

# Results: New Relationships (Theme 3) Workshop 1: Understanding human-freshwater relationships

- **How can the research/new knowledge be applied to the development of the post2020 EU biodiversity strategy?**
- Most discussed talk by Ivan Jaric explored the emerging field of *conservation culturomics* (Ladle et al 2016 FEE) which provides powerful tools to answer basic ecological questions and improve biodiversity monitoring in all kinds of ecosystems and will also allow a much better and deeper understanding of human interactions with nature.
- Ecological issues and ecosystem services can (and should?) be treated as stakeholder analogues to gain leverage in conflicts (talk by Charles van Rees)
- **Recommendations regarding the draft key messages?**
- KM 17→ freshwaters have to be seen as embedded in the landscape; to address biodiversity and underlying ecosystem services the post2020 EU strategy should also aim integration and synergies with the Water Framework Directive (WFD) an existing tool for addressing biodiversity related issues in freshwater and wetland habitats
- **What are the knowledge gaps and urgent research questions for the post 2020 period?**
- long term data is critically needed, particularly in freshwater ecosystems; current funding schemes not suited to address this;
- better understanding of various human drivers (interest, knowledge, value, relationships, procedure according to social-ecological conflict analysis; talk by Thomas Fickel)
- **Lessons learnt.**
- freshwaters are not isolated, rather connected in multiple ways to surrounding terrestrial and marine environments yet still they are special as they are mostly seen in the light of water security and less so in the light of biodiversity and ecosystem issues
- **Positive notes from the conference for the post 2020 period.**
- many new emerging technologies will improve data availability, culturomics is only one of them, connection/integration with other methods (e.g. eDNA, satellite imagery, citizen science etc) has huge potential for the future