



IWA World Water
Congress and
Exhibition



IWA World Water Congress

10 -14 September 2006

Beijing, China

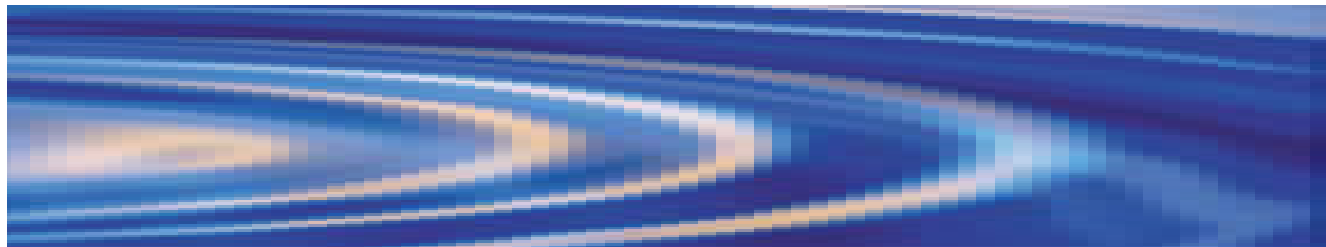
Jim Wright, Ulrike Rivett and Melissa Loudon

New Technologies for Managing Water Quality Data

In Developing Countries

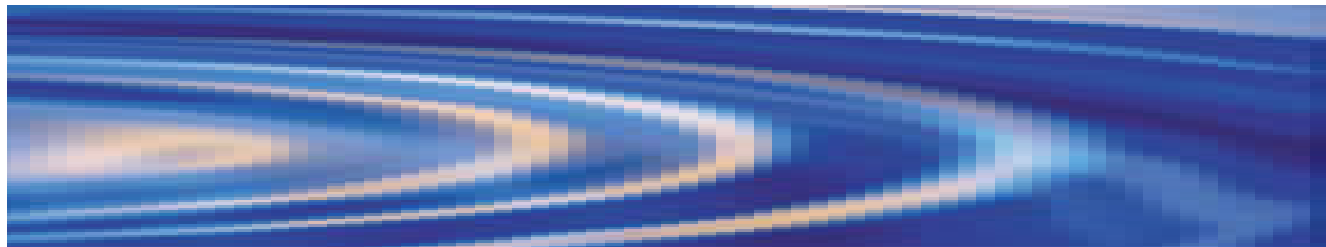
Why look at data management?

- *'The method is easy to use ... However, ... **sometimes it is difficult to store / keep our data**'* (Municipal Health Officer, Tanzania)
- Monitoring \Rightarrow Information \Rightarrow actions
- new data management technologies

