Mapping with crowds and scientists - what is the difference?
Menno-Jan Kraak

Expectations?

Today, people demand up-to-date, or (near-)real-time, information, about virtually anything, anywhere, and anytime.

Cartography

How do I say What to Whom, and is it effective?

What happens in cartography? (interaction)

[source: New York Times]
What happens in cartography?

A world of change

- We no longer look at the map to see where we are...
- ...contrary, we tell the map where we are, and the map shapes itself around us

Jessica Clark

http://www.inthesetimes.com/article/3524/the_new_cartographers

Cartographers and map makers (type A)

Cartographers and map makers (type B)
The public: Open Street Map

Human sensors

- ... is about people using and creating their own maps, on their own terms and by combining elements of an existing toolset.

  (Turner, 2006)

- Neogeography
- VGI
- Citizen science
- Crowd sourcing

Mapping emotion: tweets

Sensor Web: Real time water levels

Beyond Cartography: Visual Analytics

• The science of analytical reasoning facilitated by interactive visual interfaces (Thomas & Cook, 2005)

http://nvac.pnl.gov/agenda.stm

Detect the expected and discover the unknown

The scientist: exploratory tools

Detect the expected and discover the unknown

• Alternative insight in performance
Merging cartographers and the map makers

Maps

- Are effective because they present a selection from reality via a well design symbolization, but....
- (Many) of today’s maps show data complexity (geovisual analytics) or chaos (crowd sourcing)

• Do we combine the best of ‘both’ worlds or do we need new maps?
Disaster mapping

Conclusions

• Cartographers have to constantly evaluate (and when necessary adapt) their mapping principles in new contexts