collaboration in 2019. Through a number of pre-clearance impact assessments, gained understanding what is at stake for people, livestock, and game living the task area and revealed clearance will have vast, multi-dimensional impact.

Capability

- In 2018, 100% of fully trained mine detection rats (MDR) received accreditation in accordance with international and respective national standards.
- The enhanced performance of the MDR improved reputation, overcame scepticism, strengthened partnerships and created new opportunities for growth.

Leverage

• The International Mine Action Standard (IMAS) on animal detection was amended to integrate APOPO's MDR under the umbrella of 'animals'.

Collaboration

- Conducted successful trials in Cambodia with a renowned British humanitarian mine action operator the HALO Trust.
- This generated new partnerships and increased the acceptance of our innovation.
- Currently preparing for operational collaboration with Mines Advisory Group (MAG), another prestigious mine action organisation





How the Players are helping people in need

- Vast tracts of cleared land were returned safe for communities to use for agriculture, village expansion, or infrastructure.
- Removing landmines and explosive remnants of war permits freedom of movement, including the safe return of displaced people, and unobstructed delivery of aid by opening blocked routes and roads. This strengthens and develops the overall economy.
- 90% of our staff are recruited from the communities we serve and the countries where we have operations – APOPO provides local communities with income, stimulating micro-economies.



Mine Detection Rats (MDR's) accelerate overall mine action because unlike metal detectors they ignore scrap metal and only detect explosives. Research in Cambodia shows that integrating MDR improves cost efficiency (€ 0.31/m2 versus € 0.93/m2 without MDR)

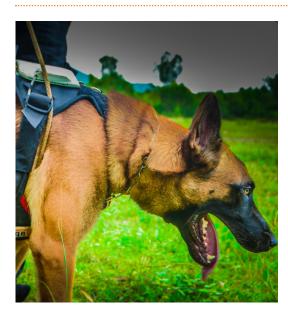
Impact Story - Luisa Manuel

- After the conflict ended, Luisa and her family set about rebuilding their lives but struggled to access fertile land because of the landmines.
- At 65, Luisa is the head of a large family, providing for ten children and numerous grandchildren through farming.
- Because they knew there were landmines, Luisa and her children had to stick to known footpaths that would safely get them to the land they could farm – a two hour walk each way. Luisa struggled to provide for her family.
- Short term: After APOPO cleared the minefield, Luisa's family can finally live without fear of being killed or maimed.
- Luisa now makes use of shorter routes and can spend her time cultivating more effectively.
- Long term: With trade routes between villages now safe, Luisa hopes she will be able to sell her surplus at better rates and invest in some livestock. This will make it easier to feed and her family and pay her grandchildren's school fees.
- Access to the nearby forest provides alternative sources for collecting water and gathering firewood.





Training Technical Survey Dogs



APOPO's started a parallel training program of Technical Survey Dogs in Cambodia. Although not directly funded by the players, their support has enabled APOPO to start this initiative. The goal of this project is to complement the rats with search dogs for large area survey work, as well as to increase our impact and initiate new partnerships. In 2018 the project started bearing fruit and has been able to lease out 9 dogs which have been clearing roads from landmines in South Sudan, improving the lives of local communities.

Clearing minefields at Preah Vihear Temple

- **Preah Vihear Temple** is an ancient Khmer empire era Hindu temple. It is located on the border between Thailand and Cambodia on a 500,000 m2 wide plateau, above the surrounding areas. As a result of its strategic position it was an encampment for various military groups during the conflicts in Cambodia between 1975 to 1993, and anti-personnel mines were laid in and around the area for protection. The Temple was also in the center of the Cambodian - Thai Border dispute that began in June 2008 and suffered from Artillery and Cluster Munitions shot at its perimeter.
- APOPO is the first foreign NGO allowed to clear this politically and culturally sensitive area from landmines and munitions. APOPO's good relations with both the Cambodian and Thai Mine Action Centres and demonstration of its cost-effective work supported by the players, have made it possible for APOPO to participate in this important regional peace building project.

Colombia startup

• APOPO arrived in-country to lay foundations for operations, lobby stakeholders and train a local NGO in non-technical survey.



