



Lake Chilwa Basin, Southern Malawi

Integrated Development in a fragile ecosystem



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Population Action
INTERNATIONAL
HEALTHY FAMILIES HEALTHY PLANET

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Malawi Country Profile

- Total population (2010): 15.7 million
- Population trebled in past 40 years
- Lake Malawi
- Proportion of total population dependent on agriculture for a livelihood: 85 percent
- Proportion living below poverty datum line: 6.3 million

Source: Synthesized from ActionAID (2006), National Statistical Office (2010), UNEP (2010), Yaron et al. (2010), and FAO (2011).



Lake
Chilwa

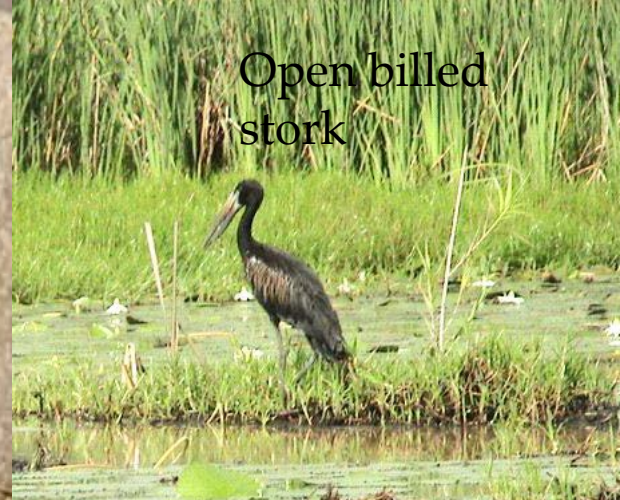




African Jacana



Ringed
Plover



Open billed
stork



Black stork



Grey
Heron



White
egret



Hottentot Teal



Challenges

- Deforestation
- Climate Variability, Extreme weather events
- Periodic drying of Lake
- Use of marginal lands for agriculture
- Population growth
- High migration into the basin- pressure on NR
- Heavy dependence on natural resources
- River bank cultivation
- Sand mining/charcoal making
- Low economic activities
- Water quality and quantity

