

Appendix 2: Unadjusted and adjusted multilevel regression analysis of health centre and patient level characteristics on recording of absolute CVRA for patients with diabetes and no documented chronic kidney disease in participating health centres in the Northern Territory between 1 January 2012 and 31 December 2014 (n= 52 health centres; 677 patient records)

Predictors		Unadjusted odds ratio			Empty Model	Model A – Health centre characteristics only			Model B – Health centre and patient characteristics		
		UOR	95%CI	p value		OR	95%CI	p value	OR	95%CI	p value
Health Centre Characteristics											
Location	Non-remote	1	(base)			1	(base)		1	(base)	
	Remote	2.69	0.17–41.48	0.478		8.18	0.92–72.79	0.060	8.51	0.86–84.67	0.068
	Very remote	2.11	0.19–22.92	0.540		1.33	0.21–8.57	0.763	1.17	0.17–8.25	0.876
Type of health centre: Community–controlled		1	(base)			1	(base)				
	Government	11.41	4.83–26.91	0.000 ^a		14.39	5.41–38.26	0.000 ^a	16.05	5.72–45.01	0.000 ^a
Service population											
	≤500	1	(base)			1	(base)		1	(base)	
	501 – 999	0.45	0.14–1.44	0.177		1.44	0.54–3.88	0.470	1.47	0.52–4.11	0.464
	≥1000	0.36	0.13–1.00	0.049 ^a		0.60	0.26–1.41	0.243	0.64	0.26–1.55	0.321
CQI experience	Nil previous cycles	1	(base)			1	(base)		1	(base)	
	1–2 previous cycles	3.07	0.46–20.53	0.246		1.17	0.28–4.91	0.827	1.13	0.26–5.01	0.871
	≥3 previous cycles	1.06	0.16–6.91	0.953		0.99	0.25–3.95	0.988	0.98	0.23–4.15	0.980
Patient Characteristics											
Sex	Male	1	(base)						1	(base)	
	Female	1.50	1.01–2.24	0.047 ^a					1.48	0.97–2.25	0.068
Age Group	15 – <30	1	(base)						1	(base)	
	30 – <45	1.04	0.58–1.87	0.901					1.02	0.56–1.88	0.939
	45 – 60	1.16	0.64–2.09	0.634					1.19	0.63–2.25	0.602
Comorbidities ^b	Hypertension	1.00	0.63–1.58	0.998					0.92	0.56–1.49	0.725
	COPD	0.70	0.40–1.25	0.231					0.71	0.39–1.28	0.249
	Dyslipidaemia	1.08	0.73–1.60	0.700					1.20	0.78–1.83	0.403
	Depression	1.08	0.47–2.49	0.861					1.43	0.57–3.61	0.446
	Other mental illness	0.47	0.18–1.22	0.121					0.41	0.15–1.13	0.084
Complications ^b	Retinopathy	1.23	0.45–3.38	0.683					1.36	0.47–3.97	0.575
	Neuropathy	0.41	0.14–1.17	0.095					0.41	0.14–1.20	0.103
	Foot ulcer	2.25	0.51–10.03	0.286					2.83	0.59–13.61	0.193
	Amputation	1.31	0.18–9.43	0.789					1.07	0.14–8.40	0.947
	Gastroparesis	1	(empty)						1	(empty)	
Random effects (intercepts)					2.27 (0.65)						
Variance (SE)						0.81 (0.30)					
Proportional change in variance						64.27%					

^a Statistically significant

^b Comorbidities and complications were compared with patients without the specific comorbidity or complication, such that an odds ratio of 1 relates to not having the specific comorbidity or complication.

^c The 5 patients with gastroparesis did not have any recorded CVRA.