

IT IS IMPORTANT THAT THESE INSTRUCTIONS ARE READ BEFORE USING THE ANALOX O2EII®

About the O2EII®

The O2EII® is ergonomically designed and equipped with several features to ensure ease of use and reliability. It is fitted with a large digital display and operates from an internal temperature compensated electrochemical oxygen sensor. Power is provided by a 9V battery which will last for approximately 18 months before replacement is necessary. The O2EII® will automatically switch off after 10 minutes to ensure battery life is not compromised if the instrument is accidentally turned on.

The O2EII® is water and drop resistant, designed specifically for the diving industry where hostile conditions are the norm.

Your O2EII® is supplied ready to use. To protect the sensor in transit a silver seal is fitted which must be removed before use. On receipt of the unit please check for damage and make sure this seal is intact. If there is any damage, or the sensor seal is broken, or not in place, contact your supplier.

Packaging & Contents

On opening your Analox O2EII®, please check you have the following items.

- O2EII®
- EII Adaptor
- Compensation card
- Any accessories ordered for your O2EII®

With the O2EII® in your left hand, press the button to turn on.



Adjust the calibration knob until the display reads the correct value, using the O2 compensation chart.



Open the tank until you hear the nitrox gently hissing out.



Hold the O2EII® in your left hand and press the sample dome firmly against the cylinder outlet.



Once you have a stable reading, press the on button to hold it. To cancel press the button again.



WARNING:
Very high flows may pressurise the sensor and inaccurate readings or sensor damage will result.

Diving at altitude:

At very high altitude normal calibration may not be achievable. In this event you must calculate the surface equivalent oxygen percentage by multiplying the actual pressure in BAR by the atmospheric oxygen percent (20.9%), and then set the reading during calibration to this level. See the altitude correction chart in the full technical manual for more information.

Technical manual details:

Visit our website for the full technical manual www.analox.net (for US customers visit www.amoxtec.com). Click on the sport diving section and then Nitrox. If you have any queries please do not hesitate to contact us.

Accessories

The O2EII® can be supplied with any of the following accessories;

- Storage Case; compact water proof case ideal for protecting your O2EII®.
Part Number: SA2 EII MINICASE
- Water proof bag with shoulder strap; protects the O2EII® from water spray.
Part Number: SA2 EII BAG
- Sensor Saver; push in cap to reduce the sensor's exposure to oxygen and extend its life.
Part Number: 8000-6016A

Quick Check

SYMPTOM	CONDITION	ACTION
'L' symbol	Low battery	Change battery
Zero reading	Sensor disconnected Sensor expired No Oxygen	Check connection Change sensor Check in air and ensure silver seal and sensor saver are removed
Reading does not change when calibration knob is turned	Reading held Sensor failure Faulty connections	Press on button to unfreeze Change sensor Return to supplier
Will not calibrate	Sensor faulty Sensor not in air High altitude	Change sensor Check EII adaptor is fitted correctly Calculate percent equivalent = 20.9% x Bar
Reading erratic	Pressure on sensor Radio transmission Sensor old or faulty Condensation on sensor	Check flow Move unit away Change sensor Dry sensor face

Sensor handling:

The sensor in the O2EII® is an electrochemical device and contains a caustic electrolyte. Always check to make sure that it is not leaking and do not allow it onto any part of your body or clothing. In the event that you do come into contact with the electrolyte wash the contaminated part with plenty of water. For further information please see the full technical manual.

Altitude correction chart

Altitude		Pressure	Atmospheric O ₂ concentration	
Feet	Meters	in Bar	PP O ₂ mBar	SEV %O ₂
-1000	-305	1.03	217	21.67
0	0	1	209	20.9
1000	305	0.97	202	20.16
2000	610	0.94	194	19.43
3000	914	0.92	187	18.73
4000	1219	0.89	181	18.05
5000	1524	0.86	174	17.39
6000	1829	0.84	168	16.75
7000	2134	0.81	161	16.13
8000	2438	0.79	155	15.53
9000	2743	0.76	149	14.94
10000	3048	0.74	144	14.38
11000	3353	0.72	138	13.83
12000	3658	0.69	133	13.3
13000	3962	0.67	128	12.78
14000	4267	0.65	123	12.28
15000	4572	0.63	118	11.8
16000	4877	0.61	113	11.33
17000	5182	0.59	109	10.88
18000	5486	0.57	104	10.44
19000	5791	0.55	100	10.02
20000	6096	0.53	96	9.61

ANALOX O₂EII®

www.amoxtec.com

Oxygen compensation chart for moisture in the atmosphere

ATMOSPHERE OXYGEN PERCENT IN RELATION TO TEMPERATURE AND RELATIVE HUMIDITY																									
RELATIVE HUMIDITY	TEMP F	ATMOSPHERIC OXYGEN PERCENT																							
	TEMP C	32	40	50	60	70	80	90	100	110	120														
10		20.9	20.9	20.9	20.9	20.9	20.8	20.8	20.8	20.7	20.6	20.5	20.4												
20		20.9	20.9	20.8	20.8	20.8	20.8	20.8	20.7	20.7	20.6	20.5	20.4	20.2											
30		20.9	20.8	20.8	20.8	20.7	20.7	20.7	20.6	20.5	20.4	20.2	19.9												
40		20.8	20.8	20.8	20.8	20.7	20.7	20.6	20.5	20.4	20.2	19.9													
50		20.8	20.8	20.8	20.8	20.7	20.7	20.6	20.5	20.4	20.2	19.7													
60		20.8	20.8	20.7	20.7	20.7	20.6	20.5	20.3	20.1	19.8	19.5													
70		20.8	20.8	20.7	20.6	20.5	20.4	20.2	19.9	19.6	19.2	19.0													
80		20.8	20.8	20.7	20.6	20.5	20.3	20.1	19.8	19.5	19.0														
90		20.8	20.7	20.7	20.6	20.4	20.2	20.0	19.7	19.3	18.7														
100		20.8	20.7	20.6	20.5	20.4	20.2	19.9	19.5	19.1	18.5														
H ₂ O at 100% RH		0.6	0.8	1.2	1.8	2.5	3.4	4.7	6.5	8.6	11.5														

If the temperature and RH axis meet in this part of the chart, calibrate to the chart O₂ level or with dry air to maintain 0.5% O₂ accuracy in NITROX.

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RANGE	0.1- 100% O ₂
ACCURACY	+/-1% of reading, ± 0.2% of O ₂
RESOLUTION	0.1% Oxygen
WARM UP TIME	< 5 seconds
RESPONSE TIME	90% in less than 15 seconds
SENSOR TYPE	Analox 9100-9220-9B EC sensor
EXPECTED SENSOR LIFE	4 – 5 years in air. 36 month graded warranty
BATTERY	9V Alkaline (PP3)
BATTERY LIFE	Approximately 18 months
OPERATING TEMP	-5 to 50°C or 23 to 122°F
STORAGE TEMP	-20 to 50°C or -4 to 122°F
PRESSURE	Sensitive to the partial pressure of Oxygen.
TEMPERATURE EFFECT	0.1 %O ₂ per °C or 0.055 %O ₂ per °F
WEIGHT	225g/ 8oz
DIMENSIONS (mm) (inches)	130 (l) x 70 (w) x 55 (d) 5 ¼ (l) x 2 ¾ (w) x 2 ¼ (d)
EMC	CE marked
PROTECTION	IP65 / NEMA 4

ANALOX

looking after the air **you** breathe®

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