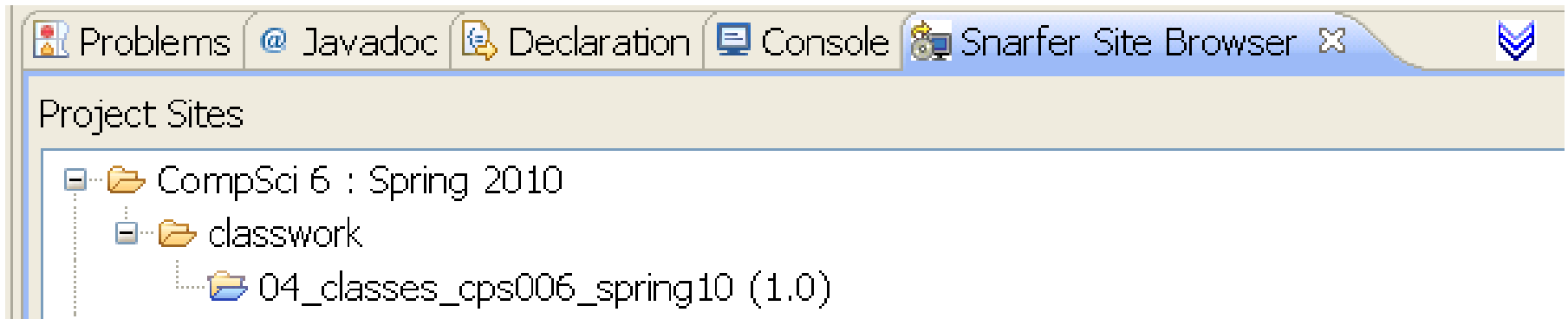


CompSci 6

Programming Design and Analysis



January 26, 2010

Prof. Rodger

Announcements

- Read for next time Chap. 4.4-4.5, Chap 5
- Assignment 2 due next time
- Reading Quiz for next time

Top 10 list for surviving in CompSci 6

- 10. Read the Book
- 9. Keep Randy's Pizza number handy
- 8. Learn how to spell Rodger
- 7. Ask questions
- 6. Keep working until it is correct

Top 10 list (cont)

- 5. Do the reading quizzes
- 4. Visit your professor, TA and/or UTA
- 3. Read the CompSci 6 Bulletin Board
- 2. Seek help when stuck (1 hour rule)!
- 1. Start programming assignments early!

Parts of a Class

- State
 - Data
- Constructors
 - Initialize state when object is created
- Accessor methods
 - Accessing data
- Mutator methods
 - Modify data – change the state

Class Example

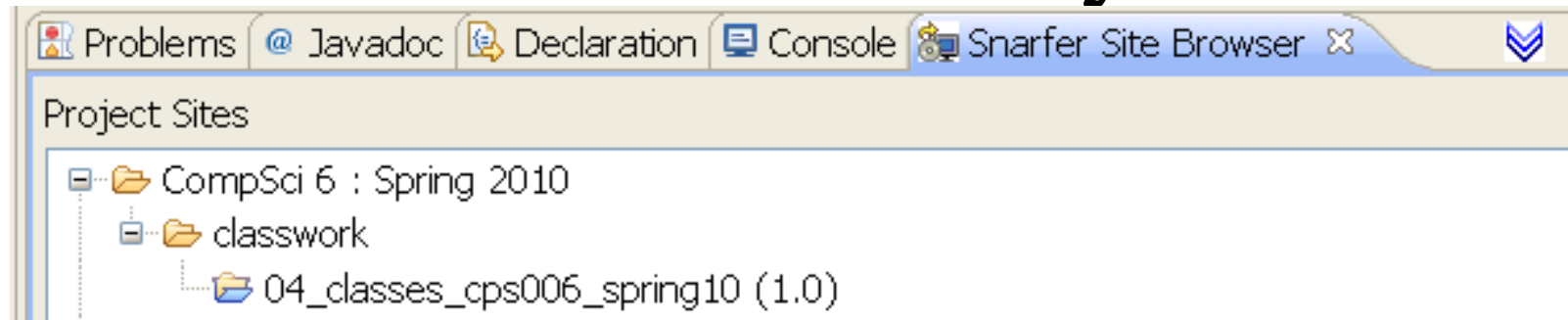
- Chicken class – `Chicken.java`
 - Defines state and behavior of Chicken
- Farm class – `Farm.java`
 - Creates Chickens with “new”
 - Invokes the Chicken constructor
 - Calls chicken methods on Chickens to access or change state

What happens here?

What is a memory heap?

```
Chicken x, y;  
Chicken z = new Chicken(1.0,  
    2.1, "baby");  
x = new Chicken(10.3, 8.1, "ed");  
y = new Chicken(6.2, 6.3, "mo");  
Chicken temp = x;  
x = y;  
y = temp;  
z = x;
```

Classwork 4 Today



- PART 1: “Snarf” a project
 - Java project we have started for you
 - Run a Java program
 - Modify the Chicken class
- Part 2: APT: CountAppearances
 - Add as a class to your project, run on APT page
- Submit project (don't forget README)
- Save your work on your Duke account