

29324 - Prosthesis I

Syllabus Information

Academic Year: 2019/20

Subject: 29324 - Prosthesis I

Faculty / School: 229 - Facultad de Ciencias de la Salud y del Deporte

Degree: 442 - Degree in Odontology

ECTS: 9.0

Year: 3

Semester: First semester

Subject Type: Compulsory

Module: ---

1.General information

1.1.Aims of the course

1.2.Context and importance of this course in the degree

1.3.Recommendations to take this course

2.Learning goals

2.1.Competences

2.2.Learning goals

2.3.Importance of learning goals

3.Assessment (1st and 2nd call)

3.1.Assessment tasks (description of tasks, marking system and assessment criteria)

4.Methodology, learning tasks, syllabus and resources

4.1.Methodological overview

The learning process that has been design for this subject is based on:

Three tipes of activities:

Work with materials and process with a symbolic nature.

- Professor's presentation through magistral lectures.
- Workshops. The students and the proffesor will show and introduce the use of the articulator and all the materials related to the complete denture prosthesis.
- Student study of the recommended texts.

Analysis and diagnosis in contextualised situations.

- Workshops with presentation and group analysis of student's casts mounted on semi-adjustable articulator.
- Study and video display of different prosthetic techniques accompanied by comments and analysis in groups.

Achievements in context close to reality.

- Laboratoty practices with their own dental casts. The practice is made with real materials and instruments.

- Preclinic and laboratory practices with plastic casts that reproduce the anatomical condition of edentulism in a similar context to a real patient.

4.2.Learning tasks

- Magistra lectures.
- Clinical Cases Sessions.
- Complementary Workshps.
- Resolution of doubts in common.
- Activity participation of the students in teaching.

4.3.Syllabus

Program

The program offered to students for helping them to achieve the expected outcomes includes these activities...

Presentation

Issue 0: Dental Prosthesis Concept. Objectives. Course organization. Theoretical and Practical program. Schedule. Rules. Evaluation Criteria. General bibliography.

Occlusion

Issue 1: Mounting casts on articulator

- Study and video display.
- **Workshop.** Articulator description.
- **Work** in group of three. Exposure and comments in groups.

Issue 2: Concept, integrant elements and functions. Anatomy and physiology of dental archs.

- **Magistral Lesson.**
- **Laboratory Practice:** Alginate impressions. Casting.

Issue 3: Temporomandibular Joint (TMJ). Mandibular Dynamics. Neuro-muscular organization.

- **Magistral Lesson.**
- **Laboratory Practice:** Trim and plinth.

Issue 4: Stomatognathic system physiology. Chewing, swallowing, breathing, phonation, aesthetics and reflexes.

- **Magistral Lesson.**
- **Laboratory Practice:** Facebow transfer. Maxillary cast assembly.

Issue 5: Cephalometrics applied to prosthesis. Points, plans, cranio-facial-mandibular indices.

- **Magistral Lesson.**
- **Laboratory Practice:** Centric Relation registration. Mandibular cast assembly.

Issue 6: Occlusion Concept. Teeth alignment. Occlusal morphology. Occlusion during mandibular dynamics.

- **Magistral Lesson.**
- **Laboratory Practice:** Registration of the inclination of the condylar guidance and Bennett Angle.

Issue 7: Compatibility between occlusal morphology and mandibular dynamics.

- **Magistral Lesson.**
- **Workshop:** Discussion in groups about the occlusal pathologic findings in the students.

Issue 8: Occlusion Theories. Centric Relation. Centric Occlusion. Habitual Occlusion. Mutually protected occlusion. Bilateral balanced occlusion. Group Function. Dysfunctions.

- **Magistral Lesson.**
- **Workshop:** Students presentations of pathologic findings.

Issue 9: Facebows and articulators.

- **Magistral Lesson.**
- **Laboratory Practice:** Incisal guide reproduction.

Complete Edentulism

Issue 10: Edentulous patient. Evolution changes because of age. Anatomical and functional evolution in edentulous patients.

