# Dräger

### Dräger X-am<sup>®</sup> 8000 Multi-Gas Detection Device

Clearance measurement was never this easy and convenient: The 1 to 7 gas detector detects toxic and flammable gases as well as vapours and oxygen all at once – either in pump or diffusion mode. Innovative signalling design and handy assistant functions ensure complete safety throughout the process.

Switch easily between pump and diffusion mode

Impact detection informs you to severe mechanical stresses

Assistants for clearance measurement, leak detection, and benzene-specific testing with the PID (pre-tube)

Optional **Bluetooth®** module to connect with the CSE Connect app for Android

Bluetooth<sup>®</sup> is a registered trademark of Bluetooth SIG, Inc.



Glowing green D-light (optional) indicates: tested and ready for use

Five slots for DrägerSensors® to measure up to seven gases, two new high-performance PID sensors

Easy-to-read colour display with zoom function

Inductive charging

### **Benefits**

#### Specially designed for use with a pump, optimised for clearance measurement

The Dräger X-am<sup>®</sup> 8000 is equipped with a very powerful pump. It can be connected with hoses of up to 45 metres in length. A pump adapter makes it easy to switch between diffusion and pump mode at any time. This means the pump is only operated when you actually need it. That saves energy, reduces wear and tear, and thereby extends the lifespan of the pump.

Handy and durable, the Dräger X-am<sup>®</sup> 8000 is intuitive to operate single-handedly using three function keys. The easy-to-read colour display clearly lays out all the information for you.

Standard accessories include a sturdy shoulder strap, so you can comfortably carry the X-am 8000. Thanks to its compact and robust construction, the device can withstand even the harshest conditions.

#### Clearance measurement, release and documentation in no time

The X-am 8000 effectively supports various applications with specially developed assistant functions that guide you through each process step by step. During clearance measurement, for example, the smart assistant calculates the necessary flooding time for the device and probe (FKM hose) based on parameters such as measuring gases, temperature limits, and the indicated hose length.

When monitoring for possibly high methane concentrations, an optional automatic measurement range switch makes it easier to take a reading: if the Cat-Ex sensor measures values above 100% LEL, the display switches to the range of 0 to 100 vol%.

An additional useful tool is CSE Connect. It combines an Android app, specially designed for the X-am 8000, with a cloud-computing solution. Measuring jobs can be quickly and easily transferred to the app using an online application. An optional Bluetooth<sup>®</sup> module in the Dräger X-am 8000 enables measured values to be transferred automatically to the CSE Connect app. You can also easily and conveniently use the app to create measurement reports. This saves time and helps you manage your measuring tasks during clearance measurements more efficiently.

#### Clear signalling design

The signal system of the Dräger X-am 8000 is based on a clear colour code, in accordance with the requirements of the EN 60079-29-1, EN 45544-1 and EN 50104:

- Red light = gas alarm
- Yellow light = device-related alarm, e.g. low battery
- Green light = device is ready for use

The green glow of the D-light allows you to see from a distance whether the device has been properly tested and is ready for use.

#### **Benefits**

In case of an alarm, the X-am 8000 alerts you with colourful alarm LEDs, a loud horn (100 dB(A) at a distance of 30 cm), and clearly palpable vibration. Optionally, four preset hazard symbols are available for the display which explicitly indicate the presence of explosive or toxic gas hazards, for example. This allows the user to easily recognise the type of hazard based purely on the symbol displayed.

The X-am 8000 is equipped with an impact detection system. The event report indicates whenever severe mechanical impacts have occurred that might result in functional impairments of the device or the sensors. These are also documented in the data logger. With this information, a device attendant can specifically check the device.

#### **Economical Fleet Management**

Bumptest and calibration are carried out simply and quickly using the Dräger X-dock<sup>®</sup> calibrating station. Its low test gas consumption keeps operating costs to a minimum.

Its reporting function and numerous other useful features make the X-dock Manager PC software a smart addition to any fleet management operation. To identify the devices in the fleet, you can either use tried and tested barcodes or an integrated RFID transponder.

#### Specialist for high and low hydrocarbon concentrations

To measure hard-to-detect hydrocarbons, you can fit the Dräger X-am 8000 with one of two high-performance PID sensors. The PID HC covers a measurement range of 0 to 2,000 ppm (Isobutene). The PID LC ppb is particularly suited for a measurement range of 0 to 10 ppm (Isobutene) with a high resolution in the range below 1 ppm.

