14-10-20

Implementation of a Linear queue

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#include<stdio.h>
#include<stdlib.h>
#define QUE_SIZE 5
int item, front=0, rear=-1, q[5];
 void insertrear()
 {
  if (rear == QUE_SIZE-1)
   {
    printf("Queue overflow\n");
     return;
   }
  rear = rear+1;
  q[rear] = item;
 }
int deletefront()
 {
  if (front > rear)
    {front=0;
     rear=-1;
     return-1;
    }
  return q[front++];
 }
void display()
 {
   int i;
   if(front > rear)
    {
     printf("Queue is empty\n");
      return;
    }
   printf("Contents of the queue are:\n");
      for(i=front; i<=rear; i++)
        { printf("%d\n", q[i]);
        }
```

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int main()
{ int choice;
  for(;;)
  {
  printf("\n1.Insertrear\n2.Deletefront\n3.Display
          \n4.Exit\n");
  printf("Enter the choice\n");
  scanf("%d",&choice);
  switch(choice)
     {
  case1 : printf("Enter the item to be inserted\n");
          scanf("%d",&item);
          Insertrear();
          break;
  Case 2: item = deletefront();
          if(Item == -1)
          printf("Queue is empty\n");
          else
          printf("Item deleted :%d\n",item);
          break;
  Case 3 : displayQ();
           break;
    default : exit(0);
   3
3
3
```