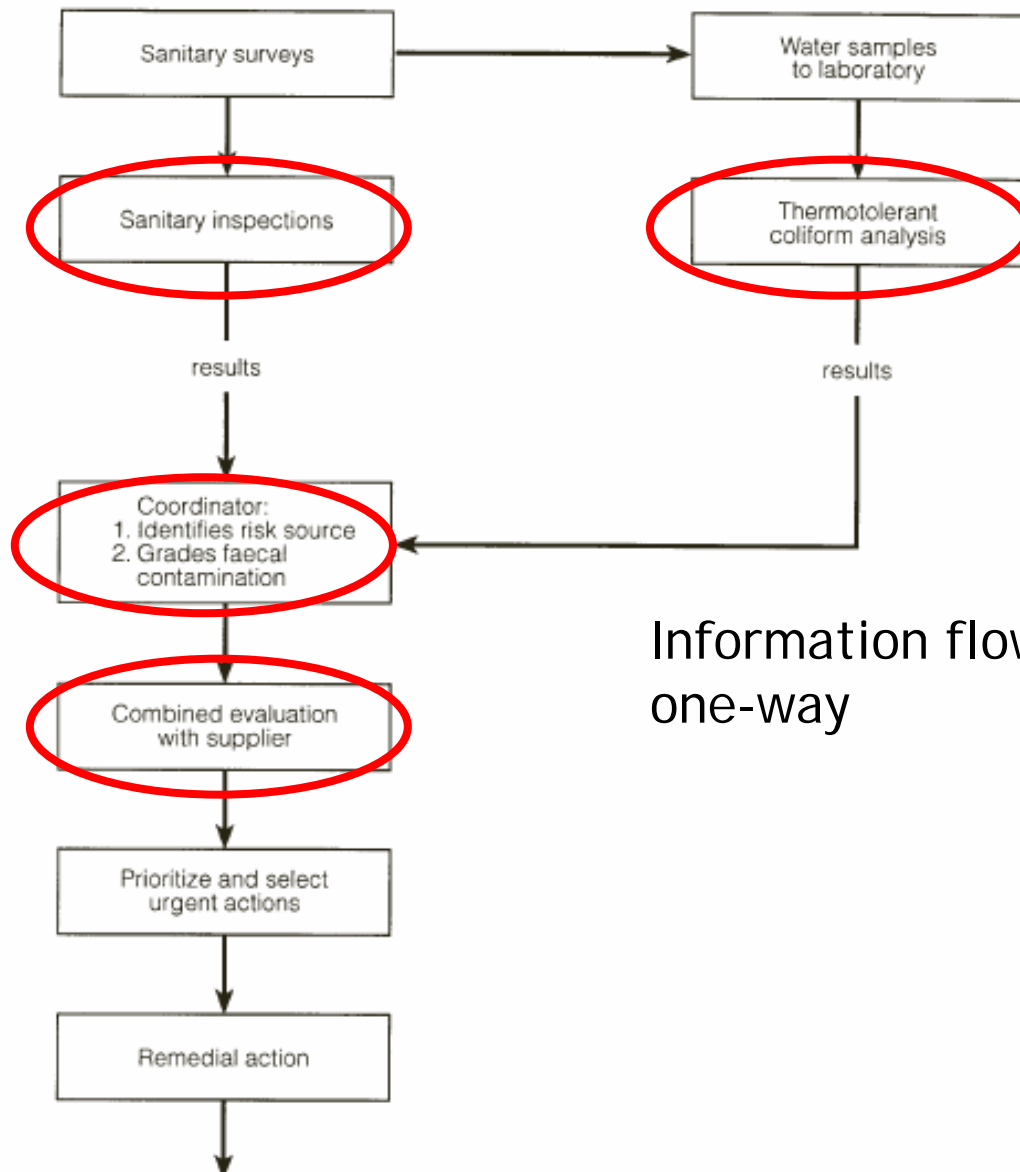


Managing data - settings

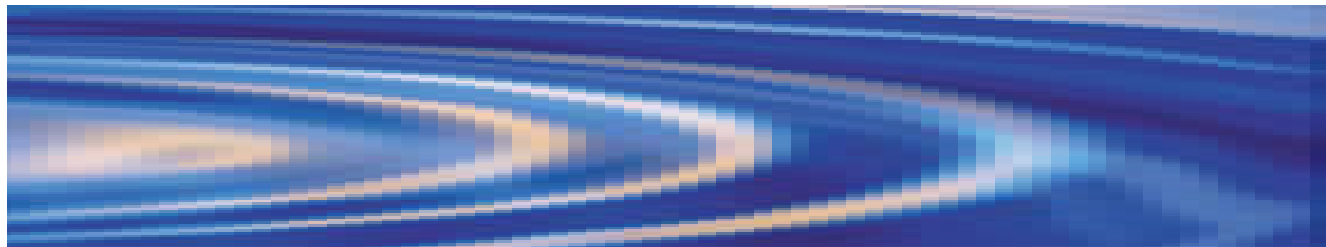
- Community use / hygiene education
- Disasters and emergencies
- Long-term development projects
- Routine water quality monitoring
- International monitoring – progress towards MDG's



Different people -
In different locations?

