Course Syllabus

Code - Course Title	**VBA202 - Exploratory Data Analysis and Visualization**
Course Type	IV. SEMESTER
Laboratory + Practice	3+0
ECTS	**6.0**
Language of Instruction	İngilizce
Course Type	Required Courses
Course Instructor(s)	DR. ÖĞR. ÜYESİ ÖNDER DORAK

Mode of Delivery	Face to face

Course Syllabus

Weeks	Learning Outcomes	Topics	Teaching Methods
Week - 1		Data exploration: Understanding large datasets	
Week - 2		Handling missing values	
Week - 3		Managing outliers in complex data	
Week - 4		Visual analytics: Relationship between variables	
Week - 5		Interactive dashboards conceptualization	
Week - 6		Data storytelling techniques	
Week - 7		Visualization tools: Using Tableau basics	
Week - 8		Advanced visualizations in Tableau	
Week - 9		Visualization tools: Using PowerBI basics	
Week - 10		Advanced visualizations in PowerBI	
Week - 11		Interactive reporting: Integrating outputs into Quarto	
Week - 12		Creating dynamic statistical reports	
Week - 13		Communicating insights through visual storytelling	
Week - 14		Final dashboard presentations	

Learning Outcomes

#	Learning Outcome
1	Handle missing values and manage dataset outliers
2	Apply effective visual data storytelling techniques

Learning Outcomes

#	Learning Outcome
3	Utilize Tableau and PowerBI for interactive reporting
4	Integrate analytical outputs into dynamic Quarto documents

Sustainable Development Goals

No content has been provided.

Course Theme

No content has been provided.

AKTS Workload

Activity	Duration (Hour)	Count	Workload
Teorik Derse Katılım	0	0	0
Sınıf Dışı Çalışma (Ön Hazırlık & Pekiştirme Amaçlı)	0	0	0
Ödevler	0	0	0
Proje - Rapor - Sunum Hazırlama	0	0	0
Ara Sınav Hazırlığı (sınav süresi dahil)	0	0	0
Final Sınavı Hazırlığı (sınav süresi dahil)	0	0	0
Uygulama (Laboratuvar, Müzik/Enstrüman Uygulaması, Atölye/Saha Çalışması vb.)	0	0	0
Staj Uygulaması	0	0	0
		Calculated ECTS	**0**

Assessment Method and Passing Requirements

No content has been provided.