MTH 316 NONPARAMETRIC STATISTICS
Homework #1 (Due Thursday, September 05)

The following exercises are from Chapter 1, pages 20–21.

1. Problem 1.1
2. Problem 1.2
3. Problem 1.4
4. Problem 1.5
5. Problem 1.6

6. Please refer to the manatee hypothesis testing example given in class. Let $X =$ birth weight of manatee and μ denote the population mean birth weight of manatees.
a. Construct a 95% confidence interval (CI) for μ. Please show your work.
b. What assumptions must hold in order to reach valid conclusions based on the CI?
c. Is 60 pounds a likely value of μ? Please explain.
d. Is 61 pounds a likely value of μ? Please explain.