



Met Office

Met Office 3-month Outlook

Period: September – November 2019 Issue date: 22.08.19

The forecast presented here is for September and the average of the September-October-November period for the United Kingdom as a whole. The forecast for September will be superseded by the long-range information on the public weather forecast web page (www.metoffice.gov.uk/public/weather/forecast/#?tab=regionalForecast), starting from 2nd September 2019.

This forecast is based on information from observations, several numerical prediction systems and expert judgement.

SUMMARY – TEMPERATURE:

For September and September-October-November as a whole, above-average temperatures are more likely than below-average temperatures.

Overall, the probability that the UK-average temperature for September-October-November will fall into the coldest of our five categories is around 5% and the probability that it will fall into the warmest of our five categories is around 60% (the 1981-2010 probability for each of these categories is 20%).

CONTEXT:

The El Niño-Southern Oscillation (ENSO) is currently in a neutral phase. Long-range forecast systems show the likelihood of a significant El Niño or La Niña event developing during the outlook period is very small, so it is not expected to have any influence on UK weather patterns.

Sea surface temperatures close to the UK are currently higher than normal. While sea temperatures can change relatively quickly at this time of year, this increases the chances of above-average UK temperatures in September.

For September, long-range forecast systems do not, overall, favour any specific weather pattern. This implies that the chances of a settled or unsettled month are balanced. Despite this, the warming of climate seen over recent decades, and the higher-than-usual sea temperatures, leads to an increased likelihood of warm conditions compared to the 1981-2010 long-term average. The range of likely outcomes is similar to September temperatures seen in the last 10 years (see left-hand graph of figure T2).

For September-October-November, the Met Office long-range forecast system, along with systems from other centres around the world, suggests an increased likelihood of below-average sea level pressure across the North Atlantic and above-average pressure across Europe. This implies a greater-than-usual incidence of warm southerly or south-westerly winds across the UK which, along with the warming of climate, contributes to an increase in the chances of above-average temperatures (see right-hand graph of figure T2). Note that below-average temperatures remain possible, although this outcome is less likely.

The relatively high probability of our warmest category does not imply extreme or unseasonal weather throughout the 3-month period. Indeed, the outlook does not identify weather for a particular day or week. The increased likelihood of this category could mean more days with temperatures that are above average to a more modest degree. Above-average temperatures can also arise from a range of types of weather, not just sunny and dry conditions.

