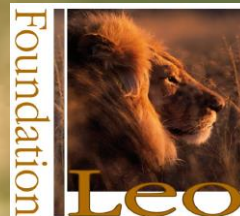


# MANAGING CARNIVORE – LIVESTOCK CONFLICTS IN AMBOSELI NATIONAL PARK, KENYA

By Tuqa Jirmo – Senior Warden  
Kenya Wildlife Service

ON 3<sup>th</sup> NOVEMBER, 2010.



## HUMAN-WILDLIFE CONFLICT

**DEFINITION:** “Any interaction between humans and wildlife that results in negative impacts on human social, economic or cultural life, on the conservation of wildlife populations, or on the environment.” (WWF, 2005)

**PROBLEM ANIMAL:** We need to be careful when defining this term.

- Potentially, all wildlife species will compete with humans for access to habitat, food and water.
- However, some individual animals may habitually select or target crops and livestock.

# INTRODUCTION

[www.kws.org](http://www.kws.org)

## GENESIS OF HUMAN WILDLIFE CONFLICT:

Dates back to era after stone age, during agrarian revolution when man first domesticated crop - plants and animals as livestock.



# INTRODUCTION

[www.kws.org](http://www.kws.org)

- Human-Wildlife Conflict is fast becoming a serious threat to the survival of many endangered species in the world.
- Poor understanding of the ecological and social underpinnings of this human–wildlife conflict in many parts of the world hampers effective conflict management and conservation programs

# INTRODUCTION

[www.kws.org](http://www.kws.org)

- In Kenya, severe livestock - carnivore conflict is largely observed in Arid and semi arid inhabited by pastoralists communities, in part Maasai stepped (Amboseli and Maasai mara), Samburu and Northern.
- Escalation of Livestock predation & retaliatory persecution a major conservation concerns.



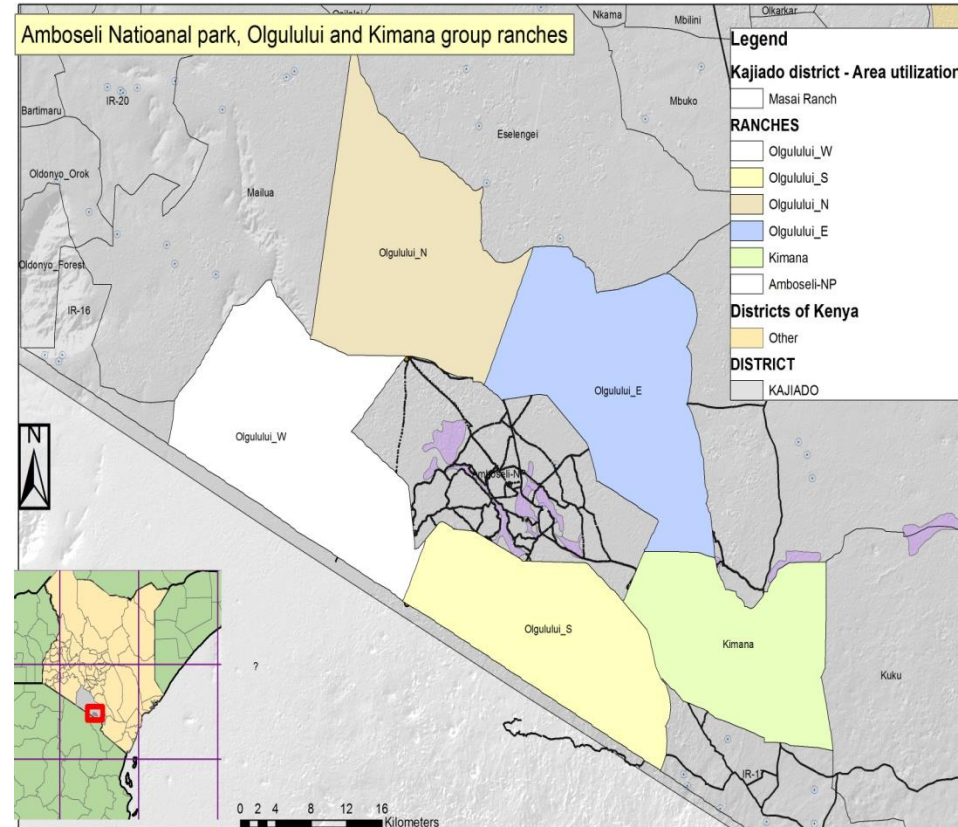
# INTRODUCTION

- Amboseli ecosystem is classified as hotspot for human - wildlife conflict because of enormous livestock depredation by carnivore and subsequent killing.
- The situation is rather complex because large carnivores range inside and outside the park on communal group ranch dominated by livestock and people.

# STUDY AREA

www.kws.org

- Amboseli National Park
- Olgulului group ranch
- Kimana group ranch







## MONITORING LIVESTOCK PREDATION

- All incidences of human carnivore conflict occurrence was attended physically and verified.
- Details on: date of the occurrence, time, livestock owner, Place name/GPS coordinates, livestock types and age, predator species involved were recorded.

