



Sherry
Hampton/STDS/STAFF/
US/IEEE

10/02/2007 11:01 PM

To mwactor@powl.com
cc tburse@powl.com, stds-pes-scc@ieee.org,
doug.edwards@ieee.org , Matthew
Ceglia/STDS/STAFF/US/IEEE@IEEE
bcc

Subject Approval of Project - PC37.13

02 October 2007

Michael Wactor
Powell Electrical Systems, Inc.
8550 Mosley Drive
Houston, TX 77075
mwactor@powl.com

Re: PC37.13 - Standard for Low-Voltage AC Power Circuit Breakers Used in Enclosures

Dear Michael:

I am pleased to inform you that on 27 September 2007 the IEEE-SA Standards Board approved the above referenced project until 31 December 2008 with the editorial changes to Items 5.2 and 5.4. A copy of the file can be found on our website at <http://standards.ieee.org/board/nes/projects/C37-13.pdf>.

Now that your project has been approved, please forward a roster of participants involved in the development of this project. This request is in accordance with the IEEE-SA Operations Manual, Clause 5.1.2i under Duties of the Sponsor which states:

"Submit annually to the IEEE Standards Department an electronic roster of individuals participating on standards projects"

Rosters can be submitted in any format to the NesCom Administrator (nescom-admin@ieee.org). Please forward this list to the NesCom Administrator via e-mail at nescom-admin@ieee.org no later than 26 December 2007.

Or, for your convenience, you can manage your standards development roster in myProject. Instructions are as follows:

- Go to myProject - <https://development.standards.ieee.org/my-site>
- Login using your IEEE Web Account username and password.
- Once logged into myProject, go to "Manage Committees"
- Drill down to the project by clicking the (+) on the left to expand each level. The actual project will be highlighted in yellow
- Click "Manage Committees" for that project. A list of individuals enrolled in the Committee/Project will appear. On this screen you can assign whether a person is a Participant, a

Non-Voting Member or a Voting Member of the project group. You may also view contact information for that individual.

Please visit our website, IEEE Standards Development Online (<http://standards.ieee.org/resources/development/index.html>), for tools, forms and training to assist you in the standards development process. Also, we strongly recommend that a copy of your draft be sent to this office for review prior to the final vote by the working group to allow for a quick review by editorial staff before sponsor balloting begins.

If you should have any questions, please contact the NesCom Administrator via e-mail at nescom-admin@ieee.org or via telephone at +1 732 562 3806.

Sincerely,

NesCom Admin
Standards Activities
Email: nescom-admin@ieee.org

PAR Request Date: 11 July 2007**PAR Approval Date:** 27 September 2007**PAR Signature Page on File:** Yes**Type of PAR:** Modification to Approved PAR**Status:** Modification to a Previously Approved PAR for the Revision of a Standard - PC37.13, 22 September 2005**Root Project:** IEEE Std C37.13-1990**1.1 Project No.:** **C37.13****1.2 Type of Document:** Standard**1.3 Life Cycle:** Full-Use**1.4 Is this document in ballot now?** No**2.1 Title**

Standard for Low-Voltage AC Power Circuit Breakers Used in Enclosures

3.1 Working Group Name [Low Voltage Switchgear Devices Subcommittee](#)**Working Group Chair**[Edwards, Douglas J](#)

Phone: 919-365-2337

Email: doug.edwards@ieee.org

Working Group Vice Chair**3.2 Sponsor**[IEEE Power Engineering Society Switchgear \(PE/SWG\)](#)**Sponsor Chair**[Burse, Ted](#)

Phone: 713-948-4599

Email: tburse@powl.com

Name of Standards Liaison Representative (if applicable)[Wactor, Michael](#)

Phone: 713-948-4918

Email: mwactor@powl.com

3.3 Joint Sponsor**4.1 Type of Ballot:** Individual**4.2 Expected Date of Submission for Initial Sponsor Ballot:** September 2008**4.3 Projected Completion Date for Submittal to RevCom:** September 2008**5.1 Approximate number of people expected to work on this project:** 9

5.2 Scope: The scope of this standard includes enclosed low-voltage ac power circuit breakers, as follows: a) Stationary or drawout type of two-pole, three-pole, or four-pole construction, with one or more rated maximum voltages of 635 V (600 V for units incorporating fuses), 508 V, and 254 V for application on systems having nominal voltages of 600 V, 480 V, and 240 V b) Unfused or fused type c) Manually operated or power operated, with or without electromechanical or electronic trip devices d) Fused drawouts consisting of current-limiting fuses in a drawout assembly intended to be connected in series with a low-voltage ac power circuit breaker to form a nonintegrally fused circuit breaker. NOTE In this standard the term circuit breaker shall mean enclosed low-voltage ac power circuit breaker, either fused or unfused. The term unfused circuit breaker shall mean a circuit breaker without either integrally or nonintegrally mounted fuses, and the term fused circuit breaker shall mean a circuit breaker incorporating current-limiting fuses. This document applies to both integrally and nonintegrally fused circuit breakers.