For benzene-specific measurements, the X-am 8000 can be used with a pre-tube. The advantage: you only need one measuring device for this application, which significantly reduces the costs of purchasing, maintaining and transporting devices in use. The use of the pre-tubes is supported by a built-in assistant.

#### Inductive charging protects against wear and tear

The X-am 8000 features inductive charging. This makes it easier to operate and increases the lifespan of the device. Issues like corrosion and contact problems in the charging cradle are a thing of the past. You can charge (outside of explosion-hazard zones) and measure at once, e.g, when in use inside vehicles or on machinery.

The charging cradle can connect with one another, taking up minimal space, and are compatible with existing Dräger X-am<sup>®</sup> series cradles.

### Details



Shoulder strap

Pump adapter

Pre-tube holder

### Comparison of Dräger X-am<sup>®</sup> 3500 and Dräger X-am<sup>®</sup> 8000

Features	Dräger X-am <sup>®</sup> 3500	Dräger X-am <sup>®</sup> 8000
Number of measuring gases	1 to 4	1 to 7
Internal pump, activation with pump adapter	Yes	Yes, optional
Inductive charging	Yes	Yes
Customer-specific settings when ordering	No	Yes
Shoulder strap included as standard	No	Yes
Catalytic bead sensor DrägerSensor® CatEx 125 PR	Yes	Yes, configurable
Electrochemical (EC) DrägerSensors®: XXS O <sub>2</sub> , XXS CO LC, XXS H <sub>2</sub> S LC, XXS NO <sub>2</sub> , XXS SO <sub>2</sub>	Yes	Yes, configurable
Electrochemical (EC) DrägerSensors®: other sensors/special gases	No	Yes, configurable
Infrared (IR) DrägerSensors® Dual IR Ex/CO <sub>2</sub> , IR-Ex, IR-CO <sub>2</sub>	No	Yes, configurable
Photoionisation detector (PID) DrägerSensors®: PID HC, PID LC ppb	No	Yes, configurable
Automatic measurement range switching for the catalytic bead sensor, catalytic bead sensor, measuring gas: methane	No	Yes, configurable
Assistant: Confined Space, Leak Search, Benzene/Pre-Tube	No	Yes, only when a pump is installed
Event report (incl. impact detection)	No	Yes, configurable
Bluetooth®1	No	Option

Dräger offers two different multi-gas detection devices with internal pump: Dräger X-am<sup>®</sup> 8000 and Dräger X-am<sup>®</sup> 3500. The different features of both devices are summarised in the table above.

### Accessories



#### Inductive charger

To charge the device inductively

#### Pedestal

To stand the device upright for area monitoring. The pedestal can be used with or without a shoulder strap.



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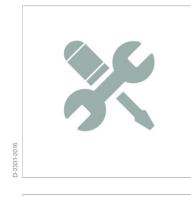
#### Protective rubber boot

Prevents damage and wear in harsh environments. The protective boot can easily be replaced by the user.

#### Adhesive label

The adhesive label can have device-specific information inscribed on it, such as the sensor configuration.

### Services



#### **Product Service**

Our product service provides support with different service packages – in our workshops or directly on your premises. Care, maintenance and servicing are crucial for safety and reliability – but careful maintenance and care are a must, even when it comes to commercial considerations. Preventive checks, ongoing care and use of original replacement parts improve the longevity of your investment.

#### Training



The Dräger Academy has shared its solid, practical knowledge for over 40 years. We hold more than 2,400 training courses each year, on a range of over 600 topics, with more than 110 authorised trainers. We equip your staff with practical knowledge and ensure that what they learn can be applied effectively, both day-to-day and, more importantly, whenever critical situations occur. We will be pleased to develop a customised training programme for you.

#### **Rental Service**

From bridging a temporary shortage of equipment to procuring special equipment for applications involving specific requirements: If you only need to cover a temporary higher demand, then Dräger Rental Service with over 65,000 pieces of rental equipment is an economical alternative to purchasing. Fast, straightforward and with a wide range of additional services available upon request.



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#### **On-site Safety Service**

Whether through a rental shop, personnel services or comprehensive safety management, our On-Site Safety Services provide support in all projects where there are particular safety risks – not to mention normal day-to-day business.

