

# Water and the WTO: Don't kill the messenger

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**Accounting for water scarcity**  
Amsterdam  
November 25, 2010

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## Water, trade and trade barriers

- Water: a tradable good much taxed at the border.

	Applied tariffs (%)			Bound tariffs (%)		
	Developed countries	Developing and LDCs	All countries	Developed countries	Developing and LDCs	All countries
Fishery	2.2	15.1	14.2	2.5	34.2	31.4
Forestry	0.6	6.5	6.1	1.2	28.9	26.5
Fuels	0.5	6.2	5.8	1.5	27.5	25.3
Mining	0.8	6.0	5.7	1.6	30.9	28.6
All merchandise imports	5.4	10.7	10.3	[c]	[c]	[c]
Virtual water: animal [a]	2.8	10.5	6.7	22.3	58.1	40.2
<i>water requirements [b]</i>	6726	10066	8396	6726	10066	8396
Virtual water: crops [a]	5.6	13.8	9.7	28.6	58.9	43.8
<i>water requirements [b]</i>	3319	5753	4536	3319	5753	4536

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## Three starting points

- Water and trade: A common problem: free rider
- Trade is the (mere) difference between consumption and production
  - Import is the excess of domestic production over domestic production
  - Export, the converse.
- Imports capture gains from trade whereas exports mirror the costs of trade

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## Comparative advantages

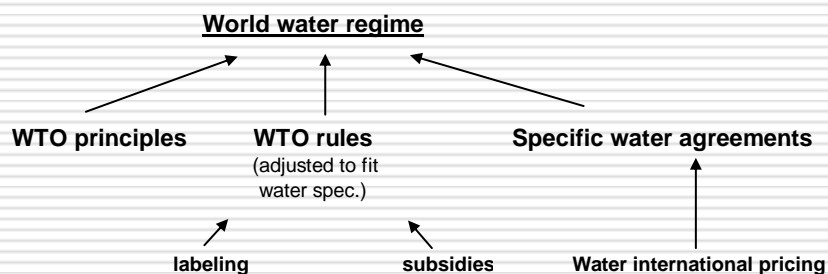
- Efficiency provided by open trade is best captured by theories of comparative advantages: Ricardo Vs. Heckscher-Ohlin

	(1) Renewable Water*	(2) Uncategorized Labor**	(3) Arable Land**	<i>Heckscher-Ohlin approach</i>		<i>Ricardian approach</i>
				(4) Water per Workers	(5) Water per Ha of arable land	(6) Wheat productivity relative to France***
Brazil	8,233	77	58	106	142	1.8
Canada	2,902	16	46	183	63	1.7
China	2,830	737	133	3.8	21	0.7
Egypt	87	19	3	5	29	2
France	204	26	18	8	11	1
India	1,908	402	163	5	12	1.9
Israel	2	2	0.3	1	7	3.7
Japan	430	68	4	6	108	0.8
Mexico	457	34	25	13	18	1.2
United States	2,071	141	175	15	12	0.9

Notes: \* International Labor Organization of the United Nations.  
 \*\* Food and Agriculture organization of the United Nations  
 \*\*\* Ratio of each country water requirement for wheat production to the one of France.

## Building a world water regime

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## The WTO: two robust pillars

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### The key problem:

- A world price for water?
- Or a regime ensuring the convergence towards a world price?

### External vs. internal sovereignty:

- Common foes: some farmers.

### The two WTO principles:

- Most-favored nation: non-discrimination among countries.
- National treatment: non-discrimination among domestic and foreign goods, once tariffs are paid.

## WTO rules and likeness

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- Like-product, water labeling
  - Likeness in the usual trade regime
  - The need to take into account water footprint of farm products
- Balance between exhaustiveness & similarity
  - water labeling
- WTO conditions
  - Non-discrimination
  - Role of scientific basis (approach a la Agreement on Sanitary & Phyto-sanitary Measures ).

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## WTO rules and domestic policies

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- Subsidies
  - Bad subsidies: useful WTO rules on banning subsidies, but “cure” to be improved.
  - Good subsidies: better rules necessary (room to be made for such subsidies).
- Export bans and taxes
  - Export bans=subsidies to domestic consumers.
  - Export taxes: better rules needed.

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## WTO rules and domestic markets

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- Ceiling on water footprint
  - Water quotas or water-pricing?
  - The missing/distorted domestic water markets: Property rights (fisheries in Iceland).
  - An international water pricing agreement: no problem for the WTO.
  - The role of the Development Banks (World Bank, Asian Development Bank, etc.) in generating such an agreement.

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## Thank You for Your Attention

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## From trade theories to water realities

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- HO expect factors to move freely within countries and to be immobile between countries
    - This is inconsistent with what we know about water: water is shared at the basin scale which gather several countries.
  - Geographical and institutional characteristics of trading partners
  - Distortive trade policies
  - The pricing mechanism of the water sector:
    - Often inexistent or highly distorted
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