

POWER SYSTEM RELAYING AND CONTROL COMMITTEE, 2025

Scope: Treatment of all matters Energy Society and associated Groups and Societies of the in which the dominant factors are the application, design, construction, and operation of protective, regulating, monitoring, synchronism-check, synchronizing, reclosing, and auxiliary relays, including all matters necessary to the function of such relays and relaying systems employed in the generation, transmission, distribution, and utilization of electrical energy and including the effects of such relays on system operation. Treatment of techniques and requirements for communications within, between, and among protective relays, to the extent that these communications affect protection functions or performance. Maintenance of liaison and collaboration as required with other committees of the Power & Energy Society of the IEEE. Web Site: <http://www.pes-psrc.org/>

Officers:

Gene Henneberg, Chair
NV Energy
Reno, NV

James K. Niemira, Vice-Chair
S&C Electric Company
Chicago, IL

Gary Kobet, Secretary
Tennessee Valley Authority
Knoxville, TN

Erin Jessup,
Standards Coordinator,
Schweitzer Engineering
Laboratories
Pullman, WA

Members:

Adamiak, M.
Antonova, G.
Apostolov, A.
Bapary, A.
Barsch, J.
Beckwith, T.
Bell, T.
Billaut, S.
Black, M.
Blumschein, J.
Bolado, O.
Boysen, B.
Brahma, S.
Brunner, C.
Bukhala, Z.
Carlson, R.
Cease, T.
Chowdhury, R.
Conrad, S.
Cooper, S.
Dahlin, T.

Dalton, C.
Das, M.
Das, R.
Davies, B.
Deronja, A.
Donahoe, K.
Dood, M.
Elkin, P.
English, W.
Eruneo, J.
Farantatos, E.
Finney, D.
Fischer, N.
Fodero, K.
Gamble, R.
Garavaglia, L.
Garcia, R.
Garg, K.
Gers, J.
Goldstein, A.
Haas, D.
Hamilton, R.
Hartmann, W.
Higginson, M.
Hu, Y.
Hunt, R.
Huntley, C.
Johnson, T.
Jones, K.
Kanabar, M.
Kao, M.
Kazimeir, B.
Kim, S.
Klecker, S.
Knapek, W.
Kockott, M.
Kumar, P.
Kunsman, S.
Ladner, H.
Lascu, R.
Lewey, B.
Lockart, C.
Mackie, B.
Madani, V.
Magruder, B.
Makki, A.
Maragal, D.
Martin, A.
Martin, K.
Martin, T.
Meisinger, M.
Midence, M.
Miller, D.
Mix, S.
Monterrubio, H.
Mugalian, B.
Mulawarman, A.
Mysore, P.
Nagpal, M.
Nesbit, B.
O'Brien, J.
Ouellette, D.
Patel, Mahendra
Patel, Manish
Patterson, R.
Patti, C.
Preuss, C.
Qiu, Q.
Rahmatian, F.
Ramirez, M.
Ranieri, M.
Ryan, G.
Sevov, L.

Sufana, C.
Swanson, M.
Sykes, J.
Tatro, P.
Tempone, A.
Theron, J.
Thibodeau, E.
Tualla, I.
Turner, S.
Udren, E.
Uribe, A.
Vandiver, B.
Venkata, M.
Verzosa, J.
Voloh, I.
Walker, C.
Ware, D.
Warren, T.
Weisz, D.
Yalla, M.
Zhang, Z.
Zimmerman, K.
Zvarych, A.

Honorary Members

*Carpenter, M.
*Dempsey, B.
*Dickerson, B.
*Friend, F.
*Henville, C.
*Jodice, J.
*McDonald, M.
*Murphy, J.
*Nail, G.
*Pettigrew, B.
*Phadke, A.
*Sachdev, M.
*Sanders, M.
*Seegers, T.
*Winston, P.

B: ADVISORY SUBCOMMITTEE

Scope: Assist the Chair of the PSRC on all matters that he may request in the functioning, direction, and conduct of the work of the Main Committee. (Main Committee Officers, Subcommittee Chairs and past PSRC Chairs)

Gene Henneberg, Chair
NV Energy
Reno, NV

James K. Niemira, Vice-Chair
S&C Electric Company
Chicago, IL

Chowdhury, R.
Dalton, C.
Davies, B.
English, W.
Gamble, R.
Henville, C.
Higginson, M.
Jessup, E.
Kao, M.
Kazimier, B.
McDonald, M.
Monterrubio, H.

Mysore, P.
Patterson, R.
Sanders, M.
Swanson, M.
Tempone, A.
Thompson, M.
Uribe, A.
Winston, P.
Yalla, M.

B1: AWARDS AND TECHNICAL PAPER RECOGNITION

Assignment: Nominate PSRC-sponsored papers, standards, and reports for PES Technical Council and IEEE awards. To nominate individual members for award recognition. (Sub Committee Vice-Chairs).

Andre Uribe, Chair
Qualus Power Services
Lake Mary, Florida

Mal Swanson, Vice-Chair
MJ Swanson Assoc
Windham, NH

Miguel Rios, Secretary
Southern Company
Dunwoody, GA

Deronja, A.
Eruneo, J.
Garg, K.
Jessup, E.
Kanabar, M.
Martin, T.
Mugalian, B.
Patel, M.

B2: FELLOWS AWARDS

Assignment: Assist PSRC sponsors with advice on the Fellow nomination process. To access the background of Fellow nominees and aid the PSRC in preparation of required documents.

Jonathan Sykes, Chair
Quanta Technology, LLC
Albuquerque, NM

Ken Martin, Vice Chair
Portland, OR

Eric Udren
Quanta Technology, LLC
Pittsburgh, PA

Boyle, J.
Brahma, S.
Brunner, C.
Carpenter, M.
Chan, S.
Dickerson, B.
Dong, X.
Fischer, N.
Henneberg, G.

Henville, C.
Hu, Y.
Ibrahim, M.
Jodice, J.
Kasztenny, B.
Madani, V.
McLaren, P.
Mozina, C.
Novosel, D.
Patel, M.
Phadke, A.
Rahmatian, F.
Ray, R.
Sachdev, M.
Skendzic, V.
Sykes, J.
Udren, E.
Venkata, S.
Ward, S.
Yalla, M.

B3: MEMBERSHIP

Assignment: Provide assistance in searching for new participants who have qualifications for eventual membership. Assist in maintaining diversity of expertise among active members and participants. Provide assistance, where appropriate, for those needing help gaining support of the organization where they are employed.

Mal Swanson, Chair
MJ Swanson Associates
Windham, NH

Catherine Dalton, Vice-Chair
& Secretary
EPRI
Duluth, GA

B4: LONG RANGE PLANNING

Assignment: The primary function of the Long Range Task Force is to act in an advisory capacity to the Chair of the PSRC. They will discuss and analyze developments in various fields of Electric Power Engineering as they affect the activity of the Power System Relaying Committee. They are to advise the Officers of PSRC if any changes in the organization and operation of the PSRC are desirable. The membership of the Long Range Task Force is limited to ex-Chairs of PSRC.

Michael Thompson, Chair
SEL Engineering Services
Fairview Heights, IL

Dempsey, R.
Henville, C.
McDonald, M.
Mysore, P.
Patterson, R. W.
Pettigrew, R.
Sanders, M.

Winston, P.
Yalla, M.

B5: PUBLICITY WORKING GROUP

Assignment: Promote the activities of IEEE PES PSRC to enhance global awareness and membership by utilizing outreach strategies that showcase PSRC's contributions to the principles and applications of power system protective relaying and control.

Catherine Dalton, Chair
EPRI
Duluth, GA

Mal Swanson,
Vice-Chair & Secretary
MJ Swanson Associates
Windham, NH

B8: O&P MANUAL REVISION AND WORKING GROUP CHAIR TRAINING

Assignment: Revise and amend PSRC Organization and Procedure Manual when directed to do so by the PSRC Chair. Conduct working group Chair forums on procedures and training.

Ritwik Chowdhury, Chair
Schweitzer Engineering
Laboratories
Charlotte, NC

Jason Eruneo, Vice Chair
Duke Energy
Tampa, FL,

B9: PSRC WEB SITE

Assignment: Provide assistance in setting up Web Sites and maintaining the PSRC Web Site.

Rick Gamble, Chair
TVA
Chattanooga, TN

Abu Zahid, Vice-Chair
Hydro One Network, Inc.
Toronto, ON

B10: INVERTER BASED RESOURCES STEERING

Assignment: Coordinate between the leadership of the various working groups doing projects related to IBR impacts on power system protection and operation.

Gene Henneberg, Chair
NV Energy
Reno, NV

James K. Niemira, Vice-Chair
S&C Electric Company
Chicago, IL

Boemer, J.
Bauer, R.
Brahma, S.
Eruneo, J.
Farantatos, E.
Hooshyar, A.
Jones, K.
Kazimier, R.
Mysore, P.
Nagpal, M.
Patel, M.
Voloh, I.

B11: SC21 DISTRIBUTED RESOURCES STANDARD COORDINATION

Assignment: To interface with SCC21/P1547 in order to reduce unnecessary delays by getting PSRC input into the process without having to wait for after-the-fact coordination.

R. Ben Kazimier, Chair
Beckwith Electric
Knoxville, TN

Wayne Stec, Vice-Chair
Distregen, LLC
Flower Mound, TX

Mat Garver, Secretary
Beckwith Electric
Largo, FL

Allnutt, J.
Baker, P.
Conrad, S.
Cummings, R.
Gers, J.
Kifle, A.
Miller, D.
Pickett, B.
Rios, M.
Siira, M.
Sufana, C.

C: SYSTEMS PROTECTION SUBCOMMITTEE

Scope: Evaluate protection system responses to abnormal power system states. Evaluate and report on special protection schemes, remedial actions schemes, monitoring and control systems and their performance during abnormal power system conditions. Recommend corrective strategies and develop appropriate standards, guides, or special publications. Evaluate and report on new technologies which may have a bearing on protection system performance during abnormal power system conditions.

Michael Higginson, Chair
S&C Electric Company
Chicago, IL

Manish Patel, Vice-Chair
Electric Power Research
Institute
Swanee, GA

Anderson, J.
Antonova, G.
Apostolov, A.
Bapary, A.
Black, M.
Blumschein, J.
Brahma, S.
Byun, R.
Cease, T.
Chowdhury, R.
Deronja, A.
Farantatos, E.
Fowler, R.
Garg, K.
Gharpure, V.
Goldstein, A.
Gurusinghe, D.
Henneberg, G.
Hooshyar, A.
Hu, Y.
Hunt, R.
Jones, K.
Kanabar, M.
Kazimier, R.
Kifle, A.
Klecker, S.
Kobet, G.
Kockott, M.
Lascu, R.
Martin, K.
Meisinger, M.
Miller, D.
Moncey, M.
Myrda, P.
Nagpal, M.
O'Brien, J.
Ouellette, D.
Perera, N.
Rahmatian, F.
Reckerd, D.
Rios, M.
Sykes, J.
Tuladhar, L.
van de Ligt, J.
Vandiver, B.
Venkata, S.
Verzosa, Q.
Walker, C.
Ware, D.
Zamani, A.

