# OMD 1700 OXYGEN ANALYZERS



UNI SENSOR OMD 1700 Oxygen Analyzer is an In-Situ type Oxygen analyzer which is used to optimize combustion by measuring the Oxygen levels inside the flue gases. By measuring Oxygen levels, fuel/air ratios of the burners are adjusted or Oxygen trim control is made. **Significant amount of fuel savings, reduction in flue gas emissions and increase in plant service life are achieved.** 



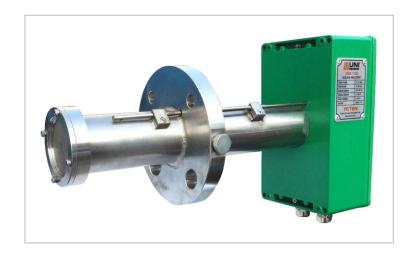
ADVANTAGES	
Suitable for Hard Working Conditions	
Easy Installation, Commissioning & Calibration	
Integrated Filter & Temperature Sensor	
Long Service life	
Economical Spare Parts	
Delivery From Stock	

APPLICATIONS
Reheat Furnaces
Shuttle Kilns
Aluminium Furnaces
Heat Treatment Furnaces
Power Plants
Boilers

### **TECHNICAL FEATURES**

OMD 1700 Oxygen Analyzer works with Zirconia Oxide (ZrO2) ceramic sensor. It can make measurements in low flue gas temperatures and its parameters are not influenced by sudden temperature changes. Integrated filter inside the analyzer protects the sensor from dusts and it can be changed easily by operators. There is a temperature sensor located on analyzer 's body to measure flue gas temperatures. Due to the customer requests, temperature sensor can be selected as PT 100 or K type thermocouple.

Measuring Range	0 - 25 % O <sub>2</sub>
Power Supply	24 V DC, 3A
Output Signal	4 - 20 mA
Ambient Temperature	-10 50 °C
Accuracy	1 %
Reaction Time	< 4 s
Manual Calibration	Available
Auto Purging System	Available



#### **MODEL SELECTION**

Due to the application temperatures, three different models are available.

Model	Content	
OMD 1700 - Standard	OMD 1700 - Mounting Flange	
OMD 1700 - SS	OMD 1700 - Ejector System - Stainless Steel Transfer Pipe - Mounting Plates	
OMD 1700 - CER	OMD 1700 - Ejector System - Ceramic Transfer Pipe - Mounting Plates	



OMD 1700 - Standard
Max. 400 °C



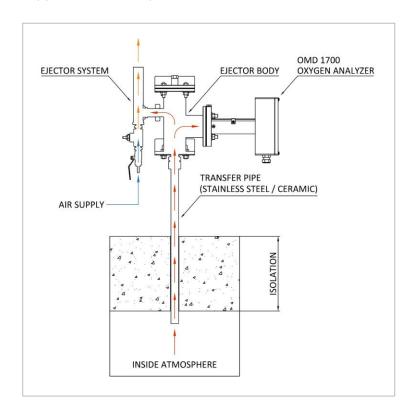
OMD 1700 - SS Max. 900 °C



OMD 1700 - CER Max. 1400 °C

# INTEGRATED EJECTOR SYSTEM FOR HIGH TEMPERATURE APPLICATIONS

OMD 1700 Oxygen Analyzer is supplied with additional ejector system for applications up to 1400 °C. This system allows furnace inside atmosphere to be pulled directly to the sensor. Ejector systems are custom designed for every project and can be mounted both horizontally or vertically. Air supply for ejector can be supplied from a compressor or from the unheated side of the combustion air line.





# **LOCAL CONTROL CABINET**

OMD 1700 Oxygen Analyzers are supplied together with local control cabinets. Measured Oxygen values are locally seen on the display of the cabinet and transmitted to the other systems via 4 - 20 mA output signal. There are 2 alarms on the cabinets. These alarms are set to min. - max. Oxygen values and used as relays.

