

Part A

-0.693147181 30		N ₂ Tissue Compartments											
		5	10	20	40	80	120	160	320	480	640	T1/2	
Copyright (C) 1998 Benton P. Zwart													
Initial Tissue PN ₂	26.07	2.2990	2.0083	1.7060	1.3905	1.2726	1.2619	1.2548	1.2350	1.2208	1.2137	Slope	
Safety Enhancement (0 - 100)	65	103.60	87.58	72.42	58.08	52.08	50.83	48.33	47.24	46.74	46.24	Intercept	
Local Barometer (mmHg)	760	1.3168	1.2150	1.1092	0.9988	0.9575	0.9538	0.9513	0.9444	0.9394	0.9369	Safety Slope	
Initial Steady State FiO ₂	0.21	53.16	47.55	42.25	37.23	35.13	34.69	33.82	33.43	33.26	33.08	Safety Intercept	
Depth Gauge Must = 0 at Surface of Water!													
Linear Transition Time	12.00	5.5	116.19	82.95	56.56	41.13	33.35	30.83	29.60	27.80	27.22	26.93	PN ₂ (t)
Transition O ₂ Fraction	0.21												
Calculated Target PN ₂	156.4	482.94	418.95	353.91	287.51	262.06	259.04	255.37	251.02	248.17	246.50		Nxt Seg Ms
Initial PN ₂ Inspired	26.07	270.43	248.03	225.27	202.03	193.12	192.07	190.78	189.26	188.26	187.68		Safety Ms
Target - Initial	130.4	154.24	165.08	168.71	160.90	159.77	161.23	161.18	161.45	161.04	160.75		Buffer
Segment 1 Conditions													
Segment Depth (FSW)	165	153.53	136.74	104.73	73.47	52.03	43.89	39.62	32.99	30.71	29.56		PN ₂ (t)
Segment Time (Min)	19	241.54	208.08	174.78	141.51	128.44	126.54	123.62	121.34	119.99	119.06		Nxt Seg Ms
Inspired O ₂ Fraction	0.21	132.17	120.45	108.80	97.16	92.58	91.92	90.89	90.10	89.62	89.30		Safety Ms
Calculated PN ₂	156.4	(21.37)	(16.28)	4.07	23.68	40.55	48.03	51.27	57.11	58.91	59.73		Buffer
165.00													
Linear Transition Time	6.00	3.5											
Transition O ₂ Fraction	0.21	118.97	124.03	104.85	77.03	55.07	46.24	41.52	34.04	31.44	30.12		PN ₂ (t)
Calculated Target PN ₂	73.47	13.20	(3.57)	3.95	20.12	37.51	45.68	49.38	56.06	58.19	59.18		Buffer
Initial PN ₂ Inspired	156.4												
Target - Initial	-82.95												
Segment 2 Conditions													
Segment Depth (FSW)	60	84.84	98.75	95.66	76.47	56.59	47.77	42.87	34.88	32.04	30.58		PN ₂ (t)
Segment Time (Min)	10	395.57	342.63	289.08	234.67	213.70	211.09	207.69	204.09	201.78	200.38		Nxt Seg Ms
Inspired O ₂ Fraction	0.21	220.39	201.86	183.12	164.08	156.73	155.82	154.63	153.37	152.56	152.07		Safety Ms
Calculated PN ₂	73.47	135.55	103.11	87.46	87.61	100.14	108.05	111.76	118.49	120.52	121.49		Buffer
60.00													
Linear Transition Time	6.00	2.2											
Transition O ₂ Fraction	0.21	101.52	102.53	97.61	79.13	58.88	49.59	44.36	35.73	32.63	31.03		PN ₂ (t)
Calculated Target PN ₂	126.4	118.87	99.33	85.51	84.95	97.85	106.23	110.27	117.64	119.94	121.04		Buffer
Initial PN ₂ Inspired	73.47												
Target - Initial	52.93												
Segment 3 Conditions													
Segment Depth (FSW)	127	123.29	117.96	109.28	89.95	67.11	55.96	49.52	38.63	34.64	32.57		PN ₂ (t)
Segment Time (Min)	15	310.51	268.33	225.96	183.23	166.61	164.40	161.26	158.39	156.61	155.47		Nxt Seg Ms
Inspired O ₂ Fraction	0.21	171.67	156.91	142.08	127.12	121.31	120.53	119.43	118.43	117.81	117.41		Safety Ms
Calculated PN ₂	126.4	48.38	38.94	32.80	37.17	54.19	64.57	69.91	79.80	83.17	84.84		Buffer
127.00													
Linear Transition Time	37.00	1.2											
Transition O ₂ Fraction	0.21	99.05	101.64	104.24	96.96	78.10	66.04	58.34	44.15	38.60	35.65		PN ₂ (t)
Calculated Target PN ₂	97.17	72.61	55.26	37.84	30.16	43.21	54.49	61.10	74.28	79.21	81.76		Buffer
Initial PN ₂ Inspired	126.4												
Target - Initial	-29.23												
Segment 4 Conditions													
Segment Depth (FSW)	90	97.64	99.41	102.17	96.99	79.68	67.79	59.98	45.28	39.44	36.31		PN ₂ (t)
Segment Time (Min)	10	241.54	208.08	174.78	141.51	128.44	126.54	123.62	121.34	119.99	119.06		Nxt Seg Ms
Inspired O ₂ Fraction	0.21	132.17	120.45	108.80	97.16	92.58	91.92	90.89	90.10	89.62	89.30		Safety Ms
Calculated PN ₂	97.17	34.52	21.05	6.63	0.16	12.90	24.13	30.91	44.81	50.19	52.99		Buffer
90.00													
Linear Transition Time	30.00	1.0											
Transition O ₂ Fraction	0.21	75.51	79.30	86.68	90.20	80.23	70.20	62.84	47.74	41.35	37.86		PN ₂ (t)
Calculated Target PN ₂	73.47	56.65	41.15	22.12	6.95	12.35	21.72	28.05	42.36	48.27	51.44		Buffer
Initial PN ₂ Inspired	97.17												
Target - Initial	-23.7												

