



Status Collaborazione ePIC e impegni INFN: i prossimi passi

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Today's agenda





Emphasys on next steps, R&D updates limited to planning (+ "real time updates from JLab")

ePIC Collaboration meeting

ePl**©**

We have a logo!

- 9-11 January ePIC Collaboration meeting @JLAB
- Good participation from Italy (6)

January 2023 ePIC Collaboration Meeting

■ 9 Jan 2023, 08:00 → 11 Jan 2023, 23:40 US/Eastern

Description

https://indico.bnl.gov/event/17621/

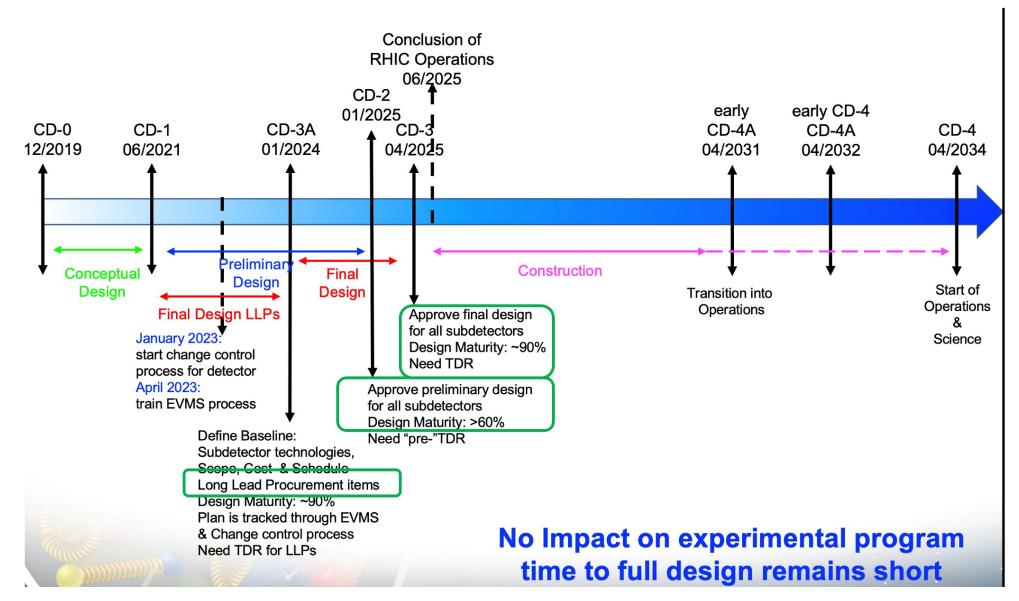
Building community!

Important updates



EIC/ePIC timeline: 8 years and 1 month from starting operations





ePIC has a leadership team



ePIC constitution approved last December
Candidates for apical positions presented their programmes / statement of intent at ePIC January meeting



John Lajoie Iowa State Universtity ePIC spokesperson



Silvia Dalla Torre INFN Trieste ePIC deputy spokesperson



Ernst Sichterman LBL ePIC Collaboration Council Chair



Bernd Surrow Temple University ePIC Collaboration Council Vice-Chair

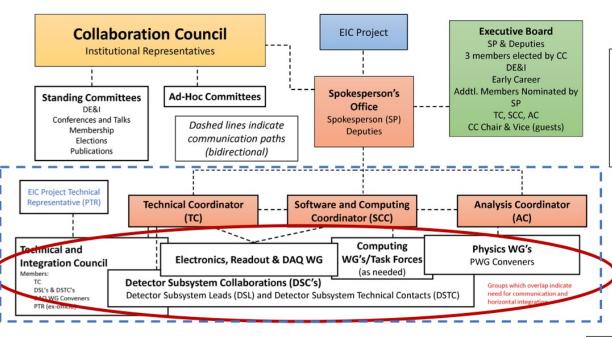
(thanks to D. Elia for serving in the Election Committee)

ePIC has a management plan



Presented at ePIC general meeting 24 February: https://indico.bnl.gov/event/18482/
Recording available

Collaboration Structure Including the Scientific Structure for the Next Two-Year Term



Transversal Task Forces

- Proposed by coordinators (TC,SCC,AC)
- Formed as needed to address critical issues, or issues that require coordination between efforts

Many aspects presented (not for today discussion) but the key thing is the requested transition from "generic detector/aggregated detector working group" to DETECTOR SUB-SYSTEM COLLABORATIONS

Transition of PWG is less "change of phase" (discussed Friday 3 March:

https://indico.bnl.gov/event/1 8483/

Task forces and transversal WG's provide the bridge between disparate efforts!

3/2/2023

ePIC Management Plan (Lajoie/Dalla Torre)

Examples:

- Background Task Force (formed by Project)
- Potential TF's: ACTS/Tracking TF, Global Event Kinematics, etc.

10/03/2023 EIC_NET - General Meeting

EIC NET is in a transition moment



by preparation of

preventivi 2024



ePIC is moving toward a real experiment organization

Creation of DSSC (and selection of their leaders + members) is step towards real commitments

Parallel to this process:

→ by 24th March!

