



DENTA
SONIC

Instruction of use

IPR-EVO[®]

interproximal reduction
evolution

Universal
brushless motor for:

- **IPR**
- **Finishing, Polishing**

Features:

- **Torque sensor**
- **Acoustic alarm**



SWISS IPR
INNOVATION

UNIVERSAL USE



IPR Program

Suitable for DentaSonic DiaStrip, and all automatic strip on the market today



Endo Program

Suitable for all endo file with RA shank (2,35mm conrtriangle)



Polishing Program

Suitable for all finishing, and polishing strips and discs with RA shank (2,35mm conrtriangle).

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Foreword

Thanks for using the cordless endo motor. For the sake of safety and efficient using of this product, please read this manual carefully.

This equipment meets the national standard: GB9706.1 M2007, medical electrical equipment Part 1 and general requirements for safety.

Protection against electrical shock: class II, type B We'll take the responsibility for the product's safety, reliability and property under the following conditions:

1. Installation, commissioning and maintenance of the equipment should operate by professionals approved by our company or who gain national appropriate level qualifications.
2. This equipment should be operated by qualified or approved personnel. Operator should have specialized medical application skills, and work follow the manual.
3. The equipment can't be used in the environment with flammable anesthetic gases mixed with air or nitrous oxide.

This device is a dental instrument, besides dental treatment, please don't use it.

Our company reserves the right to modify the design, technology, accessories, manual and package content for this equipment. Please prevail in kind. If there is difference between pictures and object, please make the object as the standard.

Notice

(The following conditions are not covered by the company's warranty)

1. Faults and damage caused by poor maintenance or without authorization.
2. Faults and damage due to any Refitting are unauthorized.
3. Faults and damage result from factor of other company's products.
4. Faults and damage result from using non specified spare parts when maintaining equipment.
5. Fault and damage because of failure to comply with the precautions and operation method described in the manual.
6. Faults and damage due to inappropriate environment for operation, such as the environment for supply, installation etc.
7. Faults and damage caused by earthquakes, floods, lightning and other irresistible factors.
8. The user did not install and use base on the electromagnetic compatibility information provided in the random file
9. Use due to strong electromagnetic interference, such as close to the mobile phone, microwave oven and other portable and mobile RF communication equipment may affect the IPR-EVO performance.

Caution

The equipment or system shall not be used close to or stacked with other equipment. If it must be used close to or stacked, it shall be observed and verified to work properly in the configuration used.

In addition to transducers and cables sold by the manufacturer of the equipment or system as spare parts for internal components, the use of non-prescribed accessories, transducers and cables may result in increased emission or reduced immunity of the equipment or system.

Use with equipment and systems of non-specified accessories, transducers or cables may result in increased emission or reduced immunity of equipment or systems.

01 Introduction

Cordless endo motor is a professional equipment for root canal treatment. It converts electrical energy into mechanical energy, and then controls the rotation and transmission through the motor. It uses micro motor to achieve the purpose of expanding the root canal in the root canal treatment. Cordless hand piece delivers freedom of movement.

Features

1. Lightweight, ergonomic design, easy to carry.
2. With 16:1 and 1:1 electric contra angle.
3. The equipment will auto-reverse or auto reverse & stop, auto-stop according to different torque and resistance.
4. Use soft starting and stop, provide convenient operation and protect the file from broken when suffer Instant Impact.
5. It could store 9 programs. The parameter could be preset or modified according to actual operation.
6. Built-in recharging and high capacity battery not only brings convenience of replace battery, but also save the cost.
7. Electric contra angle are autoclave sterilization up to 135°C.
8. LED light

02 Range of application and contraindications

Cordless endo motor applies to stomatology. It use to expand the root canal in the root canal therapy such as pulp necrosis, chronic pulpitis, chronic apical periodontitis (Incl. perleplcal grenulome, perlaplcal abscess end perlaplcel cyst), pulp-periodontal syndrome and for who has system disease which not suitable for teeth extraction but In need of treatment or keep offending teeth temporarily, IPR and finishing and polishing.

Contraindications

It can't be used with high frequency surgical equipment.

Heart patients use it with cautious!

People who use Implantable electron le devices llke heart pacemaker are not suitable to use it without doctor's advice.