# MATERIAL AND METHODS



## MONITORING LIVESTOCK PREDATION

- For the purpose of compensation, reports on predation incidences was categorized into three major aspects.

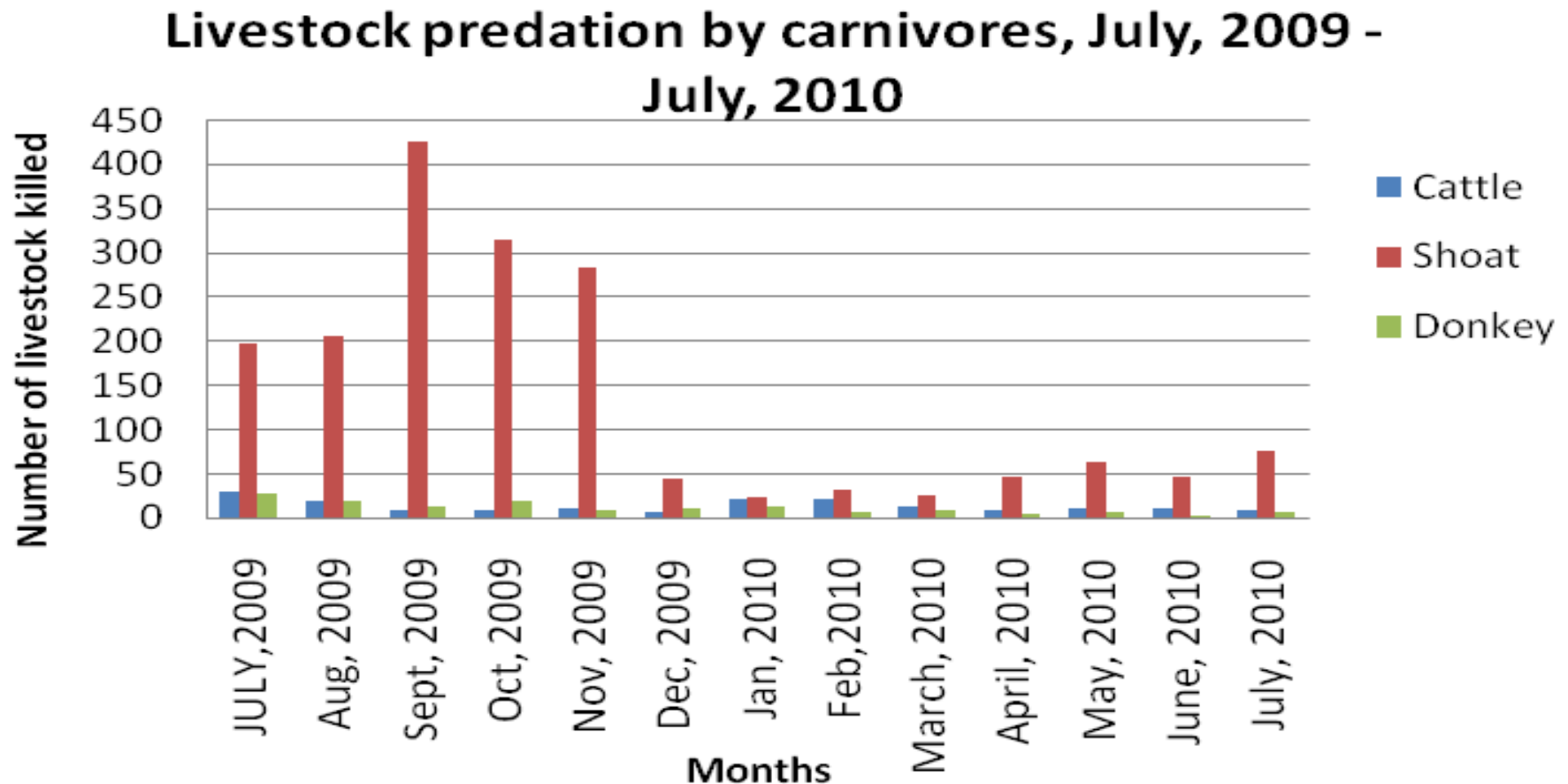
Category 1: No fault/predation unavoidable

category 2: Livestock lost/herd by children and

Category 3: Poorly fenced boma.

