Energy Efficiency Trends Vol. 25

Essential insight for consumers and suppliers of non-domestic energy efficiency in the U.K.

December 4, 2018





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Introduction Section 1.

Welcome to the latest edition of U.K. Energy Efficiency Trends (Vol. 25, 3Q 2018), the leading source of market insight for the energy efficiency sector.

"Context is everything", once said an American sociologist, and looking back at the second quarter results from earlier in the year, the 3Q results were the first positive set of feedback received for more than 12 months - during which time the market was particularly downbeat.

This is the context for this latest set of results. And as you might imagine, we were keen to see whether the positive and upbeat result from 2Q would be sustained and perhaps point us towards a more buoyant phase. Or, conversely, if the 2Q result was shown to be a blip, and we return to the more pessimistic trend line of the previous 18 months (and a somewhat less than positive outlook).

Fortunately, the results in this edition (Vol. 25) have followed the positive trajectory of 2Q. And while not quite as strong as the previous three months, many of the gains have in most part been sustained, not least the strong U.K. order books reported by suppliers.

This 'mini-trend' is good news for the sector and points to increasing market stability and potential for growth. Clearly, Brexit will have a material influence on the sector's development, but in the absence of a conclusive political outcome, it is difficult to make worthwhile forecasts.

As ever, if you have any questions or comments in relation to the findings, please do get in touch.



Michael Kenefick **BloombergNEF**



Ian Jeffries **EEVS Insight**

Section 2. Executive Summary

The EEVS/Bloomberg *Energy Efficiency Trends* Survey (Vol.25) was completed by 102 U.K.-based respondents (56 consumer organizations and 46 suppliers), between October 9 and November 9, 2018. Their answers relate to the situation in the third quarter of 2018.

2.1. Supplier trends



Figure 1: Market Monitor - tracking industry confidence

Source: EEVS, BloombergNEF. Note: based on weighted confidence indicators from Figures 3, 4, 5, 6, and 9. Zero represents neutrality.

- Overall confidence: Figure 1 shows that market confidence reduced slightly this quarter
 following the welcome uptick reported in 2Q. Despite this flattening, outlook remains positive
 and takes an increasingly optimistic outlook into the forthcoming three months. Some reasons
 underpinning this result are highlighted below:
- Orders: Figure 3 (page 5) shows that the strengthening order volumes seen in 2Q were
 largely sustained in this quarter. In fact, an almost identical set of results were reported this
 time and eight out of 10 suppliers reported stable or growing order books. This is a positive
 set of figures given the preceding year's downward trend.
- Staffing: Suppliers reported a decrease in headcount this quarter following three consecutive quarters of headcount growth. And while no significant jumps were reported by any suppliers, the balance was in favour of growth with 13% of suppliers reporting slight declines to staffing levels and 24% reporting slight increases.
- Prices: Following the sharp increase in prices reported by 40% of respondents last quarter (2Q 2018), this quarter's results returned more closely to the longer-term trend line. And for the majority of suppliers (76%) there was little change in sale prices. However, Figure 6



- shows that the balance is in favour of price inflation with 20% reporting slight price increases and only 4% reporting some reductions. Following the mini-trend of the previous two quarters, no suppliers reported any major fluctuations in sale prices.
- Government Action: On energy efficiency policy, supplier sentiment remains firmly in negative
 territory continuing the long-term trend. Less than two out of 10 suppliers considered that the
 current policy framework effectively supports the sector. And in relation to the wider economy,
 while sentiment remains negative, there was a slight increase in support for government action
 on the economy this quarter. It will be interesting to see if this continues as Brexit negotiations
 reach a conclusion over the forthcoming two quarters.

2.2. Consumer trends

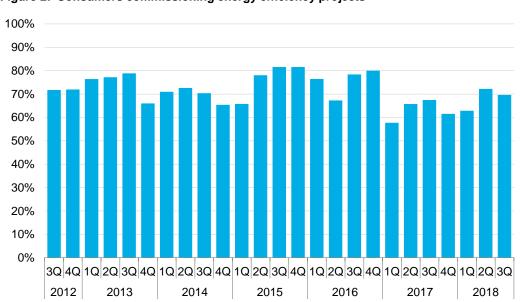
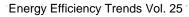


Figure 2: Consumers commissioning energy efficiency projects

Source: EEVS, BloombergNEF. Note: shows the proportion of respondents who have commissioned (or plan to commission) projects in a given quarter.