03 Technical parameter

Model: IPR-EVO 1

Degree of protection against harmful Into the liquid: Common equipment (not anti-closed inlet device), Operational Mode: Continuous operation

Main Unit

Battery Voltage: 3. 7Vdc
Battery capacity: 1050mAh
Net weight: 200g

Adapter

Adapter voltage AC: 100-240V 50/60Hz
Output voltage: 5Vdc
Output current: 1A

Note:

Users are not allowed to replace the battery by themselves.
The replacement shall be made by the manufacturer or authorized dealer.

1. Rotation speed reaches the speed range of 800 to 1000 rpm
2. 3 - 3,5N torque
3. When the torque reaches the alarm sound, it usually reaches 2.5N; the stop is 3N

FDA Owner Operator Number: 10051861

SGS: ISO 13485:2003 CE Conformity

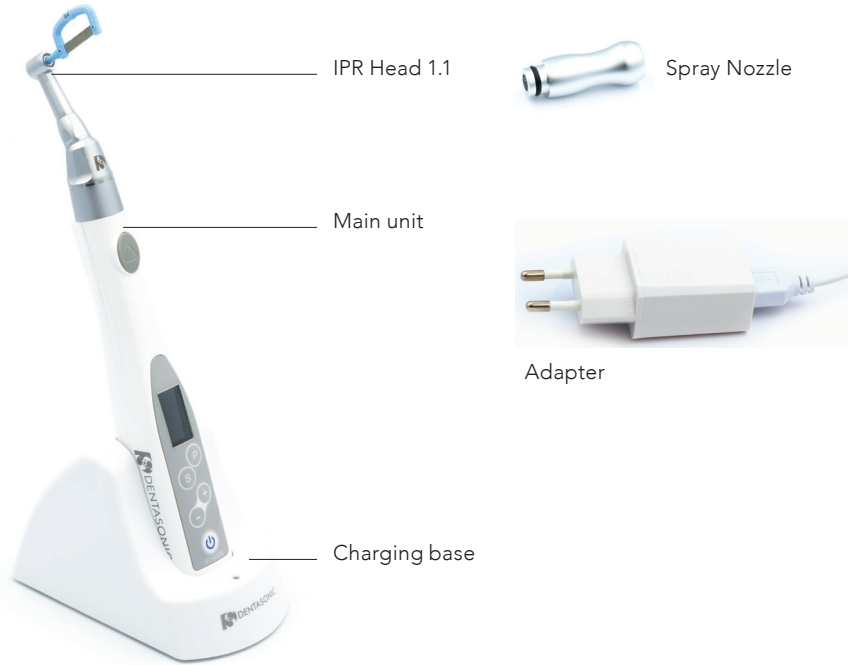
04 Structure

Model: IPR-EVO 1

Structure

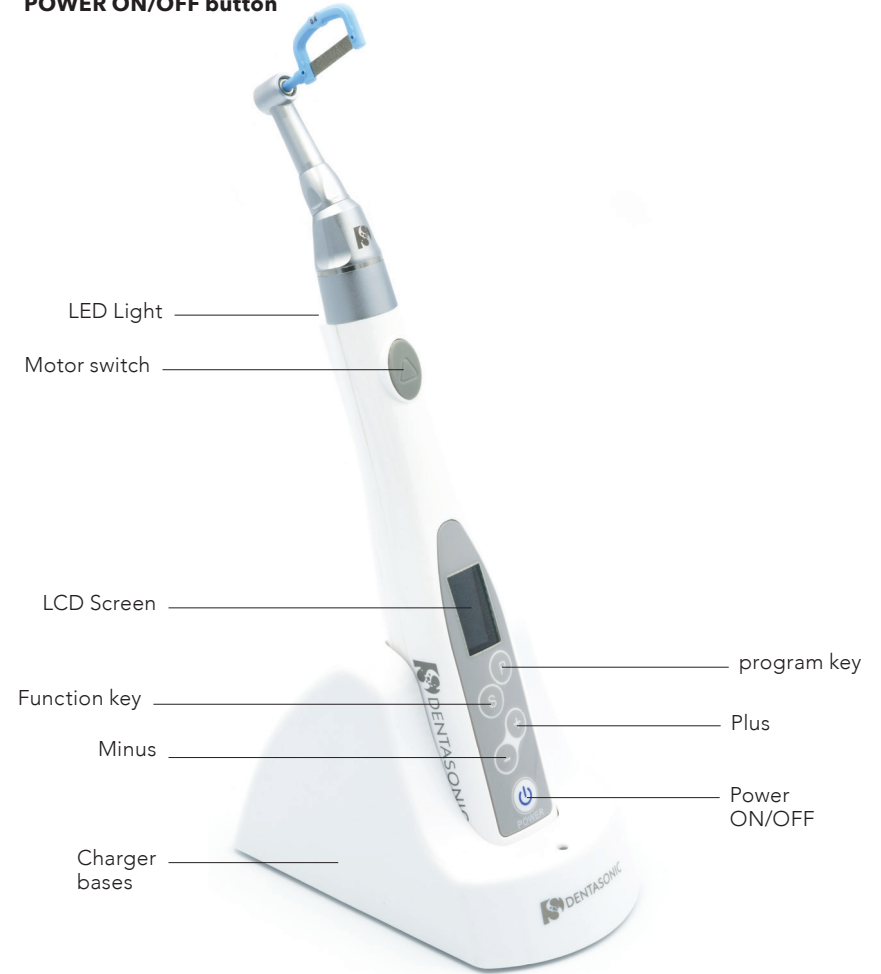
1. IPR Head 1.1
2. Main unit
3. Charging base
4. Adapter
5. Spray nozzle
6. LED lamp. Not for IPR

05 Operation panel introduction



pic. 01

POWER ON/OFF button



pic. 02

IPR-EVO

interproximal enamel reduction evolution

Multitalent IPR-EVO The evolution in IPR

Cordless and safe

IPR-EVO is an easy-to-use universal system that is safe and effective in use.

Safety functions for Endo

1) Torque control

The torque control stop to work when the set torque is reached.

2) Torque sensor,

The torque sensor ring up when the set torque is reached, and stop to work.

Safety functions for Endo

The autoreverse and auto-forward modes with automatic safety stop minimize the risk of file breakage.

Small head

The extremely small head enlarges the field of vision and offers the best possible access to the treatment site.

