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What role can Economic Policy Instruments play in building a water secure future for the OSCE



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Water challenges are driven by nature

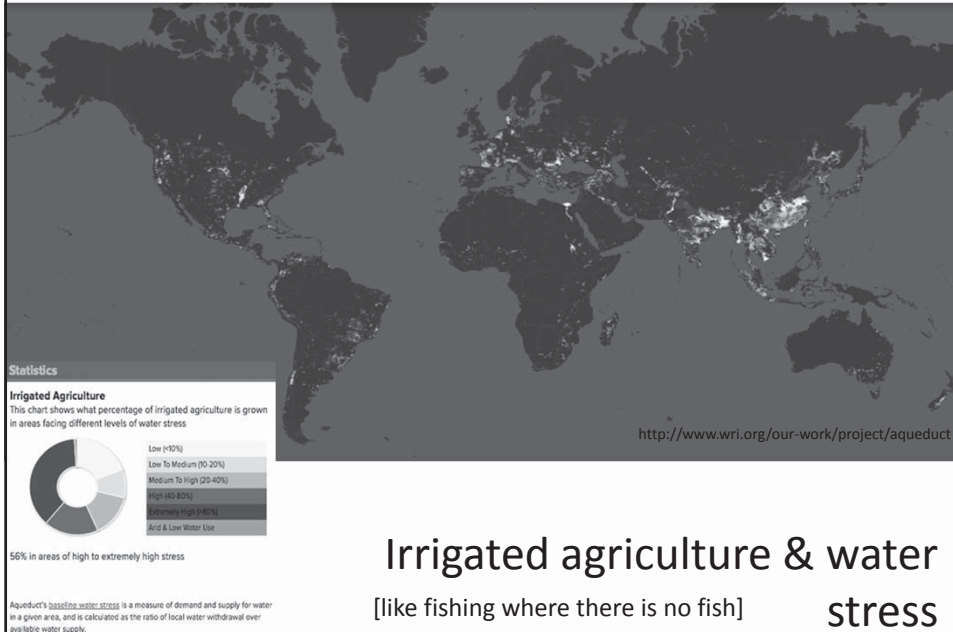


Low stress ■
Medium stress ■
High stress ■
Extreme stress ■
No Data ■

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..... but not that much...

By the economic incentives in place...



But they are after all governance failures

Why?

In essence water institutions have failed in aligning the many private decisions regarding water use and conservation with the overall social objective of preserving water resources, building water security and promoting durable economic development

(Olsen, 1976; Ostrom, 1998, Hanemann, 2005)

But water challenges are, after all...

...governance issues

Managing water · Managing conflicts

- › Flows of services vs. conservation of water assets
- › Private and public goods from water ecosystems
- › Economic growth vs. water conservation for sustained progress
- › Externalities – the interconnected nature of the hydrological cycle
- › Water security and uncertainty about future supplies – extreme precautionary options as a policy attitude
- › High fixed cost of water infrastructures vs. effective and efficient cost-sharing schemes

(Hanemann, 2005; Marshall, 2013; Libecap, 2011, Olson, 1965)

What to do? A secure water future is possible

Still significant untapped opportunities to build a water secure future...

1. Bridge the efficiency gap.
2. Build Green infrastructures natural processes.
3. Make the best of waste for the circular economy.
4. Reallocate water to its more productive uses.
5. Make Non-conventional sources (reuse, recycle, desalinisation.,) available
6. Take advantage of synergies between flood and drought management
7. Exploit synergies in the water-energy-food-climate change adapt. nexus

.....but there are huge implementation challenges ahead

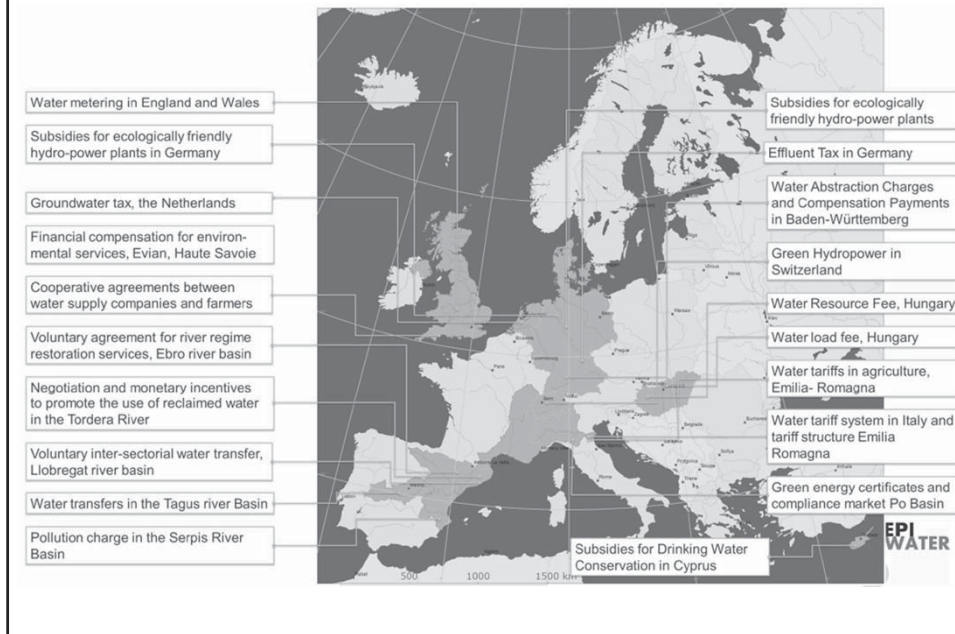
Economic instruments: much more than water finance

1. Means to an end: water security a new kind water policy rewired for the long term.
2. Adapt to an increasingly uncertain future.
3. Enhance water efficiency (in water use and water allocation)
4. Make cooperation agreements self-enforceable (by a transparent distribution of gains and losses)
5. Manage conflicts and trade-offs. Taking advantage of synergies and avoiding solving one problem by worsening others (e.g. low energy prices as drivers of water scarcity, energy-water nexus, food and climate change adaptation...)
6. Respond to current risks by improving adaptability and reducing future exposure (not really happening today with droughts and floods)
7.

