

7. This graph plots the number of wins in the 2006 and 2007 seasons for a sample of professional football teams.

1st find points

2nd put in 3 groups

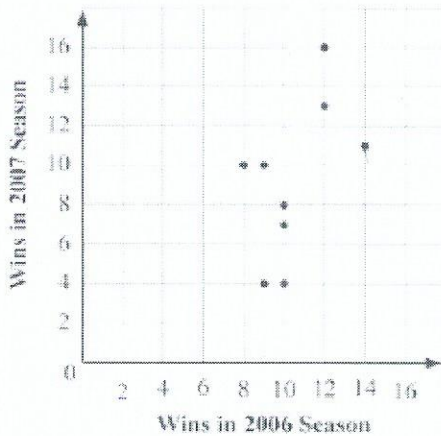
3rd find med-med points

$(9, 10)$
 $(9, 4)$
 $(9, 10)$

 $(10, 4)$
 $(10, 7)$
 $(10, 8)$

 $(12, 13)$
 $(12, 16)$
 $(14, 11)$

Team Wins, 2006 and 2007



4th find equation from first and last group

$(9, 10)$ $(12, 13)$

$y = mx + b$

$m = \frac{13 - 10}{12 - 9} = \frac{3}{3} = 1$

find b, by plugging in

$10 = 1(9) + b$

so

$y = 1(x) + 1$

$1 = b$

Move down by $\frac{1}{3}$

What is the equation of the median-median line for these data?

A. $y = x + 1$

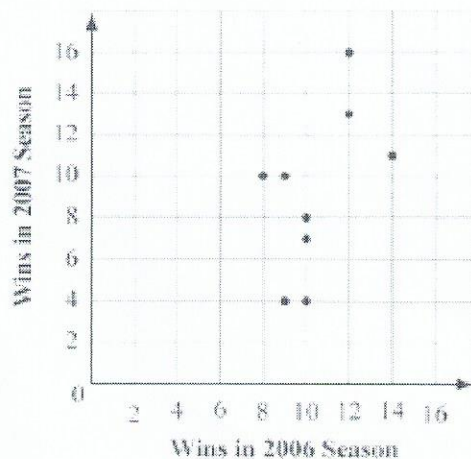
B. $y = x - \frac{1}{3}$

C. $y = 4x - 32\frac{1}{3}$

D. $y = 4x - 32$

8. This graph plots the number of wins in the 2006 and 2007 seasons for a sample of professional football teams.

Team Wins, 2006 and 2007



The linear regression model for these data is $y = 1.10x - 2.29$. Based on this model, what is the predicted number of 2007 wins for a team that won 5 games in 2006?

- A. 3
- B. 4
- C. 5
- D. 6

Use given equation to find answer ; $x = 5$

$y = 1.10(5) - 2.29$

$y = 3.21$