Paper Types

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http://www.cs.ubc.ca/~tmm/courses/547-17F
Paper Types
Paper types

• each has different contributions, validation methods, structure
  – design studies
  – technique/algorithm
  – evaluation
  – model/taxonomy
  – system

http://ieeewis.org/year/2017/info/call-participation/infovis-paper-types
Paper types: Validation

• design studies
  – qualitative discussion of result images/videos
  – abstraction & idiom validation: case studies, field studies, design justification
• technique/algorithm
  • qualitative discussion of result images/videos
  – algorithm validation for algorithm papers: computational benchmarks
  – idiom validation for technique papers: controlled experiments
• evaluation
  – (controlled experiment as primary contribution)
• theory/model/taxonomy
  – show power: descriptive, generative, evaluative, (predictive)
• system
  – show power for developer using system
Paper structures

• typical research paper vs expectations for this course final report
  – more on implementation
  – novel research contribution not required

http://www.cs.ubc.ca/~tmm/courses/547-17/projectdesc.html#outlines
Reading visualization papers

• one strategy: multiple passes
  – title
  – abstract, authors/affiliation
  – flip through, glance at figures, notice structure from section titles
  – skim intro, results/discussion (maybe conclusion)
  – fast read to get big ideas
    • if you don’t get something, just keep going
  – second pass to work through details
    • later parts may cast light on earlier parts for badly structured papers
  – third pass to dig deep
    • if it’s highly relevant, or you’re presenting it to class

• literature search
  – decide when to stop reading: is this relevant to my current concerns?
Literature search

• this course: I will give you seed papers during our 1 on 1 meetings
• forwards vs backwards search
  – Google Scholar forward citations!
  – only a subset of forwards & backwards citations will be what you need
• building up landscape
  – authors/affiliations will have more signal as you develop expertise