

CDL CES 2023
MEDICAL MICROBIOLOGY
LABORATORY PERSPECTIVE:
CHALLENGES FROM RECEIPT
TO REPORT

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MD (UNIMAS), MPATH
(MED.MICROBIOLOGY)(UM), INFECTIONS IN
IMMUNOCOMPROMISED HOSTS & HIV
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OUTLINE

Learning outcome

Background (Roles of Medical Microbiology & Parasitology, MMP Laboratory)

Specimen to laboratory report process

Issues/problems identified from MMP laboratory

Proposed remedies/solutions

LEARNING OUTCOME

At the end of the CES, the participants should be able to:

- outline the issues/challenges identified from MMP lab.
- describe the possible solutions in each of the phases of specimen testing.

ROLES OF CDL MMP LABORATORY

TWO (2) main functions:

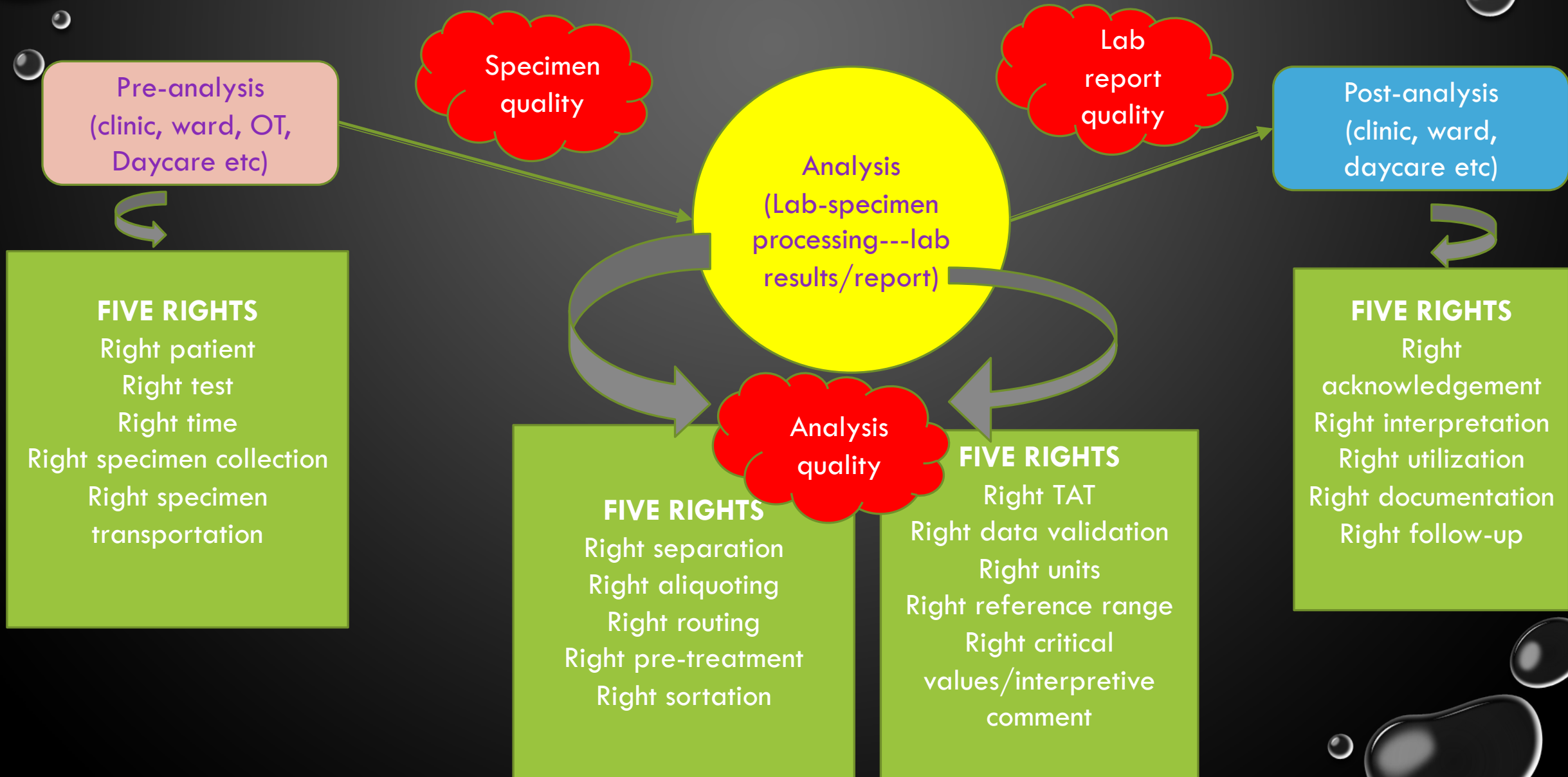
Provision of laboratory diagnosis of infection (bacteriology, virology, mycology, immunology & parasitology) in individual patient, directly related to the patient care.



