

### The Revolution

Ai Healthcare is a family owned business based in Cardiff, South Wales, We have been supporting Dentists since 1999, providing maintenance and equipment support to private and NHS organisations across the UK.

The Company recently bought Cestradent McKesson Sedation which was a famous UK manufacturer of Gas Sedations Systems. The family run business has been developing and manufacturing sedation systems in the UK since 1938. Ai Healthcare are now the custodians of this great legacy, and are proud to continue the important work of these timeless pioneers.

Ai Healthcare is the exclusive UK Distributor for the Baldus range of Nitrous Oxide Sedations Systems from Germany. This is also a family run business with a rich history in developing world class and innovative Gas Sedation Systems.

The Baldus brand evokes style, uncompromising quality and a commitment to develop the best products to meet the challenges of the future. With Baldus Nitrous Oxide systems, we have taken a step further.

# We have taken the revolution of dental nitrous oxide sedation into our hands.

Ai Healthcare recognise that dentists want to adopt new technologies with practical solutions, that are easy to use in practice. Our products meet these requirements with new developed technology and unique systems. We help dentists improve patient outcomes and welfare by reducing unnecessary stress.

By focusing on high quality products, strong innovation and modern design, the Baldus solution is simply superior, convincing in every sense: hygiene, function, design, efficiency, safety and compliance.





# Dental Nitrous Oxide Sedation

Anxiety free experience with Nitrous Oxide Sedation. Baldus has the solution for you and your patients.

It is estimated across Europe that up to 60% of the population fear the visit to the dentist. 20% of this percentage are considered to be highly anxious, and up to 10% avoid dentist completely due to severe anxiety.\*

Inhalation sedation with nitrous oxide and oxygen – is suitable for all ages.

Patient's fear or anxiety will be greatly reduced which will make for a far better atmo- sphere for both the patient and dentist, enabling for a better and more efficient treatment.

Nitrous oxide, or  $N_2O$ , has been used successfully for more than 160 years in dentistry. The mix of  $N_2O$  and  $O_2$  is the safest and most researched and oldest sedation method. It's safe and nontoxic and when treatment is finished, the patient is given 100% oxygen, and within 15 minutes after session the patient is  $N_2O$  free. Importantly, unlike general anaesthesia, the patient is fully conscious and able to communicate.

How does nitrous oxide work? During the treatment oxygen and nitrous oxide are mixed specifically to the patient's needs. It starts with 100% oxygen then  $\rm N_2O$  is raised successively until desired sedation is reached. While the patient is inhaling and exhaling the oxygen-nitrous oxide mixture, you and your team can start the treatment. At the end of the treatment and after receiving 100% Oxygen, the patient is lucid and able to communicate rationally being  $\rm N_2O$  free.

## The advantages of Nitrous Oxide Sedation

### Reduction of pain sensitivity

20% nitrous oxide has the same analgesic potency as 15mg morphine sc.

### A more gentle sedation

No anaesthesia – patient is conscious and cooperative.

### Reduced gagging reflex

Decreased gagging reflex and retching makes treatment faster and more comfortable.

### Efficiency & time saving

A patient with less anxiety is more cooperative and can be treated much more efficiently.

### **Titration**

Optimal sedation by individually adjusted nitrous oxide mixture.

### No adverse effects

Gentle sedation. No metabolism (< 0.1 %). Recovery occurs within a few minutes. Fit to drive within 15 minutes.

#### Reduced risks

 $N_2O$  is a sedative with the lowest side effects.

### Millions of patients

Millions of patients worldwide have been treated with nitrous oxide and have overcome anxieties relating to dental treatment. Most patients would choose nitrous oxide again.

### **Marketing & service**

Nitrous Oxide Sedation can be a unique selling point with a positive marketing effect for your practice.



### The 21<sup>st</sup> Century Mixer Unit The Baldus® Touch

Images shown in this brochure are for illustrative purposes only and may differ from UK specifications.



