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CORRECTION

Correction: Rapid maturation of the muscle biochemistry that supports diving in Pacific walruses (*Odobenus rosmarus divergens*)

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There was an error in *J. Exp. Biol.* (2015) **218**, 3319-3329 (doi:10.1242/jeb.125757).

The mathematics used in Eqn 2 in the blood oxygen storage portion of our calculated aerobic dive limit (cADL) shown below:

$$\text{Venous } \mathrm{O_2} = (0.67 \times \mathrm{BV} \times M)\ ([\mathrm{Hb}] \times 0.00134)[0.95 \text{ saturation } - (0.05 \times 0.95 \text{ saturation})],$$

did not adequately represent the assumptions of Ponganis (2011), where on pp. 453–454 he described the oxygenation of the venous blood as follows: (i) one-third of the blood volume is arterial and two-thirds are venous; (ii) initial arterial Hb saturation is 95% and final arterial Hb saturation is 20%; (iii) initial venous $\mathrm{O_2}$ content is 5 ml $\mathrm{dl^{-1}}$ less than 95% saturated Hb and final venous $\mathrm{O_2}$ content is zero; and (iv) the oxygen-binding capacity of hemoglobin is 1.34 ml $\mathrm{O_2}$ $\mathrm{g^{-1}}$ Hb at 100% saturation.

The revised equation below is the accurate mathematical interpretation of these assumptions:

$$\text{Venous } \mathrm{O_2} = [0.95 \text{ saturation } \times (0.67 \times \mathrm{BV} \times M)\ ([\mathrm{Hb}] \times 0.00134)] - [0.05\mathrm{l\ O_2 l^{-1}} \text{blood } \times (0.67 \times \mathrm{BV} \times M)],$$

where venous $\mathrm{O_2}$ is in l, blood volume (BV) is in l $\mathrm{kg^{-1}}$, body mass (M) is in kg, Hb concentration ([Hb]) is in g $\mathrm{l^{-1}}$ blood and the oxygen-binding capacity of hemoglobin is 1.34 ml $\mathrm{O_2}$ $\mathrm{g^{-1}}$ Hb.

Tables 1–3 show the original and revised calculations for blood and total oxygen storage capacity, cADLs assuming a diving metabolic rate that is a hypometabolism, field metabolic rate and 2× Kleiber metabolic rate, as well as maximum attainable dive depth and theoretical search time at 41, 80 and 102 m assuming a diving metabolism of 2× Kleiber metabolic rate and swim speed of 0.8 m $\mathrm{s^{-1}}$.

The estimated blood oxygen storage capacity and cADLs are not largely impacted by using the revised equation, and the major findings and conclusions of the paper remain the same.

The authors apologize to readers for any inconvenience caused.

Table 1. Data used to generate Fig. 4 for mass-specific blood and total body oxygen store of neonatal calves, immature (3 month old) and adult Pacific walruses

Age class	Blood $\mathrm{O_2}$ (ml $\mathrm{kg^{-1}}$)	Total $\mathrm{O_2}$ (ml $\mathrm{kg^{-1}}$)
Neonate (F)	19.79 (16.98)	41.77 (38.96)
3 months (F)	19.79 (16.98)	43.05 (40.24)
Adult F	19.79 (16.98)	45.30 (42.49)
Adult M	19.79 (16.98)	45.83 (43.02)

The table shows the values used in Fig. 4, with values using the revised equation shown in parentheses. Data for muscle and lung oxygen stores are not shown as these were not altered by using the revised equation.

Table 2. Data used to generate Fig. 5 for calculated aerobic dive limit (cADL) in relation to age for female and male Pacific walruses

	cADL (min)					
	Female			Male		
Age (years)	Hypo-metabolism	FMR	2× Kleiber MR	Hypo-metabolism	FMR	2× Kleiber MR
0	9.01 (8.41)	1.83 (1.71)	5.50 (5.13)	9.01 (8.41)	1.83 (1.71)	5.50 (5.13)
1	12.23 (11.43)	2.49 (2.32)	7.46 (6.97)	13.25 (12.39)	2.69 (2.52)	8.08 (7.56)
2	14.10 (13.19)	2.87 (2.68)	8.60 (8.05)	15.49 (14.50)	3.15 (2.95)	9.45 (8.85)
3	15.49 (14.50)	3.15 (2.95)	9.45 (8.85)	16.35 (15.32)	3.33 (3.11)	9.98 (9.34)
4	16.62 (15.57)	3.38 (3.17)	10.14 (9.50)	17.12 (16.04)	3.48 (3.26)	10.44 (9.78)
5	17.12 (16.04)	3.48 (3.26)	10.44 (9.78)	17.58 (16.47)	3.57 (3.35)	10.72 (10.05)
6	17.58 (16.47)	3.57 (3.35)	10.72 (10.05)	18.01 (16.89)	3.66 (3.43)	10.99 (10.30)
7	18.01 (16.89)	3.66 (3.43)	10.99 (10.30)	18.42 (17.27)	3.75 (3.51)	11.24 (10.54)
8	18.42 (17.27)	3.75 (3.51)	11.24 (10.54)	18.81 (17.64)	3.82 (3.59)	11.47 (10.76)
9	18.81 (17.64)	3.82 (3.59)	11.47 (10.76)	19.18 (17.99)	3.90 (3.66)	11.70 (10.97)
10	19.18 (17.99)	3.90 (3.66)	11.70 (10.97)	19.53 (18.32)	3.97 (3.72)	11.91 (11.17)
11	19. 53(18.32)	3.97 (3.72)	11.91 (11.17)	19.87 (18.63)	4.04 (3.79)	12.12 (11.37)
12	19.73 (18.51)	4.01 (3.76)	12.04 (11.29)	20.34 (19.09)	4.14 (3.88)	12.41 (11.64)
13	19.73 (18.51)	4.01 (3.76)	12.04 (11.29)	20.65 (19.37)	4.20 (3.94)	12.60 (11.82)
14	19.73 (18.51)	4.01 (3.76)	12.04 (11.29)	21.36 (20.05)	4.34 (4.08)	13.03 (12.23)
15	19.73 (18.51)	4.01 (3.76)	12.04 (11.29)	21.63 (20.30)	4.40 (4.13)	13.19 (12.38)
16	19.73 (18.51)	4.01 (3.76)	12.04 (11.29)	21.89 (20.55)	4.45 (4.18)	13.35 (12.53)

