Single-Server Queue with Markov-Dependent Inter-Arrival and Service Times

I.J.B.F. Adan · V.G. Kulkarni

© Springer Science + Business Media, LLC 2006

The publisher regrets the following errors which occurred in *Queueing Systems*, Volume 45, Number 2, October 2003:

- Page 116, line 5: the cross-correlation between A_n and S_n should read

$$\rho(A_n, S_n) = \rho(A_1, S_1) = \frac{\sum_{i=1}^N \pi_i (\lambda_i^{-1} - \lambda^{-1})(y_i - y)}{\{(\sum_{i=1}^N 2\pi_i \lambda_i^{-2} - \lambda^{-2})(\sum_{i=1}^N \pi_i s_i^2 - \gamma^2)\}^{1/2}},$$

and, hence, the cross-correlation between the inter-arrival time and service time should be +0.17 (instead of +1) in Example 1 and −0.17 (instead of −1) in Example 2 in Section 5.

- Page 118, line 9 from bottom: equation (4) should read equation (8)
- Page 119, line 10: $b\Lambda^{-1}e$ at right-hand side should read $v\Lambda^{-1}e$
- Page 130, line 6–8 from bottom: derivation of (A.2) should read

$$\begin{aligned} \left| u\tilde{G}_i(s)p_{i,i} + \frac{s}{\lambda_i} - 1 \right| &\geq \left| \frac{s}{\lambda_i} - 1 \right| - u\tilde{G}_i(0)p_{i,i} \geq 1 + \frac{\delta}{\lambda_i} - u\tilde{G}_i(0)p_{i,i} \\ &> u\tilde{G}_i(0) - u\tilde{G}_i(0)p_{i,i} = \sum_{j \neq i} u\tilde{G}_i(0)p_{i,j} \\ &\geq \sum_{j \neq i} |u\tilde{G}_i(s)p_{i,j}|. \end{aligned}$$

- Page 133, reference [28]: (1964) should read (1991)