Maximum comfort

Ergonomically shaped drive hand-piece for comfortable and fatigue-free working.

360° rotating contra-angle attachment

The contra-angle attachment can be attached to the drive handpiece as required. This means flexible handle positions during treatment.

Technical details



RA contra-angle rotating head 16:1 and 1:1 can also be used with LED light

Name:	IPR-EVO	IPR-EVO Head	Endo Head	Finishing Head
Article Ref.	IPR-EVO1	IPR-H1	EH-2	FP-3
Light:	yes	no	yes	yes
Stroke / movement:	rotating	0.9mm reciprocating	rotating	rotating
Transmission Ratio:		silver (ring) 1:1	green (ring) 16:1	silver (ring) 1:1
Speed:	140 - 600 min ⁻¹	max 4'000 min ⁻¹	140 - 600 min ⁻¹	max 3'000 min ⁻¹

IPR-EVO reciprocating head 1:1

IPR-EVO reciprocating head 1:1. Speed, Torque, Working mode can be adjusted.
Speed: 1400-5000 rpm adjustable Torque: 0.6-4.0N.cm adjustable

IPR-EVO, Restoration

compatible with all automatic strips and other brands like (Dentsply, Dentatus, Intensiv).

All DiaStrip All Proxo file

RA contra-angle rotating head 16:1

RA contra-angle rotating head 16:1. Speed, Torque, Working mode can be adjusted.
Speed: 1400-2000 rpm adjustable Torque: 0.6-4.0N.cm adjustable

FINISHING / POLISHING

Brushes Discs Polishers

RA contra-angle rotating head 16:1

RA Endo files

Speed, Torque, Working mode can be adjusted.
Speed: 140-600 rpm adjustable Torque: 0.6-4.0N.cm adjustable

ENDO

IPR-EVO handpiece drive	
Battery type:	Li-ion
Battery voltage:	3.7 V
Rated capacity:	1050 mAh
Torque range / Torque stages	0.6 - 4.0 Ncm / 0.6 / 0.7 / 0.8 / 0.9 / 1.0 / 1.1 / 1.2 / 1.3 / 1.4 / 1.5 / 1.6 / 1.7 / 1.8 / 2.0 until 4.0 Ncm
Weight:	120 g

