

15th International Conference on Heavy Ion Accelerator Technology - HIAT2022



Report of Contributions

Contribution ID: 1

Type: **not specified**

!!! SUNDAY (26.06.22) at 6 pm REGISTRATION !!!

Contribution ID: 2

Type: **not specified**

Session # 1 (Chair: Holger Podlech)

Monday, 27 June 2022 09:00 (1h 30m)

Contribution ID: 3

Type: **not specified**

Session # 2 (Chair: Holger Podlech)

Monday, 27 June 2022 11:00 (1h 40m)

Contribution ID: 4

Type: **not specified**

Session # 3 (Chair: Oliver Kester)

Monday, 27 June 2022 14:00 (1h 20m)

Contribution ID: 5

Type: **not specified**

Session # 4 (Chair: Francis Osswald)

Monday, 27 June 2022 15:50 (1h 30m)

Contribution ID: 6

Type: **not specified**

Session # 5 (Chair: Fabio Maimone)

Tuesday, 28 June 2022 09:00 (1h 30m)

Contribution ID: 7

Type: **not specified**

Session # 6 (Chair: Hanna Franberg Delahaye)

Tuesday, 28 June 2022 11:15 (1h 15m)

Contribution ID: 8

Type: **not specified**

Session # 7 (Chair: Fabio Maimone)

Tuesday, 28 June 2022 14:00 (1h 20m)

Contribution ID: 9

Type: **not specified**

P O S T E R Session

Tuesday, 28 June 2022 16:00 (1h 30m)

Contribution ID: 11

Type: **not specified**

Session # 9 (Chair: Markus Steck)

Thursday, 30 June 2022 09:00 (1h 40m)

Contribution ID: 12

Type: **not specified**

Session # 10 (Chair: Markus Steck)

Thursday, 30 June 2022 11:10 (1h 40m)

Contribution ID: 13

Type: **not specified**

Session # 11 (Chair: Luigi Celona)

Thursday, 30 June 2022 14:00 (1h 10m)

Contribution ID: 14

Type: **not specified**

Session # 12 (Chair: Christian Notthoff)

Thursday, 30 June 2022 16:00 (1 hour)

Contribution ID: 15

Type: **not specified**

Session # 13 (Guy Savard)

Friday, 1 July 2022 09:00 (1h 10m)

Contribution ID: 16

Type: **not specified**

Session # 14 (Frank Herfurth)

Friday, 1 July 2022 10:40 (1h 30m)

Contribution ID: 420

Type: **not specified**

Superconducting Magnets Challenges for the Future

Monday, 27 June 2022 09:40 (30 minutes)

Presenter: ROSSI, Lucio (Istituto Nazionale di Fisica Nucleare (INFN/LASA) Laboratorio Acceleratori e Superconduttività Applicata)

Contribution ID: 421

Type: **not specified**

Laser-Ion Acceleration in Plasmas

Monday, 27 June 2022 09:10 (30 minutes)

Presenter: SCHREIBER, Jörg (Ludwig-Maximilians-Universität (LMU) Physics Department)

Contribution ID: 422

Type: **not specified**

High Voltage Upgrade of the 14UD Tandem Accelerator

Tuesday, 28 June 2022 11:45 (25 minutes)

Presenter: NOTTHOFF, Christian (The Australian National University)

Contribution ID: 423

Type: **not specified**

Welcome to HIAT 2022

Monday, 27 June 2022 09:00 (10 minutes)

Presenter: HERFURTH, Frank (GSI Helmholtzzentrum für Schwerionenforschung GmbH (GSI))

Contribution ID: 424

Type: **not specified**

ISOLDE Isotope Production (LE, Post-Accel), for Physics, Material and Life Sciences (MEDICIS Inclusive), Facility Upgrades

Monday, 27 June 2022 11:00 (30 minutes)

Presenter: KOWALSKA, Magdalena (European Organization for Nuclear Research (CERN))

Contribution ID: 425

Type: **not specified**

Radioactive Ion Beams at TRIUMF, ISAC and ARIEL: Status and Perspectives

Monday, 27 June 2022 11:30 (30 minutes)

Presenter: AMES, Friedhelm (TRIUMF (TRIUMF) Canada's National Laboratory for Particle and Nuclear Physics)