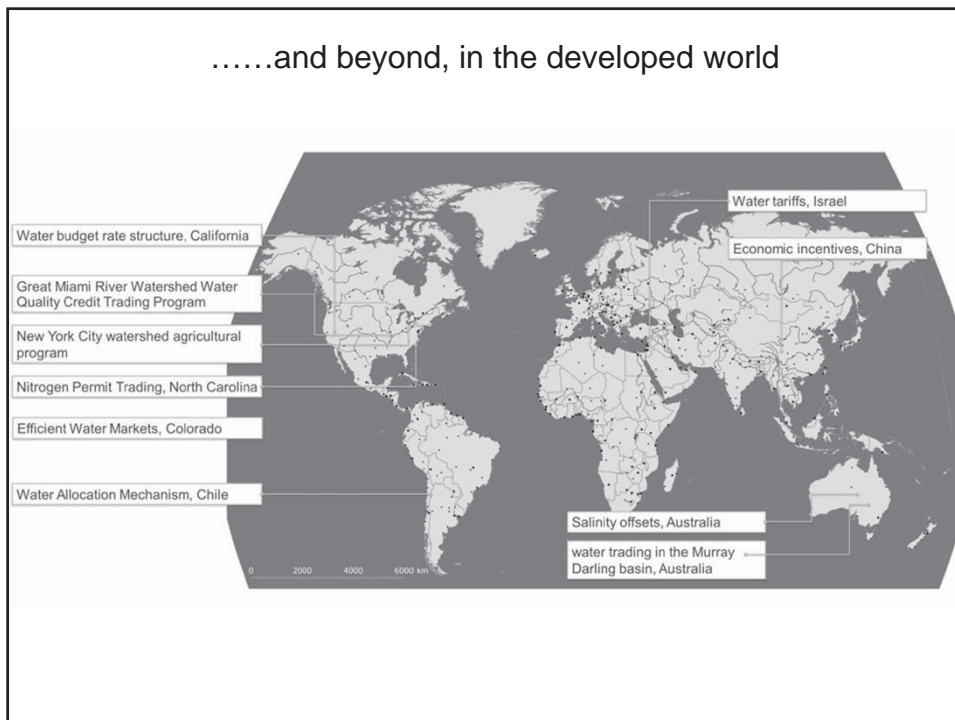
Many alternatives available.....

	Instrument	Definition	What can the EPI deliver for water policy?
Pricing	Tariffs	Price to be paid for a given quantity of water or sanitation service, either by households, irrigators, retailers, industries, or other users.	Encouraging technological improvements or changes in behaviour leading to a reduction in water consumption or in the discharge of pollutants. In addition, they generate revenues for water services or infrastructures.
	Taxes	Compulsory payment to the fiscal authority for a behaviour that leads to the degradation of the water environment.	Encouraging alternative behaviour to the one targeted by the tax, for example the use of less-polluting techniques and products.
	Charges (or fees)	Compulsory payment to the competent body (environmental or water services regulator) for a service directly or indirectly associated with the degradation of the water environment.	Discouraging the use of a service. For example, using charges in a licensing scheme may discourage users to apply for a permit.
	Subsidies on products	Payments from government bodies to producers with the objective of influencing their levels of production, their prices or other factors.	Leading to a reduction in the price of more water-friendly products, resulting in a competitive advantage with comparable products.
	Subsidies on practices	Payments from government bodies to producers to encourage the adoption of specific production processes.	Leading to the adoption of production methods that limit negative impacts, or produce positive impacts, on the water environment.
Trading	Trading of permits for using water	The exchange of rights or entitlements to consume, abstract and discharge water.	Encouraging the adoption of more water efficient technologies. May improve the allocation of water amongst water users.
	Trading of permits for polluting water	The exchange of rights or entitlements to pollute the water environment through the discharge of pollutants or wastewater.	Encouraging the adoption of less water polluting technologies. Improve the allocation of abatement costs amongst water users
Cooperation		Negotiated voluntary arrangement between parties to adopt agreed practices often linked to subsidies or offset schemes.	Encouraging the adoption of more water-friendly practices.
Risk mgmt. schemes	Insurance	Payment of a premium in order to be protected in the event of a loss.	Water users' aversion to risk and willingness to pay for income stabilisation. When properly designed, insurance premiums signal risk and discourage behaviours that increase risk or exposure
	Liability	Offsetting schemes where liability for environmental degradation leads to payments of compensation for environmental damage.	Liability as a means to incentivise long-term investments in water efficient devices.

Still few real economic instruments in place in the EU.....



.....and beyond, in the developed world



Some take away messages from current implementation of innovative economic policy instruments

Regarding transparency and accountability in the implementation of Economic Instruments as a contribution to water governance and smart regulation

- ✓ **Economic instruments are not panaceas** nor one size fits all but adaptable solutions to current water challenges.
- ✓ **Economic instruments do not work in isolation:** but in policy mixes able to deliver water and all other water related policy objectives.
- ✓ **Water objectives are polyhedral:** and economic instruments are not silver bullets. One goal, one instrument can make a sensible approach
- ✓ **The importance of the institutional set-up** economic instruments can not perform better than the institutional set up in place, but are powerful means to gradually improve water governance.

