

SESAME Fellowships (Call for 2015)

Background

The International Center for Synchrotron-light for Experimental Science and Applications in the Middle East (SESAME) is established in Jordan, under the auspices of UNESCO. Its mission is to promote international collaboration in the Middle East and neighbouring countries using synchrotron light for basic and applied research in physics, chemistry, biology, materials science, the environment, medicine, archaeology and other research areas of relevance to the region.

In September 2014, SESAME's booster synchrotron was successfully commissioned, and accelerated the injected beam from 20 MeV up to the design energy of 800 MeV, making it the highest energy accelerator in the Middle East. In March 2015, the first complete cell of SESAME's 2.5 GeV electron storage ring was assembled and successfully tested at the European Organization for Nuclear Research (CERN).

The SESAME laboratory will come into operation with two 'day-one' beamlines in late 2016/early 2017, shortly to be followed by a further two beamlines (there will be a total of seven Phase 1 beamlines), but already users are visiting SESAME for their work thanks to the Fourier Transform Infra-Red (FTIR) microscope that is operational there. These four beamlines are the following:

1. IR (infrared spectromicroscopy)
2. XAFS/XRF (X-ray absorption fine structure/X-ray fluorescence spectroscopy)
3. MS (materials science)
4. MX (macromolecular crystallography)

In 2006, a Memorandum of Understanding (MoU) was signed between the International Atomic Energy Agency (IAEA) and SESAME. One of the results is an interregional Technical Cooperation Project for capacity building, INT0086, in the use and operation of SESAME that aims *inter alia* at enhancing the skills of potential SESAME operators and users in different fields of operation of the SESAME Laboratory.

In this context fellowships, through the IAEA Technical Cooperation Project with SESAME and in accordance with the IAEA established procedures for fellowship awards, are available for young qualified scientists from SESAME Members to allow them to develop skills in well-established synchrotron radiation laboratories around the world needed to use any of the aforementioned four beamlines, or required for research they would wish to carry out at SESAME. They will be granted to scientists already having identified a synchrotron radiation laboratory at which to receive the proposed training, or those already having been accepted by a synchrotron radiation laboratory provided they are awarded a fellowship.

Eligibility for a Fellowship:

- National of one of the [SESAME Members](#).
 - A PhD or evidence of being engaged in research for a doctoral thesis in any of the disciplines of the physical or biological sciences.
 - Evidence of already having selected a host synchrotron radiation laboratory at which to receive the proposed training, or having been accepted by a synchrotron radiation laboratory provided a fellowship is granted.
 - Ability to work effectively in a multicultural environment with a multidisciplinary team of scientists, engineers and technicians.
 - Excellent oral and written command of English
 - Good communication skills.
 - Willingness to travel abroad.
- (Final award of fellowships under TC project INT0086, will be in accordance with the procedures for the IAEA Technical Cooperation Programme.)

Fellowships available and their duration

Ten (10) fellowships are available for a duration of 2-6 months.

Procedure for application

The following should be submitted in English:

- A duly completed application form ([SESAME Fellowship Application form](#)) A detailed C.V. with a clear indication of academic qualifications and positions held; major fields of training and research experience; and, in no more than five lines, current research work.
- A list of publications with an asterisk against the five most significant ones (articles are not to be submitted and abstracts are not to be listed or submitted).
- At least 2 recommendation letters from experienced scientists who know the applicant's work.
- In the case of an applicant having already been accepted by a synchrotron radiation laboratory, a letter of "acceptance" from the laboratory indicating that it is willing to accept him/her if a fellowship is awarded.

All applications received will be reviewed by a team consisting of SESAME and IAEA officials in accordance with the procedures for IAEA TC Fellowships programme.

How to apply

By 30 August 2015, the documents referred to in the Section "Procedures for Application" should be sent electronically directly to the SESAME Secretariat, to the following address sesame.fellowship.15@sesame.org.jo

For further information: please consult the SESAME web site: www.sesame.org.jo