Integrated developmental age dentistry

1. COURSE INFORMATION

Academic year	2026/2027
Faculty	Faculty of Medicine and Dentistry
Field of study	Dentistry
Leading discipline	Medical sciences
Study profile	General academic
Level of education	Long-cycle Master's degree programme
Mode of study	Full-time
Module/course type	Compulsory
Method of verifying learning outcomes	Course completion
Teaching unit(s)	Department of Paediatric Dentistry, Medical University of Warsaw ul. Binieckiego 6, 02-097 Warsaw, tel.: +48 22 116 64 24 e-mail: pedodoncja@wum.edu.pl Department of Orthodontics, Medical University of Warsaw ul. Binieckiego 6, 02-097 Warsaw, tel.: +48 22 116 64 54 e-mail: ortodoncja@wum.edu.pl Department of Paediatric Neurology, Medical University of Warsaw Paediatric Hospital, ul. Żwirki i Wigury 63A, 02-091 Warsaw; tel.: +48 22 317 96 81 e-mail: neurologia.dsk@uckwum.pl
Head(s) of unit	Prof. Dorota Olczak-Kowalczyk, MD, PhD Prof. Małgorzata Zadurska Assoc. Prof. Krystyna Szymańska
Course coordinator	Paula Piekoszewska-Ziętek ppiekoszewska@wum.edu.pl

Person responsible for the syllabus	Department of Paediatric Dentistry - Paula Piekoszewska-Ziętek, MD, PhD - ppiekoszewska@wum.edu.pl Department of Orthodontics - Monika Walerzak, MD, PhD - monika.walerzak@wum.edu.pl Department of Paediatric Neurology - Małgorzata Bilska, MD, PhD - malgorzata.bilska@wum.edu.pl
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2. BASIC INFORMATION

Year and semester of study	Year 5, Semester 9	**ECTS credits**	3.00

CLASS FORMAT **Contact hours with an academic teacher**	**Number of hours**	**ECTS credit calculation**
lecture (L)	0	0
seminar (S)	4	0,16
practical classes (C)	36	1,44
e-learning (e-L)		
practical training (PT)		
professional placement (PP)		
Student's independent work		
Preparation for classes and assessments	35	1,40

3. LEARNING OBJECTIVES

C1	Ability to interpret the general medical history and the findings of subjective and objective dental examinations.
C2	Ability to develop a preliminary dental management plan, request specialist consultations and additional examinations, and interpret their results.
C3	Ability to plan dental care, including prevention of oral diseases and conservative, surgical, periodontal, orthodontic, and prosthetic treatment, taking into account the patient's cooperation and general health (selection of the treatment approach and methods, need for pre-treatment preparation, and postoperative care).
C4	Ability to maintain the patient's medical records.
C5	Acquisition of knowledge of orthodontic prevention in children with malocclusions requiring multidisciplinary treatment.
C6	Familiarisation with the principles of a holistic approach to the orthodontic patient.
C7	Management of developmental craniofacial defects requiring interdisciplinary treatment.

4. EDUCATION STANDARD – DETAILED LEARNING OUTCOMES

Learning-outcome symbol and number in accordance with the education standards	**Outcomes in the following areas**

Knowledge – the graduate* knows and understands:	
E.W1.	the relationship between morphological abnormalities, the function of altered organs and systems, clinical symptoms, and the available diagnostic and treatment options;
F.W2.	the principles of preventive and therapeutic management of diseases of the masticatory system at different stages of development;
F.W4.	the symptoms, course, and management of specific diseases of the oral cavity, head, and neck, taking age groups into account;
F.W12.	the causes of complications of stomatognathic-system diseases and the principles of managing such complications;
F.W19.	the pathomechanisms by which oral diseases affect general health;
F.W20.	the pathomechanisms by which systemic diseases or their treatment affect the oral cavity;
F.W23.	the specific aspects of dental care for patients with systemic disease and the principles of cooperation with the physician treating the underlying disease;
Skills – the graduate* is able to:	
F.U1.	take a medical history from a patient or the patient's family;
F.U2.	perform a dental physical examination of the patient;
F.U3.	explain the nature of the patient's condition, agree on treatment supported by the patient's informed consent, and discuss the prognosis;
F.U4.	communicate an unfavourable prognosis to the patient or the patient's family;
F.U5.	collect and secure material for diagnostic tests, including cytological examinations;
F.U6.	interpret the results of additional examinations and consultations;
F.U7.	determine indications and contraindications for a specific dental procedure;
F.U8.	treat acute and chronic odontogenic and non-odontogenic inflammatory processes of the oral soft tissues, periodontium, and jaw bones;
F.U9.	manage systemic and local complications occurring during and after dental procedures;
F.U10.	treat acute and chronic odontogenic and non-odontogenic inflammatory processes of the oral soft tissues, periodontium, and jaw bones;
F.U11.	maintain current patient documentation and issue referrals for diagnostic tests or specialist dental and medical treatment;
F.U13.	present selected medical problems orally or in writing in a manner appropriate to the audience's level;
F.U15.	determine treatment for diseases of the tissues of the stomatognathic system;
F.U16.	use appropriate medicines during and after a dental procedure to eliminate pain and anxiety;
F.U18.	diagnose, differentiate, and classify malocclusions;

