COURSE SUMMARY

CS 130

Creative Software Architectures for Collaborative Projects

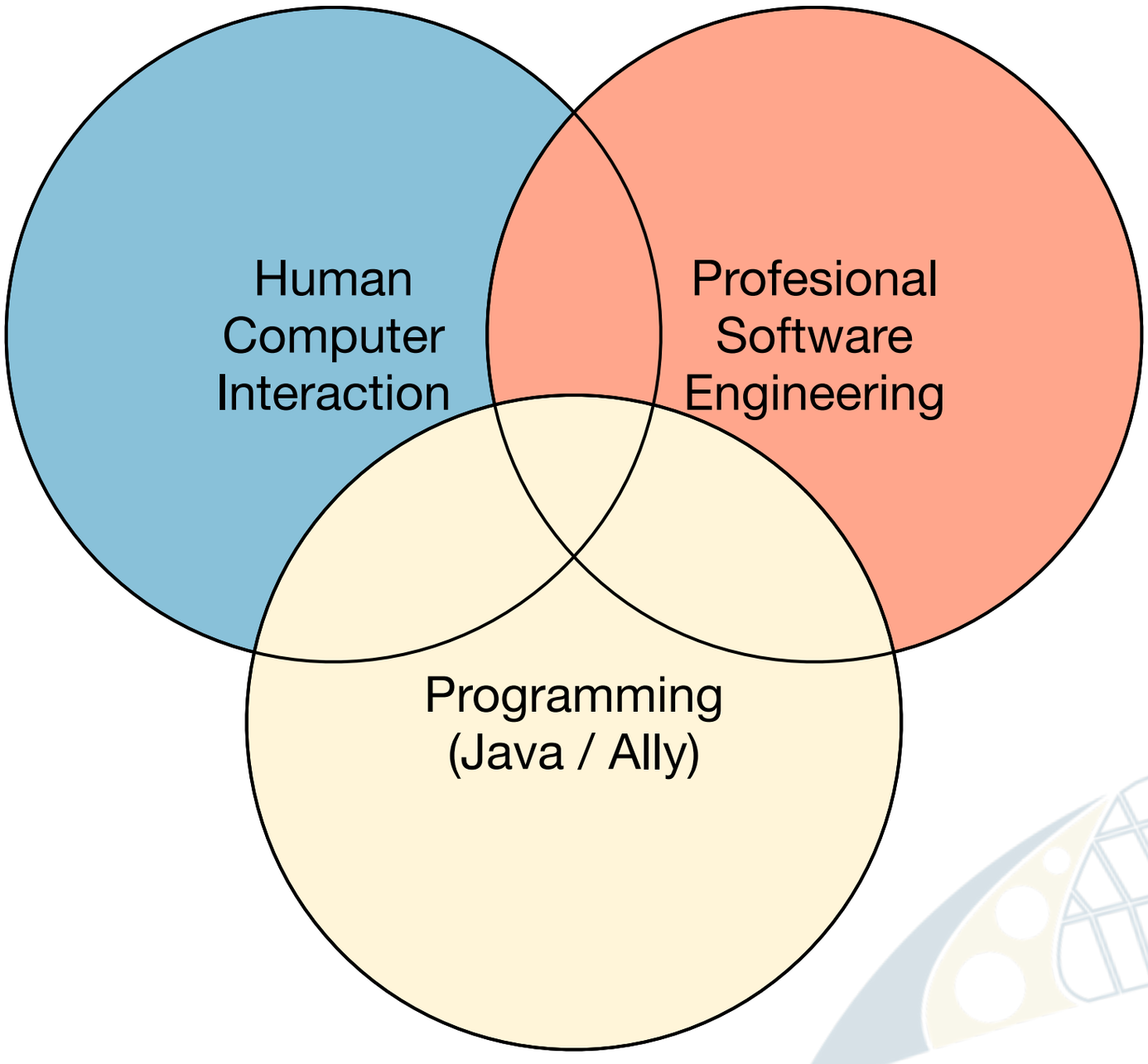
Prof. Donald J. Patterson

COURSE SUMMARY

CREATIVE SOFTWARE ARCHITECTURES FOR COLLABORATIVE PROJECTS

COURSE SUMMARY

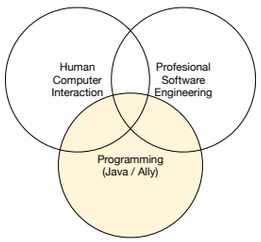
THIS COURSE TOUCHED ON THREE DOMAINS

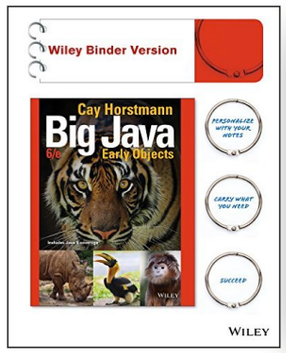


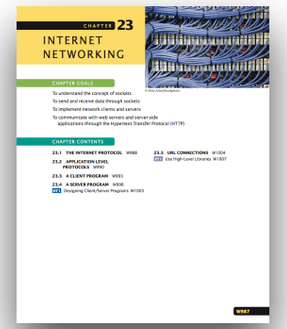
COURSE SUMMARY

IT'S BEEN A PACKED 15 WEEKS!

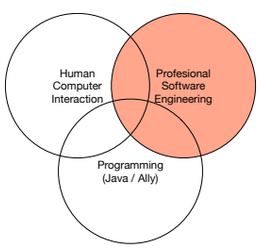
- We worked from two textbooks
  - Big Java

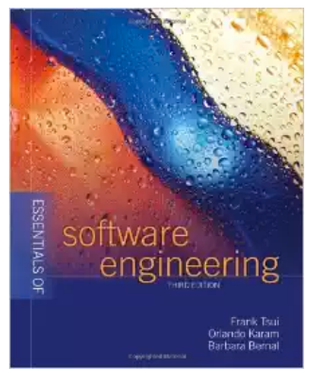






  - Ch 23 Internetworking
  - Software Engineering
    - Ch 1 Writing a Program
    - Ch 2 Building a System
    - Ch 3 Engineering Software
    - Ch 4 Software Process Models - Waterfall
    - Ch 5 Emerging Process Models - Agile





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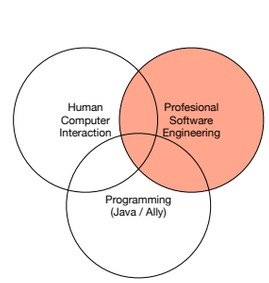
