

SFPE Handbook Errata

The following errata have been identified in the first printing of the *SFPE Handbook of Fire Protection Engineering*. The corrections reproduced here are limited to those with substantial technical implications. Simple misspellings and other typographical errors which would not have an impact on the engineering use of the handbook have not been included. The corrections presented here will be included in the second printing. If readers have identified additional errata, please contact the editor in writing.

p 1-212: Column 1 Line 13 should read:

$$t_{l_0} = \exp [8.13 - 0.5248 (20.9 - \%O_2)]$$

p 1-214: Equation for F'_{l_0} should read:

$$F'_{l_0} = \frac{1}{\exp [8.13 - 0.5248 (20.9 - \%O_2)]}$$

p 1-238 Equation for F'_{l_0} should read:

$$F'_{l_0} = \frac{1}{\exp [8.13 - 0.5248 (20.9 - \%O_2)]}$$

p 1-238: Equation (9) and the summary equations in the lower right hand corner should both read:

$$F'_{l_{cn}} = \frac{1}{\exp [5.396 - 0.023 \times ppm\ HCN]}$$

p 1-93: Equation (6) should read:

$$E_b = \int_0^{4\pi} I_b \cos\theta \, d\Omega$$

p 1-96: Equation (21) should read:

$$\tau_\lambda = \int_0^S \kappa_\lambda(x) \, dx$$

p 1-97: Equation (27) should read:

$$q_\lambda = -\frac{4}{3} \frac{\partial E_{b\lambda}}{\kappa_\lambda \partial S}$$

p 1-105: Nomenclature: h Planck's constant = $6.6256 \times 10^{-34} \text{ J} \cdot \text{s}$

p 1-131: Equation (6) should read:

$$V = \sqrt{\frac{2 p_1}{\rho_1}} \left\{ \frac{\gamma}{\gamma - 1} \left(\frac{p_2}{p_1} \right)^{2/\gamma} \left[1 - \left(\frac{p_2}{p_1} \right)^{(\gamma-1)/\gamma} \right] \right\}^{1/2}$$

p 1-131: Equation (6) should read:

$$V = CA \sqrt{2 \rho_1 p_1} \left\{ \frac{\gamma}{\gamma - 1} \left(\frac{p_2}{p_1} \right)^{2/\gamma} \left[1 - \left(\frac{p_2}{p_1} \right)^{(\gamma-1)/\gamma} \right] \right\}^{1/2}$$

p 1-131: Equation (8) should read:

$$\frac{p_2}{p_1} = \left(\frac{2}{\gamma + 1} \right)^{\gamma(\gamma-1)}$$

p 1-349: Equation 22 should be Equation (30) and should read:

$$\alpha = \frac{(h_r + h_c)}{\lambda}$$

p 1-349 The short table in column 1 beginning with M should be Equation 31 and should read:

$$\alpha = \beta \left(\frac{T_o + T_s}{T_s - T_A} \right)$$

p 1-366: Figure 1-24.7 Y axis label should read: Flame Spread Velocity (cm/s) and the X axis label should read: Initial Bulk Temperature (°C).

p 1-373: Column 1 Line 2 should read: and $D = K/2.3$.

p 2-19: In the symbol definitions above Equation 5, $\sigma =$ should read $\gamma =$

p 2-38: Equation (18) should read:

$$A_v = 1.94 \times 10^{-4} Q_f^{3/5} (h-d) / d^{1/2} m^2$$

p 2-38: Table 2-4.2 Radiation column kW
m² should read: kW/m²

p 3-5: Equation (23) should read:

$$\Delta T_2^* = \left[(t_2^* - t_{2f}^*) / (0.188 + 0.313 r/H) \right]^{4/3}$$

p 3-76: Equation (21) should read:

$$P^3 + \left(\frac{3b}{2a} \right) P^2 + \left(\frac{3c}{a} \right) P = - \left(\frac{3}{a} \right) Y_2 - \left(\frac{3d}{a} \right)$$