BASIC BIOSTAT (TEXT; 2008)

12/6/07 B. GERSTMAN

INFERENCE: HOW TO KNOW WHAT TO USE

- RESPONSE (OUTCOME) VARIABLE
  - QUANTITATIVE
    - ONE SAMPLE OR PAIRED SAMPLES
      - σ KNOWN → CH 9 & CH 10 (z PROCEDURES)
      - σ ESTIMATED BY s → CH 11 (t PROCEDURES)
    - TWO INDEPENDENT SAMPLES → CH 12 (INDEPENDENT t)
    - MULTIPLE INDEPENDENT SAMPLES → CH 13 (ANOVA)
    - LINEAR RELATIONS → CH 14 & CH 15 (CORRELATION & REGRESSION)
  - CATEGORICAL
    - BINARY OUTCOME
      - ONE-SAMPLE OR PAIRED SAMPLES → CH 16 (BINOMIAL OR NORMAL APPROXIMATION)
      - TWO SAMPLES → CH 17 (BINOMIAL "EXACT" OR NORMAL APPROXIMATION)
      - MULTIPLE INDEPENDENT SAMPLES → CH 18 (EXACT OR CHI-SQUARE)
      - CONFOUNDING & INTERACTION → CH 19 (STRATIFIED 2-BY-2 TABLES)
    - MORE THAN 2 CATEGORIES OF OUTCOME → CH 18 (EXACT OR CHI-SQUARE)