Contribution ID: 426

Type: **not specified**

Status and perspective of ECR based charge breeders

Monday, 27 June 2022 12:00 (20 minutes)

Presenter: ANGOT, Julien (Laboratoire de Physique Subatomique et de Cosmologie (LPSC) Université Grenoble-Alpes, CNRS/IN2P3)

Contribution ID: 428

Type: **not specified**

Developments towards a Compact Carbon Ion Linac for Cancer Therapy (ACCIL)

Monday, 27 June 2022 14:00 (30 minutes)

Presenter: MUSTAPHA, Brahim (Argonne National Laboratory (ANL) High Energy Physics Division)

Contribution ID: 429

Type: **not specified**

Heavy Ion Stripping

Monday, 27 June 2022 14:50 (30 minutes)

Presenter: GERHARD, Peter (GSI Helmholtzzentrum für Schwerionenforschung GmbH (GSI))

Contribution ID: 430

Type: **not specified**

Establishment of the New Particle Therapy Research Center (PARTREC) at UMCG Groningen

Monday, 27 June 2022 14:30 (20 minutes)

Presenter: JONES, Brian (University Medical Center Groningen, Particle Therapy Research Center (UMCG-PARTREC))

Contribution ID: 431

Type: **not specified**

High Beam Power Operations at RIKEN: Technical Developments, Challenges and Resolutions

Monday, 27 June 2022 15:50 (30 minutes)

Presenter: KAMIGAITO, Osamu (RIKEN Nishina Center)

Contribution ID: 432

Type: **not specified**

Liquid Lithium Charge Stripper Commissioning with Heavy Ion Beams and Early Operations of FRIB Strippers

Monday, 27 June 2022 16:20 (30 minutes)

Presenter: KANEMURA, Takuji (Facility for Rare Isotope Beams, Michigan State University (FRIB))

Contribution ID: 433

Type: **not specified**

Development, Fabrication and Testing of the Rf-Kicker for the Acculinna-2 Fragment Separator

Monday, 27 June 2022 16:50 (20 minutes)

Presenter: BEECKMAN, William (SIGMAPHI S.A.)

Contribution ID: 434

Type: **not specified**

3D Printing (Additive Manufacturing) Applied to Accelerator Components

Tuesday, 28 June 2022 09:00 (30 minutes)

Presenter: TORIMS, Toms (Riga Technical University)

Contribution ID: 435

Type: **not specified**

Surface treatment procedures to mitigate ion-induced desorption in heavy ion accelerators

Tuesday, 28 June 2022 09:30 (20 minutes)

Presenter: VELTHAUS, Verena (GSI Helmholtzzentrum für Schwerionenforschung GmbH (GSI))

Contribution ID: 436

Type: **not specified**

Turbopumps: Lowest Vibration and Highest Uptime Made With Laser Balancing Technology

Tuesday, 28 June 2022 09:50 (20 minutes)

Presenter: HANNWEG, Andre (Pfeiffer Vacuum GmbH)

Contribution ID: 437

Type: **not specified**

A 3D printed IH-type linac structure - Proof-of-concept for additive manufacturing of linac rf cavities

Tuesday, 28 June 2022 10:10 (20 minutes)

Presenter: HÄHNEL, Hendrik (Goethe Universität Frankfurt (IAP) Institut für Angewandte Physik)

Contribution ID: 439

Type: **not specified**

Development and Commissioning of the K500 Superconducting Heavy Ion Cyclotron

Tuesday, 28 June 2022 11:15 (30 minutes)

Presenter: SOM, Sumit (Department of Atomic Energy (VECC) Variable Energy Cyclotron Centre)

Contribution ID: 440

Type: **not specified**

The status of Proton Testbeam at KAHVELab

Presenter: ESEN, Seyma (Istanbul University Department of Physics)

Contribution ID: 441

Type: **not specified**

Beam tuning automation activities at TRIUMF

Tuesday, 28 June 2022 12:10 (20 minutes)

Presenter: KIY, Spencer (TRIUMF (TRIUMF) Canada's National Laboratory for Particle and Nuclear Physics)

Contribution ID: 442

Type: **not specified**

Deceleration of Highly Charged Heavy Ion Beams

Tuesday, 28 June 2022 14:00 (30 minutes)