The **TB** Problem

The World Health Organisation (WHO) declared tuberculosis the deadliest infectious disease – TB kills more people per year than HIV/AIDS and malaria. In 2017, there were 10 million new cases of tuberculosis globally and 1.6 million people died. Symptoms of tuberculosis include loss of appetite, persistent cough, and weakness resulting in an inability to work. Without treatment patients usually die and can infect up to 15 other people within a year, causing a vicious circle that is difficult to break.

How player support helps

APOPO deploys rats to detect tuberculosis and found that they can check 100 sputum samples in 20 minutes. The same task would take a lab technician up to four days. This allows APOPO to accurately re-check samples collected from partner clinics at a high speed and then confirm only the rat-suspect samples using WHO-endorsed confirmation methods. Results are then sent back to clinics who oversee patient counselling and treatment.



Naima

A healthy child, one day Naima started coughing and began to feel very tired. Her worried mother watched as her symptoms progressed and fatigue set in. When Naima started losing weight, her mother took her to the local clinic for help. Naima's mother thought the BCG vaccine she'd had as a baby would protect her from TB. X-rays of her lungs showed that she might have tuberculosis (TB), however, a traditional sputum sample came back negative, automatically excluding her from treatment. Thankfully, APOPO provide advanced means of detection and found her tuberculosis





Direct impact

Capacity

- Expansion of partner clinics in Tanzania from 41 to 58 in 2018
- Exported 10 trained TB detection rats to Ethiopia
- Another 32 HeroRATs currently in training



Capability

- APOPO labs passed all 3 external UK NEQTAS lab tests successfully.
- APOPO showed that the rats enhance paediatric TB detection by around 68% compared to smear microscopy.

Leverage

• APOPO's HeroRATs have been included among the key TB operational research areas of the Tanzanian National TB Operational Research Agenda (2015-2020)

Collaboration

• Strengthening cooperation with partners and collaborating institutions on TB from year to year and collaboration with renowned international research institutions.





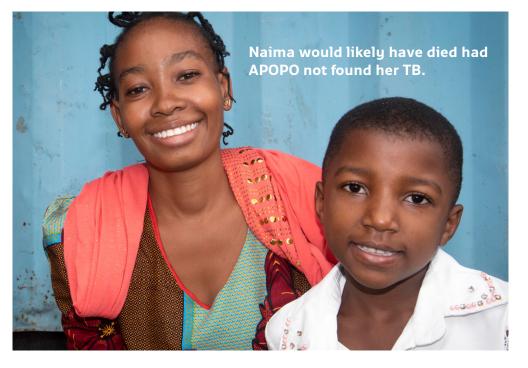
TB program Tanzania

- Suspect TB patients screened: 36,412
- Additional Patients found: 1,414
- Potential TB infections halted: 21,210
- Increase in clinic detection rate: 34%



Beneficiary story

- When her local clinic was unable to diagnose her TB Naima lacked the treatment she so desperately needed. Naima would likely have died had APOPO not found her TB.
- Naima quickly started treatment and already feels much better. She has to take two pills a day for 6 months.
- Her mother had to take time off work each time to take her to the hospital and all the travel and clinic testing cost money and can quickly impoverish a family that is stretching resources to breaking point. Thankfully she still has her job and although she has been tested, she does not have TB.
- Naima missed a lot of school as she had to stay home so as not to pass on the disease. With the disease no longer active, as soon as she is strong enough, she will return to school and get back on track.
- Her community have been very supportive with the help of APOPO partner MUKIKUTE. They have regular meetings and tuberculosis and HIV/AIDS are openly discussed so people who are worried can get help and know they are not alone.







