



Appendix 4

**This appendix was part of the submitted manuscript and has been peer reviewed.
It is posted as supplied by the authors.**

Appendix to: Cadilhac DA, Kilkenny MF, Levi CR, et al. Risk-adjusted hospital mortality rates for stroke: evidence from the Australian Stroke Clinical registry (AuSCR). *Med J Aust* 2017; 206: 345-350. doi: 10.5694/mja16.00525.

Appendix 4. 30-day mortality rates for individual hospitals providing at least 200 episodes of care in the Australian Stroke Clinical Registry, 2009–2014, adjusted for different covariates

Hospital	Number of episodes	Deaths by 30 days	Crude mortality rate	Risk-adjusted mortality rate		
				Age and sex	Hospital admissions*	Registry [†]
1	556	29	0.052	0.078	0.079	0.093
2	242	17	0.070	0.114	0.110	0.126
3	406	33	0.081	0.105	0.111	0.137
4	388	35	0.090	0.104	0.101	0.111
5	227	24	0.106	0.133	0.138	0.142
6	1125	127	0.113	0.131	0.130	0.151
7	310	36	0.116	0.133	0.131	0.119
8	369	43	0.117	0.153	0.154	0.145
9	209	25	0.120	0.144	0.142	0.159
10	354	43	0.121	0.144	0.142	0.153
11	283	35	0.124	0.131	0.128	0.132
12	668	84	0.126	0.143	0.160	0.159
13	220	29	0.132	0.152	0.169	0.166
14	482	65	0.135	0.141	0.134	0.135
15	283	39	0.138	0.139	0.144	0.152
16	421	59	0.140	0.155	0.153	0.146
17	292	41	0.140	0.134	0.137	0.145
18	956	149	0.156	0.157	0.134	0.157
19	1434	233	0.162	0.164	0.164	0.158
20	205	34	0.166	0.171	0.176	0.150
21	234	39	0.167	0.134	0.139	0.159
22	1590	270	0.170	0.163	0.164	0.162
23	809	141	0.174	0.196	0.194	0.185
24	2283	398	0.174	0.164	0.164	0.161
25	700	125	0.179	0.197	0.200	0.205
26	206	37	0.180	0.169	0.164	0.167
27	701	130	0.185	0.175	0.166	0.190
28	265	52	0.196	0.187	0.189	0.177
Total	16 218	2372				
Association between risk-adjusted mortality rate and number of episodes				$P = 0.19$	$P = 0.29$	$P = 0.24$
Akaike information criterion (AIC)				12 451	11 694	9322
Bayesian information criterion (BIC)				12 482	11 764	9405
C-statistic (95% CI)				0.69 (0.68–0.71)	0.74 (0.73–0.75)	0.80 (0.79–0.81)
Likelihood ratio test				$P < 0.001$	$P < 0.001$	Reference

* Adjusted for age, sex, year data obtained, stroke type, Index of relative Socio-Economic Advantage and Disadvantage, Indigenous status, and place of birth (Australia v elsewhere). † Adjusted for history of stroke, stroke severity, and other variables of the hospital admissions model. ‡ For association between risk-adjusted mortality rate and number of episodes contributed by the hospital. The likelihood ratio test compares the different models.