

## 1. BASIC DATA

|                             |   |
|-----------------------------|---|
| <b>Subject</b>              | Pediatric Dentistry I                     |
| <b>Degree</b>               | Degree in Dentistry                       |
| <b>School/ Faculty</b>      | Faculty of Biomedical and Health Sciences |
| <b>Course</b>               | Third                                     |
| <b>ECTS</b>                 | 6 ECTS                                    |
| <b>Character</b>            | Mandatory                                 |
| <b>Language(s)</b>          | Spanish/English                           |
| <b>Modality</b>             | Presential                                |
| <b>Semester</b>             | First semester                            |
| <b>Academic year</b>        | 2024/2025                                 |
| <b>Coordinating teacher</b> | Montserrat Diéguez Pérez                  |
| <b>Teacher</b>              | Mercedes Morales Morillo                  |

## 2. PRESENTATION

Pediatric Dentistry I is a subject in which, taking into account the formative profile that the student is expected to achieve, provides basic and specific training on the health and oral pathology of the child patient. At the same time, it helps the student to acquire the theoretical knowledge and practical skills necessary to make a correct clinical diagnosis, favour oral prevention, draw up treatment plans and introduce pre-clinical therapeutics into practice prior to the beginning of the practice with infantile patients. All this taking into account the degree of development and growth of the child.

The subject follows a chronological order that allows the acquisition of increasingly complex knowledge in a progressive way, in addition to the acquisition of manual dexterity that will be incorporated in the traditional and advanced simulation. In the planning of the Pediatric Dentistry curriculum, the general and specific competencies needed to develop the different levels of learning in the subject are clearly defined. The course is taught in Spanish and English given the strong international character of the European University of Madrid, providing students with sufficient tools to reach a level of knowledge that allows them to develop their professional work internationally.

## 3. COMPETENCIES AND LEARNING OUTCOMES

### Basic competencies:

- BC3 That students have the ability to gather and interpret relevant data (normally within their area of study) in order to make judgements that include reflection on relevant social, scientific or ethical issues.
- BC4 Students are able to transmit information, ideas, problems and solutions to both specialist and non-specialist audiences.
- BC5 That students have developed those learning skills necessary to undertake further studies with a high degree of autonomy.

### Transversal competencies:

- TC1. autonomous learning: A process that allows a person to be the author of their own development, choosing the paths, strategies, tools and moments that they consider most effective to learn and put into practice independently what they have learned. The autonomous student, in short, selects the best strategies to achieve their learning objectives.
- TC3. Ability to adapt to new situations: Be able to work under different conditions, different people and in different groups. It involves valuing and understanding different positions, adapting one's own approach as the situation requires.
- TC4: Ability to analyze and synthesize: Analysis is the method of reasoning that allows complex situations to be broken down into their constituent parts; it also allows other alternatives and perspectives to be evaluated in order to find optimal solutions. Synthesis seeks to reduce complexity in order to better understand it and/or solve problems.
- TC5: Ability to apply knowledge to practice: Ability to use knowledge acquired in academia in situations as close as possible to the reality of the profession for which they are being trained, for example, by relating theoretical foundations with their application to real problems in everyday life, addressing problems and situations close to professional activity or solving real questions and/or problems.
- TC7: Awareness of Ethical Values: Ability to think and act according to universal principles based on the value of the person that are directed to their full development and that entails commitment to certain social values.
- TC8: Information Management: Ability to search, select, analyze, and integrate information from diverse sources.