Part A

Segment 5 Conditions

Segment Depth (FSW)	60	0.02	1.24	10.83	31.89	47.71	49.64	48.46	41.92	37.92	35.48	PN ₂ (t)
Segment Time (Min)	60	241.54	208.08	174.78	141.51	128.44	126.54	123.62	121.34	119.99	119.06	Nxt Seg Ms
Inspired O ₂ Fraction	1	132.17	120.45	108.80	97.16	92.58	91.92	90.89	90.10	89.62	89.30	Safety Ms
Calculated PN ₂	0	132.15	119.22	97.97	65.26	44.87	42.28	42.43	48.18	51.70	53.82	Buffer

60.00

Linear Transition Time	0.00	0.0
Transition O ₂ Fraction	1	
Calculated Target PN ₂	0	
Initial PN ₂ Inspired	0	
Target - Initial	0	

Segment 6 Conditions

Segment Depth (FSW)	60	64.29	47.93	36.23	41.41	50.85	51.62	50.03	42.93	38.68	36.09	PN ₂ (t)
Segment Time (Min)	15	172.57	147.83	123.60	99.80	90.26	88.69	85.97	84.29	83.36	82.65	Nxt Seg Ms
Inspired O ₂ Fraction	0.21	92.66	84.00	75.52	67.19	63.85	63.30	62.35	61.77	61.44	61.19	Safety Ms
Calculated PN ₂	73.47	28.37	36.07	39.30	25.78	13.01	11.69	12.32	18.84	22.76	25.10	Buffer

60.00

Linear Transition Time	30.00	1.0
Transition O ₂ Fraction	1	
Calculated Target PN ₂	0	
Initial PN ₂ Inspired	0	
Target - Initial	0	

Fill In "Part B" Segment 7!

