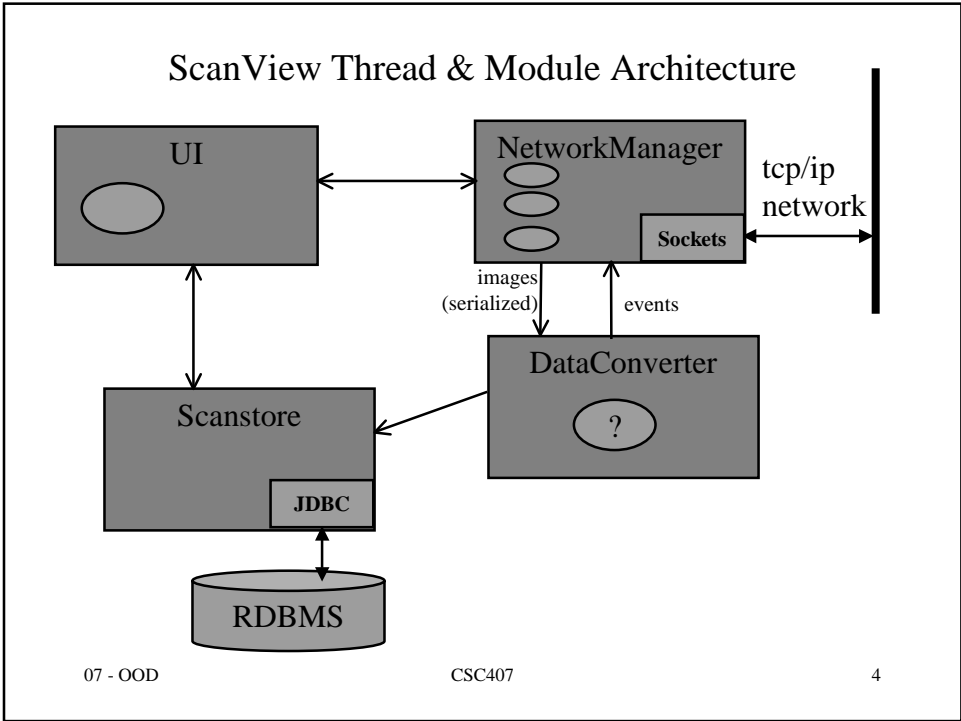
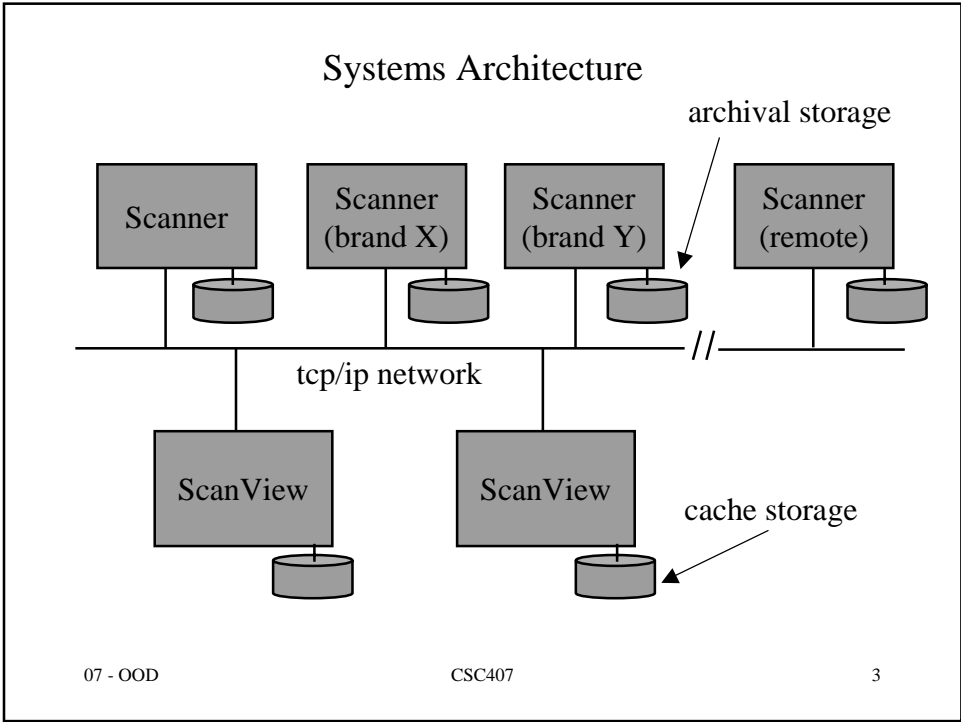


## Assignment 2

## Background

- You are a designer/programmer working on the DataConverter sub-system of the ScanView workstation.
- ScanView is a workstation used by medical professionals to view images from a large variety of medical scanning devices throughout a hospital (and even potentially across hospital sites).
- The various scanner systems store and archive the image data in proprietary formats and using their own storage systems (often optical).
- ScanView is used to grab the scans from these devices across a network, convert them into a standardized format, cache them in a local database, and allow medical professionals to view the images and manipulate the views quickly (e.g., zoom, rotate, transpose, ...)



## What You Have To Do

- Design the interface that NetworkManager uses to invoke DataConverter
  - NetworkManager is by no means fully designed at this point either.
  - Issue: multiple network manager threads have the potential to invoke DataConverter.
  - May be one class, may be multiple classes, however you choose.
  - Must be super flexible wrt number of fields, datatypes, ...
- Implement DataConverter
  - must use dynamic loading of classes that know how to convert images from all sorts of vendor scanner models.
- Provide a test scaffold implementation for Scanstore that just writes everything it gets to a text file.

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## How To Do It

- Start with an OOA of the concepts relevant to DataConverter (UML + text)
  - will be quite small
  - will guide you in suitable choice of classes
- Design DataConverter (UML + diagrams + text)
- Implement DataConverter and required test scaffolding in Java. (no javadoc requirement this time around)
- Test (hand in a document describing how you tested and the results)

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