

Project Proposal

Due: Wed., May-14-2025, 11:59pm – Gradescope entry code: R57ZN7

Please submit a half-page project proposal (at most 1 page) by May 14th on Gradescope. The project proposal should

- State the team member(s). **Students can work on a project by themselves or as a team of 2 students.**
- Identify a consensus protocol supporting a blockchain system currently in-use, and briefly describe the steps that will be taken to analyze the selected protocol.
- Specify what aspects of the protocol will be covered by the analysis. Some important aspects to consider are (i) the protocol description, (ii) its security properties (e.g., safety and liveness as a bare minimum, accountable safety where possible), and (iii) its performance metrics (e.g., communication complexity, level of decentralization).
- List which research papers, blog posts or other resources will be used for the analysis (can later be changed as needed).

Some suggested blockchain systems to analyze are listed as follows: Aptos, Avalanche, Babylon, Cardano, Ethereum, Mysten and Solana. Students are free to analyze other systems, but must consult with the instructor/TA beforehand. Reading material on the protocols selected by the students will be shared upon request.