

Appendix Table 1. Grading of postoperative shivering

Grade	Definition
0	No shivering
1	Mild fasciculation of face or neck
2	Visible tremor involving more than one muscle group
3	Generalized shaking

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Appendix Table 2a) and 2 b). Associations of operating theatre (OT) starting temperature by age category and surgery duration by active vs. passive warming

(a) OT temperature at the start of surgery by age category, count (%)

Age category	Starting OT temperature (°C)				Total
	<21	21-<23	23-<25	≥25	
1: ≤1 yr	3 (3.8)	8 (10.3)	36 (46.2)	31 (39.7)	78
2: >1 - 5 yr	17 (7.02)	43 (17.8)	107 (44.2)	75 (30.9)	242
3: >5 - 10 yr	22 (7.86)	58 (20.7)	138 (49.3)	62 (22.1)	280
4: >10 - <16 yr	23 (8.58)	66 (24.6)	119 (44.4)	60 (22.4)	268
Total	65	175	400	228	868

Chi-square p = 0.013

(b) Surgery duration tertile by active and passive warming, count (%)

Surgery Duration Tertile	Warm active			Surgery Duration Tertile	Warm passive		
	0	1	Total		0	1	Total
1	73 (25.2)	217 (74.8)	290	1	3 (1.02)	292 (98.98)	295
2	40 (15.5)	218 (84.5)	258	2	6 (2.32)	253 (97.68)	259
3	25 (8.42)	272 (91.6)	297	3	6 (2.02)	291 (97.98)	297
Total	138	707	845	Total	15	836	851
Frequency Missing = 24				Frequency Missing = 18			
Statistic	DF	Value	P-value	Statistic	DF	Value	P-value
Chi-Square	2	30.3	<0.001	Chi-Square	2	1.52	0.468

Appendix Table 3. Clinician responses to survey questions regarding hypothermia by study group

Survey Question	Total (n=43)	Normothermic (n=38)	Hypothermic (n=5)	P-value*
Do you think IPH is a problem in your practice? n (%)				0.567
Yes	35 (83.3)	30 (81.1)	5 (100)	
No	6 (14.3)	6 (16.2)	0 (0)	
Maybe	1 (2.38)	1 (2.7)	0 (0)	
Will you take measures to prevent IPH? n (%)				1.00
Yes	42 (97.7)	37 (97.4)	5 (100)	
No	1 (2.33)	1 (2.63)	0 (0)	
Maybe	0			
Are you aware of guidelines regarding IPH? n (%)				0.222
Yes	41 (95.4)	37 (97.4)	4 (80.0)	
No	2 (4.65)	1 (2.63)	1 (20.0)	
Maybe	0			

* Fisher's exact test

Appendix Table 4. Fitted predictive model variables and coefficients

Parameter	Coeff.	Std. Error	P-value
Intercept	4.0931	1.8401	0.026
Intra-OP temperature monitoring (Y=1/N=0)	-0.7150	0.2813	0.011
Active warming, Bair Hugger (Y=1/N=0)	-0.8688	0.2578	0.001
OT temp, start of surgery (°C)	-0.1918	0.0744	0.010
Type of Surgery (Elective=1/Emergency=0)	-0.8378	0.3774	0.026
Passive warming, occlusive (Y=1/N=0)	-1.0448	0.4478	0.020
Weight (kg)	-0.0145	0.0068	0.034

¹ Coefficients are listed in order of model entry from most to least significant as selected by the stepwise selection algorithm. No variables were removed from the model after having been entered.

Appendix Table 5. ROC curves based on predicted probabilities of hypothermia and associated statistics¹

(a) Non-cross-validated ROC

Pred. Prob	ROC statistics						Youden J-Index
	Sens	Spec	PPV	NPV	FP	FN	
0.03	0.989	0.103	0.129	0.985	0.871	0.015	0.092
0.04	0.975	0.176	0.138	0.981	0.863	0.019	0.151
0.05	0.961	0.230	0.144	0.978	0.856	0.022	0.191
0.06	0.952	0.293	0.154	0.978	0.846	0.022	0.245
0.07	0.912	0.367	0.163	0.969	0.837	0.031	0.279
0.08	0.872	0.432	0.171	0.962	0.829	0.038	0.304^a
0.09	0.811	0.489	0.176	0.951	0.824	0.049	0.300
0.10	0.752	0.538	0.180	0.942	0.820	0.058	0.290
0.11	0.694	0.581	0.182	0.934	0.818	0.066	0.275
0.12	0.673	0.601	0.189	0.932	0.811	0.068	0.274
0.13	0.618	0.660	0.197	0.928	0.803	0.072	0.279
0.14	0.579	0.703	0.208	0.925	0.792	0.075	0.282
0.15	0.525	0.741	0.215	0.921	0.785	0.079	0.267
0.16	0.468	0.773	0.218	0.915	0.782	0.085	0.242
0.17	0.448	0.803	0.235	0.915	0.765	0.085	0.252
0.18	0.419	0.834	0.254	0.914	0.746	0.086	0.253
0.19	0.365	0.859	0.259	0.909	0.741	0.091	0.225
0.20	0.339	0.874	0.266	0.908	0.734	0.092	0.213

^a Youden index maximum

(b) Cross-validated ROC curve

Pred. Prob	ROC statistics						Youden J-Index
	Sens	Spec	PPV	NPV	FP	FN	
0.03	0.982	0.101	0.128	0.976	0.872	0.024	0.082
0.04	0.964	0.174	0.136	0.973	0.864	0.027	0.138
0.05	0.953	0.228	0.143	0.973	0.857	0.027	0.181
0.06	0.931	0.291	0.150	0.969	0.850	0.031	0.222
0.07	0.880	0.364	0.157	0.957	0.843	0.043	0.243^b
0.08	0.803	0.423	0.158	0.941	0.842	0.059	0.226
0.09	0.749	0.481	0.163	0.934	0.837	0.066	0.230
0.10	0.713	0.533	0.171	0.932	0.829	0.068	0.246
0.11	0.661	0.578	0.174	0.927	0.826	0.073	0.239
0.12	0.622	0.622	0.182	0.924	0.818	0.076	0.245
0.13	0.594	0.657	0.189	0.923	0.811	0.077	0.251 ^a
0.14	0.553	0.695	0.197	0.920	0.803	0.080	0.248
0.15	0.509	0.736	0.206	0.918	0.794	0.082	0.245
0.16	0.454	0.771	0.210	0.913	0.790	0.087	0.224
0.17	0.425	0.803	0.225	0.912	0.775	0.088	0.228
0.18	0.384	0.832	0.236	0.909	0.764	0.091	0.217
0.19	0.343	0.858	0.246	0.907	0.754	0.093	0.201
0.20	0.306	0.873	0.245	0.903	0.755	0.097	0.178

^a Youden index maximum

^b Selected cutpoint on a clinical basis of sensitivity and NPV

¹ Estimated prevalence of hypothermia was 11.9%