- 90 people from 6 villages were also interviewed

# RESULTS: TREND AND INTENSITY OF CARNIVORE - LIVESTOCK CONFLICTS



# TREND AND INTENSITY OF HUMAN - LION CONFLICTS AROUND ANP

[www.kws.org](http://www.kws.org)



012  
09/03/010  
GPS=0306157  
9698120  
SHOATFUII  
HYENA  
-REU LESHINK

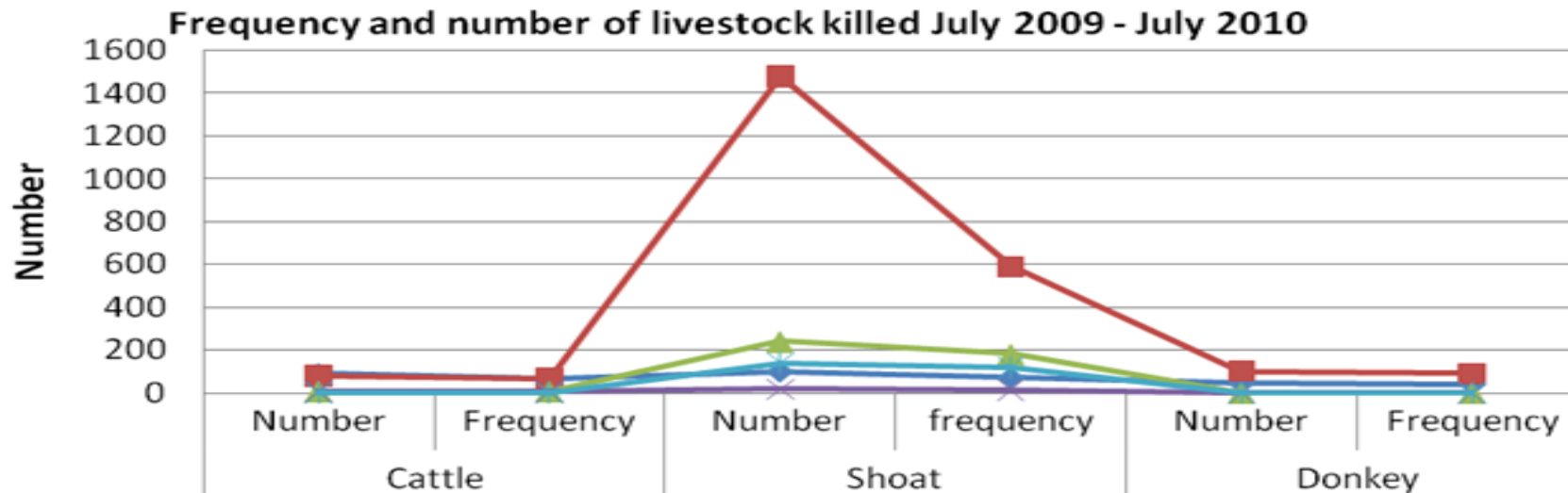


009  
26/12/09  
GPS=0306157  