Old Scope: [Original (1990) Scope]: The scope of this standard includes enclosed low-voltage ac power circuit breakers, as follows: (1) Stationary or draw-out type of two- or three-pole construction, with one or more rated maximum voltages of 635 V (600 V for units incorporating fuses), 508 V, and 254 V for application on systems having nominal voltages or 600 V, 480 V, and 240 V. (2) Unfused or fused type (3) Manually operated or power operated, with or without electromechanical or solid-state trip devices. NOTE: In this standard the term circuit breaker shall mean enclosed low-voltage ac power circuit breaker, either fused or unfused. The term unfused circuit breaker shall mean a circuit breaker without integral fuses, and the term fused circuit breaker shall mean a circuit breaker incorporating current limiting fuses as an integral part of the circuit breaker. [New Scope of document]: The scope of this standard includes enclosed low-voltage ac power circuit breakers, as follows: a) Stationary or drawout type of two-, three-pole, or four-pole construction, with one or more rated maximum voltages of 635 V (600 V for units incorporating fuses), 508 V, and 254 V for application on systems having nominal voltages of 600 V, 480 V, and 240 V. b) Unfused or fused type c) Manually operated or power operated, with or without electromechanical or electronic trip devices. d) Fused drawouts consisting of current-limiting fuses in a drawout assembly intended to be connected in series with a low-voltage ac power circuit breaker to form a nonintegrally fused circuit breaker. NOTE In this standard the term circuit breaker shall mean enclosed low-voltage ac power circuit breaker, either fused or unfused. The term unfused circuit breaker shall mean a circuit breaker without integral fuses, and the term fused circuit breaker shall mean a circuit breaker incorporating current-limiting fuses. This document applies to both integrally and nonintegrally fused circuit breakers. For nonintegrally fused circuit breakers, reference IEEE C37.27/D9 (July 25, 2005) for additional application information.

5.3 Is the completion of this document contingent upon the completion of another document? Yes

C37.27 is also an approved project and is ready for ballot. C37.13 and C37.27 are related to each other, were revised by joint working group, and are planned to be balloted simultaneously.

5.4 Purpose: [Original (1990) purpose]: The original C37.13-1990 does not include a statement of purpose.

Old Purpose: [Original (1990) purpose]: The original C37.13-1990 does not include a statement of purpose.

5.5 Need for the Project: [New purpose of document]: The structure of the standard is not changed from the original C37.13-1990 standard and thus does not include a purpose of document statement. Purpose of this project: The project will modify all dimensional information to provide metric dimensions. This is necessary to gain global acceptance of this standard. Changes will be made to coordinate with related standards (e.g. C37.20.1-2002 - Standard for Metal-Enclosed Low-Voltage Power Circuit Breaker Switchgear, C37.50-R2000 - Switchgear Low Voltage AC Power Circuit Breakers Used in Enclosures - Test Procedures, and C37.51-R1995 - Switchgear Metal Enclosed Low Voltage AC Power Circuit Breaker Switchgear Assemblies - Conformance Test Procedures). Updates associated with the extensive use of electronic trip devices on low-voltage breakers are to be reviewed and detailed.

5.6 Stakeholders for the Standard: The stakeholders include users, manufacturers, purchasers, and those performing maintenance on low-voltage power circuit breakers.

6.1.a. Has the IEEE-SA policy on intellectual property been presented to those responsible for preparing/submitting this PAR prior to the PAR submittal to the IEEE-SA Standards Board? Yes

Presented Date: 2007-05-09

If no, please explain:

6.1.b. Is the Sponsor aware of any copyright permissions needed for this project? No

If yes, please explain:

6.1.c. Is the Sponsor aware of possible registration activity related to this project? No

If yes, please explain:

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

If yes, please explain:

Sponsor Organization:

Project/Standard Number:

Project/Standard Date: 0000-00-00

Project/Standard Title:

7.2 Is there potential for this standard (in part or in whole) to be adopted by another national, regional, or international organization? ? Do not know at this time

Technical Committee Name and Number:

Contact person:

Contact person Phone Number:

Contact person Email Address:

7.3 Will this project result in any health, safety, security, or environmental guidance that affects or applies to human health or safety? Yes

Safe operation of circuit breakers based on the circuit breaker construction, rating structure, and testing are included in the standard.

