

# Surya Sen Mahavidyalaya

Siliguri



ASSESSMENT PERIOD 2018-2019 TO 2022-2023

## SUPPORTING ATTACHMENTS

**CRITERION – 3** 

**Key Indicator – 3.5 Collaboration** 

3.5.1 Number of function MoUs/linkages with institutions/industries in India and abroad for internship, onthe-job training, project work, student/faculty exchange and collaborative research during the last five years.

## **Content:**

Visit to PETRA III, DESY, Hamburg, Germany for synchrotron experiments.

## **SURYA SEN MAHAVIDYALAYA**

[AMulti-streamGovt. Aided College &Recognised by UGCu/s2(f) &12(b)] [NAACACCREDITED][ISO 9001:2015] **BlockB,Surya SenColony,Siliguri,WB - 734004.** (Affiliated to University of North Bengal)

#### স্ম সেন লগ্নের সা লগ্নির সা মহাবিদ্যালয় ESTD.1998 ISO9001:2015

## **Department of Physics**

Date: 15.06.2023

#### Visit to PETRA III, DESY, Hamburg, Germany for synchrotron experiments

Dr. Arindam Karmakar and Mijanul Islam visited the synchrotron facility in PETRA III, DESY, Germany for performing XRD experiments in June 2023 on proposal submission and acceptance basis. The visit was funded by DST, India, upon open peer review of the proposal.

Proposal no.: I-20221187

Proposal title: Temperature dependent powder diffraction of pyroelectric-magnetoelectric oxides

Beamline: P21.1

**Duration:** 05.06.23, 09:00 hrs to 09.06.23, 09:00 hrs.

Mode of experiments: On site visit

Funding by: DST, India. Nodal Institute: JNCASR, Bangalore.

#### Participants:

PI: Dr. Arindam Karmakar, Assistant Professor, Dept. of Physics, Surya Sen Mahavidyalaya, Siliguri. Student: Mijanul Islam, Project Fellow, Dept. of Physics, Surya Sen Mahavidyalaya, Siliguri.







Working in the control room: Dr. Arindam Karmakar (left), Mijanul Islam (middle), Working in the instrument chamber by Dr. Arindam Karmakar (right).

Arindam Karmakar

Dr. Arindam Karmakar Assistant Professor Physics



Dr Arindam Karmakar <a karmakar@suryasencollege.org.in>

#### [DESY Photon Science - DOOR] Experiment scheduled

DOOR <door@desy.de> Reply-To: door@desy.de

To: akarmakar@suryasencollege.org.in

Sun, Dec 18, 2022 at 8:43 PM

Dear Dr. Arindam Karmakar,

During the last Call for Proposals for PETRA III you have submitted the proposal:

Proposal: I-20221187 'Temperature dependent powder diffraction of pyroelectric-magnetoelectric oxides'

Project leader: Dr. Arindam Karmakar Principal investigator: Dr. Arindam Karmakar

This proposal has been positively evaluated by the Project Review Panel, and we have scheduled beamtime as follows:

Beamline: P21.1

Experiment: X-ray diffraction

Your Local Contact is: Dr. Oleh Ivashko (oleh.ivashko@desy.de)

No. of scheduled shifts: 8.75

Assigned beamtime period: 05-Jun-2023 09:00 - 09-Jun-2023 09:00

#### Visa Application:

To avoid any delays please start the visa application as soon as possible. Due to changed procedures it may take weeks to months to get an appointment in the consulate.

Requests for invitation letters are now processed via DOOR (log in as "General User" and select "Visa - invitation letter" in the section "Preparation of scheduled beamtimes/experiments"). Participants can submit the request as soon as they're registered for the beamtime by the PI of the scheduled Proposal.

Next steps to be taken by the PI:

As soon as your beamtime is scheduled but not later than six weeks before the experiment please log on to DOOR: https://door.desy.de and

- fill in the "Declaration of substances" including upload of safety concept
- if applicable: fill in "Use of chemistry lab", "Use of biological agents" and "Use of own lasers"

In case you require special gases or specific technical installations for your experiment, please address your Local Contact as soon as possible to enable us to provide the requested support in due time. Please note that the delivery of special or high purity gases as well as gas mixes may require delivery time up to 12 weeks!

