# Interesting NHL Team Stats Insights

## 1. Efficiency Metrics

1.1 Goals Scored Efficiency:  
- Calculate the team's goals for per game (goals\_for\_per\_game) compared to the league average.  
- Identify teams with the highest scoring efficiency or lowest defensive efficiency using goals\_against\_per\_game.  
  
1.2 Special Teams Performance:  
- Combine power\_play\_pct and penalty\_kill\_pct into a Special Teams Index (STI):  
 STI = power\_play\_pct + penalty\_kill\_pct.  
- Highlight teams with the highest or lowest STI.

## 2. Win Quality

2.1 Win Composition:  
- Compare wins\_in\_regulation to total wins to find teams that dominate in regulation vs. relying on shootouts or overtime.  
- Calculate the proportion of overtime/shootout wins:  
 OT/SO Wins % = (ot\_losses + wins\_in\_shootout) / wins \* 100.  
  
2.2 Point Percentage:  
- Use point\_pct to rank teams by consistency in accumulating points regardless of the number of games played.

## 3. Faceoff Dominance

3.1 Faceoff Impact:  
- Correlate faceoff\_win\_pct with goals\_for\_per\_game or goals\_against\_per\_game to see if better faceoff teams tend to have better overall performance.  
- Highlight teams with exceptional faceoff performance (>55%).

## 4. Defensive Trends

4.1 Defense vs. Shots:  
- Compare shots\_against\_per\_game to goals\_against\_per\_game to find teams with strong goaltending performance or porous defenses.  
- Identify teams that face the fewest shots per game and allow the fewest goals.

## 5. Power Play and Penalty Kill Analysis

5.1 Net Special Teams:  
- Use power\_play\_net\_pct and penalty\_kill\_net\_pct to identify teams excelling in net special teams performance (adjusted for shorthanded or power-play goals against).  
  
5.2 Special Teams Outliers:  
- Find teams with a high power\_play\_pct but a poor penalty\_kill\_pct, or vice versa.

## 6. Game Type Trends

6.1 Game Type Performance:  
- Compare performance metrics (wins, losses, point\_pct) across different game\_type categories (e.g., regular season vs. playoffs).

## 7. Historical Trends

7.1 Years Since Last Active:  
- Find teams with significant gaps in activity (years\_since\_last\_active) and compare their historical performance to current teams.  
  
7.2 Performance Over Time:  
- Track how goals\_for\_per\_game, wins, or point\_pct change over start\_year to identify teams improving or declining over time.

## 8. High-Performance Insights

8.1 Dominant Seasons:  
- Identify teams with seasons where:  
 - goals\_for\_per\_game exceeds a threshold (e.g., 4.0).  
 - point\_pct exceeds 0.75 (indicating winning 75% of available points).  
  
8.2 Low-Scoring Trends:  
- Highlight teams with the lowest goals\_against\_per\_game and their correlation to success metrics like wins or point\_pct.

## 9. Team Comparison

9.1 Win Efficiency:  
- Compare wins\_in\_regulation and wins\_in\_shootout to see which teams rely more on regulation wins vs. luck in shootouts.  
  
9.2 Scoring vs. Defense Balance:  
- Find teams with a balanced performance by comparing goals\_for\_per\_game and goals\_against\_per\_game.

## 10. Fun Facts or Anomalies

10.1 Best and Worst Seasons:  
- Highlight the highest-scoring seasons (by goals\_for\_per\_game) or best defensive seasons (goals\_against\_per\_game).  
  
10.2 Odd Trends:  
- Find teams with a high number of ties (historical data only).  
- Identify teams with a high number of wins\_in\_shootout but low total wins.