

Z-score Fun Facts
& Practice

1) Big S and Little s conversion:

$$\text{Big S} = \text{Little s} * \sqrt{\frac{N-1}{N}}$$

$$\text{Little s} = \text{Big S} * \sqrt{\frac{N}{N-1}}$$

2) Z score * S + mean = original score

Some typical problems:

1) An instructor told her class she would drop the lowest test score as measured by z scores. Irma's scores, means and standard deviations are given below. Which test should she drop? $\# 2$

	Irma's Score	Mean	SD
Test1	74	77	6
Test2	81	91	5
Test3	68	70	6
Test4	90	63	2

B) What would be your best guess at the Sigma for Test1 across all sections, if 30 people were in Irma's class?

C) Ms. Pickle lost Dill's original test score for test 2. He had a Z score of 1.16 what was his original score?

2) At the current University Disc Golf Course (18), Tony Dee is the champ. On Tony Dee's best day 56 throws were need to complete the round. In the Old Days, Jon Ira was the Champion. In those days the course had 9 holes. Jon Ira's personal best was a round of 28. Representative scores from the two era's are given below. Determine who the true Winthrop Eagle (all-time champion) is?

Today: 74, 69, 63, 58

Old Days: 36, 34, 32, 30