Tutorial 2

These questions refer to the lectures presented in week 2 of Object Oriented Programming with Java. They will be covered during the tutorial during week 3.

Data Abstraction and Encapsulation

1. What is the difference between the Object Oriented Paradigm and an Object Oriented Language?

2. List five more object oriented languages.

3. What do objects specify?

4. What are two possible relationships between objects?

5. What is information hiding?

6. What does it mean to inherit traits from more abstract objects?

7. What is data abstraction?

8. What are two advantages of Data Abstraction?

9. What is an abstract data type?

10. How do you define an abstract data type in C?

11. How do you define an abstract data type in C++?

12. What are three levels of information hiding in C++?

13. What is a constructor function?

14. What is a destructor function in C++?

15. Why don't you need a destructor function in Java?

16. What is the difference between method definition in C++ and Java?

17. What is a generic class?

18. How do you declare a generic class in C++?

19. How is information encapsulated in C?

20. How is information encapsulated in C++?

21. How do you encapsulated names in Ruby?

22. How do you encapsulate names in Java?

Git and eGit

23. What is SCM?

24. Why does one use SCM?

25. What is the difference between SCM and backup?

26. How does Git support SCM?

27. How do you create a new Git repository?

28. What two commands do you use to put a modified file in a Git repository?

29. What Git command do you use to find a version in a Git repository?

30. What command do you use to retrieve a version from a Git repository?

31. How does Git support backup?

32. Where does a remote repository reside?

33. How is Git different from other SCM systems?

34. What Git command will link a local repository to a remote repository?

35. How do you put a new version in a remote repository?

36. How do you retrieve a new version from a remote repository?

37. Which menu in Eclipse lets you work with Git?

38. How do you set up a local repository in Eclipse?

39. How do you do git add in Eclipse?

40. How do you do git commit in Eclipse?

41. How do you set up a remote repository from Eclipse?

42. How do you clone a remote repository from Eclipse?

Java Input and Output on the Console

43. What is system.out?

44. What are three Java console output commands?

45. How do you build a string to print out in Java?

46. What is a Scanner?

47. How does it use System.in?

48. How can you tell when you are out of input when you are using a Scanner?

49. What are the two steps in running a Java program?

50. What is a .jar file?

51. How do you specify which main to run when building a jar file in Java?

52. Why do you select only the src directories when compiling a TDD developed program?

53. What command runs a jar file?