Expansion to Ethiopia

APOPO's TB detection rat facility in Addis Ababa, Ethiopia was built on the premises of the armauer Hansen Research Institute (AHRI), a federal government institute and the main partner and host of the project. APOPO's operational research contributes to the national TB control effort from two angles: finding missed cases among symptomatic patients and finding TB among non-symptomatic high-risk populations (prison inmates) across the country. Although the players did not directly fund the program, it could not have been established without the success of the Tanzanian program that the players support







- The TB prevalence in sub-Saharan Africa is very high compared with the rest of the world. Ethiopia is one of 30 high burden countries with a prevalence of 182 cases per 100,000 capita.
- The project found 230 additional cases in just a few months' time and averted more than 2,500 potential infections.
- A total of 18,849 samples were collected from 9,667 presumptive patients
- APOPO Ethiopia has an 84% increase in case detection over the clinics.
- APOPO's work was mentioned as an innovative example at the national TB workshop entitled "Finding Missed TB cases in Ethiopia: operational guide and national plan for 2018-2020".
- The number of partner health clinics reached 55, 25 more than the first-year target.

Training and Research





Direct impact

Capacity

- A total of 110 rats participated in training activities at APOPO the largest cohort of rats trained within a single year in APOPO's history, reflecting advancements in training and breeding.
- 16 MDR deployed to Angola and an additional 18 TB detection rats were exported to Ethiopia and Tanzania (Dar es Salaam).
- 10 other HeroRATs have already met internal accreditation standards and will fly to Cambodia in early 2019.
- 7 new rat trainers received internal accreditation and were welcomed to the Training and R&D teams in Tanzania.

Capability

- Initiated two new research lines in collaboration with partner Sokoine University of Agriculture instead of SUA and One Health Africa: to examine the reproductive cycle of the pouched rat and if the rats are capable of detecting Brucellosis.
- Prepared a research plan for Search and Rescue Rats in collaboration with GEA Search & rescue team
- Explored the possibility of detection of soil pollution
- The anti-wildlife-trafficking research rats completed the first stage of the 3-part feasibility project. A workshop with port officials from both Tanzania and South Africa provided key points of consideration for next stages.





Marketing and Management





Direct impact

Capacity

- Key staff additions: Digital Marketing Manager to strengthen the marketing team and improve capacity and efficiency
- Increased APOPO's reach by targeting users that have visited the Cambodian Visitor Centre.
- Social media intern researched new tools and audiences to raise the profile of our work and increase fundraising income.

Capability

- New customer relationship management (CRM) platform that better integrates with various marketing tools.
- Automated communication & email tools to improve signup numbers
- Expanded to a number of different platforms, including Facebook's and Google's Nonprofit platforms.
- Improved Google Ads and Analytics
- Developed relevant dashboards to showcase KPIs

Leverage & Collaboration

- Preparation and recruitment for the launch of an APOPO Foundation in the UK.
- Continued fundraising for Zimbabwe based off its unique ecotourism and conservation im-

pact

• Collaboration with GoodWings and Airbnb Experiences

Enabled impact

- APOPO GuideStar platinum certified
- Marketing department transitioned to a lean infrastructure with team tasked with specific goals and directly tied generating revenue.
- Appeared over 360 times in online and traditional media channels in 2018
- Rebranding APOPO logo and style to strengthen, modernise, and better represent the organisation's image.





Visitor Center

In 2017, unrestricted funding from players enabled APOPO to invest in a Visitor Centre (VC) in Siem Reap, Cambodia and in January 2018, APOPO officially opened the doors. Locals, tourists and especially HeroRAT fans visiting Cambodia have a rare chance to see the HeroRATs at work without the dangers of a real minefield. By the end of the year APOPO's Visitor Centre had climbed to 4th position on Trip Advisor for "Top things to do in Siem Reap" following the three main temples of the Angkor Archaeological Park.



- Over 12,000 visitors, including high-level visit from His Royal Highness Prince Sisowath Tesso of Cambodia.
- Educates the general public about the global landmine problem and offers HeroRAT demonstration
- Provides an alternative source of public fundraising which in turn supports the Cambodian Mine Action operations.
- Prominently displayed signs and banners of players support and rat adoptions warrant a postcode lottery branded photo with logo shared on social media.

Carbon offsetting

Collaborating with local farmers in Tanzania on a tree planting project to offset APOPO's CO2 emissions. In 2018, 10,018 trees were planted successfully in the Uluguru mountains to restore degraded landscapes and decrease deforestation.

