Correction to "Evaluating Testing Methods by Delivered Reliability"

Phyllis Frankl Dick Hamlet Bev Littlewood Lorenzo Strigini

Some of the data presented in Table 1 in the above paper[1] are incorrect. The corrected Table appears below. The errors were not due to incorrect calculations by the program that calculated the distribution of Θ; rather, they were introduced in postprocessing the program's output and transcribing it to the table. These small changes do not affect the interpretation of the results presented in Section 4.2.

The authors would like to thank Peter Bishop for bringing this problem to our attention.

		$P(\Theta = \theta)$				
	θ	operational	debug-1	debug-2	debug-3	debug-4
Distribution of Θ	0.015	0.9133	0.0000	0.0024	0.0309	0.0000
	0.014	0.0279	0.0000	0.0281	0.1547	0.0000
	0.013	0.0003	0.0000	0.1310	0.3094	0.0000
	0.012	0.0000	0.0000	0.3056	0.3094	0.0000
	0.011	0.0000	0.0000	0.3565	0.1547	0.9801
	0.010	0.0000	0.9900	0.1664	0.0309	0.0099
	0.005	0.0570	0.0000	0.0000	0.0003	0.0000
	0.004	0.0014	0.0000	0.0003	0.0016	0.0000
	0.003	0.0000	0.0000	0.0013	0.0031	0.0000
	0.002	0.0000	0.0000	0.0031	0.0031	0.0000
	0.001	0.0000	0.0000	0.0036	0.0016	0.0099
	0.000	0.0000	0.0100	0.0017	0.0003	0.0001
Expected value $E(\Theta)$		0.0144	0.0099	0.0114	0.0124	0.0109
Variance		5.5 E-6	9.9 E-7	2.0 E-6	2.2 E-6	1.0 E-6
$P(\Theta \leq 0.01)$		0.0584	1.0000	0.1764	0.0409	0.0199
$P(\Theta < 0.15)$		0.0867	1.0000	0.9976	0.9691	1.0000

Table 1: Distributions of Θ with means and variances for several testing scenarios.

[1] Frankl, Hamlet, Littlewood, Strigini, "Evaluating Testing Methods by Delivered Reliability", *IEEE Trans. on Software Engineering*, 24, 8, Aug. 1998.