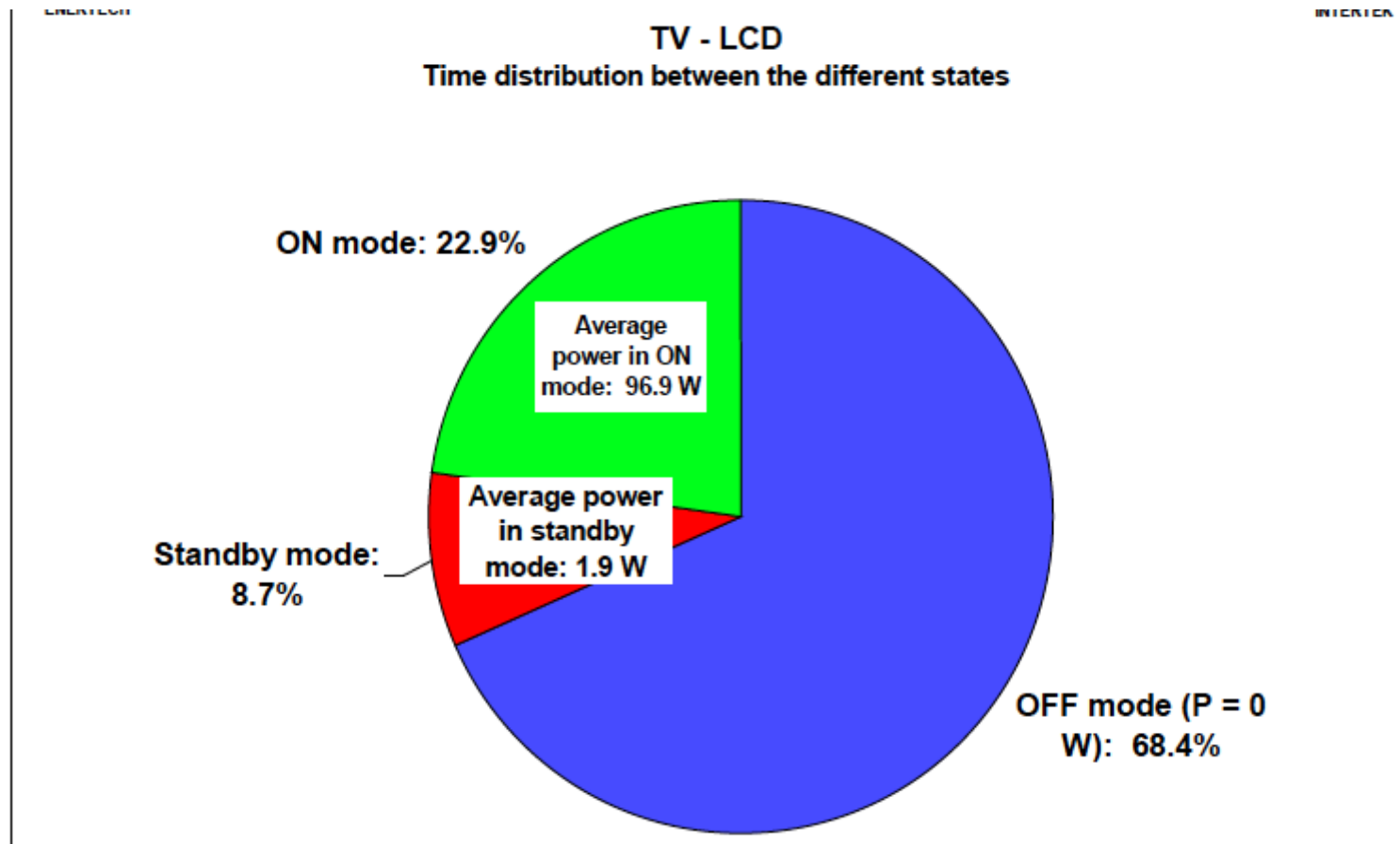


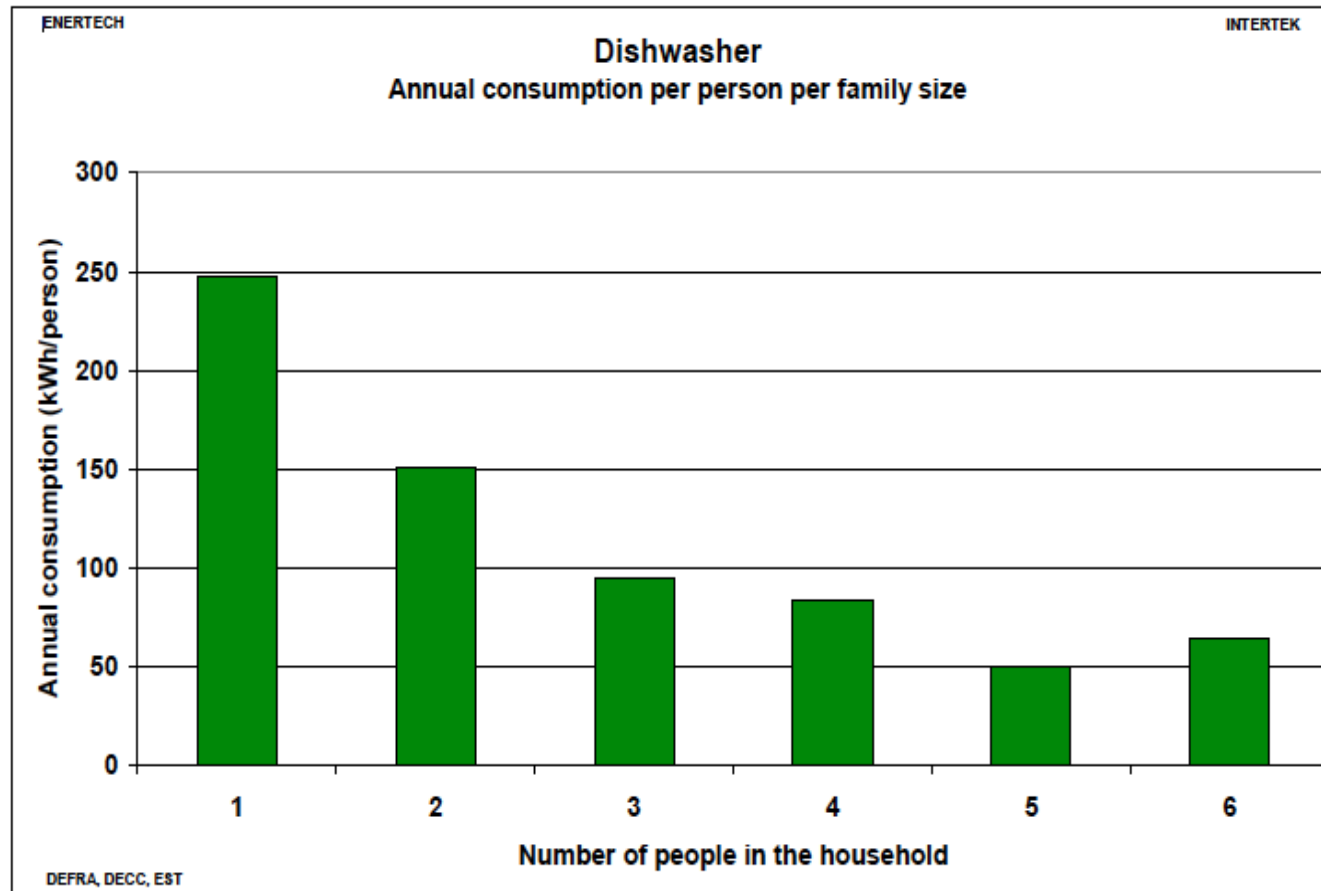
Easy-to-adopt lessons for organisers of large scale energy