9700152  
1 DONKEY INJURED  
BAB KENNA  
CHIND  
SOIPEI LEQUE

KENYA  
WILDLIFE  
SERVICE



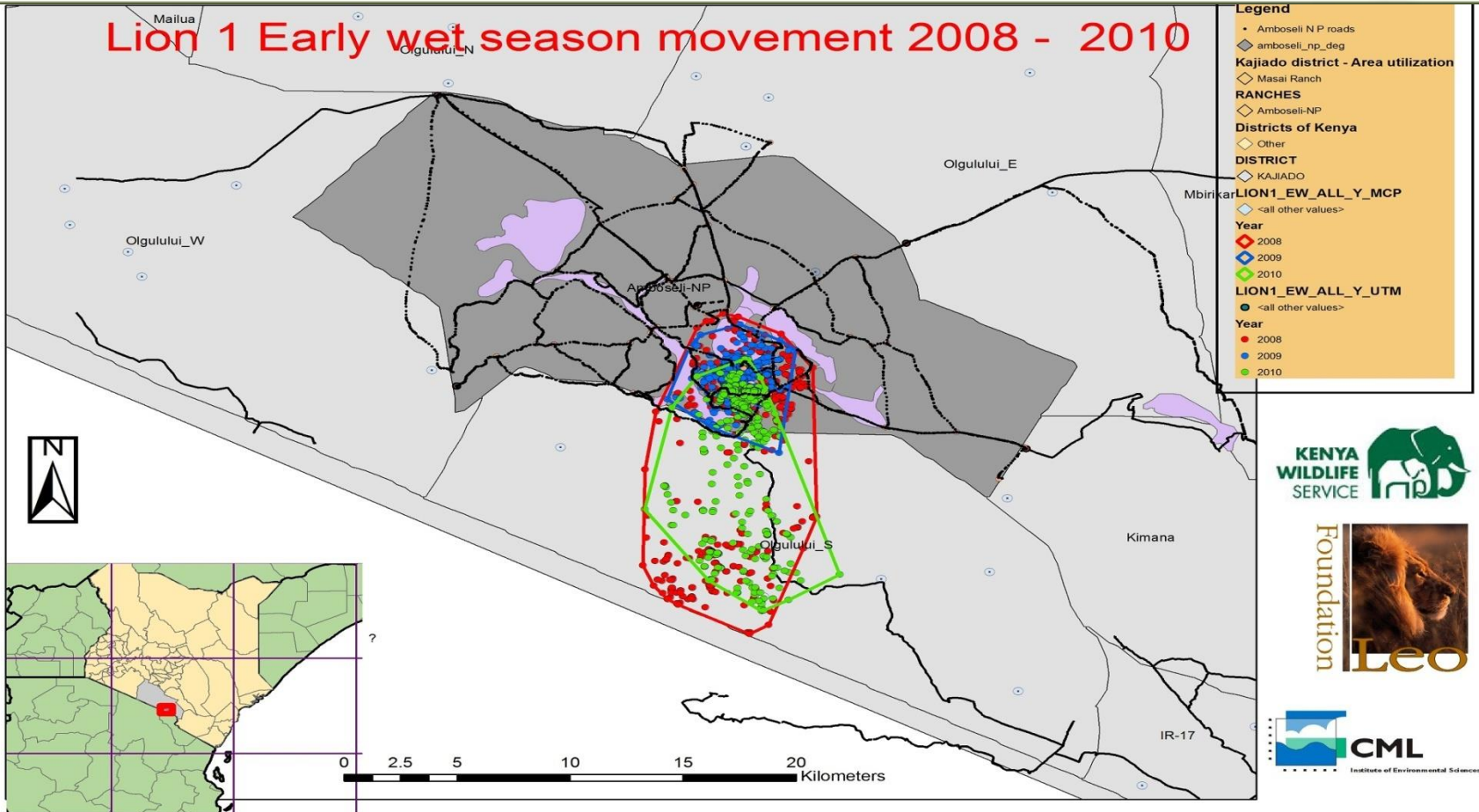
# RESULTS: TREND AND INTENSITY OF CARNIVORE - LIVESTOCK CONFLICTS



	Cattle		Shoat		Donkey	
—◆— Lion	89	65	100	71	46	41
—■— Hyena	78	65	1478	589	101	89
—▲— Cheetah	9	9	241	181	1	1
—×— Leopard	8	8	17	14	1	1
—*— Jakal	1	1	141	118	0	0

