Math 45

Last fall Myra gave her Math 80 students a quiz containing a question from a national statistics exam.
29 students took the quiz. She compared their performance on this question to the performance of the 1470 students included in the national sample. 24 of her students got the item right compared to 1001 of the national sample. Did the Math 80 students do as well as the national sample?

(2) This data comes from a study of the factors that impact birth weight. Here the variable Visit indicates whether a woman visited a physician during the first trimester of her pregnancy. The variable Low_Wt indicates whether a baby was born weighing under 2500 grams. Does visiting a doctor during the early stages of pregnancy seem to be associated with a lower incidence of low weight births?



(3) A study in Sweden looked at impact of playing soccer on the incidence of arthritis of the hip or knee. They gathered information on former elite soccer players, people who played soccer but not at the elite level, and those who never played soccer. Does this study suggest that playing soccer makes someone more likely to have arthritis of the hip or knee?

	Elite	Non-elite	Did not play	Row total
Arthritis	10	9	24	43
No arthritis	61	206	548	815
Column Total	71	215	572	858

(4) This data was collected from 8 Arizona high schools. Are students with parents who smoke more likely to be smokers?

	Student smokes	Student does not smoke
Both parents smoke	400	1380
One parent smokes	416	1823
Neither parent smokes	188	1168

What are the "take aways" from this activity?