## Technical Information:

* The PPD was written in Java 8
* The PPD uses Apache POI 5.0.0

## Development Environment Setup

1. Clone the PowerPointDiffer repository to the local disk.
2. Launch the Eclipse IDE.
3. In the workspace selection dialog, click the new button.
4. Create a new workspace named PPD-workspace, select this workspace to use and continue launching Eclipse.
5. From the Eclipse **File** menu, select the **Import…** menu option.
6. In the **Import** dialog, open the **Maven** folder, and select the **Existing Maven Projects** option.
7. Click the **Next >** button.
8. Click the **Browse…** button.
9. In the open dialog that opens, navigate to where the PPD repository was cloned in the first step, select the root level folder, and click the dialog’s **Open** button.
10. The **Projects:** pane should now be populated with: **/pptdiffer/pom.xml**
11. Click the **Finish** button.
12. The Eclipse **Package Explorer** should now be populated with a **pptdiffer** folder.
13. Right click the **pptdiffer** folder, from the contextual menu select **Maven** 🡪 **Update Project…**
14. In the **Update Maven Project** dialog, verify that the following checkboxes are checked:
    1. **pptdiffer** (under Available Maven Codebases)
    2. **Update project configuration from pom.xml**
    3. **Refresh workspace resources from local filesystem**
    4. **Clean projects**
15. Click the **OK** button.
16. If there are compiling errors at this point, try repeating the two previous steps, but with the **Force Update of snapshots/Releases** checkbox checked.
17. If there are compiling errors at this point, try the following:
    1. Right click the **pptdiffer** folder, from the contextual menu select **Run As** 🡪 **Maven Clean**.
    2. Right click the **pptdiffer** folder, from the contextual menu select **Run As** 🡪 **Maven Build**.
18. In the Eclipse Package Explorer, open the pptdiffer folder, open src/main/java, then open com.horvath.pptdiffer.application.
19. In the com.horvath.pptdiffer.application package, right-click the PpdApplication.java file, from the contextual menu select **Run As** 🡪 **Java Application**.
20. The PowerPoint Differ GUI application should start up.

## Unit Testing

* Unit tests for the PPD application were written with JUnit version 4.13.1.
* A unit test suite is included for running all unit tests at one time. The test suite is named PpdTestSuite.java and located at src/test/java in the package com.horvath.pptdiffer.
* When a new unit test file is created, it needs to be added to the test suite following the existing pattern in the test suite file.
* To run the unit test suit right-click the PpdTestSuite.java file and select **Run As** 🡪 **Java JUnit Test**.