Fall 2015 CS548
Assignment 1 v1

We have established the basis of fault-tolerant agreement and now you are tasked to identify recent related work. Whereas the foundation for fault models and agreement algorithms was established in the early to late 80s, much interest has surfaced again in the last 10 years. So make the recent research your priority. You will also notice that the application domains of these recent papers have shifted to more contemporary application domains.

You are tasked to do the following:
1) Identify recent work dealing with malicious act by using agreement. Of specific interest are of course *value faults*, e.g., Byzantine and symmetric faults.
2) For the papers you find, identify exactly what fault models they assume. Use the 5-fault model of Azadmanesh as a reference point.
3) Investigate the computational and communication overhead the approaches will have and how they scale.
4) Summarize your findings in a brief report.

Assignment 1 report:

Using the IEEE conference format template, the report should indicate the following:
1) *An Abstract* describing the outline of the problems and findings.
2) A <u>Section</u> titled *Related Work,* which offers one <u>subsection</u> for each paper you focused on, summarizing your assessment of the tasks above.
3) A <u>Section</u> titled *Lessons Learned* in which you describe anything you want to share about the experience of this assignment, e.g., what were your greatest hurtles to overcome, where did you spent the most time, what was the most difficult issue for you, what information or background did you lacked that could have helped you in conducting the work etc...
4) In the write-up, which should not exceed 3 pages, make sure that the findings are more important than the presentation! Focus on the "beef" and less on the "packaging".
5) Use IEEE referencing standards and make sure your references work!!! Also make sure to properly reference any material or ideas you talk about in your report, i.e., your paper should comply with our contract on citations!

To be determined:

1) Individual vs. group project
2) Due dates