Presenter: STECK, Markus (GSI Helmholtzzentrum für Schwerionenforschung GmbH (GSI))

Contribution ID: 443

Type: **not specified**

Beam Instrumentation, Challenging Tools for Demanding Projects - A snapshot from the French assigned network

Tuesday, 28 June 2022 14:30 (30 minutes)

Presenter: POIRIER, Freddy (Cyclotron ARRONAX)

Contribution ID: 444

Type: **not specified**

Preparation of low-energy heavy ion beams in a compact linear accelerator/decelerator

Tuesday, 28 June 2022 15:00 (20 minutes)

Presenter: ANDELKOVIC, Zoran (GSI Helmholtzzentrum für Schwerionenforschung GmbH (GSI))

Contribution ID: 445

Type: **not specified**

FRIB at MSU: Status and Opportunities/Commissioning Experience at FRIB

Wednesday, 29 June 2022 10:35 (30 minutes)

Presenter: OSTROUMOV, Peter (Facility for Rare Isotope Beams, Michigan State University (FRIB))

Contribution ID: 446

Type: **not specified**

Status of the FAIR Facility

Wednesday, 29 June 2022 10:05 (30 minutes)

Presenter: SPILLER, Peter (GSI Helmholtzzentrum für Schwerionenforschung GmbH (GSI))

Contribution ID: 447

Type: **not specified**

Innovation Aspects in Future Accelerators for Hadron Therapy

Wednesday, 29 June 2022 11:30 (30 minutes)

Presenter: BENEDETTO, Elena (South East European International Institute for Sustainable Technologies (SEEIST))

Contribution ID: 448

Type: **not specified**

Welcome by the Technical Managing Director of GSI and FAIR

Wednesday, 29 June 2022 10:00 (5 minutes)

Presenter: BLAUROCK, Joerg (Facility for Antiproton and Ion Research in Europe GmbH (FAIR))

Contribution ID: 449

Type: **not specified**

The New GANIL Beams: Commissioning of SPIRAL 2 Accelerator and recent Developments

Wednesday, 29 June 2022 12:00 (30 minutes)

Presenter: FRANBERG DELAHAYE, Hanna (Grand Accélérateur Nat. d'Ions Lourds (GANIL))

Contribution ID: 450

Type: **not specified**

Status and Challenges of High Intensity Heavy Ion Accelerator Facility (HiAF) in China

Wednesday, 29 June 2022 12:30 (30 minutes)

Presenter: YANG, Jiancheng (Institute of Modern Physics, Chinese Academy of Sciences (IMP/CAS))

Contribution ID: 451

Type: **not specified**

nuCARIBU: Upgrade of the CARIBU Facility at Argonne

Thursday, 30 June 2022 09:00 (30 minutes)

Presenter: SAVARD, Guy (Argonne National Laboratory (ANL))

Contribution ID: 452

Type: **not specified**

Reinforcement Learning and Bayesian Optimization for Ion Linac Operations

Thursday, 30 June 2022 09:30 (30 minutes)

Presenter: MARTINEZ MARIN, Jose (Argonne National Laboratory (ANL) Physics Division)

Contribution ID: 453

Type: **not specified**

Automation of RF and Cryomodule Operation at FRIB

Thursday, 30 June 2022 10:00 (20 minutes)

Presenter: ZHAO, Shen (Facility for Rare Isotope Beams, Michigan State University (FRIB))

Contribution ID: 454

Type: **not specified**

Cavity Designs for the CH3 to CH11 and Bellow Tuner Investigation of the Superconducting Heavy Ion Accelerator HELIAC at GSI

Thursday, 30 June 2022 10:20 (20 minutes)

Presenter: CONRAD, Thorsten (Goethe Universität Frankfurt (IAP) Institut für Angewandte Physik)

Contribution ID: 455

Type: **not specified**

Recent Progress of Research and Development for the Cost Effective, Energy Efficient Proton Accelerator CYCIAE-2000

Thursday, 30 June 2022 11:10 (30 minutes)

Presenter: ZHANG, Tianjue (China Institute of Atomic Energy (CIAE))

Contribution ID: 456

Type: **not specified**

Longitudinal Beam Diagnostics R&D at GSI-UNILAC

Thursday, 30 June 2022 11:40 (30 minutes)