EH-2 contra-angle head	
Transmission ration:	16:1
Coupling system:	Dentasonic coupling
Recommended root canal instruments:	Files for rotary root canal preparation at 300 min ⁻¹ with a shaft of Ø 2.35 mm
Weight:	20g
Hygiene:	thermo washer disinfected / sterilizable

Charging station	
Main voltage:	100-240V 50/60Hz standart EU for US plug, please ask
Permissible voltage fluctuation:	+/- 10%
Frequency:	50 - 60 Hz
Power:	5W
Weight:	60g

Power ON: Press the **POWER ON/OFF** button more than 2 second to turn on the equipment.

Power OFF: Press the **POWER ON/OFF** button again to turn off the equipment.

Motor switch

After turn on the equipment, press motor switch start to work. Press It again, the motor will stop.

Function key----S

Press function key, can be adjusted speed, Torque and Working mode

Order is: Speed(SP)----Torque(TQ)----

Working mode--- Save

When the option flickers, the data can be adjusted. When setting the data, press **S** to save the data in the current program number.

Program key-----P

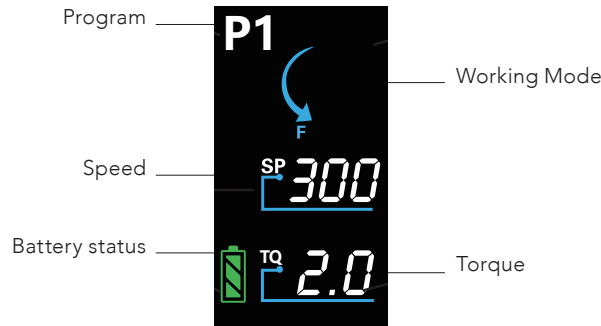
Press"**P**", working program is Selectable (**P1-P9**)

Unit of per mode: Speed: rpm Torque: **N•cm**

This instrument is equipped with 16:1 angle head, and with 1:1 IPR angle head

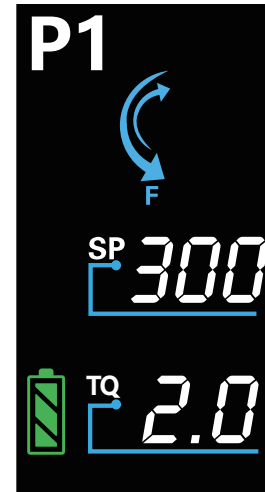
Please select according to the following range of angle head parameters:

Speed (rpm):	140~600	Speed (rpm):	140~600
Radio:	16:1	Radio:	1:1
Torque (N•cm):	0.6~4.0	Torque (N•cm):	0.6~4.0



pic. 03

Endo Head Usage Program: P1 - P7



pic. 04

Program Code: P1, P6

Speed, Torque, Working mode can be adjusted.

Speed: 140-600rpm adjustable

Torque: 0.6-4.0N.cm adjustable

Working mode

Stop working when the resistance exceeds the setting torque.

Keep running then stop when the resistance exceeds the setting torque.

In forward mode, auto-reverse when the resistance exceeds the setting torque.



pic. 05

Program code: P7

Speed can be adjusted

Torque: ----

Working mode

Reverse mode, when encountering resistance, speed-up and increase the torque.

When the resistance is too large, stop working, the resistance decreases, and restart.

IPR Head Usage Program: P2 (adjustable IPR Program)



pic. 06

Program Code: P2 IPR-Low

Speed, Torque, Working mode can be adjusted.

Speed: 200-300rpm adjustable

Torque: 2.5-4N.cm adjustable

Working mode

Stop working with acoustic alarm when the resistance exceeds the setting torque.

Instruction how insert and remove the IPR strip, see page 18

Finishing Usage Program: P3



pic. 07

Program Code: P3 Finishing, Polishing

Speed, Torque, Working mode can be adjusted.

Speed: 200-400rpm adjustable

Torque: 0.6-2N.cm adjustable

Working mode

Stop working with acoustic alarm when the resistance exceeds the setting torque.