C23: COORDINATION OF SYNCHROPHASOR RELATED ACTIVITIES

Assignment: The ongoing task force will provide three main functions:

- Liaison with NASPI (North American Synchrophasor Initiative) (specifically the PRSVTT (Performance Requirements, Standards and Verification Task Team)) to keep the PSRC in sync with the changes and needs

in the industry with respect to the development and usage of PMU devices. Formalize transfer process of PRSVTT developed documents to PES PSRC including making recommendations which PRSVTT activities should be transferred to IEEE reports, guides and standards.

- Make recommendations to PSRC for assignments that would require the creation of working groups in PSRC and also recommend what the output of those working groups might be (Guides, reports, etc.) based on the needs of the industry.
- Coordinate related activities with other IEEE PES committees.

Yi Hu, Chair
Quanta Technology
Raleigh, NC

Gustavo Brunello, Vice-Chair & Secretary
Mississauga, ON, Canada

Dagle, J.
Das, R.
Gharpure, V.
Goldstein, A.
Huntley, C.
Johnson, A.
Kanabar, M.
Maragal, D.
Martin, K.
Myrda, P.
O'Brien, J.
Ouellette, D.

C29: POWER SYSTEM TESTING METHODS FOR POWER SWING BLOCKING AND OUT-OF-STEP TRIPPING

Assignment: Create a tutorial on test instructions / parameters to accompany the PSRC documents Application of Out-Of-Step Protection Schemes for Generators, and Tutorial for Setting Impedance Based Power Swing Relaying on Transmission Lines, to aid the users in quality testing of their settings and systems when following the working group outputs which recommend testing of complex relay settings and systems.

Kevin Jones, Chair
Xcel Energy
Amarillo, TX

Michael Kockott, Vice-Chair & Secretary,
ABB
Raleigh, NC

Aquiles-Perez, S.
Candelaria, J.
Carvalho, E.
Casilla, N.
*Conrad, S.
Cooper, J.
*Das, R.
Dempsey, R.
Eruneo, J.
Fowler, R.
*Gokaraju, R.
Henneberg, G.
Hilaly, M.
Kasztenny, B.
Kobet, G.
*Lee, V.
*Liao, Y.
Lu, Y.
Malson, H.
Maragal, D.
*Osman, M.
*Pettigrew, R.
Polanco, L.
*Rajapakse, A.
Ruiz, J.
Schroeder, L.
Sykes, J.
Thakur, S.
Turner, S.
Vakili, A.
van de Ligt, J.
Vandiver, B.
Verzosa, Q.
Wilson, J.
Yang, L.
*Zadeh, M.
Zheng, C.

C33: SUPPORT FOR WG-P2004 "RECOMMENDED PRACTICE FOR HARDWARE-IN-THE-LOOP (HIL) SIMULATION BASED TESTING OF ELECTRIC POWER APPARATUS AND CONTROLS"

Assignment: Support the development of the IEEE Recommended Practice in Cooperation with PELS, IAS, and IES efforts. (P2004 Chair Georg Lauss, Austrian Institute of Technology, Vienna, Austria; P2004 Vice-Chair Blake Lundstrom, Enphase Energy, Austin, TX.

Dean Ouellette, Chair
RTDS Technology, Inc.
Winnepeg, MB CA

Sakis Meliopoulos, Vice-Chair
GA Institute of Technology,
Atlanta, GA

Aaron Findley, Secretary
Power Engineers,
Brush Prairie, WA

Devarakonda, D.
Gurusinghe, D.
Johnson, A.
Maragal, D.

Patel, M.
Reno, M.
van de Ligt, J.
Ware, D.

C38: P2030.12 GUIDE FOR THE DESIGN OF MICROGRID PROTECTION SYSTEMS

Assignment: To create P2030.12, Guide for the Design of Microgrid Protection Systems

S.S. Mani Venkata, Chair
Venkata Consulting
Solutions, Inc.
Oro Valley, AZ

Michael Higginson, Vice-Chair
S&C Electric Company
Chicago, IL

Geza Joos, Secretary
McGill University
Montreal, QC, Canada

Bloder, M.
Bower, W.
Boysen, B.
Brahma, S.
Brunello, G.
Dadash Zadeh, M.
Das, R.
Earle, J.
Elkin, P.
Fowler, R.
Friend, F.
Garg, K.
Hamilton, R.
Jafari, R.
Kamalasadan, S.
Kazimier, R.
Khalilpour, F.
Klecker, S.
Lascu, R.
Liao, Y.
Meliopoulos, A.
Mulawarman, A.
Nagpal, M.
Nair, N.
Narendra, K.
Nyombi, P.
Patel, M.
Patel, M.
Reno, M.
Richardson, P.
Roop, M.
Shepard, N.
Tuladhar, L.
Udren, E.
van de Ligt, J.
Ware, D.
Xavier, J.
Zamani, A.

C40: PREPARE A TUTORIAL FROM THE WORK OF C37.247 STANDARD FOR PHASOR DATA CONCENTRATORS STANDARD, C37.118.2, SYNCHROPHASOR DATA TRANSFER FOR POWER SYSTEMS

Assignment: Develop a publication (transaction and/or conference), a tutorial and a presentation based on C37.247-2019: the standard for Phasor Data Concentrators for power systems.

Vasudev Gharpure, Chair
Quanta Technology
Raleigh, NC

Mittal Kanabar, Vice-Chair & Secretary
GE
Markham, ON, CA

Antonova, G.

C41: PREPARE A TECHNICAL REPORT ON THE PERFORMANCE REQUIREMENTS FOR DISTRIBUTION PMUS

Assignment: Examine the measurement performance requirements for PMUs that are intended for use in distribution systems. This will include examination of the measurement environment, detailing the data requirements of phasor based distribution applications, and supporting liaisons with other groups working with synchrophasors in the distribution environment including other IEEE TCs, NASPI, NERC, and IES.

Ken Martin, Chair
Electric Power Group
Portland, OR

Nuwan Perera, Vice-Chair
Stantec
Winnipeg, MB CA

Dinesh Gurusinghe, Secretary
RTDS Technologies Inc.
Winnipeg, MB CA

Brunello, G.
Ding, X.
Dogan, R.
Elsaied, A.
Huang, L.
Kanabar, M.
Kirby, B.
Koenig, M.
Laverty, D.
Moutis, P.
Narendra, K.
Nuthalapati, S.
Paolone, M.
Rahmatian, F.
Rietveld, G.
Romano, P.
Saba, D.
Shanmugasundaram, V.
Shi, B.
Shrawane, P.

Udren, E.
Von Meier, S.

C43: USE OF ARTIFICIAL INTELLIGENCE AND MACHINE LEARNING FOR POWER SYSTEM PROTECTION AND CONTROL

Assignment: Prepare a report summarizing existing and new practical applications and challenges to use Artificial Intelligence and Machine Learning technologies for power system protection and control.

Yi Hu, Chair
Quanta Technology
Raleigh, NC

Adi Mulawarman, Vice-Chair
Xcel
Minneapolis, MN

Zheyuan Cheng, Secretary,
Quanta
Raleigh, NC

Apostolov, A.
Arbona, C.
Bidram, A.
Billaut, S.
Blumschein, J.
Brahma, S.
Das, R.
Elandalousi, A.
Fowler, R.
Kamalasadan, S.
Liu, Y.
Madani, V.
Nair, N.
Piñeros, J.
Ponraj, J.
Rajapakse, A.
Raymond, J.
Reno, M.
Sabin, D.
Yin, Y.

C45: PROTECTION AND SHORT-CIRCUIT MODELING OF SYSTEMS WITH HIGH PENETRATION OF INVERTER-BASED RESOURCES

Assignment: To prepare a technical report to investigate short-circuit modeling and protection of systems with high penetration of IBRs as a continuation of the works of WGs C32 and C24

Ali Hooshyar, Chair
University of Toronto
Toronto, ON CA

Manish Patel, Vice-Chair
Electric Power Research Institute
Suwanee, GA

Ritwik Chowdhury, Secretary
Schweitzer Engineering Laboratories
Charlotte, NC

Alkraimeen, Y.
Alla, M.
Banaie, A.
*Banerjee, K.
Bauer, R.
Bidram, A.
Billaut, S.
Brahma, S.
Chakrapani, V.
Chan, S.
Das, R.
Eruneo, J.
Farantatos, E.
Garg, K.
Gokaraju, R.
Goldstein, A.
Haddadi, A.
*Henville, C.
*Hernandez, G.
Higginson, M.
Jafari, R.
Jensen, M.
*Johnson, B.
Kamalasadan, S.
Kocar, I.
Liao, Y.
*Lockhart, C.
*McDaniel, R.
Miller, S.
Miller, T.
Mulawarman, A.
Nagpal, M.
*Raghuraman, P.
Rajapakse, A.
Reno, M.
*Saeed, A.
*Samineni, S.
*Schroeder, L.
Sun, C.
*Taylor, D.
*Thompson, M.
*Torres, H.
Tuladhar, L.
Voloh, I.
*Zadeh, M.
Zamani, A.

CTF47: RELAY MODELING IN ELECTROMECHANICAL DYNAMIC SIMULATIONS

Assignment: Contribute to the report of the Power System Dynamic Performance (PSDP) committee TF "Integrating Relay Models with RMS Dynamic Simulations"

Evangelos Farantatos, Chair
EPRI
Palo Alto, CA

Mohammad Zadeh, Vice-Chair
ETAP
Irvine, CA

Haddadi, A.
Lascu, R.
Patel, M.

Reno, M.
Zahid, A.
Zamani, A.

C48: SUMMARY / IEEE TRANSACTIONS PAPER DEVELOPMENT FOR C37.120 IEEE GUIDE FOR PROTECTION SYSTEM REDUNDANCY FOR SYSTEM RELIABILITY

Assignment: Write a summary and IEEE Transactions papers for C37.120 IEEE Guide for Protection System Redundancy for Power System Reliability

Alla Deronja, Chair
ATC
Waukesha, WI

Melvin Moncey Joseph, Vice-Chair
Burns & McDonnell
Austin, TX

Chowdhury, R.
Donahoe, K.
Kiffle, A.
Malpede, K.
Palmer, C.
Patel, M.
Pinerios, J.
Tempone, A.
Ware D.

C50: PROTECTION OF INVERTER BASED RESOURCES

Assignment: Investigate the need to revise and expand the PES Technical Report "PES-TR87: Protection of Wind Electric Plants" to explicitly address and include other types of IBR plants (e.g. Battery Energy Storage Systems and Solar PV Systems).

Brandon Davies, Chair
TRC
Augusta, ME

Amin Zamani, Vice-Chair
Quanta Technology
Toronto, OT, Canada

Beheshti, M.
Buchanan, D.
Chowdhury, R.
Eruneo, J.
Kamm, N.
Konuku, R.
Lascu, R.
Lockhart, C.
Nyombi, P.
Patel, M.
Patel, P.
Reno, M.
Sun, C.
Underwood, A.
Velez, J.
Zadeh, M.

C51: REPORT ON UNDERFREQUENCY EXCURSION MITIGATION STRATEGIES WITH CHANGING GENERATION RESOURCE MIXES

Assignment: Prepare a technical report on underfrequency excursion mitigation strategies for changing generation resource mixes in the bulk power system

Kevin Jones, Chair
Xcel Energy
Amarillo, TX

Chase Lockhart, Vice-chair
1898 & Co.
Orlando, FL

Gonzalez Gomez, A.
Malpede, K.
Patel, M.
Rios, M.
Underwood, A.