- Procurement levels: Figure 2 (above) shows solid levels of consumer procurement during
 3Q 2018, with around 7 out of 10 consumers reporting projects in the last three months.
- **Technologies:** Figure 11 (page 9) shows that lighting has retained its leading position at the top of the technologies list, followed by lighting controls and boiler controls/optimization. After a period of strong growth, Building Energy Management Systems (BEMS) saw a sharp decline in reported orders this quarter.
- Spending: Following a significant uptick in project spend last quarter, Figure 15 (page 11) shows that levels have returned to the normal range this quarter. However, even with this downtick, spending remained strong and sits at the higher end of our median trend line (at around 250,000 pounds (\$320,000) per project). This appears to have been driven by a material number of very large projects being commissioned this quarter. Very large projects cost more than 500,000 pounds on average.
- **Project Finance & Expected Payback:** This quarter saw little change to long-term trends. The vast majority of projects (around 7 out of 10) continue to be financed using in-house



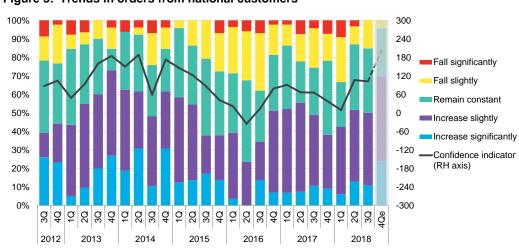
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sources of capital (see Figure 16, page 11), while financial payback expectations tightened a little to just less than four years (see Figure 17, page 12).

Section 3. Supplier trends

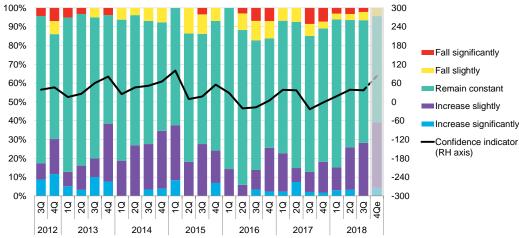
3.1. The order book

Figure 3: Trends in orders from national customers



Source: EEVS, BloombergNEF. Note: the confidence indicator is an input from the market monitor in Figure 1. Zero represents neutrality.

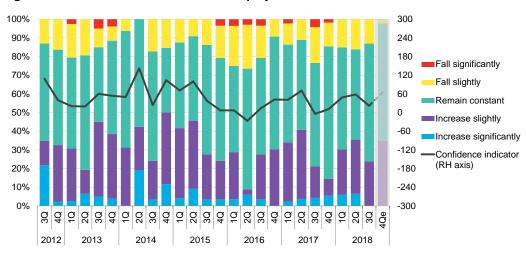
Figure 4: Trends in orders from overseas customers



Source: EEVS, BloombergNEF. Note: the confidence indicator is an input from the market monitor in Figure 1. Zero represents neutrality.

3.2. Staff numbers

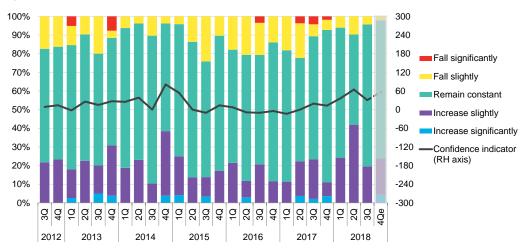
Figure 5: Trends in the number of staff employed



Source: EEVS, BloombergNEF. Note: the confidence indicator is an input from the market monitor in Figure 1. Zero represents neutrality.

3.3. Sale prices

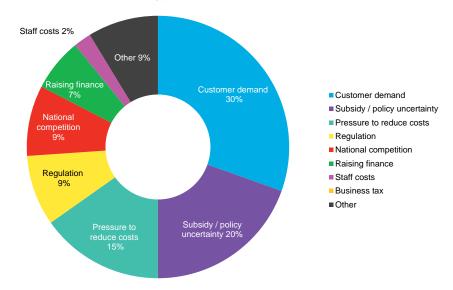
Figure 6: Trends in sale prices achieved



Source: EEVS, BloombergNEF. Note: the confidence indicator is an input from the market monitor in Figure 1. Zero represents neutrality.

