

```
#include <stdio.h>
#include <stdlib.h>
#define QVE_SIZE 5
int item, front = 0, rear = -1, q[QVE_SIZE], count = 0;
void enqueue()
{
    if (count == QVE_SIZE)
    {
        printf("QUEUE OVERFLOW\n");
        return;
    }
    rear = (rear + 1) % QVE_SIZE;
    q[rear] = item;
    count++;
}

int delete front()
{
    if (count == 0)
    {
        return -1;
    }
    item = q[front];
    front = (front + 1) % QVE_SIZE;
    count = count - 1;
    return item;
}

void display()
{
    int i;
    if (count == 0)
    {
        printf("QUEUE is empty\n");
        return;
    }
    for (i = front; i < front + count; i++)
    {
        printf("%d ", q[i]);
    }
    printf("\n");
}
```

```

f = front;
printf ("CONTENTS OF QUEUE\n");
for (i = 1; i <= count; i++)
{
    printf ("%d\n", q[f]);
    f = (f + 1) % QUEUE_SIZE;
}
}

```

```

void main()

```

```

{
    int choice;
    for (;;)
    {
        printf ("Enter 1. insert item 2. delete from 3. Display\n");
        printf ("Enter choice\n");
        scanf ("%d", &choice);
        switch (choice)
        {
            case 1: printf ("Enter item to be entered\n");
                    scanf ("%d", &item);
                    insert item();
                    break;
            case 2: item = delete front();
                    if (item == -1)
                        printf ("Queue empty\n");
                    else
                        printf ("Item Deleted is %d", item);
                    break;
            case 3: Display();
                    break;
            default: exit(0);
        }
    }
}
}

```