### Technical Data

Dimensions (H x W x D)	179 x 77 x 42 mm		
Weight	Approx. 495 g, depending on sensor configuration, without strap, without pump		
	Approx. 550 g, depending on sensor config	juration, without strap, with pump	
Housing	Durable two-component housing		
Display	High-contrast colour display		
Temperature	-20° C to 50° C		
Pressure	700 to 1,300 hPa		
Relative humidity	10 to 90% (short-term up to 95%) r.h.		
Alarms	Visual:	3 LED 'red' (gas alarms),	
		3 LED 'yellow' (device alarms)	
	Acoustic	Multi-tone, typically 100 dB(A) at 30 cm	
	Vibration		
Ingress protection class	IP 67		
Energy supply	Lithium-ion battery, rechargeable, inductive charging		
Operating times (Diffusion)	With CatEx and 3 EC sensors	Typically 24 hours	
	With IR and 3 EC sensors	Typically 22 hours	
	With 3 EC sensors	Typically 120 hours	
	With CatEx, PID and 3 EC sensors	Typically 17 hours	
	With IR, PID and 3 EC sensors	Typically 16 hours	
	With CatEx-, IR- and 3 EC sensors	Typically 14 hours	
	PID only	Typically 42 hours	
Charging times	Typically 4 hours after use during a shift of r	max. 10 hours	
Start-up times	Typically <60 seconds for standard sensors		
Data storage	12 MB, e.g. at 10 minutes per hour of gas exposure with measuring values changing to		
	the second on all 7 channels: approx. 210 hours		
Pump operation	Max. hose length 45 m		
Approvals	ATEX / IECEx	I M1, II 1G	
		Ex da ia I Ma, Ex da ia IIC T4 Ga	
		Metrological approval pending	
	EAC	PO Ex da ia I Ma X	
		Ex da ia IIC T4 Ga X	
	cCSAus (Please contact Dräger regarding	Class I, Zone 0, AEx da ia IIC T4 Ga	
	availability.)	Class II, Div 1, Gr. E, F, G T4	
		C22.2 No. 152, ANSI-ISA 12.13.01:2000	
	CE labelling		
	MED / DNV GL (Please contact Dräger		
	regarding availability.)		
Manufacturer's warranty	3 years for the device		
-	1 year for the power supply		
	Sensors: see DrägerSensor <sup>®</sup> & Portable Instruments Handbook		

### Ordering Information

Dräger X-am <sup>®</sup> 8000	83 25 800
consists of: Device with power supply (Lithium-ion battery), data logger, shoulder	
strap, manufacturer's certificate, certificate of calibration, and charger (optional). A fully	
functioning device requires up to 5 sensors and an optional integrated pump.	
Instruction for use included as standard in the following languages:	
DE, EN, FR, ES, PT, IT, NL, RU, ZH, JA	

Instruction for use on request (please indicate when ordering), also available in the following languages: DA, FI, NO, SV, PL, HR, SL, SK, CS, BG, RO, HU, EL, TR, KO Technical handbook available in the following languages: DE, EN, FR, ES, RU