Provision of support to the HAI prevention and control (AMS, antimicrobial surveillance, MRSA screening, infection control protocol etc.

NB: the first role :diagnosis of infection - has also a function in HAI prevention

SPECIMEN---LABORATORY REPORT



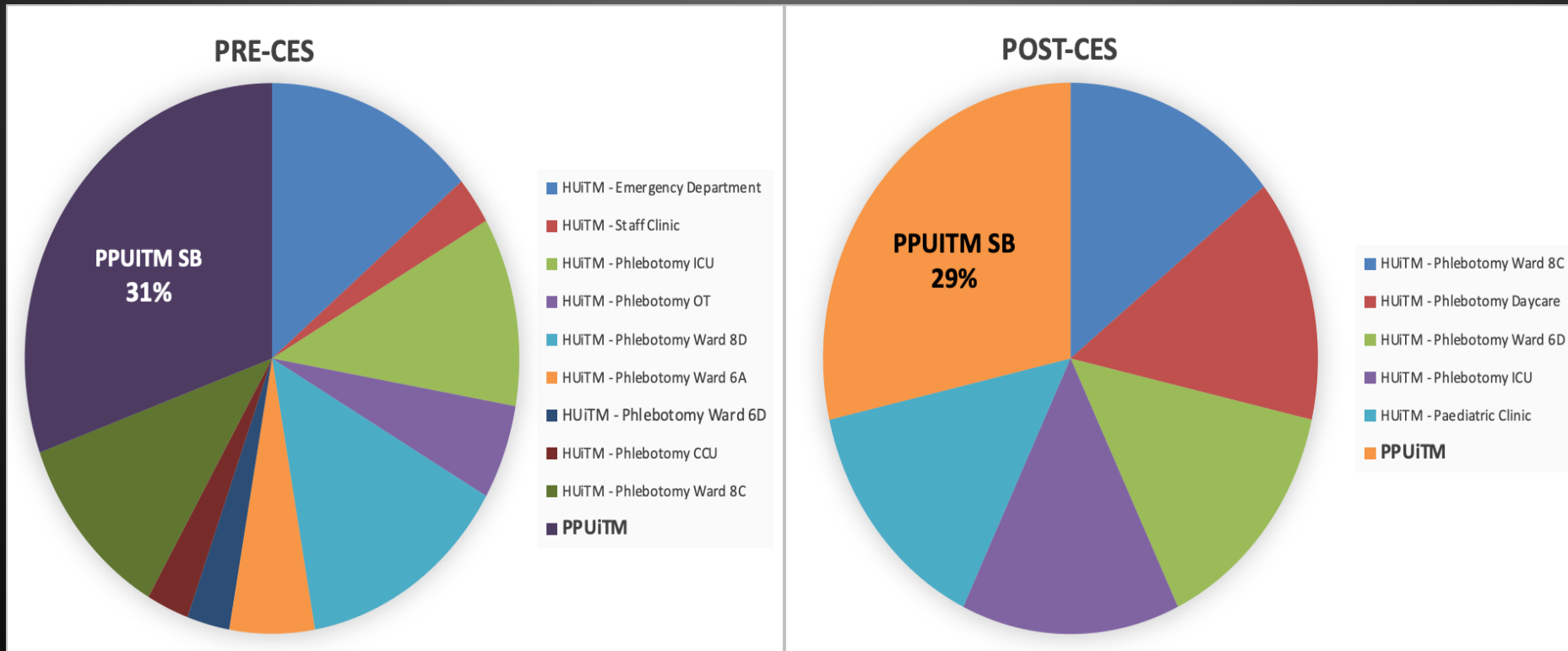
ARISING ISSUES FROM MMP LAB

NO	PHASES	ISSUES
1	Pre-analysis	Requester is different with the staff that collect the specimen.
2	Pre-analysis	Requester to label/specify the labelling e.g: red lumen, blue lumen, PICC.
3	Pre-analysis	Requester to specify correct location eg: specimen collected in the OT, report should be send from lab to OT? Ward? Clinic?
4	Pre-analysis	Laboratory becomes the place for ward/clinic to ask info on billing.
5	Post-analysis	Amended report: AMENDED- requester need to be aware.
6	Post-analysis	AST: SDD current, no more intermediate 'I' section: Please read the comments- requester need to be aware.
7	Post-analysis	Laboratory become 'info counter': How to see report from LIS.

