

## Myntra

### Round 1: Problem solving

Find an element in sorted and rotated array. Consider all the edge cases.

Flatten a binary tree

Java questions on closeable interface and try with resources block

### Round 2: DS+Algo

Find all the nodes in binary tree which are at a distance  $k$  from the given node

Find next greater number with the same set of digits

### Round 3: Design Round

Design question : Design a parking lot where the query is : given a vehicle number , you should be able to find parking lot.

given white colour vehicle, we should find the parking lot number.

Find open slots of the parking lot

### Round 4: Hiring manager

Java questions on synchronization, inner classes, future object

## FlipKart:

### Round 1 : Machine Coding Round

Design logging system which reads, writes logs and has the ability to purge logs as well.

There are different types of log levels.

### Round 2 : DS+Algo

There are  $n$  people sitting in circular table. Find maximum number of handshakes between two people at a time such that no two handshakes do not cross each other.

There is a lucky draw going on in Flipkart where each user is assigned a unique code everytime he buys ticket. The algorithm for choosing the winner is that winner is chosen from list of users who bought ticket only once.

### Round 3 : Design

Design Parking lot where there are multiple entries and exits.

### Round 4 Hiring Manager

Mostly about projects and behavioural questions.

## Amazon:

### Round 1 : Problem solving

Minimum number of jumps required in an array to reach from start of the array to end of the array such that a person can jump from  $arr[i]$  to  $arr[j]$  only when:

1.  $arr[i] == arr[j]$
2. From  $i$  to  $i+1$
3. From  $i$  to  $i-1$

### Round 2 :

Write a program to find whether a binary tree is BST or not

Write a program to find the largest size BST in a binary tree.

How auto settle function works in splitwise app.

### Round 3:

Design cricinfo website. Both class design and system design.

### Round 4:

Mostly about projects and past experiences

### Hotstar:

#### Round 1 : Telephonic

Given a dictionary, and two words 'start' and 'target' (both of same length). Find length of the smallest chain from 'start' to 'target' if it exists, such that adjacent words in the chain only differ by one character and each word in the chain is a valid word i.e., it exists in the dictionary. It may be assumed that the 'target' word exists in dictionary and length of all dictionary words is same.

#### Round 2: DS+ALGO

Edit distance problem:

Given two strings  $str1$  and  $str2$  and below operations that can performed on  $str1$ . Find minimum number of edits (operations) required to convert 'str1' into 'str2'.

1. Insert
2. Remove
3. Replace

All of the above operations are of equal cost.

Round 3: Design Round 1

Design book my show . Both class design and system design

Round 4: Design Round 2

Design both classes and system design for a component which calculates watch time for each content per user and calculates finally the average watch time for a content

Round 5 Bar raiser Round

Design classes for system where user can post content in hotstar and compute whether the content is liked or not, compute number of likes for content etc.

Design APIS for above system.

Design notification system for a particular component. (Observer pattern)

Round 6 : hiring manager round

Mostly about projects

Round 7 HR round

RazorPay

Round 1:

Design hotel booking system . Write fully working code with all the classes and driver program to test the full workflow.

Round 2:

Java questions on multithreading. How to enable multiple transactions in payment system ? handle concurrency

Round 3:

More questions on hotel booking system code. How can we make the code synchronized for multiple bookings at a time ?. Which object should be locked during synchronization ?

Round 4: HR round

Other important questions:

Given an array x, find pair i,j such that  $|x[i]-x[j]| + |i-j|$  is maximum

Given an array, find the maximum sum such that no two elements are consecutive

Given a binary tree, connect all the nodes at same level.

Coin change problem

Given a 2d array, find minimum number of steps required to reach destination from source

Tree important questions :

<https://medium.com/@codingfreak/binary-tree-interview-questions-and-practice-problems-439df7e5ea1f>

<https://www.geeksforgeeks.org/given-an-array-arr-find-the-maximum-j-i-such-that-arrj-arri/>

<https://www.geeksforgeeks.org/maximum-difference-between-two-elements/>

<https://www.geeksforgeeks.org/find-the-two-repeating-elements-in-a-given-array/>

<https://www.geeksforgeeks.org/sort-an-array-of-0s-1s-and-2s/>

<https://www.geeksforgeeks.org/find-a-fixed-point-in-a-given-array/>

<https://www.geeksforgeeks.org/maximum-sum-increasing-subsequence-dp-14/>

<https://www.geeksforgeeks.org/find-a-sorted-subsequence-of-size-3-in-linear-time/>

<https://www.geeksforgeeks.org/maximum-contiguous-circular-sum/>

<https://www.geeksforgeeks.org/minimum-number-platforms-required-railwaybus-station/>