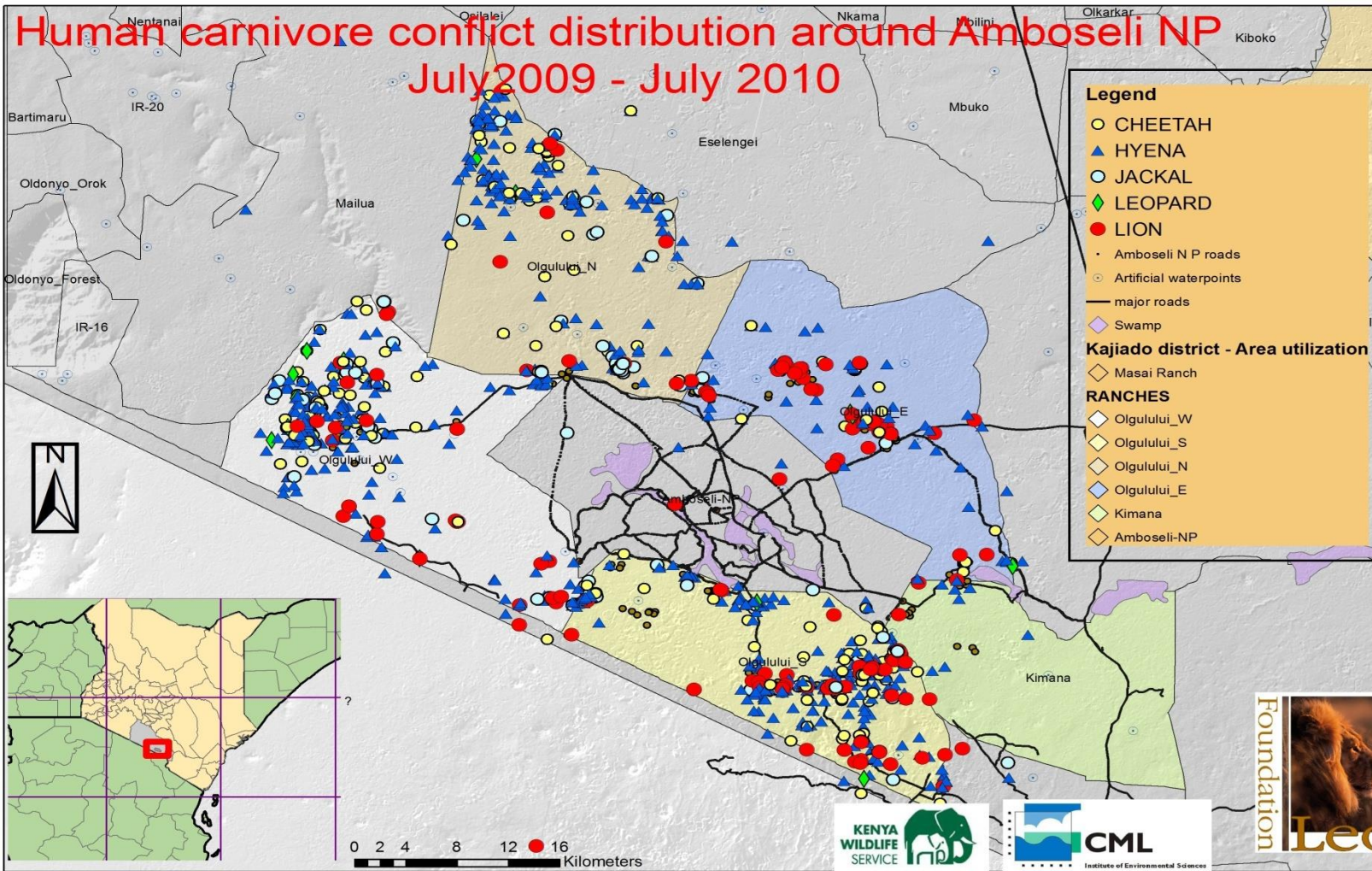


# RESULTS: LION MOVEMENTS





# RESULTS: DISTRIBUTION OF CONFLICT AROUND THE PARK



# COMMUNITY REACTION: LION SPEARING & POISONING.

[www.kws.org](http://www.kws.org)



Year	Number of lions killed
2001	20
2002	31
2003	12
2004	19
2005	17
2006	25
2007	9
2008	5
2009	1 – Killed by buffalo
2010	16 (6 natural)



# COMMUNITY REACTION: LION POISONING

[www.kws.org](http://www.kws.org)





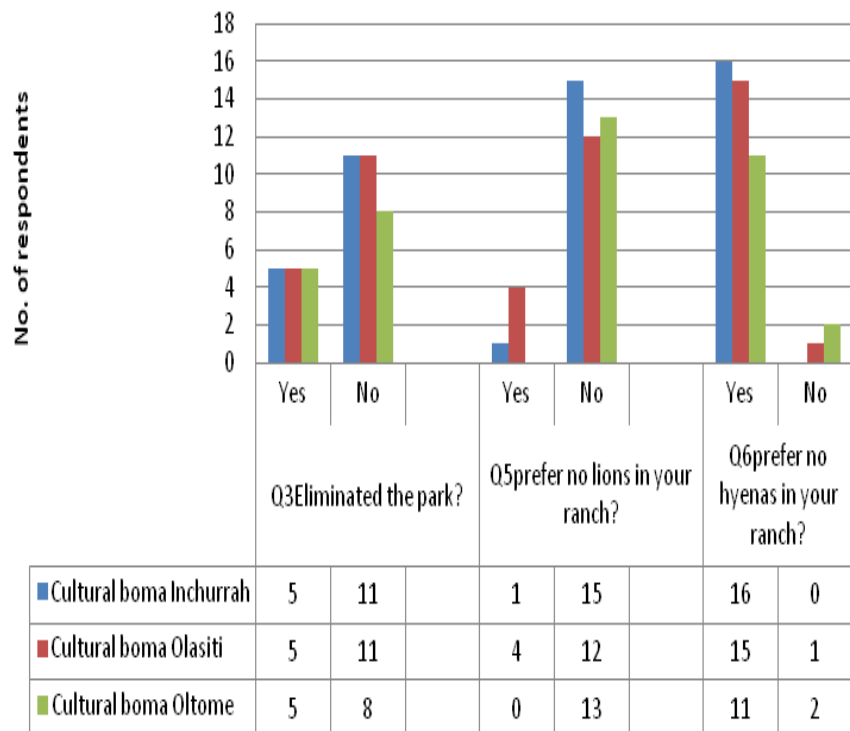
# LIONS SPEARING

[www.kws.org](http://www.kws.org)