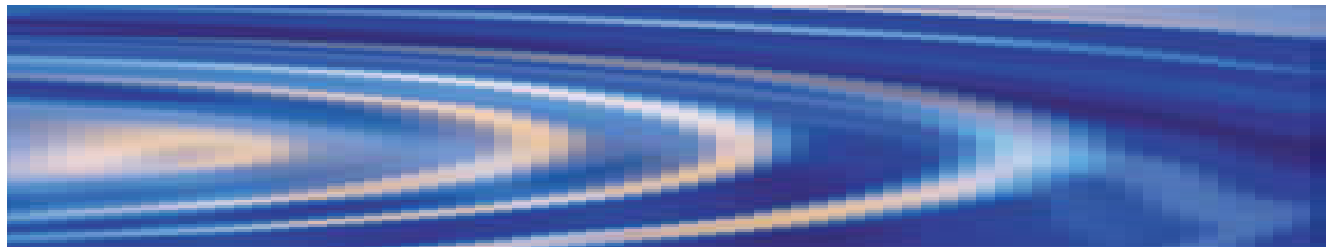


Information flow is
one-way

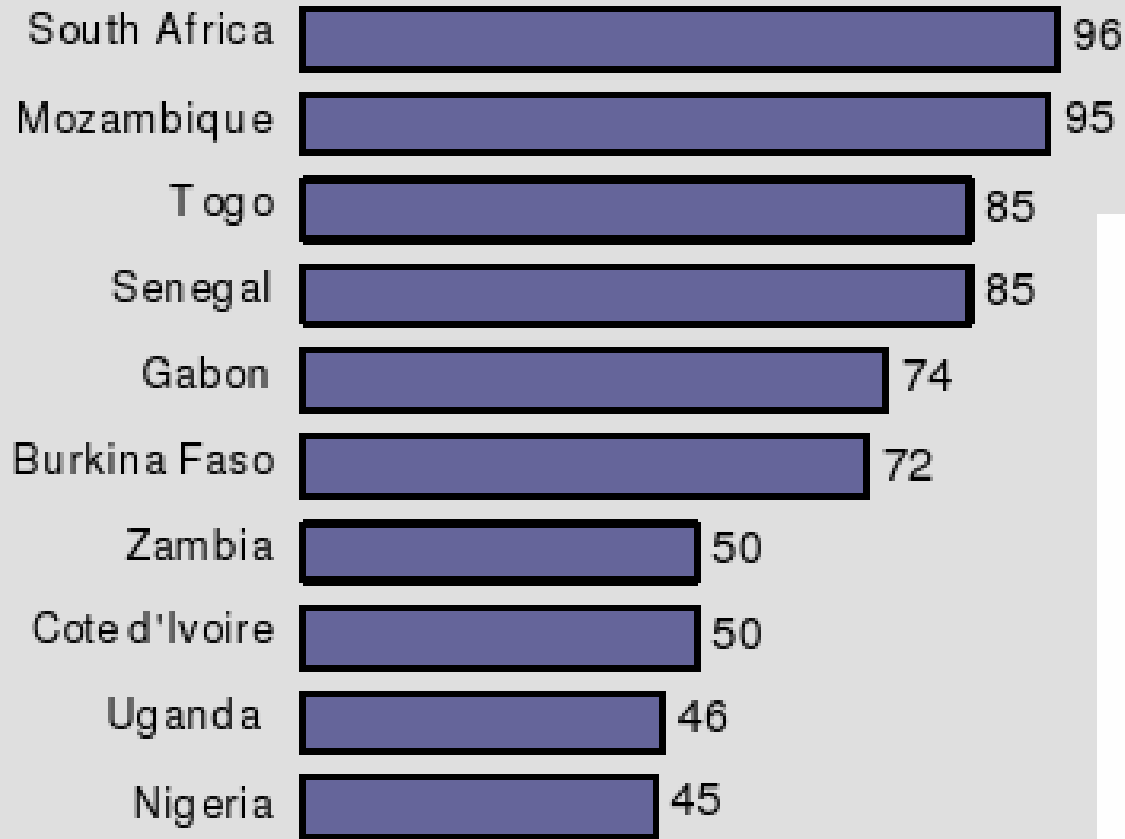


New technologies - examples

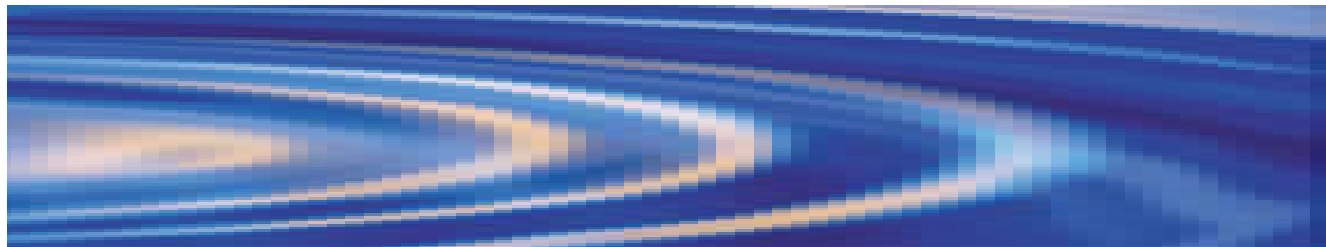
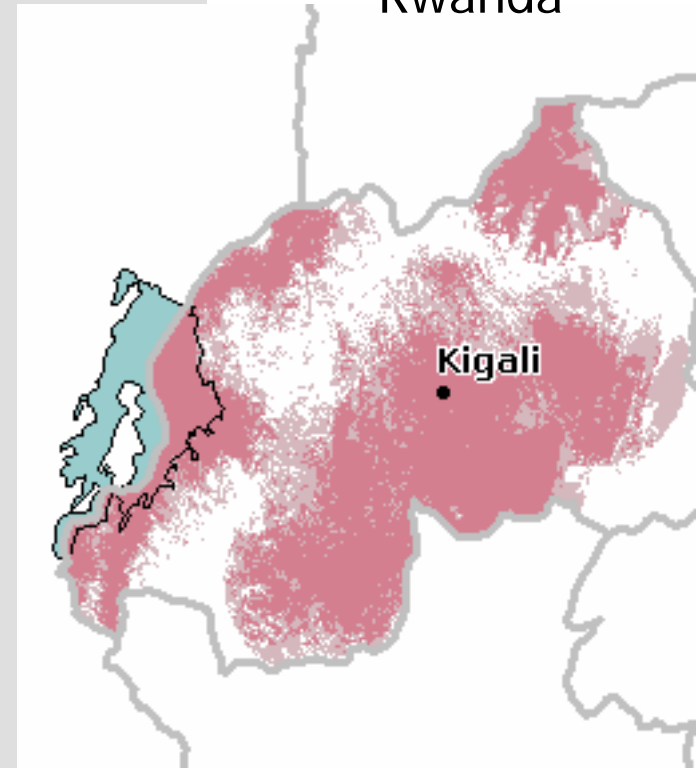
- GPS receiver chip – now \$5
- Web-based reporting of information
- Mobile phone communication infrastructure growing



Percentage of population covered by mobile cellular signal, selected African countries 2003/2004

