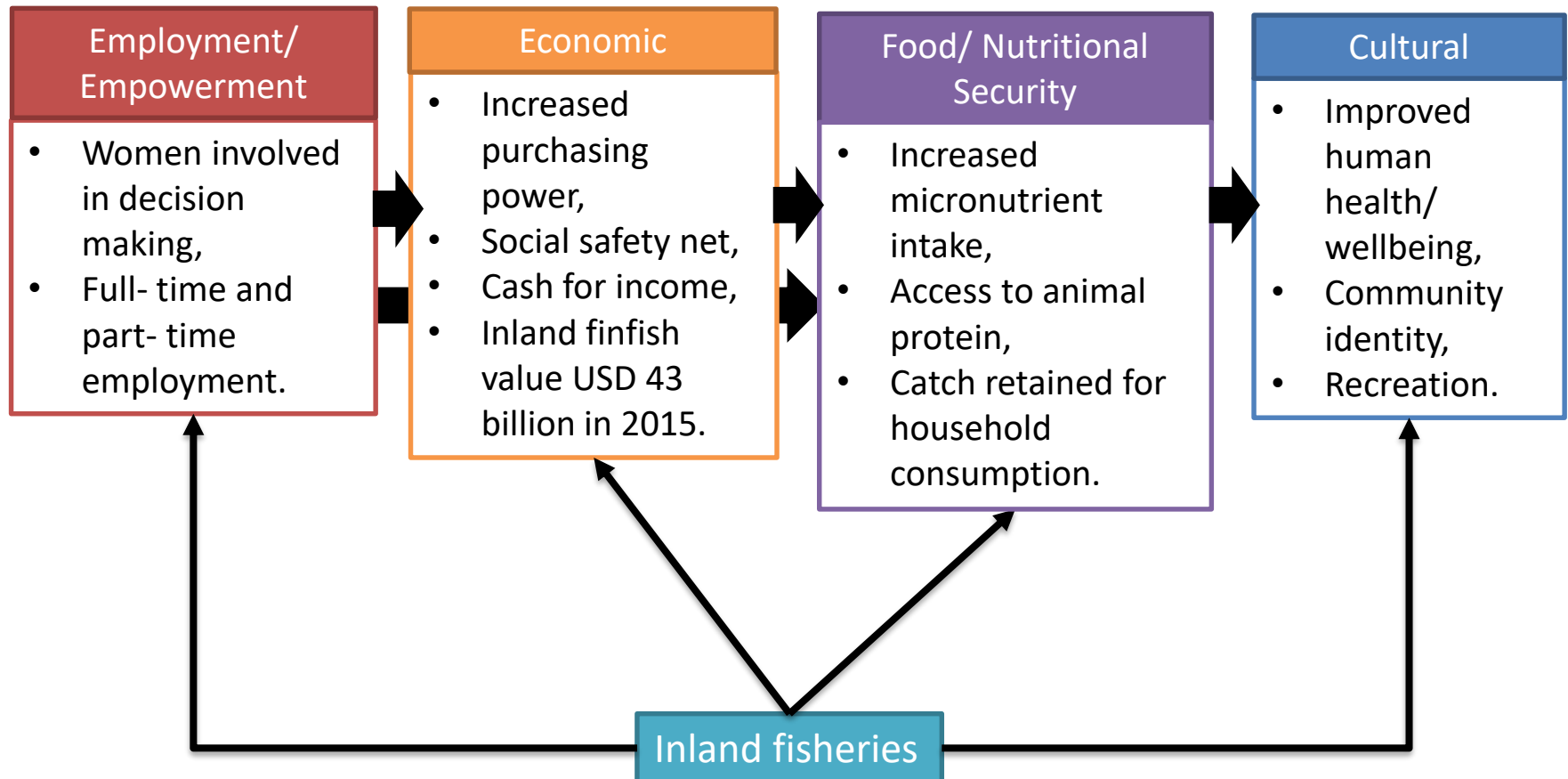




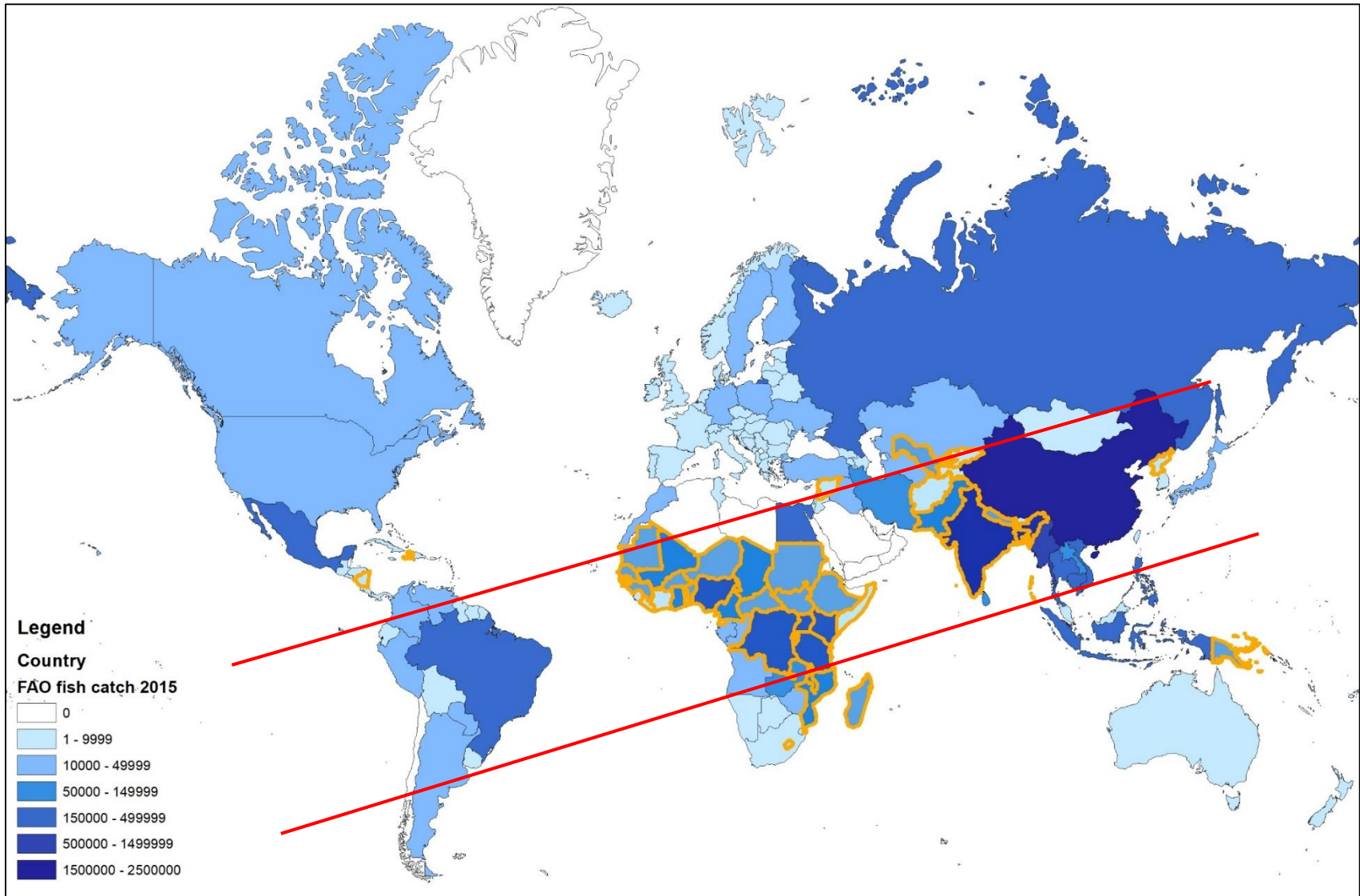
Replacement Water Cost of Global Inland Fisheries

