

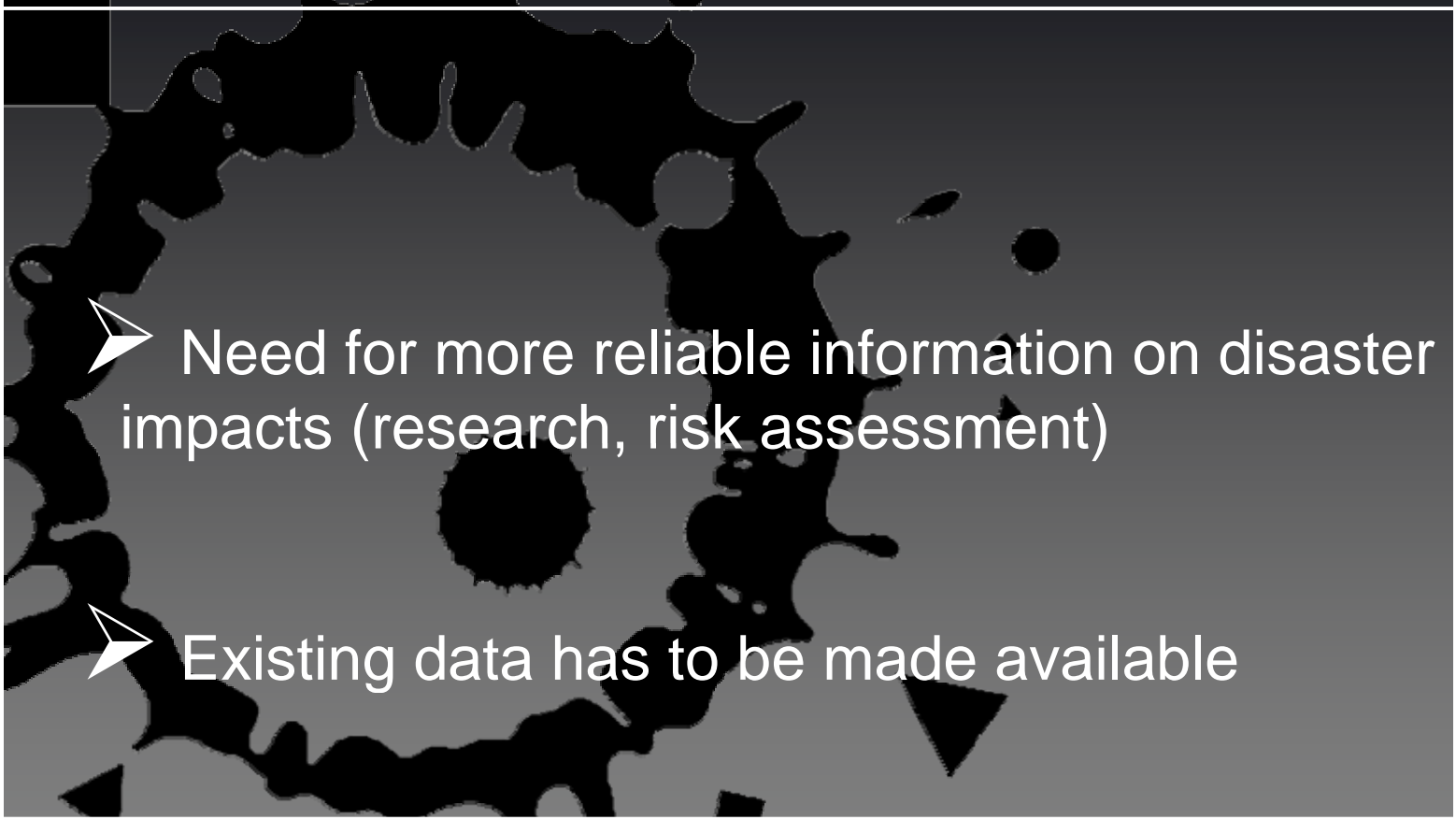
Developing a method to assess the human impact of disasters: initial findings for floods

