Climate ≈water

Bridging the gap between adaptation strategies of climate change impacts and European water policies





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Contributing partners VITUKI, the co-ordinator, Hungary (G. Jolankai) **University of Debrecen, Hungary CNR IRSA**, Italy **University of Osnabruck, Germany** GeoEcoMar, Rumania **GEONARDO**, Hungary **University of Vienna, Austria University of Leicester, United Kingdom** SHMU, Slovak Hydrometeorological Institute **SOGREAH, France** Malta Resources Authority, Malta



Conclusions by the Co-ordinator: major policy gaps and and strategies to bridge them



All participants of the Project identified gaps in the research field they work on. This got along with advices for much increased monitoring and field measurement.

Another rather commonly identified gap of the existing water related policies was that if they deal (at all), with policy changes due to the changing climate, they rather stay on generalisation level. Some of the major documents of international organisations and larger projects aimed directly on adapatation to climate change also do not give concrete advices. (Guidance Document No 24 is kind of exception)

A major gap is that neither of the offered strategies and measures consider the ever growing extremes (of precipitation:- <u>thus the</u> <u>extremes of flood and drought!</u>). The reason is that the process of birth of the strategies and measures for adaptation is slower than the the changes in the Climate, which was much faster than predicted 3 years ago wen we started the project



Conclusions by the Co-ordinator: major policy gaps and and strategies to bridge them, (ctd1)



Evidently, the Water Framework Directive got the most criticism, along with the many related directives.

The major objection against it is, that it did not consider nonpoint pollution which grew to extreme health risk upon the changes of the climate. (bursting sewers, flood flushed cadavers and waste heaps (like that of dangerous chemicals, etc) Another major criticisms were aimed at RBMP, the major tool for implementing WFD. Generally it lags behind the rapid changes of the climate (although Guidance Document No 24, tries to help a lot), and do not consider the (model based) verifiable planning for water quality and ecological changes.

The most disturbing problem with modeling (planning and forecasting) is that no working accidental emergency warning models are available in the lack of continuous updating of the data base and calibration and vertification of the water quality, ecological and hydrological sub-models of them (it can be proven by the false or rather no forecasts of cyanide and red-slurry propagation)



Conclusions by the Co-ordinator: major policy gaps and and strategies to bridge them, (ctd2)



- The adaptation strategies to bridge the gaps can be divided to the following groups:
- The strategies of policy- and decision-makers (of state and EU administration), that is Water Management. An important part is to create new international legislation that will ensure;- the giving water to downstream, backholding water when too much, and paying for the pollution caused (PPP) .(e.g. no small letter ammendments for escaping obligations)
- The learning or expanding of knowledge base of the population and of all stakeholders, so as to adapt to the climate change created situation.

- The third group, the most important one for an Environmental-Water Engineer is to design and implement the startegies and measures of adaptation, based on many field measurements: and this is what we call Ecohydrology and this is what we practiced in a number of EU projects and former TAS, PHARE etc projects