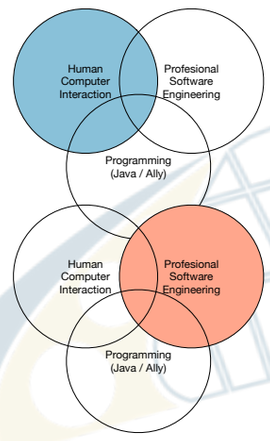
- Custom Topics
  - DNS
  - mtr, dig, host, wireshark
- OSI Model of the network
- TCP packet layout
- IP packet layout
- Contextual Inquiry - Design Process
- Source Control Management





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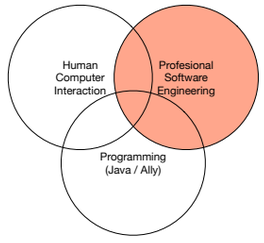
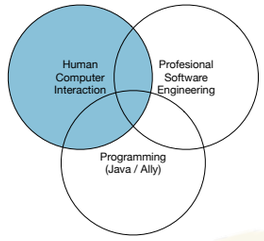
- Custom Topics
  - Github
  - Continuous Integration
  - Code Review
  - Paper Prototyping
  - Pop - almost paper prototyping
  - Brainstorming





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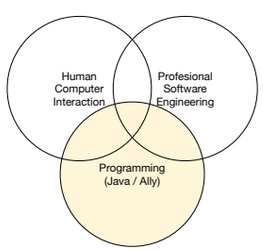
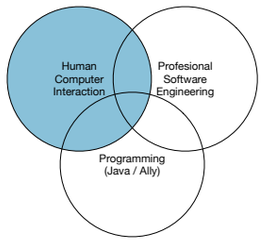
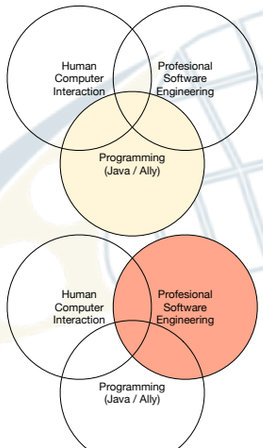
- Custom Topics
  - XML
  - JSON
  - Bootstrap
  - Responsive Websites
  - Basic Web Architecture
    - Browser, Webserver, Database
    - HTML/CSS/Javascript, php, mysql
  - Selenium