**Specific competencies:**

- SC10 Recognise normality and oral pathology, as well as the evaluation of semiological data.
- SC11 Identify the main reason for consultation and the history of the current disease. Take a general clinical history of the patient and a clinical record that accurately reflects the patient's records.
- SC12 Knowing the behavioural and communication sciences that facilitate dental practice.
- SC13 Handle, discriminate and select the appropriate materials and instruments in dentistry.
- SC14 Knowing dental biomaterials: their handling, properties, indications, allergies, bio-compatibility, toxicity, waste disposal and environmental impact.
- SC16 Knowing and using basic equipment and instrumentation for dental practice.
- SC18 Providing a global approach to oral care and applying the principles of health promotion and prevention of oral diseases.
- SC19. Educate and motivate patients in the prevention of oral diseases, control pathogenic oral habits, instruct them on correct oral hygiene, dietary and nutritional measures and, in short, on all methods of maintaining oral health.
- CE26. Recognise that the patient is the centre of attention and that all interactions, including prevention, diagnosis, planning and execution of treatment and maintenance, must seek the patient's best interests, avoiding any type of discrimination and respecting confidentiality. Identify the signs and attitudes that suggest the possible existence of maltreatment.
- SC44. Prepare and isolate the operative field.

**Learning outcomes:**

- RA1: To know the development and cranial and bucofacial growth of the child.
- RA2: To know how to describe the most frequent carious pathology in children, its diagnosis and treatment.

The table below shows the relationship between the competences developed in the subject and the learning outcomes pursued:

| Competencias   | Resultados de aprendizaje   |
|--|---|
| BC3, BC4, BC5,<br>TC1, TC3, TC5,<br>TC7, TC8, SC12,<br>SC10,   | <b>RA1.</b> To know the development and cranial and bucofacial growth of the child.                               |
| BC3 BC4, BC5,<br>TC1, TC3, TC4,<br>TC5, TC7, TC8,<br>SC14, SC17, SC21,<br>SC25, SC26, SC27,<br>GC4, GC14, GC17,<br>GC21, GC25,<br>GC26, GC27,<br>SC10, SC11, SC12,<br>SC13, SC14, SC16,<br>SC18, SC19, SC26,<br>SC44 | <b>RA2:</b> To know how to describe the most frequent carious pathology in children, its diagnosis and treatment. |

## 4. CONTENTS

The subject is organized into three learning units, which in turn are divided into themes (one, four or eight themes depending on the units):

### Unit 1. Introduction to Pediatric Dentistry

1.1 Introduction to Pediatric Dentistry.

### Unit 2. Dental morphology. Rash and occlusion

2.1 Morphology of the temporary dentition I.

2.2 Morphology of the temporary dentition II.

2.3. Nomenclature and dental maturation.

2.4. Dental development.

2.5. Tooth eruption.

2.6. Pathology of the eruption.

2.7. Occlusion and articulation in the temporary dentition.

2.8. Physiology of tooth replacement.

### Unit 3. Dental pathology and therapeutics in children

3.1. Isolation.

3.2. Dental caries in children.

3.3 Treatment of dental caries in children I.

3.4 Treatment of dental caries in children II.

## 5. TEACHING LEARNING METHODOLOGIES

The types of teaching-learning methodologies that will be applied are listed below:

- Master class.
- Portfolio.
- Case analysis.
- Cooperative learning.
- Problem-based learning.
- Laboratory practices. (Traditional simulation practices)
- Advanced simulation environments.

## 6. TRAINING ACTIVITIES

The types of training activities that will be carried out and the dedication in hours of the student to each one of them are identified:

### Presential modality:

| Training activity                             | Nº of hours |
|---|-------------|
| Master classes                                | 24          |
| Laboratory practices (traditional simulation) | 30          |
| Case análisis                                 | 4           |
| Practical exercises                           | 4           |
| Study and autonomous work                     | 70          |
| Seminars                                      | 8           |
| Tutoring                                      | 5           |
| Knowledge tests                               | 5           |
| <b>TOTAL</b>                                  | <b>150</b>  |

## 7. ASSESSMENT

The evaluation systems are listed below, as well as their weight on the total grade of the subject:

### Presential modality:

| Evaluation system                             | Minimum and maximum ponderation |
|---|---------------------------------|
| Knowledge test                                | 30%                             |
| Traditional and advanced simulation practices | 50%                             |
| Practical exercises/active methodologies      | 10%                             |
| Apoyo lingüístico (spanish)                   | 10%                             |

In the Virtual Campus, when you access the subject, you will be able to consult in detail the evaluation activities that you must carry out, as well as the delivery dates and the evaluation procedures for each of them.