Torr Estimator: Alt (0-20000') = 8000 Torr = 561.21 Equiv = -8.63 FSW

Part A Dive Time (Min) 250

30.00

Part B

-0.693147181 30		N ₂ Tissue Compartments										
Copyright (C) 1998 Benton P. Zwart		5	10	20	40	80	120	160	320	480	640	T1/2
		2.2990	2.0083	1.7060	1.3905	1.2726	1.2619	1.2548	1.2350	1.2208	1.2137	Slope
Safety Enhancement (0 - 100)	65	103.60	87.58	72.42	58.08	52.08	50.83	48.33	47.24	46.74	46.24	Intercept
Local Barometer (mmHg)	760	1.3168	1.2150	1.1092	0.9988	0.9575	0.9538	0.9513	0.9444	0.9394	0.9369	Safety Slope
Initial Steady State FiO ₂	0.21	53.16	47.55	42.25	37.23	35.13	34.69	33.82	33.43	33.26	33.08	Safety Intercept
Depth Gauge Must = 0 at Surface of Water!												
Segment 7 Conditions												
Segment Depth (FSW)	30	25.39	18.81	18.69	26.71	39.66	43.59	44.06	40.33	37.13	35.02	PN ₂ (t)
Segment Time (Min)	5	172.57	147.83	123.60	99.80	90.26	88.69	85.97	84.29	83.36	82.65	Nxt Seg Ms
Inspired O ₂ Fraction	0.21	92.66	84.00	75.52	67.19	63.85	63.30	62.35	61.77	61.44	61.19	Safety Ms
Calculated PN ₂	49.77	67.28	65.19	56.83	40.48	24.20	19.72	18.29	21.44	24.31	26.17	Buffer
30.00												
Linear Transition Time	0.00	0.0										
Transition O ₂ Fraction	0.21	25.39	18.81	18.69	26.71	39.66	43.59	44.06	40.33	37.13	35.02	PN ₂ (t)
Calculated Target PN ₂	49.77	67.28	65.19	56.83	40.48	24.20	19.72	18.29	21.44	24.31	26.17	Buffer
Initial PN ₂ Inspired	49.77											
Target - Initial	0											
Segment 8 Conditions												
Segment Depth (FSW)	30	0.00	0.00	0.29	3.34	14.02	21.79	26.20	31.10	31.23	30.75	PN ₂ (t)
Segment Time (Min)	120	172.57	147.83	123.60	99.80	90.26	88.69	85.97	84.29	83.36	82.65	Nxt Seg Ms
Inspired O ₂ Fraction	1	92.66	84.00	75.52	67.19	63.85	63.30	62.35	61.77	61.44	61.19	Safety Ms
Calculated PN ₂	0	92.66	84.00	75.23	63.85	49.83	41.51	36.16	30.67	30.22	30.44	Buffer
30.00												
Linear Transition Time	0.00	0.0										
Transition O ₂ Fraction	0.21	0.00	0.00	0.29	3.34	14.02	21.79	26.20	31.10	31.23	30.75	PN ₂ (t)
Calculated Target PN ₂	49.77	92.66	84.00	75.23	63.85	49.83	41.51	36.16	30.67	30.22	30.44	Buffer
Initial PN ₂ Inspired	49.77											
Target - Initial	0											
Segment 9 Conditions												
Segment Depth (FSW)	30	48.99	43.55	32.28	22.16	22.20	26.24	29.07	32.27	32.01	31.36	PN ₂ (t)
Segment Time (Min)	30	103.60	87.58	72.42	58.08	52.08	50.83	48.33	47.24	46.74	46.24	Nxt Seg Ms
Inspired O ₂ Fraction	0.21	53.16	47.55	42.25	37.23	35.13	34.69	33.82	33.43	33.26	33.08	Safety Ms
Calculated PN ₂	49.77	4.17	4.00	9.97	15.07	12.92	8.45	4.74	1.16	1.25	1.72	Buffer
30.00												
Linear Transition Time	30.00	1.0										
Transition O ₂ Fraction	1	0.77	5.44	11.41	13.18	17.12	22.07	25.53	30.24	30.65	30.36	PN ₂ (t)
Calculated Target PN ₂	0	52.39	42.11	30.84	24.05	18.01	12.62	8.29	3.19	2.60	2.73	Buffer
Initial PN ₂ Inspired	0											
Target - Initial	0											
Segment 10 Conditions												
Segment Depth (FSW)	0	0.77	5.44	11.41	13.18	17.12	22.07	25.53	30.24	30.65	30.36	PN ₂ (t)
Segment Time (Min)	0	103.60	87.58	72.42	58.08	52.08	50.83	48.33	47.24	46.74	46.24	Nxt Seg Ms
Inspired O ₂ Fraction	0.21	53.16	47.55	42.25	37.23	35.13	34.69	33.82	33.43	33.26	33.08	Safety Ms
Calculated PN ₂	26.07	52.39	42.11	30.84	24.05	18.01	12.62	8.29	3.19	2.60	2.73	Buffer
0.00												
Linear Transition Time	0.00	0.0										
Transition O ₂ Fraction	0.21	0.77	5.44	11.41	13.18	17.12	22.07	25.53	30.24	30.65	30.36	PN ₂ (t)
Calculated Target PN ₂	26.07	52.39	42.11	30.84	24.05	18.01	12.62	8.29	3.19	2.60	2.73	Buffer
Initial PN ₂ Inspired	26.07											
Target - Initial	0											
Segment 11 Conditions												
Segment Depth (FSW)	0	0.77	5.44	11.41	13.18	17.12	22.07	25.53	30.24	30.65	30.36	PN ₂ (t)
Segment Time (Min)	0	103.60	87.58	72.42	58.08	52.08	50.83	48.33	47.24	46.74	46.24	Nxt Seg Ms
Inspired O ₂ Fraction	0.21	53.16	47.55	42.25	37.23	35.13	34.69	33.82	33.43	33.26	33.08	Safety Ms
Calculated PN ₂	26.07	52.39	42.11	30.84	24.05	18.01	12.62	8.29	3.19	2.60	2.73	Buffer