90 33 656

Available to download from the product

			website.
Selectable device options when	ordering Integrated	pump with pump adapter	
	Bluetooth®	module	
	RFID trans	ponder	
		ing cradle/power plug can be o	deselected during the ordering process.)
Slot 1:	Slot 2:		Slots 3-5:
PID or IR sensor	IR or CatE	sensor	Electrochemical sensors (XXS format)
Sensors	Measuring range	Resolution	Order No.
Cat-Ex 125 PR <sup>1, 2</sup>	0-100 % LEL	1 % LEL	68 12 950
	0-100 vol% CH <sub>4</sub>		
Cat-Ex 125 PR Gas <sup>1</sup>	0-100 % LEL	1 % LEL	68 13 080
	0-100 vol% CH <sub>4</sub>		
Dual IR Ex/CO <sub>2</sub> <sup>1</sup>	0-100 % LEL	1 % LEL	68 11 960
	0-100 vol% CH <sub>4</sub>	0.2 vol%	
	0-5 vol% CO <sub>2</sub>	0.01 vol% CO <sub>2</sub> or	
		50 ppm CO <sub>2</sub>	
IR Ex <sup>1</sup>	0–100 % LEL	1 % LEL	68 12 180
	0–100 vol% CH <sub>4</sub>	0.2 vol%	
IR CO <sub>2</sub>	0-5 vol% CO2	0.01 vol% CO <sub>2</sub> or	68 12 190
		50 ppm CO <sub>2</sub>	
DrägerSensor PID LC ppb	0.05–10 ppm Isobuter	ne depending on gas	value, 68 13 500
(10.6 eV)	0-5 ppm Benzene	starting with 10 pp	b
DrägerSensor PID HC	0-2,000 ppm Isobuter		
(10.6 eV)	0-1,000 ppm Benzen		
DrägerSensor <sup>®</sup> XXS O <sub>2</sub> <sup>2</sup>	0–25 vol%	0.1 vol%	68 10 881
DrägerSensor <sup>®</sup> XXS O <sub>2</sub> 100	0–100 vol%	0.5 vol%	68 12 385
DrägerSensor <sup>®</sup> XXS O <sub>2</sub> /H <sub>2</sub> S	0-25 vol% O <sub>2</sub>	0.1 vol%	68 14 137
LC	100 ppm H <sub>2</sub> S	0.1 ppm	
DrägerSensor <sup>®</sup> XXS CO LC <sup>2</sup>	0–2,000 ppm	1 ppm	68 13 210
DrägerSensor® XXS CO HC	0-10,000 ppm	5 ppm	68 12 010
DrägerSensor <sup>®</sup> XXS CO / H <sub>2</sub>	0-2,000 ppm CO	2 ppm	68 11 950
compensated	0.100	0.1	
DrägerSensor <sup>®</sup> XXS H <sub>2</sub> S LC <sup>2</sup>	0-100 ppm	0.1 ppm	68 11 525
DrägerSensor <sup>®</sup> XXS H <sub>2</sub> S HC	0-1,000 ppm	2 ppm	68 12 015
DrägerSensor <sup>®</sup> XXS CO LC /	0-2,000 ppm CO/	1 ppm CO	68 13 280
H <sub>2</sub> SLC	$\frac{0-100 \text{ ppm H}_2\text{S}}{0.000 \text{ prm CO}}$	0.1 ppm H <sub>2</sub> S	60.10.075
DrägerSensor <sup>®</sup> XXS CO LC /	0-2,000 ppm CO/	1 ppm CO	68 13 275
	0-25 vol%	1 vol% O <sub>2</sub>	60.11.545
DrägerSensor® XXS NO	0–200 ppm	0.1 ppm	68 11 545
DrägerSensor <sup>®</sup> XXS NO <sub>2</sub>	0-50 ppm	0.1 ppm	68 10 884
DrägerSensor <sup>®</sup> XXS NO <sub>2</sub> LC	0-50 ppm	0.02 ppm	68 12 600
DrägerSensor <sup>®</sup> XXS SO <sub>2</sub>	0–100 ppm	0.1 ppm	68 10 885
DrägerSensor <sup>®</sup> XXS PH <sub>3</sub>	0–20 ppm	0.01 ppm	68 10 886
DrägerSensor <sup>®</sup> XXS PH <sub>3</sub> HC	0-2,000 ppm	1 ppm	68 12 020
DrägerSensor <sup>®</sup> XXS HCN	0–50 ppm	0.1 ppm	68 10 887
DrägerSensor <sup>®</sup> XXS HCN PC	0–50 ppm	0.5 ppm	68 13 165

