Centro de Investigación en Computación

Instituto Politécnico Nacional

Call for Admission 2024 A

DCC

PhD in Computer Science

EDUCACIÓN
SECRETARÍA DE EDUCACIÓN PÚBLICA

IPN
Instituto Politécnico Nacional
"La Técnica al Servicio de la Patria"

ipn.mx

PRESENTATION

The Instituto Politécnico Nacional (IPN), and Centro de Investigación en Computación (CIC-IPN),

CALL

To those interested in pursuing studies in the PhD program in Computing Science, off line modality, to start in February 2024 under the following bases:

To obtain the degree of Doctor of Computer Science, the student must demonstrate their ability to carry out original and quality research. For this, the DCC program offers its students a solid and international-quality training and is registered in the National Postgraduate System (SNP) of the National Council of Humanities, Science and Technology (Conahcyt).

Full information about the DCC Curriculum can be found at the link: http://www.cic.ipn.mx/dcc

Admission Profile

The applicant to the PhD in Computer Science (DCC) program must have solid knowledge that allows them to approach the analysis and design of computational systems, models and algorithms, as well as a good level in the domain of mathematics, which together allow to develop an original and quality research project in the field of computer science.

The applicant must have a Master of Science and/or Master of Engineering degree, as well as have an academic and professional record that demonstrates their academic and intellectual capacity and coherence in their career, which allows them to ensure the successfully conclusion of their doctorate studies in the regulatory times.

Graduate Profile

The PhD in Computer Science will acquire solid knowledge, experience and creativity to carry out scientific activities, generating relevant and innovative contributions to provide solutions to scientific and technological problems, in some of the program's specialties.

The PhD in Computer Science will have developed during his training process, the critical capacity, aptitudes and abilities to solve problems that support and promote the general advancement of knowledge and that respond to the needs of the industry and the public and social sectors, both nationally and internationally. By applying the knowledge acquired and skills developed in their doctoral work, PhDs in Computer Science will be able to promote scientific and technological research, carrying out basic and/or applied research projects.

Entry Requirements

To enter the DCC postgraduate program, the applicant must comply at the time of registration with the requirements established in the Regulation of Postgraduate Studies of the IPN (REP-IPN), chapter I, articles 8, 10, 11 and 12 For more information you can consult the REP-IPN through the following URL:
http://www.cic.ipn.mx/REP/

The requirements are as follows:
1. Possess an official degree or certificate of completion of bachelor's studies, or an equivalent document for applicants who have studied abroad.

2. Possess, when appropriate, the master's degree certificate or the master's degree examination certificate.

3. Approve the admission process established in this call, demonstrating the ability to continue their studies at the doctoral level, by reaching the minimum score established by the Admission Committee for this process, as well as defending the presentation of the research proposal for doctoral studies.

4. Accredit with a minimum grade of eight or equivalent, the level of knowledge of the English language in four English language skills. Taking as a base criterion **level B1** of the common European framework of reference for languages, in accordance with the provisions of article 8, section VI and its last paragraph of the REP and the agreement of the College of Professors of the Computing Research Center.

5. Not having caused a permanent withdrawn from any postgraduate program of the IPN, by a well-founded and motivated resolution of the Academic Board, unless said collegiate body has revoked it. (Art. 8 Frac. V REP).

6. Express through the letter of reasons, the interest you have in entering doctoral studies and in developing your research work in one of the lines promoted by the Computer Research Center.

