

*Cigre Study Committee B5
Annual Meeting and
Colloquium*

Bulletin 3

*Tromsø
NORWAY*

24th – 28th June 2019

The Norwegian National Committee (NONC) of CIGRE welcomes Study Committee B5 (Protection and Automation) to hold its 2019 Annual Meeting and associated Colloquium in Tromsø, Norway between 24th – 28th June 2019.

The Venue

Clarion Hotel The Edge in Tromsø has been chosen as the venue for both the Study Committee annual meeting and the Colloquium. This venue has very suitable meeting, conference rooms to host business events and accommodation. It is also close to other high-quality hotel and accommodation options.

The Programme

Sunday 23 June 2019

Whole day: Working Group (WG) meetings (optional)

Monday 24 June 2019

Morning: Tutorial Advisory Group (TAG) meeting

Whole day: Registration of delegates

Whole day: Working Group (WG) meetings

Afternoon: Thematic Group meetings (TM)

Tuesday 25 June 2019

Morning: Strategic Advisory Group (SAG) meeting

Whole day: Registration of delegates

Whole day: Working Group (WG) meetings

Whole day: Submission and discussion of prepared contributions to the Colloquium (SR)

Afternoon: 15:30-17:00, Poster Session

Evening: Welcome Cocktail at "Rorbua"

Wednesday 26 June 2019

Morning: Tutorial

Afternoon: Colloquium PS1 - Leveraging PMU data for better Protection, Automation and Control systems

Evening: Colloquium Dinner at Clarion Hotel the Edge

Thursday 27 June 2019

Morning: Colloquium PS2 - Time in Protection Applications – Time sources and distribution Methods

Afternoon: Colloquium PS3 - Future technologies for inter-substation communication, Migrating Digital Teleprotection Channels to Packet-Based Networks

Evening: Barbecue Dinner (Offsite: Sommarøy. Not included in the registration fee)

Friday 28 June 2019

Whole day: Study Committee annual meeting

Evening: Study Committee Dinner at Villmarkssenteret

The Colloquium

The Colloquium will be held in the Business conference centre facility at Clarion Hotel The Edge in Tromsø on Wednesday and Thursday, 26th – 27th June 2019.

The preferential subjects for this meeting will be:

PS1 - Leveraging PMU data for better Protection, Automation and Control Systems

- Use of PMU data to improve system models and to monitor analogue inputs
- Adaptive protection concepts utilizing PMU data
- Wide area schemes, novel backup protection, power swing protection, and synchronizing schemes based on PMU data
- Improvements in PACS commissioning and post-event analysis using PMU data

Special Reporter: Rafael Fernandes (BR)

PS2 - Time in Protection Applications – Time sources and distribution Methods

- Sources and distribution of time references in PACS and Wide Area Systems and the related accuracy
- Engineering of time synchronisation and time reference distribution for IEC 61850 process bus based protection and control applications
- Commissioning and testing of time reference sources and distribution means
- Expected behaviour of PACS functions in case of loss and recovery of time synchronisation

Special Reporter: Dr. Yubo Yuan (CN)

PS3 - Future technologies for inter-substation communication, Migrating Digital Teleprotection Channels to Packet-Based Networks

- Migration of Serial Teleprotection Channels to Packet-Based Networks and best practices for specifying, testing, commissioning and monitoring
- Specification of channel or network performance, data transmission and management of constraints for PACS
- Data Segregation including use of virtual networks and WDM (Wavelength-Division Multiplexing) for PACS and performance analysis methods
- Substitution of serial interface: Technologies, topologies, constraints and experience feedback

Special Reporter: Dr. Fred Steinhauser (AT)

The Colloquium Papers

Call for papers

Authors are invited to submit a Synopsis (about 500 words) of the proposed paper. The Synopsis should be sent by e-mail via their CIGRE SC B5 National Committee Member/Observer to reach the Secretary of Study Committee B5 (richard.adams@ramboll.co.uk) by **31 October 2018**.

Templates for Synopses and Papers are available at the conference website www.cigreb5tromsoe2019.com

Acknowledgement of reception

The submitted synopses will go through a peer review process. The Secretary of Study Committee B5 will notify receipt and acceptance of the synopses before November 15, 2018.

