

**Vocational School of Health Services / Opticianry**  
**2024 - 2025 Academic Year**  
**OPTICIANRY III**  
**Syllabus**

Course Description					
Name	Code	Semester	T+A Hour	Credit	ECTS
OPTICIANRY III	OPT2210896	Spring Semester	2+3	3,5	12
<b>Prerequisites Courses</b>					
<b>Recommended Elective Courses</b>					
<b>Language of Instruction</b>	Turkish				
<b>Course Level</b>	Short Cycle (Associate's Degree)				
<b>Course Type</b>	Required				
<b>Course Coordinator</b>	Lect. Hüseyin DEMİR				
<b>Name of Lecturer(s)</b>	Lect. Filiz KARTAL DEMİRHAN				
<b>Assistant(s)</b>					
<b>Aim</b>	To be able to recognize automatic machines, to recognize Bifocal-Progressive glasses and to make recipe analysis				
<b>Course Content</b>	This course contains; Learning the technical characteristics of automatic machines, making lens measurement with automatic focometer, making full frame assembly with automatic grinding machine taking 2-pd and pdhg size,Explanation of automatic focometer, Applications related to automatic focometer (Sph, SphCyl, Prismatic...),Pd and pdhg making size facet frame assembly with automatic grinding machine making,Properties of photochromic and polarized glasses. Lens aberrations. Abbreviations, wavelengths and reflection properties of lenses,Making assembly with automatic grinding machine by taking pd and pdhg size,Recognition of bifocal lenses, pd and pdhg measurements in bifocal lenses,Mounting bifocal lenses to the frame,Recognition of progressive lenses, pd and pdhg measurement,Mounting progressive lenses to the frame,Learning the properties of aspheric and lenticular lenses,Learning the edge thickness and center thickness standards of lenses,Working principles in optical store, glass order and frame purchase,Optical glass production stages, coating types and properties.				
<b>Course Learning Outcomes</b>			<b>Teaching Methods</b>	<b>Assessment Methods</b>	
At the end of this course, the student will be able to: 1. explain the use of automatic machines. 1.1. Explain the use of automatic focometer. 1.2. Explain dioptric power measurements of lenses with automatic focometer. 1.3. Explain the measurement of prismatic effects of lenses with automatic focometer. 1.4. Explains the installation of full frame, nilor frame, facet frame with automatic grinding machine. 2. recognize bifocal lenses. 3. recognize progressive, aspheric, lenticular lenses. 3.1. Determine the measurement of pd and pdhg in progressive lenses. 3.2. Explain the mounting of progressive lenses to the frame. 3.3. Determines the edge thickness and center thickness standards of the lenses. 4. will be able to recognize working principles in optical store. 4.1. Identify product sales and after sales services.			16, 8, 9	A, E	
<b>Teaching Methods</b>	16: Question - Answer Technique, 8: Flipped Classroom Learning, 9: Lecture Method				
<b>Assessment Methods</b>	A: Traditional Written Exam, E: Homework				
<b>Lecture Schedule</b>					
<b>Sequence</b>	<b>Topics</b>	<b>Preliminary Preparation</b>			
1	Learning the technical characteristics of automatic machines, making lens measurement with automatic focometer, making full frame assembly with automatic grinding machine taking 2-pd and pdhg size	Pre-Reading			
2	Explanation of automatic focometer, Applications related to automatic focometer (Sph, SphCyl, Prismatic...)	Pre-Reading			
3	Pd and pdhg making size facet frame assembly with automatic grinding machine making	Pre-Reading			
5	Properties of photochromic and polarized glasses. Lens aberrations. Abbreviations, wavelengths and reflection properties of lenses	Pre-Reading			
6	Making assembly with automatic grinding machine by taking pd and pdhg size	Pre-Reading			
7	Recognition of bifocal lenses, pd and pdhg measurements in bifocal lenses	Pre-Reading			
8	Mounting bifocal lenses to the frame	Pre-Reading			
9	Recognition of progressive lenses, pd and pdhg measurement	Pre-Reading			
10	Mounting progressive lenses to the frame	Pre-Reading			
11	Learning the properties of aspheric and lenticular lenses	Pre-Reading			
12	Learning the edge thickness and center thickness standards of lenses	Pre-Reading			
13	Working principles in optical store, glass order and frame purchase	Pre-Reading			
14	Optical glass production stages, coating types and properties	Pre-Reading			
<b>Evaluation Methods</b>		<b>Weight(%)</b>			
Midterm Exam		40			
General Exam		60			

<b>Resources</b>	
1) Aksak,E.-Küçüker, T. (2005) Gözlükçülük .Eskişehir	
2) Onur Yarar, Erdoğan Özdemir. Basic Opticianry, Güneş Tıp Kitabevleri, 2016, Ankara.	
3) Saniye Tekerek. Opticianry with Solved Examples, Nobel Academic Publishing, 2022, Ankara.	