

MATCH GROUP RATIOS

The CBA data is for CBA NM 2000-2013, PRO, PBB, HVY and UNR, group averages.
The 5 shot issue 100 yd data is from Ric Bowman, Military matches from 1006-2015 =10 years.

The numbers are ratios of group size averages, 2ND/1ST = second place average group size/first place average group size.

	5 SHOT	CBA	CBA	CBA	CBA
	ISSUE	5 SHOT	10 SHOT	5 SHOT	10 SHOT
	100 YD	100 YD	100 YD	200 YD	200 YD
2ND/1ST	1.16	1.20	1.21	1.19	1.21
3RD/1ST	1.25	1.33	1.36	1.34	1.36
4TH/1ST	1.34	1.47	1.50	1.47	1.46
5TH/1ST	1.55	1.55	1.55	1.52	1.51

The military data has the same kind of numbers as the CBA data. The differences might be due to the smaller sample size, 10 years vs 14 years, or the number of classes, Mil = 1, CBA = PRO, PBB, HVY, UNR = 4.

The CBA PRO ratios were extracted and the table modified as shown below:

	5 SHOT	CBA PRO	CBA PRO	CBA PRO	CBA PRO
	ISSUE	5 SHOT	10 SHOT	5 SHOT	10 SHOT
	100 YD	100 YD	100 YD	200 YD	200 YD
2ND/1ST	1.16	1.19	1.20	1.17	1.18
3RD/1ST	1.25	1.33	1.33	1.34	1.34
4TH/1ST	1.34	1.46	1.43	1.45	1.40
5TH/1ST	1.55	1.55	1.47	1.52	1.39

Something is going on here, these ratios are remarkably constant, and suggest to me that there's something here that explains at least part of group size.

The second place shooter shoots groups averaging ~20% bigger than the first place shooter.

The second place golfer doesn't average ~20% more strokes than the first place golfer, does he?

The second place baseball team doesn't average ~20% less runs than the first place, does it?

Football?