- **Magistral Lesson.**

Issue 11: Clinical History, clinical and complementary explorations, diagnosis, prognosis and treatment plan in edentulous patients.

- **Magistral Lesson.**
- **Workshop:** Clinical History.

Issue 12: Complete Prosthesis. Concept and general characteristics. Biomechanical and retention principles. Prosthetical space.

- **Magistral Lesson.**
- **Workshop:** Clinical History.

Issue 13: Impressions in complete prosthesis. Impression materials, individual trays and casts.

- **Magistral Lesson.**
- **Preclinic Practice:** Incial impressions in edentulous typodont.

Issue 14: Base Plates and wax rods.

- **Magistral Lesson.**
- **Preclinic Practice:** Articulator mounting with Split-cast.

Issue 15: Transference and resiter of intermaxillary and caniomaxillary relations.

- **Magistral Lesson.**
- **Preclinic Practice:** Individual tray manufacture. Work impressions.

Issue 16: Artificial teeth. Mount and articulate of artificial teeth. Occlusion in complete prosthesis.

- **Magistral Lesson.**
- **Preclinic Practice:** Base plates manufacture.

Issue 17: Prosthesis test. Evaluate data: Aesthetics and functional.

- **Magistral Lesson.**

Issue 18: Wax-up, muffling, demuffling and prosthesis obtention.

- **Magistral Lesson.**
- **Precilinic Practice:** Teeth wax articulation.

Issue 19: Articulator test, remounting, laboratory selective grinding and prosthesis finishing.

- **Magitral Lesson.**

Issue 20: Prosthesis installation in mouth. Aesthetic, functional and stability checks. Patient instructions.

- **Magistral Lesson.**
- **Preclinic Practice:** Muffling and demuffling.
- **Level Test.**

4.4.Course planning and calendar

Presential sessions and work presentations schedule.

Subject important dates such as register o global exam date, as well as academic calendar and updated shedule are reflected in the faculty web page:

<https://fccsyd.unizar.es/odontologia/grado-odontologia>

4.5. Bibliography and recommended resources

Basic Bibliography:

- Okeson, Jeffrey P. Tratamiento de la oclusión y afecciones temporomandibulares. Barcelona : Elsevier España, 2003
- Bortolotti, Lilia. Prótesis removibles : clásica e innovaciones / Lilia Bortolotti . Caracas : Amolca, 2006
- Geering Alfred H. Atlas de prótesis total y sobredentaduras. Barcelona : Masson-Salvat, 1993 Prótesis completas / dirigido por B. Koeck; con la colaboración de J. Besford. . 4ª ed. Barcelona [etc.] : Elsevier Masson, 2007.

Complementary bibliography:

- Pessina Edoardo. Articuladores y arcos faciales en prótesis odontológica y gnatología / Edoardo Pessina, Mario Bosco, Alessandro M. Vinci. Barcelona : Salvat, 1994
- Campos Ortega, Agustín. Rehabilitación oral y oclusal. Madrid : Harcourt, 2000
- Campos Ortega, Agustín. Procedimientos clínicos de laboratorio en rehabilitación oral/oclusal. Madrid : Harcourt, 2000
- Casado Llompарт, José Ramón. Tratamiento del desdentado total / José Ramón Casado Llompарт. Madrid : José Ramón Llompарт, 1991
- Fonollosa Pla, Josep Maria.. Prótesis removible de resina / Josep Ma Fonollosa Pla ; directoras Caterina Casado Latorre, Ma Angeles Chavarría Lorente. . Barcelona : Masson, 2004.
- Alonso, Aníbal Alberto. Oclusión y diagnóstico en rehabilitación oral / Aníbal Alberto Alonso, Jorge Santiago Albertini, Alberto Horacio Bechelli . 1a ed., 4a reimp. Buenos Aires : Editorial Médica Panamericana, 2005
- Öwall, Bengt. Odontología protésica : principios y estrategias terapéuticas / Öwall, Arnd F. Käyser, Gunnar E. Carlsson. Madrid : Mosby, 1997