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### Foreword

This ETSI Standard (ES) has been produced by ETSI Technical Committee Environmental Engineering (EE).

The present document is part 11 of a multi-part deliverable covering Monitoring and control interface for infrastructure equipment (Power, Cooling and environment systems used in telecommunication networks), as identified below:

- Part 1: "Generic Interface";
- Part 2: "DC power system control and monitoring information model";
- Part 3: "AC UPS power system control and monitoring information model";
- Part 4: "AC distribution power system control and monitoring information model";
- Part 5: "AC diesel back-up generator system control and monitoring information model";
- Part 6: "Air Conditioning System control and monitoring information model";
- Part 7: "Other utilities system control and monitoring information model";
- Part 8: "Remote Power Feeding System control and monitoring information model".
- Part 9: "Alternative Power Systems";
- Part 10: "AC inverter power system control and monitoring information model";

#### Part 11: "Battery system with integrated control and monitoring information model";

Part 12: "Telecom/ICT equipment control and monitoring information model".

### Modal verbs terminology

In the present document "shall", "shall not", "should", "should not", "may", "may not", "need", "need not", "will", "will not", "can" and "cannot" are to be interpreted as described in clause 3.2 of the <u>ETSI Drafting Rules</u> (Verbal forms for the expression of provisions).

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### 1 Scope

The present document applies to Battery Systems with integral control and monitoring for telecommunication and datacom (ICT) equipment. It applies to battery system with a dedicated monitoring and control unit.

The present document defines:

- Monitored and controlled battery system architectures.
- The minimum set of exchanged information required at the interface, described in "natural language" in text tables.
- The XML files with tags and variables corresponding to the data in the tables of the annexes.

## 2 References

References are either specific (identified by date of publication and/or edition number or version number) or non-specific. For specific references, only the cited version applies. For non-specific references, the latest version of the reference document (including any amendments) applies.

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### 2.1 Normative references

The following referenced documents are necessary for the application of the present document.

- [1] ETSI ES 202 336-1: "Environmental Engineering (EE); Monitoring and Control Interface for Infrastructure Equipment (Power, Cooling and Building Environment Systems used in Telecommunication Networks) Part 1: Generic Interface".
- [2] ETSI EN 300 132-3-1: "Environmental Engineering (EE); Power supply interface at the input to telecommunications and datacom (ICT) equipment; Part 3: Operated by rectified current source, alternating current source or direct current source up to 400 V; Sub-part 1: Direct current source up to 400 V".

### 2.2 Informative references

The following referenced documents are not necessary for the application of the present document but they assist the user with regard to a particular subject area.

- [i.1] IEEE 802.1 to 11: "IEEE Standard for Local and Metropolitan Area Networks: Overview and Architecture".
- [i.2] ISO/IEC 10164 (all parts): "Information technology Open Systems Interconnection".
- [i.3] ISO/IEC 8879:"Information processing Text and office systems Standard Generalized Markup Language (SGML)".
- [i.4] ETSI EN 300 132-2: "Environmental Engineering (EE); Power supply interface at the input to telecommunications and datacom (ICT) equipment; Part 2: Operated by -48 V direct current (dc)".