In accordance with article 1, point 4 of the REGULATIONS FOR THE ASSESSMENT OF ACCREDITED UNDERGRADUATE DEGREES AT UNIVERSIDAD EUROPEA DE MADRID:

Students taking campus-based studies are required to demonstrate that they have attended at least 50% of their classes. Such attendance forms an essential part of the assessment process and is necessary to give the student the right to receive guidance, assistance and academic supervision from the professor. For such purposes, students must use the technological system put in place by the University to accredit their daily attendance at each of their classes. This system shall furthermore ensure that objective information is gathered regarding the active role of the student in the classroom. The failure to use the methods proposed by the University to demonstrate 50% attendance will give the professor the right to grade the course as a fail under the ordinary exam period. The foregoing does not affect other requirements of higher attendance percentages that each school may establish in their teaching guides or internal regulations.

Therefore, it is the authority of the professor that students who have not fulfilled the 50% of attendance in the ordinary call must pass all the evaluation tests in the extraordinary call, for which they must obtain a grade greater than or equal to 5.0 out of 10.0 in all of them (Faculty Board 11-07-23).

In accordance with article 6, point 12 of the REGULATIONS FOR THE ASSESSMENT OF ACCREDITED UNDERGRADUATE DEGREES AT UNIVERSIDAD EUROPEA DE MADRID:

Any student that uses or benefits from unlawful means during an evaluation test or that unduly attributes the author of the academic work required for the assessment will be graded as a “fail” (0) and may similarly be the object of a sanction, subject to the opening of disciplinary proceedings. In the case of the Final Graduation Project, the plagiarism or the lack of originality of the project, will automatically be graded as a “fail” (0) in the corresponding course in both ordinary and extraordinary periods. Likewise, the student will lose their status as a student during six months according with the General Standards for Graduation Projects and Master’s Thesis in its Article 5.

## 7.1. Ordinary call

In order to pass the course in the ordinary call, the student must obtain a grade higher or equal to 5.0 out of 10.0 in the final grade (weighted average) of the course. This grade will be the sum of the grades obtained in each of the assessment systems:

- **Knowledge test:** 30% of the final grade. The MODALITY of the test is FREE. The teacher has the right not to correct the test if the student does not sign the test because it means that he does not accept the rules of the same, if he does not indicate his full name, his file number and group to which he belongs. If the test mode is requested, the student must necessarily answer 80% of the questions asked, so that if more than 20% of the questions are not answered, the test will be considered invalid and if he does not underline in the template the unanswered answers, the correction will not be carried out either. Failure to comply with these rules will mean that the student will pass to the extraordinary call. If the test modality also includes short questions or a clinical case, both parts (test and short questions or clinical case) must be passed with at least 5.0 in each modality. The answer template must be signed for subsequent correction and include as already indicated the full name, file number and group to which it belongs. We insist on the need to read and understand the rules of the objective test as well as its signature, failure to comply with these rules automatically cancels the test.

- **Traditional and advanced simulation:** 50% of the final grade. The grade will be calculated as follows: 10% advanced simulation activity and 90% traditional simulation practices (all practices having the same evaluation weight, including the pre-tests carried out during the practices and the final practical exam, if this is carried out). On the day of the final practical test, the student must hand in the provided typodont, unless he/she needs to recover the simulation practices, it is a necessary condition to obtain the final grade of this block, for this he/she will have to notify via e-mail the delivery of the same and once verified, he/she will obtain the final grade of this practical evaluation. To pass the preclinical practices, all evaluations must be passed, including the pretests.

