## Lab 5 - Polymorphism - Never drink black coffee at lunch; it will keep you awake all afternoon. - Jilly Cooper

- 1. In your lab project, Team->Remote->Pull from Upstream
- 2. Open Windows (not Internet) Explorer and go to the project on your USB drive
- 3. Go into Documents\Lab05
- 4. Copy the file javadoc.zip to the Desktop
- 5. Double click on javadoc.zip on the Desktop and select Extract
- 6. This will create a folder called javadoc; open that folder, right-click on index.html, and select Open with->Chrome
- 7. This will open the javadoc for the package edu.blackburn.cs.cs212sp16.coffeeshop
- 8. Open WhiteStar UML and make a new file with a class diagram
- 9. Save this file in the lab project as Documents\Lab05\cafe-lastname-lastname.uml
- 10. Create the class diagram for edu.blackburn.cs.cs212sp16.coffeeshop (focus on methods and relationships)
- 11. Create a new package in your lab project called edu.blackburn.cs.cs212sp16.cafelastnamelastname (no punctuation or separators)
- 12. Add the .jar file from Documents\Lab05 to your project (ask for assistance)
- 13. Create a Runner class
- 14. Import edu.blackburn.cs.cs212sp16.coffeeshop.\*
- 15. In Runner, create a main() method and create a Customer instance, the correct Measurement subclass instance, and a Mixer subclass instance, compile/run/evaluate
- 16. In the same package, create a subclass of Drink called Coffee
- 17. In Runner, create a Coffee instance and add the Customer object and the Mixer object
- 18. Use one statement to get the Measurement attribute out of the Coffee instance
- 19. Using ==, not .equals(), compare the Measurement subclass instance of the Mixer subclass instance that you added to your Coffee instance to the Measurement attribute from Step18
- 20. What happened? Why?
- 21. For your lab project, Pull from Upstream/Add/Commit/Push to Upstream