Wells Fargo - Programming questions - May 2024

1. What will be the output of below code

```
DispatchQueue.global().async {
    if Thread.isMainThread {
        print("We are on main thread")
    } else {
        print("We are on background thread")
    }
}
```

2. What will be the output of below code

```
DispatchQueue.global().sync {
    if Thread.isMainThread {
        print("We are on main thread")
    } else {
        print("We are on background thread")
    }
}
```

3. What will be the output of below code

```
DispatchQueue.global().sync {
    print("1")
    DispatchQueue.main.sync {
        print("2")
    }
    print("3")
}
```

4. Create a stack class with push and pop methods, make it generic, and add error handling? How can you make the push and pop operations of a stack class thread-safe?