- We need to make/define commitments among us
- We need to make commitments vis a vis INFN (move from _NET to "sigla"
- We need to prepare a sounding multi-year financial plan

We need to prepare a sounding mater year maneral plan We need to prepare an ePIC TDR within 19 months

What is happening?

- Consultation via Responsabili Locali in your groups about next steps about "sigla CNS3". Engage in your group! (so far collected feedback from BA GE PD groups)
- Meetings with Responsabili Locali of groups participating in tracker and in dRICH to steer transition to DSSC as INFN (note: very different situation)
- Updates and discussions to follow in general dRICH and tracking meetings

EIC_NET is in a transition moment (2)





As part of transition moment we will need to re-think our meetings:

→ by 24th March!

- dRICH meetings should stay in ePIC agenda now...
- INFN groups already part of ePIC in the tracking meeting (note EIC Silicon Consortium will morph too)
- should the Montecarlo & Simulation group move to ePIC (in tracking and dRICH)?

And we have many other meetings happening, very nice some of them are real!

[List I know....]

- SiPM electronics (BO-TO-FE)
- LAPPD R&D (GE-TS)
- For irradiation (CT-BO-SA-CS-GE)
- For test-beam data analysis (BO-TO-SA)
- Real meetings: for ALCOR (BO-TO), for simulation (TS-SA), for starting-up lab (CS-BO-CT-SA), for mechanics (FE-LNS), ...

Any suggestions about how to move on here?



Today's agenda ePIC Collaboration meeting Spokesperson + Deputy Management plan "transition moment"

Altre cose:

- Publication policy
- EIC School
- RRB
- Fondi DoE
- Varsavia
- R&D

But many other things are happening....



Miscellanea list of items to report discussed in next slides or talks

- Publication policy
- EIC School
- EIC NET General meeting
- RRB Fondi DoE
- NuPECC Long Range Plan: roles for Eugenio (SC), Silvia (detectors, convener), Marco (infrastructure, convener),
 Annalisa and Pietro (hadron physics)
- Varsavia meeting → see talk, but a) check with your responsabile locale and b) book your flights now
- R&D: -→ see talks

EIC_NET publication policy



- > Revised initial publication policy (november 2021) "evryone signs everything"
- > Scaled to a more realistic model given current (still separated lines of research) and a mechanisms of list of authors for each research line
- ➤ Approved by CEI last 24th February (after several round of discussions) → have a look

Per l'anno 2023 si prevedono le seguenti linee di ricerca e referenti:

- streaming readout (lavori in collaborazione a JLAB), referente: M. Battaglieri
- caratterizzazione sensori per tracciamento / vertex (lavori in collaborazione con vari gruppi ALICE), referente: D. Elia
- caratterizzazione SiPM, referente: R. Preghenella
- caratterizzazione LAPPD, referente: S. Dalla Torre
- dRICH prototype, referente: M. Contalbrigo simulazioni e studi performance di fisica su ePIC, referente: S. Fazio

What is happening now?

- Referenti linee di ricerca are collecting input for lists from Responsabili Locali
- Lists of authors to be approved soon

EIC NET: conferences and publications



Reminder:

- If you want to submit an abstract to a conference related to EIC_NET research check with your responsabile locale, then with the Conference Publication Committee (Pietro, Marta, Marco, Domenico)
- For a proceeding: check with your responsabile locale, then with the Conference Publication Committee (and authors involved)
- For a publication: see publication policy

Key message:

All this is to support talks at conferences & publications!!!

"Do good research, submit abstract, go to conference, publish papers"

EIC School: few lines in addition





18–22 Jun 2023 Corigliano-Rossano, Italy

First European School on the Physics of the Electron-Ion Collider

18–22 Jun 2023 Europe/Rome timezone

Overview

Important dates

Committees

Timetable

Contribution List

Call for Abstracts

My Conference

My Contributions

Registration

Participant List

Accommodation

How to reach the venue

School poster

Fee payment

Financial support

Bulletins

Sponsoring institutions

Sponsoring institutions



The 2023 edition of the European School on the Physics of the Electron-Ion Collider is sponsored by the following institutions and projects:

- Istituto Nazionale di Fisica Nucleare, Italy
- Center for Frontiers in Nuclear Sciences, USA
- STRONG2020: a European Union's Horizon 2020 Research and Innovation programme on hadron physics (grant agreement No 824093)
- · Physics Department of University of Calabria, Italy
- Salerno University and Physics Department "E. R. Caianello" of Salerno University, Italy
- Physics and Astronomy Department "E. Majorana" of Catania University, Italy
- RECAS Bari, Italy















- Superthanks to the LOC, in particular CS colleagues (Marcella, Salvatore, Enrico) and all Southern Italy institutions
- Exposure toward ePIC and European colleagues
- INFN students participation is key for its success: please register soon
- Advertize within your section
- "now too big to fail"

