



# State-of-play in the EU initiative to promote water reuse

**R3Water Final Conference**  
**30<sup>th</sup> May 2017**

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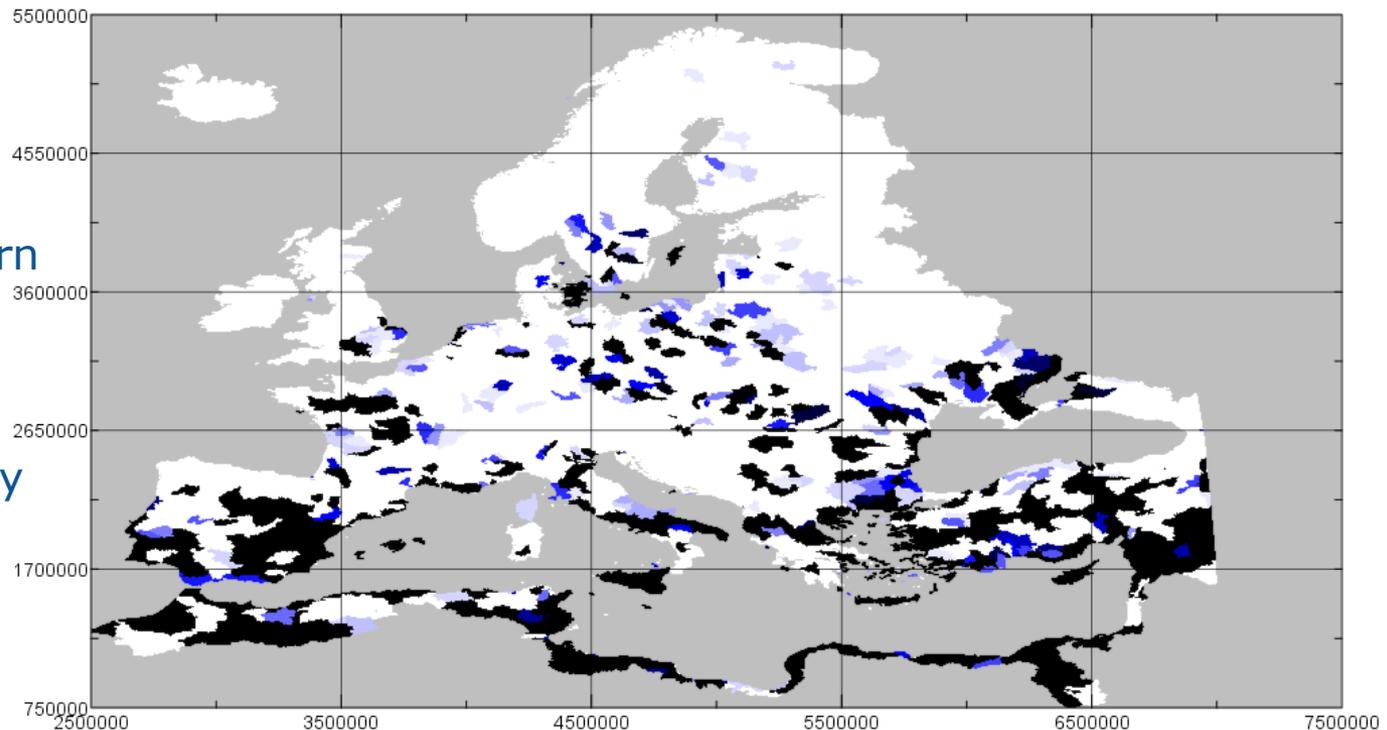
*EU initiative on Water Reuse*