José Rodríguez Llanes, Thomas Jakubicka

- Introduction
- Methodology
- Results

- 
- Need to measure the impact of disasters
 - Technology is advancing
 - A lot of effort is put into early warning
 - Many possibilities through the combination of existing databases
 - Existing efforts to assess risk globally (RISK, GNA)

comparability problems between indexes due to data quality and methods

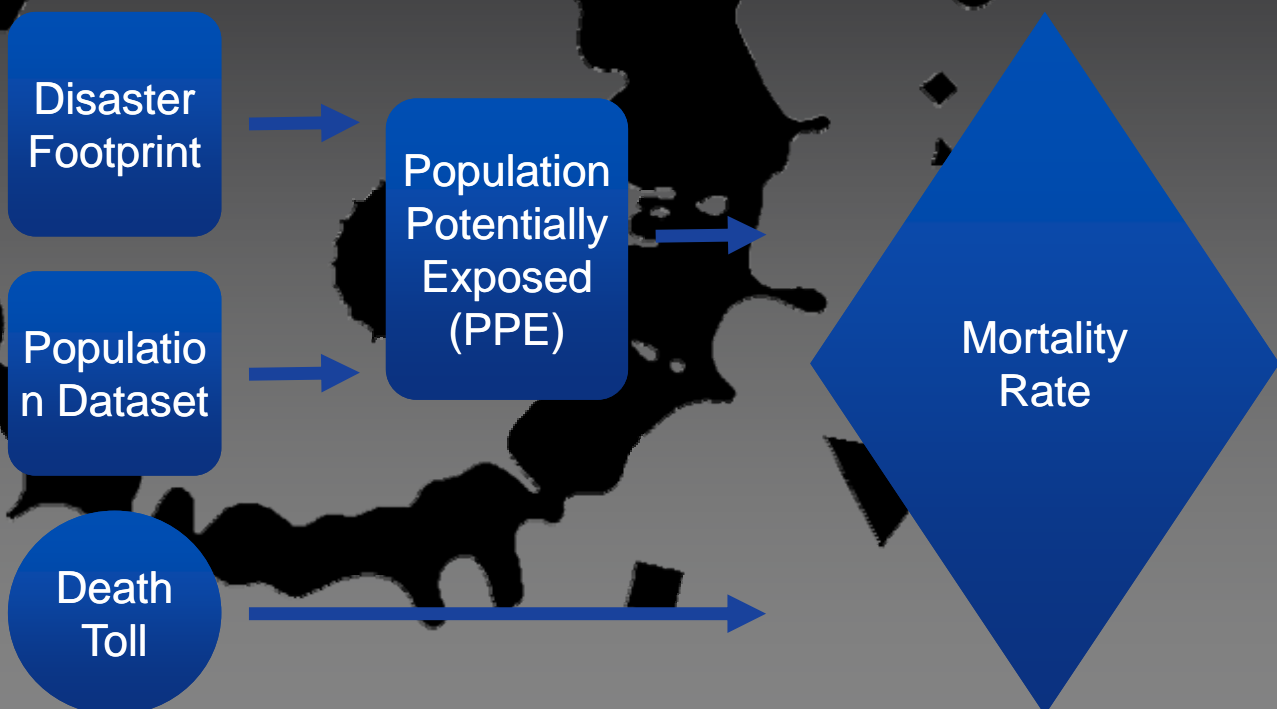
- 
- Need for more reliable information on disaster impacts (research, risk assessment)
 - Existing data has to be made available

Building resilience against disasters is a long term objective and needs the assessment of the existing problems