MAIN CAUSES OF SPECIMEN REJECTION FROM MMP LAB JAN-DEC 2022

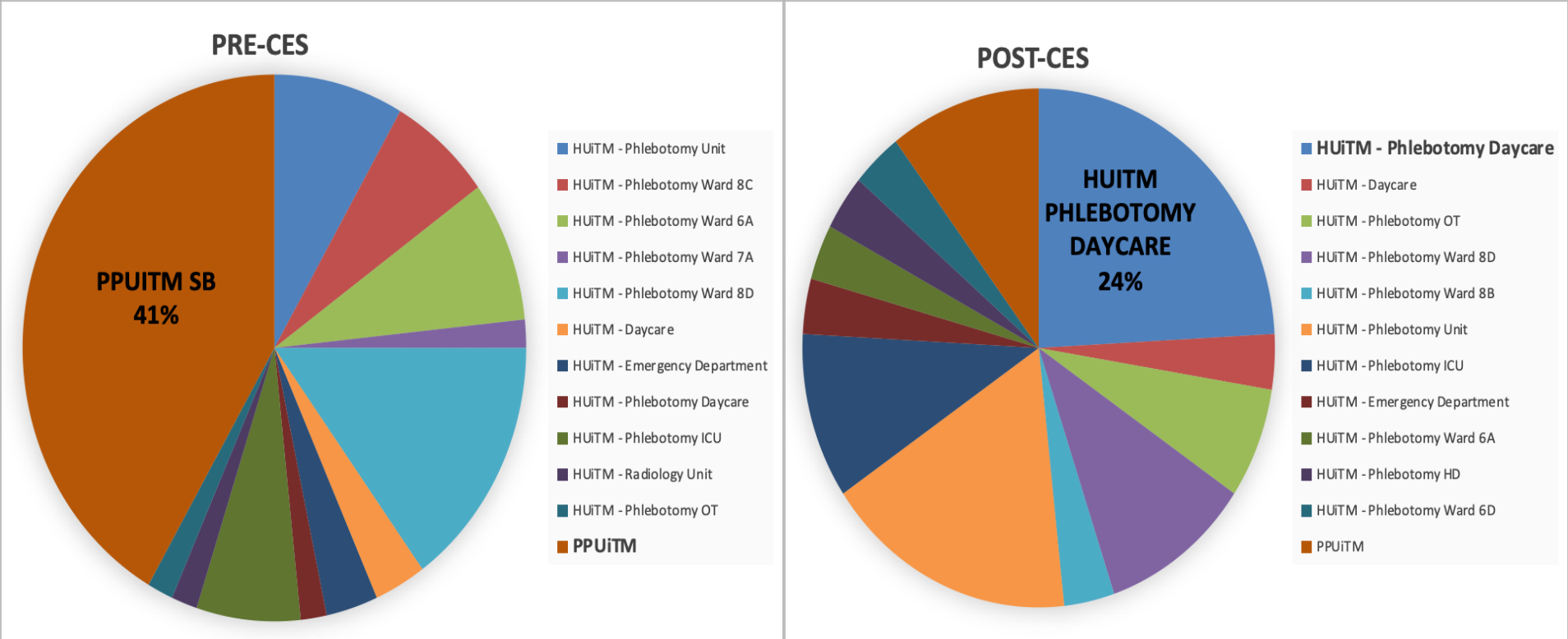
NO	CAUSES	EXAMPLE
1	Specimen not received	Request form & biohazard bag are available, but no specimen in the biohazard bag.
2	Wrong test ordered by the requester	The requester would like to test for RPR, however ordered TPPA/TPHA test instead.
3	Repetitive order	Sputum C&S, Blood C&S etc ordered 2-3x in a day
4	Improper specimen collection	Formalin was added into Tissue C&S.