Presenter: SINGH, Rahul (GSI Helmholtzzentrum für Schwerionenforschung GmbH (GSI))

Contribution ID: 458

Type: **not specified**

Signal Estimation and Analyzing of Cold Button Bpms for a Low-beta Helium / Proton Superconducting Linac

Thursday, 30 June 2022 12:30 (20 minutes)

Presenter: ZHANG, Yong (Institute of Modern Physics, Chinese Academy of Sciences (IMP/CAS))

Contribution ID: 459

Type: **not specified**

A Novel CW RFQ for Exotic and Stable Beams

Thursday, 30 June 2022 14:00 (30 minutes)

Presenter: PALMIERI, Antonio (Istituto Nazionale di Fisica Nucleare (INFN/LNL) Laboratori Nazionali di Legnaro)

Contribution ID: 460

Type: **not specified**

Alternating phase focusing based DTL for heavy ion application

Thursday, 30 June 2022 14:30 (20 minutes)

Presenter: LAUBER, Simon (GSI Helmholtzzentrum für Schwerionenforschung GmbH (GSI))

Contribution ID: 461

Type: **not specified**

Recent UNILAC Upgrade Activities

Thursday, 30 June 2022 14:50 (20 minutes)

Presenter: SCHEELER, Uwe (GSI Helmholtzzentrum für Schwerionenforschung GmbH (GSI))

Contribution ID: 462

Type: **not specified**

Status and perspectives of the Advanced Ion Source for Hadrontherapy (AISHa)

Thursday, 30 June 2022 16:00 (20 minutes)

Presenter: CASTRO, Giuseppe (Istituto Nazionale di Fisica Nucleare (INFN/LNS) Laboratori Nazionali del Sud)

Contribution ID: 463

Type: **not specified**

Installation and Operation of Raisor, the Atlas Radioactive Ion Separator

Presenter: DICKERSON, Clayton (Argonne National Laboratory (ANL))

Contribution ID: 464

Type: **not specified**

High Intensity Proton Beams at GSI (Heavy Ion) UNILAC

Thursday, 30 June 2022 16:30 (20 minutes)

Presenter: BARTH, Winfried (GSI Helmholtzzentrum für Schwerionenforschung GmbH (GSI))

Contribution ID: 465

Type: **not specified**

Design Status of the EIC/Electron Ion Collider Design and Path Forward

Friday, 1 July 2022 09:00 (30 minutes)

Presenter: WILLEKE, Ferdinand (Brookhaven National Laboratory (BNL) Collider-Accelerator Department)

Contribution ID: 466

Type: **not specified**

Redundancy Concepts for Improved MTBF of RF Systems in Particle Accelerator Facilities

Friday, 1 July 2022 09:30 (20 minutes)

Presenter: LAU, Marcus (TRUMPF Huettinger GmbH)

Contribution ID: 467

Type: **not specified**

Mode Analysis of Single Spoke Resonator Type-2 (SSR2) for RISP

Friday, 1 July 2022 09:50 (20 minutes)

Presenter: HYUN, Myung Ook (Institute for Basic Science (IBS))

Contribution ID: 468

Type: **not specified**

Physics with Heavy Ion Accelerators

Friday, 1 July 2022 11:10 (30 minutes)

Presenter: BLOCK, Michael (GSI Helmholtzzentrum für Schwerionenforschung GmbH (GSI))

Contribution ID: 469

Type: **not specified**

First Intense Beam at JUNA 400 kV Underground Accelerator

Friday, 1 July 2022 10:40 (30 minutes)

Presenter: SUN, Liangting (Institute of Modern Physics, Chinese Academy of Sciences (IMP/CAS))

Contribution ID: 470

Type: **not specified**

Direct injection of intense heavy ion beams from an ECR ion source into an RFQ

Presenter: RODRIGUES, Gerard (Inter University Accelerator Centre (IUAC))

Contribution ID: 471

Type: **not specified**

Bus Tour FAIR Construction Site

Wednesday, 29 June 2022 09:15 (35 minutes)

Presenter: HERFURTH, Frank (GSI Helmholtzzentrum für Schwerionenforschung GmbH(GSI))

Contribution ID: 472

Type: **not specified**

Conference Photo

Wednesday, 29 June 2022 14:10 (10 minutes)

On the lawn outside the GSI/FAIR canteen