UMSUG121/06 – ELECTRIC VEHICLE CHARGING WHERE THE APPARATUS CONTAINS A METER

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Summary	This paper updates the UMSUG on issues relating to electric vehicle (EV) charging where the Apparatus contains a Meter. It proposes a way forward and invites the UMSUG to recommend this approach to the Supplier Volume Allocation Group (SVG).

1. What are the issues?

1.1 ELEXON has been approached by a number of parties looking to implement EV charging via Apparatus connected to street lighting columns. In two cases that we are aware of, the system developer has proposed a solution that contains a Measuring Instrument Directive (MID) approved Meter in, or attached to, the lighting column. ELEXON's usual position would therefore be that this type of set up falls under the metered, rather than the unmetered, arrangements. However, further discussion with developers has identified practical obstacles to using the installed Meter for BSC Settlement.

2. What are the obstacles to using the Meter for BSC Settlement?

2.1 The proposed set up does not sit well under the metered arrangements because:

- The Meter comes already built into the EV charger and the display cannot be accessed.
- Meter Operator Agents (MOAs) would not be able to access the Meter for maintenance. In one case MOAs have suggested fitting their own Meter as well as that already in the EV charging system, which could be a disproportionate approach.
- Even if a second Meter is fitted by the MOA, Licensed Distribution System Operators are unwilling to allow these EV charging solutions to be metered due to the size of the supply and engineering regulations.

So we are left with a situation where potentially innovative solutions are falling between the metered and unmetered arrangements.

2.2 ELEXON has already developed a solution for Measured Central Management Systems (mCMS). The first approved mCMS was for an EV charging system that contained a 'movable' Meter within the charging cable. This could not be accommodated under the metered arrangements because the Meter can move between different Grid Supply Point (GSP) Groups (distribution areas).

2.3 The proposed new charging systems are not significantly different from the approved mCMS other than the fact that the Meter would be at a fixed Metering Point.

2.4 ELEXON has had a number of discussions on these issues with Ofgem and Regulatory Delivery at the Department for Business, Energy & Industrial Strategy. We have reiterated that, if the solution contains a Meter, we believe it cannot be considered for a UMS.

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3. What is the proposed way forward?

3.1 ELEXON proposes that, to resolve this impasse, we ask developers to fit an appropriate 'measuring device' rather than a Meter. These devices will not have a display and as such cannot be deemed to be a Meter under the MID (or therefore the BSC). We would then allow such arrangements to apply for testing as an mCMS under the UMS arrangements. The accuracy of the measuring device will be established during the mCMS witness testing.

3.2 ELEXON also proposes that this approach is allowed only for slow-charging arrangements on residential streets. This is to differentiate it from larger, fast-charging arrangements via feeder pillars, which will still need to be metered.

3.3 We will need to update the mCMS Test Specification to reflect the new approach, including a definition of 'slow-charging'. We invite the UMSUG's views on an appropriate definition.

4. What are we asking the UMSUG?

4.1 We invite the UMSUG to recommend the above approach to the SVG.

5. Recommendations

5.1 We invite you to:

a) **NOTE** the issues identified with charging EVs via street lighting columns where the Apparatus contains a Meter; and

b) **AGREE** to recommend ELEXON's proposed approach to the SVG.

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