Power Supply	230 V AC, 3A
Output Signal	4 - 20 mA
Ambient Temperature	0 50 °C
Alarm Quantity	2
Display	LED
Programming	Available



#### **AUTO PURGING SYSTEMS FOR DIRTY FUEL OPERATIONS**

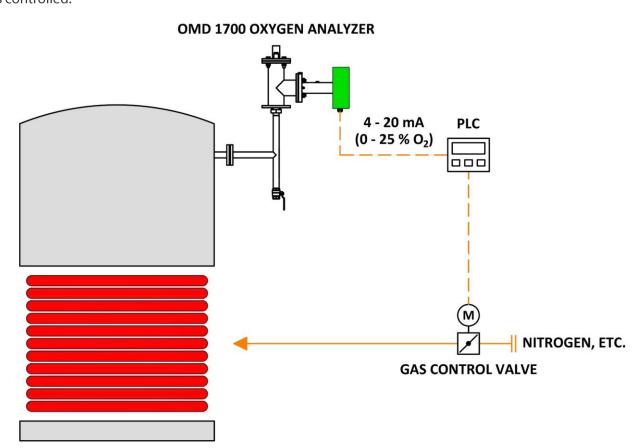
OMD 1700 Oxygen Analyzers are supplied together with auto purging systems for dirty fuel operations such as coal, COG and others. A purging air is applied to the analyzer 's filter at certain time periods and the sensor is cleaned from accumulated dusts and powders.

For analyzers with ejector system (OMD 1700 - SS & OMD 1700 - CER), purging air is also supplied to the transfer pipe of the ejector and possible blockages are prevented. Auto purging systems are delivered with timer unit, pressure regulator, solenoid valves, necessary shut - off valves and tubings.



### ATMOSPHERE CONTROL IN HEAT TREATMENT FURNACES

OMD 1700 Oxygen Analyzer is also used to control the inside atmosphere of Heat Treatment Furnaces. Due to the measured Oxygen levels, amont of additional gases (Nitrogen, etc.) which sent to furnace atmosphere is controlled.



# **SZUTEST**



## ATTESTATION OF COMPLIANCE UYGUNLUK ONAYI

The technical file and test reports of the following product have been checked and found in compliance with the Parliament and Council Directive 2014/35/EU of 26 February 2014 on the harmonization of the laws of Member States relating to electrical equipment designed for use within certain voltage limits and Parliament and Council Directive 2006/42/EC of 17 May 2006 on the approximation of the laws of the Member States relating to machinery.

Teknik dosya ve test raporları incelenerek, belirtilen ürünün Avrupa Birliği Teknik Komisyonu tarafından 26 Şubat 2014 tarihinde yayınlanan 2014/35/EU Belirli Gerilim Sınırları Dahilinde Çalışmak Üzere Teçhizat ile ilgili yönetmeliği ve 17 Mayıs 2006 tarihinde yayınlanan 2006/42/AT Makina Emniyeti Yönetmeliğine uygunluğu saptanmıştır.

> Number: Numara:

2195-AG029-20-01

Applicant:

Başvuru Sahibi:

YETEN YAKMA VE ENERJI TEKNOLOJILERI SAN. TIC. LTD. ŞTI. DUDULLU OSB MAH.DES-113 SOK. C-04 BLOK NO:33 ÜMRANİYE /

**ISTANBUL** 

Manufacturer:

Üretici:

YETEN YAKMA VE ENERJI TEKNOLOJILERI SAN. TIC. LTD. ŞTI.

DUDULLU OSB MAH.DES-113 SOK. C-04 BLOK NO:33 ÜMRANİYE /

**ISTANBUL** 

Products:

Ürün:

ELECTRIC OXYGEN ANALYSER

ELEKTRİKLİ OKSİJEN ANALIZÖRÜ

Trademark:

Ticari Marka:

**UNI SENSOR** 

Type/Models:

OMD 1700, OMD 2100, OMD 2200, OMD 2400, GCA 01, GCA 02, GCA 03,

Tip/Model:

OMD - S1, OMD - S2, OMD - S3

Base of attestation: Onay Dayanağı:

File of technical documentation, test report no AG029-TR-01 Teknik Dökümantasyon, AG029-TR-01 numaralı Test Raporu

The referred technical file(s) is reviewed and attested with presumption of compliance with the essential requirements listed EU Directive above. This attestation does not abrogate the compulsory obligation of the manufacturer to issue the declaration of conformity.

Diğer ilgili direktiflere uyulmalıdır. Bu onay üreticinin uygunluk beyanı düzenleme zorunluluğunu ortadan kaldırmaz. Referans teknik dosya ile ürünün yukarıda belirtilen AT Direktifinin temel gereklerine uygunluğu kabul edilir.

İstanbul, Date / Belge Tarihi 30-04-2020 Expiry Date / Geçerlilik Tarihi 29-04-2023