Revalidation of Credits

Those applicants interested in obtaining a revalidation of credits of postgraduate learning units previously completed, must submit the application to the College of Professors in accordance with the provisions of articles 15 and 17 of the Regulation of Postgraduate Studies of the IPN.
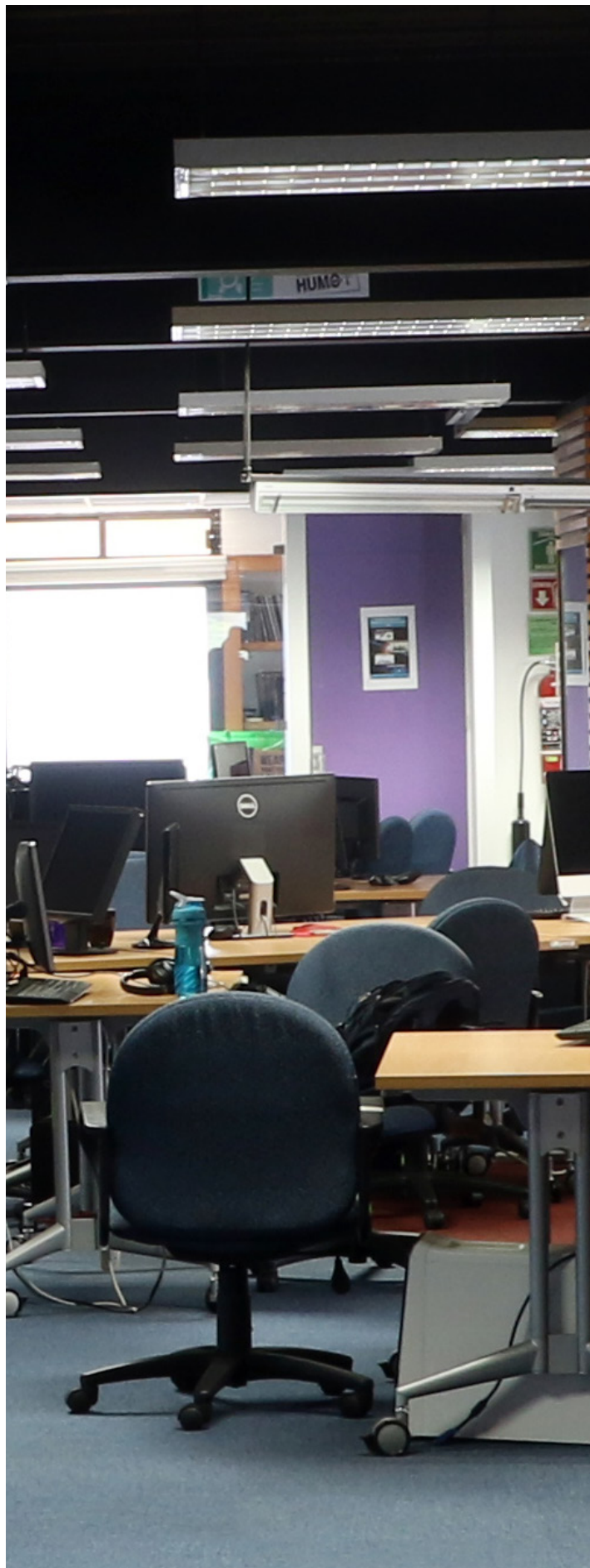
Requirements for Obtaining the Degree

Enrolled students must abide by the provisions of article 49 of the IPN Graduate Studies Regulations regarding the requirements for obtaining the degree, as established by agreement of the College of Professors:

I. Be enrolled in the Doctoral program in Computing Sciences

II. Approve the predoctoral exam.

III. Comply with the definitive individual program of activities.

IV. Have any of the following products, which must be related to their research work:

   1. Scientific or technological article published in a specialized magazine that is in levels A, B or C of the Catalog of Journals of the Institute or letter of acceptance for its publication.

   2. Patent registration at the Mexican Institute of Industrial Property (IMPI).

The tutorial committee will evaluate the concordance of the products with the student's research work, and will submit the result of the evaluation for approval by the College of Graduate Professors.

