# Decision tree for testing means/locations of distributions

How many groups?

- 2 → Paired?
  - N → Normal or transform to normal?
    - N → Rank sum
    - Y → Equal variances?
      - N → Welch's t
      - Y → Two-sample t
  - Y → Normal or transform to normal?
    - N → Sign Signed rank
    - Y → Paired t
- 3+ → Normal or transform to normal?
  - N → Kruskal-Wallis
  - Y → ANOVA