EIC NET Giornate Nazionali





Giornate nazionali EIC_NET 2023

22–23 Jun 2023 Corigliano-Rossano Europe/Rome timezone

ter your search term

Overview

Timetable

Registration

Participant List

How to reach the venue

Conference fee and accommodation costs

Contact

- Salvatore.Fazio@unical.it
- Pietro.Antonioli@bo.infn.it
- Marcella.Capua@fis.uni.
- Enrico.Tassi@unical.it

Le giornate nazionali EIC_NET 2023

Le Giornate Nazionali di Corigliano-Rossano sono la quinta edizione di una serie di appuntamenti annuali. I gruppi INFN interessati alla futura sperimentazione all'Electron-Ion Collider, (EIC) nuova macchina acceleratrice che sarà realizzata a Brookhaven (USA) ed è prevista entrare in operazione nel 2031, discutono stato e prospettiva del coinvolgimento italiano e dell'INFN in questo progetto scientifico internazionale.

A partire dalla prima riunione (avvenuta a Bari nel 2019) la situazione e' notevolmente evoluta. Nel 2022 è stata costituita la Collaborazione ePIC che sarà responsabile della progettazione, costruzione e operazione del principale detector previsto al collisionatore EIC.

La Collaborazione ePIC ha già tenuto due incontri internazionali (Stony Brook luglio 2022, Jefferson Lab gennaio 2023) e vi partecipano attivamente molti gruppi italiani. A febbraio 2023 sono stati eletti come spokesperson John Lajoie (Iowa University) e come deputy spokesperson Silvia Dalla Torre (INFN - Trieste), già responsabile nazionale di EIC_NET.

L'evento precederà il meeting internazionale dell' EIC Users Group (EICUG) (Varsavia 24-29 luglio) che include una terza riunione della Collaborazione ePIC.

La partecipazione alle giornate prevede una fee, comprensiva delle spese di soggiorno (pasti e pernottamento) presso il BV Resort Airone, dove nei giorni precedenti a questo incontro si terrà la prima edizione della "European School on the Physics of the Electron-Ion Collider".

https://agenda.infn.it/event/34631/

Register, register, register!

From DoE: eRD funds and Resource Review Board



Bureaucracy

Thanks to the work of INFN groups submitting proposals we got from DoE 435500 USD for FY23

Bureaucracy at work:

- Statements of Work agreed, Delibera CD (CD 16563/2023) approved last 24th February, one of the two needed contracts signed (and purchase order received) one still missing (problem on Jlab side!!)
- "INFN budget modification procedure" to be launched 15th March, with funds available beginning of April, otherwise
 we will end up to May

Various positions (PhD, post-docs) will be hired thanks to these funds in our INFN units!

- Opportunity for early career students
- Currently in discussion with some Responsabile Locale about how to optimize use of funds (co-funding is key) → iteration with CEI

First EIC Resource Review Board 3-4 April: Stony Brook University + visit to BNL

- Attendance from top management of funding agencies (D. Bettoni, R. Nania for INFN)
- One ePIC observer for each funding agency (P. Antonioli for INFN)
- ePIC management (John and Silvia, if appointed already also likely the ePIC Technical Coordinator, etc.)

Key occasion to "lobby/network" (and I will also bring a pack of EIC School posters...;-))

Conclusions



- Very exciting transition time!
- A time of choices: more than available for individual chats with groups / meetings





Status EIC project: eRD "targeted" funding + FY23



| Project | Торіс |
|---------|---|
| eRD101 | Modular RICH / aerogel RICH |
| eRD102 | Dual-radiator RICH |
| eRD103 | High-performance DIRC |
| eRD104 | Silicon service reduction |
| eRD105 | SciGlass |
| eRD106 | Forward EMCAL |
| eRD107 | Forward HCAL |
| eRD108 | Cylindrical / planar MPGD |
| eRD109 | ASICs / electronics |
| eRD110 | Photosensors |
| eRD111 | Silicon tracked (excluding electronics) |
| eRD112 | AC-LGAD (including ASIC) |
| eRD113 | Sensors for silicon trackers |

BA-BO-CS-CT-FE-LNF-LNS-RM1-SA-TO-TS

GE-RM2 (streaming readout)

Focus on detector R&D common to protocollaboration proposals

Resources finally allocated by EIC project in April 2022 for FY22 (7 months delay due to US delayed approval of Federal Budget): 265 k\$

- Resources mainly for post-doc and/or PhD positions
- eRD projects as a space to build alliances/consortia for detectors

TO

BO-FE-CS (**SiPM**) + TS-GE (**LAPPD**) (TO in FY22)

BA-TS-PD

BA-TS-PD

For FY23 eRD resources might equal CSN3 resources! A win/win operation. Careful planning of PhD and "CdR" (former assegni)!

- requests presented <u>at DAC (Detector Advisory Committee) 19-21 October</u> "positive feedback"
- "expect letters this week or anyway by Christmas" (cit E.A.)