Quality Assurance Requirements of the Interdisciplinary Medicine of Doctoral School, at the University of Szeged

1. IODI quality assurance requirements relating to management/organization

1.1 Basic principles of the IODI quality assurance plan

The IODI quality assurance plan is based on the principles of quality assurance and quality management, which are defined in the Quality Assurance Act. The multi-stage process of obtaining a doctoral degree places high demands on the doctoral candidates participating in it, the teachers and researchers assisting them, and the administrative staff. To ensure successful degree completion, the Interdisciplinary Medical Sciences Doctoral School has developed a quality control/quality assurance system that takes into account the specific characteristics of the field of science and covers the entire degree process of the University of Szeged.

- a) The IODI Doctoral Council (DT) reviews its training and quality assurance plan by January 31 each year to ensure that the necessary changes are made on an annual basis.
- b) The DT and subprogram leaders approve the IODI's annual report.
- c) The IODI publishes the results of the previous year on its website (results of PhD students and supervisors, defenses, dropout data, changes in supervisors), which can be commented on by the DT, subprogram leaders, supervisors, thesis writers, and doctoral students. They may communicate their opinions to the head of the Doctoral School verbally and in writing, and may make suggestions for changes. All of these are discussed by the DI Subprogram Directors and the DT, who take steps to change the processes in question and then incorporate them into the modified training and quality assurance plan.
- d) By February 15 of each year, the IODI publishes on its website the previous year's quality assurance report and, if necessary, the revised training and quality assurance plan.

1.2. Contents of the quality assurance plan of the Interdisciplinary Medical Sciences Doctoral School

1.2. a) Name of the quality assurance officer

The IODI DT entrusts Prof. Dr. Katalin Burián, university professor (SZTE SZAOK Medical Microbiology and Antimicrobial Immunity subprogram), with the task of quality assurance, who is responsible for the quality assurance of the IODI.

1.2. b) Acceptance of the quality assurance report

The public documents of the Doctoral School in Hungarian and English (training plan, quality assurance plan, forms) are available on the official website of the IODI: http://www.phd.szote.u-szeged.hu/Interdiszciplinaris_DI.htm and on the doktori.hu website: https://doktori.hu/index.php?menuid=316&lang=HU.

1.3. a) Students' options for filing complaints

The IODI provides students with the opportunity to file complaints regarding doctoral training. Students may submit their complaints in writing to the head of the Doctoral School or communicate them in person. The IODI DT acts on the complaint within 30 days and provides a written response to the student.

1.3. b) Issues concerning student status

Issues concerning student status are handled by the dean of the University of Szeged, Albert Szent-Györgyi Doctoral School. Student status is recorded by the administrator of the Doctoral School based on the university's Neptun system.

2. IODI quality assurance requirements for instructors

2.1.1. Academic/educational requirements for persons performing the duties of instructors and supervisors

IODI supervisors and teachers must meet the academic and educational requirements set out in the MAB (The Hungarian Accreditation Committee) and University of Szeged Regulations on Doctoral Training and Doctoral Degree Acquisition. This information is publicly available on the website of the National Doctoral Council. https://doctori.hu/index.php?menuid=316&lang=HU

2.2. a) 1. Review of the composition of existing core members and teaching staff

The IODI reviews the scientific and supervisory activities of its existing core members, supervisors, and teaching staff annually on the ODT website and makes recommendations for corrections if necessary.

2.2. b) 2. Admission requirements for new supervisors

The professional background of applicants with academic degrees who apply to become supervisors/instructors at IODI is evaluated by the IODI DT, which then decides whether to accept the application. The acceptance of the application is approved by the Doctoral Council of the University of Szeged. The IODI DT strives to ensure that only instructors/researchers who meet the university's habilitation requirements become members of the school, but based on individual assessment, thesis supervisors who only conduct research activities may also be accepted as IODI thesis supervisors. The IODI Council has made it mandatory that, starting June 1, 2022, instructors and researchers applying for admission as thesis supervisors must have at least two English-language Q1 or Q2-rated first/last author articles (full scientific publications) since their defense in the MTMT2 database.

2.2. c) Termination of the supervisor's mandate

This occurs if the internal supervisor (University of Szeged institute/clinical employee) terminates their legal relationship with the University of Szeged, or if the instructor/supervisor does not meet the publication requirements for two consecutive years and therefore does not have a publicly visible valid page on the doktori.hu website.