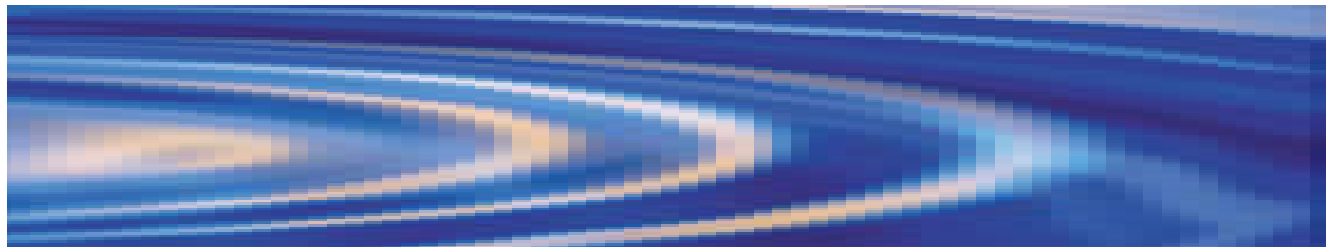


Cellular signal coverage for Rwanda

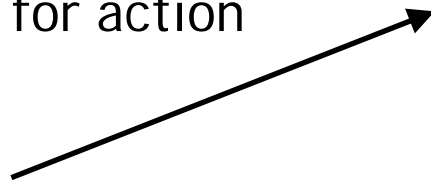


Use in other sectors

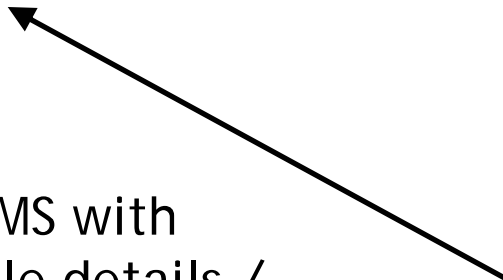
- Cell-Life have used technology in South African pilot studies
- HIV testing and ART treatment
- Education via distribution to schools