C52: REVISE C37.246, IEEE GUIDE FOR PROTECTION SYSTEMS OF TRANSMISSION-TO-GENERATION INTERCONNECTIONS

Assignment: Revise IEEE Guide C37.246-2017, IEEE Guide for Protection Systems of Transmission-to-Generation Interconnections

Melvin Moncey Joseph, Chair
Burns & McDonnell
Austin, TX

Mike Jensen, Vice-Chair
Pacific Gas & Electric
Fresno, CA

Muhammad Hamid, Secretary
Black & Veatch
Dallas, TX

Agyekum, F.
Buchanan, D.
Byreddy, S.
Daub, M.
Elhaj, F.
Haines, M.
Higginson, M.
Kabra, S.
Karyawasam, S.
Kifle, A.
King, M.
Lebeau, D.
Lockhart, C.
Martin, T.
Palmer, C.
Park, J.
Patel, M.
Patel, P.
Perera, N.
Saeed, A.
Sevov, L.

Tualla, I.
Tuladhar, L.
Varghese, L.

C53: COLLECTION, MANAGEMENT, AND ANALYSIS OF PROTECTION & CONTROL DATA SETS FOR ARTIFICIAL INTELLIGENCE AND MACHINE LEARNING APPLICATIONS

Assignment: Develop an IEEE PES technical report summarizing the collection, management, and analysis of protection & control data sets for artificial intelligence and machine learning applications.

Dan Sabin, Chair
Schneider Electric
Andover, MA

No Roster Available

C54: DATA CENTER PROTECTION, AUTOMATION, AND CONTROL SYSTEMS

Assignment: Write a technical report to describe common architecture and functional requirements of HV/MV Protection, Automation, Control and Monitoring Systems for Data Centers.

Andre Melo, Chair
Schneider Electric
San Juan de Aznalfarache, Spain

No Roster Available

CTF55: SYNCHRO-WAVEFORM / CONTINUOUS POINT-ON-WAVE / SYNCHRONIZED MEASUREMENTS

Assignment: Investigate the industry need for a relevant standard or report for Synchro-Waveform/ Continuous Point-On-Wave/Synchronized Measurement.

Shane Haveron, Chair
Ametek
Belfast, UK

No Roster Available.

CTF56: IEEE 1547.7 GUIDE FOR CONDUCTING IMPACT STUDIES FOR DISTRIBUTED ENERGY RESOURCE INTERCONNECTION COLLABORATION

Assignment: Contribute to the IEEE 1547.7 Guide for Conducting Impact Studies for

Distributed Energy Resources Interconnection.

Sean Carr, Chair
ComEd
Oakbrook Terrace, IL

Craig Holt, Vice-Chair
Sargent & Lundy
Arvada, CO

No Roster Available.

D: LINE PROTECTION SUBCOMMITTEE

Scope: Investigate and report on the relaying techniques and systems used for transmission and distribution (T&D) line protection. Develop statistics and recommend protection practices for improving line relaying performance. Develop and maintain standards for line protection.

Meyer Kao, Chair
Qualus
Atlanta, GA

Alla Deronja, Vice-Chair
ATC
Waukesha, WI

Antonova, G.
Barsch, J.
Billaut, S.
Blumschein, J.
Boysen, B.
Brunello, G.
Conrad, S.
Fischer, N.
Gamble, R.
Hamid, M.
Garg, K.
Hayes, S.
Hughes, J.
Jones, K.
Klecker, S.
Kobet, G.
Kockott, M.
Lamb, J.
Lascu, R.
Lewey, B.
Lukach, D.
Mackie, B.
Miller, D.
Moncey Joseph, M.
Mulawarman, A.
Mysore, P.
O'Brien, J.
Patel, M.
Patterson, R.
Patti, C.
Perera, N.
Ryan, G.
Sufana, C.
Sykes, J.
Tualla, I.
Tuladhar, L.
Udren, E.
Voloh, I.
Walker, C.
Warren, J.

Zahid, A.
Zamani, A.
Zimmerman, K.

D29: TUTORIAL FOR SETTING IMPEDANCE-BASED POWER SWING RELAYING ON TRANSMISSION LINES

Assignment: Create a tutorial on setting impedance-based power swing blocking and out-of-step tripping functions related to transmission line applications. Specific relay settings examples will be provided. Other methods of detecting out-of-step conditions that exist will be summarized and referenced but will not be addressed in detail.

Kevin Jones, Chair
Xcel Energy
Amarillo, TX

Normann Fischer, Vice-Chair & Secretary
Schweitzer Engineering Laboratories
Pullman, WA

Alla, M.
*Aguiles-Perez, S.
*Banerjee, K.
Bapary, A.
Blumschein, J.
*Brahma, S.
Buanno, A.
*Buneo, J.
Candelaria, J.
*Dase, K.
*Hakim, W.
Hamid, M.
Henneberg, G.
Henson, A.
*Hilaly, M.
*Hou, D.
Kao, M.
*Kasztenny, B.
Khatiri, H.
Kockott, M.
Lebeau, D.
Malson, H.
Maragal, D.
Moncey Joseph, M.
*Mulawarman, A.
*Mysore, P.
*Parvin, M.
Patel, Mahendra
Patel, Manish
Polanco, L.
Qiu, Q.
*Tatro, P.
*Vakili, A.
*van de Ligt, J.
Verzosa, Q.
*Warren, J.
Zhang, Zhiying
Zheng, Ce

D30: TUTORIAL ON APPLICATION AND SETTING OF GROUND DISTANCE ELEMENTS ON TRANSMISSION LINES

Assignment: Write a tutorial on the factors affecting the application and setting of ground mho and quadrilateral distance elements on transmission lines.

Karl Zimmerman, Chair
Ameren
St. Louis, MO

J.T. Warren, Vice-Chair & Secretary
Southern Company
Birmingham, AL

Billaut, S.
Blumschein, J.
*Candelaria, J.
Chowdhury, R.
Holt, C.
*Jones, K.
*Ladner Garcia, H.
Lamb, J.
Le, V.
*Lebeau, D.
*Martin, A.
McDaniel, R.
*Newman, A.
Sun, C.
Walker, C.
*Wilson, J.
Zhang, Z.

D34: COORDINATE WITH IEC-60255-187-3 FUNCTIONAL SPECIFICATION FOR LINE CURRENT DIFFERENTIAL

Assignment: Prepare a technical report to the line protection subcommittee to evaluate advantages and disadvantages of common transmission line pilot protection schemes, including POTT, DCB, DCUB, and line current differential. The schemes will be evaluated in terms of speed, sensitivity, dependability and security based on the design and configuration of transmission lines and system topology. A limited number of example systems will be evaluated.

Normann Fischer, Chair
Schweitzer Engineering Laboratories
Pullman, WA

TBD, Vice-Chair & Secretary

No Roster Available.

D35: EVALUATION OF TRANSMISSION LINE PILOT PROTECTION SCHEMES

Assignment: Prepare a technical report to the line protection subcommittee to evaluate advantages and disadvantages of common transmission line pilot protection schemes, including POTT, DCB, DCUB, and line current differential. The schemes will be evaluated in terms of speeds, sensitivity, dependability and security based on the design and configuration of transmission lines and system topology. A limited number of example systems will be evaluated.

Rick Gamble, Chair
TVA
Chattanooga, TN

Brandon Lewey, Vice-Chair & Secretary
Ameren
St. Louis, MO

Anderson, J.
Armstrong, B.
Barsch, J.
Bell, T.
Billaut, S.
Black, M.
Blumschein, J.
Buanno, A.
Deronja, A.
Fontana, D.
Garver, M.
Hakim, W.
Holt, C.
Janssen, B.
JeanJulien, S.
Joshi, B.
Kifle, A.
Klecker, S.
Lamb, J.
Lebeau, D.
Mackie, B.
Martin, A.
Mulawarman, A.
O'Brien, J.
Perera, N.
Richardson, P.
Ryan, G.
Tuladhar, L.
Tziouvaras, D.
Warren, J.
Zahid, A.
Zaitz, Z.

D37: IMPACT OF SERIES COMPENSATION ON TRANSMISSION LINES

Assignment: Prepare a report on the impact of fixed series compensation on transmission line protection

Michael Kockott, Chair
Hitachi Energy
Hertford, NC

Nuwan Perera, Vice-Chair
Power Engineers
Winnipeg, Canada

Melvin Moncey Joseph, Secretary
Black & Veatch
Bryan, TX

Ashrafi, H.
Bapary, A.
Brahma, S.
Findley, A.
Fischer, N.
Garg, K.
Henville, C.
Manna, T.
Maragal, D.
Martin, A.
Miller, D..
Mulawarman, A.
Rajapakse, A.
Tuladhar, L.
Tziouvaras, D.

D38: IMPACT OF HIGH SIR ON LINE RELAYING

Assignment: Prepare a technical report to the line protection subcommittee to evaluate the impact of high SIR on line protection.

Chris Walker, Chair
Walker Consulting Svc.
Ellisville, MO

Greg Ryan, Vice-Chair & Secretary
Ameren
Decatur, IL

Agyekum, F.
Aquiles-Perez, S.
Armstrong, B.
Bainy, R.
Banerjee, K.
Bapary, A.
Barsch, J.
Billaut, S.
Blumschein, J.
Buanno, A.
Chowdhury, R.
Dadash Zadeh, M.
Deronja, A.
Devarakonda, D.
Doak, N.
El Halabi Fares, N.
Fentie, D.
Fischer, N.
Fowler, R.
Gamble, R.
Garg, K.
Gonzalez, A.
Gulczynski, N.
Hamid, M.
Hart, J.
Henneberg, G.
Hilaly, M.
Holt, C.

Hooshyar, A.
James, R.
Janssen, B.
JeanJulien, S.
Jester, J.
Kao, M.
Kasztenny, B.
Khatri, H.
Klecker, S.
Lamb, J.
Lane, J.
Lebeau, D.
Lewey, B.
Lopez, F.
Lukach, D.
Mackie, B.
Malcolm, B.
Martin, T.
McDaniel, R.
Moncey Joseph, M.
Mulawarman, A.
Mysore, P.
Nagpal, M.
Oyebanjo, O.
Perez, J.
Piñeros, J.
Ponraj, J.
Raffield, T.
Sufana, C.
Sykes, J.
Turner, S.
Voloh, I.
Warren, J.
Wilson, J.
Zahid, A.
Zimmerman, K.

D42: REVISE C37.113, GUIDE FOR PROTECTIVE RELAY APPLICATIONS TO TRANSMISSION LINES

Assignment: Revise C37.113-2015, IEEE Guide for Protective Relay Applications to Transmission Lines

Jeff Barsch, Chair
American Electric Power
Pickerington, OH

Rick Gamble, Vice-Chair
TVA
Chattanooga, TN

Josh Lamb, Secretary
Ameren
St Louis, MO

Bapary, A.
*Bell, T.
Billaut, S.
Blumschein, J.
*Boanta, S.
*Brunello, G.
*Buanno, A.
*Byreddy, S.
Chowdhury, R.
Conrad, S.
Deronja, A.
*Fischer, N.
*Fital, J.
Garcia, R.
Garg, K.
Garver, M.