Program code:

P2 IPR-Low

Speed, Torque, can be adjusted.

Speed: 200 - 300rpm are low

Torque: 1.5 - 2.5N.cm adjustable light pressure

Program code:

P2 IPR-Medium

Speed, Torque, can be adjusted.

Speed: 250 - 400rpm adjustable are medium

Torque: 2 - 3.5N.cm adjustable medium pressure

Program code:

P2 IPR-High

Speed, Torque, can be adjusted.

Speed: 200 - 500rpm adjustable are high

Torque: 2.5 - 4N.cm adjustable strong pressure

Program code:

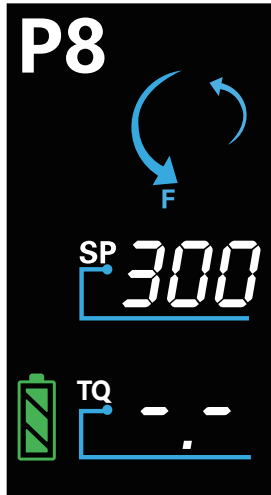
**P3 Contouring,
Finishing, Polishing**

Speed, Torque, Working mode can be adjusted.

Speed: 200-400rpm adjustable

Torque: 0.6-4N.cm adjustable

Program code: P8-P9



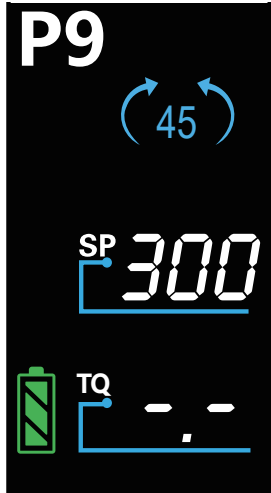
pic. 08

Program Code: P8

Speed: 140-600rpm adjustable
Torque: -----

Working code

Forward working, When encountering resistance, speed up and increase the resistance. When the resistance is too large, stop working, the torque encountered decreases, and restart the work.



pic. 09

Program code: P9

Speed: 160-300rpm adjustable
Torque: ----

Working mode

Forward 45°, reverse 135°

06 Usage method

Charging

1. Connect the charging base with adapter. The charger indicator light will **ON**.
2. Put the main unit in the charger base, charger base is without other thing, the light is on when you put it in correct.
3. It will be fully charged in about 3 hours.

Loading & Unloading Electric angle head

Connect the electric angle head with main unit, locating pin of the electric angle should be placed in the locating slot of the main unit until you hear "click" sound. Please take off the angle head in parallel and straight direction.

Notice: Please turn off the motor when loading or unloading the angle head (Refer Pic. 10)



Angle head joint



Motor joint



Positioning pin



Positioning groove

pic. 10

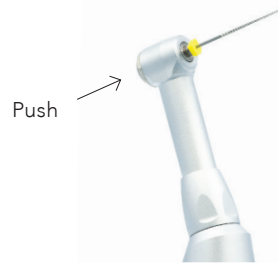
Loading & Unloading file

Insert the file into the rotary shaft hole of the angle head, gently rotate to find the corresponding position with the half-round part of the file. After finding the position, insert a part first, do not press thback cap on the angle head, and then press the file into the angle head with a slightly larger force. When the sound of "cut" is heard, the file is connected to the angle head. When taking out, press and hold the button above the angle head while pulling the file out of the head.

Notice:

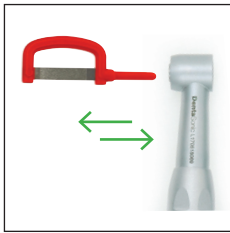
Before loading or unloading, please turn off the motor. When loading the bur, please pull the file several times to make sure it's fixed well before using it.

Please make sure the file is clean, if dirt things get into the head, it will lead to the file vibration.

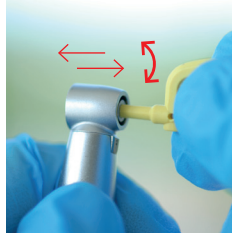


Insert and remove the strip from the head

How insert and remove correctly the strip form the head see instruction here:



insert and remove



Hold the strip, pull out and turn left and right (as a key)



How hold the strip on correct way



How to never hold the strip!