Rachel Ainsworth

Importance of Inland Fisheries



Dependence on Inland Fisheries



- Orange outline indicates LIFDC



Climate change

Invasive species

WANTED

FOR HARMING FLORIDA

NON-NATIVE FISH ROUNDUP

Sat, April 8, 2017 | 7 a.m. to 3 p.m.



Help native fish by catching invasive species like Mayan cichlids, Oscars, Spotted Tilapia, and more. All fish must arrive at the Gazebo located at the Conservancy of Southwest Florida by 3 p.m. for measurements and weigh in. Stay for the cook out and awards!

JUST FOR KIDS! FISH TO PLATE!
3 pm to 4 pm at the Gazebo Pond!

Target Fish, Awards, and More Info at
www.floridainvasives.org/Southwest
Hosted by the Southwest Florida Cooperative Invasive Species Management Area.

Inland fisheries are exposed to multiple pressures



Dams



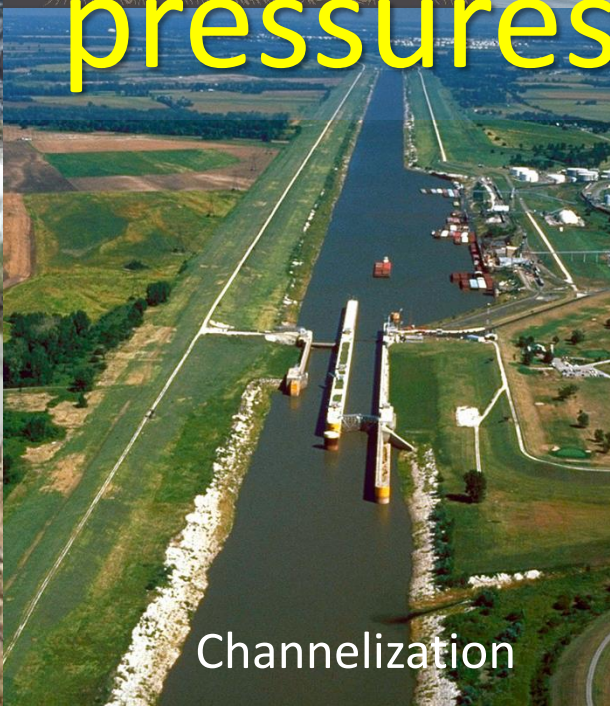
