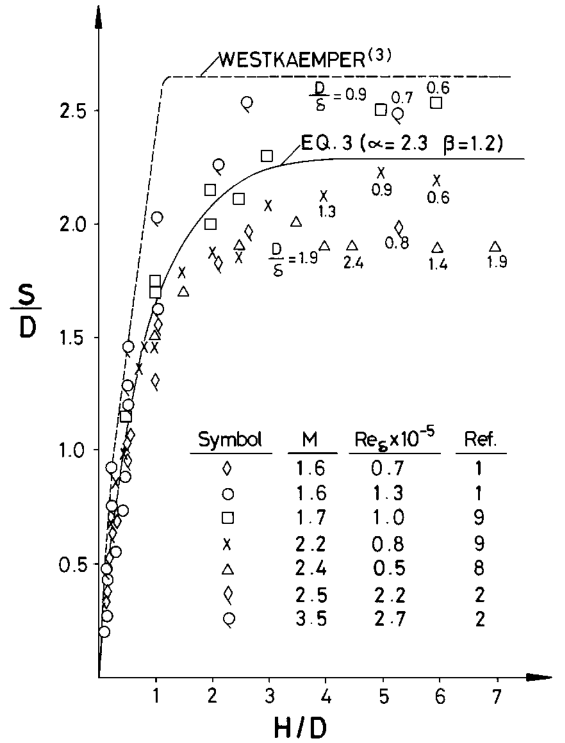

Fig. 2 Variation of *S/D* with *H/D*.

Thus, Eq. (3) is approximately four times more accurate than Eq. (1), which is twice less accurate than Eq. (2). The superiority of the correlation given by Eq. (3) over the other correlations is more apparent for small values of H/δ and H/D: $\sigma_1 = 0.70$ and $\sigma_2 = 0.34$ for $H/\delta < 2$, whereas $\sigma_3 = 0.13$ for $H/D < 1$.

Two important conclusions must be restated: 1) the cylinder diameter D is the appropriate scaling parameter for this flow and 2) the correlations given by Eqs. (1) and (2) are not as accurate as the correlation of Sedney and Kitchens.[2]

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Reply by the Authors to O. Özcan and K. B. Yüceil

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THE authors would like to thank Özcan and Yüceil for their comments.[1] The exponential curve fit of Eq. (2) in their comments is quite clearly a better equation. The authors proposed Eq. (1) because it was quite adequate for the data available to them. However, the contention of Ref. 1 that the cylinder diameter D is the appropriate scaling parameter for this flow is not borne out by the evidence presented by them. The true measure of the relative scatter is not the standard deviation σ in cases where different variables are being considered, as in the present case, but σ normalized with a characteristic value of the relevant variables. The values of δ/D are fairly small so that the values of the variables in Fig. 1 of Ref. 1 are much larger than the corresponding values in their Fig. 2. Then again, most of the new points[2,3] (from their[1] Refs. 8 and 9), which appear as quite scattered on Fig. 1, are lying mostly below the curve for Eq. (3) in Fig. 2 (see Ref. 1).

The discussor's evidence is, therefore, not conclusive. Further, from a physical point of view alone, the characteristic length for separation distance should be derivable from blockage area rather than D.

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