

Fool's Gold

Can NFL Statistics Spot Overrated Teams and Predict Playoff Upsets?

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Introduction

An NFL team's record does not always tell the whole story. Close-game results, turnovers, schedule strength, and other factors can cause a team's win total to differ from its underlying performance.

This study asks:

1. Can regular-season statistics identify teams with potentially misleading records?
2. Can those statistics help identify playoff upset winners?

Methods

1. Collect Data → 2. Linear Regression → 3. Playoff Upset Analysis

320 team-seasons (2016–2025)

Point differential • efficiency • turnovers • close games • SOS

Actual Wins – Expected Wins = Over/Underperformance

Results

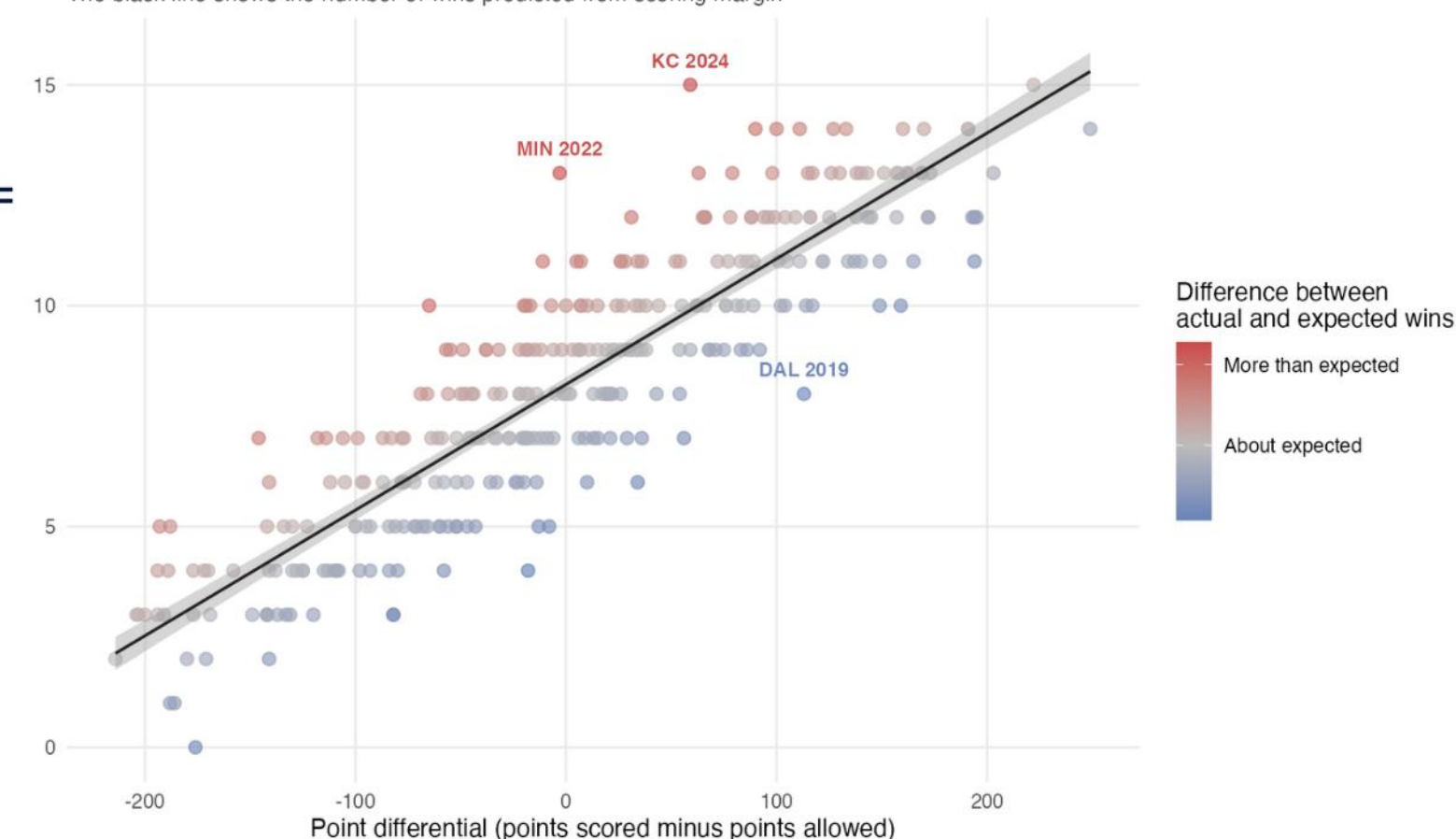
≈80% of the variation in team wins was explained by point differential.