V. Develop a doctoral thesis with the characteristics indicated in the Regulation of postgraduate Studies of the IPN.
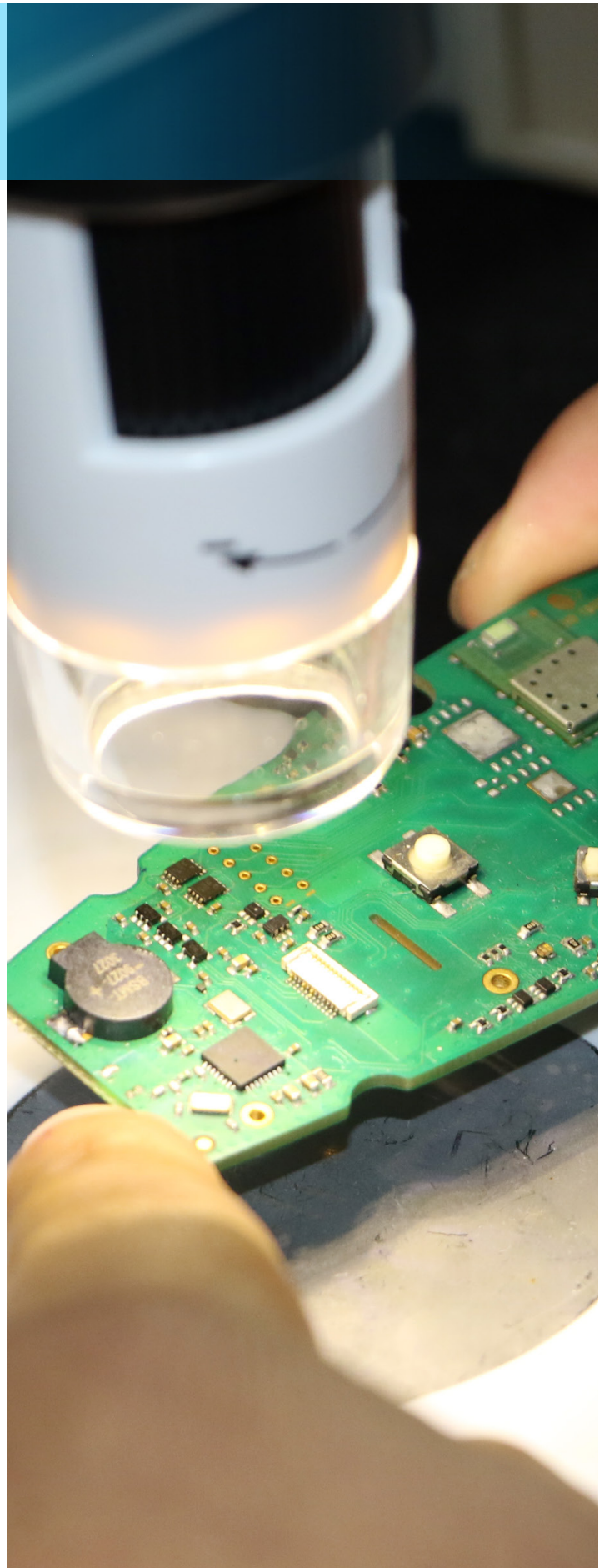
VI. Approve the graduation exam.

Research proposal for doctoral studies

The applicant to enter the PhD in Computer Science must begin with the preparation of a research proposal for their doctoral studies, which must be carried out under the supervision of a nominating professor, which will make up the applicant's research file. The nominating professor is a CIC-IPN professor with a doctoral degree who proposes the applicant's admission to the DCC as his possible thesis director.

In this proposal, the applicant will preliminarily raise a possible research topic.

The research proposal for doctoral studies must include the following elements:

a. Title of the proposal.

b. Preliminary description of the problem to be solved.

c. Review of related works reported in the state of the art, inside and outside the CIC.

d. General objective.

e. Goals (specific objectives).

f. Possible expected results and the relevance of the scientific contribution that is expected to be obtained.

g. Tentative program of activities.

h. Necessary resources for the development of the proposal.

i. References (include, in full length in PDF format, the main articles you consulted).

Admission Process

To enter the DCC Program, one of the following criteria must be met:

a.   Take the Graduate Record Examination General Test (GRE-General Test), EXANI-III, or Postgraduate Studies Admission Test (EXADEP)*.
The proofs of the GRE, EXADEP and EXANI-III exam with an antiquity of no more than 5 years on the closing date of the call are valid.

*The EXADEP has been discontinued, but it is accepted for those applicants who have previously taken this exam.

b.   Have equivalent research products in the opinion of the Admission Committee: patents or extensive publications included in Web of Science (WoS) or Scopus (except publications made in CIC journals).