3.4. Industry risk

Figure 7: Key issues of concern to energy-efficiency suppliers, 3Q 2018



Source: EEVS, BloombergNEF. Note: each supplier respondent was asked to select their primary issue of concern.

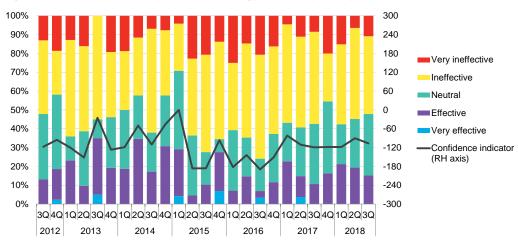
100% 90% 80% ■ Other International competition 70% Business tax 60% ■ Staff costs 50% Raising finance National competition 40% Regulation 30% ■ Pressure to reduce costs ■ Subsidy / policy uncertainty 20% Customer demand 10% 0% 2014 2015 2016 2017 2018

Figure 8: Trends in key issues of concern

Source: EEVS, BloombergNEF. Note: each supplier respondent was asked to select their primary issue of concern.

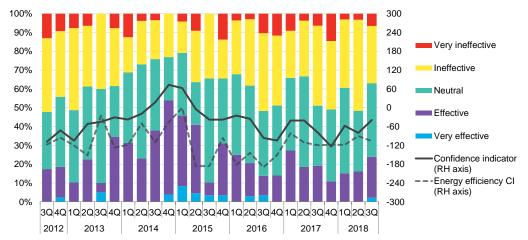
3.5. Government Effectiveness

Figure 9: Trends in industry views on energy efficiency policy



Source: EEVS, BloombergNEF. Note: the confidence indicator is an input from the market monitor in Figure 1. Zero represents neutrality.

Figure 10: Trends in industry views of the wider economy's management

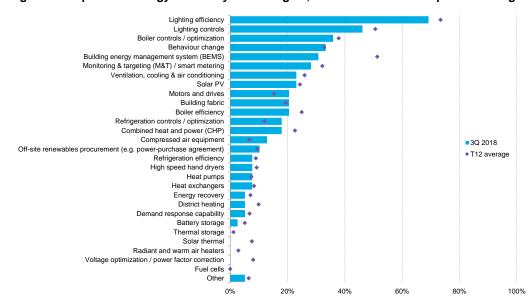


Source: EEVS, BloombergNEF. Note: CI = confidence indicator. The dotted line represents the CI from Figure 9, which is overlaid here for comparison with views on the wider economy. Zero represents neutrality.

Section 4. Consumer Trends

4.1. Technologies and measures

Figure 11: Uptake of energy efficiency technologies, 3Q 2018 versus four-quarter average



Source: EEVS, BloombergNEF. Note: The graph ranks technologies according to the proportion of consumers who commissioned a project in each technology, out of the overall number of consumers commissioning projects.

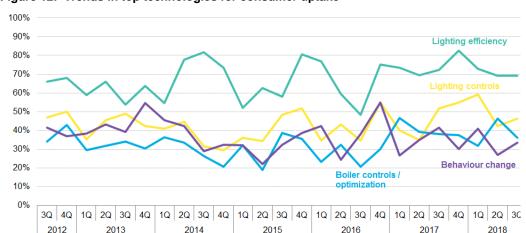
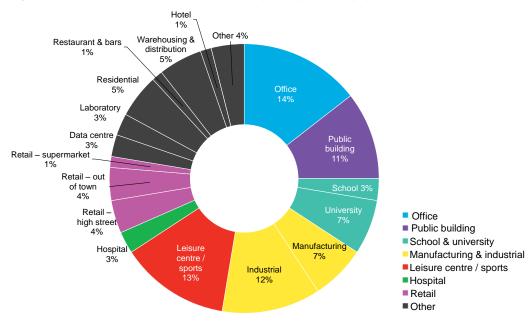


Figure 12: Trends in top technologies for consumer uptake

Source: EEVS, BloombergNEF. Note: The graph shows the proportion of respondents who commissioned a project in the respective category, out of the total number of respondents who commissioned a project.