Hamid, M.
*James, R.
Kao, M.
*Khatri, H.
*Klecker, S.
Kockott, M.
Kunze, A.
Lebeau, D.
Lewey, B.
*Lopez, F.
*Lukach, D.
Mackie, B.
*McCannon, W.
McDaniel, R.
Mezco, H.
Moncey Joseph, M.
*Mysore, P.
O'Brien, J.
*Oyebanjo, O.
*Patti, C.
*Paudel, M.
*Pineros, J.
Qiu, Q.
*Quinteros, M.
*Raffield, T.
*Reckerd, D.
Shrestha, A.
Sufana, C.
Tualla, I.
*Usmen, O.
*van de Ligt, J.
*Vasireddy, V.
Voloh, I.
Walker, C.
Warren, J.
Zahid, A.

D43: REPORT, EFFECT OF DISTRIBUTION AUTOMATION ON PROTECTIVE RELAYING

Assignment: Update the technical report, "Effect of Distribution Automation on Protective Relaying"

Greg Ryan, Chair
Ameren IL
Decatur, IL

Amin Zamani, Vice-Chair
GE Renewable Energy - Grid Automation
Toronto, OT, Canada

Joshua Hughes, Secretary
Qualus
Chattanooga, TN

Black, M.
Das, S.
Gers, J.
Konsavage, C.
Lukach, D.
Nordell, D.
Mackie, B.
Maragal, D.
Mulawarman, A.
Oyebanjo, O.
Perera, N.
Shrawane, P.
Wilson, J.

D44: REVISE C37.114, GUIDE FOR DETERMINING FLT LOC ON T AND D LINES

Assignment: Revise C37.114, IEEE Guide for Determining Fault Location on AC Transmission and Distribution Line

Sebastien Billaut, Chair
Commonwealth Associates, Inc
Lake Mary, FL

Karl Zimmerman, Vice-Chair
Ameren
Saint Louis, MO

Looja Tuladhar, Secretary
Commonwealth Associates
Jackson, MS

Arbona, C.
Bapary, A.
Bloder, M.
Blumschein, J.
Boysen, B.
Brahma, S.
Carroll, P.
Chowdhury, R.
Cintron Rivera, J.
Dadash Zadeh, M.
Das, S.
Dase, K.
Fischer, N.
Garver, M.
Gohari, J.
Gokaraju, R..
Gulczynski, N.
Hamid, M.
Hayes, S.
Hou, D.
James, R.
Khatri, H.
Klecker, S.
Kobet, G.
Laughner, T.
Liao, Y.
Liu, Y.
Mackie, B.
Makki, A.
Manel-Ia Pujol, X.
O'Brien, J.
Paudel, M.
Sabin, D.
Schock, E.
Shrestha, A.
Sidhu, H.
Sorensen, D.
Tempone, A.
Wilson, J.
Winston, P.
Yalla, M.
Zimmerman, K.

D45: PROTECTION METHODS TO REDUCE WILDFIRE RISKS DUE TO TRANSMISSION AND DISTRIBUTION

Assignment: Prepare a technical report to the line protection subcommittee to

document protection methods used to reduce wildfire risks due to transmission and distribution lines

Jonathan Sykes, Chair
Quanta Technology, LLC
Albuquerque, NM

Scott Hayes, Vice Chair
Pacific Gas & Electric
Fair Oaks, CA

Antonova, G.
Borland, H.
Chowdhury, R.
*Fischer, N.
Garver M.
*Hartmann, W.
Hou, H.
James, R.
Mackie, B.
Maragal, D.
*Marendic, B.
*Marxsen, T.
Nair, N.
Patterson, R.
Quin, H.
Ransom, D.
Reno, M.
*Taylor, D.
Udren, E.
*Wahlroos, A.
*Xavier, J.
*Yin, Y.
Zamani, A.

D47: REVISE C37.243, IEEE GUIDE FOR APPLICATION OF DIGITAL LINE CURRENT DIFFERENTIAL RELAYS USING DIGITAL COMMUNICATIONS

Assignment: Revise C37.243, IEEE Guide for Application of Digital Line Current Differential Relays Using Digital Communications.

Alla Deronja, Chair
ATC
Waukesha, WI

Steve Klecker, Vice-Chair
Davenport, IA

Galina Antonova, Secretary
Hitachi Energy
Vancouver, BC

Agyekum, F.
Bapary, A.
Black, M.
Blumschein, J.
Byreddy, S.
*Chowdhury, R.
Dahlin, T.
Fodero, K.
*Gajjar, G.
Garg, K.
Gurusinghe, D.
Huntley, C.
Hou, D.
*Kobet, G.

Kockott, M.
*Komatsu, C.
Mackie, B.
*Malpede, K.
*Mezco, H. A.
Monsey Joseph, M.
Nelms, G.
O'Brien, J.
*Patel, P.
Qiu, Q.
Raffield, T.
Rudolph, T.
Saia, N.
Shrestha, A.
Tran, T.
Tualla, I.
Wade, A.
Walker, C.
Ware, D.
Zahid, A.
*Zimmerman, K.

D48: CREATE REPORT ON SINGLE-PHASE TRIP AND RECLOSE ON TRANSMISSION LINES

Assignment: Prepare a report focusing on the considerations associated with single-phase tripping and reclosing on transmission lines.

Kamal Garg, Chair
Schweitzer Engineering Laboratories
Pullman, WA

Ilia Voloh
General Electric
Markham, ON, CA

Bapary, A.
Blumschein, J.
Conrad, S.
Cook, W.
Calero, F.
Chowdhury, R.
Gurusinghe, D.
Henneberg, G.
Hou, D.
Klecker, S.
Kobet, G.
Kockott, M.
Lin, D.
Lopez, D.
Mackie, B.
Matchyaraju, A.
Mysore, P.
Martin, A.
Nagpal, M.
Rajapakse, A.
Town, J.
Qui, Q.

D51: PROTECTION CONSIDERATIONS FOR SINGLE PHASE TRIPPING AND RECLOSING OF DISTRIBUTION LINES

Assignment: Prepare a technical report on protection considerations for single phase

tripping and reclosing of distribution lines

Brian Boysen, Chair
We Energies
Milwaukee, WI

Jack Jester, Vice Chair
Excelon

Sudarshan Byreddy, Secretary
Burns & McDonnell

Bell, J.
Bravo, F.
Das, S.
Garg, K.
Gong, Y.
Hamid, M.
Harris, P.
Hataway, G.
Hawaz, J.
Holt, C.
Hou, D.
Kao, M.
Mackie, B.
Meisinger, M.
Mulawarman, A.
Parr, S.
Ryan, G.
Wagner, B.

DTF52: LINE PROTECTION BASED ON TRANSIENT QUANTITIES

Assignment: Develop a technical report to the D subcommittee for line protection based on transient quantities.

Kevin Malpede, Chair
ComEd
Chicago, IL

Michael Kockott, Vice-Chair
Hitachi Energy
Hertford, NC

Vijay Shanmugasundaram, Secretary
Burns & McDonnell
Raleigh, NC

Roster not available

D53: REPORT ON DISTRIBUTION LINE PROTECTION PRACTICES SURVEY

Assignment: Create and issue an industry survey on distribution line protection practices and associated distribution protection topics. The working group will create a report based on the survey results.

Muhammad Hamid, Chair
Black & Veatch
Dallas, TX

Greg Ryan, Vice-Chair
Ameren IL
Decatur, IL

Brian Boysen, Secretary
We Energy
Milwaukee, WI

Corporan, E.
 Das, S.
 Ding, X.
 Geng, Y.
 Harris, P.
 Hayes, S.
 Holt, C.
 James, R.
 Lebeau, D.
 Mackie, B.
 Matta, B.
 Parr, S.
 Sufana, C.
 Sun, C.
 Wester, C.

D54: PROTECTION METHODS UTILIZED ON COMPENSATED NEUTRAL GROUNDED DISTRIBUTION SYSTEMS

Assignment: Develop a report describing protection and fault location methods in use on non-effectively grounded and compensated grounded distribution systems

Russ Patterson, Chair
Qualus
Chattanooga, TN

Hugh Borland, Vice-Chair
Anseris IQ

*Bingyin, X.
 Byreddy, S.
 *Druml, G.
 *Fickert, L.
 Harris, P.
 Gong, Y.
 *Rorabaugh, J.
 Sorensen, D.
 *Stephenson, B.
 Sufana, C.
 Wahlroos, A.

DTF55: PROTECTION OF HVDC SYSTEMS AND DC DISTRIBUTION SYSTEMS

Assignment: tbd

Brandon Lewey, Chair
Ameren
St. Louis, MO

Roster not available

DTF56: IEC 61850 EFFECT ON TRANSMISSION LINE PROTECTION BASED ON INTERNET COMMUNICATIONS

Assignment: tbd

Alex Apostolov, Chair
Omicron
Los Angeles, CA

Roster not available

H: RELAYING COMMUNICATIONS SUBCOMMITTEE

Scope: Evaluate and report on the characteristics and performance of protective relaying communications and control systems. Recommend communication requirements, operating and test procedures which assure reliable performance of the overall protection and control system. Report on new relaying equipment designs tailored to specific communication requirements. Included are matters necessary to the function of such systems employed in the generation, transmission, distribution, and utilization of electrical energy, and their effects on system operation. Control systems include data acquisition and processing from devices such as transducers, Intelligent Electronic Devices (IEDs), and Human Machine Interfaces (HMI) including the low-level interfaces to these systems. Power System control issues associated with Power System Dynamics are excluded from this scope.

Hugo Monterrubio, Chair
Hubbell
Weston, FL

Mittal Kanabar, Vice-Chair
General Electric
Markham, ON Canada

Dean Ouellette, Secretary
Quanta Technology
Winnipeg, Canada

Adamiak, M.
 Allen, E.
 Anderson, J.
 Antonova, G.
 Apostolov, A.
 Bell, T.
 Benou, M.
 Black, M.
 Blood, E.
 Bougie, J.
 Brunner, C.
 Capuozzo, M.
 Cease, T.
 Dahlin, T.
 Das, R.
 Ding, X.
 Dolezilek, D.
 Dood, M.
 Fodero, K.

Goldstein, A.
 Haveron, S.
 Hu, Y.
 Huntley, C.
 Jessup, E.
 Klecker, S.
 Laughner, T.
 Makki, A.
 Maragal, D.
 Martin, A.
 Martin, K.
 Mix, S.
 Palmer, C.
 Preuss, C.
 Reckerd, D.
 Ruiz, J.
 Sabin, D.
 Sufana, C.
 Swanson, M.
 Thibodeau, E.
 Udren, E.
 Vandiver, B.
 Verzosa, J.

H6: APPLICATION TESTING OF IEC 61850 BASED SYSTEMS

Assignment: Write a summary paper of technical report: Application Testing of IEC 61850 Based Systems PES-TR84.

Charlie Sufana, Chair
Retired
Melbourne, FL

Benton Vandiver, Vice-Chair
ABB
Houston, TX

Anderson, J.
 Brunner, C.
 Buneo, J.
 Falk, H.
 Gurusingham, D.
 Huntley, C.
 Martin, A.
 Mathias, T.
 Reckerd, D.
 Riccardo, A.
 Schultz, M.
 Vandiver, B.
 Vardhan, H.
 Velazquez, M.
 Verzosa, Q.
 Vundekari, E.
 Wade, A.

H17: ESTABLISHING LINKS BETWEEN COMTRADE, IEC 61850 AND CIM

Assignment: Develop a standard approach to link IEC 61850, CIM and COMTRADE so that the COMTRADE channels can be associated to a node in the power network.

