

## Post Nexus Demand Response

### Background

Total UIG levels are partly determined by the difference in demand estimation and actual customer demand. The issue can be separated into a problem of levels (determined by the ALP) and the weather response from a seasonal normal (determined by the WCF).

If the weather response from demand estimation differs from its actual (can be measured on aggregate LDZ NDM demands) the result would be a change in Total UIG.

### Measuring Weather Response

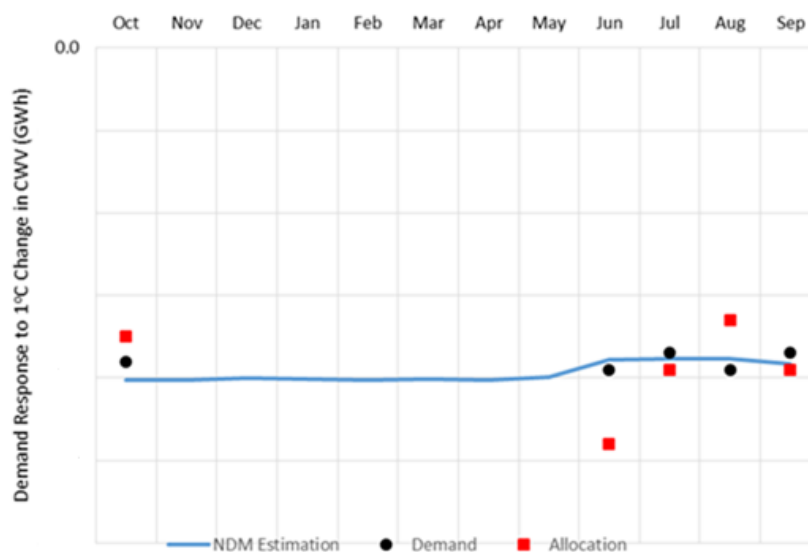
We have determined a method to visualise the weather response determined by 1) Demand Estimation which is compared to 2) actual demand response.

The calculation for 1) is detailed in Post-Nexus Demand Response - for Mod 0631R.docx

The calculation for 2) is measured by performing a simple regression analysis on aggregate NDM demands and CWV for each month.

Here the weather response compares the calculated weather response from NDM Estimation, aggregate NDM Demands and Allocation (Demand + UIG) for a subset of our EUC supplier demands and AQ portfolio.

### Demand Response National (GWh)



*Note: Due to commercial reasons the scale has been removed.*

By comparing the Demand Estimation response with actual response we can visualise where the weather sensitivity of Demand Estimation is insufficient or in excess of actual weather response. We would expect Demand Estimation weather sensitivity to align with Demand and differ more from Allocation, as UIG reflects actual weather sensitivity.

British Gas understands that the weather response from Demand Estimation is at times insufficient and is believed to be the use of “bucket” profiles in EUC categories with WAR bands.

Request - We are able to complete the analysis on Total NDM by substituting our portfolio AQ with total market Aqs. Can total AQ be provided for all 429 EUC bands to repeat the analysis?

We can then determine:

- The scale of difference between weather response from demand estimation and real demands for total NDM.
- The impact of any changes to the composition of EUC WAR bands on the accuracy of weather response.