

Problem Solving

Example 2:

Problem Solving Example 2:

- Open the cash register
- Identify each and every denomination of what type of bill is stored in it
- Count the number of bills in each compartment ~~and multiply this~~
- Multiply the counted number with the bill's value
- Add all the multiplied values to get the total cash stored.

Q1.

Problem Solving Q1.

1. Identify the items that are cluttered
2. Choose one of each item and place them on a clean and empty table
3. Take one item from the clutter and place it with its corresponding item on table.
4. Find an empty space in the kitchen where one type of items can be stored, and store the items there.
5. Repeat step 4 until no more items left on table
6. End...

Q2 and 3:

Problem Solving Q2:

- Identify the possible solutions and the time they require approximately. One solution is to call a cab ride from Uber.
- Post a request to find an available driver
- Negotiate the price to what you regularly pay
- Give the driver directions to your location
- Get seated in the car and notify the driver to drive fast but safe, because you are late
- When you arrive at the destination, pay the driver and get to your office.

Problem solving Q3:

- Identify the types of exercises you want to do regularly.
- Choose ~~at~~ only the ones that require under 10 minutes and are still effective
- All your exercises should add up to 30 minutes.
- Execute this plan in your free time. If you need changes, do implement them accordingly.
- Remember to accompany yourself with a full water bottle before your routine.

Problem Analysis Chart (PAC)

Q1.

PAC Chart Q1:	
Given Data	Required Results
Length Width	Area Perimeter
Processing Required	Solution alternatives
Area = Length \times Width Perimeter = $2(\text{Length} + \text{width})$	• Plot on a graph then find the enclosed area

Q2.

PAC Chart Q2:	
Given data	Required Results
numA numB numC	maximum
Processing req	Solution alternatives
if numA > numB AND numA > numC maximum = numA elseif numB > numC maximum = numB else maximum = numC	• If the second number input is less than the first number, eliminate it. Same for the third number.

Q3.

PAC chart for	
<u>Given data</u>	<u>Required results</u>
TempCelsius	TempFahr
<u>Processing required</u>	<u>Solution alternatives</u>
$\text{TempFahr} = (9/5)(\text{TempCelsius}) + 32$	<ul style="list-style-type: none">• Use an automatic ^{temperature} conversion module by importing it

Input Processing Output Chart (IPO)

Q1.

IPO Q1

Input	Processing	Module Reference	Output
Length width	Area = Length x width Perimeter • Input Length • Input width • Calculate Area • Calculate Perimeter • Print Area, Perimeter • End	Read Read Calc Calc Print CalcAreaPerimeter	Area Perimeter

Q2.

IPO Chart Q2

Input	Processing	Module Ref	Output
numA numB numC	• Input numA, numB, numC • Compare the numA, numB, numC to find out maximum • Print maximum • End	Read CompareMax Print max Number	maximum

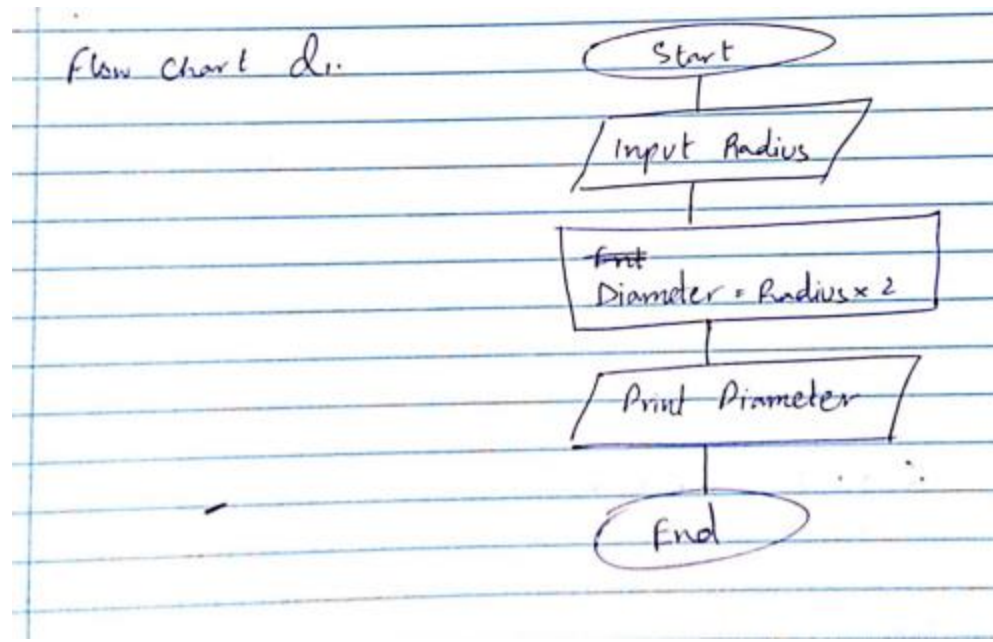
Q3.

IPO chart dg.

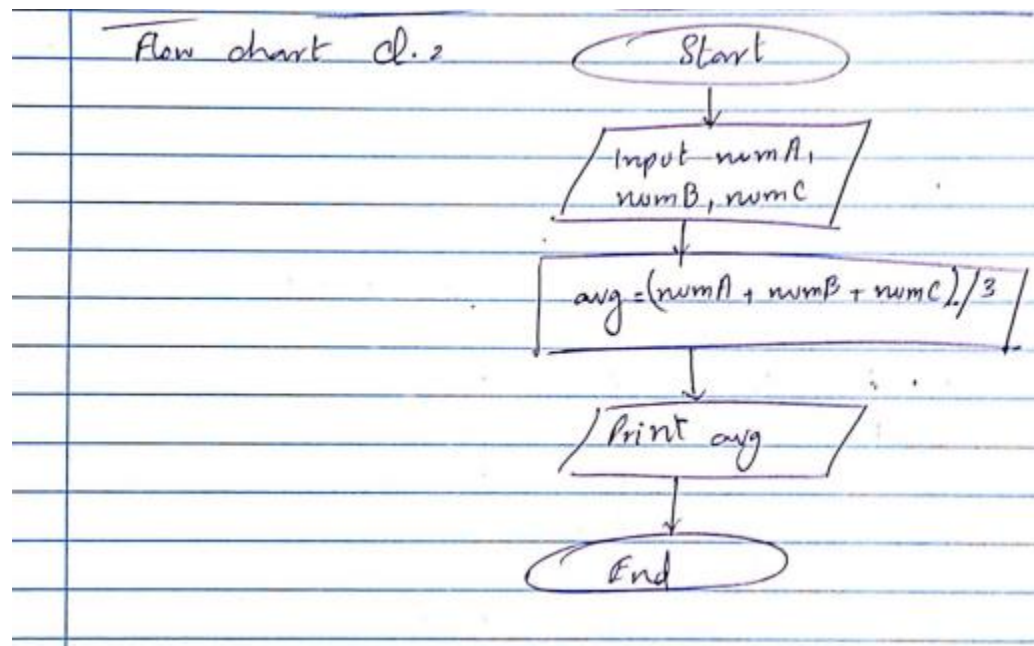
Input	Processing	Module Ref.	Output
tempCelsius	<ul style="list-style-type: none">• Input tempCelsius• Calculate tempFahr• Print tempFahr• End	<ul style="list-style-type: none">ReadCalcPrintconvertTemp	tempFahr

Flow Chart

Q1.



Q2.



Q3.

Date:

Flow chart Q3