7.4 Additional Explanatory Notes:

The Scope was modified in this Modified PAR request. The change is to clarify the reference to integrally and nonintegrally fused circuit breakers. Previously, the PAR incorrectly provided a definition statement that fused circuit breakers were only for intergrally fused devices. This is not correct and is corrected in this modified PAR. The statement is modified to state that "The term unfused circuit breaker shall mean a circuit breaker without either integrally or nonintegrally mounted fuses."

8.1 Sponsor Information:

Is the Scope of this project within the approved scope/definition of the Sponsor's Charter? Yes

If no, please explain:

[Email This Letter](#)

06 December 2006

Michael Wactor
Powell Electrical Systems, Inc.
8550 Mosley Drive
Houston, TX 77075
mwactor@powl.com

Re: PC37.13 - Standard for Low-Voltage AC Power Circuit Breakers Used in Enclosures

Dear Michael:

I am pleased to report that on 06 December 2006 the IEEE-SA Standards Board approved the extension request of the above-referenced project until 31 December 2008.

If you should have any further questions, please contact me at +1 732 562 6003 or by email at s.hampton@ieee.org.

Sincerely,

Sherry Hampton
Administrator, Governance
Standards Activities
Phone +1 732 562 6003
FAX +1 732 875 0695
Email: s.hampton@ieee.org

CC: tburse@powl.com, stds-pes-scc@ieee.org, doug.edwards@siemens.com

IEEE-SA Standards Board Extension Request

Revised 23 June 2004

1. Date of Request: 5-Oct-06
2. Assigned Project Number: PC37.13
3. Project Title: Standard for Low-Voltage AC Power Circuit Breakers Used in Enclosures
 - a. Name of Working Group (WG): C37.13
 - b. Name of Working Group Chair: Douglas J. Edwards
 - c. Name of Sponsoring Society and Committee: Power Engineering Society Switchgear
 - d. Name of Sponsoring Committee Chair: Jeff Nelson
4. Contact Information (Contact should be the person who will answer any questions concerning this extension request):
 - a. Name: Douglas J. Edwards
 - b. Telephone: 919-365-2337
 - c. FAX: 919-365-1337
 - d. EMAIL: doug.edwards@siemens.com
5. Statement of why an extension is required. This should include a description of what the working group has accomplished and what remains to be accomplished, along with the reasons why the work was unable to be completed in the allotted timeframe The document has been balloted and is in the process of resolving ballot comments. The delays were primary due to hot discussions but resolutions of these issues are being resolved. Recirculation ballot should be initiated in November 2006 and the controversial issues are being resolved.
6. History
 - a. What date was the PAR first approved? 11-Dec-02
 - b. What date did you begin writing the first draft? 1-Jan-00
 - c. How many people are actively working on the project? 8
 - d. How many times a year does the working group meet:
 1. In person? 2
 2. Via teleconference? 2
 - e. How many times a year is a draft circulated to the working group via electronic means? 3
7. Document Progress
 - a. What percentage of the Draft is stable? 95%
 - b. How many significant work revisions has the Draft been through? 17
8. Project Plan

(Item #8a is only for projects that have been balloted. If your draft has not yet gone to ballot, please go to Item #8b)

 - a. Balloting History - Provide history of all IEEE Sponsor ballots under this project::

1st Ballot Close date (or scheduled close): 2005-10-26

1st Ballot Draft Number: 15

1st Ballot results (% affirmative, %negative, %abstain): 87.1% Affirmative, 12.9% Negative, 4.6% Abstain

2nd Ballot Close date (or scheduled close):

2nd Ballot Draft Number:

2nd Ballot results (% affirmative, %negative, %abstain):

(Add additional entries for ballots as needed):

When do you estimate that the final IEEE Sponsor ballot will be completed? 1-Jun-07

When do you expect to submit the proposed standard to RevCom? 1-Jun-07

b. For projects that have not yet begun Sponsor ballot, please answer the following:

When will IEEE sponsor balloting begin?

When do you estimate that the final IEEE Sponsor ballot will be completed?

When do you expect to submit the proposed standard to RevCom?

9. Future Adoptions

- If this is a new document, will it be adopted (in part or in whole) by another national, regional or international organization? No If yes, which organization?
- If this is a revision of an existing document, has this document been adopted by the IEC, ISO, ETSI, SCC, etc? No If yes, which organization?