Fish exploitation



Pollution



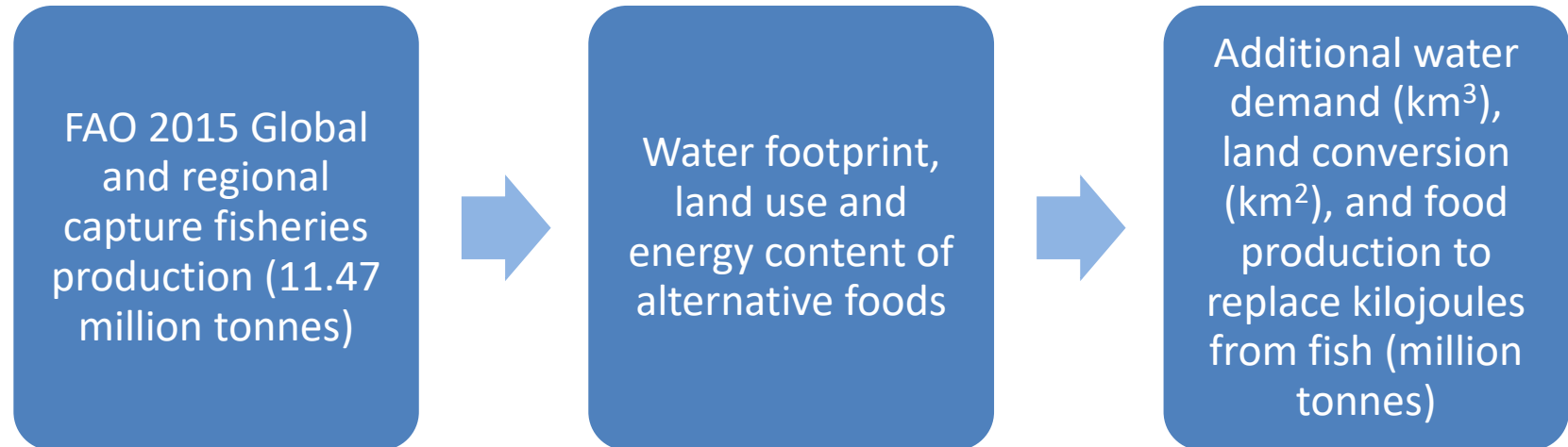
Habitat loss



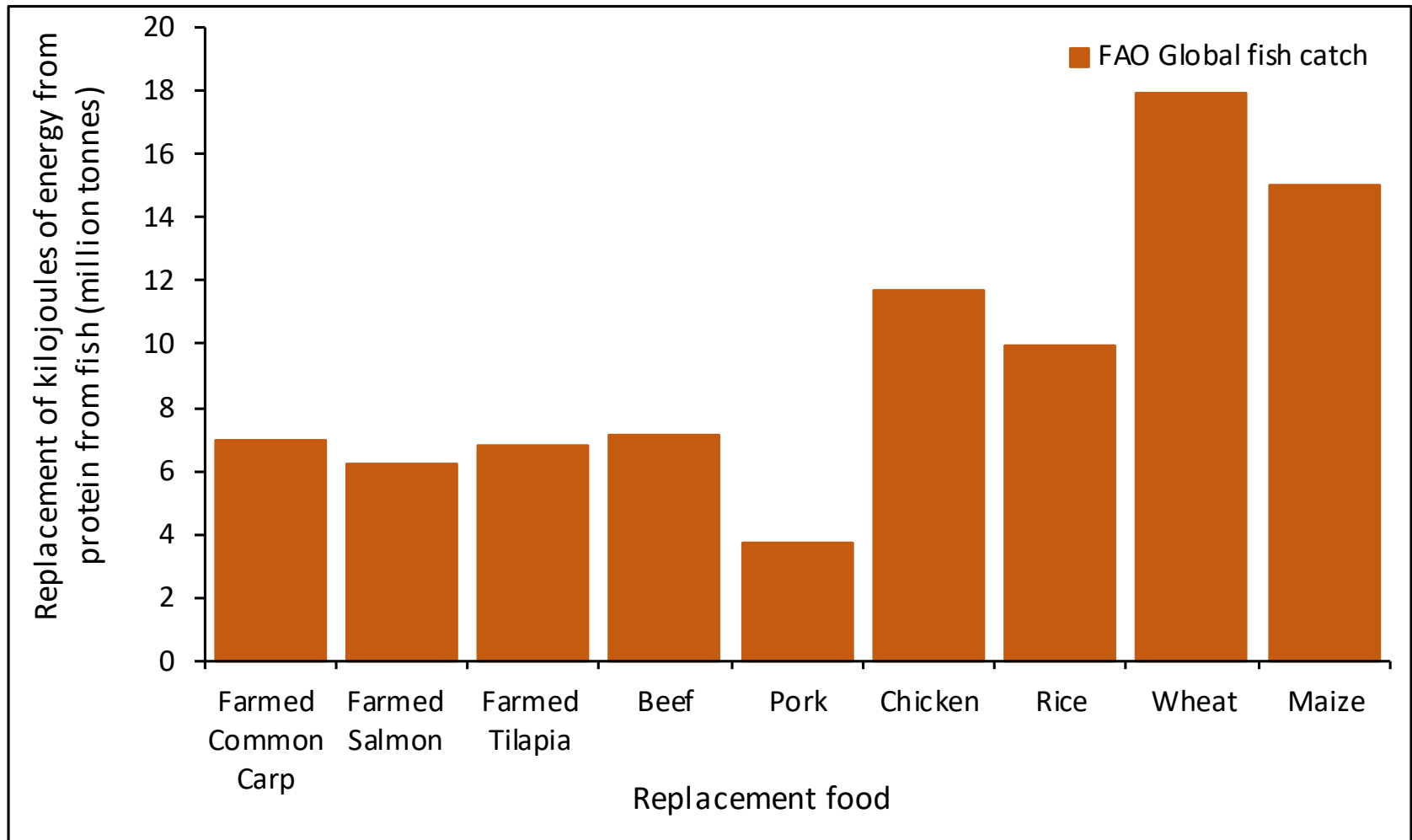
Channelization



Irrigation

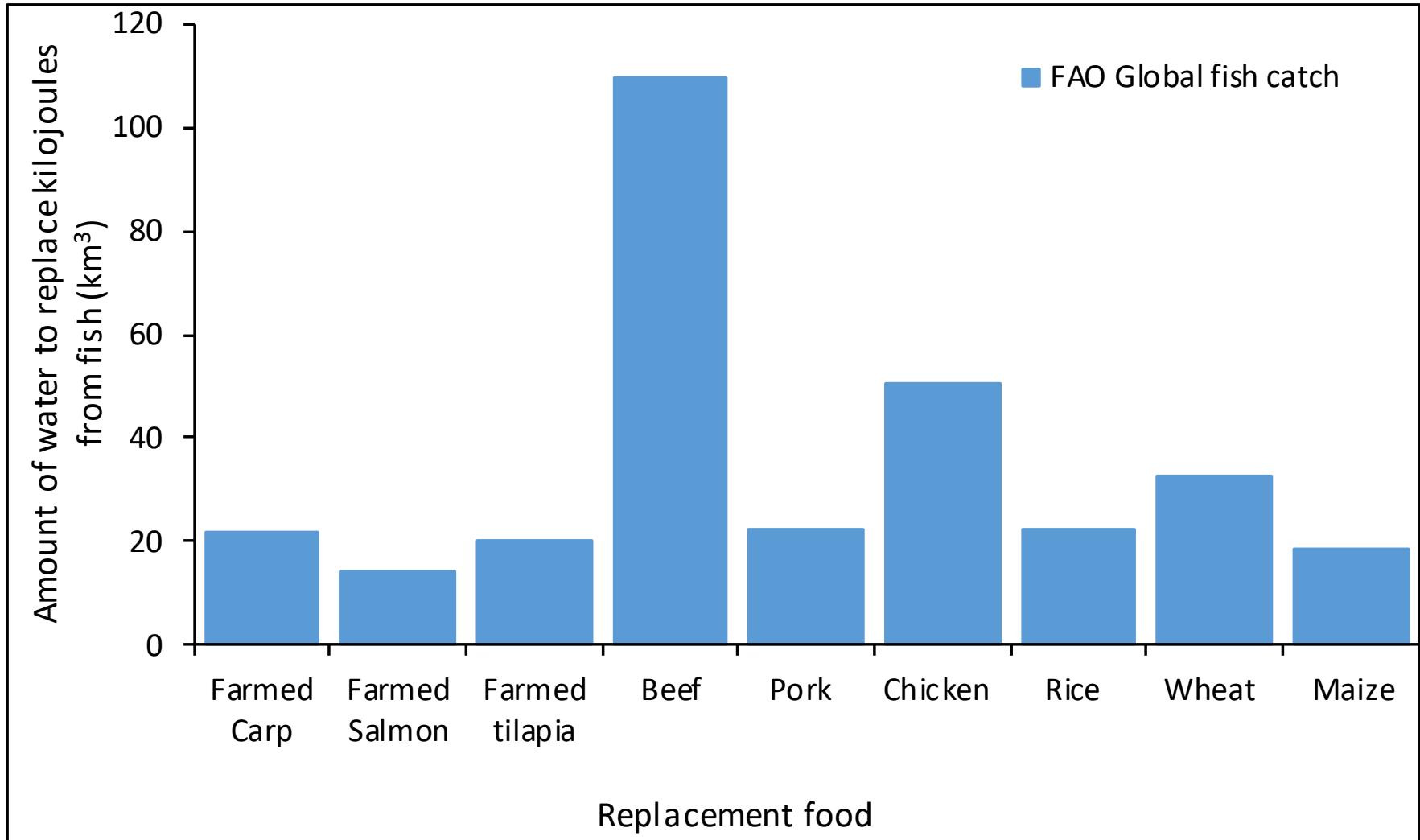


Kilojoule replacement

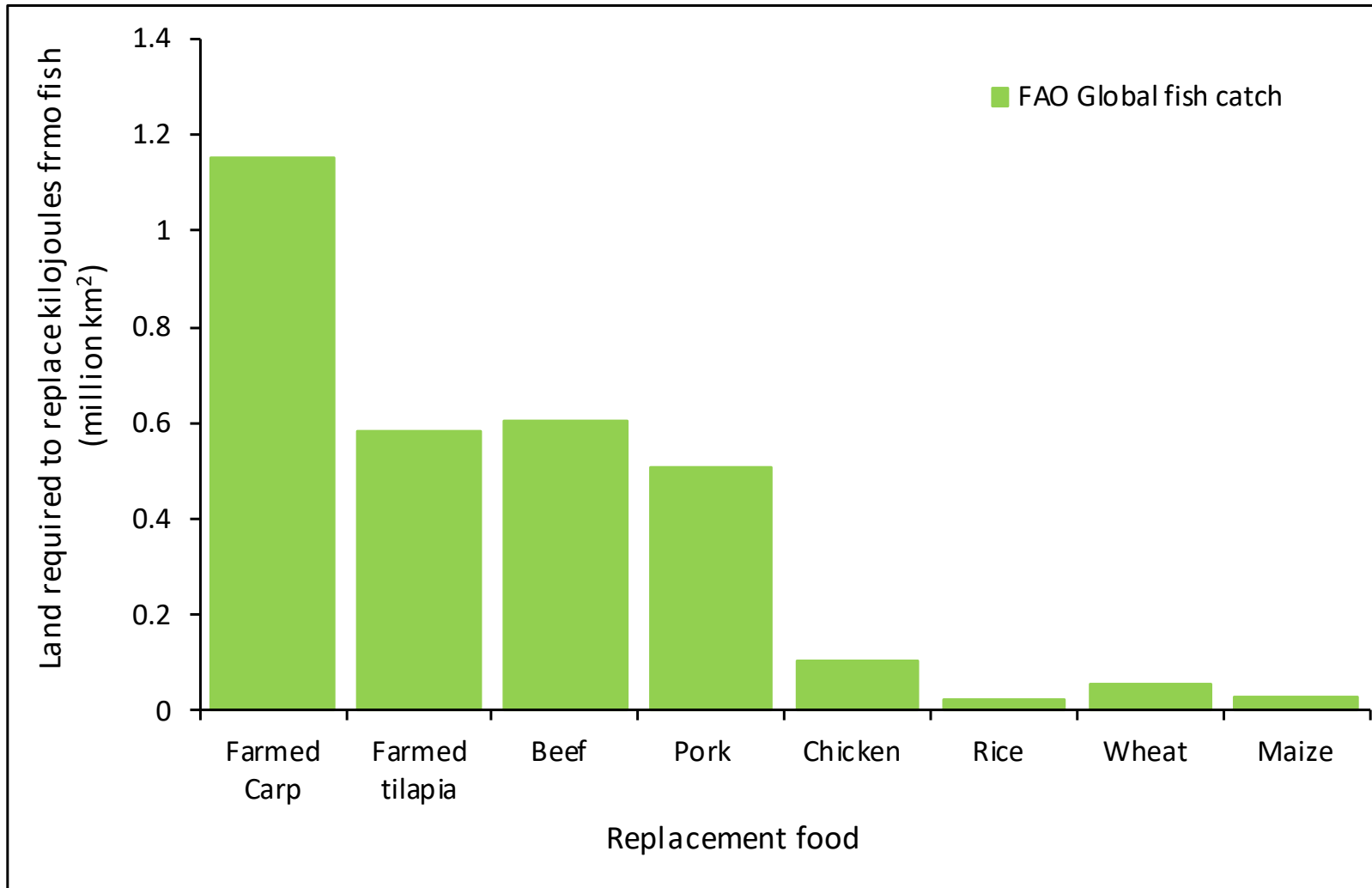


- Aquaculture- 6 times global production,
- Livestock- 8% of global production,
- Crops- 2% of global production.