Submission of full papers

Upon synopsis acceptance, a full paper limited to 6 to 8 pages in CIGRE format should be submitted for the final contribution by **31 January 2019**. Papers are to be forwarded by e-mail to the Secretary of Study Committee B5 richard.adams@ramboll.co.uk.

Availability of Papers

Accepted final contributions will be available for the delegates at the conference website before 30 March 2019. Authors have to be aware that at least one of them has to attend the colloquium and the poster session.

Special reports

The special reports will be available at the conference website www.cigreb5tromsoe2019.com before **30 March 2019**.

Discussion contributions

All prepared contributions including word and PPT files should be sent to SC B5 Secretary and Special Reporter concerned by emails before **1 June 2019**. Contributors will be required to meet with SC Chairman, Special Reporter and SC Secretary in the SR meeting room on **25 June 2019** to review/discuss their contributions and to agree their time slots.

Spontaneous written contributions are also welcomed. Spontaneous oral contributions are accepted at the Chairman's discretion and depending on available time and degree of delegate reaction

The Tutorial

The tutorial will be held on Wednesday morning, 26 June 2019.

Impact of geomagnetic storms on protection

- Physical Phenomena – Dr. Paal Brekke (NO)
- Impact on Power Systems and Mitigation Techniques – Stein Ingebrigtsen (NO)
- Impact on Instrument Transformers and Protection – Dr. Bogdan Kasztenny (CA)

Precision Time Protocol PTP

- Principles and applications of Precision Time Protocol PTP – Roman Graf (CH)

The Poster Session

The authors are encouraged and given the opportunity to display their work in the poster session in the afternoon of Tuesday 25 June 2019.

The poster session is an interesting opportunity both for authors and visitors. Authors can present some details of their papers, while visitors can discuss directly with the authors.

Authors can send e-file to Colloquium Secretariat (stein.ingebrigtsen@statnett.no) before **1 May 2019** for reviewing if needed.

Local printing service will be available. For local printing, the authors can send the final version to the **Event organizer** (mette@xtenso.no) before **1 June 2019**. Posters produced after this date must be printed by the authors themselves and brought to the session. On-site printing service is not available.

Dimensions for poster presentation are A0 Portrait 841mm x 1189mm .

The Study Committee Annual Meeting

The Study Committee B5 annual meeting of Regular Members, Observers and Working Group Convenors will be held on Friday 28 June 2019.

Sponsoring

Companies and organisations are encouraged to sponsor the event. Sponsors will be visible and especially honoured and mentioned at different occasions during the event. Also free registration of delegate(s) are provided for sponsors according to the assigned agreement. Further details regarding sponsor opportunities are available at the conference website www.cigreb5tromsoe2019.com

Evening Events

Tuesday 25 June 2019 18:30-21:00
Welcome Cocktail and tapas at "Rorbua"

Wednesday 26 June 2019 19:00-22:30
CIGRE Colloquium Dinner at the Conference Hotel.

Thursday 27 June 2019 18:30-23:30
Barbecue Dinner at Sommarøy (Summer Island).

Friday 28 June 2019 19:00-22:00
Study Committee B5 Dinner at Villmarkssenteret (Wilderness Centre).

Registration

Registration will start from November 2018 through the conference website.
www.cigreb5tromsoe2019.com

For CIGRE SCB5 full delegates, the registration fee will include the CIGRE SCB5 conference packet, the participation at the tutorial, the colloquium and the poster session, as well as welcome cocktail on Tuesday, the conference dinner on Wednesday along with lunches and coffee breaks from Tuesday through to Thursday. The barbecue dinner on Thursday will need to be registered separately.

Hotel Accommodation

The preferred hotel accommodation is **Clarion Hotel The Edge**. Agreed discount rates will be available for this hotel when booking through the conference website. We encourage you to do the reservation as soon as possible.

A number of nearby hotels are also available:

- Scandic Ishavshotel
- Radisson Blu

Important Dates

Call for papers	Finished
Final date for submission of Synopsis	Finished
Date for notification of acceptance	Finished
Registration starts	1 November 2018
Final date for receipt of full papers	31 January 2019
Booking of WG meeting room	30 March 2019
Early bird registration deadline	30 March 2019

Final date for special rate for hotel	30 March 2019
Distribution of papers and special reports	15 April 2019
Final date for submission of poster for reviewing	1 May 2019
Receipt of prepared contributions	1 June 2019
Final date for submission of poster for printing	15 June 2019

Important Addresses

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