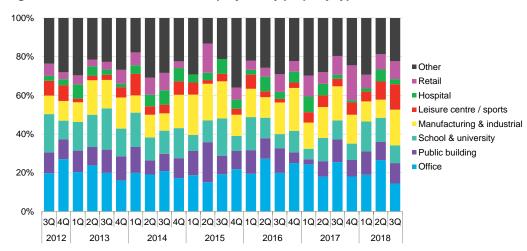
4.2. Property types

Figure 13: Breakdown of commissioned projects by property type, 3Q 2018



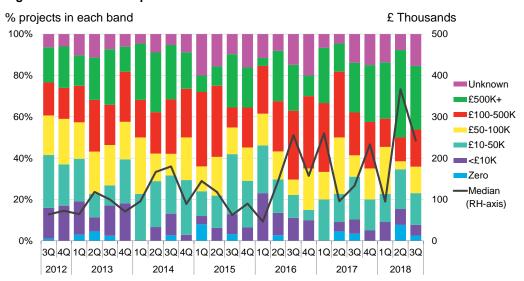
Source: EEVS, BloombergNEF

Figure 14: Trends of commissioned projects by property type



4.3. Project costs

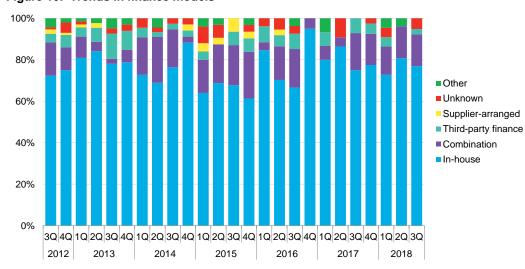
Figure 15: Trends in capital costs



Source: EEVS, BloombergNEF. Note: the line shows the cost trend for energy efficiency projects over time based on the estimated median.

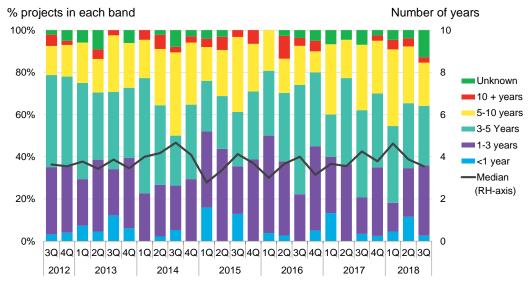
4.4. Project finance

Figure 16: Trends in finance models



4.5. Financial payback

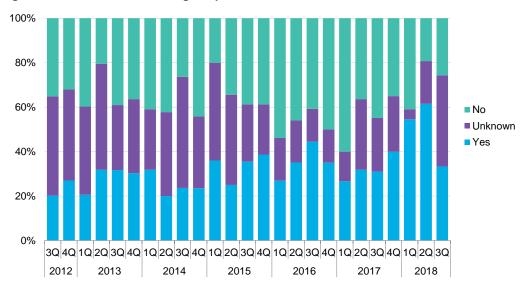
Figure 17: Trends in expected payback periods



Source: EEVS, BloombergNEF. Note: the line shows the expected payback trend for energy efficiency projects based on the estimated median.

4.6. Measurement and verification

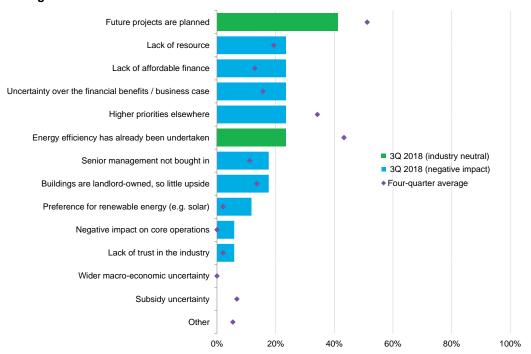
Figure 18: Trends in the use of good practice M&V



Source: EEVS, BloombergNEF. Note: M&V = measurement and verification.