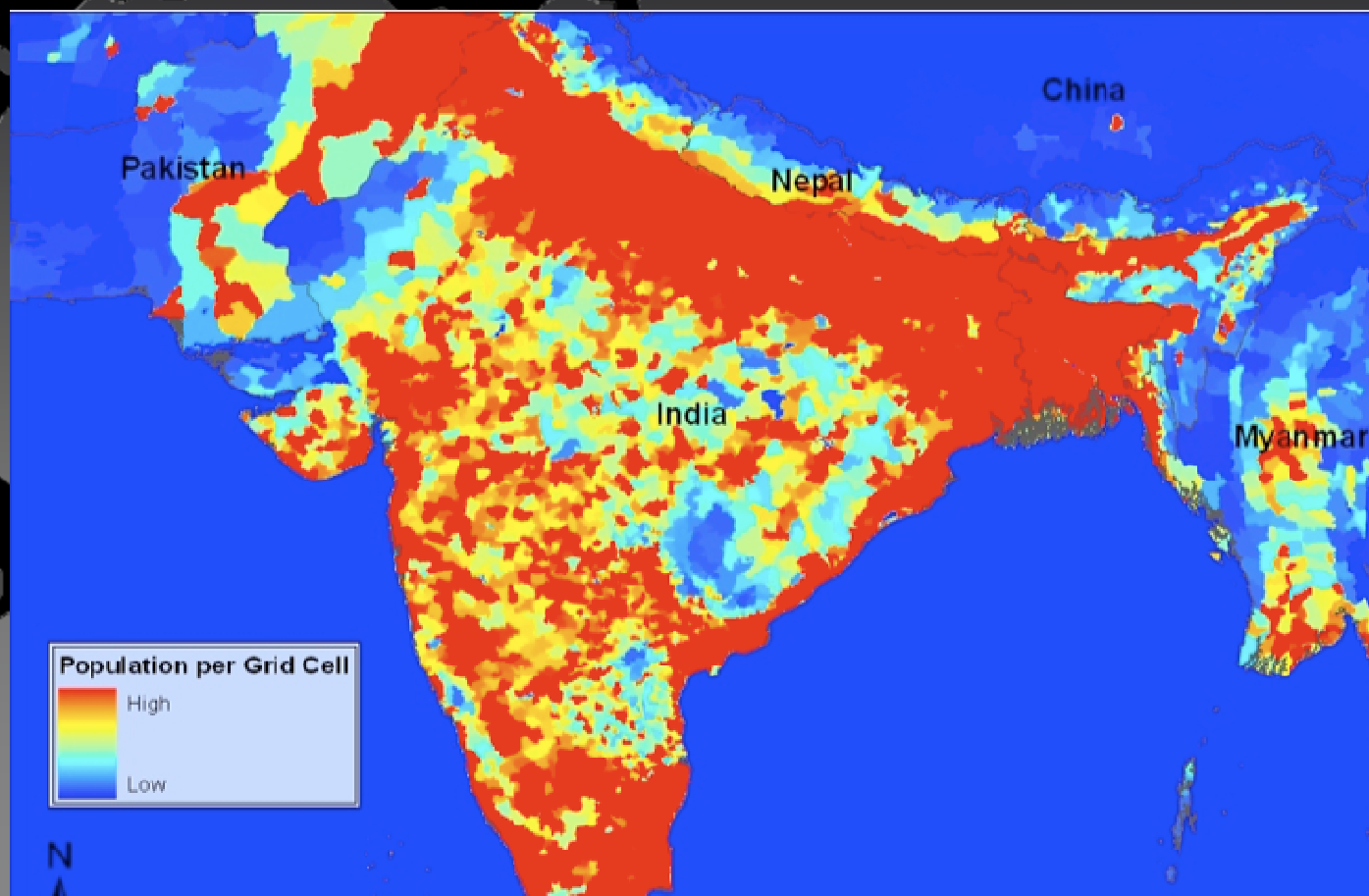
Datasets:

- Population dataset reference year 2005, 2,5 arc min, CIESIN
- DFO flood shapefiles
- EMDAT database

