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(iv) Priority Queue

Priority Queue is also a linear data structure. Like all other queues it also has two ends front and rear. New elements are added from rear end where as existing elements are deleted from the front end. As a result this queue follows FIFO Principle. which means

When the queue became full, insertion of new element if attempted result in Overflow. and when it is empty, attempt to delete any element results in Underflow.

Priority Queue is a special type of Queue in which each element has a priority number. ~~Each~~ the elements are processed in the ascending order of their priority number it means element with priority number 1 will be processed first, followed by ~~other~~ element with priority number 2 and so on.

In case if two elements have same priority numbers then they are processed in order of their arival in the main memory. It means each element of the priority queue has two extra fields

i) Priority number
ii) Order

The structure of priority Queue can be shown as given below:⇒

```
Struct Job
 {
  char Jobname[5];
  int priority no;
  int order;
 }

Struct Page
 {
  int frone;
Struct job jobr[50];
  int rear;
 };
```

Page No.
Date : / /

Advantage of priority Queue :⇒

Priority Queue is a very useful que and use at places where we have to perform task according to their priority. This queue is used by operating System or priority scheduling and we use it for listening to a song of our choice in serial order as we want.