# **POLICY BACKGROUND**

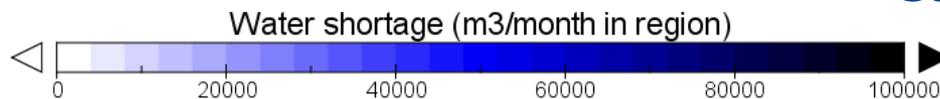
# Water scarcity and droughts

- ❑ Water stress affects **1/3 of the EU territory** all year round
- ❑ No longer an issue confined to southern Europe
- ❑ **Climate change** increases frequency and intensity of droughts
- ❑ Cost of water shortages 1976-2006 **100 billion €**

Water scarcity under 2 degree global temperature increase



Source JRC,  
2016

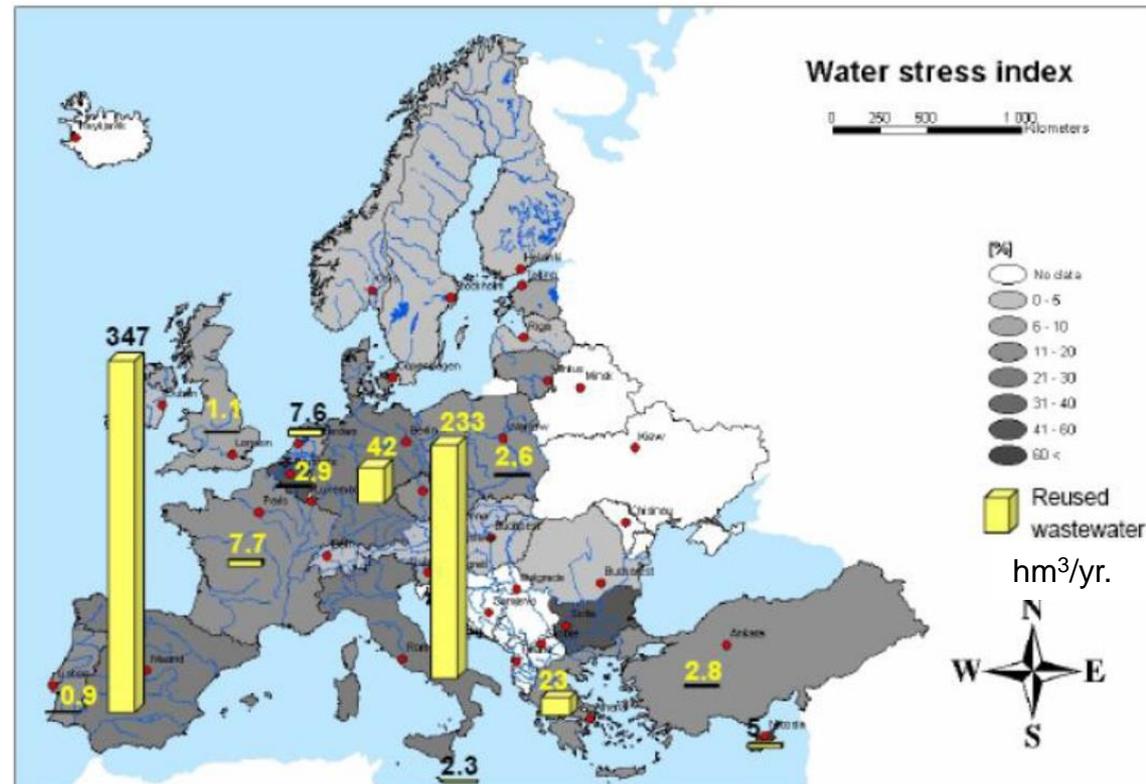


## An untapped potential for water reuse in the EU

- ❑ Reused wastewater in Europe: **1 billion m<sup>3</sup>/year** in 2006 =
  - 2.4% of the total volume of treated effluents (5-12% in Greece, Italy and Spain)
  - ~ 0.4% of annual EU freshwater withdrawals

- ❑ Achievable potential.  
→ **6 billion m<sup>3</sup>/year**  
by 2025
- ❑ A strategic option beneficial  
to both the environment  
and economy

