“Hard-to-Reach” energy users and Transaction Costs: A brief energy efficiency programme perspective

BEHAVE Conference, 23 April, 2021

Luis Mundaca, Lund University, Sweden
Transaction costs - Concept

- ‘Any cost that is not directly involved in the production of goods or services but that it is essential for realizing the trade as such’ (Coase, 1960)
- ‘The costs of arranging a contract *ex-ante* and monitoring and enforcing it *ex-post* as opposed to production costs’ (Matthews, 1986)
- Examples: costs related to search for information, approval, monitoring & verification, etc.
• Energy saving obligations (or ‘Tradable White Certificates’), WHY?

- Approval & administrative procedures
- Time delays
- Legal services
- Search for trading partner
- Negotiation / bargaining
- Legal services
- Approval & administrative procedures
- Brokerage fees
- Development and operation of mechanisms to monitor, quantify and verify energy savings
- Approval & administrative procedures
- Time delays
- Search and assessment of information
- Project identification, pre-evaluation
- Search for customers willing to implement measures
- Marketing efforts
- Procurement
- Contract negotiation
- Project validation
- Brokerage fees

Source: Mundaca et al. (2013)
## Transaction costs – Estimated scale

<table>
<thead>
<tr>
<th>Case study</th>
<th>Sources of TCs</th>
<th>Estimated scale</th>
<th>Reference</th>
</tr>
</thead>
<tbody>
<tr>
<td>Utility conservation programmes (US)</td>
<td>Promotion, delivery, and monitoring</td>
<td>30% of programme costs</td>
<td>Joskow and Marron (1992)</td>
</tr>
<tr>
<td>Free-of-charge energy audits (DK)</td>
<td>Search for information, contract negotiation</td>
<td>15%–20% of audit costs</td>
<td>Mundaca and Neij (2006)</td>
</tr>
<tr>
<td>ESCOs (US)</td>
<td>Prospecting, proposal, project identification, M&amp;V</td>
<td>20%–40% of project costs</td>
<td>Easton Consultants (1999)</td>
</tr>
<tr>
<td>Energy Efficient Committment (UK)</td>
<td>Search for customers, hiring managing agents, approval, contract negotiations, random quality checks</td>
<td>10%–30% of project costs</td>
<td>Mundaca (2007)</td>
</tr>
</tbody>
</table>
Please go to [menti.com](http://menti.com), use the code **1350429** and…..

- Rank the following **sources of transaction costs** for programmes targeting HTR energy users (*1st* = most important; *5th* = not so important).

- Provide your 'best guess' about the estimated **scale of transaction costs** in programmes targeting HTR audiences.