2.2. d) Conditions for involving an external supervisor in the supervision of a student

The condition for involving a new external supervisor is that they have a documented connection with the University of Szeged and, since their PhD defense, have at least two English-language, Q1 or Q2-rated first/last author articles (full scientific publications).

2.2. e) Publication of student evaluations of instructors and their consideration for quality assurance

The IODI DT provides students with the opportunity to evaluate teaching and research work. They may submit their opinions in writing to the head of the Doctoral School. Due to the nature of student feedback, it must be addressed immediately or during the annual quality assurance review.

2.3. Improving the educational environment and supporting teachers in acquiring new knowledge and methodologies – quality assurance

- **2.3.** a) The IODI DT selects the supervisors, teachers, and core members of the Doctoral School in such a way as to ensure that the educational environment is in place and that there is opportunity for its development in the given department or research laboratory.
- **2.3. b**) The IODI DT continuously motivates teachers to develop the curriculum and participate in training courses on new teaching techniques and their application in education.

3. IODI quality assurance requirements with regard to academic requirements

3.1. a) Review of course descriptions

Course descriptions are reviewed and revised annually by February 15 of each year.

3.1. b) Quality-oriented admission of IODI students to doctoral programs

The Doctoral School's admission rules stipulate the entry requirements in accordance with the Regulations for Doctoral Training and Doctoral Degree Acquisition, which are uniform for both full-time and individual students in terms of qualifications. Individual students enter doctoral training by taking a complex exam, skipping the training-research phase. (See section 5.1. e).

The IODI DT strives to select the most outstanding applicants. The DT scores and ranks students based on their admission and previous academic performance, while also taking into account their motivation and commitment to research work.

3.1. c) Transfer of theoretical and practical knowledge

In the IODI subprograms, theoretical knowledge is transferred through compulsory and elective courses taught by the most outstanding instructors, while practical knowledge is transferred through research work supervised by thesis advisors.

Continuous research work in departments or institutes and active participation in departmental life, e.g., through practical exercises and lectures, provide students with the opportunity to actively apply the knowledge they have acquired in previous courses relevant to their field of study.

4. IODI requirements during the doctoral admission procedure

4.1. a) For members of the admissions committee

In the case of Hungarian full-time students, the members of the admissions committee are the head of IODI DT and the subprogram leaders. If they are unable to attend, the head of IODI will arrange for a suitable replacement.

4.1. b) Quality assurance of the admission procedure for full-time students: topics, scoring system, and objective ranking

In the 100-point admission system, full-time students must achieve a minimum of 60 points to reach the admission threshold. (See Chapter IV, Sections 17-27 of the Regulations for Doctoral Training and Doctoral Degree Acquisition, and in detail, the IODI admission exam scoring sheet).

4.1. c) Technical details of the admission procedure

Admission can be done in person or online. External members of the examination board can also join the work of the examination board online. The language of the examination for foreign students is English.

4.1. d) The admission procedure for individually trained students consists of a complex examination (see section 5.1. e)).

4.2. Recording the experiences of the admission procedure

In its annual report, IODI DT describes its experiences with the admission process and makes recommendations for possible changes, e.g., regarding exam requirements and organization, which are incorporated into the training and quality assurance plan as amendments.

5. Quality assurance requirements for IODI doctoral training during doctoral training

5.1. a) 1. IODI strives to ensure personnel requirements

Members, thesis writers, and core members are selected in such a way as to ensure that the personnel requirements for research are met. IODI familiarizes its students with the latest teaching materials. With regard to compulsory subjects linked to compulsory foundation and sub-programs, it expects its lecturers to deliver high-quality lectures to their students and, in exceptional circumstances where the lecturer is unable to do so, to provide teaching materials and online consultation in online form.

5.1. a) 2. The IODI strives to ensure the necessary conditions

The IODI DT selects the supervisors, instructors, and core members of the Doctoral School in such a way as to ensure that the educational environment and the given department or research laboratory provide opportunities for development. (See section 2.3. a).

