

## **Session Program**

**4-7 Feb 2020**



## **TTC 2020**

### ***Working Group Session***

CERN, 500/1-001 - Main Auditorium  
Several rooms

## Tuesday 4 February

11:00

### Working Group Session: WG2\_Couplers and Auxiliaries

**Session** | **Location:** CERN, 503/1-001 - Council Chamber | **Conveners:**  
Eric Montesinos, Naruhiko Sakamoto, Sang Hoon Kim

11:00–11:18 **Fundamental studies for power coupler in KEK (10'+8')**

**Speaker**

Yasuchika Yamamoto

11:18–11:36

**R&D Toward a 500 kW CW High Power Coupler with Variable Qext (10'+8')**

**Speaker**

Wencan Xu

11:36–11:54

**Qext studies for the 1.5 GHz BESSY VSR couplers (10'+8')**

**Speaker**

Emmy Sharples

11:54–12:12

**Our experiences and troubles on FPCs for RIKEN QWR (10'+8')**

**Speaker**

Kazutaka Ozeki

12:12–12:30

**Special design considerations of high power input couplers for TEM-type superconducting cavities (10'+8')**

**Speaker**

Tongming Huang

12:30

14:00

### Working Group Session: WG2\_Couplers and Auxiliaries

**Session** | **Location:** CERN, 503/1-001 - Council Chamber | **Conveners:**  
Eric Montesinos, Sang Hoon Kim, Naruhiko Sakamoto

14:00–14:18 **Update on FPC progress at DESY (10'+8')**

**Speaker**

Denis Kostin

14:18–14:36

**Experience with FPCs for the LCLS-II project at JLAB (10'+8')**

**Speaker**

Mircea Stirbet

14:36–14:54

**Test bench conditioning of the ESS couplers for elliptical cavities (10'+8')**

**Speaker**

Christian Arcambal

14:54–15:12

**High power testing of ESS FPCs on the elliptical cavities cryomodules (10'+8')**

**Speaker**

Guillaume Devanz

15:12-15:30

**Technical Issues on RF power coupler for QWR and HWR cavity in RISP (10' + 8')****Speaker**

Sangbeen Lee

15:30

16:00

**Working Group Session: WG2\_Couplers and Auxiliaries****Session** | **Location:** CERN, 503/1-001 - Council Chamber | **Conveners:**  
Naruhiko Sakamoto, Sang Hoon Kim, Eric Montesinos

16:00-16:18

**R&D Toward High Power Warm SiC Beam Line HOM Absorbers (10' + 8')****Speaker**

Doug Holmes

16:18-16:36

**HOM couplers for crab cavities and challenges (10'+8')****Speaker**

James Alexander Mitchell

16:36-16:54

**Newest Piezo-Actuators for High Dynamic Rate Operation (10'+8')****Speaker**

Yuriy Pischnalnikov

16:54-17:12

**Compact tuner designed to minimize the intervals of QWRs for RIKEN heavy-ion linac (10'+8')****Speaker**

Kenji Suda

17:12-17:30

**Resonance control with pneumatic slow frequency tuners for FRIB > half-wave resonators (10' + 8')****Speakers**

John Popielarski, Sang Hoon Kim

17:30

## Wednesday 5 February

11:00

### Working Group Session: WG2\_Couplers and Auxiliaries

**Session** | **Location:** CERN, 6/2-024 - BE Auditorium Meyrin | **Conveners:**  
Sang Hoon Kim, Eric Montesinos, Naruhiko Sakamoto

11:00-11:23

#### **Power Couplers - Technology, manufacturing, and four ways to procure for half the price (15' + 8')**

##### **Speaker**

Steve Einarson

11:23-11:46

#### **THALES experience for EU-XFEL project - From the (non)pre-industrialization phase to mass production (15'+8')**

##### **Speaker**

Stephane Bethuys

11:46-12:09

#### **Development of fundamental power couplers for several years at CETD (15' + 8')**

##### **Speaker**

Masao Irikura

12:09-12:30

#### **Remarks on the industrial production of FPC (15' + 8')**

##### **Speaker**

Daniel Trompetter

12:30

14:00

### Working Group Session: WG4\_New Fabrication Methods (1 /2)

**Session** | **Location:** CERN, 6/2-024 - BE Auditorium Meyrin | **Conveners:**  
Stephane Berry, Tug Arkan, Hiroshi Sakai

