

Circular Queue

A [SIZE] , FRONT = -1 , REAR = -1

IsEmpty () {

if (front == -1 && rear == -1)

return true

else

return false

}

IsFull ()

{ if (rear == (front+1) % N)

return true

else

return false

}

Enqueue (x)

{ if (IsFull ())

printf (" Q is Full ");

else if (IsEmpty ())

front ← rear ← 0

else

rear ← (rear + 1) % N

A [rear] = x

}

Dequeue ()

{ if (IsEmpty ())

printf (" Q is Empty ");

else if (front == rear)

front ← rear ← -1

else

$x \leftarrow A[\text{front}]$

$\text{front} \leftarrow (\text{front} + 1) \% N$

}

return x

}