PERCENTAGE OF REJECTION (ACC. TO REQUESTERS) IN MMP UNIT



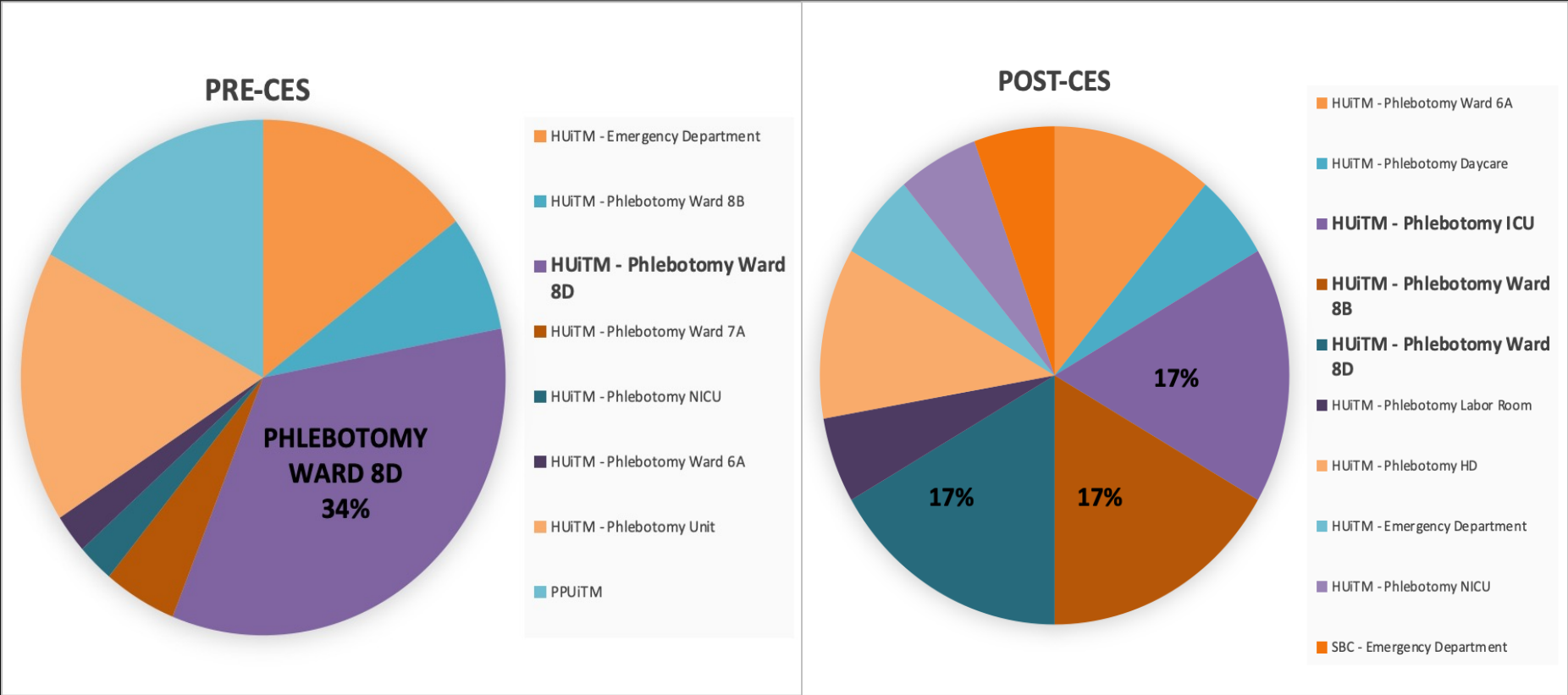
CRITERIA: SPECIMEN NOT RECEIVED

PERCENTAGE OF REJECTION (ACC. TO REQUESTERS) IN MMP UNIT



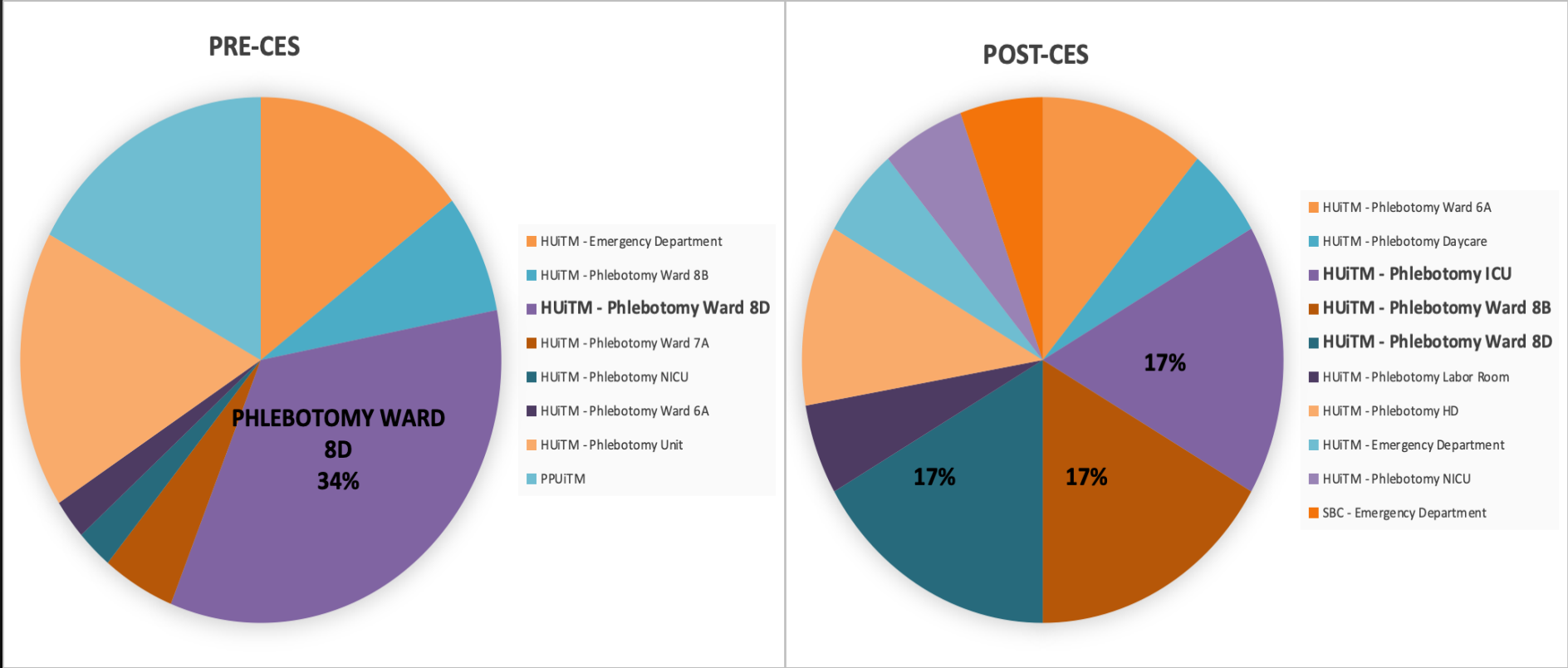
CRITERIA: WRONG TEST ORDERED

PERCENTAGE OF REJECTION (ACC. TO REQUESTERS) IN MMP UNIT



CRITERIA: REPETITIVE ORDER

PERCENTAGE OF REJECTION (ACC. TO REQUESTERS) IN MMP UNIT



CRITERIA: IMPROPER SPECIMEN COLLECTION

PROPOSED SOLUTIONS

IDENTIFIED ISSUES

Requester is different with the staff that collect the specimen.

Requester to label/specify the labelling e.g: red lumen, blue lumen, PICC.

Requester to specify correct location eg: specimen collected in the OT, report should be send from lab to OT? Ward? Clinic?

Laboratory becomes the place for ward/clinic to ask info on billing.

Amended report: AMENDED- requester need to be aware, AST: SDD current, no more intermediate 'I' section: Please read the comments- requester need to be aware.

Laboratory become 'info counter': How to see report from LIS?

Wrong test & improper specimen collection.

PROPOSED SOLUTIONS

Good conduct of practice: medicolegal.

Drop down menu in the LIS is readily available.

Good conduct of practice: patient care & safety, medicolegal.

Test price is readily available in 'Bursary unit/Billing unit', HASA.

Good conduct of practice: **Right utilization**, please read the report, interpret according to the patient's clinical history and findings. TREAT the patient not the RESULT/REPORT.

Obtain assistance from senior staffs/sister/matron NOT LAB, provide the steps (flowchart) and paste it near the desktop.

Refer to CDL Handbook:

https://hospital.uitm.edu.my/images/departments/clinical/pathology/download/2021-cdl-handbook-v11oct_amended-1-june-2022-13.6-2022.pdf

QUIZ

The following are the specimen rights at the pre-analysis phase **EXCEPT** :

A: Right patient.

B: Right time.

C: Right specimen collection.

D: Right utilization.

E: Right test .

A group of hands holding a yellow flower on a green lawn with bubbles.

**"IF YOU WANT TO LIFT YOURSELF UP,
LIFT UP SOMEONE ELSE." – BOOKER
T. WASHINGTON**

THANK YOU