

CAP4630.01 Assignment 4 Due 10/15/19

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1. Given the following game tree, please apply *minimax* algorithm with *alpha-beta* pruning to mark what branches can be pruned from the game tree, cross out those leaf nodes that will not be evaluated, and cross out those internal nodes that their scores will not be concluded.

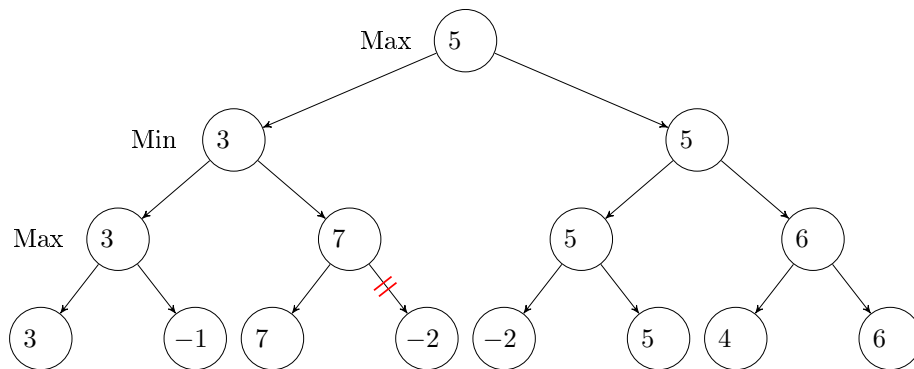


Figure 1: Minimax tree with $\alpha - \beta$ pruning

The fourth node from the left (-2) does not need to be calculated because $7 > 3$ so that branch should never be reached.