Controls for Distribution Equipment



April 25, 2016 - Hilton Head, SC - Sonesta Resort

Chair: Nenad Uzelec

Meeting Minutes

1. Call to order and introduction:

Meeting was called to order at 7:02 by Nenad Uzelac, the chair.

2. Roster Check:

13 Members and 7 guests were in attendance.

3. Previous Meeting Minutes:

Minutes had been uploaded to the web site. Chis Ambrose moved to accept. François Soulard seconded.

4. Meeting Highlights:

- 1. This will be the taskforce's last meeting.
- 2. History:

This is the task force that has been going for many years. We started as a standard for some years and then moved to a taskforce which dragged. Changed course three years ago and were charged to have this as a RODE document which is ready now. It is about 120 pages.

The purpose of the document is to take items that are important to the control gear outside of the substation. Things are different there. Grounds are weaker, exposure to radiation emissions is more, it is harsher than in the substation. We do not have a standard for out there. Substation is covered by Relay standards. The environmental, mechanical, and electrical considerations are very different than inside the substation.

The document is a good reference that can be used within RODE sub-committee. It is not polished enough to be published in the IEEE though.

In the past three years we have talked about factors that reference out to other standards such as the transformer transformers. Talking with people it appears that we have enough material now to go back to square one and consider creating a standard for the IEEE World that covers items outside of C37.90, the relay world.

3. Discussion:

- a. Even within other switchgear standards that refer to the C57.12 series of standards enclosure integrity standard. This should be considered as part of the scope, any RODE type of equipment.
- b. One person stated they have to custom write requirements when specifying pieces of equipment. They would like to have a document that provides specifications to do so.
- c. On manufacturer would like to see a level of consistency. They could design a different control for every customer.

- d. The expectation of controls, when equipment has a control in any location, it seems that no one is comfortable in defining what should be done for testing. We should be able to focus on specific needs of product standards. This group's work has made them the expert on controls. We should reach out to each product standard about what is missing in their standard about controls. This should fill the gap.
- e. What sort of things would people see as major challenges that they see if we get into this as a standard.
 - i. One, making sure there are people working on this.
 - ii. Scoping it correctly not to interfere with Relay and substation standards.
- f. There are standards, and there are guides. Guides don't have requirements. There is a lot of information in the document that we have and tests for various chapters we talked about. How does this become a standard as equipment standard. Why would we not want to create a guide.
 - i. Different manufacturers may use different standards. Even in the IEC there are differences.
 - ii. Units conform to standards but not necessarily uniformity to which ones.
- g. When we started this it was for design considerations. Was the intent at RODE to create a guide? No, technical report. The proposal will be to go back to RODE and say that we would like to create a standard. If so, we should have a small task force put together to come back with a PAR in the fall.
- h. A manufacturer stated that they try to look for those things that need to be tested within their designs and pick a standard to design to if one exists. Otherwise they determine their own tests. One concern is having a standard dictate on how to design and test a product they make. Second thought is what do the users need? The third thought is that this is so complicated and broad to the point that we don't know if we have the expertise in this group to tackle this.
- i. A user stated that is just a box. The communications inside does not concern him, it is how it works with his system. The type of radio etc inside does not matter.
- j. A user stated that there are a lot of different tests performed on equipment they use by different manufacturer. This came about because there is no way of comparing the tests used on equipment that they make. He feels like there is a lot of items that will never show up in the standard requirements because there is a lot of years of experience manufacturers have that is not in a standard.
- k. One manufacturer stated that predecessors have created the boxes in use now. He needs to create a new improved box but does not know what the predecessors had made. It would be good if there were a basic set of common requirements, such as temperature, in the industry.
 - i. Question: Don't standard conditions cover that?
- The Chair commented that the key is to take a basic set of requirements that have to be
 done on every single control. This is an opportunity to come up with some minimum set of
 requirements for a utility to specify and the manufacturer to design for. There are too
 many gaps right now.
- m. One user stated for vault use. Use NEMA? IP, IK? For this standard we would need to deal carefully with water ingress. This user would like this since all would be on the same plane.
- n. Are we at a guide stage versus a standard state? A guide is non-binding. Chair felt that it would take 10 years to put a standard in then.
- o. Would it make sense to reach out to another committee that is concerned with Relays and controls such as Power Systems Relays? We can reach out but have done so in the past and have not had feedback from them.

- p. Chair proposed a straw vote. Recommend to RODE that we will have a task force come up with a PAR for the fall meeting for the standard Distribution Control Gear Equipment.
 - i. The scope of this group was to create a document and provide a report on controls to RODE. Then RODE can recommend how to proceed.
 - ii. If this group says don't do it then we will not put this request t RODE.
 - iii. 10 members voted yes, 1 no, and 2 abstentions
- q. Straw Vote: We recommend to disband as a group
 - i. 12 yes, 0 no, 1 abstention
 - ii. Who is willing to participate on taskforce if RODE starts one:
 - 1. Francois Soulard, Antone Bonner, Anil Dhawan, Karla Trost, Paul Found, Jeff Geiger, Tim Royster, Frank, Bill Walters, Kevin Rogerson, Frank DeCesaro, Nenad Uzelac
- 4. The Chair thanks everyone that work on this the past few years. It had a lot of work. The group thanked the Chair for his excellent leadership.

5.	Now	Rucinocc	
J.	INCW	Business	,

None.

6. Next meeting:

None

7. Meeting was adjourned at 9:12 AM

Annex: Member Attendance

Role	First Name	Last Name
Vice-Chair	Francois	Soulard
Secretary	Frank	DeCesaro
Member	John Paul	Adigwu
Member	Chris	Ambrose
Member	Robert	Behl
Member	Antone	Bonner
Member	Paul	Found
Member	Jeffrey	Gieger
Member	Peter	Glaesman
Member	Edward	Jankowich
Member	Travis	Johnson
Member	Chris	Lettow
Member	Donald	Martin
Member	Jeffery	Mizener
Member	Timothy	Royster
Member	Karla	Trost
Guest	Robert	Behl
Guest	Anil	Dhawan
Guest	William	Ernst
Guest	Jose	Jarque
Guest	John	Kaminski
Guest	Jon	Spencer
Guest	Kyle	Stromberg
Guest	Dustin	Sullivan
Guest	Steven	Meiners
Guest	Michael	Whitney
Guest	Keith	Wood

Submitted by:

Name Frank DeCesaro Date 9/21/2015