Forest Fire



Charcoal



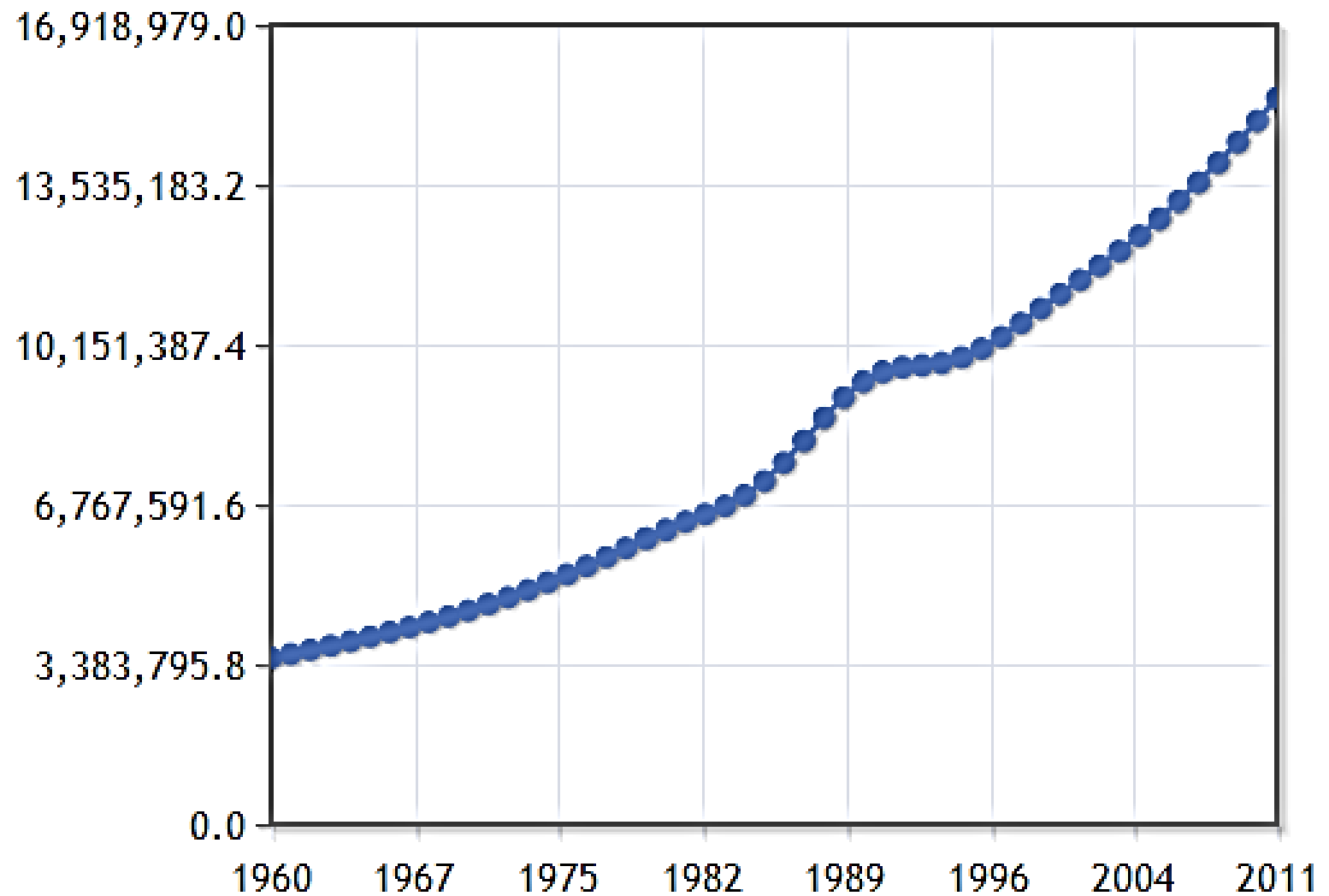


Mulunguzi
River
Uphill

Likangala
River
Downhill

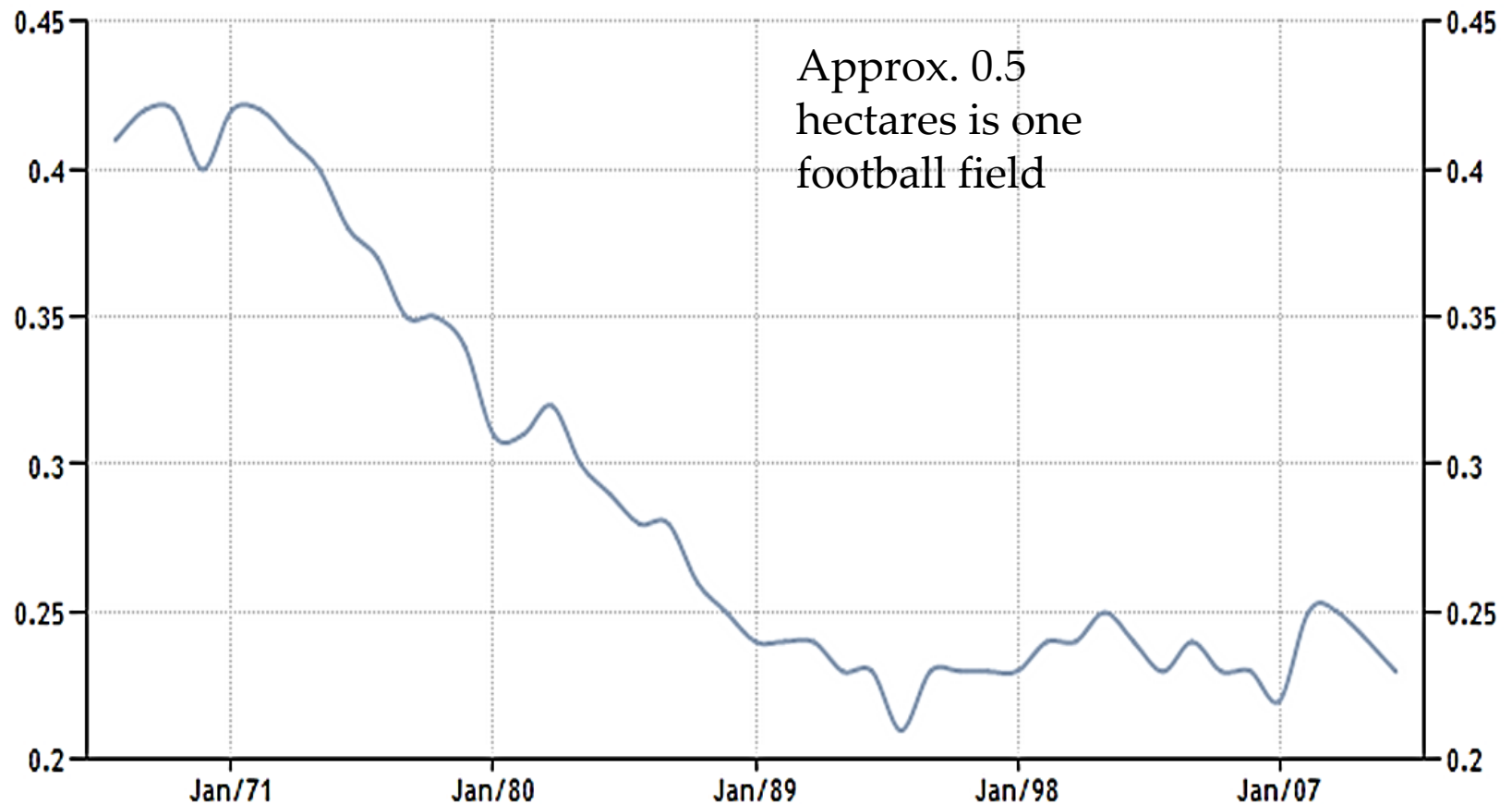