DrägerSensor <sup>®</sup> XXS NH <sub>3</sub>	0–300 ppm		1 ppm	68 10 888	
DrägerSensor <sup>®</sup> XXS CO <sub>2</sub>	0-5 vol%	Ď	0.1 vol%	68 10 889	
DrägerSensor <sup>®</sup> XXS Cl <sub>2</sub>	0–20 pp	m	0.05 ppm	68 10 890	
DrägerSensor <sup>®</sup> XXS H <sub>2</sub>	0-2,000	ppm	5 ppm	68 12 370	
DrägerSensor <sup>®</sup> XXS H <sub>2</sub> HC	0-4 vol%	,	0.01 vol%	68 12 025	
DrägerSensor <sup>®</sup> XXS OV	0–200 p	pm	0.5 ppm	68 11 530	
DrägerSensor <sup>®</sup> XXS OV-A	0–200 p	pm	1 ppm	68 11 535	
DrägerSensor <sup>®</sup> XXS Amine	0–100 p	pm	1 ppm	68 12 545	
DrägerSensor <sup>®</sup> XXS Odorant	0–40 pp	m	0.5 ppm	68 12 535	
DrägerSensor <sup>®</sup> XXS COCl <sub>2</sub>	0–10 pp	m	0.01 ppm	68 12 005	
DrägerSensor <sup>®</sup> XXS Ozone	0–10 pp	m	0.01 ppm	68 11 540	
Sensors with five-year					
guarantee (recommended)					
DrägerSensor <sup>®</sup> XXS E CO	0-2,000	ppm	2 ppm	68 12 212	
DrägerSensor <sup>®</sup> XXS E H <sub>2</sub> S	0-200 p	pm	1 ppm	68 12 213	
DrägerSensor® XXS E O <sub>2</sub>	0-25 vol	%	0.1 vol%	68 12 211	
<sup>1</sup> Special calibrations possible	for the Ex se	ensors (Standard: m	nethane)		
<sup>2</sup> A three-year manufacturer's v				om defects remain unaffected.	
Power supply unit		· · · · · · · ·	1 1)		
Energy supply (incl. back housi	ng)	(included as star	ndard)	83 26 817	
Charging accessories					
Inductive charger for charging	1 device	(included as standard, deselectable)		83 25 825	
Adapter for power plug				83 25 736	
Power plug for charging 1 device		(included as standard, deselectable)		83 16 997	
Power plug for charging 5 devices		(requires adapter 83 25 736)		83 16 994	
Power plug 100-240 VAC; 1.33 A, for				83 21 849	
charging up to 5 devices					
Power plug 100-240 VAC; 6.2	5 A, for	(requires adapte	er 83 25 736)	83 21 850	
charging up to 20 devices	M fau			45.00.057	
Vehicle connector cable 12/24	V for			45 30 057	
charging 1 device Vehicle connector cable 12/24 V DC for		(requires adapter 83 25 736)		83 21 855	
charging up to 5 devices	V DO IOI	(requires adapte	1 00 20 7 00)	00 21 000	
Vehicle mount		(requires adapter for power plug 83 25 736 and vehicle connector cable		83 27 636	
Venicie mount					
		12/24 V DC 83	21 855)		
Pump accessories					
Dust and water filter for pump i	nlet	(included in devi	ice when pump option is	83 19 364	
· ·		selected)			
		(المعادية ما المعامية)	ice when pump option is	83 26 820	
		•	ice when pump option is	00 20 020	
		selected)	ice when pump option is		
Accessories for Photoionisatio	on Detector	•		-	
Accessories for Photoionisatio	on Detector	•	ce when pump option is		
	on Detector	•		68 13 769	
(PID)		•			
(PID) Pre-tube holder	) tubes)	•		68 13 769	
(PID) Pre-tube holder Pre-tube benzene (package, 10	) tubes)	•		68 13 769 81 03 511	

Tube opener TO 7000		64 01 200
Leather case set for photoionisation		83 27 639
detector, incl. Leather case for the device		
PID lamp cleaning set		83 19 111
Probes and hoses		
Telescopic probe 100	Connection for filter is included in order no. 83 19 364 (dust/water filter).	83 16 530
Telescopic probe 150, stainless steel	Connection for filter is included in order no. 83 19 364 (dust/water filter).	83 16 533
5 m FKM hose, 3.2 mm, with adapters		83 25 705
10 m FKM hose, 3.2 mm, with adapters		83 25 706
20 m FKM hose, 3.2 mm, with adapters		83 25 707
45 m FKM hose, 3.2 mm, with adapters		83 28 212
Float probe EPP,		83 25 831
incl. 3 m hose, 3.2 mm		
Float probe EPP,		83 25 832
incl. 10 m hose, 3.2 mm		
Float probe (transparent),		83 27 654
with adapter		
Additional probes, hoses and accessories a	are available from Dräger. Please contact us.	
Calibration accessories		
Dräger X-am <sup>®</sup> 8000 calibration adapter		83 26 821
Dräger X-dock <sup>®</sup> Module Dräger		83 21 893
X-am <sup>®</sup> 8000		
Dräger X-dock <sup>®</sup> Module Dräger		83 21 894
X-am <sup>®</sup> 8000+ charging		
Dräger X-dock <sup>®</sup> 5300 (Dräger		83 21 882
X-am <sup>®</sup> 8000) with Master		
Nonane tester		83 25 861
Test gases		Please contact Dräger.
Accessories for measured value acquisition and configuration		
Dräger CC Vision		Freeware (www.draeger.com/software)
Dräger GasVision Licence Key		83 25 646
USB Dira Dongle / IR interface		83 17 409
Holder for USB Dira Dongle		83 25 859
Other accessories		
Protective rubber boot, removable		83 25 858
Leather case for the device		83 27 664
Transport case (empty)		83 27 661
Protective Display cover (set of three)		83 26 828
Shoulder strap (complete)	(included as standard)	83 26 823
Retractable lenyard	· · · · · · · · · · · · · · · · · · ·	83 23 032
Holder for labels (on strap)	(included as standard)	83 26 824
Adhesive labels for individual inscriptions,		83 27 645
Addresive labels for individual inscribions		
		0027 040
for holder on strap, silver (set of 5) Pedestal for holding device upright, e.g.		83 25 874

Transponder reader for reading the integrated RFID transponder (optional)

65 59 283

Notes

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