



## PC57.133

Type of Project: New IEEE Standard
Project Request Type: Initiation / New
PAR Request Date: 14 Mar 2024
PAR Approval Date: 22 May 2024
PAR Expiration Date: 31 Dec 2028

PAR Status: Active

**1.1 Project Number:** PC57.133 **1.2 Type of Document:** Guide

1.3 Life Cycle: Full Use

2.1 Project Title: Guide for Evaluating Transformer Performance under Reverse Power Flow

**3.1 Working Group:** Standards - Working Group on the Guide for Evaluating Transformer Performance under Reverse Power Flow PC57.133(PE/TR/Stds/WG - Reverse Power Guide -PC57.133)

3.1.1 Contact Information for Working Group Chair:

Name: Ryan Hogg

Email Address: rhogg@ieee.org

3.1.2 Contact Information for Working Group Vice Chair:

None

**3.2 Society and Committee:** IEEE Power and Energy Society/Transformers(PE/TR)

3.2.1 Contact Information for Standards Committee Chair:

Name: David Wallach

Email Address: david.wallach@ieee.org

3.2.2 Contact Information for Standards Committee Vice Chair:

Name: William Griesacker

Email Address: bgriesacker@verizon.net

3.2.3 Contact Information for Standards Representative:

Name: Stephen Shull

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4.1 Type of Ballot: Individual

4.2 Expected Date of submission of draft to the IEEE SA for Initial Standards Committee Ballot:

Nov 2027

4.3 Projected Completion Date for Submittal to RevCom: Oct 2028

5.1 Approximate number of people expected to be actively involved in the development of this project: 100

**5.2** Scope of proposed standard: This document provides guidance for the operation and performance evaluation of single- and three- phase transformers subjected to reverse power flow. This guide covers power and distribution transformers, both liquid-filled and dry-type.

5.3 Is the completion of this standard contingent upon the completion of another standard? No

**5.4 Purpose:** The purpose of this document is to provide guidance for transformers subjected to reverse power flow. This includes recommendations for specification and operation of new and existing transformers.

**5.5 Need for the Project:** This guide is needed to provide:

- Guidance for transformers subjected to reverse power flow.
- Information on how harmonic content introduced from downstream sources will affect transformers whose base operating frequency is 50 Hz or 60 Hz.
- Direction on regulation requirements for transformers subjected to reverse power flow.
- **5.6 Stakeholders for the Standard:** Electrical power utilities and transformer manufacturers.

## **6.1 Intellectual Property**

- **6.1.1** Is the Standards Committee aware of any copyright permissions needed for this project? No
- **6.1.2** Is the Standards Committee aware of possible registration activity related to this project? No

7.1 Are there other standards or projects with a similar scope? No

**8.1 Additional Explanatory Notes:**