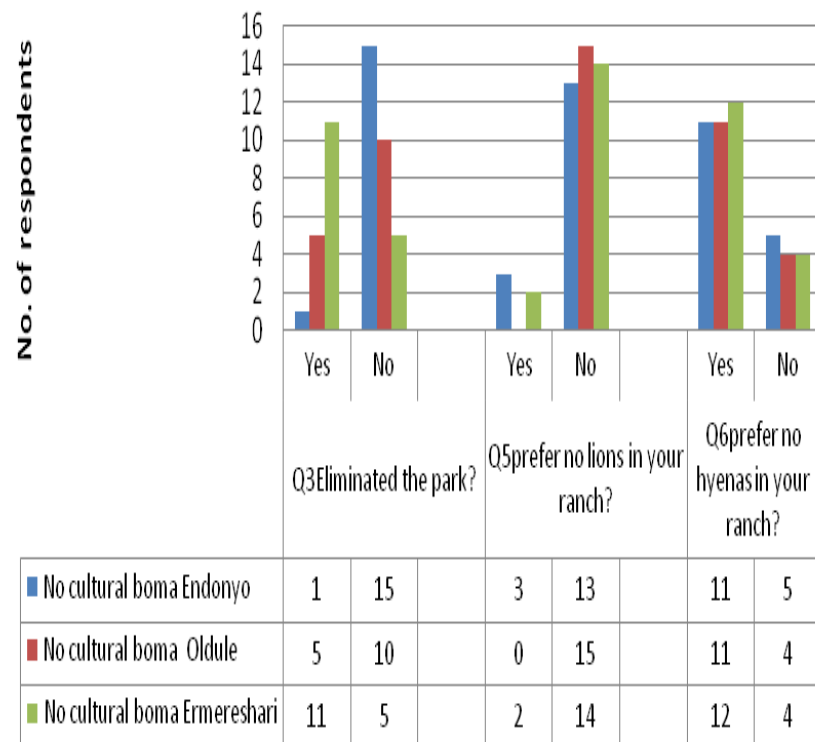


# ATTITUDE AND PERCEPTION OF LOCAL COMMUNITY TOWARDS CARNIVORES & PARK

Response from village with cultural boma



Response from village with no cultural boma



# DRIVING FORCE OF LIVESTOCK CARNIVORE CONFLICT AROUND ANP.

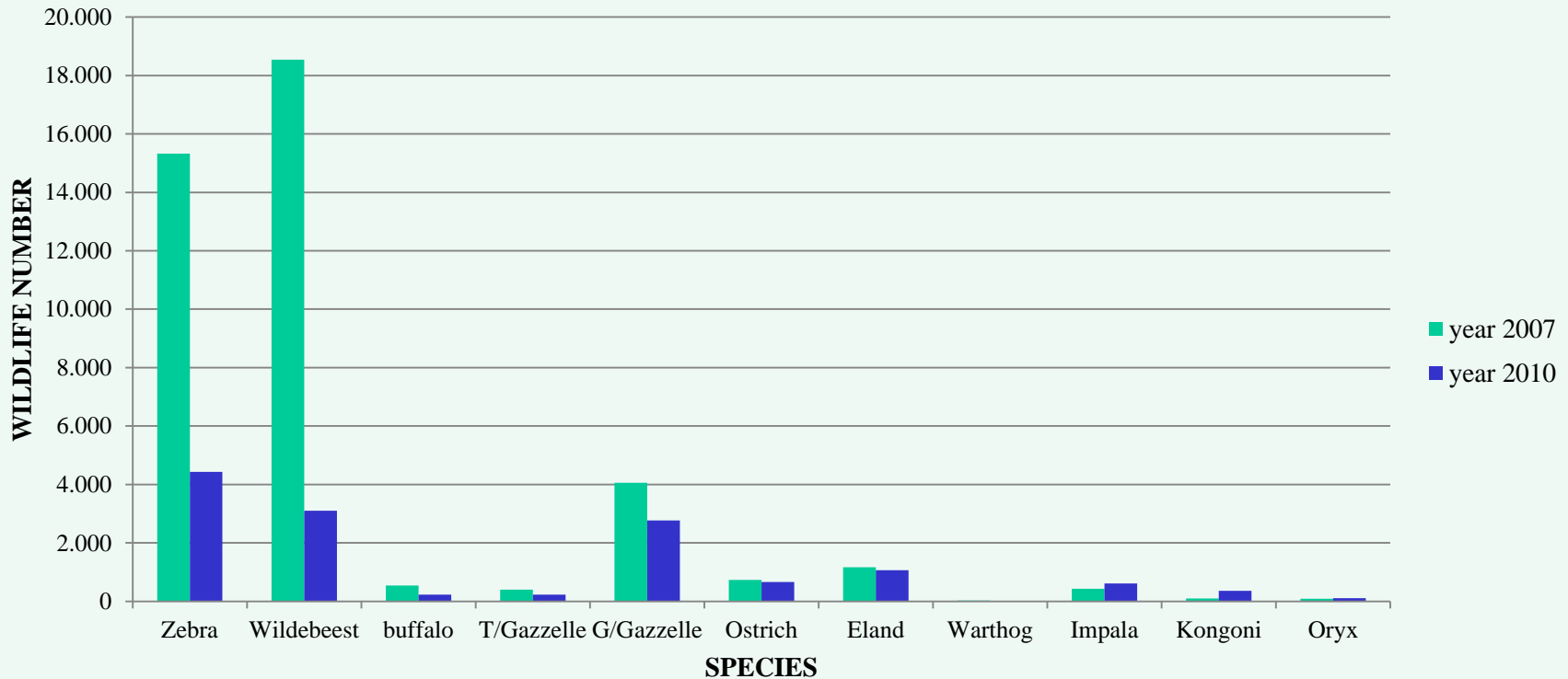
- Rural economy and dependence on livestock as source of wealth & livelihood
- Human population growth and land use transformation
- Close settlement and access of community to use resources from the park.
- Perception and cultural practices of killing lions as prove of been a real man.