Christoph Brunner, Chair
it4power
Zug, Switzerland

Alex Apostolov, Vice-Chair
Omicron
Los Angeles, CA

No roster available.

H22: C37.249 GUIDE FOR CYBER SECURITY FOR PROTECTION RELATED DATA FILES

Assignment: Identify and categorize protection, automation, and control (PAC) related data files based on content, use, and risk of disclosure or compromise (confidentiality, integrity, and availability). PAC related data files include but are not limited to files used for configuration, management, and analysis of protective relaying systems.

Amir Makki, Chair
SoftStuf
Philadelphia, PA

Cesar. Calix, Vice-Chair & Secretary
Burns and McDonnell
Lawrenceburg, KY

Hugo Monterrubio, Vice-Chair
Hubbell
Weston, FL

Capuozzo, M.
 Cease, T.
 Giarratano, D.
 Johnson, A.
 Preuss, C.
 Sufana, C.

H27: PC37.251 STANDARD FOR COMMON PROTECTION AND CONTROL SETTINGS OR CONFIGURATION DATA FORMAT (COMSET)

Assignment: Develop a standard file format for exchange of protection and control configuration data between engineering tools and asset management tools.

Mario Capuozzo, Chair
Doble Engineering
Tulsa, OK

Benton Vandiver, Vice-Chair
ABB
Houston, TX

Dan Sabin, Secretary
Schneider Electric
Andover, MA

Falk, H.
 Haveron, S.
 Laughner, T.
 Maragal, D.
 Preuss, C.
 Rudolph, T.

Velazquez, M.
Verzosa, Q.

H30: IEC 61850 USER FEEDBACK

Assignment: Collect user feedback from utilities and consultants for designing and implementing IEC-61850 based substation automation system. Prepare a report outlining the experienced issues and suggest enhancements to IEC-61850 standard and manufacturer implementations.

Depak Maragal, Chair
Power Eureka
Whiteplains, NY

Dustin Tessier, Vice Chair
Tesco Automation Ltd
Emerald Park, Canada

Adamiak, M.
Allen, E.
Anderson, J.
Apostolov, A.
Bilimoria, N.
Brunner, C.
Falk, H.
Gohari, J.
Holbach, J.
Liposhchak, R.
Mulawarman, A.
Myrda, P.
Ouellette, D.
Qiu, Q.
Rudolph, T.
Schock, E.
Shah, P.
Udren, E.
Vandekari, E.
Xavier, J.

H31: COMMON PROTECTION & CONTROL PARAMETERS FOR COMSET

Assignment: Develop generic models and parameters of protection functions.

Depak Maragal, Chair
New York Power Authority
White Plains, NY

Alex Apostolov, Vice-Chair & Secretary
Omicron Electronics
Los Angeles, CA

Allen, E.
Blumschein, J.
Brunner, C.
Busot, D.
Capuzzo, M.
Dadash Zadeh, M.
Haveron, S.
Martin, T.
Nadkar, P.
Narendra, K.
Nelson, S.
Riccardo, A.

Ruiz, J.
Sabin, D.
Shrestha, A.
Therrien, P.
Vardhan, H.
Verzosa, Q.
Yalla, M.

H40: C37.1.2 DATABASES USED IN UTILITY AUTOMATION SYSTEMS

Assignment: This recommended practice presents general requirements, design, and lifecycle costs versus performance for databases associated with substation automation systems. Also included are specifications for database elements that should be standardized to ensure interoperability. Example designs are included for reference purposes, which are not intended to prescribe a definitive database design. Applications utilizing databases can be very different and may have vastly different requirements.

Theo Laughner, Chair
Lifescale Analytics Inc.
Knoxville, TN

Mario Capuzzo, Vice-Chair
Doble engineering
Tulsa, OK

Antonova, G.
Dood, M.
Johnson, A.
Preuss, C.

H41: REVISION OF IEEE 1646 COMMUNICATION DELIVERY TIME PERFORMANCE REQUIREMENTS

Assignment: Revision to IEEE Standard 1646-2004

David Dolezilek, Chair
SEL
Pullman, WA

T.W. Cease, Vice-Chair & Secretary
Consultant
Palmto, GA

Dahlin, T.
Dood, M.
Lacroix, M.
Muschlitz, B.
Preuss, C.
Swanson, M.
Thibodeau, E.
Verzosa, J.

H44: P2030.100.1 GUIDE FOR MONITORING AND DIAGNOSTICS OF IEC 61850 GOOSE AND SAMPLED VALUES BASED SYSTEMS (PC2030.100.1)

Assignment: Write a IEEE guide titled "Monitoring and Diagnostics of IEC 61850 GOOSE and Sampled Values Based Systems".

Aaron Martin, Chair
Bonneville Power Administration,
Vancouver, WA

David Dolezilek, Vice-Chair
Schweitzer Engineering Laboratories
Pullman, WA

Jose Ruiz, Secretary
Doble Engineering
Chattanooga, TN

Apostolov, A.
Carvalho, E.
Casilla, N.
Falk, H.
Legget-Wyszczelski, K.
Mix, S.
*Muschlitz, B.
*Newell, R.
Ouellette, D.
Preuss, C.
Ruiz, J.
*Shrestha, A.
Tessier, D.
Vandiver, B.
Verzosa, J.
*Vundekari, E.

H45: C37.300 GUIDE FOR CENTRALIZED PROTECTION AND CONTROL (CPC) SYSTEMS WITHIN A SUBSTATION

Assignment: Develop a guide for Centralized Protection and Control (CPC) Systems within a Substation.

Rattan Das, Chair
GE Vernova-Consulting
Newark, DE

Paul Myrda, Vice-Chair
EPRI
Orland Park, IL

Mittal Kanabar, Secretary
GE Vernova Electrification
Markham, ON, CA

Anderson, J.
Andre, B.
Apostolov, A.
Beaumont, P.
Byun, R.
Blumschein, J.
Chowdhury, R.
Dadash Zadeh, M.

De Oliveria, E.
Hunt, R.
Jessup, E.
Jester, J.
Komatsu, C.
Lascu, R.
Liao, Y.
Luskind, Y.
Madani, V.
Meliopoulos, S.
Monterrubio, H.
Nalla, B.
Novosel, D.
Preuss, C.
Qiu, Q.
Raymond, J.
Rudolph, T.
Ruiz, J.
Sachdev, M.
Shiles, J.
Shrestha, A.
Vardhan, H.
Wade, A.
Ware, D.
Xavier, J.
Yang, Q.

H46: RECOMMENDED PRACTICE, C37.1.3 HMI USED IN SUBSTATION AUTOMATION SYSTEMS

Assignment: Produce a Recommended Practice for Human-Machine Interfaces (HMI) used with Electric Utility Automation Systems

Matt Black, Chair
Sargent & Lundy
Lookout Mt, TN

Craig Preuss, Vice-Chair
Black & Veatch
Leawood, KS

Shane Haveron, Secretary
AMETEK Power Instruments
Craigavon, UK

Anderson, J.
Bougie, J.
Cunningham, M.
De Ronde, D.
Ding, X.
Doak, M.
Farrar, T.
Gamble, R.
Johnson, A.
Klecker, S.
Malcolm, B.
Newell, R.
Ouellette, D.
Pack, J.
Smith, B.
Sufana, C.
Thibodeau, E.
Verzosa, Q.
Wilson, J.

H47: IMPACTS OF IEC 61850 SAMPLED VALUES, GOOSE AND PTP TIME SYNCHRONIZATION ON PROTECTION AND CONTROL APPLICATIONS USING PROCESS BUS

Assignment: In a digital substation Protection and Control (P&C) devices rely on Sampled Values (SV), GOOSE and time synchronization (PTP) together over process bus to communicate with Merging Units (MUs). This Working Group will generate a report evaluating the discrepancies in the communication of SV, GOOSE or PTP messages and their impact on protection and control applications such as performance and behavior.

Mittal Kanabar, Chair
General Electric
Markham, ON Canada

Antonio Riccardo, Vice-Chair
National Grid
Syracuse, NY

Dean Ouellette, Secretary
Quanta Technology
Winnipeg, Canada

Anderson, J.
Apostolov, A.
Carvalho, E.
Cambel, J..
Dinesh, B.
Gurusinghe, D.
Hache, J.
Huntley, C.
Kraemer, N.
Lewey, B.
Maragal, D.
Martin, A.
Nuwan, P.
Qun, Q.
Ruiz, J.
Tessier, D.
Tuladhar, L.
Udren, E.
Vardhan, H.
Villasmil, D.

H49: APPLICATION CONSIDERATIONS ON THE USE OF PACKET-SWITCHED COMMUNICATION CHANNELS FOR PILOT PROTECTION AND TELEPROTECTION SCHEMES

Assignment: To develop a report on application considerations and experiences on the use of packet-switched networks from a teleprotection application point of view for the benefit of relay engineers. Produce tutorial/summary presentation based on report.

Steve Klecker, Chair
MidAmerican Energy
Company
Davenport, IA

Galina Antonova, Vice-Chair
Hitachi Energy
Vancouver, BC, Canada

Jose Ruiz, Secretary
Doble Engineering
Chattanooga, TN

*Anderson, J.
Antonova, G.
Arbona, C.
Dahlin, T.
Fodero, K.
Huntley, C.
Klecker, S.
Michaelis, J.
Ruiz, J.
Udren, E.
Voloh, I.
Zvarych, A.

H50: REQUIREMENTS FOR TIME SOURCES IN PROTECTION AND CONTROL SYSTEMS

Assignment: Presently there are IEEE and IEC standards around (accurate) time distribution systems (for example, IEEE 1588 and associated Profiles, IEEE/IEC 61850-9-3, etc.). The intent of this Report is to document requirements for Time Sources (Clocks) used in Protection and Control Systems.

Dean Ouellette, Secretary
Quanta Technology
Winnipeg, Canada

Jay Anderson, Vice-Chair
ComEd - Exelon Corp.
Lombard, IL

Adamiak, M.
Antonova, G.
Bougie, J.
Brunello, G.
Byun, R.
Dagle, J.
Ding, X.
Goldstein, A.
Hunt, R.
Huntley, C.
Johnson, A.
Kanabar, N.
Kraemer, N.
Li-Baboud, Y.
Maragal, D.
Martin, A.
Martin, K.
Mix, S.
Muschlitz, B.
Myrda, P.
Nadkar, P.
Ruiz, J.
Tessier, D.
Udren, E.

Vandiver, B.

H51: REVISION OF C37.239-2010 STANDARD ON A COMMON FORMAT FOR EVENT DATA EXCHANGE (COMFEDE)

Assignment: Revise the current COMFEDE standard (C37.239-2010)

Mark Adamiak, Chair
Adamiak Consulting LLC
Paoli, PA

Pierre Martin, Vice-Chair

Zach Makki, Secretary
Softstuf Inc.
Northfield, NJ

Falk, H.
Gagnon, J.
Haveron, S.
Makki, Z.
Rudolph, T.
Sabin, D.
Thibodeau, E.
Verzosa, J.
Yin, Y.

H52: COMMON FORMAT FOR NAMING TIME SEQUENCE DATA FILES (IEEE STANDARD C37.232-2011, COMNAME)

Assignment: Revise the Standard. The revision to include clarification on methods of use such as use for naming folders and allowing for underscore delimiters.