$R^2 = 0.797$ | In-sample MAE = 1.14 wins

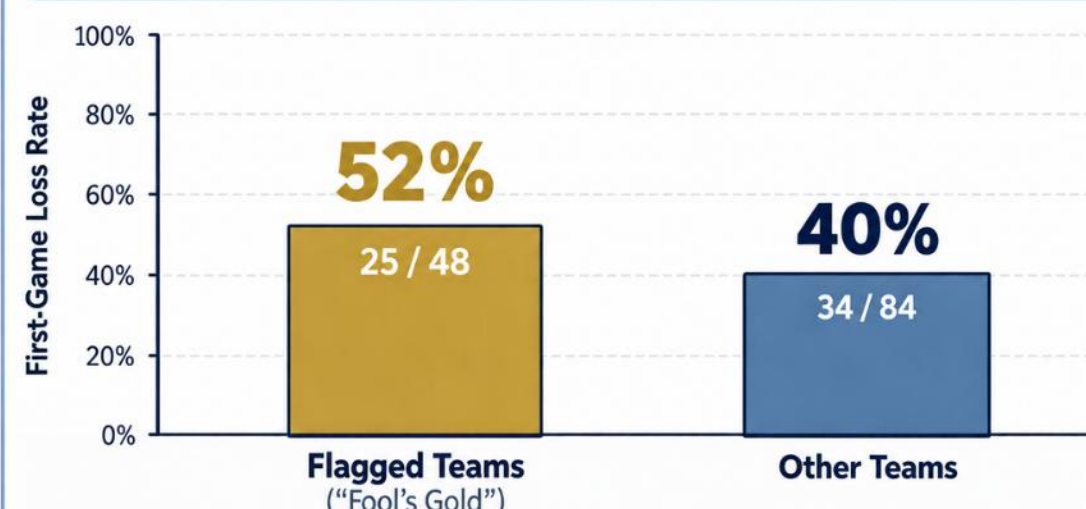
Figure 1. Teams with better point differentials generally won more games.

Point Differential Gives a Strong Picture of Team Quality

The black line shows the number of wins predicted from scoring margin



Did “Fool’s Gold” Teams Lose Earlier?



12 percentage-point difference, but not statistically significant ($p = 0.134$).

Discussion

Point differential captured team quality better than win-loss record alone. However, the relationship between regular-season overperformance and playoff failure was much weaker, suggesting that single-game playoff outcomes are harder to predict.

Conclusion, Limitations, & Future Work

Point differential was a strong indicator of regular-season team quality, but “Fool's Gold” status did not significantly predict early playoff elimination. Regular-season statistics were much less effective at predicting individual playoff upsets.

Only 10 seasons were analyzed, thresholds were custom-defined, and the same seasons were used to fit and evaluate the models. Future work should test models on unseen seasons and incorporate EPA, success rate, and more detailed injury data.

Examples

2024 Chiefs
15 actual wins | 9.9 expected
+5.1 above expected

2022 Vikings
13 actual | 8.1 expected
+4.9 above expected

2019 Cowboys
8 actual | 11.4 expected
–3.4 below expected

38% of playoff games were won by underdogs
46 of 122 games.

What predicted an upset?

- Offensive production was the primary useful predictor.
- Defense, turnovers, close-game performance, strength of schedule, and overperformance did not provide significant additional insight once offense was accounted for.