Water demand

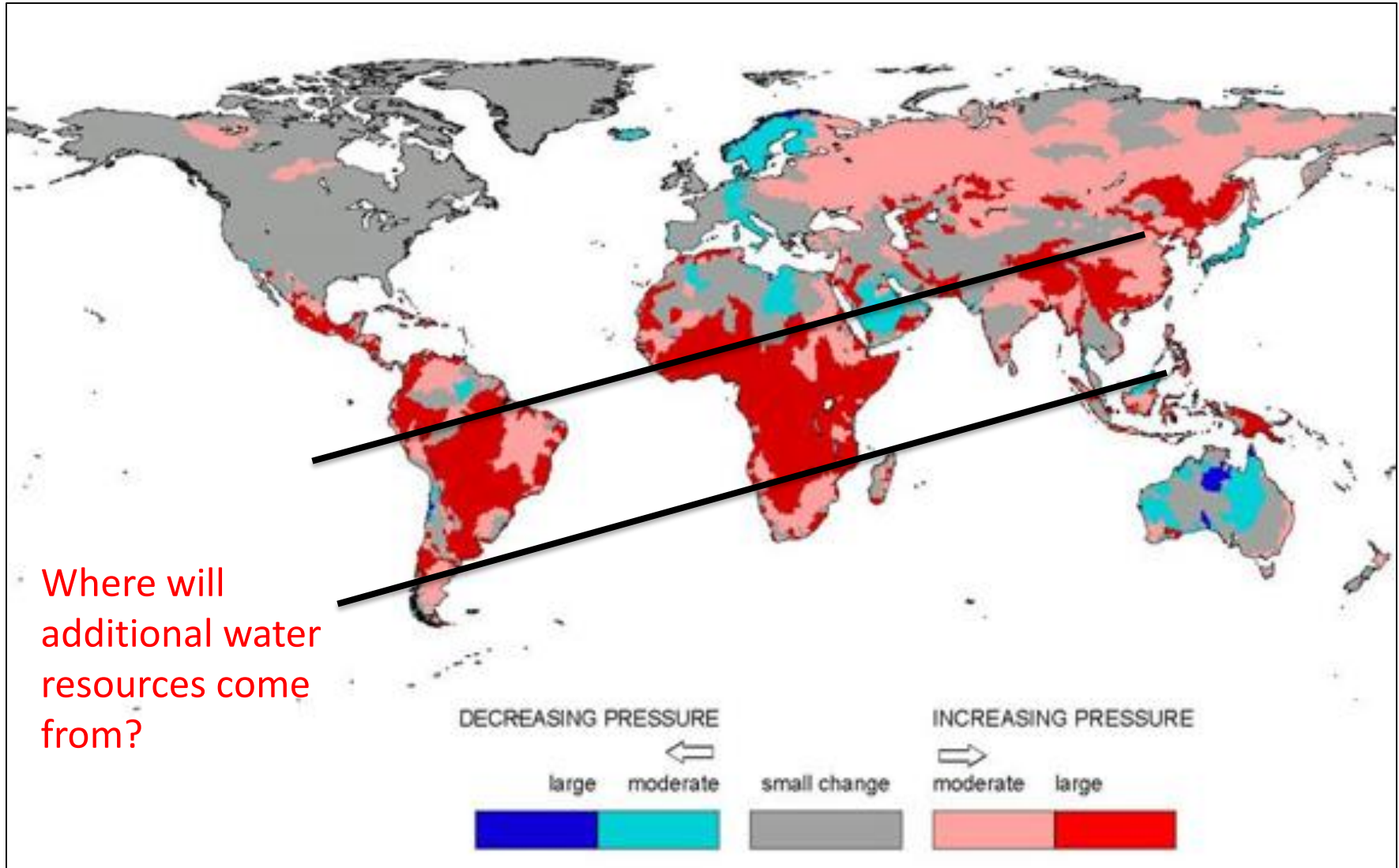


- Beef- 4% of global agricultural water use,

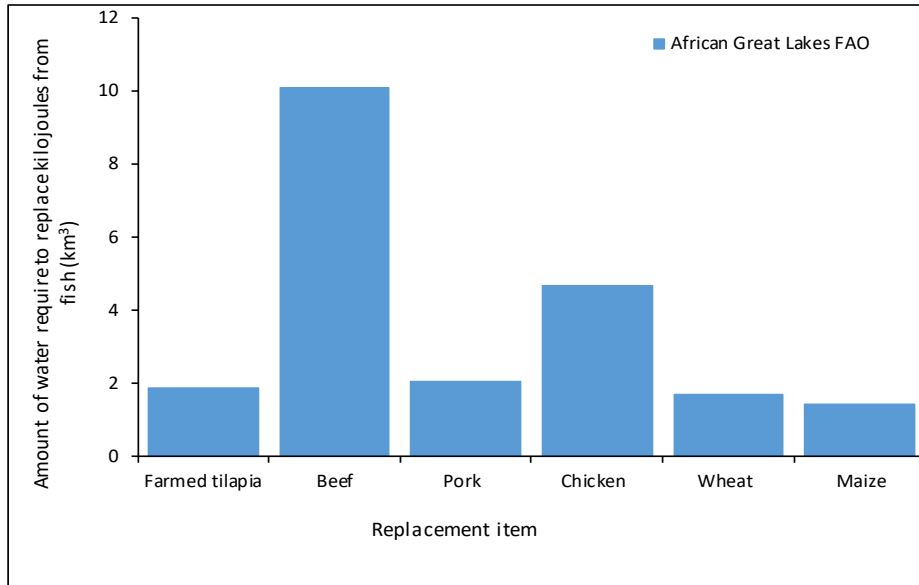


- Aquaculture- 24% of global inland water area,
- Beef- 4% of global pasture land.

Pressure on water resources

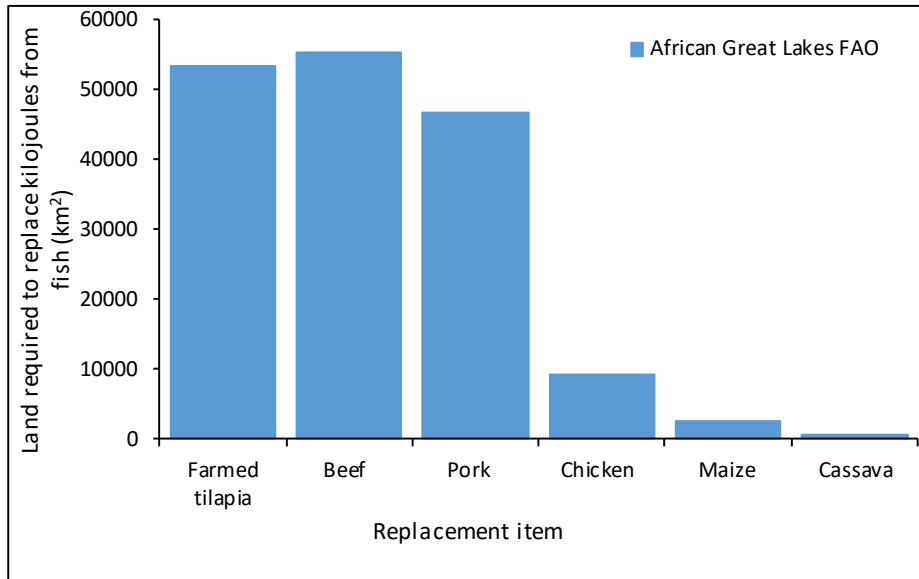


African Great Lakes (1.1 million tonnes)



