



Pomeranian Medical University in Szczecin

SYLLABUS of the MODULE (SUBJECT) General Information

Module title: Periodontal diseases	
Module type	Obligatory
Faculty PMU	Faculty of Medicine and Dentistry
Major	Medicine and Dentistry
Level of study	long-cycle (S2J)
Mode of study	full-time studies
Year of studies, semester	Year 3, semester v and VI
ECTS credits (incl. semester breakdown)	4 ECTS (semester V-2, semester VI-2)
Type/s of training	lectures 10h (5h and 5h) /seminars 10h (5h and 5h)/ practical 35h (10h and 25h) = 55 h
Form of assessment*	<input checked="" type="checkbox"/> graded assessment: <ul style="list-style-type: none"> <input type="checkbox"/> descriptive <input checked="" type="checkbox"/> test <input type="checkbox"/> practical <input checked="" type="checkbox"/> oral <input type="checkbox"/> non-graded assessment <ul style="list-style-type: none"> <input type="checkbox"/> final examination <ul style="list-style-type: none"> <input type="checkbox"/> descriptive <input type="checkbox"/> test <input type="checkbox"/> practical <input type="checkbox"/> oral
Head of the Department/ Clinic, Unit	dr hab. n. med. Elżbieta Dembowska
Tutor responsible for the module	dr hab. n. med. Małgorzata Mazurek-Mochol
Department's/ Clinic's/ Unit's website	https://www.pum.edu.pl/wydzialy/wydzial-lekarsko-stomatologiczny/zaklad-periodontologii
Language	English

* replace into where applicable

Detailed information

Module objectives		<p>The main aim of Periodontal Diseases is to prepare a student to work with a patient in the prevention and basic treatment of periodontal disease. Specific learning objectives of the module include:</p> <ul style="list-style-type: none"> • the acquisition of research skills in particular oral periodontal assessment of oral hygiene and periodontal tissue condition documented by selected indicators • gain knowledge on the etiopathogenesis of periodontal disease, in particular the importance of bacterial biofilm • familiarize students with instruments for removing dental deposits and instruments for the control of oral hygiene • gain practical skills in scaling and performing hygienic treatments in prevention and primary treatment of periodontitis • acquire practical skills in the diagnosis differentiation, and comprehensive treatment of periodontal diseases • learn practical cooperation with patients with periodontal disease and the use of basic periodontal treatments in prevention, treatment and preservation of treatment effects • integrate knowledge of basic disciplines of the impact of periodontal disease on the general health of the patient.
Prerequisite /essential requirements	Knowledge	<p>Knowledge of the:</p> <ul style="list-style-type: none"> • anatomy and physiology of the oral cavity with a special focus on periodontal structure and characteristics of the oral mucosa • etiopathogenesis, diagnosis and differentiation of periodontal diseases • non-surgical treatment of periodontal diseases
	Skills	An ability to select the basic dental instruments, ability to work with the active assistance and the ability to actively assist.
	Competences	A habit of self-study, the use of different sources of knowledge, including scientific literature, the Internet. Ability to work in a team.

Description of the learning outcomes for the subject /module			
No. of learning outcome	Student, who has passed the (subject) knows /is able to /can:	SYMBOL (referring the standards)	Method of verification of learning outcomes*
W01	knows and understands the principles of preventive and therapeutic management in the masticatory system diseases at various stages of development;	F.W2.	Continuous evaluation during exercises. Checking of the practical skills.
W02	knows and understands symptoms, course and treatment methods of specified diseases of oral cavity, head and neck with regard to age groups	F.W4	Continuous evaluation during exercises. Checking of the practical skills.
W03	knows and understands diagnostics and treatment of periodontal and oral mucosa diseases	F.W9	Continuous evaluation during exercises. Checking of the practical skills.