F.U21.	provide treatment to prevent malocclusions during the primary dentition and early mixed-dentition periods;

**The appendices to the Regulation of the Minister of Science and Higher Education of 26 July 2019 refer to a "graduate", not a student.*

5. OTHER LEARNING OUTCOMES

Learning-outcome number	*(optional field)* **Outcomes in the following areas**
Knowledge – the graduate knows and understands:	
W1	
W2	
Skills – the graduate is able to:	
U1	
U2	
Social competence – the graduate is prepared to:	
K1	
K2	

6. CLASSES

Class format	**Course content**	**Learning outcomes**
Seminars	Department of Paediatric Dentistry (2 hours): S1 - Seminar 1 - Principles of planning dental care for paediatric patients. The seminar covers patient examination, assessment of preventive and therapeutic dental needs, interpretation of additional examination results, and cooperation with the child and caregivers. Preparation of a treatment plan taking into account the patient's individual needs and general health. Department of Orthodontics (2 hours): S1 - Introductory seminar: Multidisciplinary treatment of disorders of the masticatory system. The seminar presents the specific aspects of therapeutic management of patients with congenital developmental defects, neurological disorders, disabilities, injuries to the teeth and jaw bones, and a history of cancer treatment. It also covers agreeing a shared management plan with regard to the sequence, type, and timing of procedures.	F.W2., F.W4., F.W12., F.W19., F.W20., F.W23. E.W1., F.W2
Practical classes	Department of Paediatric Dentistry (24 hours):	

	Six practical classes, C1-C6, covering medical and dental history-taking, dental examination, diagnosis of oral diseases, identification of preventive and treatment needs, planning and interpretation of consultations and additional examinations, preparation of a treatment plan, and performance of preventive and therapeutic procedures in paediatric dentistry. C1 - Practical class 1 - Examination of paediatric patients C2 - Practical class 2 - Examination of paediatric patients C3 - Practical class 3 - Preventive procedures in paediatric patients C4 - Practical class 4 - Preventive procedures in paediatric patients C5 - Practical class 5 - Therapeutic procedures in paediatric patients C6 - Practical class 6 - Therapeutic procedures in paediatric patients Department of Orthodontics (12 hours) Four practical classes. The first class is delivered jointly with the Department of Paediatric Dentistry. During practical classes, the student independently takes a medical and dental history, performs a comprehensive and focused dental examination, and differentiates normal from abnormal occlusion and assesses normal and abnormal functions of the masticatory system with particular consideration of patients requiring interdisciplinary treatment, including those with congenital craniofacial defects, dental abnormalities, and neoplastic diseases, taking into account the effects of pharmacotherapy for underlying conditions on the planned treatment. The student plans orthodontic preventive procedures, additional examinations, and specialist consultations, communicates professionally with physicians of other specialties when planning interdisciplinary treatment, and assists in planning interdisciplinary dental treatment for patients up to 18 years of age. C1 - Practical class 1 - Orthodontic procedures in paediatric patients C2 - Practical class 2 - Orthodontic procedures in paediatric patients C3 - Practical class 3 - Orthodontic procedures in paediatric patients C4 - Practical class 4 - Orthodontic procedures in paediatric patients Department of Paediatric Neurology (2 hours): C1 - Practical class 1 - delivered by a team of doctors from the Department of Paediatric Dentistry and the Department of Paediatric Neurology: analysis of medical records, dental examination, identification of preventive and treatment needs, and principles of dental management of a child with a chronic disease.	C1, C2, C3, C4, C5, C6: F.U1., F.U2., F.U3., F.U4., F.U5., F.U6., F.U7., F.U8., F.U9., F.U10., F.U11., F.U13., F.U15., F.U16., F.U18 C1: F.U1, F.U2., F.U3., F.U4., F.U6., F.U7., F.U9., F.U13., F.U15., F.U18., F.U21. C2: .U1, F.U2., F.U3., F.U4., F.U6., F.U7., F.U9., F.U13., F.U15., F.U18., F.U21. C3:.U1, F.U2., F.U3., F.U4., F.U6., F.U7., F.U9., F.U13., F.U15., F.U18., F.U21. C4: .U1, F.U2., F.U3., F.U4., F.U6., F.U7., F.U9., F.U13., F.U15., F.U18., F.U21. F.U1., F.U2., F.U3., F.U4., F.U5., F.U6., F.U11., F.U13., F.U15., F.U18.

