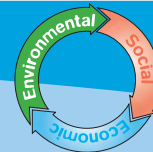




Water



Water is a fundamental and finite resource, vital to support life on this planet. The assurance of a plentiful supply of clean, easily accessible water was raised at this year's Johannesburg Earth Summit as one of the major issues impeding the achievement of the goal of sustainable development. As well as being an issue that we associate with developing countries, monitoring the usage and promoting the conservation of water resources has become a major concern in the modern urban environment.

INDICATOR WR1 - Water Consumption

The average volume of water pumped into supply during the year 2001/2 totalled 870 million litres per day compared with 829 million litres per day for 2000/1. The recorded increase in supply was caused by a combination of population growth, and a general

increase in domestic consumption lead by improved summer weather conditions. Three Valleys Water also recorded an increase in leakage breakout levels last winter. This was associated with a cold spell of weather in early January 2002.

The average household per capita consumption of water in Hertfordshire is currently increasing above the national average. The figure for 2001/2 of 181 litres per head per day compared to last year's 175 litres per head per day represents an overall increase of 3%, leading to an increase of some 17 million litres per day in volumetric terms. The peak demand for the year occurred around the end of July. Although average demand for the year increased compared with the previous year's peak week demand, it remained lower than historically recorded levels. For the ninth consecutive year customers have not experienced any water use restrictions.

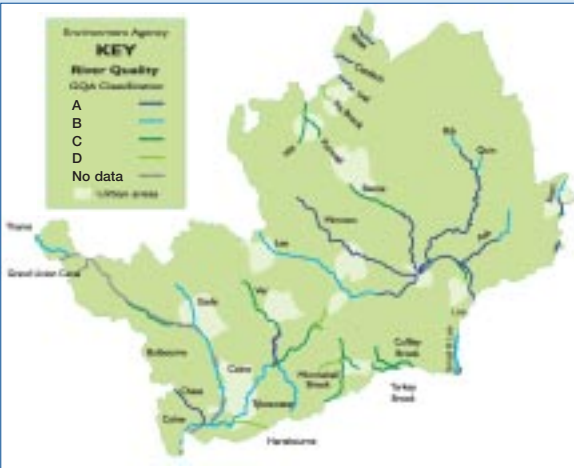


Water



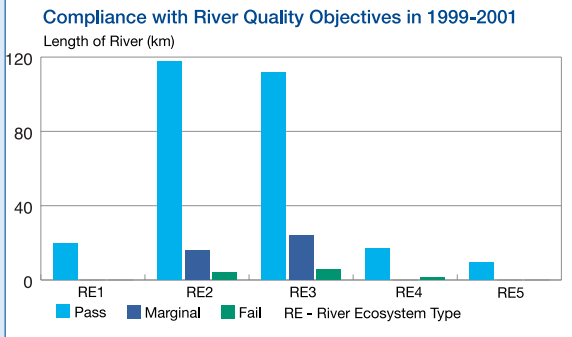
INDICATOR WR2 - River Quality

The Environment Agency (www.environment-agency.gov.uk) assesses the quality of rivers using four aspects of river quality – biology, chemistry, nutrients and aesthetic quality. This General Quality Assessment (GQA) system grades between A – very good and F – bad.

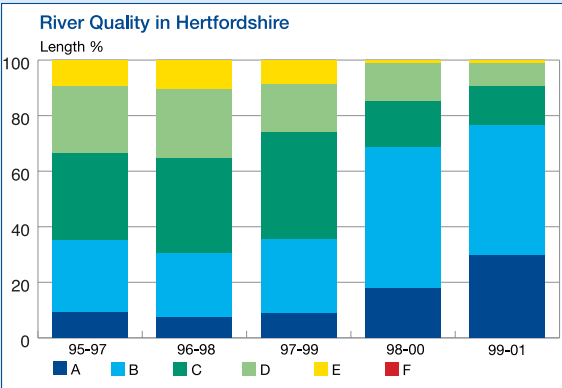


INDICATOR WR3 - River Quality Objectives

River reaches that are monitored for their water quality also have River Quality Objectives (RQOs). The RQO scheme is based on the recognised uses of a river. At present, objectives are only based on the river ecosystem (RE). These address the chemical quality requirements of all types of aquatic ecosystems as outlined here: Class RE1/RE2 - water of very good/good quality suitable for all fish species; Class RE3/RE4 – water of fair quality suitable for all/for coarse fish species; Class RE5 – water of poor quality which is likely to limit coarse fish populations.



The trend for improvement continued with only 3.5% of river length in Hertfordshire failing to achieve its RQO in 2001. The majority of these failures in Hertfordshire occur on stretches of the Grand Union Canal. The slow-running nature of canals can increase water quality problems. A turbulent, fast flowing river will mix pollutants quickly and absorb oxygen from the water surface which helps breakdown organic material. This 'self-purification' is not as rapid in sluggish canals. Also, if nutrient levels are high, these conditions can be ideal for encouraging the growth of algae, potentially leading to severe oxygen depletion in the water at night.



The latest results for river quality in Hertfordshire have been added, the years are shown as 99-01, for example, because the results are averaged over three years. This graph shows that river quality in Hertfordshire continues to improve, with 76.4% of river length in Hertfordshire now achieving 'very good' or 'good' quality, compared to the England and Wales average of 69%. With a further 22.6% achieving 'fairly good' or 'fair'.