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# Circular queue implementation

## Pseudo code:

```
#define size 20
    int A[size]
int front = -1 , rear = -1 ;
IsFull()
{
  if(front ==(rear + 1)%N)
    return true
  else
    return false
}
IsEmpty()
  { if (front == -1 && rear == -1)
      return true
    else
      return false
  }
Insert (element)
  { if(IsFull())
      printf ("Queue is full");
    else if (IsEmpty())
      { front = rear = 0
      }
    else { rear = (rear+1)%N
           A[rear] = element
```

```
Delete ( )
{
   if (IsEmpty ( ))
      printf ("Queue is Empty");
   else if ( front == rear)
   { element = A[front]
     front = rear = -1

   }
   else
   {element = A [front]
      front = (front +1) % N
   }
   return element;
   }
Display ( )
{
   if (IsEmpty ( ))
      printf ("Queue is empty");
   else
   for (i = front ; i != rear; i = (i+1) % size)
   printf("%d", A[i]);
}
```