

Cricket Pitch is a combinatorial game whose result is determined by who makes the last move. It was created in 2010 by Nowakowski and Ottaway, as an example of a new class of games. They solved the normal play version – where the last player to move wins – and left the misere version – where the last player to move loses – as an open problem. I will present an overview of the solution to the misere version originating from a games workshop held at Dalhousie over the summer. The main future goal is to be able to analyze disjunctive sums of misere cricket pitch games. A disjunctive sum of games is a set of games in which each player can choose to play a move in any one of the games in the set on each turn. The full analysis would involve finding an algebra that allows us to quantify the difference between positions. The new class has the property that any position that a player can reach with 2 or more consecutive moves can be reached by that same player with just one move. These are option closed. Finding an algebra that quantifies the difference between misere option closed games is an important open problem and a solution to multi-board cricket pitch could help to better understand option closed games in general.