Population of Malawi

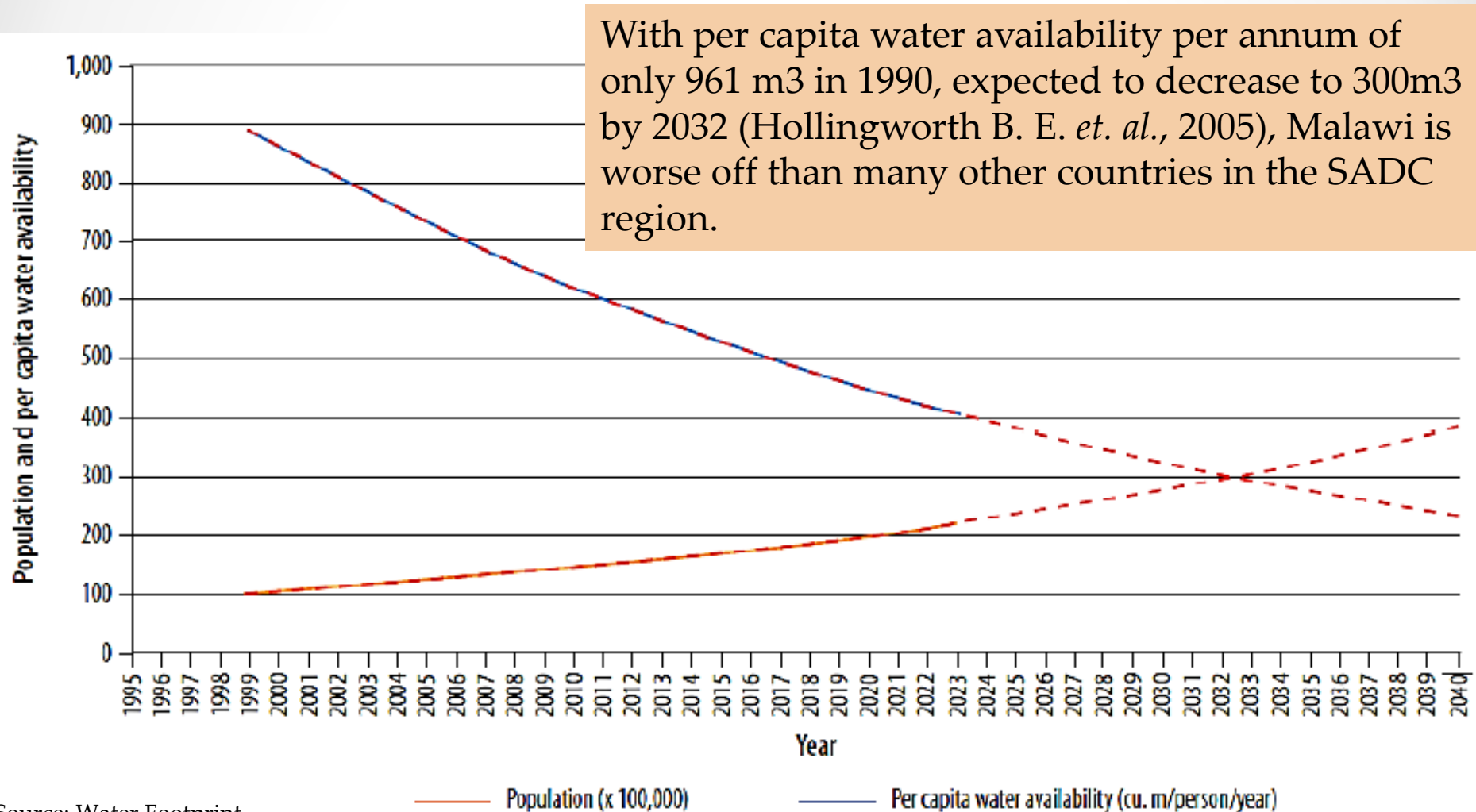


Arable land per capita 1967-2014

Source: World Bank Indicators (2014)