### **Baldus® Touch**

### Elegance combined with high technology.

Our everyday lives are unimaginable without the use of touchscreens. The Baldus® Touch is the next generation of digital oxygen – nitrous oxide mixer units. The new display menu functions and system settings give the Baldus® Touch the status of a modern and distinctive mixer unit on the dental nitrous-oxide market.

### **High-technology**

- Touch-function: High resolution screen.
- Recording: Patient ID and Parameters.
- Thermic measurement: pressure and temperature independent, faster reaction time.
- Software & Hardware Watchdog Safety.

#### **Baldus® Touch features**

- Recovery button: 100% O<sub>2</sub> Flush, Countdown clock.
- Error memory: Error log recorded in memory for data and analysis.
- Flow 18L/PM: Breathing Bag will fill sufficiently for anxious patients.



### Safety standards

- Self-test at power on, also in Standby mode.
- Nitrous oxide lock when lack of oxygen.
- Acoustic and visual information signals.
- User-friendly single button control.
- Red O₂-Flush-Button for immediate, 100% oxygen supply.
- Non-rebreathing valve on the Bag-T.
- Ambient air valve on the Bag-T.
- 0, Demand Mask-Port.
- Standard coding of the gas types.

### Hygienic design

- Fast and easy cleaning due to flat fronts and rounded corners.
- Intelligent placement of the ambient air valve under the Bag-T protects from dust and other pollutants.
- Filters where the gas enters to keep any impurities away.
- Microbiological testing: requirements regarding the hygienic standards during production and packing are 100% fulfilled.





- US Patented
- Touchscreen
- Automatic data documentation
- Automatic lead out by recovery button
- Maximum total flow of 18 l/min
- O<sub>2</sub>-Flush-Button
- Self-test-function & error memory
- Software & Hardware Watchdog
- Thermic measurement



## **Mixer Unit**

### Baldus® Touch O<sub>2</sub>/N<sub>2</sub>O Mixer for Analgesia.

- Digital mixer unit controlled via HQ touchscreen.
- Max. mixing concentrations: 50%, 60%, or 70% N<sub>2</sub>O (Standard: 70%).
- Precise mixing ratio adjustment via % arrow key.
- Automatic flow adjustment with single-button control.
- Oxygen flush for immediate oxygen supply via red-signal button.
- Premium safety package with acoustic and visual alerts.
- Self-test function.
- Automatic N<sub>2</sub>O stop if oxygen supply is insufficient.

- Non-rebreathing valve on Bag-T.
- Ambient air valve (when reservoir bag is empty).
- Gas type connection coding.
- O<sub>2</sub>-demand mask port.
- USB port.
- Mixer unit can be installed in All-in-One Cart 15005T, hollow wall, or unit door.
- Input voltage: 110/230V AC, 50-60Hz.
- Dimensions (H x W x D): 136 x 300 x 119 mm.
- Weight: 2.5 kg.
- US Patent No. 10,065,159 B2.
- German Innovation Award Winner 2019.

Article Number	Article
16010-50	Baldus® Touch-50% N <sub>2</sub> O
16010-60	Baldus® Touch-60% N <sub>2</sub> O
16010-70	– —————Baldus® Touch-70% N₂O



# Baldus® Analog

Work smarter, not harder. Baldus® Nitrous Oxide Sedation.

### High-quality robust material

 Rugged in design and with over 92% of the mixer unit manufactured in Aluminium and Stainless Steel.

### Hygiene

- Hygienic and easy to clean.
- Fresh air valve which is under the Bag-T to prevent infiltration of dust and other pollutants.

#### **New features**

- Acoustic Alarm in the event of oxygen failure (decrease in pressure under 3 bar).
- Tamper-resistant: Opening the mixer is only possible with a purpose-built-in tool.
- Maximum flow of 15 I/min ensures the bag is always sufficiently filled.
- Centrally-placed O<sub>2</sub> flush button for a 100% oxygen supply and a quick reaction.
- Easily-readable nitrous oxide concentration: Baldus® Analog displays the percentage of nitrous oxide concentration and not the oxygen concentration no need to convert the gases concentration, therefore less misjudgement.