4.7. Consumers not undertaking energy efficiency

Figure 19: Consumer reasons for lack of efficiency uptake, 3Q 2018 versus four-quarter average



Source: EEVS, BloombergNEF. Note: respondents not commissioning projects may have cited multiple reasons. The chart shows the proportion of respondents in each category, out of the total number of respondents not commissioning projects. Therefore, results do not add up to 100%.

Appendices

Appendix A: Methodology

The EEVS/Bloomberg *Energy Efficiency Trends* Survey (Vol.25) was conducted between October 9 and November 9, 2018, and completed by 102 U.K.-based respondents (56 consumer organizations and 46 suppliers).

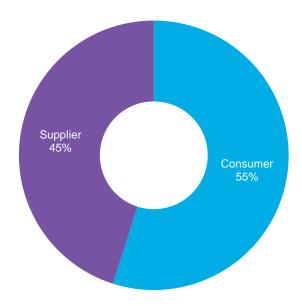
This is the 25th in a series of reports showing industry trends in non-residential energy efficiency. As the report series evolves, we continue to make minor tweaks.

Initially, the report covered a broad range of European countries, but since Volume 8, it has presented U.K.-based results only, as these consistently accounted for the bulk of data received.

In focusing the report on a single country with better data coverage, we were able to present cleaner, more robust results. This coincided with a revamp of the analysis including – among other modifications – the introduction of a set of time series charts.

Please reach out should you wish to discuss any of the trends observed in the charts.

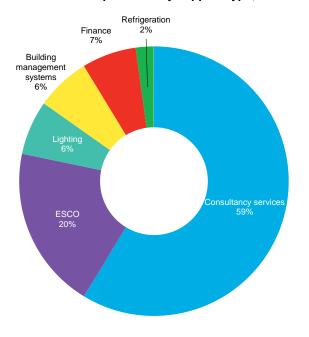
Figure 20: Who completed the survey?





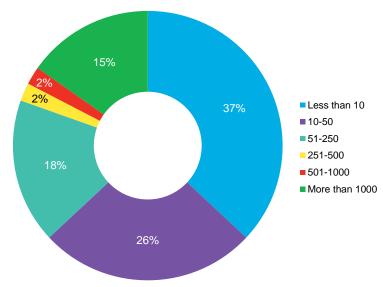
Appendix B: Supplier respondents

Figure 21: Breakdown of respondents by supplier type, 3Q 2018



Source: EEVS, BloombergNEF

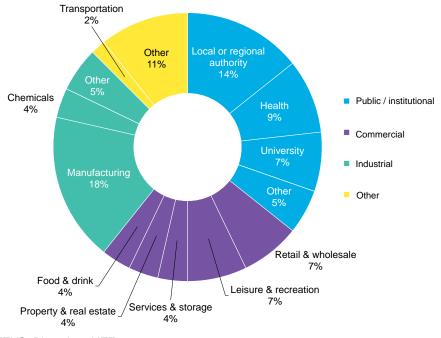
Figure 22: Organization size of supplier respondents (no. of employees), 3Q 2018





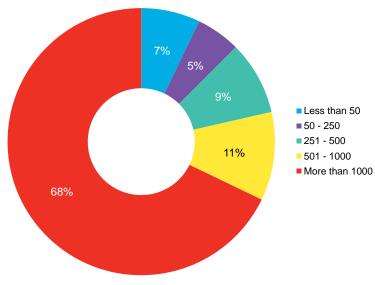
Appendix C: Consumer respondents

Figure 23: Consumer respondents by sector, 3Q 2018



Source: EEVS, BloombergNEF

Figure 24: Organization size of consumer respondents (no. of employees), 3Q 2018



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About EEVS



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Alongside this, our established team of energy analysts provide high quality, independent Measurement and Verification (M&V) services for all sizes and types of energy saving projects. Since 2011 we have evaluated the savings performance of hundreds of energy efficiency projects to the global good practice standard, IPMVP. Our trusted analysis helps suppliers to credibly prove their project's or technology's saving performance, whilst providing customers with much-needed certainty around their investment's return and value for money.

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