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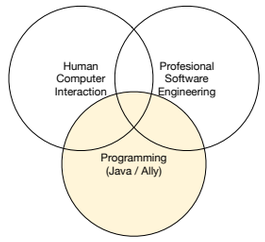
- Custom Topics
  - jQuery



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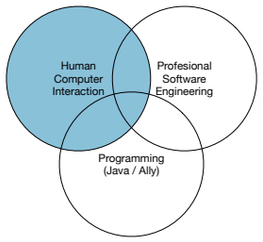
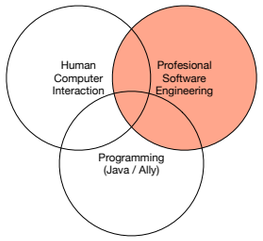
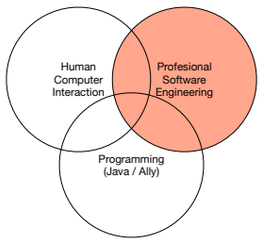
- Non Textbook Readings
  - How do you design?



- Lean Start-Up



- Mythical Man Month



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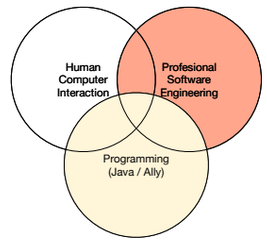
- Practical Skills
  - Ticketing
    - Trello
  - Agile Process
    - Team Meetings
- Pull Requests



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- Faith and Learning
  - Global Food Waste Scandal Video
  - In-class prayers
  - Connections between how our approach to work can be motivated by a relationship to Christ

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- Field Trips
  - Pinger
  - SB Foodbank
- Professional Presentations
  - ProCore
    - Ed/Mike

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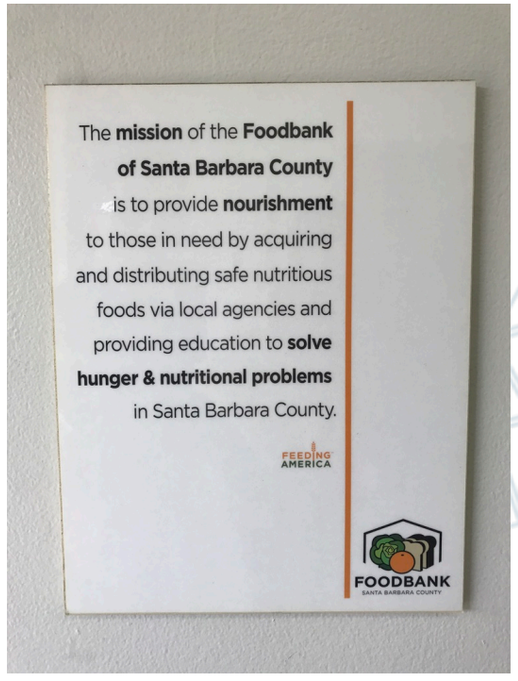

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- Assignments
  - 26 participation grades
  - 11 Online Homework
  - 1 stand-alone programming assignment
  - Contextual Inquiry
  - Contextual Inquiry Presentation
  - Four rounds of software development
    - PR 1-4
  - Retrospective discussion

COURSE SUMMARY

IT'S BEEN A PACKED 15 WEEKS!

- As an instructor I learned
  - More about Westmont CS students
  - Santa Barbara Food Bank Infrastructure
  - Continuous Integration Systems
  - What I like and don't like about software engineering
  - What motivates you all as learners

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CONGRATULATIONS!

- It is an honor and privilege to
  - be able to teach
  - be able to teach a subject that I love
  - in this place
  - to you

WESTMONT INSPIRED
COMPUTING LAB