```java
/* PRACTICAL-4: Write a program to implement Queue using arrays that performs following operations.
(a) INSERT (b) DELETE (c) DISPLAY

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// CODE:

import java.util.Scanner;

public class practical4 {
    private int[] queue;
    private int front;
    private int rear;
    private int capacity;
    private int size;

    public practical4(int capacity) {
        this.capacity = capacity;
        this.queue = new int[capacity];
        this.front = 0;
        this.rear = -1;
        this.size = 0;
    }

    public void insert(int item) {
        if (isFull()) {
            System.out.println("Queue is full. Cannot insert more elements.");
            return;
        }
        rear = (rear + 1) % capacity;
        queue[rear] = item;
        size++;
        System.out.println("Inserted element: " + item);
    }

    public int delete() {
        if (isEmpty()) {
            System.out.println("Queue is empty. Cannot delete element.");
            return -1;
        }
        int deletedItem = queue[front];
        front = (front + 1) % capacity;
        size--;
        return deletedItem;
    }

    public void display() {
        if (isEmpty()) {
            System.out.println("Queue is empty.");
            return;
        }
        System.out.print("Queue elements: ");
        int count = 0;
        int index = front;
        while (count < size) {
            System.out.print(queue[index] + " ");
```

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            index = (index + 1) % capacity;
            count++;
        }
        System.out.println();
    }

    public boolean isFull() {
        return size == capacity;
    }

    public boolean isEmpty() {
        return size == 0;
    }

    public static void main(String[] args) {
        Scanner scanner = new Scanner(System.in);
        System.out.print("Enter the capacity of the queue: ");
        int capacity = scanner.nextInt();
        practical4 queue = new practical4(capacity);

        int choice;
        do {
            System.out.println("\nQueue Operations:");
            System.out.println("1. Insert");
            System.out.println("2. Delete");
            System.out.println("3. Display");
            System.out.println("4. Exit");
            System.out.print("Enter your choice: ");
            choice = scanner.nextInt();

            switch (choice) {
                case 1:
                    System.out.print("Enter element to insert: ");
                    int element = scanner.nextInt();
                    queue.insert(element);
                    break;
                case 2:
                    int deletedItem = queue.delete();
                    if (deletedItem != -1)
                        System.out.println("Deleted element: " + deletedItem);
                    break;
                case 3:
                    queue.display();
                    break;
                case 4:
                    System.out.println("Exiting...");
                    break;
                default:
                    System.out.println("Invalid choice. Please enter a valid option.");
            }
        } while (choice != 4);

        scanner.close();
    }
}
```