Parte I

Avance 2 del proyecto

Andrés Salazar, Daniel Montoya

27 de Abril de 2017

Índice

1.	Checkstyle	1
	1.1. Descripción	1
	1.2. Descarga	2
	1.3. Instalación	2
2.	Configurar plugin en eclipse	4
3.	Análisis de la herramienta	7
4.	Conclusiones	7
5.	Referencias	7

Resumen

El siguiente documento explica el modo de uso de la herramienta de verificación de la codificación. El cual sirve para verificar la sintaxis del código para que sea más legible.

1. Checkstyle

1.1. Descripción

Es una herramienta de calidad de código encargada de validar los estándares de construcción de un desarrollo. Es decir, chequea la sintaxis del código fuente que ha sido desarrollado, encontrando las ocurrencias de un determinado problema que haya sido previamente configurado para ser detectado.

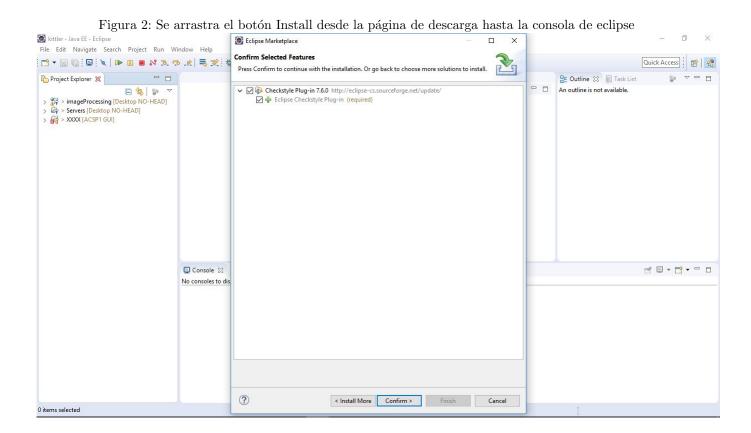
1.2. Descarga

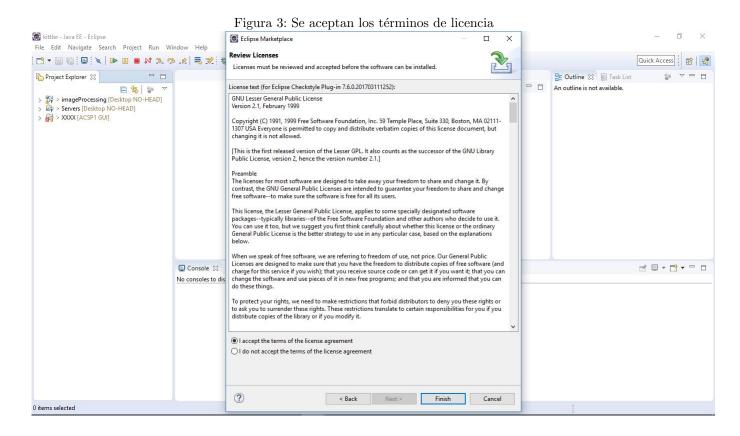
Figura 1: Página de descarga del plugin de checkstyle para eclipse ← → C 🔓 Es seguro | https://marketplace.eclipse.org/content/checkstyle-plug © ☆ **(** 0 : å Create account → Log in marketplace MY MARKETPLACE ADD CONTENT MORE-HOME / MARKETPLACE / TOOLS (1641) / CHECKSTYLE PLUG-IN Checkstyle Plug-in Screenshots Metrics Errors External Install Button eclipse-cs Search C The Checkstyle Plugin (eclipse-cs) integrates the well-known source code analyzer Checkstyle into ☆396 ♀1 the Eclipse IDE. ADVANCED SEARCH Checkstyle is a development tool to help you ensure that your Java code adheres to a set of coding 🚣 Install standards. Checkstyle does this by inspecting your Java source code and pointing out items that deviate from a defined set of coding rules. A 9 6 7 With the Checkstyle Plugin your code is constantly inspected for problems. Within the Eclipse workbench you are notified of problems via the Eclipse Problems View and source code annotations just as you would see with compiler errors or warnings. A comfortable Checkstyle configuration editor helps you create and maintain your audit rule configurations. Using filters and file sets you are able to define which files get checked and which don't. FindBugs Eclipse Plugin • coala Eclipse Plug-in Categories: Source Code Analyzer Stereotype Checker

