OWASP DeepViolet
TLS/SSL
JAVA API & Tools

Project Leader
Milton Smith
Twitter: @deepvioletapi
Blog: https://www.securitycurmudgeon.com/

Black Hat EU 2016 London
Tools Arsenal
What is DeepViolet?

TLS/SSL scanning API

2 reference cases demonstrating API

Command line tool & desktop application
Why Build DeepViolet?

Why build DeepViolet (DV)? I did not set out to build a tool for the public. DV was a learning tool for me. Heartbleed was in the popular press, I wanted to learn more about underlying TLS/SSL protocols. When I finished the original code I posted it to my github site.

I was approached several times to add improvements to DV. Asked others why they liked it. Most common answer is that there are few available choices for libraries that provide TLS/SSL scanning features for applications.

Great tools exist today like OpenSSL, Qualys SSL Server Test, Mozilla Observatory, etc. Yes, my favorites as well. No intention to compete with any tools.
<table>
<thead>
<tr>
<th>What Can DeepViolet API/Tools Do?</th>
</tr>
</thead>
<tbody>
<tr>
<td>Identify Weak Server Cipher Suites</td>
</tr>
<tr>
<td>Identity Weak Signature Algorithms</td>
</tr>
<tr>
<td>Identity Certificates About to Expire</td>
</tr>
<tr>
<td>And more...</td>
</tr>
</tbody>
</table>
Getting Started with the API

```java
IDSession session = DVFactory.initializeSession(url);

IDVOnEng eng = DVFactory.getIDVOnEng(session);

// Get certificates, ciphersuites, print some reports...
// Review unit tests in com.mps.deepviolet.test.api to get started...
```
DeepViolet Desktop Application

1) Provide a URL and Click
2) Report is generated
3) Save report to disk

Easy as that. Adapt as needed.
DeepViolet Command Tool

1) Try a command line like this, `java -jar dvCMD.jar -serverurl https://www.google.com/ -s hrcisn`

2) Report is generated

3) Redirect output to file or pipe to `grep` to search certificate metadata

Easy as that. Adapt as needed.
Additional References


**GitHub Site:** [https://github.com/spoofzu/DeepViolet](https://github.com/spoofzu/DeepViolet)

**Download:** [https://github.com/spoofzu/DeepViolet/releases](https://github.com/spoofzu/DeepViolet/releases)

**Follow Online:** twitter, [@deepvioletapi](https://twitter.com/deepvioletapi)