Ellery Blood, Chair
SEL
Pullman, WA

Shane Haveron, Vice-Chair
AMETEK Power Instruments
Craigavon, UK&

Amir Makki, Secretary
SoftStuf
Philadelphia, PA

Laughner, T.
Monterrubio, H.
Sabin, D.
Verzosa, J.

H53: USE GUIDE FOR SMART DISTRIBUTION APPLICATIONS P1854

Assignment: Revision of IEEE Guide P1854 Use Guide for Smart Distribution Applications

Xiangyu Ding Chair
S&C Electric Company
Chicago, IL

Jason Lombardo, PSCC PO-Chair
S&C Electric Company
Chicago, IL

Bougie, J.
Johnson, A.
Martino, S.
Preuss, C.

H54: REVISION OF IEEE C37.111-2013/IEC 60255-24:2013 STANDARD FOR COMMON FORMAT FOR TRANSIENT DATA EXCHANGE (COMTRADE)

Assignment: Revision of IEEE C37.111-2013/IEC 60255-24:2013 Standard for Common Format for Transient Data Exchange (COMTRADE)

Mark Adamiak, Chair
Adamiak Consulting LLC
Paoli, PA

Zach Makki, Vice-Chair
Softstuf
Northfield, NJ

Dan Sabin, Secretary
Schneider Electric
Andover, MA

Dagle, J.
Gagnon, J.
Garg, K.
Haveron, S.
Lu, Y.
Makki, A.
Maragal, D.
Martin, A.
Thibodeau, E.
Verzosa, J.
Vundekari, E.
Yalla, M.

HFT55: DISTRIBUTED CYBER PHYSICAL ASSESSMENT FOR GRID RESILIENCE

Assignment: Investigate Distributed Cyber Physical Assessment for Grid Resilience and evaluate participation with other technical committees, societies, groups, and associations that may have interest.

Jeff Pack, Chair
POWER Engineers
Meridan, ID

Craig Rieger, Vice-Chair
Idaho National Laboratory
Idaho Falls, ID

Johnson, B.
Preuss, C.

HTF56: H SUBCOMMITTEE IDEATION MEETING

Assignment: The task force will facilitate a forum to brainstorm about ideas and possible topics to create future new H SC task forces or working groups. Power Systems Visionary keynote speakers will be invited to share industry trends and thoughts to trigger these brainstorming sessions.

Mittal Kanabar, Chair
General Electric
Markham, ON Canada

Dean Ouellette, Vice Chair
Quanta Technology
Winnipeg, Canada

HTF57: EVALUATE THE NEED TO REVISE 2030.101-2018 IEEE GUIDE FOR DESIGNING A TIME SYNCHRONIZATION SYSTEM FOR POWER SUBSTATIONS

Assignment: The TF will Evaluate the need to revise the 2030.101-2018 IEEE Guide for Designing a time synchronization system for power substations.

Dean Ouellette, Chair
Quanta Technology
Winnipeg, Canada

Jay Anderson, Vice-Chair
ComEd - Exelon Corp.
Lombard, IL

No roster available

I: PROTECTION AND CONTROL PRACTICES SUBCOMMITTEE

Scope: Evaluate and report on all matters related to protection and control practices for compatibility with the physical and electrical environment (including but not limited to equipment withstand capabilities to electromagnetic interference), characteristics and performance of instrument transformers and sensors, equipment and system testing procedures, protection and control performance criteria and applications, event/transient recording, and definitions of protection and control systems. Develop, recommend, establish, and maintain standards on protective relaying and control equipment and practices. Evaluate, report on, and develop standards on other pertinent aspects of protective relaying and control systems not addressed by other PSRC Subcommittees.

Angelo Tempone, Chair
Duke Energy
Lake Mary, FL

Todd Martin, Vice-Chair
Basler Electric,
Highland, IL

Al-Yousef, H.
Beckwith, T.
Byreddy, S.
Chowdhury, R.
Cooper, J.
Dalton, C.
Donahoe, K.
Dood, M.
Fischer, N.
Frye, R.
Garavaglia, L.
Garcia, R.
Gers, J.
Higginson, M.
Knapek, W.
Kobet, G.
Lockhart, C.
Mackie, B.
Magruder, B.
Makki, A.
Meisinger, M.
Monterrubio, H.
Mooney, T.
Mugalian, B.
Niemira, J.
Pestell, C.
Preuss, C.
Quinteros, M.
Ramirez, M.
Ransom, D.
Sharma, M.
Swanson, M.
Turner, S.
Udren, E.
Underwood, A.
Uribe, A.
Wade, A.
Ware, D.
Whittaker, R.
Zvarych, A.

I2 : TERMINOLOGY REVIEW WORKING GROUP

Assignment: Review drafts of PSRC publications for proper terminology, abbreviations and symbols; and to recommend additions and changes to the IEEE database as appropriate.

Mal J. Swanson, Chair
MJ Swanson Associates
Windham, NH

Claire Patti, Vice-Chair & Secretary
Portland General Electric
Portland, OR

Black, M.
Balado, O.
Deronja, A.
Donahoe, K.
*Friend, F.
Hayes, S.
Kifle, A.

Liao, Y.
Patel, M.
Vandiver, B.
*Whittaker, R.

I4 IEC ADVISORY WORKING GROUP

Assignment: Analyze standards development of IEC Technical Committee 95 to foster understanding and rationalization of IEC versus IEEE relaying documents. Develop U.S. position on IEC voting documents. Report on IEC TC 95 and TC 57 standards activities to the subcommittee.

Eric Udren, Chair
Quanta Technology, LLC
Pittsburgh, PA

Normann Fischer, Vice-Chair & Secretary
Schweitzer Engineering Laboratories
Pullman, WA

Adamiak, M.
Beaumont, P.
Bell, T.
Brunello, G.
Brunner, C.
Burnworth, J.
Dwyer, D.
Hamilton, R.
Huntley, C.
Kunsmann, S.
Mulawarman, A.
Niemira, J.
Ranieri, M.
Skendzic, V.
Spiewak, E.
Vandiver, B.
Voloh, I.
Ward, S.

I32: SURVEY OF PROTECTIVE RELAYING TEST PRACTICES

Assignment: To review report prepared by working group I11 in 2001 called "Survey of Relaying Test Practices" and update the survey accordingly to today's industry environment.

Andre Uribe, Chair
Qualus Power Services
Lake Mary, FL

Will Knapek, Vice-Chair & Secretary
OMICRON
Knoxville, TN

Beach, D.
Black, M.
Buchanan, D.
Casilla, N.
Cooper, S.
Garcia, R.
Lee, A.

Malson, H.
Monterrubio, H.
Moores, B.
Moskos, G.
Newman, A.
Pond, J.
Schock, E.
Seegers, T.
Siira, M.
Sykes, J.
Tempone, A.
Torres, N.
Uchiyama, J.
Ware, D.
Weyer, G.

I33: REVIEW OF RELAY TESTING TERMS

Assignment: Produce formal definitions for terms commonly used to describe relay testing procedures and prepare a report for consideration by the I-Subcommittee and future inclusion in the IEEE Dictionary

Scott Cooper, Chair & Secretary
OMICRON
Saint Petersburg, FL

Hugo Monterrubio, Vice-Chair
Beckwith Electric Co., Inc.
Weston, FL

Hankins, L.
Jester, J.
Knapek, W.
Monson, E.
Saad, A.
Sharma, M.
Stec, W.
Turner, S.
Ware, D.
Zaitz, Z.

I36: STANDARD FOR RELAYS, RELAY SYSTEMS, AND CONTROL DEVICES USED FOR PROTECTION AND CONTROL OF ELECTRIC POWER APPARATUS – RADIATED ELECTROMAGNETIC INTERFERENCE WITHSTAND CAPABILITY REQUIREMENTS AND TESTS

Assignment: Revision of Standard for Relays, Relay Systems, and Control Devices used for Protection and Control of Electric Power Apparatus – Radiated Electromagnetic Interference Withstand Capability Requirements and Tests

Chase Lockhart, Chair
Leidos
Winter Garden, FL

Mat Garver, Vice-Chair & Secretary
Beckwith Electric Co.
Largo, FL

Anderson, J.
 Bell, T.
 Garvaglia, I.
 Mooney, T.
 Palmer, C.
 Pond, J.
 Ramie, G.
 Ray, R.

I37: PC37.90 STANDARD FOR RELAYS, RELAY SYSTEMS, AND CONTROL DEVICES USED FOR PROTECTION AND CONTROL OF ELECTRIC POWER APPARATUS – GENERAL REQUIREMENTS AND TESTS

Assignment: Revision of C37.90 Standard. PAR Expiration 31-Dec-2024

Marilyn Ramirez, Chair
POWER Engineers
Lake Mary, FL

Bill Morse, Vice-Chair
Schweitzer Engineering Labs
Pullman, WA

April Underwood, Secretary
Southern Company
Atlanta, GA

Al-Yousef, H.
 Bell, T.
 Martin, T.
 Mooney, T.

I40: STANDARD FOR SURGE WITHSTAND CAPABILITY (SWC) TESTS FOR RELAYS AND RELAY SYSTEMS ASSOCIATED WITH ELECTRIC POWER APPARATUS

Assignment: To revise IEEE C37.90.1 Standard for Surge Withstand Capability (SWC) Tests for Relays and Relay Systems Associated with Electric Power Apparatus.

Roger Whittaker, Chair
Retired,
Portland, OR

Todd Martin, Vice-Chair & Secretary
Basler Electric,
Highland, IL

*Abdelhamid, E.
 Al-Yousef, H.
 Bell, T.
 *Byun, R.
 Channarasappa, S.
 *Desrochers, A.
 *Frye, R

Garvaglia, L.
 Manna, T.
 *Meisinger, M.
 *Messel, R.
 Mooney, T.
 Morse, W.
 *Mugalian, B.
 Niemira, J.
 *Pestell, C.
 *Pond, J.
 Ramie, G.
 *Ramirez, M.
 *Ray, R.
 *Yalla, M

I43: INVESTIGATE RESPONSE TO USA EXECUTIVE ORDER REGARDING EMP PROTECTION

Assignment: Write a report to, (1) Investigate and describe EMPs and their likely effects on protection and control apparatus, and (2) Determine and describe strategies generation, transmission, and distribution utilities can utilize to mitigate the effects of EMPs on their equipment.

Angelo Tempone, Chair
Duke Energy
Lake Mary, FL

Dolly Villasmil, Vice-Chair
HDR
Lake Mary, FL

Johnny Moore, Secretary
Schweitzer Engineering
Laboratories, Inc.
Pullman, WA

Adamiak, M.
 Al-Yousef, H.
 Basler, M.
 Bloder, M.
 Byun, R.
 Carroll, P.
 Chowdhury, R.
 Klecker, S.
 Kobet, G.
 Lockart, C.
 Manna, T.
 Mooney, T.
 Morse, B.
 Qiu, Q.
 Sambasivan, S.
 Voloh, I.
 Ware, D.
 Zvarych, A.