The student will only be able to take the final practical test if all the practical evaluations are passed, because if this is not the case either because one of the evaluations is not passed or because he/she needs to recover a practical, the day scheduled for the evaluation will take place the recovery and, on the day assigned for the recovery, he/she will take the practical exam. The last day of practices the student must deliver the provided typodont, unless you need to retake the traditional simulation practices in extraordinary call, it is a necessary condition to obtain the final grade of this block, for it will have to notify via e-mail the delivery of this and once checked will obtain the final grade of this practical evaluation.

It is possible to recover two practices of traditional preclinical simulation in ordinary call, either due to lack of attendance, or because it has not been passed or because of serious faults, regardless of the reason, only two modalities can be recovered and if they exceed, the student will go directly to the extraordinary period. If in the student's record there are more than two absences regardless of the modality (lack of attendance, practice not passed or serious failure), the student will go directly to the extraordinary period without having the option of recovering in the ordinary period. However, the advanced simulation activities are not recoverable in any case due to a logistical problem. The evaluation of each thematic block of the preclinical practicals implies having done all the practicals that compose the block and not having any serious fault such as unpunctuality and attending the practicals without the corresponding

material. The student will not be allowed to be absent from his work station until the professor of practices reviews the material to avoid exchanges between colleagues, if this happens (absent) it will be considered as a serious fault.

- **Active methodologies** account for 10% of the final mark. They represent 20% of the final grade. The activities corresponding to the methodologies section can be evaluated as long as the student passes the collaborative work and also 70% of the rest of the presential activities. The activity corresponding to the cooperative learning is equivalent to 50% of the final grade of the methodologies section and it is necessary the presential attendance of the student in the classroom whether he/she exposes or not, therefore the non-attendance will suppose its recovery in extraordinary call.

The grade obtained in the **group activity** will be the grade of this assessment, and presential attendance to group activities presentation is mandatory, even if the student's group is not presenting in that session. Nonattendance to a group activities presentation session will mean that the student will have to retake the group activity during the extraordinary period.

- **Apoyo lingüístico (Spanish)**. It represents 10% of pediatric dentistry I final grade. It is necessary to reach a 5/10 in this area to pass the subject of Pediatric dentistry I. In order to pass the course in the ordinary exam, you must obtain a grade higher or equal to 5.0 out of 10.0 in the final grade (weighted average) of the course.

In any case, it will be necessary to obtain a grade greater than or equal to 5.0 in the final test, so that it can be averaged with the rest of the activities.

#### **Objective test review protocol:**

All examined students are entitled to the exam review regardless of their grade. The final grades will be published on the virtual campus in the section intended for this purpose, stating the date and time for the review and will be developed, whenever possible, between the 2nd and 5th working day from the publication, as indicated in article 7.10 of the Evaluation Regulations of the Official Undergraduate Degrees. In order to guarantee the correct development of the review, students must previously notify the professors through the channel that the professor deems appropriate (mail, canvas, etc.) of their desire to attend the review and those who have not been notified will not be able to do so. During the exam revision, the student will be provided with his/her answer sheet, template and question booklet. He/she will not be able to open the computer, telephone and/or notes. Any doubt or disagreement with a specific question will be discussed with the professor, who will give an answer; if more time is required, the student may be asked to answer the question at another time. The maximum recommended time for a student to review his/her exam will be 15-20 minutes. The exam review will take place in person at the place indicated by the professor. The review date is official and, therefore, the teacher is not obliged to change the date if the student is unable to attend.

## **7.2. Extraordinary period**

In order to pass the course in extraordinary period, you must obtain a grade greater than or equal to 5.0 out of 10.0 in the final grade (weighted average) of the course.

In any case, it will be necessary for you to obtain a grade greater than or equal to 5.0 in each of the evaluation systems so that it can make average with the rest of the activities.

Activities that have not been passed must be handed in in an ordinary call, after having received the corresponding corrections from the teacher, or those that were not handed in. The teacher will indicate during the extraordinary call what activities, practices or knowledge test each student must complete and in which way.