In case of choosing to present the research products, the applicant must add to his work plan the publication of at least one article in a JCR indexed journal, or present evidence to his tutorial committee that has everything ready for publication in the period not exceeding 5 semesters.

The Admission Process begins with the online registration of the applicant; Subsequently, the necessary documentation must be sent and, finally, attendance at interviews with the Admission Committee for the defense of the research proposal for doctoral studies, technical-academic and psychometric aspects. The complete process is described in the following steps:

Step 1: Registration of the application for admission and completion of the necessary documentation
A. The applicant must make their request to start the admission process and send files, through the web application available in the following link:
http://www.cic.ipn.mx/registroA24/

Once the application has been made, the applicant will obtain a registration identifier (FOLIO), which will be used subsequently to register on the platform and for the subsequent sending of their documents, as well as to monitor the progress of their application process.

B. After registering, the applicant must send through the application the digitized and readable version in .PDF format **(LOW QUALITY IMAGES WILL NOT BE ACCEPTED)** of the following documents:
1. Signed admission application form with a child-size photograph. This format is generated through section A above.

2. Unique Population Registry Code (CURP) or passport in the case of foreign applicants.

3. Curriculum Vitae of the applicant.

4. Certificate of bachelor's and master's studies, specifying the general grade average, as well as the date of completion.

5. Bachelor's degree and master's degree diploma, examination record or proof of ongoing procedure.

6. Letter of reasons to enter the program, addressed to the Admission Commission and **signed by the applicant.**

7. 7.   Proof of compliance with the admission criteria: (one of the following documents):

a)   GRE, EXANI-III or EXADEP exam result.
b)   Research products.

8. Document proving mastery of four English language skills with reference to level B1. See the "Guía para la Acreditación del idioma inglés".

9. PDF file integrated by the following documents:
a)   Letter of Application signed by the proposing professor.
b)   Research proposal for doctoral studies.
c)   Presentation of your research proposal for doctoral studies, considering a maximum length of 15 sheets.

Notes for foreign applicants:

a)   All documents such as the bachelor's degree, degree diploma, the certificate of bachelor's and master's studies, must be submitted with their translation into Spanish and with the corresponding apostille. If it is in a language other than English or Spanish, a simple translation into one of those two languages must be submitted at the time the documents are sent.

b)   For more information on procedures and procedures for foreign applicants, see the following link:
https://www.ipn.mx/assets/files/posgrado/docs/buenas-practicas/guia-buenas-practicas-posgrado.pdf

In order to schedule the interviews, the applicant must send all the complete documents through the system. **Documents do not will be received by any other way.**

Step 2: Presentation and Defense of the research proposal for doctoral studies

The DCC Program Coordination will provide feedback to the applicant regarding compliance with the previous step, once the documentation is covered, the presentation and defense of the research proposal will be scheduled, for which the program coordination will inform the applicant about the date, time and jury assigned.

It is important to highlight that the presentation can be made online via videoconference, must have a maximum duration of 20 minutes and will be developed with the participation of the proposing professor as part of the designated jury.

Publication of results

The Admission Committee will evaluate each of the files of the applicants and will determine those who will be admitted to the Doctorate in Computer Science. The list of admitted applicants will be published in the "Admission Process" section of the official CIC-IPN portal. The ruling will be final.

Those accepted must attend the induction sessions according to the schedule published in the "Admission Process" section of the official CIC IPN website and must submit the following original documents for verification at the time of registration:

- Official identification
- Certificate of bachelor's and master's studies
- Birth certificate
- Bachelor's degree and Master's degree or equivalent
- Valid proof of English language proficiency

In the case of foreigners, all documents must have the translation and the corresponding apostille, likewise they must submit their CURP, which is processed once they have the document of legal stay in the country as students (FM3).

INCOMPLETE FILES WILL NOT BE RECEIVED.
If the applicant does not comply with the requirement of the comparison of the documents and the total delivery of the same, it will be considered that they voluntarily renounce the admission process and, therefore, their registration will not proceed.

