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ERRATUM

Erratum to: The effect of Knudsen layers on rarefied cylindrical Couette gas flows

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The original publication of the article contains errors which need to be amended as mentioned below.

The text immediately after Eq. (8) should read as: "where $p(r)$ describes the probability a molecule will experience a collision while travelling a distance r."

The corrected version of Fig. 1b is given here.

The corrected version of Eq. (19) is given below:

$$R_2^2 = r^2 + (R^+)^2 + 2rR^+\cos(\theta^+),$$

After Eq. (20), in the second line of the paragraph text should read as:

"Using half symmetry, it is sufficient to integrate θ^+ from 0 to π."

The corrected versions of Eqs. (21) to (24) can be written as follows:

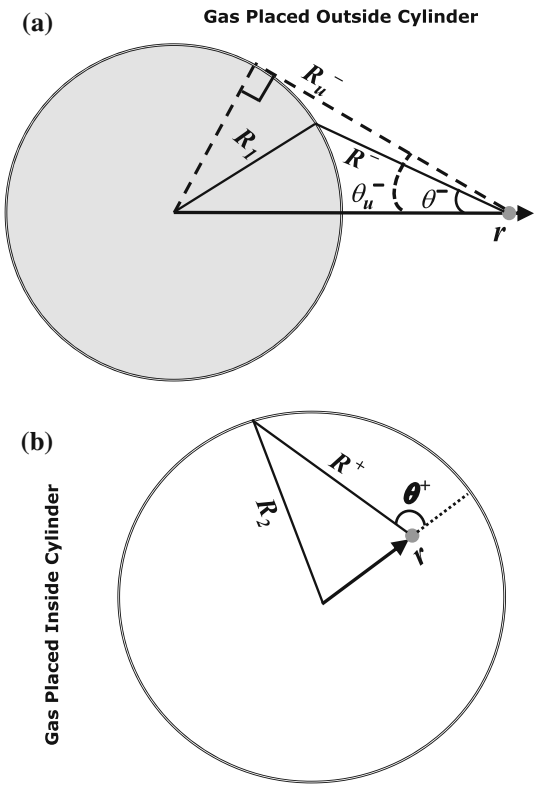

Fig. 1 **a** A gas molecule outside a solid cylinder and situated at a radial distance r from the centre of the cylinder of radius R_1. R^- is the travelling distance limit for a molecule moving towards the cylinder surface, for a given zenith angle θ^-. The largest travelling distance R_u^- is achieved for the zenith angle direction θ_u^-, above which the molecule by-passes the cylinder surface and travels into the bulk. **b** A gas molecule inside a cylindrical cavity of radius R_2, at a wall normal distance of $R_2 - r$, where r is the radial distance of the molecule from the centre of the cylinder. The molecule has a traveling distance of R^+ to the wall for a traveling direction of θ^+, where θ^+ is varied from 0 to π

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$$\lambda_{\text{eff(conc)}} = \lambda\left[1 - \frac{1}{\pi}\int_0^{\pi}\left(1 + \frac{R^+(r,\theta^+)}{a}\right)^{(1-n)} \mathrm{d}\theta^+\right], \quad (21)$$

$$\beta_{(\text{i})} = \frac{\lambda_{\text{eff(conc)}}}{\lambda} = 1 - \frac{1}{\pi}\int_0^{\pi}\left(1 + \frac{R^+(r,\theta^+)}{a}\right)^{(1-n)} \mathrm{d}\theta^+, \quad (22)$$

$$\lambda_{\text{eff}} = \lambda_{\text{eff(conv)}}\left(\frac{\theta_u^-}{\pi}\right) + \lambda_{\text{eff(conc)}}\left[1 - \left(\frac{\theta_u^-}{\pi}\right)\right], \quad (23)$$

$$\beta = \left(\frac{\theta_u^-}{\pi}\right)\left[1 - \frac{1}{\theta_u^-}\int_0^{\theta_u^-}\left(1 + \frac{R^-(r,\theta^-)}{a}\right)^{(1-n)} \mathrm{d}\theta^-\right] + \left[1 - \left(\frac{\theta_u^-}{\pi}\right)\right]\left[1 - \frac{1}{\theta_u^+}\int_0^{\theta_u^+}\left(1 + \frac{R^+(r,\theta^+)}{a}\right)^{(1-n)} \mathrm{d}\theta^+\right], \quad (24)$$

In Sect. 2.3, Line 10, the inline equation should be replaced by

$[1 - (\theta_u^-/\pi)]$

In Sect. 3.1, line 4 in the first paragraph, the text Fig. 1 is replaced by Fig. 5.