



UTM
UNIVERSITI TEKNOLOGI MALAYSIA

FACULTY OF COMPUTING

SEMESTER 1 2024/2025

SECR1213 – NETWORK COMMUNICATIONS

SECTION 12

PROJECT TASK 1

LECTURER: MR. FIROZ BIN YUSUF PATEL DAWOODI

GROUP 12.1 (POWERPUFF)

STUDENT NAME	MATRIC NO
CHRYL CHEONG KAH VOON	A23CS0060
LAU YEE WEN	A23CS0099
CHUA JIA LIN	A23CS0069
GUI KAH SIN	A23CS0080

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GROUP INFO

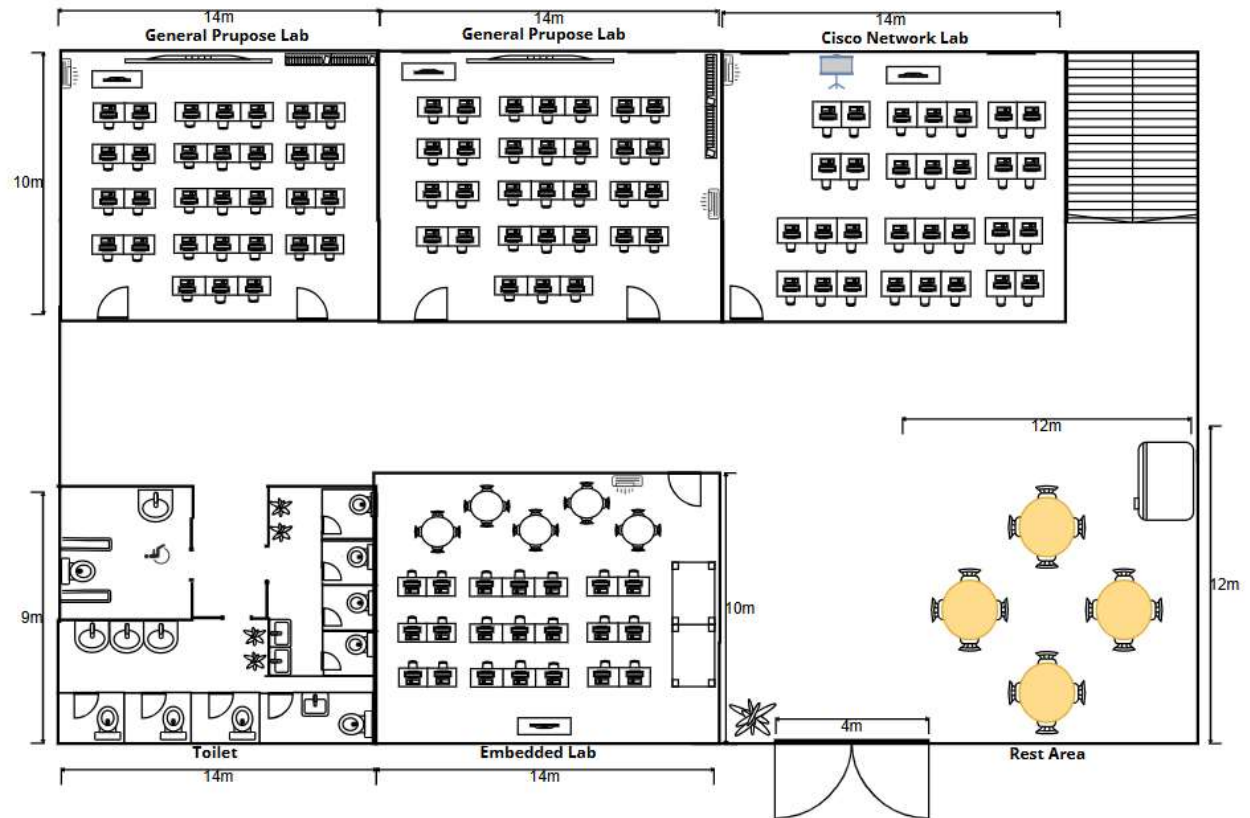
Group Name: 12.1 (POWERPUFF)				
Group Members				
No.	Member Photo	Name	Matric No	Position
1.		Cheryl Cheong Kah Voon	A23CS0060	Project Manager
2.		Lau Yee Wen	A23CS0099	Researcher
3.		Chua Jia Lin	A23CS0069	Content Creator
4.		Gui Kah Sin	A23CS0080	Designer

BRIEF EXPLANATION OF TASK 1















In Task 1, a project team is formed to construct a new 2-story building for Faculty of Computing (FC) to facilitate the population growth of the students and academic staffs. Our team which is named POWERPUFF includes 4 members which are Cheryl Cheong Kah Voon, Lau Yee Wen, Chua Jia Lin, and Gui Kah Sin. The objectives of this task are to understand the case study and the requirements of the new building which states the new building should have 4 labs that consist at least 30 workstations, 1 video conferencing room, 1 hybrid classroom, and a student lounge.