→ Towards a more  
Circular Economy



## Identified barriers

- ✓ Insufficient integration in the broader management of water resources
- ✓ Reuse more complicated, more costly, and perceived as more risky than use of conventional water resources
- ✓ Potential trade barriers for agricultural products in the EU internal market

To be addressed at EU level:

- Insufficient implementation of EU water policies
- Lack of a common approach to risks and of an harmonised legal framework

# Water reuse in Circular Economy

- **EC Communication: "Closing the loop – An EU action plan for the Circular Economy"** (December 2015):
  - **Chapter 4. From waste to resources: boosting the market for secondary raw materials and water reuse**
  - List of follow-up initiatives (Annex):
    - 1. Reuse in integrated water planning and management**  
→ CIS Guidance
    - 2. Minimum quality requirements for water reuse for irrigation & GW recharge** → legislative proposal
    - 3. Water reuse in industrial activities** → BREFs
    - 4. Support to research and innovation**
    - 5. EU funds for investments in water reuse**

*EU initiative on Water Reuse*

# **PROGRESS & NEXT STEPS**

# 1. Reuse in integrated water planning and management

Development of the **CIS Guidelines on Integrating Water Reuse into Water Planning and Management in the context of the Water Framework Directive.**

- Promote a common understanding of reuse in EU water legislation (e.g. WFD, UWWTD, ND) and good practice.
- Based on experience in MS and third countries.
- Endorsed by MS water directors in June 2016.

## Structure of the CIS guidelines

- Explains policy background – how reuse can help **contribute to WFD objectives**, but in the context of the **water hierarchy**
- Sources/uses; **benefits and potential problems**
- Explains the importance of **meeting other EU env/water law** especially UWWTD, ND
- Importance of **quality standards** is stressed, including following legal requirements (e.g. MS law). The stress is on ensuring the right quality for the specific use, use of risk assessments, monitoring of quality, etc.
- The **steps in planning** are explored, including **interactions with RBMPs** (and other planning processes)
- **Public and other stakeholder interaction** is explored
- The final chapter considers **funding** of reuse schemes

## 2- Minimum quality requirements for water reuse in irrigation and aquifer recharge

Address the **lack** of a common **approach to risks** and of an harmonised **legal framework** in MS

= significant **barrier** to further uptake

Focus on **2 uses** of most relevance at EU level

- Alleviate **water scarcity** and increase **nutrients recycling**
- Ensure a high level of **health** and **environmental** protection
- Provide **public confidence** in reuse practices
- Provide clarity, coherence and predictability for **investments**

## 2- Minimum quality requirements for water reuse in irrigation and aquifer recharge

### Ongoing preparation of the legislation proposal:

- ✓ Technical proposal by the Joint Research Center – draft report Dec. 2016
  - ✓ Public consultation – report published
  - ✓ Consultation of experts in MS and other stakeholders
    - WFD CIS Ad-hoc task group
  - ✓ Consultation of EFSA (European Food Safety Agency) and SCHEER (Scientific Committee on Health, Environmental and Emerging Risks)
  - ✓ Impact Assessment
- Discussion in the CIS Ad-hoc task group on 23<sup>rd</sup> June
- Finalisation of the Impact assessment in summer (incl. impacts on R&I)
- Commission proposal to be tabled in 2<sup>nd</sup> semester 2017

## 2- Minimum quality requirements for water reuse in irrigation and aquifer recharge

Draft technical proposal by the Joint Research Center for **irrigation**:  
(NB: work in progress!)

- Based on existing guidelines and regulations, adapted to EU context
- Fit-for-purpose approach - requirements differentiated against:
  - *Crop categories*
  - *Irrigation methods*
- Quality parameters (E.Coli, BOD, TSS, turbidity), associated limits and monitoring requirements + additional performance requirements for the highest quality class
- Additional (site-specific) risk assessment and preventive measures



**Thank you  
for your attention**

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## **Access to documents**

*Dedicated EC Internet page:*

*<http://ec.europa.eu/environment/water/reuse.htm>*