Water demand

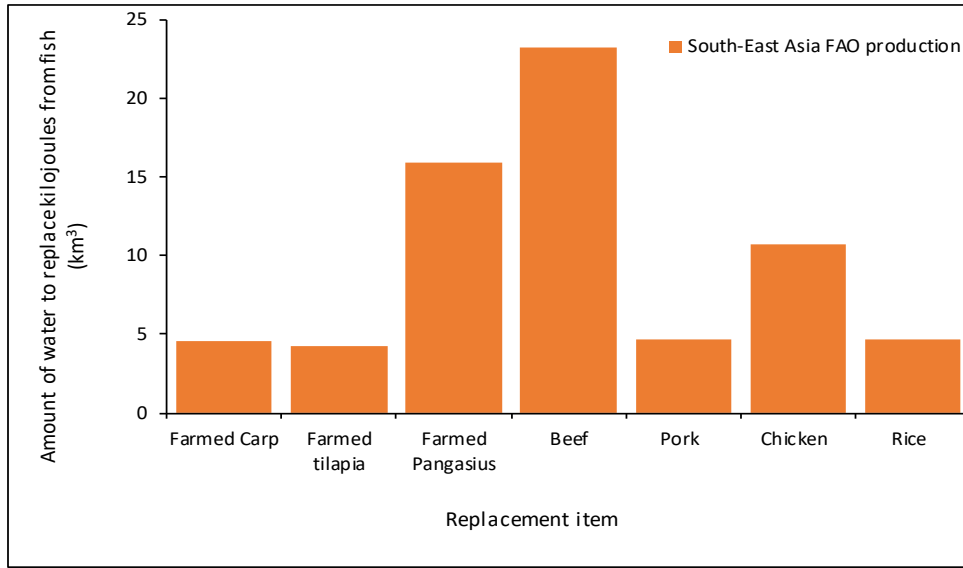
- Beef- 1.2 times regional water use



Land use

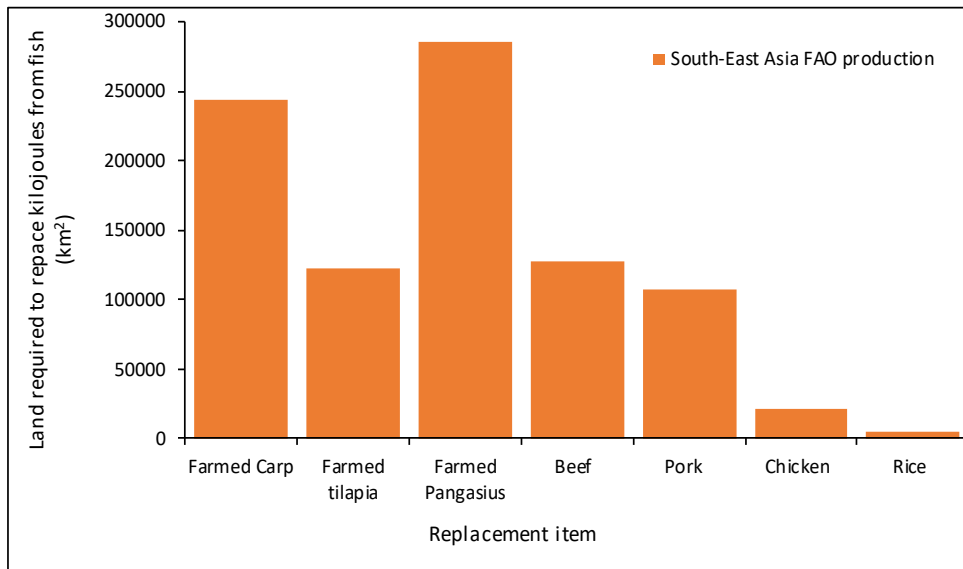
- Aquaculture- 51% regional inland water area
- Beef- 14% of regional pasture land

South- East Asia (2.5 million tonnes)