### **Mixer Unit**

### Baldus® Analog O<sub>2</sub>/N<sub>2</sub>O Mixer for Analgesia.

- Max. mixing concentration: 50%, 60%, or 70% N<sub>2</sub>O (Standard: 70% N2O).
- CE certified.
- Precise mixing concentration adjustment via %-N<sub>2</sub>O regulator.
- Automatic output flow adjustment with increased N<sub>2</sub>O intensity (single-button operation).
- ISO color coding.
- Red O<sub>2</sub> flush button for immediate oxygen supply.
- Premium safety package.

- Automatic N₂O stop and advisory tone in case of insufficient oxygen.
- Non-rebreathing valve.
- Ambient air valve (when reservoir bag is empty).
- Gas type connection coding.
- O<sub>2</sub> demand mask port.
- Emergency ventilation mask connection.
- Dimensions (H x W x D): 270 x 155 x 148 mm.
- US Patent No. 10,065,159 B2.

Article Number	Article
16009-50	Baldus® Analog-50% N <sub>2</sub> O
16009-60	Baldus® Analog-60% N <sub>2</sub> O
16009-70	Baldus® Analog-70% N-O



# **Packages**

Item Number	r Product		Baldus® Analog Set
16010	Mixer Unit 'Baldus® Touch O <sub>2</sub> /N <sub>2</sub> O Mixer for Analgesia'		
16009	Mixer Unit 'Baldus® Analog O <sub>2</sub> /N <sub>2</sub> O Mixer for Analgesia'		
16024-1	Baldus® Adult Double Mask Scavenger System, the package includes: autoclavable outer mask and inner mask, complete hose system and hose connectors	4	4
16002	Baldus® Vacuum Control Block with regulator valve	4	4
15015-3L	3-Liter Adult Reservoir Bag, latex free and autoclavable	4	4
15020	Ultraslim Cylinder Pressure Regulator O₂ including medical hose	4	4
15021	Ultraslim Cylinder Pressure Regulator N <sub>2</sub> O including medical hose	4	4
15004S	All-in-One-Cart Ultra Slim, encased portable cart for Baldus® Touch and Analog O <sub>2</sub> /N <sub>2</sub> O Mixer, Dimensions: 108 x 38,5 x 29 cm, 25 kg, Colour: matt white	4	4
	Marketing-Package: video with english subtitles for waiting room, information flyer for patients and medical devices book	4	4





# **Baldus Touch/Analog**

One device, endless possibilities.





### Tailored design to complement your practice.

Customise your Nitrous Oxide Cart to match your practice's interior or personal style. Choose from a wide range of RAL colour glass covers, with high-gloss or matte finishes. For a premium touch, opt for a solid wood version, such as oak, for an elegant look.

Article Number	Article	
15010GRAL	Glass covers available in all RAL colours	
15010S	Special surface finish	
15010H	Special Edition: Solid wood	



# Baldus® Scavengersystem

The environmentally friendly companion for inhalation sedation with nitrous oxide.

### **Sustainability**

- Eco-friendly mask system.
- All parts (tube, masks, connectors) are autoclavable.
- Cost-saving with no disposable items.

### Handling

- Unrestricted space for dentist and team.
- Easy to handle and set up.
- Clear markings and various sizes for quick setup.
- Translucent mask allows continuous observation of breathing.
- Compatible with all oxygen-nitrous oxide mixer units.

### **Safety**

• Special focus on the Scavenger System.

#### **Material**

- Soft, translucent silicone.
- Latex-free and autoclavable.
- Biocompatible.

#### **Patient Comfort**

- Soft material prevents pressure marks.
- Oval membrane reduces exhalation resistance for smooth gas discharge.
- Larger inner mask volume for optimal airflow.