10. Additional Extensions

a. Is this the first request for an extension? Yes (If yes, please do not go any further. You have completed the form.)

b. If not, when was the previous extension approved?

After completion of this form, please e-mail this to the NesCom Administrator at nescom-admin@ieee.org. Confirmation of submittal will be sent on receipt of this request.

[Email This Letter](#)

23 September 2005

M. Dean Sigmon
ABB Inc.
2300 Mechanicsville Road
Florence, SC 29501-0524
michael.d.sigmon@us.abb.com

Re: PC37.13 - Standard for Low-Voltage AC Power Circuit Breakers Used in Enclosures

Dear M. Dean:

I am pleased to inform you that on 22 September 2005 the IEEE-SA Standards Board approved the above referenced project until 31 December 2006. A copy of the file can be found on our website at <http://standards.ieee.org/board/nes/projects/C37-13.pdf>.

Now that your project has been approved, please forward a roster of participants involved in the development of this project. This request is in accordance with the IEEE-SA Operations Manual, Clause 5.1.2i under Duties of the Sponsor which states:

"Submit annually to the IEEE Standards Department an electronic roster of individuals participating on standards projects"

For your convenience, an Excel spreadsheet for your use has been posted on our website at <http://standards.ieee.org/guides/par/roster.xls>. Please forward this list to me via e-mail at j.haasz@ieee.org no later than 21 December 2005.

Please visit our website, IEEE Standards Development Online (<http://standards.ieee.org/resources/development/index.html>), for tools, forms and training to assist you in the standards development process. Also, we strongly recommend that a copy of your draft be sent to this office for review prior to the final vote by the working group to allow for a quick review by editorial staff before sponsor balloting begins.

If you should have any further questions, please contact me at 732-562-6367 or by email at j.haasz@ieee.org.

Sincerely,

Jodi Haasz
Program Manager
International Stds Programs and Governance
Standards Activities
Phone +1 732 562 6367
FAX +1 732 875 0695
Email: j.haasz@ieee.org

CC: jeffnelson@ieee.org, doug.edwards@siemens.com, stds-pes-scc@ieee.org

PAR FORM

PAR Status: Modified Revision PAR

PAR Approval Date: 2005-09-22

PAR Signature Page on File: Yes

1. Assigned Project Number: PC37.13

2. Sponsor Date of Request: 2005-08-09

3. Type of Document:

4. Title of Document:

Draft: Standard for Low-Voltage AC Power Circuit Breakers Used in Enclosures

5. Life Cycle: Full-Use

6. Type of Project:

6a. Is this an update to an existing PAR? Yes

If Yes: Indicated PAR number/approval date: C37.13 - 2002-12-11

If Yes: Is this Project in Ballot now? No

6b. The Project is a: Revision of Std C37.13-1990

7. Working Group Information:

Name of Working Group: Low-Voltage AC Power Circuit Breakers Used in Enclosures
Working Group

Approximate Number of Expected Working Group Members:9

8. Contact information for Working Group Chair:

Name of Working Group Chair: Douglas J Edwards

Telephone: 919-365-2337 **FAX:** 919-365-1337

Email: doug.edwards@siemens.com

9. Contact information for Co-Chair/Official Reporter, Project Editor or Document Custodian if different from the Working Group Chair:

Name of Co-Chair/Official Reporter, Project Editor or Document Custodian:

Telephone: FAX:

Email:

10. Contact information for Sponsoring Society or Standards Coordinating Committee:

Name of Sponsoring Society and Committee: IEEE Power Engineering Society Switchgear

Name of Sponsoring Committee Chair: Jeffrey H Nelson

Telephone: 423 751 8275 **FAX:** 423 751 6238

Email: jeffnelson@ieee.org

Name of Liaison Rep. (if different from the Sponsor Chair): M. Dean Sigmon

Telephone: 843-413-4707 **FAX:** 843-413-4850

Email: michael.d.sigmon@us.abb.com

Name of Co-Sponsoring Society and Committee:**Name of Co-Sponsoring Committee Chair:****Telephone: FAX:****Email:****Name of Liaison Rep. (if different from the Sponsor Chair):****Telephone: FAX:****Email:****11. The Type of ballot is:** Individual Sponsor Ballot**Expected Date of Submission for Initial Sponsor Ballot:** September 2005**12. Projected Completion Date for Submittal to RevCom:** July 2006**Target Extension Request Information for a Modified PAR whose completion date is being extended past the original four-year life of the PAR:****13. Scope of Proposed Project:**

