CHECKING YOUR PROGRESS: A SELF-TEST

1. Match the nonparametric test with its parametric alternative.

_____Mann–Whitney   **a.** one-way between-subjects ANOVA

_____Kruskal–Wallis   **b.** *t* test for dependent samples

_____Wilcoxon   **c.** *t* test for independent samples

2. Three groups of rats are fed different diets for 4 weeks. Each animal's latency (rounded to the nearest whole second) to leave a lighted platform is recorded, and the results are shown here. Because of the unequal and small sample sizes and the large amount of within-group variability, the one-way ANOVA may not be appropriate. Use the nonparametric alternative to perform an overall test. If the overall test is significant, do all pairwise comparisons, and tell what your conclusions mean in the context of the problem.

Group 1	Group 2	Group 3
30	43	13
25	33	12
23	30	10
16	28	8
12	25	7
10	15	6
8	14	5
5	10	

3. Fifteen students, rated as extreme introverts on the Myers–Briggs Type Indicator, are given 5 hours of assertiveness training. The MBTI is again administered. Did assertiveness training affect the introversion score on the MBTI?

Student	Score Before Training	Score After Training
1	27	27
2	33	27
3	35	27
4	45	35
5	47	43
6	31	35
7	35	37
8	31	25
9	29	15
10	27	11
11	35	31
12	43	45
13	39	27
14	35	37
15	31	25