



# SECURITY REVIEW

Nadko Dentals

Version	Date	State
1.0	20.06.2021	Initial Release

## Contents

OWASP TOP 10.....	2
Injection ✓ .....	2
Broken Authentication ✓ .....	2
Sensitive Data Exposure ✓ .....	2
XML External Entities ✓ .....	2
Broken access control ✓ .....	2
Security Misconfiguration ✓ .....	2
Cross-Site Scripting XSS ✗ .....	2
Insecure Deserialization ✗ .....	2
Using Components with Known Vulnerabilities ✗ .....	3
Insufficient Logging & Monitoring ✗ .....	3

## OWASP TOP 10

### Injection ✓

Nadko Dentals Is protected from SQL injection on account of it not using any SQL native queries. Instead database communication is handled by methods like `*reposiroty*.save()`.

### Broken Authentication ✓

Authentication in Nadko Dentals is handled by JSON Web Tokens therefore no actions are authorized either in the front end or in the Rest API unless they come with a header featuring an active JWT token.

### Sensitive Data Exposure ✓

Password protection in “NadkoDentals” is handled by Bcrypt type encryption provided by the Spring framework’s PasswordEncoder interface. No other sensitive data is encrypted.

### XML External Entities ✓

Nadko Dentals doesn’t handle external XML files therefore isn’t affected by this vulnerability.

### Broken access control ✓

Authorization is handled by the back-end. Specifically the `@PreAuthorize()` Spring Framework tag and the Spring framework class `authorizeRequests()` method

### Security Misconfiguration ✓

Nadko Dentals’ security is setup well and without needless vulnerability however it has not been thoroughly tested due to the lack of expertise in that field by the developer.

### Cross-Site Scripting XSS ✗

Nadko Dentals is vulnerable to XSS as many fields are not regex validated to exclude a JS injection.

### Insecure Deserialization ✗

Many fields are not regex validated therefore Nadko Dentals is vulnerable in this regard

## Using Components with Known Vulnerabilities ❌

Nadko Dentals does use some input files that use or override a deprecated API.

## Insufficient Logging & Monitoring ❌

Nadko Dentals implements no logging or monitoring