#### At least 4 weeks before the beamtime

- register all participants
- submit application for reimbursement of travel, hostel or shipment costs for University users from Germany or EU/EU associated countries

In addition, please make sure that all participants complete their online safety training (also accessible via DOOR) before coming to DESY. DACHS cards (access batch) can be obtained in bldg. 6/Room 110 (Mon-Thu 8:00-12:00 and 13:00-16:00, Fri 8:00-12:00 and 13:00-14:00) and outside office hours at the DESY main entrance, Notkestr. 85 (upon request).

Accommodation at the DESY Hostel should be booked as soon as possible and well in advance under specification of the facility (PETRA III/FLASH/DESY NanoLab) via

https://welcome-services.desy.de/hostel\_in\_hamburg/index\_eng.html

For any questions regarding your beamtime, please address your Local

Contact. For inquiries concerning your stay in Hamburg or any procedure in DOOR please do not hesitate to contact the DESY Photon Science User Office (door@desy.de).

We look forward to welcoming you here at DESY!

With best regards, **DESY Photon Science User Office** 



## जवाहरलाल नेहरू उन्नत वैज्ञानिक अनसंधान केंद्र

जक्कर पोस्ट, बेंगलुरु - 560064, कर्नाटक, भारत

विज्ञान एवं प्रौद्योगिकी विभाग, भारत सरकार के अधीन एक स्वायत्त संस्थान सम विश्वविद्यालय संस्था

#### Jawaharlal Nehru Centre For Advanced Scientific Research

Jakkur P.O., Bengaluru - 560064, Karnataka, INDIA

An autonomous institution under Department of Science and Technology, Govt. of India. An Institution Deemed-to- be-University





#### Prof. Kanishka Biswas Principal Coordinator, PETRA III Project

JNC/PETRA/IN-72

January 3, 2023

Dr. Arindam Karmakar Department of Physics Surya Sen Mahavidyalaya Siliguri, West Bengal - 734004

Dear Dr. Karmakar,

Please refer to your following allocated proposal to Petra-III:

ID: I-20221187

Title: "Temperature dependent powder diffraction of pyroelectric-magnetoelectric oxides"

Proposer: Dr. Arindam Karmakar Email: akarmakar@suryasencollege.org.in Nominated scientists: (1) Dr. Arindam Karmakar (2) Mr. Mijanul Islam

Beamline: P21.1

Allocated shifts: 8.75shifts (between 5/6/2023 to 9/6/2023)

Please note that necessary financial support for the 2 nominated scientists will be reimbursed by Jawaharlal Nehru Centre for Advanced Scientific Research from the DST-DESY project to carry out the proposed experiment on DESY, Germany and the maximum number of days for which DA will be paid is 6 days.

The Financial support includes:

- 1. Economy class return Air Fare from place of work to Hamburg and back (follow standard Govt. of India rule, i.e., booking through authorized Travel Agents viz. M/s Balmer Lawrie & Company, M/s Ashok Travels & Tours, IRCTC.
- 2. Local conveyance from place of Residence/Office to the Airport and back (place of Origin).
- 3. Return Taxi fare from Hamburg Airport to DESY.
- 4. Accommodation charge (maximum 50 USD per day).
- 5. DA as mentioned above @ (75 USD per day).
- 6. Visa fees and related travel and other costs.
- 7. Covid 19 test bills if any carried out for this specific travel.
- 8. Travel Medical Insurance.

While publishing the work the PIs should check with the beam scientist whether they would like to be co-authors. In addition, they should include in the acknowledgement the following text "Portions of this research were carried out at the light source PETRAIII of DESY, a member of the Helmholtz Association (HGF). We would like to thank NN\* for assistance at beamline NN\*\*. Financial support by the Department of Science & Technology (Government of India) provided within the framework of the India@DESY collaboration is gratefully acknowledged."

\* Names of the supporting beamline staff in case they are not co-authors

\*\* Name of the beamline(s)

The quarantine and medical expenses related charges if any will not be reimbursed and COVID related norm of DESY should be followed.

Please feel free to get in touch with us on india-desy@jncasr.ac.in for any clarification /assistance.

With best Regards,

(Kanishka Biswas)

PS: The PI should forward the TA form duly filled (attached with this letter) with all the necessary documents after the visit. For further information contact (india-desy@jncasr.ac.in).