Question 6:

Flowchart--

Sheet metal

Finished car

Hardware, trim and electronics

If the parts pass quality control

Stamp the sheet into car parts.

Assemble parts into basic structure of the car

Install internal components of the car

Add engine, wheels, axles and transmission

Paint the car

Question 4:

Algorithm—

* Assign a number from 1 to 12 to each month chronologically.
* Ask the user to enter a number from 1 to 12.
* Select the month that corresponds to the number and display it.

Question 5:

Pseudocode—

* Start
* Input: two numbers
* If the operator ‘+’ is selected, then take sum of the two numbers
* If the operator ‘-‘ is selected, then take difference of the two numbers.
* Output: display either the sum or difference depending on the operator entered.
* End.

Question 7:

Algorithm--

* Ask the user to enter two numbers and one of the four operators: ‘-, +, \* or /’
* If the operator entered is ‘-’, take difference of the two numbers.
* If the operator entered is ‘+’, take sum of the two numbers.
* If the operator entered is ‘\*’, take product of the two numbers.
* If the operator entered is ‘/’, divide the two numbers.
* Print the sum, difference, product or quotient depending on the operator entered.

Question 10:

Difference between pseudo-code and algorithm.

An algorithm is a systematic, step-by-step progression of logic that is used to develop code. Pseudo-code is used to develop algorithms. Although both are in English and not in the syntax of a particular programming language, pseudo-code is more informal compared to algorithm.

Question 2:

Pseudocode—

* Start
* Input: Customer account number and details of deposit transactions.
* Check whether the account details are valid or not.
* Check whether the deposit amount fulfill the deposit conditions or not.
* Output: deposit the given amount to the customer’s account
* End

Algorithm—

* Ask the customer to enter account number.
* Verify the validity of the customer account.
* Ask the customer to enter deposit transaction details.
* Verify if the deposit amount fulfills the conditions for deposit transaction. If they do, proceed. Else, decline the transaction.
* Deposit the given amount to the customer’s account.

Question 3:

Pseudocode—

* Start
* Input: three different values
* Compare the three values
* Output: print the largest value
* End

Algorithm—

* Ask the user to enter three different values
* Compare the three values to find the largest value
* Display the value to the user

Question 1:

Pseudocode—

* Start
* Input: customer order
* Processing: record customer order, retrieve the products required from kitchen.
* If special request like add-ons, then take additional input and process.
* Output: Serve customer the ordered product.
* End

Algorithm—

* Take the customer’s order.
* Retrieve the ordered items from the kitchen.
* If the customer has any add-ons, then record and retrieve those items as well.
* Serve the customer the retrieved items.

Flowchart—

Start

Input: order

Retrieve order from kitchen

If more input received

Serve the order to customer

End

then