[Original (1990) Scope]: The scope of this standard includes enclosed low-voltage ac power circuit breakers, as follows: (1) Stationary or draw-out type of two- or three-pole construction, with one or more rated maximum voltages of 635 V (600 V for units incorporating fuses), 508 V, and 254 V for application on systems having nominal voltages of 600 V, 480 V, and 240 V. (2) Unfused or fused type (3) Manually operated or power operated, with or without electromechanical or solid-state trip devices. NOTE: In this standard the term circuit breaker shall mean enclosed low-voltage ac power circuit breaker, either fused or unfused. The term unfused circuit breaker shall mean a circuit breaker without integral fuses, and the term fused circuit breaker shall mean a circuit breaker incorporating current limiting fuses as an integral part of the circuit breaker. [New Scope of document]: The scope of this standard includes enclosed low-voltage ac power circuit breakers, as follows: a) Stationary or drawout type of two-, three-pole, or four-pole construction, with one or more rated maximum voltages of 635 V (600 V for units incorporating fuses), 508 V, and 254 V for application on systems having nominal voltages of 600 V, 480 V, and 240 V. b) Unfused or fused type c) Manually operated or power operated, with or without electromechanical or electronic trip devices. d) Fused drawouts consisting of current-limiting fuses in a drawout assembly intended to be connected in series with a low-voltage ac power circuit breaker to form a nonintegrally fused circuit breaker. NOTE In this standard the term circuit breaker shall mean enclosed low-voltage ac power circuit breaker, either fused or unfused. The term unfused circuit breaker shall mean a circuit breaker without integral fuses, and the term fused circuit breaker shall mean a circuit breaker incorporating current-limiting fuses. This document applies to both integrally and nonintegrally fused circuit breakers. For nonintegrally fused circuit breakers, reference IEEE C37.27/D9 (July 25, 2005) for additional application information.

Is the completion of this document contingent upon the completion of another document?

No

C37.27 is also an approved project and is ready for ballot. C37.13 and C37.27 are related to each other, were revised by joint working group, and are planned to be balloted simultaneously.

14. Purpose of Proposed Project:

[Original (1990) purpose]: The original C37.13-1990 does not include a statement of purpose.

15. Reason for the Proposed Project:

[New purpose of document]: The structure of the standard is not changed from the original C37.13-1990 standard and thus does not include a purpose of document statement. Purpose of this project: The project will modify all dimensional information to provide metric dimensions. This is necessary to gain global acceptance of this standard. Changes will be made to coordinate with related standards (e.g. C37.20.1-2002 - Standard for Metal-Enclosed Low-Voltage Power Circuit Breaker Switchgear, C37.50-R2000 - Switchgear Low Voltage AC Power Circuit Breakers Used in Enclosures - Test Procedures, and C37.51-R1995 - Switchgear Metal Enclosed Low Voltage AC Power Circuit Breaker Switchgear Assemblies - Conformance Test Procedures). Updates associated with the extensive use of electronic trip devices on low-voltage breakers are to be reviewed and detailed. The stakeholders include users, manufacturers, purchasers, and those performing maintenance on low-voltage power circuit breakers.

16. Intellectual Property:

- a. Has the IEEE-SA policy on intellectual property been presented to those responsible for preparing/submitting this PAR?** Yes 2005-05-09
- b. Is the sponsor aware of copyright permissions needed for this project?** No
- c. Is the sponsor aware of trademarks that apply to this project?** No
- d. Is the sponsor aware of possible registration activity related to this project?** No

17. Are there other documents or projects with a similar scope? No

Similar Scope Project Information:

18. Is there potential for this document (in part or in whole) to be adopted by another national, regional or international organization? Do not know at this time

If yes, the following questions must be answered:

Organization Name?

Technical

Committee

International

Contact

Information?

19. Will this project result in any health, safety, or environmental guidance that affects or applies to human health or safety? Yes

If yes, please explain:

Safe operation of circuit breakers based on the circuit breaker construction, rating structure, and testing are included in the standard.

20. Sponsor Information

- a. Is the scope of this project within the approved/scope/definition of the Sponsor's**

Charter? Yes

If no, please explain:

b. The Sponsor's procedures have been accepted by the IEEE-SA Standards Board Audit Committee? Yes

21. Additional Explanatory Notes: (Item Number and Explanation)

The document is ready for ballot now and is only pending revision of this PAR. The PAR revision is associated only with the Scope of the project (reference item 13). The Scope is revised to: (1) include four-pole construction for harmonization with C37.20.1-2002, (2) correct terminology used for trip devices from "solid-state" to "electronic" for harmonization with C37.17 (under revision), and (3) include non-integrally fused circuit breakers and to add reference to C37.27 (under revision).