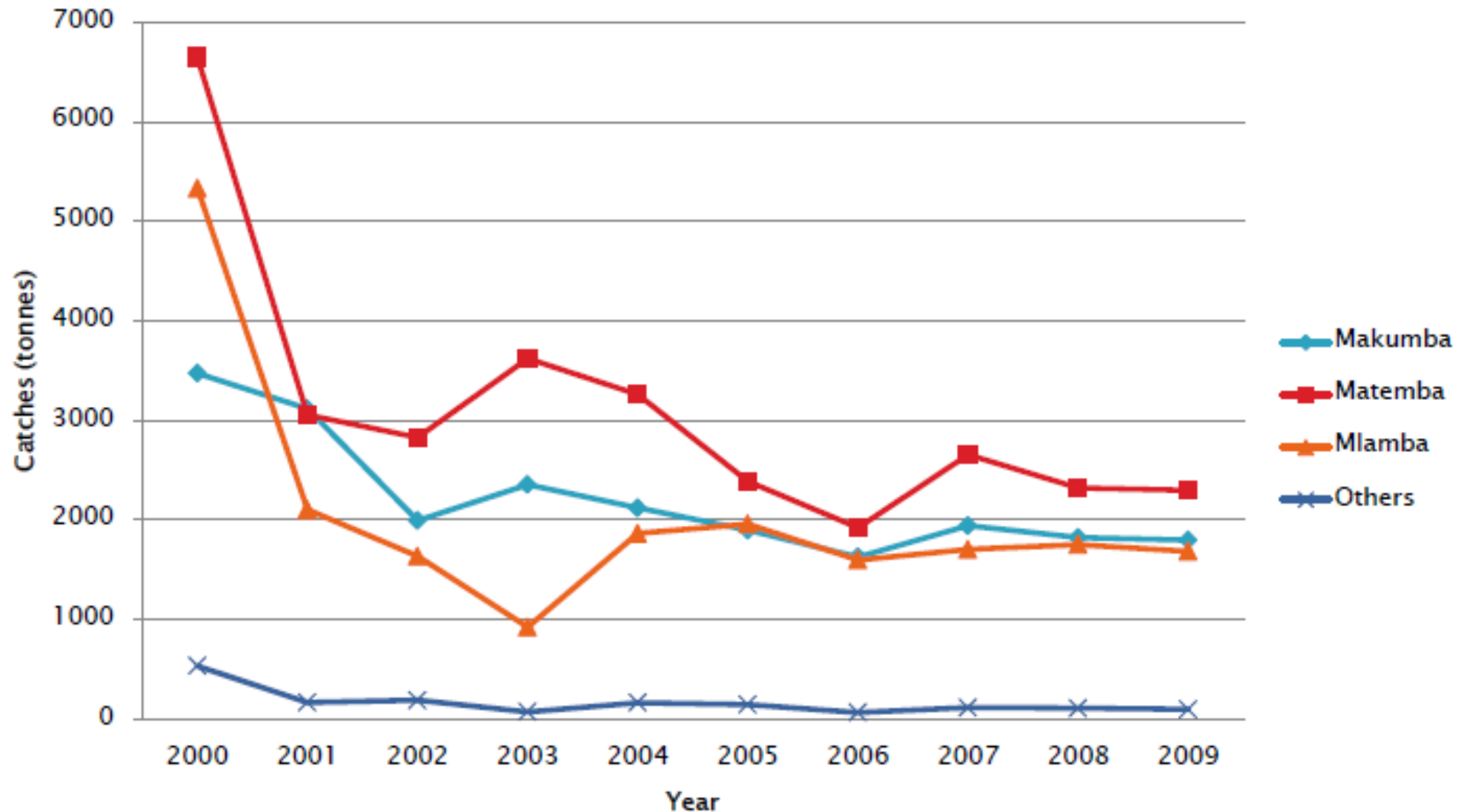


Population and Per Capita water projections for Malawi (1999-2040)

