

# Exploring Geospatial Analysis and Conservation Strategies



Technology and Conservation: Saving Elephants  
in the Mara

# A Lesson in Geospatial Analysis and Community Action

A collared elephant  
Masai Mara, Kenya



# How does technology help save wildlife?

- **Wildlife conservation now depends on advanced technology.**
- **We can track and protect animals in a new, powerful way.**
- **It's a way to connect with communities and solve conflicts.**

# OUR GOALS

**By the end of this lesson, you will be able to:**

- **Understand how technology is used to monitor wildlife.**
- **Explain the role of geospatial analysis in conservation.**
- **See the link between technology, conservation, and communities.**



# A Real-World Case Study

## The Mara Elephant Project

- Located in the Mara ecosystem in Kenya.
- Uses GPS collars to track elephants in real-time.
- Uses a system called EarthRanger to view data and predict movement.
- Works with local communities to reduce human-elephant conflict.



# HANDS ON AND CREATIVE

## Become a Conservation Designer

- **Activity 1: Create a Collar.** Design your own elephant tracking collar with new tech features.
- **Activity 2: Role-Play.** Step into a real-world conflict scenario and find solutions with technology.





**Innovating software solutions to solve conservation's most pressing operational challenges.**

# Activities: Data & Analysis

## Become a Data Scientist

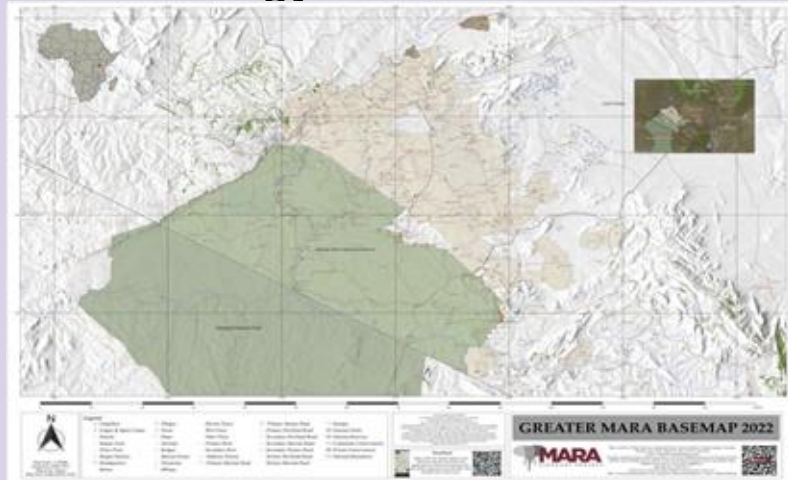
- **Activity 1: Map it.** Use Google Earth to map elephant habitats and migration paths.
- **Activity 2: Visualize the Data.** Analyze mock data to predict elephant behavior and find conflict zones.



# RESEARCH AND INNOVATION

## Become a Tech Innovator

- **Activity 1: Research.** Explore how technologies like RADAR and GPS work for conservation.
- **Activity 2: Innovate.** Design a new technology solution to solve a real elephant conservation problem.



# In Conclusion

## The Interconnected World

- **Technology is a powerful tool for monitoring and protecting wildlife.**
- **Data helps us understand complex ecosystems.**
- **Community involvement is key to long-term success.**



# Thank You & Next Steps

## What can you do?

- **Task: Write a brief reflection on how technology can solve a local wildlife challenge.**
- **For more information on Geospatial technology contact @maraelephantproject**