Selection Criteria

In the candidate selection process, the following will be considered:

- The score obtained for the quantitative reasoning ability in the GRE, EXANI-III, EXADEP exam, or its equivalent in publications as established by the Admission Commission.

- Meeting the English language proficiency level requirement.

- The quality of the defense of the research proposal for doctoral studies.

- The delivery in time and form of the document.

Fees / Costs

The Computing Research Center of the Instituto Politécnico Nacional, is a public education institution of the Mexican state, so there are no costs or enrollment fees or tuition in our postgraduate programs.

Maximum Enrollment

The maximum enrollment of students projected for admission to the Doctorate in Computer Science is as follows, which will be covered only with those applicants who meet the requirements established in the admission process.

Program Start	Maximun Enrollment
February 13, 2024	25 students

Although the PhD program in Computer Science is a full-time program, for each admission process up to 20% of the accepted applicants may choose to register as part-time students, in which case they will not have the option of Conahcyt scholarship.

Scholarships and Supports

The Doctorate in Computer Science is registered in the Conahcyt National Postgraduate System. People enrolled in the CIC-IPN's Doctorate in Computer Science (DCC) program may request a monthly maintenance scholarship corresponding to 6 Unidades de Medida y Actualización (UMA), in accordance with the provisions of the current scholarship call.

Once the person is registered, they will be responsible for applying for the scholarship directly to Conahcyt, in accordance with the corresponding call. THE SCHOLARSHIPS AWARDED BY CONAHCyT ARE SUBJECT TO THE FEDERAL BUDGET GRANTED.

For further information, consult the link:
http://www.cic.ipn.mx/becasCONAHCYT/

The IPN manages the medical service coverage before the Mexican Institute of Social Security (IMSS) during the period of postgraduate studies, with the corresponding social security number.

Information

For information related with academic aspects:
Dr. Grigori Sidorov
Coordination of PhD program in Computing Science
E-mail: sidorov@cic.ipn.mx

For information related to administrative aspects:
Lic. Margarita Cedeño Mateos
Department of Educational Technologies
E-mail: admision@cic.ipn.mx
Facebook Messenger: @admisionCIC

Important Dates

In order to expedite the admission process, two cut-off dates are established. In the early cut-off a maximum of 9 students will be accepted. Applicants who could not be admitted in the first cut-off, due to having reached the maximum number of places or due to pending documents in their files, will be evaluated in the final cut-off. The priority in applying for scholarships is independent of acceptance in one court or another. **It is recommended to apply in the first cut-off**.

Early Cut-off	
Description	Period / Date (GMT-6)
Registration of the application for admission and sending of documents	From the publication of the call and until October 16, 2023
Defense of the research proposal for doctoral studies	From October 18 to 25, 2023, scheduled by the Program Coordinator
Publication of the results	October 31, 2023

Final Cut	
Description	Period / Date (GMT-6)
Registration of the application for admission and sending of the documentation	A partir de la publicación de la convocatoria y hasta 7 de enero de 2024
Defense of the research proposal for doctoral studies	From January 8 to 12, 2024, scheduled by the Program Coordinator
Publication of the results	January 19, 2024

For admitted applicants:

Description	Period / Date (GMT-6)
Induction session for admitted students	From February 6 to 8, 2024
Registrations	February 9 and 12, 2024
Beginning of the semester	February 13, 2024

In the event of any major situation that makes it impossible for the accepted applicant to enroll in the A24 semester, they may request to transfer their registration to the B24 semester.

Equity, equality and non-discrimination

The academic and administrative processes related to this call and to the completion of postgraduate studies at the National Polytechnic Institute are carried out without any distinction, whether for reasons of gender, ethnic origin, color, language, religion, political opinions or other reasons. . All this in order to ensure fairness, equality and non-discrimination

Unforseen Situations

Any situation arising during the admission process not contemplated in this call will be resolved in full compliance with the Regulations for Postgraduate Studies by the competent authority as appropriate.

This is an English translation for this call provided for convenience of the applicants. Any situation regarding this call will be resolved in terms of the official Spanish version.