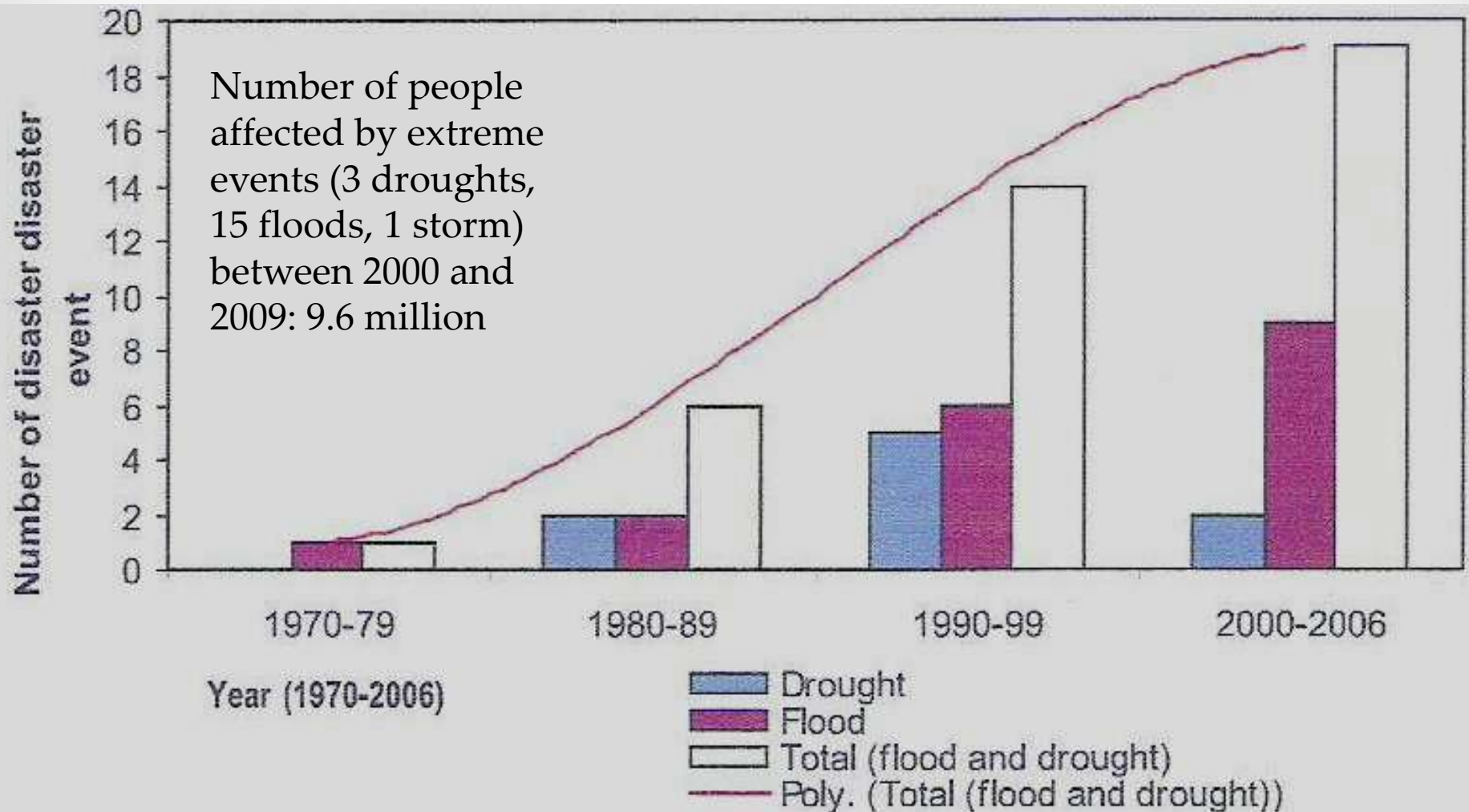


Lake Chilwa Fish Species Catches (2000-2009)