# CLIMATIC FACTOR & IMPACT OF DROUGHT - DECLINE IN WILDLIFE PREY BASE

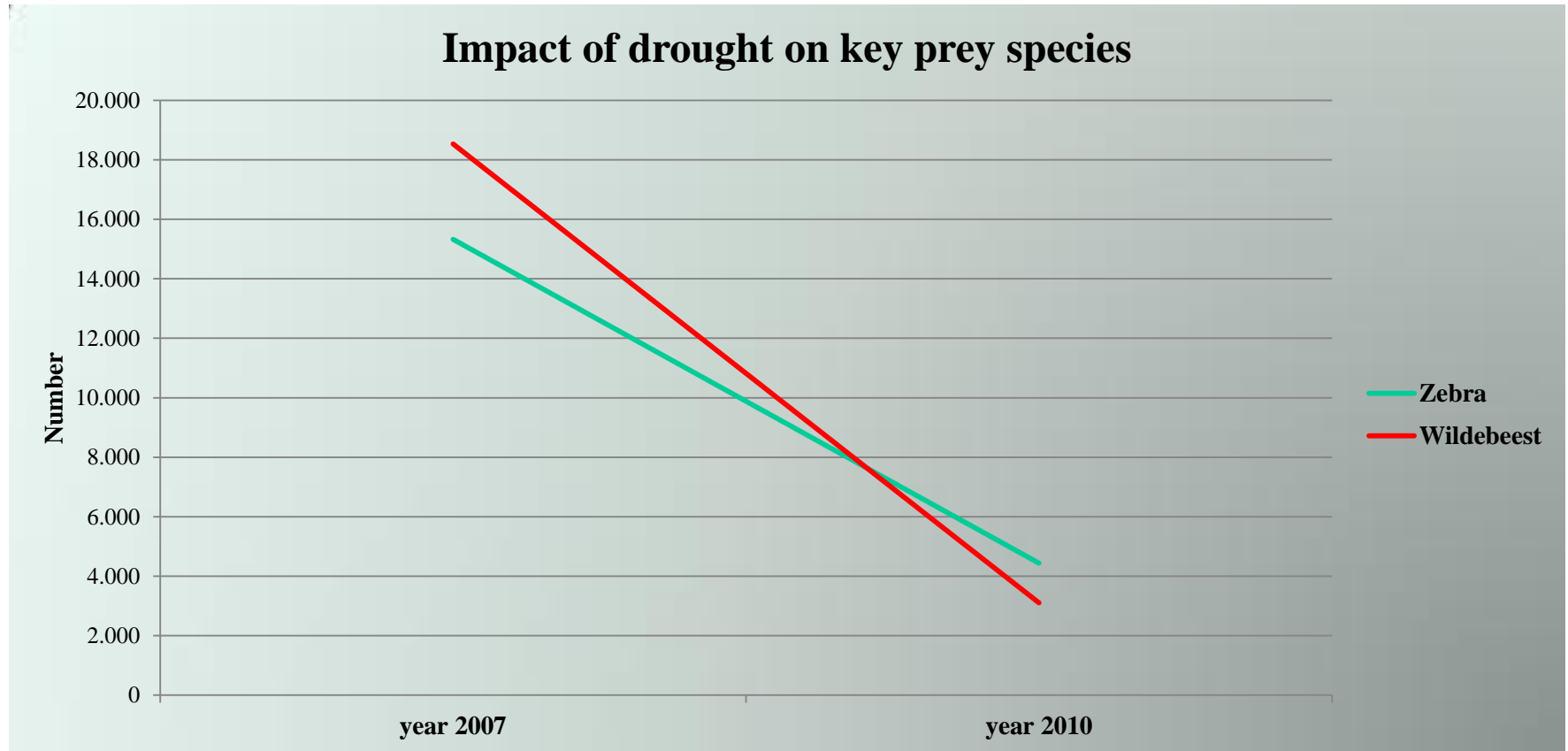
www.kws.org

**AERIAL CENSUS RESULT 2007 -2010**



# IMPACT OF DROUGHT ON ZEBRA AND WILDEBEEST.

[www.kws.org](http://www.kws.org)



# INTERVENTION MEASURES BY KWS AND STAKEHOLDERS

[www.kws.org](http://www.kws.org)

1. Boosting of prey population base
  - KWS translocated zebras and wildebeest
2. Rapid deployment of problem animal management unit (PAMU)
3. Education and awareness

## 4. PREDATOR PROOF BOMA.

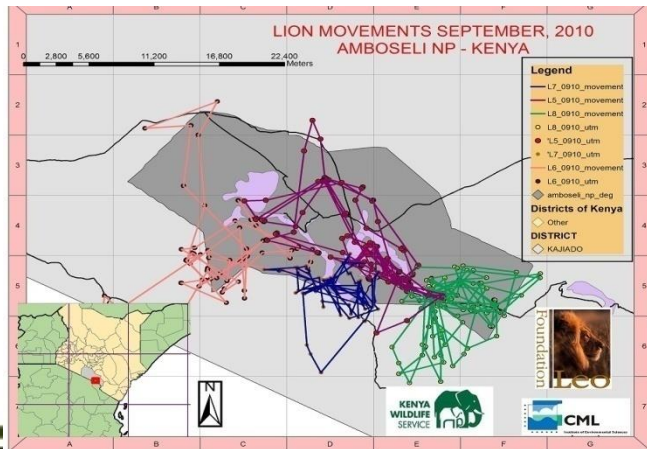




## 5 COMPENSATION SCHEME

- Introduced in 2008, still on pilot base
  - Livestock killed by five large carnivores are compensated at ½ market price.
  - Programme has management committee and verification team
  - Has certain criteria to assess livestock loss are genuine
- 
- Cattle – 15,000 (EURO 150) - 20,000 (EURO 200)
  - Goat – 5,000 (EURO 50) - 9000 (EURO 90)
  - Donkey 10,000 (EURO 100) – 15,000 (EURO 150)

