

Energy Saving Tip of the Month

6. The gas bill

Most plastics processing sites use gas simply for space heating but some processes use gas as part of the process, e.g. rotational molding.

Where gas is used for hot water then this is generally relatively constant over the year. For space heating the gas usage load will be related to the weather conditions (how cold it is) and the weather is then a 'condition' driver for gas usage.

Where gas usage is part of the process then usage will be driven by both the activity (production) and the condition (weather). The two drivers will need to be separated either by sub-metering or by statistical analysis - but sub-metering is preferable.

Action:

- Plot gas usage against time. If it is used for space heating only then you should see peaks in winter and troughs in summer.
- Plot gas usage against the 'heating degree-days' in the month as a scatter chart. 'Heating degree days' is a measure of how cold it is in a specific area. There should be a linear relationship, the Performance Characteristic Line (PCL) for the heating system - if not then find out why.
- Use the PCL to assess heating system performance.
- If gas usage is part of the process then recording meters allow gas usage to be related to production volume via a PCL - as with electricity use (see last month).

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