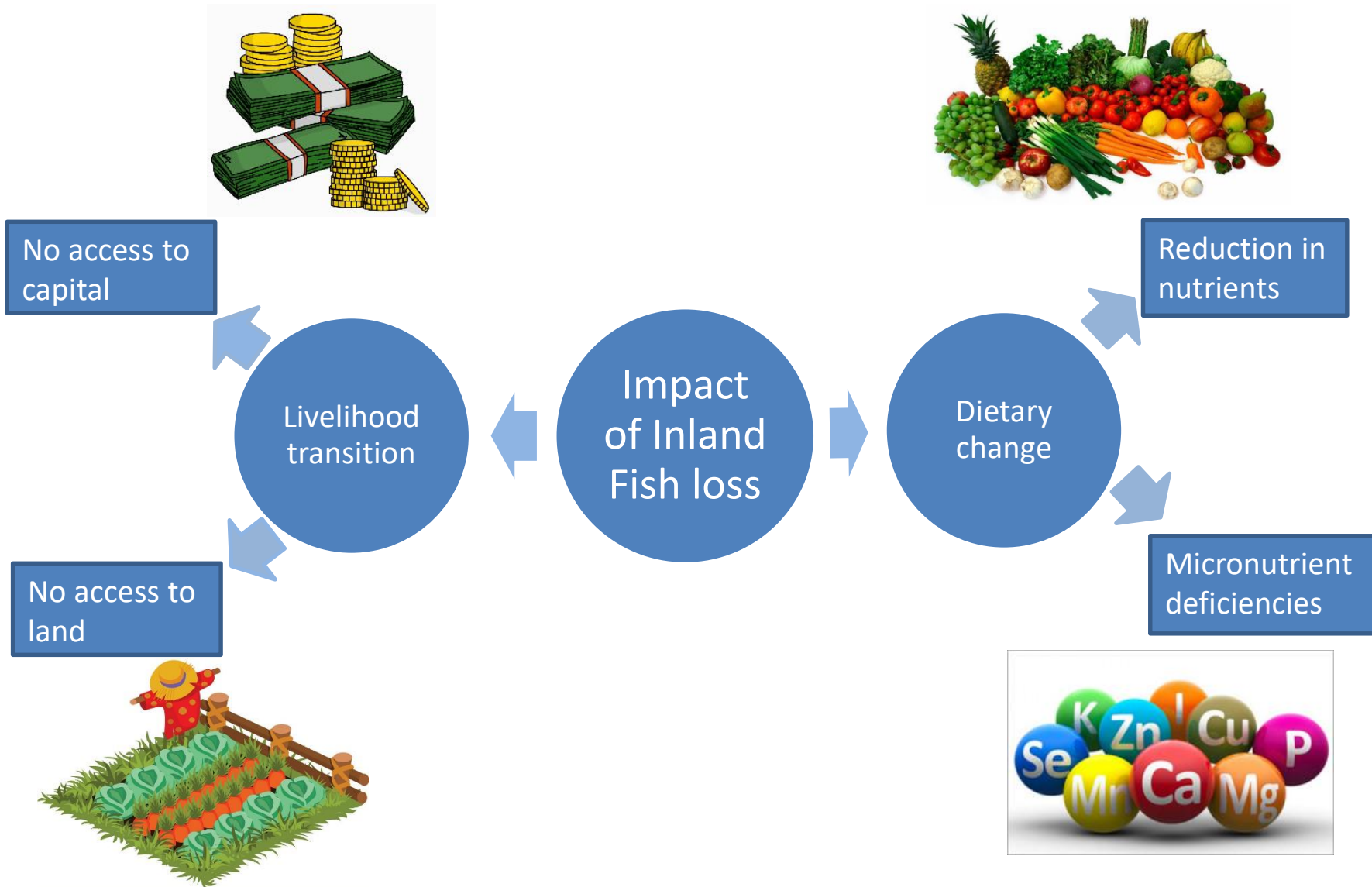
Water demand

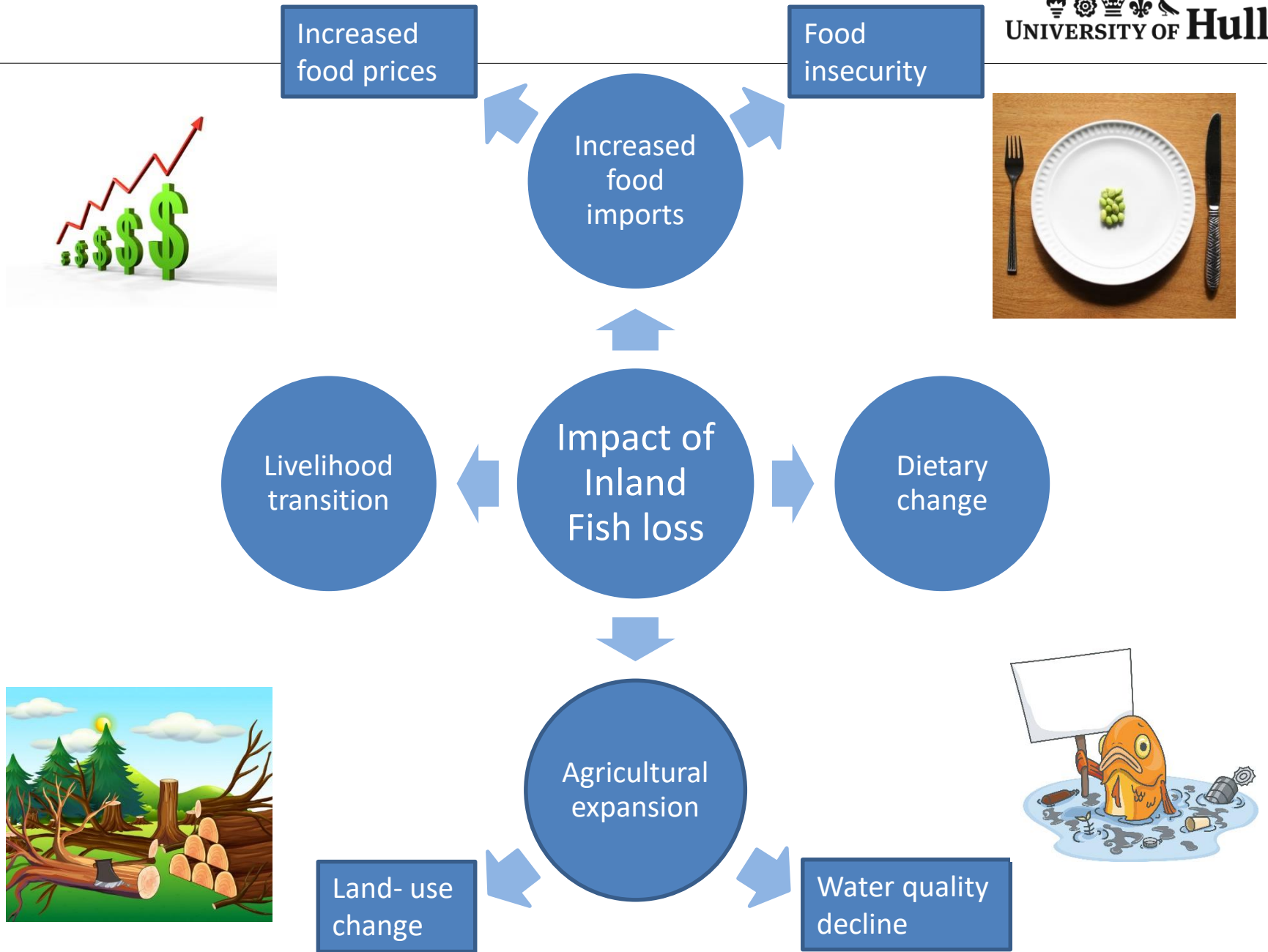
- Beef- 7.6% regional water use,



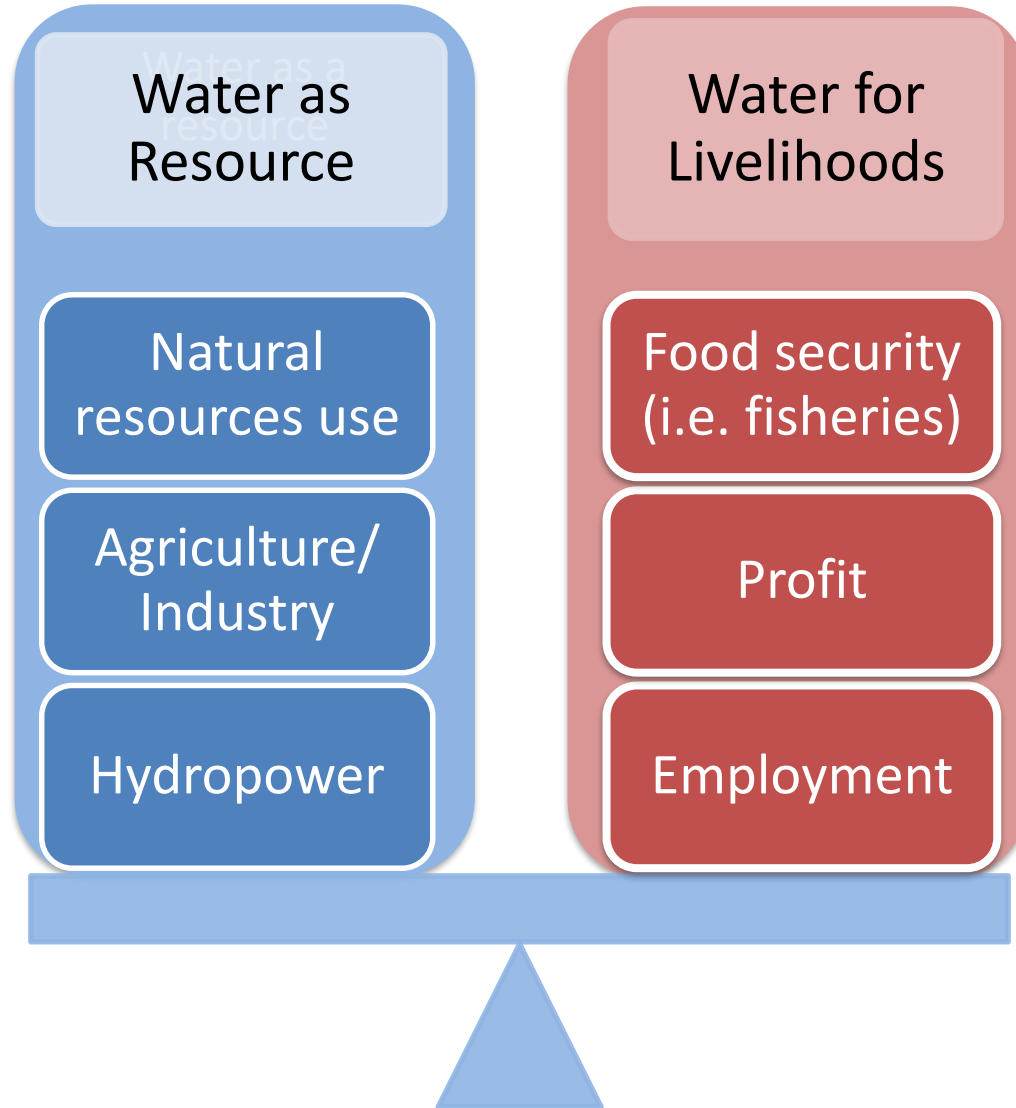
Land use

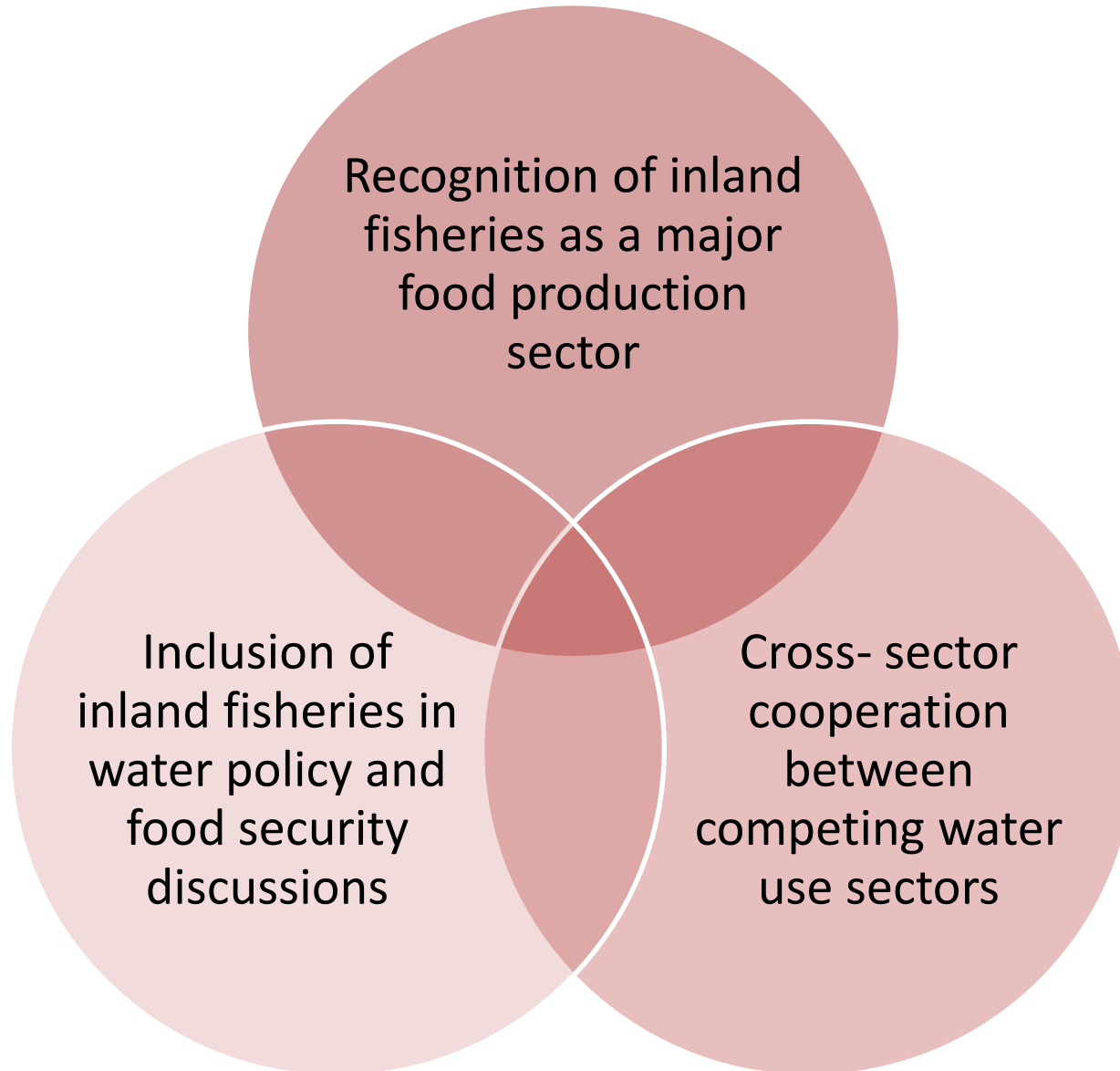
- Beef- 1.4 times regional pasture land area,
- Aquaculture- 1.5- 3.1 times regional inland water area.





The delicate balance





Thanks for listening!

Any questions?

Acknowledgements:

Supervisors Prof Ian Cowx and Dr John Harvey,

Dr Doug Beard and Dr Abby Lynch at USGS,

Dr Simon Funge- Smith at FAO.