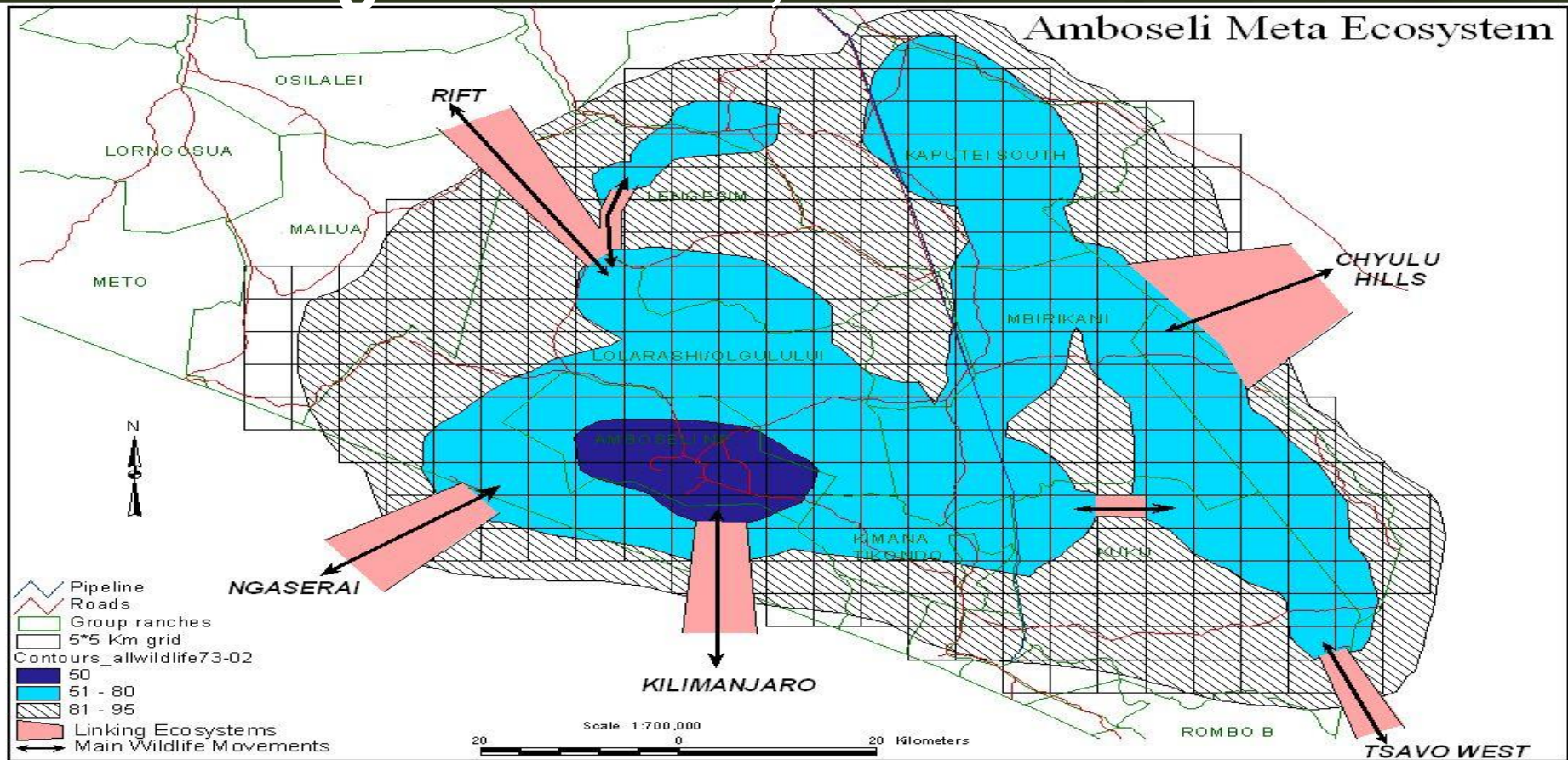
## 6. RESEARCH & MONITORING.





# 7. Amboseli Ecosystem Management Plan, 2008-2018

[www.kws.org](http://www.kws.org)



# CONCLUSION

- Conservation of predators outside protected areas will depend largely on how communities tolerate and coexistence with them.
- To sustainably conserve large carnivores, there is a need to protect rural livelihoods, reduce their vulnerability, and counterbalance losses with benefits and foster community-based conservation.

# ACKNOWLEDGEMENTS

[www.kws.org](http://www.kws.org)

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Patrick.**



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*Thank  
you*

