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Root form as an aid in the diagnosis and prediction of early-onset periodontitis

Childs, Robert John

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APPENDIX TABLE 14(A) LOGISTIC DISCRIMINATION FOR MOLARS USING "ORIGINAL" LEVELS

Parameter	Estimate	s.e.	Wald chi square	P value
Constant	4.983	3.090	2.61	0.107
u2	2.945	6.989	0.18	0.673
u3	6.231	8.436	0.55	0.460
u4	-13.500	9.244	2.13	0.144
u5	-6.821	6.032	1.28	0.258

Discriminant function

$lp = 4.983 + 2.945u_2 + 6.231u_3 - 13.500u_4 - 6.821u_6$

Model deviance 12.243 on 4 d.f. (P = 0.0156)

Residual deviance 43.208 on 35 d.f.

PREDICTION PERFORMANCE

	Disease prediction (50%)		Disease prediction (40%)	
True status	*Control* predicted	*Experimental* predicted	*Control* predicted	*Experimental* predicted
Control	17	3	13	7
Experimental	6	14	6	14
Sensitivity	70%		70%	
Specificity	85%		65%	

APPENDIX TABLE 14(B) LOGISTIC DISCRIMINATION FOR PREMOLARS USING "ORIGINAL" LEVELS

Parameter	Estimate	s.e.	Wald chi square	P value
Constant	17.438	5.798	9.04	0.0026
u2	-10.419	12.923	0.65	0.420
u3	-5.825	12.536	0.22	0.642
u4	-0.228	11.388	0.00	0.984
u5	-10.492	8.158	1.65	0.198

Discriminant function

$lp = 17.438 - 10.4195u_2 - 5.825u_3 - 0.228u_4 - 10.492u_5$

Model deviance 22.566 on 4 d.f. (P = 0.0002)

Residual deviance 32.885 on 35 d.f.

PREDICTION PERFORMANCE

	Disease prediction (50%)		Disease prediction (40%)	
True status	*Control* predicted	*Experimental* predicted	*Control* predicted	*Experimental* predicted
Control	15	5	14	6
Experimental	4	16	4	16
Sensitivity	80%		80%	
Specificity	75%		70%	

APPENDIX TABLE 14(C) LOGISTIC DISCRIMINATION FOR MOLARS USING "ORIGINAL" LEVELS

Parameter	Estimate	s.e.	Wald chi square	P value
Constant	6.557	3.408	3.70	0.054
V1	8.547	6.476	1.74	0.187
V2	-14.839	8.387	3.13	0.077
V3	3.758	7.293	0.27	0.606
V4	-17.735	14.263	1.55	0.214
V5	7.432	9.720	0.58	0.445

Discriminant function

$lp = 6.557 + 8.547v_1 - 14.839v_2 + 3.758v_3 - 17.735v_4 + 7.432v_5$

Model deviance 14.243 on 5 d.f. ($P = 0.0141$)

Residual deviance 41.208 on 34 d.f.

PREDICTION PERFORMANCE

	Disease prediction (50%)		Disease prediction (40%)	
True status	*Control* predicted	*Experimental* predicted	*Control* predicted	*Experimental* predicted
Control	16	4	14	6
Experimental	5	15	4	16
Sensitivity	75%		80%	
Specificity	80%		70%	

APPENDIX TABLE 14(D) LOGISTIC DISCRIMINATION FOR PREMOLARS USING "NEW" LEVELS

Parameter	Estimate	s.e.	Wald chi square	P value
Constant	18.802	6.770	7.712	0.005
V1	-12.076	11.805	1.046	0.306
V2	-10.923	14.348	0.580	0.446
V3	7.631	21.432	0.13	0.722
V4	3.062	23.448	0.02	0.896
V5	-20.468	14.154	2.09	0.148

Discriminant function

$lp = 18.802 - 12.076v_1 - 10.923v_2 + 7.631v_3 + 3.062v_4 - 20.468v_5$

Model deviance 26.185 on 5 d.f. (P = 0.0001)

Residual deviance 29.266 on 34 d.f.

PREDICTION PERFORMANCE

	Disease prediction (50%)		Disease prediction (40%)	
True status	*Control* predicted	*Experimental* predicted	*Control* predicted	*Experimental* predicted
Control	16	4	16	4
Experimental	4	17	2	18
Sensitivity	85%		90%	
Specificity	80%		80%	

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Author Childe R J
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