

UK research and evaluation on energy audits

- Conducted interim evaluation 2015-2017 on Energy Savings Opportunity Scheme
- Since November 2017, commissioned further evaluation of ESOS as well as additional research on the use and potential use of energy audits more widely.
 - Aims:
 - To provide evidence on the effectiveness of energy audits and reporting in driving energy efficiency savings across organisations and how these mechanisms can be used to develop future policy.
 - To build on the findings of the interim process evaluation and assess: ESOS impacts and benefits; the operation of the scheme; the extent to which its policy objectives have been achieved



Findings from ESOS evaluation 2015 -2017

An interim evaluation of ESOS was undertaken in 2015 - 2017. The research included a survey of 871 ESOS-obligated organisations; qualitative interviews with a further 40 ESOS organisations and 10 assessor market firms; and in-depth case-studies with 10 compliant organisations.

The main findings are as below:-

- The costs of compliance were in line with those anticipated in the initial Impact Assessment.
- Over 70% of ESOS participants were satisfied with their energy audit report and trusted the recommendations made
- A third of organisations reported that ESOS was influential in their decision to implement at least one energy efficiency improvement in the 18 months prior to the survey. Similarly, around one in five of those who had implemented fuel efficiency improvements within this same time period went on to attribute at least one of these improvements to influence of ESOS.
- Over 900 accredited assessors registered to meet the ESOS requirements. However, delayed compliance activity led to competition in the market for external energy audits and increases in prices.
- ESOS was reported to have led to an increase in interest (including at board-level) in energy efficiency by 40% of compliant organisations
- The evaluation evidence suggests that ESOS may have helped keep or push energy efficiency agendas primarily among organisations already interested in energy efficiency

Research on Energy Audits and Reporting

- Being carried out in 2 phases.

Phase 1 of the Research which started in November 2017 and is now complete, carried out evidence and policy review of energy audits and reporting, through:-

- Literature review of international schemes
- Workshops with SMEs, trade bodies, ESOS organisations and assessors, and public sector organisations
- In-depth interviews with ESOS organisations (x13), EU counterpart organisations (x2), SMEs (x5) assessors (x5) and trade bodies (x3)

Phase 2 research, focus on impact of ESOS

Work is now underway on the main evaluation of ESOS and further research on energy audits and reporting. Due for completion in March, with publication by July 2019.

Key research in this Phase includes:

- Telephone survey with c. 500 organisations in scope of ESOS to better understand
 - experiences since complying with ESOS;
 - organisations' approaches to energy efficiency and energy management;
 - preparations made for the 2nd phase of ESOS;
 - (expected Nov to Dec 2018).
- Further in-depth telephone interviews with lead assessors and supply chain organisations (expected Nov 2018 to Jan 2019)
- Case-studies on the impact of ESOS (through 10 case-studies with ESOS compliers), and to further explore the role of audits and reporting in organisations outside of ESOS (5 are planned with non-obligated organisations) (expected Nov 2018 to Jan 2019)

Streamlined Energy and Carbon Reporting - from April 2019

Quoted Companies

Continue to require **all UK quoted companies** to report in **Directors' report** on **global GHG emissions** and **intensity metric** in annual reports,

SECR requires total underlying **energy use and energy efficiency action taken**

SECR – Synergies with ESOS

Require **large unquoted companies and large LLPs** to include within **Directors' report (or LLP equivalent)**:

- **UK energy use** and associated **scope 1 and scope 2 emissions** (as a minimum) - UK energy use = **electricity, gas & transport** (as a minimum)
- **intensity metric** (chosen by companies), **Energy efficiency action** taken in period of report and **Methodologies used** in calculation of disclosures
- Large as per **Companies Act** – at least 2 of balance sheet (£18M+), turnover (£36M+) and employees (250+); not **EED**
- Electronic reporting – can be done on **voluntary basis** but not mandatory
- Directors to confirm if any information withheld on grounds of being **seriously prejudicial** to company, **not being practical to obtain** or if organisation uses **40MWh or less energy** in reporting period
- If the relevant report is a group report, the company or LLP must make the required statements on the basis of its information and its subsidiaries

