## Scuola di Medicina e Chirurgia

## Dipartimento di Medicina di Precisione

## Degree Course in Medicine & Surgery in English Language

## ADE A.A. 2024-2025

Title		DNA damage repair: the "Achille's heel" of cancer in the synthetic lethal era						
PROF.		Luigi Alfano, Nunzia D'Onofrio						
SSD		BIOS-07/A						
GENERAL AND SPECIFIC OBJECTIVES		Genomic instability is one of the enabling characteristics underlying cancer development. Many sources of endogenous and environmental DNA damage affect genome integrity predisposing to cancer development. We propose to describe the principal damages affecting the DNA and which biological pathways are involved in the repair. Moreover, we analysed the mechanism of action of principal cancer treatments such as radiotherapy or anticancer drugs. Finally, we want to describe a synthetic lethal strategy for cancer therapy in DNA damage deficient repair tumours.						
	ACTIVITY TYPE		PROPOSED ACTIVITY	MINIMUM DURATION (HOUR)	ADE duration (HOUR)	CFU	PROPOSED CFU	
LABORATORY ACTIVITY /INTERNSHIPS				13		1		
MONOGRAPHIC COURSES				> 13		1		
INTERACTIVE SEMINARS			X	≥ 6,25 (up to12,5)		0,5	0,5	
INTERACTIVE SEMINARS				≥ 12,5		1		
TELEMATIC PRESENTATION OF CLINICAL CASE			<u>12.5 hours</u>		1			
•	YEAR	2024/2025						
•	MAXIMUM N. OF STUDENTS	30						
•	STUDENT COURSE YEAR	II-III-IV-V-VI						
•	BASIC KNOWLEDGE REQUESTED	Biology, Biochemistry						
<b>*</b>	LOCATION	Booked students will be notified						
•	DATE (S) AND TIME	June 10 <sup>th</sup> 2025, 2:30 p.m June 12 <sup>th</sup> 2025, 2:30 p.m June 17 <sup>th</sup> 2025, 2:30 p.m						
•	CONTACTS	nunzia	nunzia.donofrio@unicampania.it					