consumption studies in households

Chris Evans

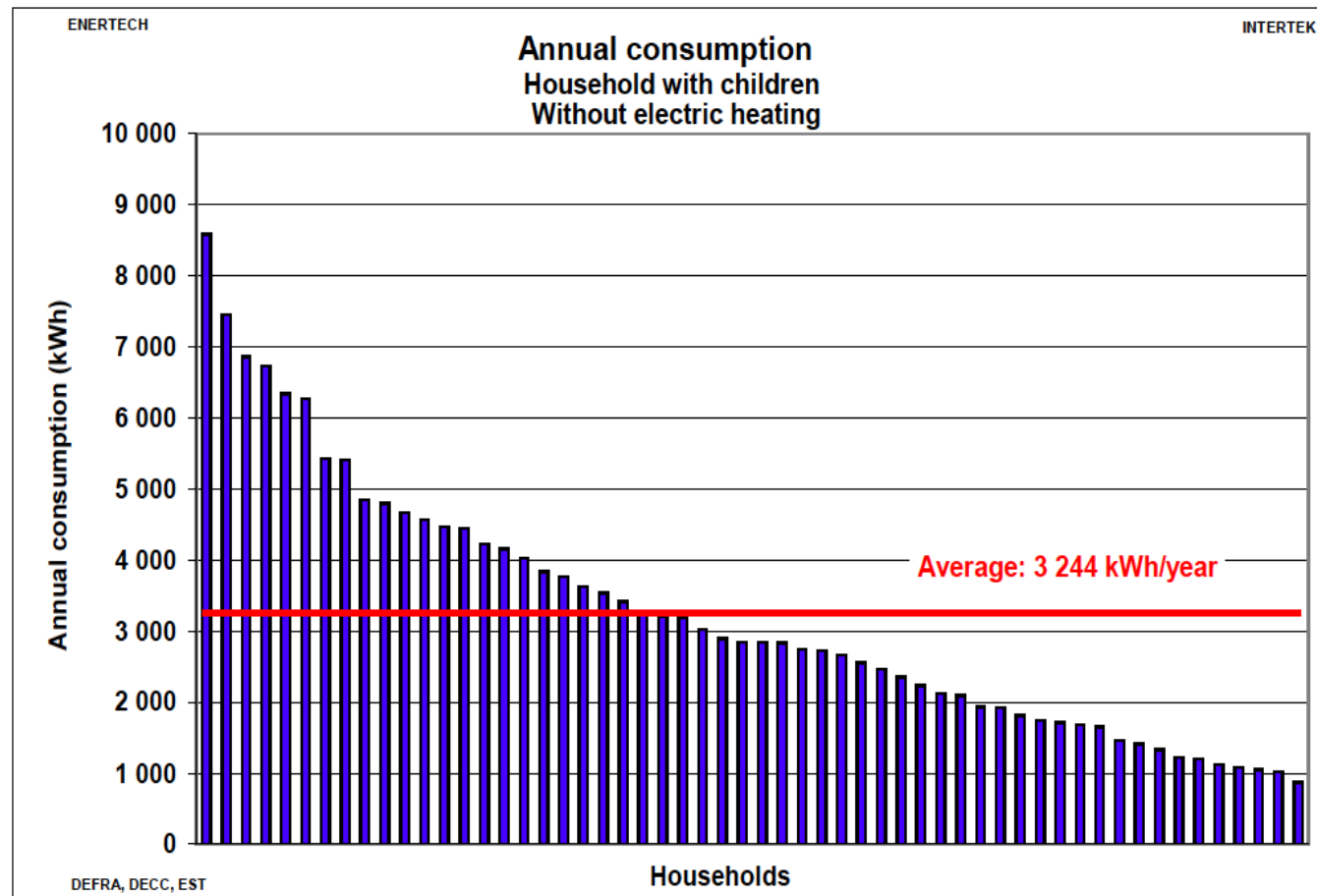
Do you need data like this to inform future policy?