W04	knows and understands causes of complications of stomatognathic system diseases and the rules of their management	F.W12	Continuous evaluation during exercises. Checking of the practical skills.
W05	knows and understands rules of radiological diagnostics	F.W18	Continuous evaluation during exercises. Checking of the practical skills.
U01	is able to interview patient or his/her family	F.U1	Continuous evaluation during exercises. Checking of the practical skills.
U02	is able to carry out dental examination of patient	F.U2	Continuous evaluation during exercises. Checking of the practical skills.
U03	is able to provide patient with explanation about nature of ailment, establish treatment confirmed by informed consent of the patient as well as establish prognosis	F.U3	Continuous evaluation during exercises. Checking of the practical skills.
U04	is able to provide patient or his/her family with the information about unfavorable prognosis	F.U4	Continuous evaluation during exercises. Checking of the practical skills.
U05	is able to sample and protect material for diagnostic tests, including cytology	F.U5	Continuous evaluation during exercises. Checking of the practical skills.
U06	is able to interpret results of auxiliary diagnostics and consultations	F.U6	Continuous evaluation during exercises. Checking of the practical skills.
U07	is able to determine indications and contraindications to a specified dental procedure	F.U7	Continuous evaluation during exercises. Checking of the practical skills.
U08	is able to treat tooth-derived and non-tooth-derived acute and chronic inflammation of soft tissue, periodontium and jaw bones	F.U8	Continuous evaluation during exercises. Checking of the practical skills.
U09	is able to manage general and local complications during and after dental procedures	F.U9	Continuous evaluation during exercises. Checking of the practical skills.

U10	is able to prescribe medicines taking into account their interactions and side effects	F.U10	Continuous evaluation during exercises. Checking of the practical skills.
U11	is able to keep current patient records, refer patient to general and specialist dental and medical examination or treatment	F.U11	Continuous evaluation during exercises. Checking of the practical skills.
U12	is able to formulate research proplems in dentistry	F.U12	Continuous evaluation during exercises. Checking of the practical skills.
U13	is able to present selected medical problems in oral or written form relevantly to recipient standards	F.U13	Continuous evaluation during exercises. Checking of the practical skills.
U14	is able to establish treatment for stomatognathic system tissues diseases	F.U15	Continuous evaluation during exercises. Checking of the practical skills.
U15	is able to diagnoses and perform basic treatment of periodontal diseases	F.U17	Continuous evaluation during exercises. Checking of the practical skills.
K01	is ready to be guided by the patient wellbeing	K.2.	Continuous evaluation during exercises. Checking of the practical skills.
K02	is ready to respect physician-patient privilege and patient's rights	K.3.	Continuous evaluation during exercises. Checking of the practical skills.
K03	is ready to take activities towards patient on the basis of ethical principles with awareness of social conditions and disease restrictions	K.4.	Continuous evaluation during exercises. Checking of the practical skills.
K04	is ready to propagate health-promoting behavior	K.6.	Continuous evaluation during exercises. Checking of the practical skills.

Table presenting LEARNING OUTCOMES in relation to the form of classes								
No. of learning outcome	Learning outcomes	Type of training						
		Lecture	Seminar	Practical classes	Clinical classes	Simulations	E-learning	Other...
1.	F.W2.	X		X	X			
2.	F.W4.	X			X			
3.	F.W9.	X		X	X			
4.	F.W12.	X			X			
5.	F.W18.		X		X			
6.	F.U1.				X			
7.	F.U2.				X			
8.	F.U3.				X			
9.	F.U4.				X			
10.	F.U5.				X			
11.	F.U6.			X	X			
12.	F.U7.		X	X				
13.	F.U8.				X			
14.	F.U9.				X			
15.	F.U10.				X			
16.	F.U11.			X	X			
17.	F.U12.				X			
18.	F.U13.				X			
19.	F.U15.		X		X			
20.	F.U17.		X	X	X			
21.	K.2.				X			
22.	K.3.				X			
23.	K.4.				X			
24.	K.6.				X			

Table presenting TEACHING PROGRAMME			
No. of a teaching programme	Teaching programme	No. of hours	References to learning outcomes
Winter semester			
Lectures			
TK01	Periodontal anatomy.	1	W01
TK02	Prevention of periodontal disease - part one.	1	W01
TK 03	Prevention of periodontal disease - part two.	1	W01, W03
TK 04	Non-surgical treatment of gum disease and periodontitis - part one.	1	W02, W03
TK 05	Semester test.	1	W01-W03
Seminars			
TK01	Periodontal examination-part one.	1	W03
TK02	Periodontal examination-part two.	1	W03, W04