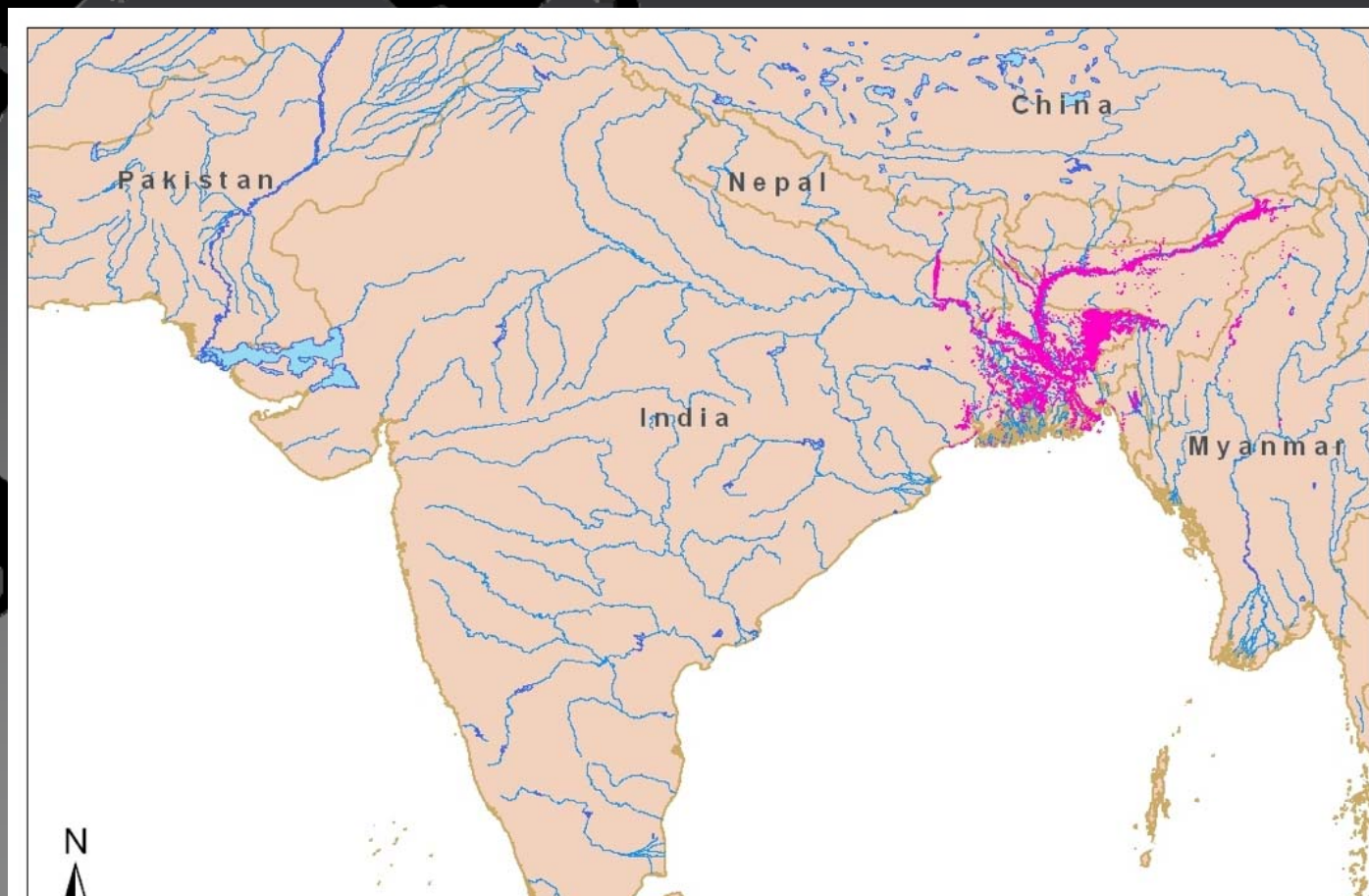
Methodology



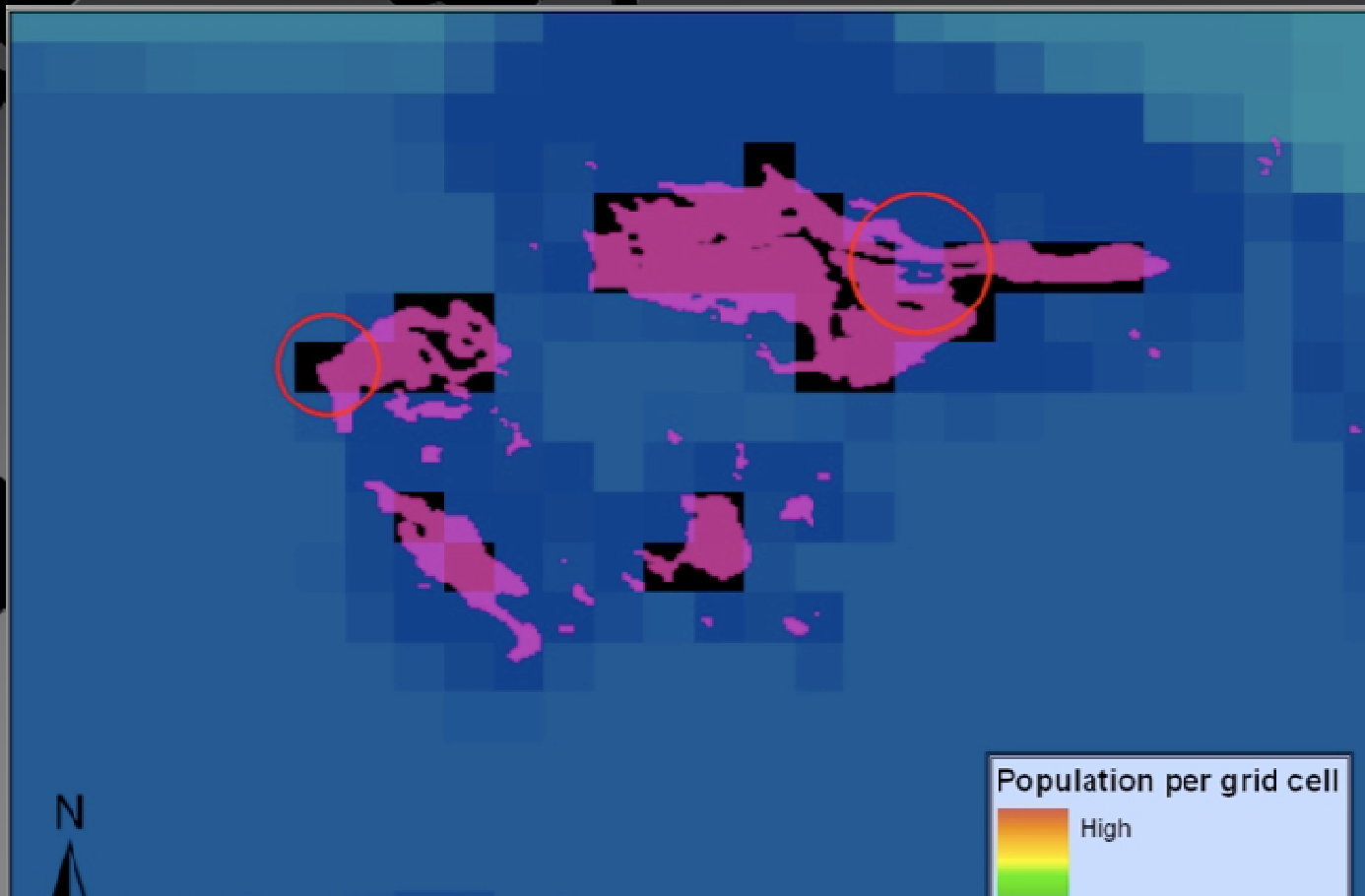
Population Grid



Food footprint



ection Problems



Possible Solutions:

- Landscan population grid
- flood shapefiles that distinguish between permanently water covered and inundated areas

Selected countries:

Country Name	Number of Floods	GDP per capita (USD)
Algeria	44	4,588
Australia	50	46,824
India	225	1,017
Kenya	34	838
Zimbabwe	7	268

Results:

Country	Glide#¶	Disaster subtype*	Associated disasters*	PPE	Deaths*
Algeria	2008-000178	Flash Flood	Landslide / Mudslide	98.846	93
Kenya		General Flood	Landslide / Mudslide	33.201	17
India		General Flood	Broken Dam / Burst Bank	16.831.500	47
Australia	FL-2008-000014-AUS	General Flood		53.512	0
Zimbabwe	FL-2008-000004-ZWE	General flood		1.962.106	24

- 
- More and global disaster footprint data will be needed
 - Only possible for specialized and well funded Teams
 - Linkage between the Databases is an Issue (GLIDE)

Good data sources (EMDAT, Landsat)
➔ footprints will provide new possibilities