Or data like this...?



Or data like this...?



Many authorities need to access data that can only be produced from large scale household studies but are put off from commissioning them due to their anticipated complexity and cost.

This presentation explains a proven management structure that can be confidently used to generate these types of data. We also mention costs...

What are the basic essentials for a large study?

- A statement of purpose
- Some form of oversight body, supervisory board or similar
- A supply team made up of specific delivery skills
- Enough budget

Statement of purpose...

Be clear at the outset of what information needs to be gathered in the programme...

- Electricity consumption?
 - By household, by major and minor consuming products?
- Water consumption?
- Gas consumption?
- Numbers of households, size of research sample?
- Householder demographics
 - Big households, single occupant households, affluent and low income...
- Over what time period?
 - Seasonality can have a big impact on consumption

An oversight or advisory body...

Perhaps not essential for a small budget programme but otherwise strongly recommended.

Why? For risk management...

- Represents the interests of the policy maker(s) funding the programme
- Provides strategic advice to the operational management team
- Provides a mechanism to bring multi-disciplinary oversight into a programme that will always have multi-disciplinary content

A supply team made up of specific delivery skills

Once you have determined the outline specification of what you want to achieve, getting the *right delivery team* in place is *essential*

There are a number of different skills required and no one person is going to have them all.

The technical team members...

1. **MARKET RESEARCHER** – they locate and interview the households. This is a task not to be underestimated. In large “balanced” programmes this is often the most challenging aspect.
2. **MEASURING INSTRUMENTATION SUPPLIER** – to provide all the measuring instrumentation and data capture technology.
3. **MEASURING INSTRUMENTATION FITTER** – to visit each household to fit and later remove the measuring equipment.
4. **DATA ANALYSER** – studies involving many households can generate huge amounts of data (the UK study produced up to 1m lines of data per household). Database management and analysis requires specialist skills

And very importantly...

MANAGING OPERATIONS CONTRACTOR - the “glue” that holds the delivery programme with all its complexity together.

In a large programme such as we had in the UK (250 households) this was a near full-time role.

And then there's the budget...

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The management structure described earlier enabled it to be completed on time and under budget.

But how did the UK manage to find
so much budget?

Put simply:

Programme delivery spanned 3 financial
years (say) €330k/year

Programme outputs were required for 4
different funding departments. So required
(say) €85k/year budget from each...

Results of the UK study are all in the public domain

- UK Study main Report: *Household Electrical Study*
<http://efficient-products.defra.gov.uk/cms/publication-of-the-household-electricity-study/>
- Summary of UK report: *Powering the nation: household electricity-using habits revealed*
<http://www.energysavingtrust.org.uk/About-us/What-we-do/Recent-reports>
- Address to apply for a copy of the complete database:
efficient.products@defra.gsi.gov.uk

Concluding remarks...

One important set of market data needed by policy makers is knowing what products are being used in the households in their countries and knowing what energy is being consumed by them.

Without this information, policy makers face difficulties to develop well focussed forward looking and effective policies.

This information is expensive to generate, but large studies do not need to be undertaken very often.

They need proper budget provision, a well developed specification and a multi-disciplinary delivery team.