

# Understanding Consumer-led Flexibility Opportunities

## Learning and development objectives:

- Understanding what consumer led flexibility encompasses and why there is a growing need for it
- How the different flexibility services available in GB work for consumers
- How end users can engage in flexibility
- An understanding of what potential changes on the horizon that could impact the GB flexibility markets

## Day 1 – Introduction to Consumer-led Flexibility Markets

### Introduction & welcome

- 10 am
- Tech check!
  - Aim and objectives

### Introduction to consumer-led flexibility fundamentals

- Module 1
- Defining end user flexibility
  - Market (aka 'implicit')
    - Time of use pricing – bill elements: wholesale, networks
  - System' (aka 'explicit') flexibility
    - Introducing the range of balancing service
      - Balancing Mechanism
      - Response and Reserve
      - Capacity Market
    - Role of NESO and DNOs
      - How does the System Operator decide which flexibility service to use?
      - System flexibility market timings
  - Why end user flexibility markets are expected to grow
    - End user flexibility examples – EV charging, Demand Side Response, on-site generation, on-site Battery Energy Storage Systems

### Discussion and Q&A

## Break

### Consumer-led market flexibility choices

- Module 2
- Electricity supply contract structures
    - What makes up the end user electricity bill and which elements could be subject to time of use charging?
    - 'Flexi' contracts
    - Overview of the supply market – who's offering what
  - **Case study – business electricity contract with time of use charges**
    - Typical business vs business with on-site flexible assets (e.g., EV charging, BESS)
  - Introducing system flexibility for Day 2

- Role of aggregators and optimisers

*Discussion and Q&A*

11.45 Q&A

12.00 What we will cover off in future sessions and close

## **Session 2 – Consumer-led engagement in system flexibility**

**Introduction & welcome**

10 am

- Tech check!
- Aim and objectives

**Consumer-led system flexibility**

Module 1

- Key considerations for end user system flexibility
  - Competing with other flexibility providers
  - Metering, comms and delivery times – smart and secure systems programme
  - Workstreams to support end user flexibility – opening up the market to the consumer
- Overview of how system flexibility services are opening up to end users
  - Considering how consumer-led low carbon technologies can participate: EVs, BESS, consumption turn-up/ down, onsite generation
- Current and future flexible market sizing and potential value

*Discussion and Q&A*

Break

**System flexibility services and routes to market**

Module 2

- Introducing Virtual Lead Parties (VLPs) and Virtual Trading Parties (VTPs)
  - End-users offering services in the Balancing Mechanism – volumes and prices
    - NIV chasing
- Key balancing services with potential for end user participation
  - Response
  - Reserve
  - Local Constraint Markets

***Case study: How the Demand Flexibility Service has evolved***

- Routes to system flexibility markets
  - Aggregators and optimisers

*Discussion and Q&A*

11.45 Q&A

12.00 Close

## **Session 3 – Consumer-led engagement in capacity markets and bringing it all together**

**Introduction & welcome**

10 am

- Tech check!
- Aim and objectives

## Capacity market

- What is Capacity Adequacy
- The Capacity Market
  - How it is works
  - Consumer engagement – Demand Side Response
- Module 1**
  - Timelines – qualification through to securing a CM Agreement
- Recent Capacity Market auction results
  - Clearing prices
  - How consumer (DSR) involvement has increased
- Workstreams in play for CM change

## *Discussion and Q&A*

### Break

## Bringing it altogether

- How flexibility market revenues can be ‘stacked’
- Key workstreams impacting on consumer-led flex over the coming years
  - Enabling Demand Side Flexibility
  - Flexibility Market Facilitator
  - Clean Flexibility Roadmap
  - Smart Secure Electricity Systems Programme
- *Discussion and Q&A*

### Module 2

11.45 Q&A

12.00 Close