Operation

Long press the **POWER ON/OFF** button: Motor starts work

Press the Motor switch: file starts rotation

Press the Motor switch again: bur stops rotation.

After treatment

After treatment, press the Motor switch, file stop working. Long press **POWER ON/OFF** button, machine turns off. Take off the electric contra angle head from main unit, and then cover the motor cap.

If no operation about 5 minutes, power will auto turn off.

Last program settings can be memorized when the power turns on.

07 Cautions

1. Don't use damaged, winding or unqualified files, it will cause accident if use.
2. Please comply with the file speed by manufacturer appointed when using.
3. Don't put or use this product in the strong sunshine place or near high temperature place.
4. Please pay attention when put the main unit in the charger base, the operation panel should be outward, misdirection will damage the product or can't charge.
5. Don't put the lubricating oil in the main unit or don't put the main unit in autoclave sterilization.
6. Our product is not water-proof. Don't let water or liquid in it, to avoid short circuit, rusting or discoloring.
7. Don't drop the main unit and the charging base, don't use other adapter.
8. Please use the configured adapter when charging, don't use other adapter.
9. Please use the electric contra angle provided or approved by our factory, otherwise it maybe cause the misoperation.
10. Please don't use our product in the electromagnetic environment of strong magnetic field and strong electric field.

Install & Uninstall LED Lamp

Insert the light strip into the socket first, then fasten the light strip.

Please install before use!

After the motor stop working, the lights turn off for about 3 seconds.

Can be removed.



We advise:

The LED Strip are made onyl for ENDO, as also finishing and polishing heads. Not for IPR

08 Troubleshooting

If the product is found to be in abnormal operation during use, please refer to the following methods for maintenance and adjustment.

Problem	Reason & Solution
Doesn't work:	<ol style="list-style-type: none">1. No power, please charge it.2. Press the ON/OFF button in short time, please press the ON/OFF button more than 2 seconds.3. POWER ON/OFF button is broken: please contact the dealer or manufacturer.
No charging display:	<ol style="list-style-type: none">1. Doesn't connect well with adapter, please pull out and try it again.2. There are other things in the bottom of the machine or changing base, please clean it.3. Doesn't put the main unit in the right place of the charging base.

If the above methods are still not working properly, please contact the dealer or our company.

09 Maintenance

If not using for a long time, when you reuse it, please check it works normally and safely or not. If not using for a long time, please make sure to charge it every month, in order to protect the working life of the battery.

From the purchasing date, the working life is about 5 years.

Please clean the surface of the main unit by soft cloth with neutral detergent, and then using wet cloth to clean it.

Note: It is forbidden to wipe the banana oil, oil (light gasoline) and so on. Do not put the machine in the sun or near the fire, so as not to cause battery explosion.

If the instrument reaches the service life and the parts are damaged and scrapped, it should be handled according to the local medical equipment scrapping regulations.

Contra angle head

1. **Lubricating:** Twist the nozzle into the oil outlet of the spray lubricant, remove the file from the angle, as shown in *Pic 12*, insert the outer sheath of the angle, and spray inwardly shoot for at least 2-3 seconds, until the oil comes out of the IPR head, keep the Spray can upright.
2. After that, remove the spray nozzle and clean with a paper towle the head.
3. Autoclave the head for 12 min at 135°C.

E-type Spray Nozzle



pic. 12

Note: it is recommended to use "disassemble" cleaning and maintenance method every time. After the contra angle is reloaded, please load the motor and run for 1 minute to ensure the uniform distribution of lubricating oil



10 Sterilization

Please sterilization only for the electrical contra angle.

Autoclave Sterilization

Using brush (don't use metal thing) to remove dirt on the surface, then cleaning it by soft cloth with alcohol. The limited temperature of Autoclave sterilization is 135°C (For example, 120°C for 20 min, 132°C for 15 min).

Please put it in a sterilization bag and keep it in clean place if not use.

Notice:

Please sterilization only for the electrical contra angle. Because of the base layer of the autoclave is near the heat source, high temperature, so it would be better put it in the middle or top layer.

Strongly acidic water is strictly prohibited for use, also don't use sterilization liquid to washing, dipping, wipe the product.