I44: SKILLS REQUIRED TO PROGRAM, COMMISSION, TEST, MAINTAIN ETHERNET BASED PAC SYSTEMS

Assignment: Create report on Skills Required to Program, Commission, Test, and Maintain Ethernet Based PAC Systems

Andre Uribe, Chair
Qualus Power Services
Lake Mary, FL

Will. Knapek, Vice-Chair & Secretary
OMICRON
Knoxville, TN

Antonova, G.
 Bougie, J.
 Cooper, S.
 Cunningham, M.
 Kuber, S.
 Nalla, B.
 Sykes, J.
 Velazquez, M.
 Ware, D.
 Williams, D.
 Wyszczelski, K.
 Zvarych, A.

I45: REPORT ON GROUNDING OF INSTRUMENTATION AND CONTROL CIRCUITS

Assignment: The purpose of the WG is to develop a Technical Report reviewing grounding and bonding of circuits associated with instrumentation, protective relaying, communications, power supplies, and other electric facilities in substations. The report will review existing practices and standards, identify where conflicts or omissions exist, and address means of reconciling conflicts.

Adrian Zvarych, Chair
Power Grid Engineering
Clearwater Beach, FL

Jalal Gohari, Vice-Chair & Secretary
WSP
Glendale, NY

Byun, R.
 Conrad, S.
 Cunningham, M.
 Frye, R.
 He, Y.
 Magruder, B.
 Michaelis, J.
 Morse, W.
 Nesbit, B.
 O'Brien, J.
 Ramirez, M.
 Ware, D.
 Warner, J.
 Wilson, J.

I46: Guide for Grounding of Instrument Transformer Secondary Circuits and Cases

Assignment: Revise and prepare PAR for IEEE C57.13.3-2014

Bruce Magruder, Chair
Swinerton Renewable Energy
Garner, NC

Sudarshan Byreddy, Vice-Chair & Secretary
Burns & McDonnell
Fort Worth, TX

Ellis, D.
 Gohari, J..
 Mugalian, B.
 Niemira, J.
 O'Brien, J.
 Prabhakar, S.
 Ren, J.

I47: IEEE STANDARD C37.231 STANDARD COMMON FORMAT FOR DOCUMENTING IED FIRMWARE OR SOFTWARE CHANGES AND CONFIRMING THEIR TRANSMITTAL (COMFIRM)

Assignment: Revise the Standard. The revisions include clarification on the use of the Standard and on the impact of the latest NERC CIP and PRC requirements.

Milton Quinteros, Chair
Entergy
New Orleans, LA

Eric Thibodeau, Co-Chair
Hydro Quebec,
Quebec City, QC, Canada

Nicholas. Kraemer, Vice-Chair
Nugrid Power
Burnaby, BC, Canada

Charles Pestell, Secretary
Powell
Houston, TX

Al-Yousef, H.
 *Burkart, D.
 *Chowdhury, R.
 Das, S.
 Formea, J.
 Hackett, J.
 Lombardo, J.
 *Makki, A.
 Nelms, G.
 Preuss, C.
 Tran, T.
 Wilson, J.

I48: REVISION TO IEEE C37.103-2015: GUIDE FOR DIFFERENTIAL AND POLARIZING RELAY CIRCUIT TESTING

Assignment: Revise IEEE Std C37.103-2015, IEEE Guide for Differential and Polarizing Relay Circuit Testing

Mohit Sharma, Chair
Schweitzer Engineering
Laboratories
Irvine, CA

Gary Kobet, Vice-Chair & Secretary
TVA
Chattanooga, TN

Byreddy, S.
 *Chowdhury, R.
 Das, S.
 Hughes, J.
 McDaniel, R.
 Niemira, J.
 Tempone, A.
 Zaitz, Z.

I49: Roadmap for developing new or updating existing IEEE standards to address issues of Centralized Protection and Control (CPC) Systems

Assignment: Roadmap for developing new or updating existing IEEE standards to address issues of Centralized Protection and Control (CPC) Systems.

Craig Preuss, Co-Chair
Black & Veatch
Laurel Park, NC

Brian Mugalian, Co-Chair
S&C Electric
Chicago, IL

Mike Dood, Co-Chair
SEL
New Berlin, WI

Caballero, A.
 Melo, A.
 Johnson, A.
 Sivesind, A.
 Wade, A.
 Pestell, C.
 Finney, D.
 Sabin, D.
 Hou, D.
 Deronde, D.
 Dolezilek, D.
 Maragal, D.
 Patel, D.
 Ware, D.
 Tessier, D.
 Thibodeau, E.
 Khalilpour, F.
 Nelms, G.
 Pires, G.
 Al-Yousef, H.
 Falk, H.
 Abdulhadi, I.
 Jester, J.
 Anderson, J.
 Michaelis, J.
 Xavier, J.
 Blumschein, J.
 Varghese, L.
 Lechuga, M.
 McChesney, M.

Moncey Joseph, M.
 Saia, N.
 Harris, P.
 Shrawane, P.
 Haveron, S.
 Byreddy, S.

I50: SUMMARY PAPER FOR IEEE C37.92-2023 STANDARD FOR LOW-ENERGY ANALOG INTERFACES BETWEEN PROTECTIVE RELAYS AND POWER SYSTEM SIGNAL SOURCES

Assignment: Write a summary paper of IEEE Std C37.92-2023 Standard for Low-Energy Analog Interfaces between Protective Relays and Power System Signal Sources.

Eric Udren, Chair
Quanta Technology, LLC
Pittsburgh, PA

Peiman Dadkhah, Vice Chair
NuGrid
Vancouver, BC, Canada

*Adamiak, M.
 Al-Yousef, H.
 Chowdhury, R.
 Frye, R.
 Garver, M.
 Hunt, R.
 Monterrubio, H.
 Niemira, J.
 Skendzic, V.
 Verzosa, Q.
 Whittaker, R.

I51: SUMMARY PAPER FOR IEEE STD C37.110-2023 IEEE GUIDE FOR THE APPLICATION OF CURRENT TRANSFORMERS USED FOR PROTECTIVE RELAYING PURPOSES

Assignment: Determine need to write a summary paper for IEEE Std C37.110-2023 IEEE Guide for the Application of Current Transformers Used for Protective Relaying Purposes

Juan Gers, Chair
Gers USA
Weston, FL

Steve Turner, Vice-Chair
Sargent & Lundy
Phoenix, AZ

Brandt, L.
 Grindle, E.
 Hamilton, R.
 Raghuraman, P.
 Ramirez, M.
 Underwood, A.

ITF52: PAR STUDY GROUP FOR CORRIGENDUM TO IEEE STD C37.92-2023

Assignment: PAR Study Group to determine a need for a Corrigendum for IEEE Std C37.92-2023 and draft a PAR if there is a need.

Eric Udren, Chair
Quanta Technology, LLC
Pittsburgh, PA

Charles Pestell, Secretary
Powell
Houston, TX

Chowdhury, R.

J: ROTATING MACHINERY PROTECTION SUBCOMMITTEE

Scope: Evaluate and report on protective relaying concepts and practices applicable to generators, motors, synchronous condensers, associated auxiliary systems, and performance of plant protective systems. Develop and maintain related relaying standards.

Will English, Chair
Consumers Energy
Jackson, MI

Jason Eruneo, Vice-Chair
Duke Energy
Tampa, FL,

Ashrafi, H.
 Basler, M.
 Beckwith, T.
 Brandt, L.
 Bukhala, Z.
 Buneo, J.
 Carlson, R.
 Chowdhury, R.
 Conrad, S.
 Das, M.
 Finney, D.
 Fischer, N.
 Gers, J.
 Haas, D.
 Hamilton, R.
 Hartmann, W.
 Haveron, S.
 Henneberg, G.
 Kim, S.
 Kobet, G.
 Kumar, P.
 Monterrubio, H.
 Mraz, J.
 Mueller, S.
 Nesbit, B.
 Patterson, R.
 Tatro, P.
 Theron, J.
 Thompson, M.
 Turner, S.
 Weisz, D.
 Yalla, M.

J15: INVESTIGATION OF THE CRITERIA FOR THE TRANSFER OF MOTOR BUSES

Assignment: Review, compare and contrast NEMA MG-1 with ANSI C50.41 regarding transfer criteria. Examine published reports and papers on motor bus transfer criteria to compare the conclusions with NEMA MG-1 with ANSI C50.41 regarding fast transfer criteria. Investigate existing open-transition motor bus transfer (MBT) actual data from multiple events at the medium voltage level. Examine for current and torque ratio versus Volts/Hz at transfer periods to see if there is a correlation. Examine published reports, papers, C50.41 and NEMA MG-1 on motor fast bus transfer criteria to reconcile the conclusions with the field-measured results. Study existing motor protection oscillography voltage and current to identify which motors are generating and which are motoring. Examine v/Hz of composite bus and individual motor reacceleration current versus total bus reacceleration current (if available). Produce a Report to Subcommittee with findings of the above.

Wayne Hartmann, Chair
GE Grid Automation
Tarpon Springs, FL

Doug Weisz, Vice-Chair & Secretary
Hubbell
Largo, FL

*Alla, M.
 Ashrafi, H.
 Basler, M.
 Beckwith, T.
 Brunello, G.
 Carlson, R.
 Chowdhury, R.
 English, W.
 Eruneo, J.
 Finney, D.
 *Fischer, N.
 Haas, D.
 Hamilton, R.
 Kazimier, B.
 *Kobet, G.
 Nesbit, B.
 *Parvin, M.
 Theron, J.
 *Tierney, D.
 Yalla, M.

J21: MOTOR PROTECTION TUTORIAL

Assignment: Develop a practical motor protection tutorial based around IEEE C37.96. The intent is to aid the reader to develop effective relay settings.

Derrick Haas, Chair
Schweitzer Engineering
Laboratories
Houston, TX

JC Theron, Vice-Chair
GE Vernova
Airdrie, AB, Canada

Ashrafi, H.
 Beckwith, T.
 Bukhala, Z.
 Chowdhury, R.
 English, W.
 Eruneo, J.
 Finney, D.
 Kim, S.
 Kobet, G.
 Kumar, P.
 Nyombi, P.
 Patel, S.
 Sathu, S.

J22: REVISION OF C37.96 **GUIDE FOR AC MOTOR** **PROTECTION**

Assignment: To revise and update C37.96, Guide for AC Motor Protection

Zeeky Bukhala, Chair
GE Vernova
Schenectady, NY

Jason Buneo, Vice-Chair
General Electric
Schenectady, NY

Ashrafi, H.
 Barner, K.
 Beckwith, T.
 Belayneh, S.
 Bowie, T.
 El Halabi Fares, N.
 English, W.
 Eruneo, J.
 Farr, T.
 Finney, D.
 Gohari, J.
 Haas, D.
 Kabra, S.
 Kim, S.
 Kobet, G.
 Kumar, P.
 Kunze, A.
 Liao, Y.
 Marte, O.
 Midence, R.
 Nesbit, B.
 Nyombi, P.
 Shivam, P.
 Pajuelo, E.
 Theron, J.
 Tuladhar, L.
 Weisz, D.

J23: REPORT ON **GENERATOR CONDITION** **MONITORING**

Assignment: Develop a report that covers the following aspects of condition-based monitoring for synchronous machines:

- Describe and develop guidelines for online condition monitoring of large synchronous machines, including salient-pole rotors as well as cylindrical rotors.
- Use online machine condition-based monitoring to detect potential problems before an actual fault develops and schedule maintenance.
- Provides information on online condition monitoring techniques as well as proposing typical thresholds to trigger alarms and initiate remedial or compensating action.
- Demonstrate how to use specific the protection functions to monitor machines.
- Describe mechanisms of degradation and applicable monitoring devices.
- Some relays can monitor RTDs and other transducer-based signals. Some relays monitor field voltage and current. Some relays also include thermal models for the stator and rotor.
- Pilot projects to explore this technology.
- Work with other technical committees as necessary.