The task is to design a new 2-story building layout by drawing a floor plan with scale using any software tools and import the floor plan into the Cisco Packet Tracer application. The design of the building should be functional, cost-effective, and have a reliable, efficient and secure network that can be easily managed.

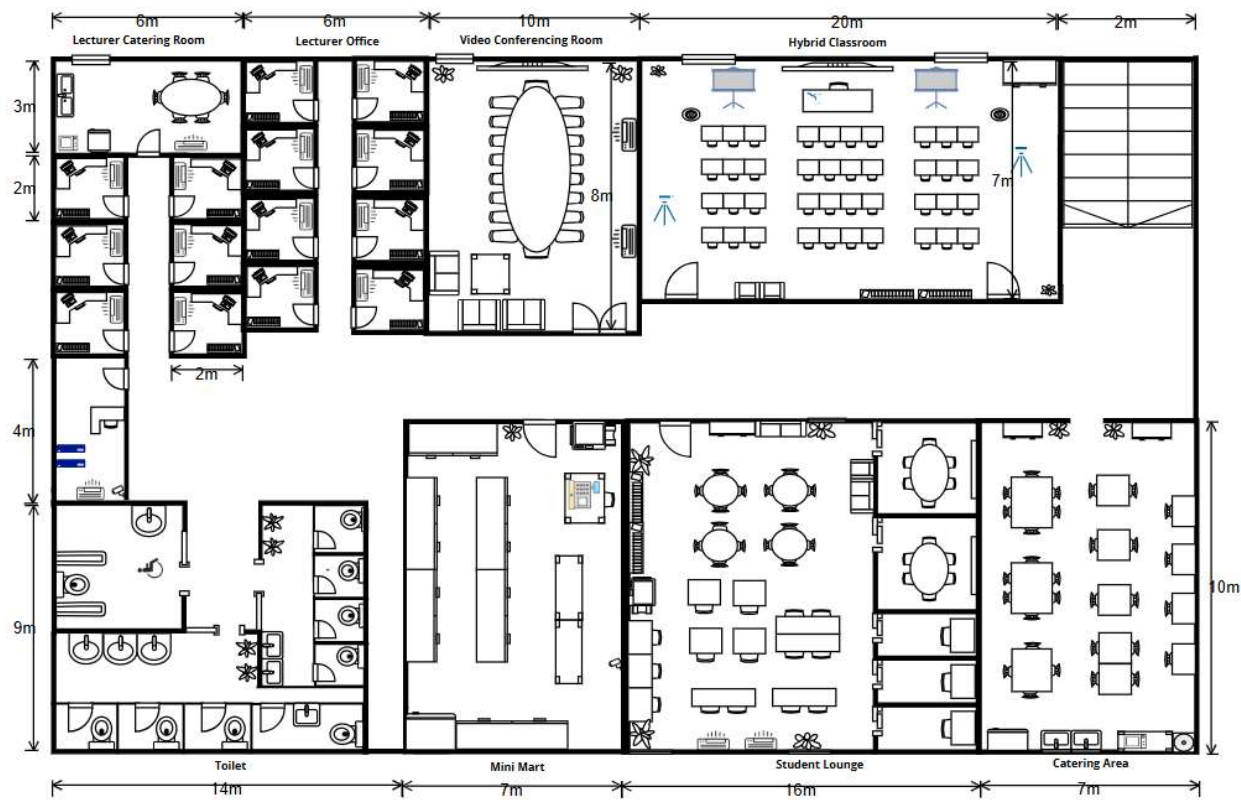
FLOOR PLAN: GROUND FLOOR



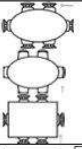































Indicators:

	Desk – 90cm x 70cm (General Purpose Lab and Embedded Lab)
	Desk – 6cm x 20cm (Cisco Network Lab)
	Desk – 80cm x 80cm (Cisco Network Lab)
	Desk – 100cm x 50cm (Embedded lab)
	Round Table - 80cm x 90cm
	Round Table - 200cm x 220cm
	Chair – 40cm x 43cm
	Window – 70cm x 120cm
	Door – 80cm x 85cm
	Slide door – 150cm x 30cm
	Door - 200cm x cm
	Sink – 70cm x 65cm
	Air Conditioner – 99.8cm x 34.5cm
	Bookcase – 100cm x 30cm
	Toilet Bowl – 60cm x 80cm
	Smartboard – 221.6cm x 131.6cm (General Purpose Lab)
	Flat TV – 90cm x 20cm (Cisco Network Lab and embedded lab)
	Vending machine – 74cm x 65cm
	Flowerpot – 40cm x 51cm

FLOOR PLAN: FIRST FLOOR



Indicators:

	Desk – 200cm x 100cm (Respectively Lecturer Catering Room, Student Lounge and Catering Area)
	Desk – 150cm x 100cm (Lecturer Office)
	Desk – 110cm x 110cm (Video Conferencing Room)
	Desk – 600cm x 300cm (Video Conferencing Room)
	Desk – 120cm x 80cm (Respectively Hybrid Classroom and Mini Mart)
	Desk – 100cm x 80cm (Hybrid Classroom)
	Desk – 100cm x 90cm (Respectively Student Lounge and Catering Area)
	Desk – 110cm x 110cm (Respectively Student Lounge and Catering Area)
	Desk – 100cm x 100cm (Catering Area)
	Checkout counter – 110cm x 80cm (Mini Mart)
	Chair – 40cm x 43cm
	Window – 70cm x 120cm
	Door – 80cm x 85cm
	Slide door – 150cm x 30cm
	Sink - 140cm x 65cm
	Sink – 70cm x 65cm
	Air Conditioner – 99.8cm x 34.5cm
	Refrigerator – 80cm x 170cm
	Oven – 60cm x 35cm
	Bookcase – 100cm x 30cm
	Toilet Bowl – 60cm x 80cm
	Screen Projector – 200cm x 180cm
	Smartboard – 221.6cm x 131.6cm
	Sofa – 120cm x 80cm & 60cm x 80cm
	Printer – 60cm x 140cm
	Cabinet – 150cm x 80cm (Same size, different appearance)
	Camera – 55cm x 140cm
	Floor lamp – 50cm x 50cm
	Water dispenser – 35cm x 120cm
	Microphone with mic stand – 14cm x 43cm
	Flowerpot – 40cm x 51cm
	Server – 48.3cm x 17.6cm

BRIEF EXPLANATION OF THE FLOOR PLAN

The ground floor consists of the 4 labs which are the Cisco Network lab, Embedded lab and 2 General Purpose Labs. The 2 General Purpose Labs are in the top left corner of the layout, adjacent to each other, while the Cisco Networking Lab is located beside the General Purpose Lab. The Embedded Lab is located on the left side beside the main entrance of the building. In this floor, toilets are located in the bottom left corner of the layout. There are 3 types of toilets which are Male Toilet, Female Toilet, and OKU Toilet. Moreover, a Rest Area with tables and chairs is prepared for students who are waiting outside the labs, and a vending machine that contains drinks and biscuits is prepared for students. The staircase is located in the top right corner of the layout.

The first floor of the building contains the Server Room, Lecturer Office, Lecturer Catering Room, Student Lounge, Mini Mart, Catering Area, Video Conferencing Room, and Hybrid Classroom. On the top left of the layout, there is a Lecturer Catering Room for lecturers that facilitated with refrigerator, microwave, and sink. The surroundings of the Lecturer Catering Room are multiple adjacent Lecturer Offices. Below the Lecturer Offices, there is a Server Room. Beside the Lecturer Offices, a Video Conferencing Room for virtual project meetings and a Hybrid Classroom are housed. On the bottom part of the layout, the toilets are placed on the left corner of the layout. Next to the toilets, a Mini Mart and the Student Lounge are housed beside each other. Besides, a Catering Area is prepared for students to enjoy their food, and it is located in the bottom right corner of the layout.