7. READING LIST

Required reading

1. Contemporary Developmental-Age Dentistry [Współczesna Stomatologia Wieku Rozwojowego], eds. D. Olczak-Kowalczyk, J. Szczepańska, and U. Kaczmarek, Med Tour Press International, 2017 (chapters 10 and 12).
2. Compendium of Developmental-Age Dentistry [Kompendium Stomatologii Wieku Rozwojowego], ed. Prof. D. Olczak-Kowalczyk, MD, PhD, Med Tour Press International, 2023 (chapter 8).
3. Pharmacotherapy of Dental Infections in Children and Adolescents [Farmakoterapia zakażeń stomatologicznych u dzieci i młodzieży], ed. D. Olczak-Kowalczyk, Med Tour Press International, 2015.
4. Outline of Contemporary Orthodontics [Zarys współczesnej ortodoncji], ed. I. Karłowska, PZWL, 2008.
5. ABC of Orthodontic Materials and Techniques [ABC Materiałów i Technik Ortodontycznych], ed. A. Komorowska, Polish Orthodontic Society, 2009.
6. Procedures in Paediatric Dentistry (course handbook) [Procedury w stomatologii dziecięcej], eds. D. Olczak-Kowalczyk and P. Piekoszewska-Ziętek, Warsaw, 2023.

Supplementary reading

1. Diseases of the Oral Mucosa and Periodontium in Developmental Age [Choroby błony śluzowej i przyzębia wieku rozwojowego], eds. D. Olczak-Kowalczyk and R. Górska, Medical University of Warsaw, 2009.
2. Contemporary Orthodontics [Ortodoncja Współczesna], W.R. Proffit, Elsevier Urban & Partner, 2009.
3. Selected Hereditary Diseases and Developmental Defects in Dental Practice [Wybrane choroby dziedziczne i wady rozwojowe w praktyce stomatologicznej], eds. B. Siemińska-Piekarczyk and M. Zadurska, Med Tour Press International, 2008.
4. Paediatric Dentistry [Stomatologia dziecięca], A.C. Cameron and R.P. Widmer, 2nd Polish ed., edited by U. Kaczmarek, Urban & Partner, 2013.
5. Czasopismo Stomatologiczne, Polish Dental Society.
6. Orthodontic Forum [Forum Ortodontyczne], Polish Orthodontic Society.
7. Stomatologia Współczesna, Med Tour Press International.
8. Nowa Stomatologia, Borgis.

8. METHODS OF VERIFYING LEARNING OUTCOMES

Course learning-outcome symbol	Method of verifying the learning outcome	Pass criterion
Department of Paediatric Dentistry		
F.W2., F.W4., F.W12., F.W19., F.W20., F.W23.	Oral assessment of preparation for the seminar. During the seminar, the teacher asks questions of all participants.	Active participation in the seminar and correct answers to the teacher's questions. Failure

		to answer a question results in failure of the seminar and the requirement to complete an oral assessment covering the seminar material.
F.U1., F.U2., F.U3., F.U4., F.U5., F.U6., F.U7., F.U8., F.U9., F.U10., F.U11., F.U13., F.U15., F.U16., F.U18.	Assessment of activities performed in accordance with the practical-class plan. Written test covering knowledge acquired during seminars and practical classes (20 single-best-answer questions with three distractors and one correct answer). The first and second attempts at the test are conducted in written test form. A student who does not pass is entitled to two resit attempts. For the second resit, the student may ask the Dean to allow an observer designated by the student government to attend. The Dean may permit a board assessment if justified objections concerning the conduct of the assessment are raised. The result of the board assessment is final. Scope of material: Compendium, chapter 8, and Contemporary Dentistry, chapters 10 and 12. Preparation of a presentation of a clinical case from practical classes at the Department of Paediatric Dentistry or the Department of Paediatric Neurology. Presentation components: 1. Presentation of the patient examination, consultations, and results of additional examinations (5 points) 2. Identification of preventive and therapeutic dental needs (5 points) 3. Dental management plan (5 points) 4. Preventive and therapeutic procedures performed (5 points)	Active participation in practical classes. The written test is passed with at least 60% correct answers. Grade Criterion 2.0 (fail) <12 points 3.0 (satisfactory) 12-13 points 3.5 (satisfactory plus) 14-15 points 4.0 (good) 16-17 points 4.5 (good plus) 18-19 points 5.0 (very good) 20 points Preparation of a presentation. The substantive content, delivery, and ability to engage in discussion are assessed. A total of 20 points is available, with 5 points for each presentation component. Grade Criterion 2.0 (fail) <12 points 3.0 (satisfactory) 12-13 points 3.5 (satisfactory plus) 14-15 points 4.0 (good) 16-17 points 4.5 (good plus) 18-19 points 5.0 (very good) 20 points
Department of Orthodontics		
E.W.1, F.W2.	Oral assessment of preparation for the seminar.	Active participation in the seminar and correct answers to the teacher's questions.
F.U1., F.U2., F.U3., F.U4., F.U6., F.U7., F.U9., F.U13., F.U15., F.U18., F.U21.	Assessment of activities performed in accordance with the practical-class plan. Written test covering knowledge acquired during seminars and practical classes (10 single-best-answer questions, 2 points per question, with three distractors and one correct answer). The first and second attempts at the test are conducted in written test form. A student who receives a failing grade in a course ending with course completion is entitled to two resit attempts.	Active participation in practical classes. The written test is passed with at least 60% correct answers. Grade Criterion 2.0 (fail) <12 points 3.0 (satisfactory) 12-13 points