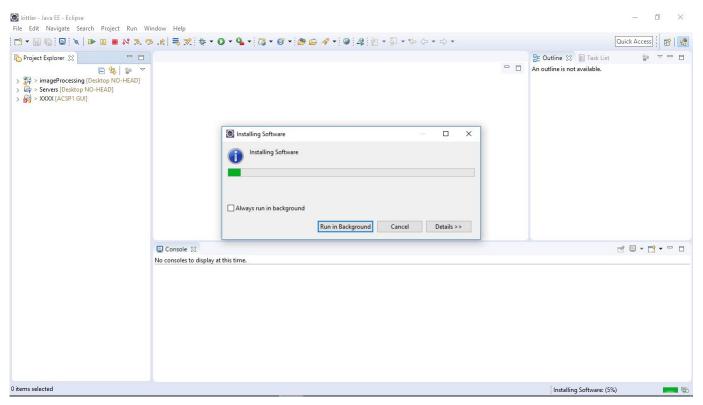
Tags: static analysis, Favorite, validator, coding style

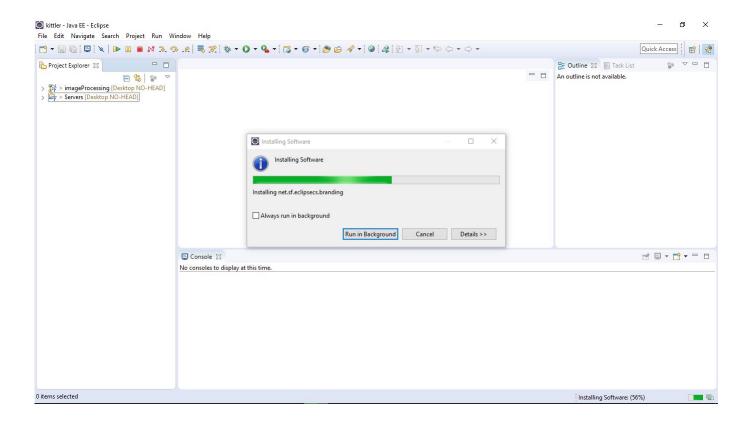
1.3. Instalación

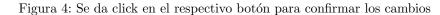
• Robusta Eclipse Plugin

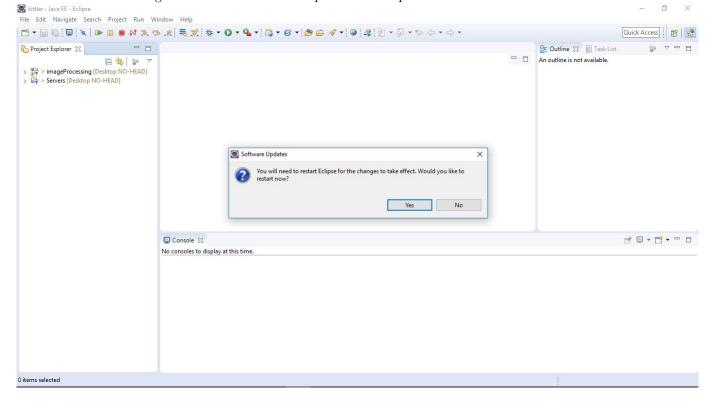












2. Configurar plugin en eclipse

Una vez instalado el plugin se debe configurar el proyecto para posteriormente ejecutar el análisis.

Figura 5: Se da click derecho en la carpeta del proyecto, vamos a propiedades y seleccionamos Checkstyle

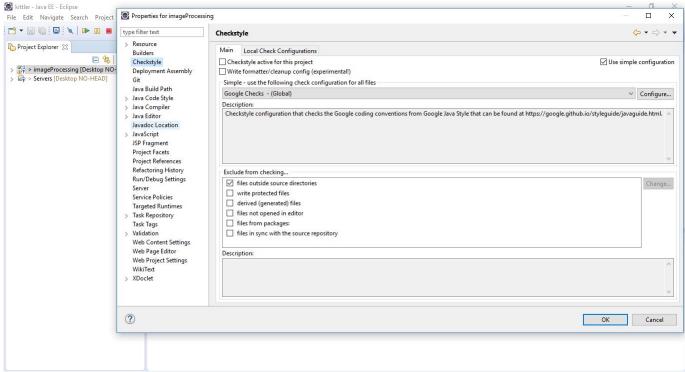
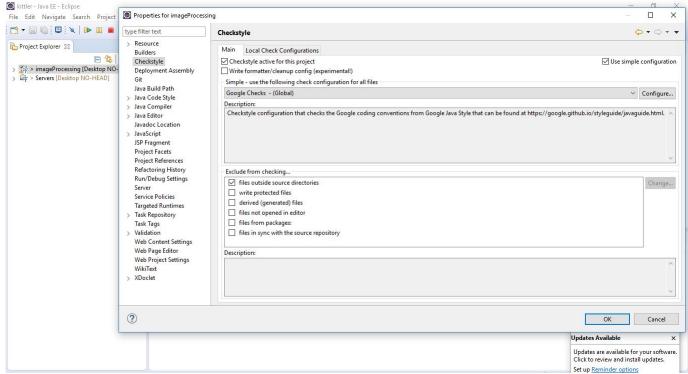