Three metabolic rates were assumed for the values provided in Fig. 5. The table shows the values used in Fig. 5, with values calculated using the revised equation shown in parentheses. FMR, field metabolic rate; MR, metabolic rate.

Table 3. Data used to generate Fig. 6 for maximum attainable depth (0 min of search time on the bottom) and theoretical search time (ST) in minutes at 41, 80 and 102 m, assuming a diving metabolism of 2× Kleiber basal metabolism and swim speed of 0.8 m s^{-1}

	Female				Male			
Age (years)	Max. depth (m)	ST at 41 m (min)	ST at 80 m (min)	ST at 102 m (min)	Max. depth (m)	ST at 41 m (min)	ST at 80 m (min)	ST at 102 m (min)
0	132 (123)	3.8 (3.4)	2.2 (1.8)	1.3 (0.9)	132 (123)	3.8 (3.4)	2.2 (1.8)	1.3 (0.9)
1	179 (167)	5.8 (5.3)	4.1 (3.6)	3.2 (2.7)	194 (181)	6.4 (5.9)	4.7 (4.2)	3.8 (3.3)
2	206 (193)	6.9 (6.3)	5.3 (4.7)	4.4 (3.8)	227 (212)	7.7 (7.1)	6.1 (5.5)	5.2 (4.6)
3	227 (212)	7.7 (7.1)	6.1 (5.5)	5.2 (4.6)	240 (224)	8.3 (7.6)	6.6 (6.0)	5.7 (5.1)
4	243 (228)	8.4 (7.8)	6.8 (6.2)	5.9 (5.3)	251 (235)	8.7 (8.1)	7.1 (6.4)	6.2 (5.5)
5	251 (235)	8.7 (8.1)	7.1 (6.4)	6.2 (5.5)	257 (241)	9.0 (8.3)	7.4 (6.7)	6.5 (5.8)
6	257 (241)	9.0 (8.3)	7.4 (6.7)	6.5 (5.8)	264 (247)	9.3 (8.6)	7.7 (7.0)	6.7 (6.1)
7	264 (247)	9.3 (8.6)	7.7 (7.0)	6.7 (6.1)	270 (253)	9.5 (8.8)	7.9 (7.2)	7.0 (6.3)
8	270 (253)	9.5 (8.8)	7.9 (7.2)	7.0 (6.3)	275 (258)	9.8 (9.1)	8.1 (7.4)	7.2 (6.5)
9	275 (258)	9.8 (9.1)	8.1 (7.4)	7.2 (6.5)	281 (263)	10.0 (9.3)	8.4 (7.6)	7.5 (6.7)
10	281 (263)	10.0 (9.3)	8.4 (7.6)	7.5 (6.7)	286 (268)	10.2 (9.5)	8.6 (7.8)	7.7 (6.9)
11	286 (268)	10.2 (9.5)	8.6 (7.8)	7.7 (6.9)	291 (273)	10.4 (9.7)	8.8 (8.0)	7.9 (7.1)
12	289 (271)	10.3 (9.6)	8.7 (8.0)	7.8 (7.0)	298 (279)	10.7 (9.9)	9.1 (8.3)	8.2 (7.4)
13	289 (271)	10.3 (9.6)	8.7 (8.0)	7.8 (7.0)	302 (284)	10.9 (10.1)	9.3 (8.5)	8.4 (7.6)
14	289 (271)	10.3 (9.6)	8.7 (8.0)	7.8 (7.0)	313 (294)	11.3 (10.5)	9.7 (8.9)	8.8 (8.0)
15	289 (271)	10.3 (9.6)	8.7 (8.0)	7.8 (7.0)	317 (297)	11.5 (10.7)	9.9 (9.0)	8.9 (8.1)
16	289 (271)	10.3 (9.6)	8.7 (8.0)	7.8 (7.0)	320 (301)	11.6 (10.8)	10.0 (9.2)	9.1 (8.3)

The table shows the values used in Fig. 6, with values calculated using the revised equation shown in parentheses.

Reference

Ponganis, P. J. (2011). Diving mammals. *Compr. Physiol.* **1**, 447-465. doi:10.1002/cphy.c091003