MAKEAWARE x Spearhead

To test the efficacy of antibiotics
on specific bacteria, scientists
in the laboratory position antibiotic pills
in a transparent lidded dish (called Petri)
covered by bacteria. After some
cultivation hours, it is possible to observe
the efficacy of antibiotics that prevent
bacteria growing. The higher the
antibiotic efficacy, the less the bacteria
spread, leaving an empty space around
the pill. On the other hand, the smaller
that area, the higher the resistance
development. The use and misuse
of antibiotics is one of the leading causes
of resistance development. Consuming
antibiotics responsibly helps preserve
their efficacy.

https://github.com/zumatt/diplab

DipLab – Digital Petry Laboratory

/Patient ‘s Dossier

Patient code: 68996

Age: 45

Disease: Infected burns

Bacterium: Staphylococcus aereus

Drug allergies: ⊘ Trimethoprim

Medical history:
Patient, 45, with infected burns, Staphylococcus aureus identified. Allergic to Trimethoprim. Burns acquired from a kitchen accident, initially treated at home, later showing signs of infection: redness, swelling, pus. Urgent need for an antibiogram to determine effective antibiotics.

Lab signature: _____

Bacterium: Staphylococcus aereus

Acronym	Zone Diameter Breakpoints (mm)		Antibiotic name	Diameter size (mm)	Diameter category (Sensitive/Resistant)
	Sensitive ≥	Resistant <			
AM 2	18	18	Ampicillin		
OX 1	20	20	Oxacillin		
CR 5	20	17	Ceftaroline		
NX 10	17	17	Norfloxacin		
AK 30	15	15	Amikacin		
GT 10	18	18	Gentamicin		
TY 10	18	18	Tobramycin		
EY 15	21	21	Erythromycin		
CD 2	22	22	Clindamycin		
EC 20	20	20	Eravacycline		
TE 30	22	22	Tetracycline		
TG 15	19	19	Tigecycline		
LZ 10	21	21	Linezolid		
TD 2	20	20	Tedizolid		
TTH 5	14	14	Trimethoprim		