## 'Drinking Water' and Water-drinking



Is there a problem with drinking bottled water? Would it be appropriate to ask people to stop drinking tea or coffee, or soft drinks, because these have a higher carbon footprint than tap water? Is the only way to drink water straight from the tap? In the UK a social practice of drinking bottled water has become widespread during the last three decades. Should that practice be abandoned for reasons of sustainability? The historical and comparative research of this project challenges the taken-for-granted assumption that drinking bottled water should be understood as an environmental problem.



Most people in the UK drink as much tap water in tea or coffee as they drink 'neat'



In Taiwan, much more water is consumed as bottled tea than bottled water



A drive-in water vending station in Kaoshiung, Taiwan

## Insights

- In Europe, there are huge differences in the practices of drinking water. In the UK, it is the richest 10% that drink the most bottled water, and most people drink as much tap water in tea or coffee as they drink 'neat'.
- Italians drink five times more bottled water per capita than the British, partly because of natural contamination and concerns over tap water. Most of this is 'still' water.
- By contrast Germans, also heavy consumers, overwhelmingly drink sparkling, highly mineralised bottled water, despite having readily accessible high quality tap water.
- In Delhi, there is a sharp divide between rich and poor: the rich drink bottled water because tap water is not safe; the poor can only afford to consume unsafe water.
- In Taiwan, they drink bottled tea far more than bottled water and, although relatively safe, they commonly filter and boil tap water before consuming it.
- Sustainability issues surrounding practices of water drinking are varied and complex, and cannot be reduced to a simple opposition between tap and bottled water. Bottled water is as much a different drink from tap water as is tea or Coca-Cola.

## Significance

- Water is an excellent lens through which to understand the complex interactions between economies, politics, social practices and natural environments. Our research has developed the concept of 'emergent sustainability crises' to understand these different dynamics of drinking water consumption in different contexts.
- Sustainability crises emerge in different ways in different places. The emergence of the all-purpose tap water we use in the UK today took over 150 years to become universal in most European countries. In Europe, historically, water borne diseases, notably cholera and typhoid, resulted in major sustainability crises, and stimulated huge state investments and structural innovations. In Mexico City or in Beijing, water scarcity has intensified to crisis point as a consequence of rapid urbanisation and the growth of mega-cities. In these locations water scarcity is not a natural but a social phenomenon principally produced by migration. In the mega-city of Delhi, sustainability crises related to contamination and scarcity are combined in a context of very unequal rights to different water resources, with scarcity for some, and abundance for others. In Mexico City, 2,000 metres above sea level and without close access to large river resources, the carbon footprint of pumped tap water has grown with the expanding population. And Mexico City similarly has major social division between the rights of rich and poor to drinkable water.
- Because drinkable water is an essential good (but only recently a UN human right), water has had an intensely political history in all our case studies. If there is a universal right to drinking water then is water at some level a 'natural' public good, which states are obliged to provide? There have been battles over the price of water, its public or private provision, over who has rights to extract groundwater, or to river water, and so on. At the other end of the spectrum from water as a public good we find bottled water—and water bottled in soft drinks. While such 'market goods' appear subject to pure market relations they also rely on water extracted from the groundwater 'commons' and are subject to various regulatory regimes. While water may often be an 'uncooperative commodity', establishing social, collective and public rights over water resources may be equally fraught. Drinking water, in any form, cannot be understood only through consumer preferences expressed within markets.

## Implications for Policy and Practice

- Policy must adapt to the particular forms of sustainability challenges of drinking water as they emerge in the environmental contexts of different societies.
- Strategies to support sustainability of drinking water must apply coherently across all forms of drinking water consumption (including tea, coffee, soft drinks and so on), not just singling out bottled water. Bottled water is no more a simple substitute for tapwater than Coca-Cola, with its much higher carbon footprint. It makes no sense to stigmatise bottled water.
- In many societies, providing equal rights to basic potable water remains an overriding policy objective, which may include delivery by various means and not only piped infrastructures.
- Sustainability policy requires the development of integrated and coherent forms of the 'water commons', whether to control pollution or to construct rights to exploitation and extraction of water resources, whether beneath the ground or on the surface.