Source: Dept. of Fisheries, 2010



Extreme events increasing





Some human habitats
in Lake Chilwa make
people vulnerable to
diseases (Zimbowela)





Lake Chilwa Basin Climate Change Adaptation Programme (2010-2014)



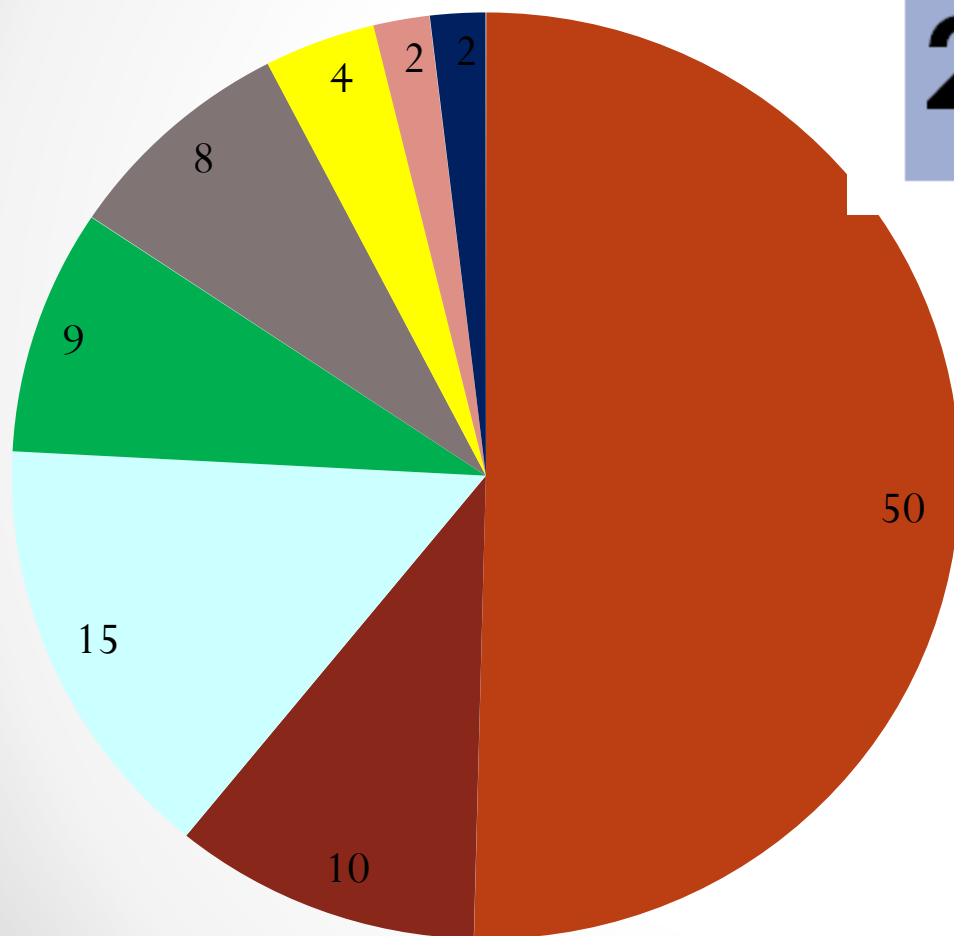
What was
missing that was
important?



Bilharzia



How to enhance women's adaptive capacity to climate change?