5.1. b) IODI monitors the progress of students in doctoral training

The doctoral school monitors the progress of its students in the Neptun database from enrollment to defense, and also monitors student requests received by the head of IODI, decisions of the Doctoral Council of the Field of Science, and examination documents.

The IODI requests the provisional performance records of full-time students every semester. It monitors course registration and completed courses (entry of grades, instructor signatures, dates).

At the end of every second semester, the Doctoral School requests the submission of a work log for the past academic year, which is accepted by the head of the IODI.

At the end of the fourth semester, the DI checks whether the student meets the conditions for admission to the exam based on the DI training plan and the Doctoral Training and Doctoral Degree Regulations.

After completing the eighth semester, the IODI Secretariat checks whether the student has a minimum of 240 certified study credits.

The student enters the degree acquisition procedure with the help of the DI's acting staff member, who prepares the defense committee reviewed and signed by the head of the Doctoral School and the necessary documents required by the Doctoral Regulations for the Doctoral Council of the Scientific Field (TDT). Two weeks before the defense, the IODI administrative staff member will publish the details of the defense on the IODI website and ODT page under "Planned Doctoral Defenses."

5.1. c) IODI supports the academic advancement of its students

With the help of supervisors, IODI DT encourages students to participate in face-to-face and online conferences, summer universities, part-time training, and EUGLOH programs currently operating with the participation of five European universities. IODI DT encourages students to apply for grants, e.g., ÚNKP, Richter scholarships, Cooperative Doctoral Program. IODI DT ranks applications within its jurisdiction. It encourages students to publish their scientific results in Open Access format and to use University of Szeged support to finance the related costs.

5.1. d) The IODI shall ensure the placement of students' publications

After enrollment, full-time and part-time students of the IODI register in the SZTE Repository, MTMT2, and affiliate themselves with their university institute/department. If a full-time student does not conduct research at a university institution, they must affiliate at least one publication related to their defense with the DI before the defense.

5.1. e) The procedure and requirements of the comprehensive exam; objective determination and regular review of evaluation criteria; expectations regarding the members of the examination committee

The IODI Secretariat checks the conditions for admitting full-time students to the exam. (90 credits, completion of foundation and compulsory courses) The IODI DT determines the examination committees and compulsory examination subjects for each subprogram in agreement with the supervisor and in accordance with the relevant provisions of the Doctoral Degree Regulations. (See Doctoral Training and Doctoral Degree Regulations, Chapter V, Sections 1-7.) The head of IODI invites experts in the given field to serve on the examination committees, and the TDT approves and accepts the proposal.

Students and their supervisors fulfill the preliminary requirements for the examination (research report, supervisor's evaluation of the work done with the student) in accordance with the

Regulations for Doctoral Degree Acquisition and the description of the IODI training plan. The examination committee receives the mandatory examination materials (minutes, student materials) at least 2 days before the examination date. The complex examination consists of 2 parts and its result will be counted 50-50% towards the final result. The first part is the theoretical part, the professional exam (replacing the previous doctoral comprehensive exam), in which the candidate must demonstrate their knowledge of the selected subjects. The second part is the dissertation part, during which the candidate must present a pre-prepared dissertation report on their research from the first two years and their planned research for the next two years (max. 10-12 slides; max. 15-20 minutes).

5.1. f) Individual students are admitted to the IODI by passing a complex examination

Applicants who have conducted research alongside their work (with at least one relevant publication) have the opportunity to take the complex examination twice a year. See the website of the Doctoral Institute of the University of Szeged. https://u-szeged.hu/dokint/hataridok In addition, applications for supplementary admission can be submitted between August 1 and 20 each year. At the end of the fourth semester, examinees must meet the same requirements as full-time students taking the complex exam.

Ensuring the quality requirements for members of the complex examination committee

We involve university lecturers and researchers who hold a PhD degree in the given field of science and are engaged in teaching activities at the university, and who have no conflict of interest with the student in any respect. See Regulations for Doctoral Degrees, Chapter V, Section 3. Committee members evaluate student performance based on Regulations for Doctoral Degrees, Chapter V, Section 6.

5.1. g) Monitoring the collection, processing, and use of student feedback and data related to student progress, as well as the implementation of decisions made in this regard (especially those related to dropout rates)

We monitor data related to student feedback and student progress (especially dropout rates) in accordance with university regulations.