# How does the Baldus® Scavenger Breathing System work?

When the patient exhales, the membrane in the inner mask opens, allowing the exhaled gas to enter the outer mask. The suction in the outer mask is separate from the inner mask, enabling the patient to breathe freely without resistance. This reduces the 'straw effect' seen in other mask systems.

The double nasal mask system effectively protects the dentist and their team from exhaled gases. The soft, autoclavable nasal masks are easy to replace and are available in various sizes for adults and children, as well as different colours and flavours.



### Inhalation phase

Delivery of the oxygen-nitrous-mixture.



### **Exhalation phase**

The exhaled gas flows through the oval membrane.







Article Number	Article
16056	Double Mask Scavenger System with Vacuum Control Block, including single-use double nasal masks (3 x Adult, Blueberry Dance aroma and 3 x Pediatric, Strawberry Delight aroma).
16055	Double Mask Scavenger System, including single-use double nasal masks (3 x Adult, Blueberry Dance aroma and 3 x Pediatric, Strawberry Delight aroma) (excluding Vacuum Control Block).

### Autoclavable Baldus® Double Nasal Masks

### Baldus® Double Mask



Autoclavable outer and inner mask.

Article Number: 16025
Baldus® Double Mask Adult

Article Number: 16031
Baldus® Double Mask Pedo

Does not include connectors

### Baldus® Inner Mask



Autoclavable inner mask.

Article Number: 16027Y
Baldus® Inner Mask Adult

Article Number: 16033Y Baldus® Inner Mask Pedo

Does not include connectors

### Baldus® Outer Mask



Autoclavable inner mask with membrane.

Article Number: 16026
Baldus® Outer Mask Adult

Article Number: 16032
Baldus® Outer Mask Pedo

Does not include connectors

**Material:** Material: Nasal Masks – 100% medical silicone (latex-free). Compatible with: Double mask scavenger systems from Baldus®, Porter, and Accutron; other systems available upon request.

# Double Nasal Masks Single Use



### Innovations at a glance.

### Design

- Double hood design minimises ambient nitrous oxide in the operatory.
- Oval exhalation valve directs exhaled gases to the inner hood's built-in scavenger flow channels for maximum efficiency.

#### **Profile**

- Accurate fit! The inner hood seals to the face for proper gas delivery.
- Size matters! Smaller profile improves sight line visibility for dental staff and access to the oral cavity.

#### **Material**

- Soft inner hood enhances seal and patient comfort.
- Clear outer hood sits closer to the face, improving scavenging efficiency and allowing visual monitoring of breathing.
- Latex-free material protects patients and staff with latex allergies.

### Compatibility

 Universal fit with other double scavenging circuits, allowing use with existing systems and the new Baldus Double Nasal Hoods.

### Available in 6 scents. Each box contains 12 individually packed pieces.



## **Upgrades**

Double Nasal Masks. Single Use.



# Acrylic Glasses and LED Board for Decorative Presentation of Scented Masks.

- Acrylic Glass with Lid: Includes 12 mixed buttons. Dimensions: 300 x 120 mm.
- LED Board: Designed to hold 3 acrylic glasses.
   Standard colour: Matt White (RAL 9010); additional colours available upon request. Dimensions: 52.5 x
   21.5 x 4 cm. Features RGB LED lighting with remote control. Power supply: 230 V ~ 12 V.

Acrylic Glass with Lid	Article No.
Happy Apple (Apple)	16032-A
Blueberry Dance (Blueberry)	16032-Blue
Bouncy Bubble (Bubble- gum)	16032-Bub
Strawberry Delight (Strawberry)	16032-E
Chilla Vanilla (Vanilla)	16032-V
Pure Ghost (Unscented)	16032-G
LED Board for 3 acrylic glasses	16045



### **AiHealthcare**

Dental | Medical | Imaging | Compliance

+44 (0) 330 223 4350 info@aihealthcare.uk www.aihealthcare.uk