14:00-14:15

#### **Seamless cavities via electrodeposition**

##### **Speaker**

Lucia Lain Amador

14:15-14:30

#### **Developments of Niobium atomize powder for superconducting**

##### **Speaker**

Takeshi Dohmae

14:30-14:45

#### **Metal Additive Manufacturing at CERN in general and SRF Niobium**

##### **Speaker**

Romain Gerard

14:45-15:00

#### **Electron beam welding for cavity production, collaboration with KEK on internal welding of 1.3GHz type cavities**

##### **Speaker**

Peter Oving

15:00-15:15

#### **Novel Technologies applied to SRF (cavity) fabrication**

15:30

**Speaker**

Said Atieh

**15:15-15:30 Fabrication Experience with Balloon SSR Cavity at TRIUMF**

**Speaker**

Robert Edward Laxdal

16:00

**Working Group Session: WG4\_New Fabrication Methods (2 /2) and Alternative Cooling Techniques**

**Session** | **Location:** CERN, 6/2-024 - BE Auditorium Meyrin | **Conveners:** Hiroshi Sakai, Tug Arkan, Stéphane BERRY

**16:00-16:15 RFD crab cavities manufacturing experience at CERN**

**Speaker**

Marco Garlasche

**16:15-16:30 Methods and results of laser welding of niobium**

**Speaker**

Kyle Branigan

**16:30-16:45**

**Stand-Alone Cryocooler-Based Module for the ATLAS Multi-User Upgrade**

**Speaker**

Michael Kelly

**16:45-17:00**

**An effective thermal link for cooling cryo-magnetic systems : The Pulsating Heat Pipe (PHP)**

**Speaker**

Dr Bertrand Baudouy

**17:00-17:15 Developing conduction-cooled SRF cavities and first test results**

**Speaker**

Dr Ram Dhuley

**17:15-17:30 Results from a multi-metallic conduction-cooled SRF single-cell cavity**

**Speaker**

Robert Alan Rimmer

17:30

## Thursday 6 February

09:00

### Working Group Session: WG4\_Non standard concepts

**Session** | **Location:** CERN, 503/1-001 - Council Chamber | **Conveners:** Stéphane BERRY, Tug Arkan, Hiroshi Sakai

09:00–09:15

**Measurement results of moving particles during STF cryomodule assembly under slow pumping/venting in KEK (12/20)**

**Speaker**

Hiroshi Sakai

09:15–09:30

**IFMIF/QST on dust particle measurements by using "a vacuum particle counter"**

**Speaker**

Takashi Ebisawa

09:30–09:45

**Cryomodule design, assembly and installation utilizing "KOACH" system**

**Speaker**

Nari Yamada

09:45–10:00

**plasma processing and particulate's composition**

**Speaker**

Bianca Giaccone

10:00–10:15

**Development of the position monitor by white light interferometer method in cryomodule at cERL**

**Speaker**

Hiroshi Sakai

10:15–10:30

**Computer Vision solutions for Robot-assisted technology in SRF assembly at Fermilab**

**Speaker**

Silvia Zorzetti

10:30

11:00

### Working Group Session: WG4\_Robotic Techniques

**Session** | **Location:** CERN, 503/1-001 - Council Chamber | **Conveners:** Tug Arkan, Hiroshi Sakai, Stéphane BERRY

11:00–11:15

**Robotics HPR Application for Elliptical FRIB Upgrade Cavity**

**Speaker**

Laura Popielarski

11:15–11:30

**Robot assisted cavity HPR and assembly at IMP**

**Speakers**

Hao GUO, Teng Tan

11:30-11:45

**Remote handling of UHV beam pipe connections in high-radiation zones****Speaker**

Lukasz Piotr Krzempek

11:45-12:00

**Robotic disk stacking for the production of RF structures****Speaker**

Riccardo Zennaro

12:00-12:15

**Chemical & Electropolishing facility for niobium (HL-LHC) and copper (FCC) substrates****Speaker**

Valentin Gerbet

12:15-12:30

**Seeking for a novel fabrication technology large-bore SRF-QWR cavity for 1-ampere class linac****Speaker**

Hiroki Okuno

12:45