Department for
Business, Energy
& Industrial Strategy



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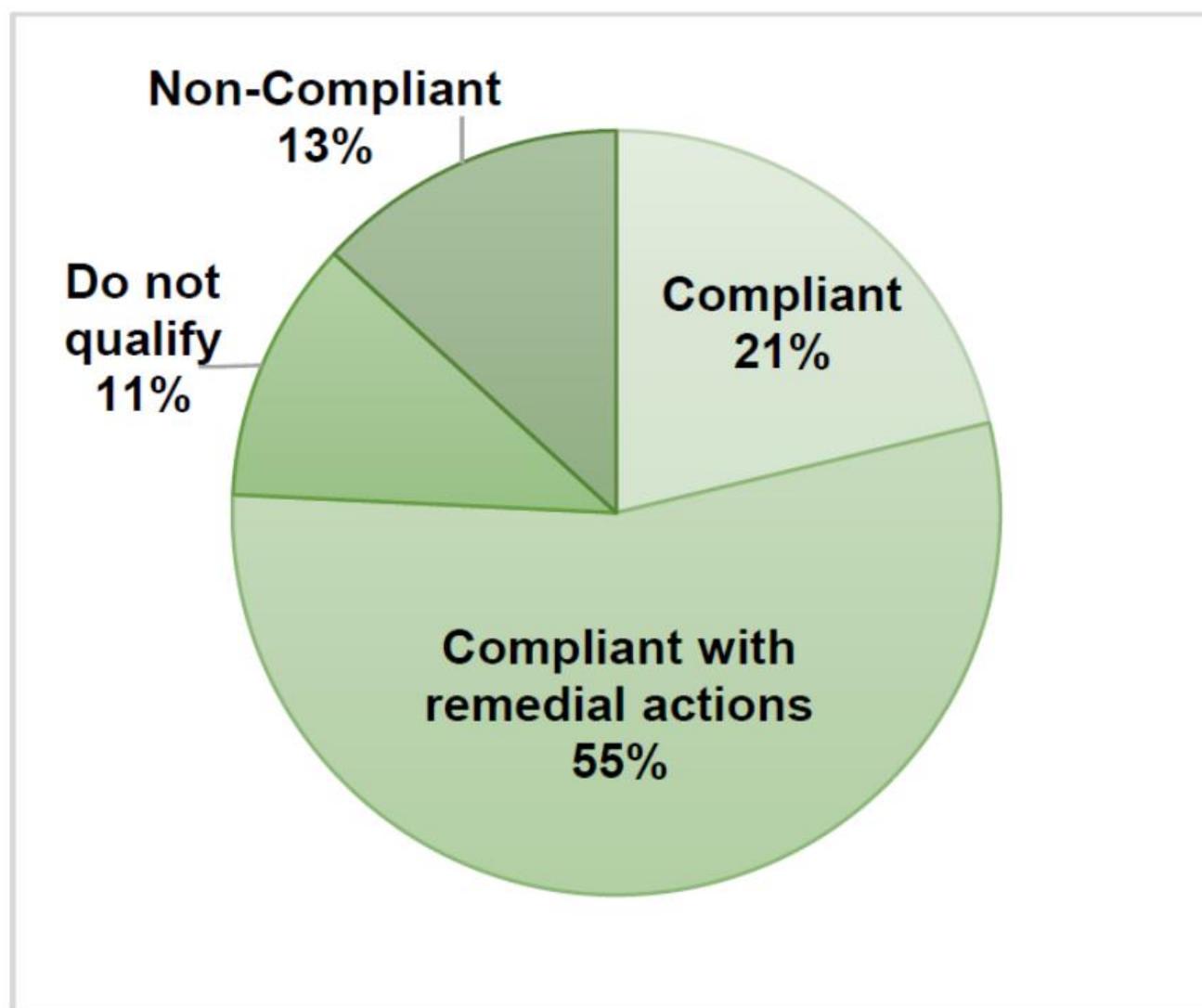


Figure 1. 2017/18 audits by grade.

UK Government



ESOS – common issues

Omitted transport consumption, where transport constituted significant proportion of the Total Energy Consumption

ESOS Energy Audits did not meet minimum criteria stated in Regulations/Guidance

Lead Assessor and or Board Director Signoff completely missing

Sampling Approach not representative of Significant Energy Consumption

Audited the 10% de-minimums instead of the 90% SEC

Moved Premises between qual. & comp. date so thought didn't need to conduct energy audits