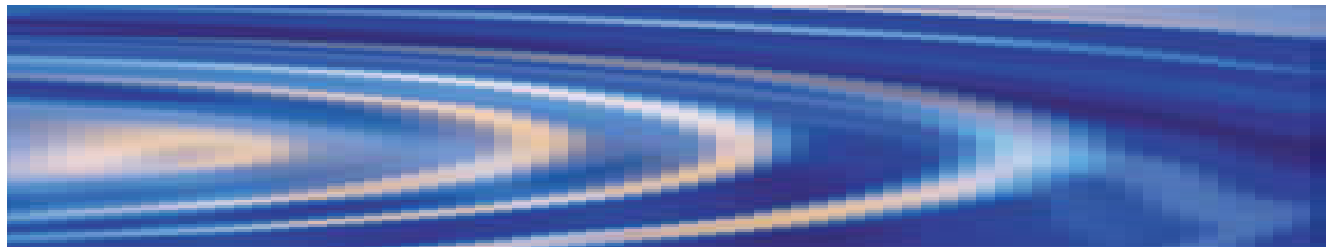
SMS with
Priorities for action



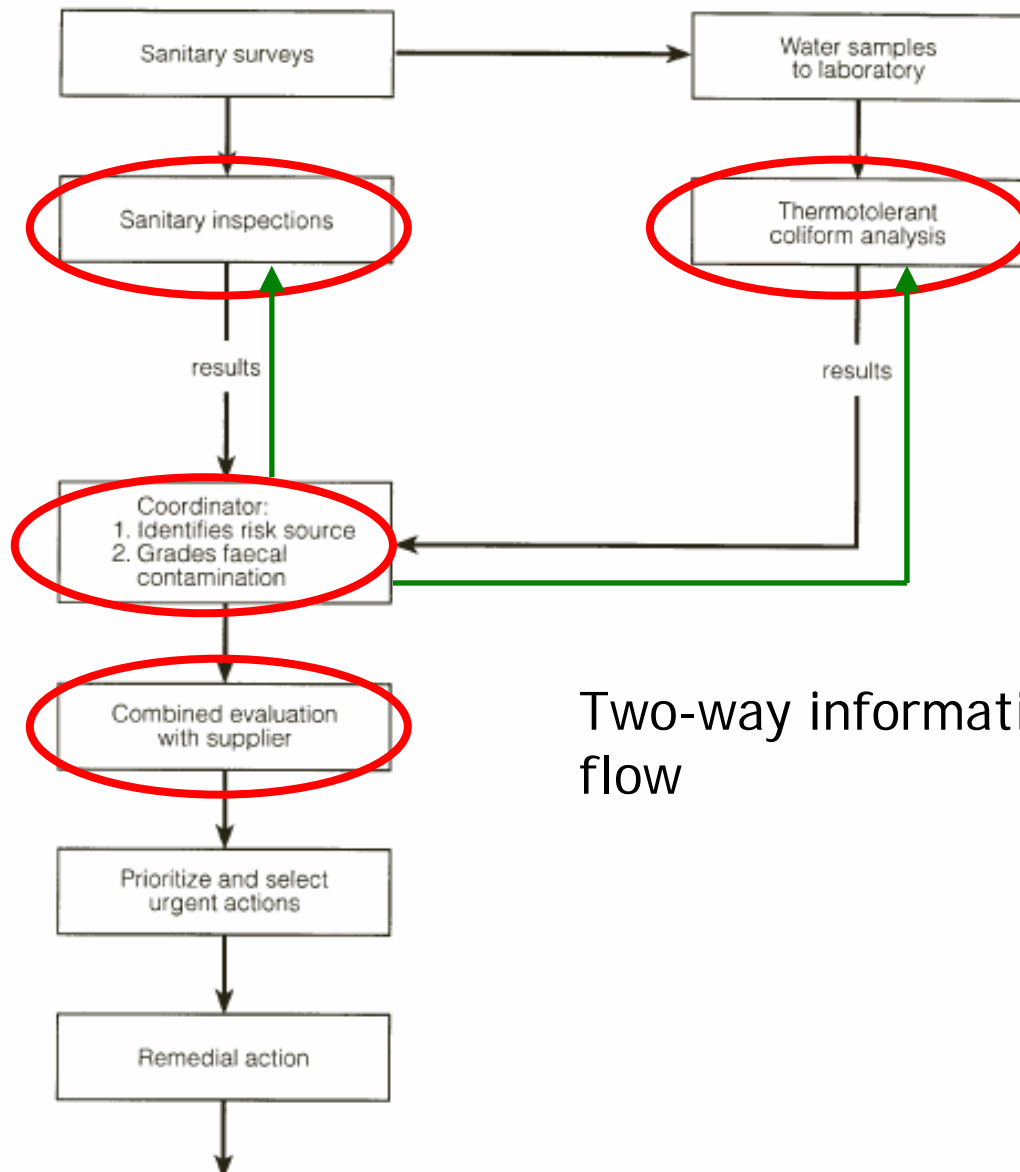
Co-ordinator



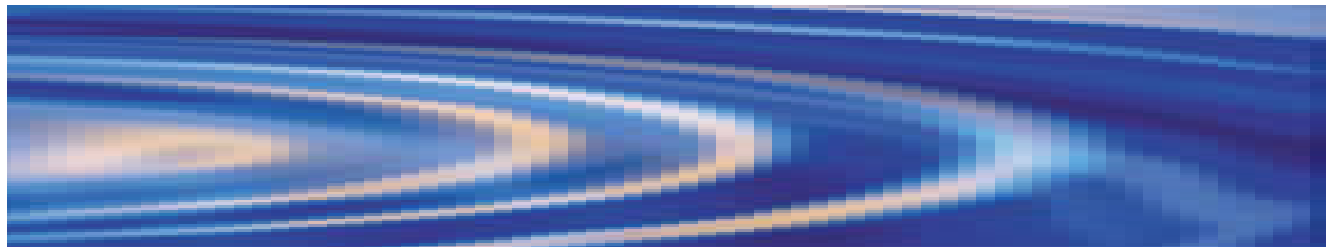
SMS with
sample details /
result



Communication part
of information system



Two-way information
flow



Challenges

- feasible for a subset of uses and areas
- Planning, testing and development
- Technology alone not a solution
- Sustainability
- Integration with Water Safety Plans