TK 03	Microbiology of plaque. Bacterial biofilm and its role in the etiology of gum and periodontal diseases. Dental calculus.	1	W01
TK 04	Non-surgical treatment of gum disease and periodontitis - part one.	1	W02, W03
TK05	Differences in the clinical picture of healthy periodontium, gingivitis and periodontitis.	1	W03,W04
Practical classes			
TK01	Periodontal patient examination card. Introduction to periodontal instruments. Simulation of plaque indexing on phantom models. Presentation of selected plaque staining preparations.	2	U11, U15
TK02	Preventive and treatment plan. Periodontal patient examination card - cont. Demonstration of periodontal anatomy on phantom models. Periodontal instrumentation. Hand instrumentation for dental deposits removal. Calibrated periodontal probes – general design characteristics; types of periodontal probes.	2	U11, U15
TK03	Nabers probe. Study of tooth mobility. Periotest. Practice methods of toothbrushing on models. Practice of cleaning interdental spaces on models. Presentation and discussion of additional oral hygiene aids. Instruments for examination of periodontium. Instruments for manual scaling - cont. Indirect and direct support.	2	U06, W03
TK04	Manual instrumentation - cont. Overview of mechanical scalers (magnetostrictive, piezoelectric). Tips for scaling and root planning. Dental sandblasters.	2	U07, U15, W01
TK05	Manual and machine tools - cont. Plaque and gingival condition - indicators - cont. Periodontal anatomy on phantom models - cont. Periodontal examination chart. Methods of dental prophylaxis.	2	U06, U07, U11, U15
Summer semester			
Lectures			
TK01	Healthy periodontium and gingival diseases on healthy or reduced periodontium	1	W02
TK02	Classification of periodontitis. Staging and grading of periodontitis.	1	W02, W04
TK03	Comprehensive treatment of gingivitis and periodontitis- part I	1	W04
TK04	Comprehensive treatment of gingivitis and periodontitis- part II	1	W04

TK05	Final test	1	W01-W04
Seminars			
TK01	Patomechanism of changes in periodontal tissues and progression of periodontopathy.	1	W02
TK02	Acute conditions of periodontium.	1	W02
TK03	Symptoms of systemic diseases and conditions affecting the periodontal structures.	1	W01
TK04	Radiological visualization of normal periodontium and pathological changes in periodontium.	1	W03,W05
TK05	Other conditions affecting the periodontium. Teeth mobility. Determination of tooth immobilization indicators.	1	W04
Practical classes			
TK06	Periodontal patient examination card. Introduction to periodontal instruments.	1	U01,U07,U11,U15
TK07	Preventive and treatment plan.	1	U03,U06,U08,U09, U10, U12
TK08	Periodontal examination.	1	U02,U15
TK09	Clinical exercises with patients	22	U01, U02, U03, U04, U05, U06, U07, U08, U09, U10, U11, U12, U13, U15, K01, K02, K03, K04

Booklist

Obligatory literature:

Articles about new classification of periodontal diseases

1. Caton J et al. A new classification scheme for periodontal and peri-implant diseases and conditions- introduction and key changes from the 1999 classification. J Periodontol 2018; 89 (Suppl 1):S1-S8.
2. Chapple ILC et al. Periodontal health and gingival diseases and conditions on an intact and a reduced periodontium: Consensus report of workgroup 1 of the 2017 World Workshop on the Classification of Periodontal and Peri-Implant Diseases and Conditions. J Periodontol. 2018; 89(Suppl 1): S74-S84.
3. Murakami S et al. Dental plaque-induced gingival conditions. J Periodontol. 2018; 89(Suppl 1):S17-S27.
4. Holmstrup P et al. Non-plaque-induced gingival diseases. J Periodontol.2018;89(Suppl 1): S28-S45.
5. Lang NP et al. Periodontal health. J Periodontol.2018; 89(Suppl 1): S9-S16.
6. Papanou PN et al. Periodontitis: Consensus report of Workgroup 2 of the 2017 World Workshop on the Classification of Periodontal and Peri-Implant Diseases and Conditions. J Periodontol.2018;89 (Suppl 1): S173-S182.
7. Herrera D et al. Acute periodontal lesions (periodontal abscesses and necrotizing periodontal diseases) and endo-periodontal lesions. J Periodontol. 2018 (Suppl 1): S85-S102.
8. Tonetti MS et al. Staging and grading of periodontitis: Framework and proposal of a new classification and case definition. J Periodontol. 2018;89 (Suppl 1): S159-S172.
9. Jepsen S et al. Periodontal manifestations of systemic diseases and developmental and acquired conditions: Consensus report of workgroup 3 of the 2017 World Workshop on the Classification of Periodontal and Peri-Implant Diseases and Conditions. J Periodontol.2018; 89 (Suppl 1): S237-S248.