Nationally, unmet need for Family Planning was **27%** (AFIDEP-PAI Brief, 2012)

- Improve maternal health
- reduce child mortality
- Dont know/ No response
- Promote gender equality
- Reduce women vulnerability to HIV
- Provide means of transportation

Environmental Shock: Lake Chilwa partially dried 2012



Cholera



Addressing Health Concerns

- Press release on Cholera outbreak, TV programme, news paper articles
- Subsequently help received by DHO
- Bilharzia ...??
 - Neglected tropical disease
 - No recent studies
 - Prevalence to be determined



Bilharzia prevalence study



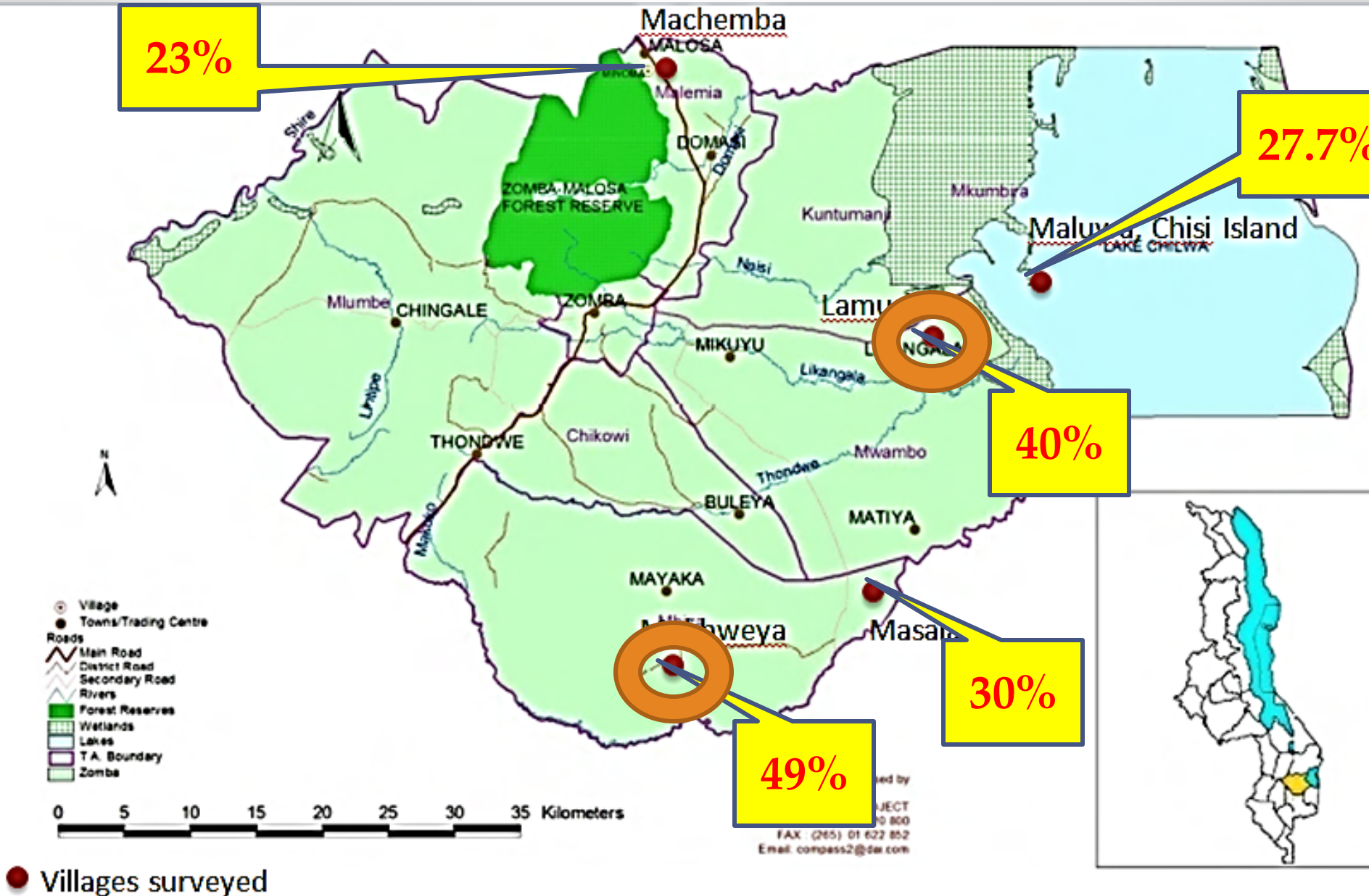
23%

27.7%

40%

30%

49%



Map of study area

Additional drugs were received from WHO and District Health Office is now including communities in the Mass Drug Administration which was previously only targeting primary schools