In order to be able for to retake the subject in the extraordinary call it is essential to attend all the activities of the follow-up period, if the student does not show up on any of the days stipulated for this, in no case will he/she be able to pass the subject in this period. In addition, students must submit and pass with at least a 5.0 all the activities that the teacher considers necessary taking into account their progress during the academic year.

It is essential to obtain in each of these three blocks a grade that is greater or equal to 5.0 out of 10.0 so that it can be averaged with the rest of the activities. The student must attend presential the two weeks assigned to this period for the evaluation to be carried out.

In any case, it will be necessary to obtain a grade greater than or equal to 5.0 in the final test, so that it can make average with the rest of the activities.

The rules for the correction of the objective test are the same as those applied in the ordinary exam. Regarding the realization of the preclinical practicals, the work done on the typodont without the presence of the teacher and/or outside the phantom implies a serious fault and the failure of the practices. The activities and group work not passed in ordinary exams must be handed in after having received the corresponding corrections from the teacher, or in those cases in which they were not handed in. It is obligatory, in addition to their delivery, the presential attendance in the classroom on the days assigned by the teacher. The plagiarism of this implies the opening of disciplinary proceedings.

## 8. CHRONOGRAM

In this section you will find the schedule with delivery dates of evaluable activities of the subject:

| Actividades evaluables           | Fecha           |
|----------------------------------|-----------------|
| Activity 1. Laboratory Practices | Week 2-17       |
| Activity 2. Practical exercises  | Week 3, 4, 17   |
| Activity 3. Cooperative work     | Week 5-11       |
| Activity 4. Seminars             | Week 5,13,14    |
| Activity 5. Advanced Simulation  | Week 6-12       |
| Activity 6. Case analysis        | Week 6-11,15,16 |
| Activity 7. Knowledge test       | Week 19         |



This schedule may be modified due to logistical reasons of the activities. Any modification will be notified to the student in a timely manner.

## 9. BIBLIOGRAPHY

The reference work for the monitoring of the subject is:

- Boj JR, Catalá M, García C, Mendoza A, Planells P. Odontopediatría: Bebés, niños y adolescentes. Mexico: Odontología actual; 2019.

The following is a recommended bibliography:

- Barbería E. Atlas de Odontología Infantil para Pediatras y odontólogos. 2ª ed. Madrid: Ripano; 2014.
- Barbería E, Boj JR, Catalá M, García C, Mendoza A. Odontopediatría. 2ª ed. Barcelona: Masson; 2001.
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## 10. DIVERSITY UNIT

From the Educational Guidance and Diversity Unit (ODI) we offer support to our students throughout their university life to help them achieve their academic achievements. Other pillars of our action are the inclusion of students with specific educational support needs, universal accessibility in the different campuses of the university and equal opportunities.

This Unit offers students

1. Accompaniment and follow-up through counseling and personalized plans for students who need to improve their academic performance.
2. In terms of attention to diversity, non-significant curricular adjustments are made, i.e., at the level of methodology and evaluation, in those students with specific educational support needs, thus pursuing equal opportunities for all students.
3. We offer students different extracurricular training resources to develop different competencies that will enrich their personal and professional development.

4. Vocational guidance through the provision of tools and counseling to students with vocational doubts or who believe they have made a mistake in their choice of degree.

Students who need educational support can write to us at:  
[orientacioneducativa@universidadeuropea.es](mailto:orientacioneducativa@universidadeuropea.es)

## **11. SATISFACTION SURVEY**

Your opinion matters!

Universidad Europea encourages you to participate in satisfaction surveys to detect strong points and areas for improvement regarding the teaching staff, the degree and the teaching-learning process.

The surveys will be available in the survey space of your virtual campus or through your email.

Your assessment is necessary to improve the quality of the degree.

Thank you very much for your participation.