Figura 6: Seleccionamos Checkstyle active for this project



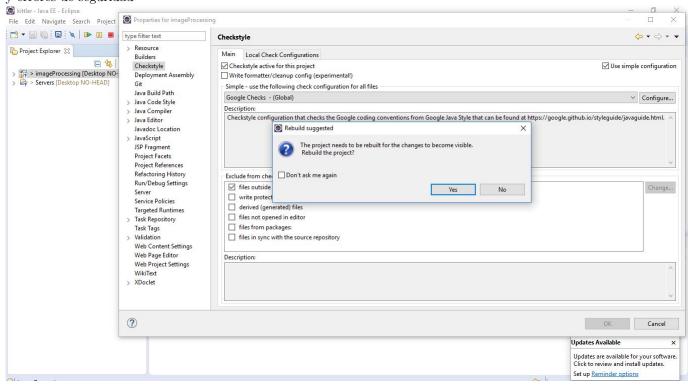
kittler - Java EE - Eclipse Properties for imageProcessing File Edit Navigate Search Project X type filter text Checkstyle Resource Project Explorer 🛭 Main Local Check Configurations Builders ☐ Checkstyle active for this project
☐ Write formatter/cleanup config (experimental!) Checkstyle ✓ Use simple configuration > imageProcessing [Desktop NO-> Servers [Desktop NO-HEAD] Deployment Assembly Simple - use the following check configuration for all files Java Build Path ∨ Configure... Google Checks - (Global) Java Code Style Description:

Checkstyle configuration that checks the Google coding conventions from Google Java Style that can be found at https://google.github.io/styleguide/javaguide.html. > Java Compiler Java Editor Javadoc Location > JavaScript JSP Fragment **Project Facets** Project References Refactoring History Exclude from checking... Run/Debug Settings files outside source directories Change... Server write protected files Service Policies derived (generated) files Targeted Runtimes > Task Repository files not opened in editor Task Tags files from packages: > Validation files in sync with the source repository Web Content Settings Web Page Editor Web Project Settings WikiText > XDoclet ? OK Cancel

Figura 7: Por último seleccionamos Google Checks - (Global) y seleccionamos OK

Figura 8: Se aparece un mensaje diciendo que se va a recompilar para después detectar cada una de las advertencias y errores de seguridad

Updates are available for your software Click to review and install updates. Set up Reminder options



3. Análisis de la herramienta

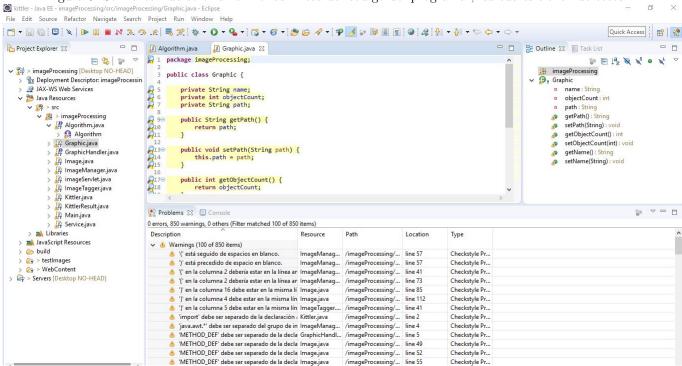


Figura 9: Se marcan de color amarillo las líneas del código del programa, las cuales tienen defectos

4. Conclusiones

La herramienta Checkstyle está encargada de verificar los errores de seguridad que existen en el código del programa, así como aumentar la seguridad de nuestro código ante posibles ataques para evitar que se dañe la integridad del programa.

5. Referencias

Anon, (2017). [online] Available at: https://marketplace.eclipse.org/content/checkstyle-plug [Accessed 26 April 2017].