	The board assessment is oral and is conducted by a committee appointed by the Head of the Department.	3.5 (satisfactory plus) 14-15 points 4.0 (good) 16-17 points 4.5 (good plus) 18-19 points 5.0 (very good) 20 points
	Preparation of a presentation of a clinical case from practical classes at the Department of Orthodontics. Presentation components: 1. Presentation of the patient examination, consultations, and results of additional examinations (5 points) 2. Identification of preventive and therapeutic dental needs (5 points) 3. Dental management plan (5 points) 4. Preventive and therapeutic procedures performed (5 points)	Preparation of a presentation. The substantive content, delivery, and ability to engage in discussion are assessed. A total of 20 points is available, with 5 points for each presentation component. Grade Criterion 2.0 (fail) <12 points 3.0 (satisfactory) 12-13 points 3.5 (satisfactory plus) 14-15 points 4.0 (good) 16-17 points 4.5 (good plus) 18-19 points 5.0 (very good) 20 points
Department of Paediatric Neurology		
F.U1., F.U2., F.U3., F.U4., F.U5., F.U6., F.U11., F.U13., F.U15., F.U18.	Assessment of activities performed in accordance with the practical-class plan.	Active participation in practical classes.

9. ADDITIONAL INFORMATION

The course Integrated Developmental-Age Dentistry is delivered by the Department of Paediatric Dentistry and the Department of Paediatric Neurology of the Medical University of Warsaw (dental component) and by the Department of Orthodontics (orthodontic component).
Lecture content presents the latest findings and standards in paediatric dentistry and is included in examination questions.
Attendance is recorded.
During e-learning seminars, students must keep their camera on and have a working microphone.
Please arrive on time. Arrival more than 15 minutes late is treated as an absence.
A Student Research Group operates at the Department of Paediatric Dentistry.
The group's supervisor is Assoc. Prof. Anna Turska-Szybka, MD, PhD; e-mail: anna.turska-szybka@wum.edu.pl.
Department website: http://pedodoncja.wum.edu.pl
A Student Research Group operates at the Department of Orthodontics.
The group's supervisor is Magdalena Marczyńska-Stolarek, MD, PhD; e-mail: magdalena.marczynska-stolarek@wum.edu.pl.
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Year 5 coordinator at the Department of Orthodontics:
Assoc. Prof. Ewa Czochrowska, MD, PhD; tel.: +48 22 116 64 54; e-mail: ewa.czochrowska@wum.edu.pl
Course coordinator: Paula Piekoszewska-Ziętek, MD, PhD; ppiekoszewska@wum.edu.pl

Excused absence from classes or an assessment.
To excuse an absence from a class or assessment, the student must notify the course coordinator or another person designated by the head of the unit by e-mail or in writing no later than three working days after the class, assessment, examination, or placement. Documentation may be submitted later if the student was unable to provide it for justified reasons; it must then be submitted as soon as the reason preventing submission ceases.
Course completion
In the event of an excused absence from an assessment, the student may take it on the next date scheduled by the unit. An unexcused absence constitutes grounds for recording a failure for that date. If the student does not pass the course by the final date set by the unit in the academic year, the student does not receive course credit. A student who receives a failing grade in a course ending with course completion is entitled to two resit attempts.
Medical clothing and identification badges are required during practical classes. Please do not use mobile phones.

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NOTE

The final 10 minutes of the last class in each block/semester/year must be allocated for students to complete the Course and Academic Teacher Evaluation Survey.