

CORRECTION TO
“JACKKNIFING U-STATISTICS”

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In the above named article (*Ann. Math. Statist.* **40** 2076–2100) the following corrections should be made.

- (1) On page 2095, equation (66) needs a right parenthesis at the end.
- (2) On page 2099, on line 8, redefine

Let

$$\begin{aligned} f^{*(7)}(u_{\alpha_1}, u_{\alpha_2}; v_{\beta_1}, v_{\beta_2}) &= [(\mu + a(u_{\alpha_1}) + b(v_{\beta_1}) + c(u_{\alpha_1}, v_{\beta_1}) + e(u_{\alpha_1}, v_{\beta_1})) \cdot \\ &\quad \cdot (\mu + a(u_{\alpha_2}) + b(v_{\beta_2}) + c(u_{\alpha_2}, v_{\beta_2}) + e(u_{\alpha_2}, v_{\beta_2})) \cdot \\ &\quad + (\mu + a(u_{\alpha_1}) + b(v_{\beta_2}) + c(u_{\alpha_1}, v_{\beta_2}) + e(u_{\alpha_1}, v_{\beta_2})) \cdot \\ &\quad \cdot (\mu + a(u_{\alpha_2}) + b(v_{\beta_1}) + c(u_{\alpha_2}, v_{\beta_1}) + e(u_{\alpha_2}, v_{\beta_1})) \cdot]/2 \\ &= (Y_{\alpha_1\beta_1} \cdot Y_{\alpha_2\beta_2} + Y_{\alpha_1\beta_2} \cdot Y_{\alpha_2\beta_1})/2 \end{aligned}$$

be a 2×2 kernel with U -statistic,

$$U^{(7)} = 2(I(I-1)J(J-1))^{-1} \sum_{i < l} \sum_{j < k} (Y_{ij} \cdot Y_{lk} + Y_{ik} \cdot Y_{lj}).$$

- (3) Also, on page 2099, delete lines 22 to 30 and replace by

$$\begin{aligned} f_{10}^{*(5)}(u_{\alpha_1}) &= \mu^2 + \sigma_B^2 + \sigma_e^2/K + E\{c(u_{\alpha_1}, v_{\beta_1}) \cdot c(u_{\alpha_2}, v_{\beta_1}) \mid u_{\alpha_1}\} \\ &\quad + E\{b(v_{\beta_1}) \cdot c(u_{\alpha_1}, v_{\beta_1}) \mid u_{\alpha_1}\} \end{aligned}$$

and $f_{01}^{*(5)}(v_{\beta_1}) = b^2(v_{\beta_1}) + \sigma_e^2/K$. But since

$$\begin{aligned} E\{c(u_{\alpha_1}, v_{\beta_1}) \cdot c(u_{\alpha_2}, v_{\beta_1}) \mid u_{\alpha_1}\} &= E\{E\{c(u_{\alpha_1}, v_{\beta_1}) \cdot c(u_{\alpha_2}, v_{\beta_1}) \mid u_{\alpha_1}, v_{\beta_1}\} \mid u_{\alpha_1}\} \\ &= 0, \end{aligned}$$

one sees that $\zeta_{10}^{(5,5)} = \text{Var}[E\{b(v_{\beta_1}) \cdot c(u_{\alpha_1}, v_{\beta_1}) \mid u_{\alpha_1}\}]$.

Note that one can again obtain tests or confidence intervals for the quantity σ_B^2/σ_e^2 .