

**TYPOS IN DEVORE & BERK: MODERN MATHEMATICAL
STATISTICS WITH APPLICATION, 2ND EDITION, SPRINGER**

1. SECTION 6.4: DISTRIBUTIONS BASED ON A NORMAL RANDOM SAMPLE, PG. 315-325

- Pg. 315: The formula for the density of the gamma distribution with ν degrees of freedom should be

$$f(x) = \begin{cases} \frac{1}{2^{\nu/2}\Gamma(\nu/2)} x^{\nu/2-1} \exp(-x/2) & x > 0 \\ 0 & x \leq 0 \end{cases}$$

Note that the in the definition of the gamma distribution in Section 4.4 the formula for the gamma density in equation (4.10) is correct.

- Pg. 321: The formula for the density of the T distribution with ν degrees of freedom should read

$$f(t) = \frac{1}{\sqrt{\pi\nu}} \frac{\Gamma((\nu+1)/2)}{\Gamma(\nu/2)} \frac{1}{(1+t^2/\nu)^{(\nu+1)/2}}, \quad -\infty < t < \infty,$$

(so the $\sqrt{}$ in the first fraction should cover both π and ν).

- Formula (6.14) on pg. 323: The formula should read

$$F_{m-1, n-1} = \frac{\frac{(m-1)S_1^2/\sigma_1^2}{m-1}}{\frac{(n-1)S_2^2/\sigma_2^2}{n-1}} = \frac{S_1^2/\sigma_1^2}{S_2^2/\sigma_2^2},$$

(the second term has S_1^2 in both nominator and denominator).