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Abstract

A large proportion of Malawi's more than 13 million people live in rural areas where major livelihood activities include subsistence farming, irrigation and fishing. Therefore the villagers have contact with water, which exposes them to schistosomes. In this case study, surveys and parasitological investigations were conducted to determine the prevalence of schistosomiasis and to explore the relationship between disease prevalence and selected qualitative variables in five villages located in Zomba District in Lake Chilwa Basin. The study revealed a high prevalence, ranging from 23% in Macheimba village to 49% in Mukhweva village. Children, 6–15 years old,



50% of girls get
married before
age 18yrs

Samiyathu's
story –
Child marriage

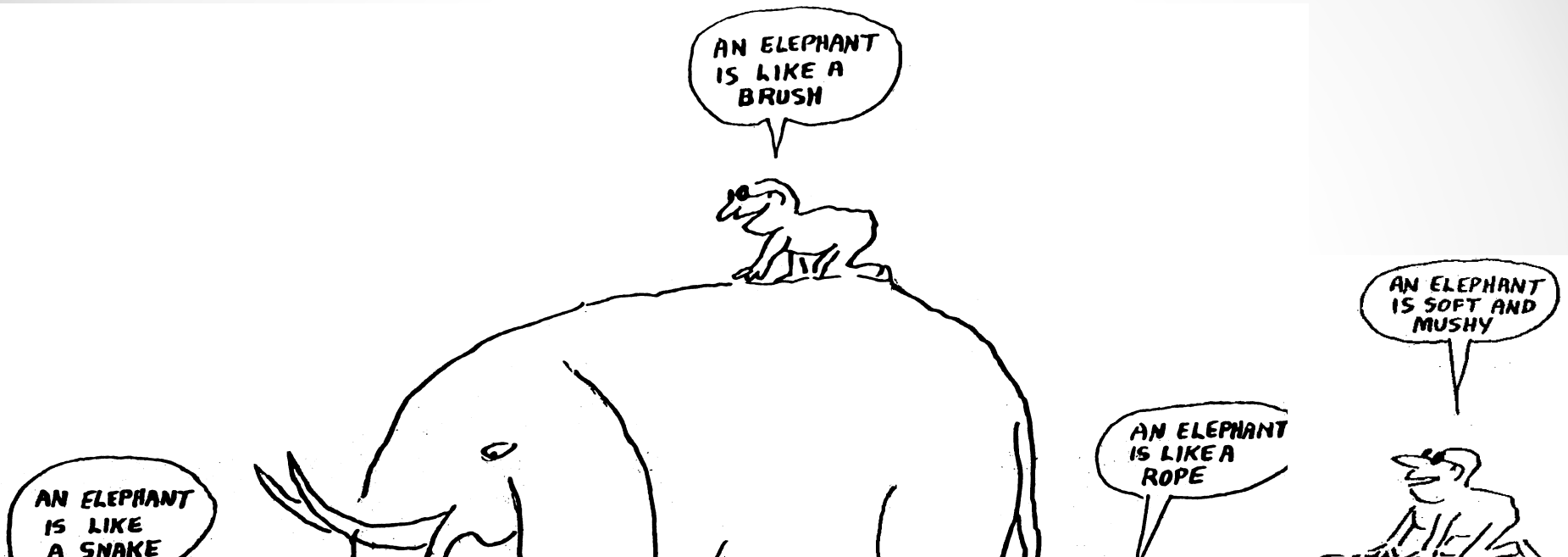


- Linked communities with Family Planning Association of Malawi
- Population Ref Bureau “Engage” video shown
- Mobilizing LEAD Families to provide peer support

Policy and Programmes

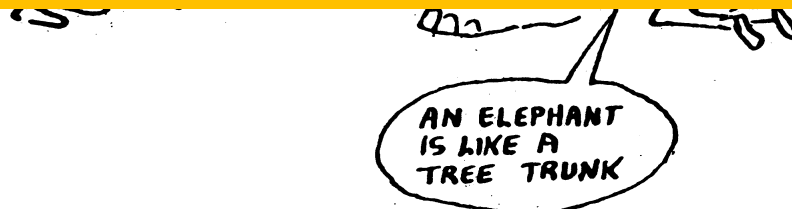
- National Climate Change Policy of Malawi
- GEF proposal on climate proofing local development gains
- Plan to train journalists on PHE approach

Systems approach



Sectors versus Systems:

Fixing a part, missing the whole



Mutu umodzi susenza denga
(it takes many hands to fix the roof)

