



Correction to: Gaussian mixture model for robust design optimization of planar steel frames

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The original version of this paper unfortunately contains two mistakes. The authors wish to revise the mistaken problem (27) and a mistaken statement in Section 5.1; see below corrections.

Correction 1: Problem (27) should be corrected to

$$\begin{aligned} \min. \quad & f(x_1, x_2) = \rho x_1 \sqrt{1 + x_2^2} \\ \text{subject to} \quad & \\ g_1(x_1, x_2) = & 1 - \frac{5Q}{\sqrt{65}F_y} \sqrt{1 + x_2^2} \left(\frac{8}{x_1} + \frac{1}{x_1 x_2} \right) \geq 0 \\ g_2(x_1, x_2) = & 1 - \frac{5Q}{\sqrt{65}F_y} \sqrt{1 + x_2^2} \left(\frac{8}{x_1} - \frac{1}{x_1 x_2} \right) \geq 0 \end{aligned} \quad (27)$$

$$0.2 \leq x_1 \leq 20, \quad 0.1 \leq x_2 \leq 1.6$$

The numerical results are correct, since this was just a typing error.

Correction 2: In the second paragraph of Section 5.1, the statement: “Nominal values of the yield stress, tensile strength, and Young’s modulus of the steel material are 200 MPa, 250 MPa, and 400 GPa, respectively” should be corrected to “Nominal values of the yield stress, tensile strength, and Young’s modulus of the steel material are 250 MPa, 400 MPa, and 200 GPa, respectively”.

Compliance with ethical standards

Conflict of interest The authors declare that they have no conflict of interest.

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