Fig T1

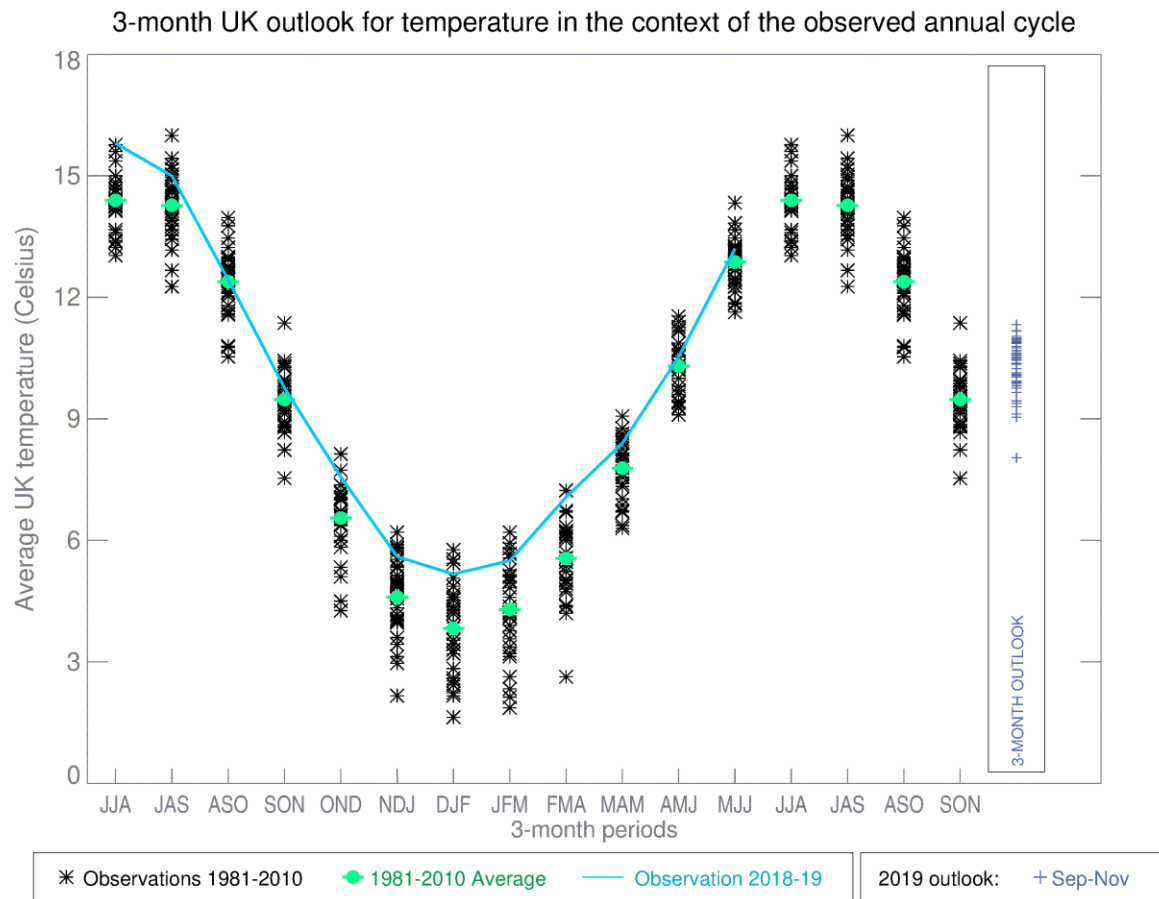


Fig T2

1-month and 3-month UK outlook for temperature in the context of observed climatology