Steve Turner, Chair
Sargent and Lundy
Phoenix, AZ

Rob Messel, Vice-Chair & Secretary
Siemens
Winter Springs, FL

Blood, E.
 Brandt, L.
 *Bukhala, Z.
 *Cintron Rivera, J.
 *Das, M.
 Finney, D.
 *Goel, V.
 Kim, S.
 Nesbit, B.
 *Rajapakse, A.
 Samineni, S.
 *Theron, J.

J24: REPORT ON **SYNCHRONOUS** **GENERATOR DISTURBANCE** **RECORDING**

Assignment: Establish a working group to publish a document on the use of disturbance recording for synchronous generators which will include: Digital Fault and Dynamic Disturbance Recorder basics, NERC disturbance monitoring and reporting requirements (PRC-002), detection of events, and oscillations, and creation / handling of data files.

Shane Haveron, Vice-Chair
AMETEK Power Instruments
Craigavon, UK

JC Theron, Vice-Chair
GE Vernova
Airdrie, AB, Canada

*English, W.
 Haas, D.
 Kobet, G.
 Podany, N.

J25: REPORT ON **SYNCHRONOUS** **CONDENSER PROTECTION**

Assignment: Develop a report for Synchronous Condenser Protection. This report will discuss all aspects related to the protection of synchronous condensers. This includes design, settings, and protection schemes for synchronous condensers. Specifically, identify functions that apply to a synchronous condenser and refer to IEEE C37.102 for functions that align with the synchronous generator guidance.

Jason Eruneo, Chair
Duke Energy
Seminole, FL

Dale Finney, Vice-Chair
Schweitzer Engineering
Laboratories
North Sydney, Canada

Brandt, L.
 Bukhala, Z.
 Carlson, R.
 Conrad, S.
 Fischer, N.
 Kim, S.
 Kobet, G.
 Patterson, R.
 Theron, J.
 Thompson, M.

J26: SUMMARY PAPER - **MODELING OF GENERATOR** **CONTROLS FOR** **COORDINATING** **GENERATOR RELAYS**

Assignment: Write a summary paper of the J13 report,

Modeling of Generator Controls for Coordinating Generator Relays.

Juan Gers, Chair
GERS USA
Weston, FL

Phil Tatro, Vice-Chair
ENTRUST Solutions Group
Weston, MA

Basler, M.
 Chowdhury, R.
 Hamilton, R.
 Kobet, G.
 Nesbit, B.
 Reese, D.
 Safari-Shad, N.
 van de Ligt, J.

J27: SUMMARY PAPER - **REVISION OF C37.106,** **GUIDE FOR ABNORMAL** **FREQUENCY PROTECTION** **FOR GENERATING UNITS**

Assignment: Write a summary paper of IEEE Standard C37.106 Guide for Abnormal Frequency Protection for Power Generating Plants.

Bracy Nesbit, Chair
Lower Colorado River
Authority
Austin, TX

Laurel Brandt, Vice-Chair
TVA
Chattanooga, TN

*Alla, M.
 Bukhala, Z.
 Chowdhury, R.
 Conrad, S.
 Eruneo, J.
 Haas, D.
 *Hamilton, R.
 Kabra, S.
 Rees, D.
 Theron, J.
 Weisz, D.

JTF28: PREPARE J6, J14 **PAPERS FOR PUBLICATION**

Assignment: Address potential copyright issues arising from the use of significant word-for-word sections of IEEE transactions papers on which the reports were developed. Appropriate citation and formatting of the word-for-word sections and figures will be added. Format both papers in PES format.

Zeeky Bukhala, Chair
GE Vernova
Schenectady, NY

Dale Finney, Vice-Chair
Schweitzer Engineering
Laboratories
North Sydney, Canada

Beckwith, T.
 Conrad, S.
 Eruneo, J.
 Haas, D.
 Kobet, G.
 Tatro, P.
 Theron, J.

J30: SUMMARY PAPER -
REVISION OF C37.102.
GUIDE FOR AC GENERATOR
PROTECTION

Assignment: Write a summary paper of IEEE Standard C37.102 Guide for AC Generator Protection.

Steve Mueller, Chair
Ameren Services
St Louis, MO

Michael Thompson, Vice-Chair
SEL Engineering Services
Fairview Heights, IL

Barksdale, B.
 Brandt, L.
 Buneo, J.
 Chowdhury, R.
 English, W.
 Eruneo, J.
 Nesbit, B.

K: SUBSTATION
PROTECTION
SUBCOMMITTEE

Scope: Evaluate and report on methods used in protective relaying of substations and the consumer or independent power producer, associated equipment and performance of these protective systems. Develop and maintain relaying standards which re-late to this equipment and the utility-consumer interface.

Brandon Davies, Chair
TRC
Augusta, ME

Kamal Garg, Vice-Chair
SEL Engineering Svcs
Pullman, WA

Bapary, A.
 Barsch, J.
 Billaut, S.
 Conrad, S.
 Das, R.
 Elkin, P.
 English, W.
 Gamble, R.
 Hamilton, R.
 Henneberg, G.
 Kazimier, R.

Klecker, S.
 Ladner Garcia, H.
 Lukach, D.
 Madani, V.
 Miller, D.
 Mulawarman, A.
 Mysore, P.
 Nagpal, M.
 Qiu, Q.
 Samineni, S.
 Sevov, L.
 Sufana, C.
 Thompson, M.
 Voloh, I.

K12: GUIDE, PC37.431.20
IEEE GUIDE FOR
PROTECTING
TRANSMISSION DYNAMIC
REACTIVE POWER
COMPENSATORS JOINT W/
SUBST I9

Assignment: To work jointly with Substations WG I9 to write a guide for protecting transmission dynamic reactive power compensators. PSRC WG K12 will provide guidance and review on topics that are already covered in other IEEE guides to prevent overlap and identify areas where interpretation of existing guides is necessary to meet the specific application challenges unique to transmissions dynamic reactive power compensators.

Satish Samineni, Chair
Schweitzer Engineering
Laboratories
King of Prussia, PA

Tappan Manna, Vice-Chair & Secretary
Burns & McDonnell
Kansas City, MO

Antonova, G.
 Casilla, N.
 Elkin, P.
 Miller, D.
 Thompson, M.
 Warner, J.
 Whittaker, R.

K25: C37.99 GUIDE FOR THE
PROTECTION OF SHUNT
CAPACITOR BANKS

Assignment: Revise and update C37.99 IEEE Guide for the Protection of Shunt Capacitors

Rick Gamble, Chair
TVA
Chattanooga, TN

Mat Garver, Vice-Chair
Beckwith
Largo, FL

Brandon Lewey, Secretary
Ameren
St. Louis, MO

Bloder, M.
 Buanno, A.
 Conrad, S.
 Elkin, P.
 Gulczynski, N.
 Hakim, W.
 Hamid, M.
 Janssen, B.
 Klecker, S.
 Kunze, A.
 Ladner Garcia, H.
 Lukach, D.
 Manna, T.
 Moncey Joseph, M.
 Mysore, P.
 Nguyen, A.
 Patterson, R.
 Patti, C.
 Pineros, J.
 Raffield, T.
 Sevov, L.
 Sorensen, D.
 Thibodeau, E.
 Watson, J.

K27: C37.95, GUIDE FOR
PROTECTION OF UTILITY -
CONSUMER
INTERCONNECTIONS

Assignment: Review and update C37.95 IEEE Guide for Protective Relaying of Utility-Consumer Interconnections

Paul Elkin, Chair
EPRO
Oakland, ME

Hillmon Ladner, Vice-Chair & Secretary
Southern Company
Forest Park, GA

Barsch, J.
 Billaut, S.
 Conrad, S.
 Davies, B.
 James, R.
 Klecker, S.
 Miller, D.
 Piñeros, J.
 Saia, N.
 Sevov, L.
 Warren, T.

K29: WRITE PES TECHNICAL
REPORT BASED ON K3
REPORT ENTITLED
'REDUCING OUTAGE
DURATIONS THROUGH
IMPROVED PROTECTION
AND AUTORESTORATION IN
DISTRIBUTION
SUBSTATIONS

Assignment: Create a PES technical report based on the K3 report entitled 'Reducing outage durations through improved

protection and auto restoration in distribution substations'.

Sebastien Billaut, Chair
Arcadis
Lake Mary, FL

Mohammad Zadeh, Vice-Chair
ETAP
Irvine, CA

Boysen, B.
 Das, S.
 Klecker, S.
 Ladner, H.
 Matta, B.
 Nair, N.
 Prabhakar, S.
 Raghuraman, P.
 Ware, D.

K31: GUIDE FOR BREAKER
FAILURE PROTECTION OF
POWER CIRCUIT BREAKERS

Assignment: Revise C37.119 IEEE Guide for Breaker Failure Protection of Power Circuit Breakers

Vahid Madani, Chair
GridTology
Crockett, CA

Brandon Davies, Vice-Chair
TRC
Augusta, ME

*Bapary, A.
 *Barsch, J.
 *Bowie, T.
 *Chanda, A.
 Deronja, A.
 Eruneo, J.
 Garg, K.
 Henneberg, G.
 Joshi, B.
 Klecker, S.
 Ladner-Garcia, H.
 Lukach, D.
 Matta, B.
 Mezco, A.
 Mulawarman, A.
 Patti, C.
 Prabhakar, S.
 *Raffield, T.
 Samineni, S.
 Thompson, M.
 Walker, C.
 Ware, D.
 Whittaker, R.
 Yin, Y.

KTF32: Investigate need for
separate guide for protection
of filter banks

Assignment: Task force to exploring the need of creating a separate guide for protection of filter banks.

Satish Samineni, Chair
Schweitzer Engineering
Laboratories
King of Prussia, PA

Saeed, A.

Warren T.
 Elkin P.
 Sevov L.
 Ladner H.
 Davis B.
 Patel P.
 Manna T.
 Garg K.
 Voloh I.
 Hawaz J.
 Sathu S.
 Leyba M.
 Mulawarman A.
 Louderback M.

K33: Write Amendment to
C37.234 on ungrounded bus
protection section

Assignment: Prepare amendment to IEEE C37.234-2021 Guide for Protective Relay Applications to Power System Buses, to add a statement to limit the applicability of clause 8.3 to ungrounded systems with largely balanced shunt capacitance to ground and to add guidance on systems with large unbalance shunt capacitance.

Sebastien Billaut, Chair
Arcadis
Lake Mary, FL

Koustubh Banerjee, Vice-Chair
Eversource Energy

Kamm, N.
 Leyba, M.
 Tuladhar, L.
 Zamani, A.

K35: Applying ground
detection banks to
ungrounded systems or
systems that can become
unintentionally ungrounded

Assignment: Develop a report on applying ground detection banks to ungrounded systems or system that can become unintentionally ungrounded.

Sebastien Billaut, Chair
Arcadis
Lake Mary, FL

T. Warren, Vice-Chair
Southern Company

Koustubh Banerjee,
Secretary
Eversource Energy

Das, S.
 Lebeau, D.
 Mulawarman, A.
 Patel, P.