MEETING MINUTES #1

DATE/TIME	30 October 2024 8:00pm		
LOCATION	Online (Google Meet)		
AGENDA	1. Discuss the question on Task 1 2. Discuss the layout of floor plan 3. Decide on tools for designing the floor plan 4. Task distribution for all members		
Meeting MC	Chua Jia Lin		
ATTENDANCE			
NAME	TIME	REASON FOR ABSENCE	
Lau Yee Wen	8:00PM	-	
Cheryl Cheong Kah Voon	8:00PM	-	
Chua Jia Lin	8:00PM	-	
Gui Kah Sin	8:00PM	-	
MINUTES			
NO.	ITEM DISCUSSED	IDEAS/SUGGESTIONS AND PERSON GIVING IT	PERSON IN CHARGE & DATE
1	Discussion for Task 1	<ul style="list-style-type: none">- Cheryl shared the question and rubric via a slideshow.- All members reviewed the materials together.- Members who were unclear on the task received explanations from others.	All members
2	Group name	<ul style="list-style-type: none">- Yee Wen proposed the name "POWERPUFF".	Yee Wen
3	Tools for Designing the Floor Plan	Cheryl recommended using Cisco Packet Tracer and Visual Paradigm to do the floor plan.	Cheryl
4	Discussing layout of the floor plan	<ul style="list-style-type: none">- Kah Sin suggested placing 4 labs on the ground floor.- Yee Wen proposed adding a Catering Area next to the Student Lounge on the first floor.	All members

		<ul style="list-style-type: none"> - Cheryl recommended installing a sliding door for the Student Lounge. - Jia Lin suggested having toilets on both the ground and first floors. 	
5	Estimate the size	<ul style="list-style-type: none"> - Jia Lin highlighted the sizes given for each lab and the Student Lounge. - Cheryl suggested each lab must have uniform sizes. - Yee Wen suggested standardizing the size of all Lecturer Offices. - Kah Sin suggested the dimensions for the Lecturer's Office. 	All Members
5	Task Distribution	<ul style="list-style-type: none"> - Cheryl is responsible for designing 4 computer labs - Jia Lin is responsible for designing the Video Conferencing room, Lecturer Catering Room and Lecture room. - Yee Wen is responsible for designing Hybrid Classroom and all the toilets. - Kah Sin is responsible for designing the Rest Area and Student Lounge. 	All Members
5	Next meeting	Scheduled for November 7, 2024. The layout design for each room and lab needs to be completed by then.	
6	Meeting ended	At 10:30 pm, the meeting ended after all discussions had been done.	

MEETING MINUTES #2

DATE/TIME	7 November 2024 2:00pm		
LOCATION	M01 (KTDI)		
AGENDA	1. Plan the layout for the ground and first floors 2. Design and edit each lab and room 3. Combine the layout of all labs and rooms on the ground and first floors 4. Finalize the floor plan design of ground and first floor		
Meeting MC	Lau Yee Wen		
ATTENDANCE			
NAME	TIME	REASON FOR ABSENCE	
Lau Yee Wen	2:00PM	-	
Cheryl Cheong Kah Voon	2:00PM	-	
Chua Jia Lin	2:00PM	-	
Gui Kah Sin	2:00PM	-	
MINUTES			
NO.	ITEM DISCUSSED	IDEAS/SUGGESTIONS AND PERSON GIVING IT	PERSON IN CHARGE & DATE
1	Sharing session on the current progress	- All members shared	All members
2	Layout for the ground and first floor	- Cheryl suggested adding a vending machine on the ground floor. - Kah Sin reminded us that ensure all labs must have at least 30 workstations as per the rubric. - Jia Lin suggested placing all computer labs on the ground floor. - Yee Wen suggested including decorations and air conditioning for each room.	All members
3	Design and edit each room and floor	- Cheryl suggested the size of the Lecturer Catering Room and Lecturer Office.	All members

		<ul style="list-style-type: none"> - Yee Wen suggested position the Catering Area beside the Student Lounge - Kah Sin suggested ensuring the female toilet is larger than the male toilet and includes facilities for OKU. - Jia Lin suggested the position of the stairs. 	
4	Combination of each lab and room on the ground and first floor	<ul style="list-style-type: none"> - All members integrated their designs into the ground and first floor layouts. 	All members
5	Beautify the final floor plan design	<ul style="list-style-type: none"> - All members added decorations to enhance the final floor plan. 	All Members
6	Meeting ended	At 4:30 pm, the meeting ended after all discussions had been done.	