



Standards Update Notice (SUN)

Issued: January 26, 2017

Standard Information

Standard Number: UL 1973

Standard Name: Batteries for Use in Light Electric Rail (LER) Applications and Stationary Applications

Standard Edition and Issue Date: 1st Edition Issued February 15, 2013 with Revisions July 3, 2013

Date of Previous Revisions to Standard: 1st Edition Outline Issued October 6, 2010

Effective Date of New/Revised Requirements

Effective Date: **January 31, 2018**

Impact, Overview, Fees and Action Required

Impact Statement: A review of all Listing Reports is necessary to determine which products comply with new/revised requirements and which products will require re-evaluation. **NOTE:** Effective immediately, this revised standard will be exclusively used for evaluation of new products unless the Applicant requests in writing that current requirements be used along with their understanding that their listings will be withdrawn on the Effective Date noted above, unless the product is found to comply with new/revised requirements.

Overview of Changes: Addition of an Effective Date to the requirements noted in the table below. Specific details of new/revised requirements are found in table below.

Client Action Required:

Information – To assist our Intertek Engineer with review of your Certification Reports, please submit technical information in response to the new/revised paragraphs noted in the attached or explain why these new/revised requirements not apply to your product (s).

Current Listings Not Active? – *Please immediately identify any current Listing Reports or products that are no longer active and should be removed from our records. We will do this at no charge as long as Intertek is notified in writing prior to the review of your reports.*



Standards Update Notice (SUN)

Issued: January 26, 2017

Description of New/Revised Technical Requirements

Clause	Verdict	Comment
5.7 and 5.8.2		<p>An analysis of potential hazards (including an FMEA) shall be conducted on the device under test to determine that events that could lead to a hazardous condition have been identified and addressed through design or other means.</p> <p>Functional safety requirements revised for those systems relying on electronic and software for critical safety.</p> <p>Compliance to smart grid standard for systems connected to a Smart Grid.</p>
11		Toxic emissions criteria for systems that are installed indoors, located within passenger compartments of trains or walk in systems that may vent hazardous substances
15		Overdischarge Protection Test
17		Imbalanced charging test is a new test that evaluates battery safety under imbalanced charging condition.
18		Dielectric withstand test is only option for checking insulation. The test is based upon UL 60950-1 electric strength test criteria.
19		Addition of a continuity check tests based upon requirements in UL 60950-1
28		Drop impact test added for field installed battery packs and modules.
33		Thermal cycling test upper test temperature limit raised to 85°C.
35		Salt Fog test added for systems installed near marine environments that are not located within corrosion enclosures.
37		Internal fire exposure is a new test for lithium ion chemistry systems, which consists of failing a cell inside a pack and determining if the fire is contained within the system.
40		Added grounding test to manufacturing production tests if system is provided with grounding.
		CUSTOMERS PLEASE NOTE: This Table and column "Verdict" can be used in determining how your current or future production is or will be in compliance with the new/revised requirements.