Part B

Linear Transition Time	0.00	0.0										
Transition O ₂ Fraction	0.21	0.77	5.44	11.41	13.18	17.12	22.07	25.53	30.24	30.65	30.36	PN ₂ (t)
Calculated Target PN ₂	26.07	52.39	42.11	30.84	24.05	18.01	12.62	8.29	3.19	2.60	2.73	Buffer
Initial PN ₂ Inspired	26.07											
Target - Initial	0											
Segment 12 Conditions												
Segment Depth (FSW)	0	0.77	5.44	11.41	13.18	17.12	22.07	25.53	30.24	30.65	30.36	PN ₂ (t)
Segment Time (Min)	0	103.60	87.58	72.42	58.08	52.08	50.83	48.33	47.24	46.74	46.24	Nxt Seg Ms
Inspired O ₂ Fraction	0.21	53.16	47.55	42.25	37.23	35.13	34.69	33.82	33.43	33.26	33.08	Safety Ms
Calculated PN ₂	26.07	52.39	42.11	30.84	24.05	18.01	12.62	8.29	3.19	2.60	2.73	Buffer
0.00												
Linear Transition Time	0.00	0.0										
Transition O ₂ Fraction	0.21	0.77	5.44	11.41	13.18	17.12	22.07	25.53	30.24	30.65	30.36	PN ₂ (t)
Calculated Target PN ₂	26.07	52.39	42.11	30.84	24.05	18.01	12.62	8.29	3.19	2.60	2.73	Buffer
Initial PN ₂ Inspired	26.07											
Target - Initial	0											
Final Depth (FSW)	0											
Final Air PN ₂	26.1	Torr Estimator:		Alt (0-20000') =		10000	Torr =	519.34	Equiv =	-10.45 FSW		
Total Dive Time (A+B Min)	435.0											
Residual PN ₂ (mm-min)	3854	-126.52	-206.27	-293.17	-515.71	-715.94	-480.19	-86.783	1335.07	2200.28	2743.17	
Residual PN ₂ Index (mm)	2.055											
0.00												