



List of Errata

Handbook of Linear Partial Differential Equations for Engineers and Scientists, Chapman & Hall/CRC, 2002 by A. D. Polyanin

Page 503: Right-hand side of the equation before Paragraph 7.3.3-1:

Was: $\dots = -\Phi(r, \varphi, z), \dots$

Correct: $\dots = -\Phi(r, \varphi), \dots$

Page 509: Displayed equation at the fifth line:

Was: $\frac{\partial^2 w}{\partial \xi^2} + \frac{\partial^2 w}{\partial \eta^2} + \dots$

Correct: $\frac{\partial^2 w}{\partial u^2} + \frac{\partial^2 w}{\partial v^2} + \dots$

Page 605: Paragraph 9.2.2-1, 2nd and 3rd solutions:

Was:

$$w(x, t) = [A \sin(\lambda x) + B \cos(\lambda x) + C \sinh(\lambda x) + D \cos(\lambda x)] \sin(\lambda^2 at),$$

$$w(x, t) = [A \sin(\lambda x) + B \cos(\lambda x) + C \sinh(\lambda x) + D \cos(\lambda x)] \cos(\lambda^2 at),$$

Correct:

$$w(x, t) = [A \sin(\lambda x) + B \cos(\lambda x) + C \sinh(\lambda x) + D \cosh(\lambda x)] \sin(\lambda^2 at),$$

$$w(x, t) = [A \sin(\lambda x) + B \cos(\lambda x) + C \sinh(\lambda x) + D \cosh(\lambda x)] \cos(\lambda^2 at),$$

Page 606: Displayed equation at the last but one line:

Was:

$$\lambda_n = \frac{\mu_n}{l}, \quad \text{where } \mu_1 = 1.875, \quad \mu_2 = 4.694, \quad \mu_n = \frac{\pi}{2}(2n-1) \quad \text{for } n \geq 3.$$

Correct:

$$\lambda_n = \frac{\mu_n}{l}, \quad \text{where } \mu_1 = 4.730, \quad \mu_2 = 7.853, \quad \mu_n = \frac{\pi}{2}(2n+1) \quad \text{for } n \geq 3.$$

(Thanks to Erwin Reichel for these corrections.)

Page 608: Paragraph 9.2.4-1, 3rd and 4th solutions:

Was:

$$w(x, t) = [A \sin(\lambda x) + B \cos(\lambda x) + C \sinh(\lambda x) + D \cos(\lambda x)] \sin(t\sqrt{a^2\lambda^4 + k}),$$

$$w(x, t) = [A \sin(\lambda x) + B \cos(\lambda x) + C \sinh(\lambda x) + D \cos(\lambda x)] \cos(t\sqrt{a^2\lambda^4 + k}),$$

Correct:

$$w(x, t) = [A \sin(\lambda x) + B \cos(\lambda x) + C \sinh(\lambda x) + D \cosh(\lambda x)] \sin(t\sqrt{a^2\lambda^4 + k}),$$

$$w(x, t) = [A \sin(\lambda x) + B \cos(\lambda x) + C \sinh(\lambda x) + D \cosh(\lambda x)] \cos(t\sqrt{a^2\lambda^4 + k}),$$

Page 701: Line 2:

Was: The substitution of expression (1) with $n = 2 \dots$

Correct: The substitution of the expression $w = F(z)$ with $z = \varphi(x) + \psi(y) \dots$