5.2. Review of compulsory and elective course topics

The IODI DT regularly reviews its compulsory and elective subjects and their course syllabuses. Taking into account students' and teachers' suggestions, it updates and modifies them with new information, which it publishes on its website. At the same time, it changes its training plan.

6. IODI quality assurance requirements for doctoral degrees

6.1. a) 1. Verification of publication requirements for degree procedures

Based on the decision of the TDT on July 2, 2019, the IODI will apply both the old "IF-based" publication requirement and the new "classification based on D and Q ranking data" requirement system in parallel until December 31, 2023.

Based on the old "IF-based system," the requirement to be met in the two IODI subprograms, Medical Microbiology and Antimicrobial Immunity and Medical Genetics and Genomics, is 4.0 IF, while in the Preventive Medicine subprogram it is 1.0 IF (see IODI training plan).

From January 1, 2024, only the new "classification taking into account D and Q ranking data" requirement will remain in force, to which the IODI DT adds one point. When using an evaluation system that takes into account D and Q ranking data, if more than one person wishes to use the main article to obtain a degree, it must be specified exactly which parts or results are used by another candidate in their thesis. The same result cannot be included as an independent result in multiple procedures and dissertations.

6.1. b) Ensuring the verification of foreign language requirements

The IODI requires English as the first foreign language, which students must demonstrate by passing an intermediate-level complex language exam. The Doctoral School checks this during the admission process. If a student does not have an intermediate-level English language exam, the Doctoral School requires that they pass one as soon as possible. As a second language, students must pass a basic language exam in any living foreign language. They must provide proof of this with a language exam certificate before entering the degree program at the latest.

6.1. c) Quality guarantees for IODI students studying in a foreign language regarding the degree program

The IODI DT sets the same requirements for the defense of foreign-language students as it does for Hungarian-language students. In this case, however, all stages of the procedure are conducted in English, both in writing and orally. (dissertation, minutes, invitation)

6.1. d) Use of the Study and Information Center (TIK) plagiarism detection software program for the purpose of checking dissertations

The IODI DT recommends using the plagiarism detection program before sending dissertations to opponents.

6.1. e) Objective evaluation criteria for the public defense process and requirements, frequency of checks

The head of IODI and/or the subprogram director, as well as the doctoral student's supervisor, participate in person or online in the defenses related to the individual subprograms of the Doctoral School once a year. In this regard, it complies with the requirements set out in the Doctoral Degree Regulations. Objective evaluation is ensured by the IODI Council appointing a five-member committee, the chair of which is a university professor or holds a doctorate from the Hungarian Academy of Sciences, all other members hold academic degrees, and one member and one opponent are not university employees or members of the candidate's external institution.

The degree awarding process, requirements, and evaluation criteria are reviewed by the IODI every five years.

The defense committee is approved by the TDT and entrusted with compliance with the rules on conflicts of interest. The candidate may not have any joint publications with any member of the committee.

In the event of a negative recommendation by one of the reviewers, the TDT request a third reviewer in accordance with the above rules.

Based on two positive reviews, the TDT submit the dissertation for public discussion within two months.

The list of invitees, as indicated on the invitation, includes the head of the IODI, the student's supervisor, the members of the committee, the subprogram leader, and the members of the TDT. In addition to these, the doctoral student may invite anyone to the public defense.

The defense is public, where the doctoral student presents the theses of their dissertation in a free presentation lasting a maximum of 30 minutes. Afterwards, the reviews are presented publicly, and the candidate first answers the questions posed in writing by the reviewers, and then the spontaneous questions and comments posed by the audience (either online or in person).

The committee votes in closed session, secretly, based on uniform rules in all cases. It scores the thesis on a scale of 0-5. A minimum of 60% of the total score is required for a successful defense. The final result is also announced publicly by the chair and justified a few minutes after the defense. These steps ensure objectivity during the evaluation.

After this, the IODI DT accepts the defense, and then the TDT gives its opinion. Subsequently, the University Doctoral Council (EDT) approves the degree in a resolution. The student receives their doctoral degree classification based on their average defense score. (See Regulations for Obtaining a Doctoral Degree, Chapter 6, Section 47.)

In the case of a double degree, the doctoral degree regulations of the other university must also be taken into account, unless otherwise specified in the agreement between the two universities.

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