10. Albandar JM et al. Manifestations of systemic diseases and conditions that affect the periodontal attachment apparatus: Case definitions and diagnostic considerations. *J Periodontol.*2018; 89 (Suppl 1):S183-S203.
11. Berglundh T et al. Peri-implant diseases and conditions: Consensus report of workgroup 4 of the 2017 World Workshop on the Classification of Periodontal and Peri-Implant Diseases and Conditions. *J Periodontol.*2018; 89 (Suppl 1): S313-S318.
12. Renvert S et al. Peri-implant health, peri-implant mucositis and peri-implantitis: Case definitions and diagnostic considerations. *J Periodontol.*2018;89 (Suppl1):S304-S312.
13. Cortellini P et al. Mucogingival conditions in the natural dentition: Narrative review, case definitions, and diagnostic considerations. *J Periodontol.* 2018;89 (Suppl 1): S204-S213.
14. Fan J et al. Occlusal trauma and excessive occlusal forces: Narrative review, case definitions, and diagnostic considerations. *J Periodontol.* 2018;89 (Suppl 1): S214-S222.
15. Ercoli C et al. Dental prostheses and tooth-related factors. *J Periodontol.*2018;89 (Suppl 1): S223-S236.

Articles about treatment of periodontitis

1. Sanz M. et al. Treatment of stage I–III periodontitis—The EFP S3 level clinical practice guideline. *Journal of Clinical Periodontology* 2020, 48, 1, 164-165. *J Clin Periodontol* 2020,47,22:4-60.
2. Tonetti M., Sanz M. Implementation of the new classification of periodontal diseases: Decision-making algorithms for clinical practice and education. *J Clin Periodontol.* 2019 Apr;46(4):398-405.

Supplementary literature:

Periodontology- The Essentials. Hans-Peter Mueller, Thieme 2015.

Periodontology: Color Atlas of Dental Medicine by Herbert F. Wolf, Edith M. Rateitschak-Pluss Klaus H. Rateitschak.

Clinical Periodontology and Implant Dentistry. Edited by J. Lindhe, Niklaus P.Lang. Chichester : Wiley Blackwell, 2015.

Carranza's Clinical Periodontology by Michael G. Newman, Henry Takei, Fermin A.Carranza, Perry R. Klokkevold

Standards of procedures required to obtain credit:

- Carrying out a medical interview with a patient - 5 procedures
- Conducting a physical examination of the patient:
 - staining of plaque- 5 procedures
 - assessment of the periodontal status and oral hygiene of the patient documented using selected indicators - 5 procedures
 - examination of the depth of periodontal pockets and loss of connective tissue attachment - 4 procedures
 - recession measurement - 3 procedures
 - examination of the mobility of the teeth using the static and dynamic method - 2 procedures
- Procedures to improve the effectiveness of oral hygiene (motivating, hygiene instruction, minimal anti-smoking intervention) - 5 procedures
- Controlling the risk factors for gingivitis and periodontitis in a patient - 3 procedures
- Analysis of patients' X-rays - 3 procedures
- Establishing a written prevention and treatment plan - 2 procedures
- Professional mechanical plaque removal PMPR - 3 procedures
- Removal of plaque with tooth polishing - 4 procedures
- Referral to additional tests and interpretation of these test results with description in documentation - 2 procedures

Student's workload	
Form of student's activity (in-class participation; activeness, produce a report, etc.)	Student's workload [h]
	Tutor
Contact hours with the tutor	55
Time spent on preparation to seminars/ practical classess	35
Time spent on reading recommended literature	10
Time spent on writing report/making project	-
Time spent on preparing to colloquium/ entry test	10
Time spent on preparing to exam	-
Other	-
Student's workload in total	110
ECTS credits for the subject (in total)	3
Remarks	

* Selected examples of methods of assessment:

EP – written examination

EU – oral examination

ET – test examination

EPR – practical examination

K – colloquium

R – report

S – practical skills assessment

RZC – practical classes report, incl. discussion on results

O – student's active participation and attitude assessment

SL – lab report

SP – case study

PS - assessment of student's ability to work independently

W – entry test

PM – multimedial presentation

other...