

Michigan Math Club

Thursday at 4pm in the Commons

Free Pizza and Pop



A Voting Theory Approach to Golf Scoring

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(Mathematical Reviews)

Abstract for 26 March



The Professional Golfer's Association (PGA) is the only professional sports league in the U.S. that changes the method of scoring depending on the event. Even without including match play or team play, PGA tournaments can be scored under stroke play or the modified Stableford scoring system; these two methods of scoring are equivalent to using voting vectors to tally an election. This equivalence is discussed and data from the 2004 Masters and International Tournaments are used to examine the effect of changing the scoring method on the results of the tournament.

With as few as 3 candidates, elementary linear algebra and convexity can be used to show that changing how votes are tallied by a voting vector can result in up to 7 different election outcomes (ranking all 3 candidates and including ties) even if all of the voters do not change the way they vote! Sometimes, regardless of the voting vector the same outcome would have occurred, as in the 1992 US Presidential election. I relate this to the question: Can we design a scoring vector to defeat Tiger Woods? And answer it, retrospectively, for his record-breaking 1997 Masters performance.