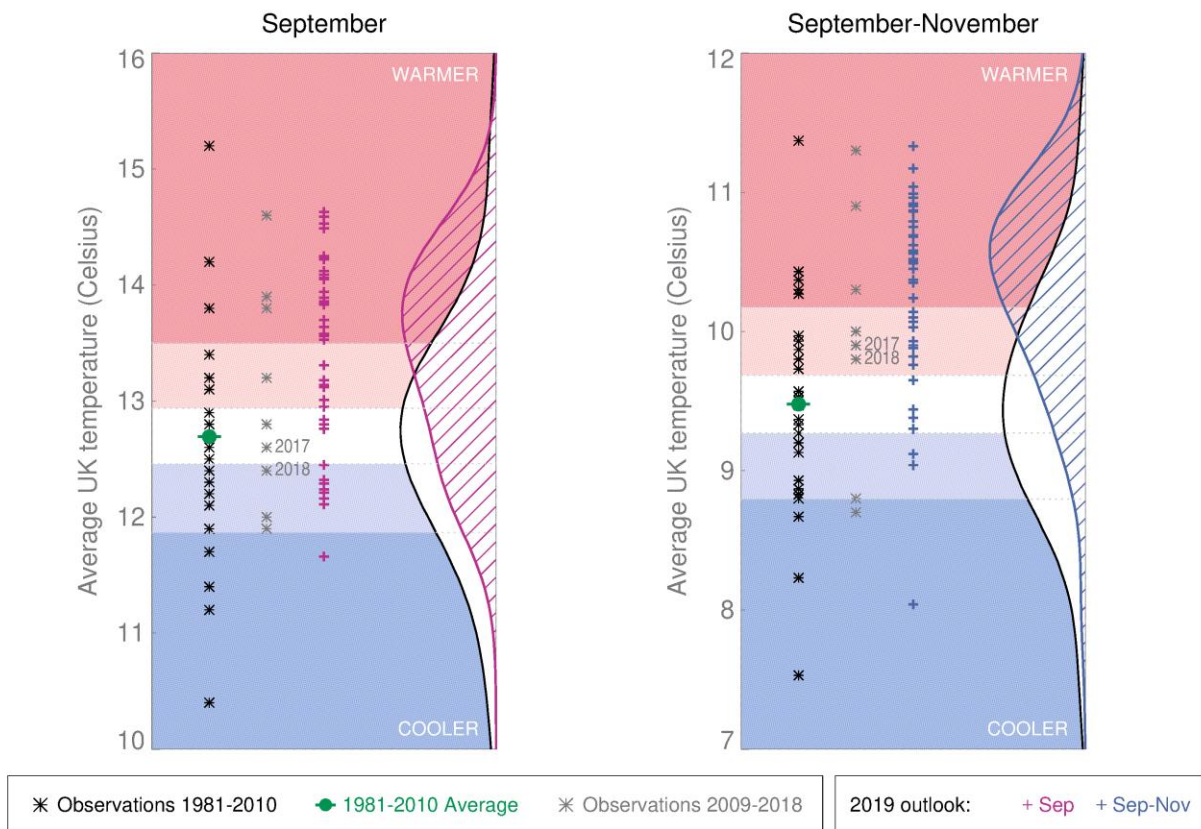
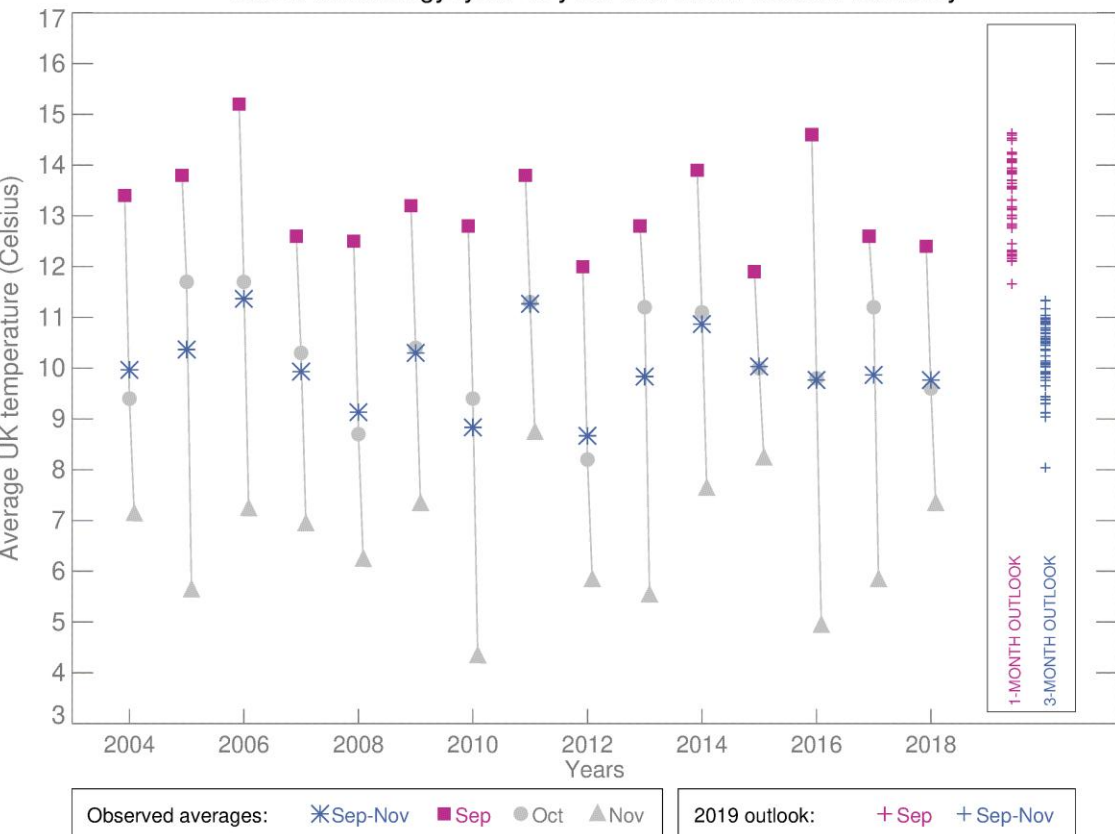


Fig T3

1-month and 3-month UK outlook for temperature in the context of recent climatology: year-to-year and within-season variability



This Outlook provides an indication of possible temperature and rainfall conditions over the next 3 months. It is part of a suite of forecasts designed for contingency planners. The Outlook should not be used in isolation but should be used with shorter-range and more detailed (30-day, 15-day and 1-to-7-day) forecasts and warnings available to the contingency planning community from the Met Office.