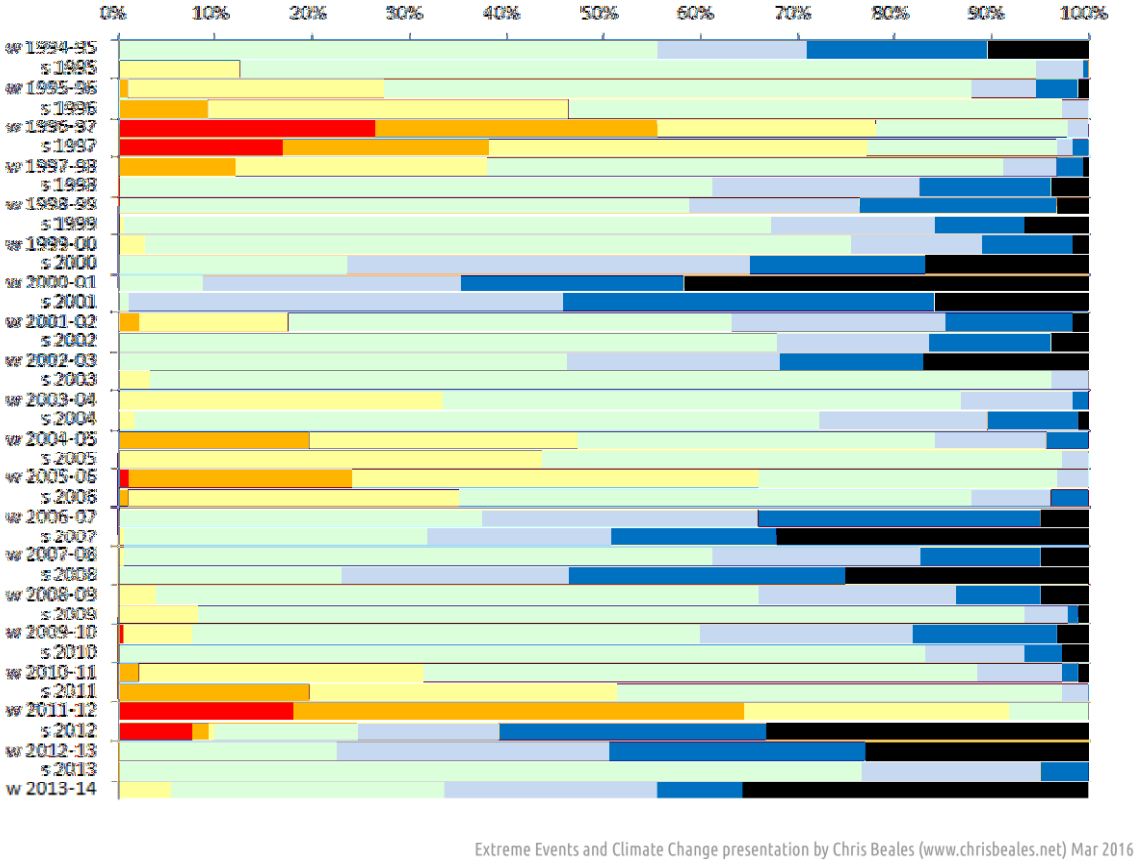
Flow in the River Thames

A series of depressions can lead to flooding in river basins. The figure below shows the flow of water in the River Thames at Kingston, near London. From top to bottom, each bar alternates between the Winter (October-March) and Summer (April-September) seasons for each year.

The graph in the Figure below shows the percentage of each season that the flows were in each band, ranging from ‘exceptionally low’ (red), through ‘notably low’, ‘below normal’, ‘normal’ (green), ‘above normal’ (pale blue), ‘notably high’ and ‘exceptionally high’ (black).

In a ‘statistically average’ year: 5% of the bar would be red, 44% would be green, and 5% would be black.

The last 20 years were 4% wetter than 1883-2003 long term average for the Thames catchment. Flows at Kingston reflect this, as you can see from the chart, they were 2-3% more often in the exceptionally and notably high bands (black & blue). Hence flood issues have been more dominant than drought in this period. In particular, right at the bottom of the chart, you can see the winter of 2013/14 when the flow rate in the Thames was exceptionally high for almost 40% of the season.



Extreme Events and Climate Change presentation by Chris Beales (www.chrisbeales.net) Mar 2016

River flow in the Thames from Winter 1994/95 to winter 2013/ 14 © Chris Beales
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