11 Transportation and storage

Storage Condition

Temperature:	-10°C~50°C;
Humidity:	<80%;
Atmospheric pressure:	70KPa~106KPa.
Environmental conditions:	Not near from fire equipment or flammability material
Transportation:	Suitable for common mode of transportation, please handle

12 Product list

– Main unit	1
– Charging base	1
– Electric angle head (16:1)	1
– Electric angle IPR head (1:1)	1
– Adapter	1
– Spray nozzle	1
– User manual	1
– LED Lamp	2 (only for Endo), Not IPR

13 After-sale service

It's 1 year warranty for the main unit and charging base of the cordless endo motor. After 1 year warranty, we will charge you the spare parts fee. 6 monthes warranty for the accessories, such as electrical contra angle, cover and so on. You may buy the spare parts from us if damage or use up.

Note: The company reserves the right to modify the instrument design, product technology, accessories, product manuals and instrument packaging contents at any time. The right without notice. **For some Countries we give 2 years warranty.**

14 Symbols



Cautions! Refer to random file



For door only



Follow the waster of electric and electronic equipment (WEEE) Directive (2002/96/CE) to dispose of the product and accessories.



Class II equipment



Date of manufacture



Manufacturer



High temperature and high pressure disinfection



Type B conforming component

15 Electromagnetic Compatibility

Notice

- IPR-EVO Comply with relevant requirements of YY0505 electromagnetic compatibility;
- Users shall install and use electromagnetic compatibility information provided in random files;
- Use due to strong electromagnetic interference, such as close to the mobile phone, microwave oven and other portable and mobile RF communication equipment may affect the IPR-EVO performance.
- Please see the attachment for guidance and manufacturer’s statement.

Cautions

- IPR-EVO shall not be used close to or stacked with other equipment. If it must be used close to or stacked, it shall be observed and verified to work properly in the configuration used.
- In addition to transducers and cables sold by the manufacturer of the equipment or system as spare parts for internal components, the use of non-prescribed accessories, transducers and cables may result in increased emission or reduced immunity of the equipment or system.

Attachment

Guidance and manufacturer’s declaration - electromagnetic emissions.

The IPR-EVO is intended for use in the electromagnetic environment specified below. The customer or the user of the IPR-EVO should assure that is used in such an environment.

Emissions test	Compliance	Electromagnetic environment - guidance
RF emissions GB 4824	Group 1	The IPR-EVO uses RF energy only for its internal function. Therefore, its RF emissions are very low and are not likely to cause any interference in nearby electronic equipment.
RF emissions GB 4824	class B	The IPR-EVO is suitable for use in all establishments, including domestic establishments and those directly connected to the public low-voltage power supply network that supply network that supplies buildings used for domestic purposes.
Harmonic emissions GB 17625.1	Not Applicable	
Voltage fluctuations/ flicker emissions GB 17625.2	Not Applicable	

Guidance and manufacturer’s declaration - electromagnetic immunity


IPR-EVO is intended for use in the electromagnetic environment specified below. The customer or the user of the IPR-EVO should assure that it is used in such an environment.

Immunity test	IEC60601 test level	Compliance level	Electromagnetic environment - guidance
Electrostatic discharge (ESD) GB/T 17626.2	±6kV contact ±8kV air	±6kV contact ±8kV air	Floors should be wood, concrete or ceramic tile. If floors are covered with synthetic material, the relative humidity should be at least 30%.
Electrical fast transient/burst GB/T 17626.4	±2kV for power supply lines ±1kV for input/output	Not Applicable	Not Applicable
GB/T 17626.5	±1kV line(s) to line(s) ±2kV line(s) to earth	Not Applicable	Not Applicable
Voltage dips, short interruptions and voltage variations on power supply input lines GB/T 17626.11	<5% Ut (>95% dip in Ut) for 0.5 cycle 40% Ut (60% dip in Ut) for 5 cycles 70% Ut (30% dip in Ut) for 25 cycles <5% Ut (>95% dip in Ut) for 5 secs	Not Applicable	Not Applicable
Power frequency (50/60Hz) magnetic field GB/T 17626.8	3 A/m	3 A/m, 50/60Hz	Power frequency magnetic fields should be at levels characteristic of a typical location in a typical commercial or hospital environment.

Note: Ut is the a.c. mains voltage prior to application of the test level.

Guidance and manufacturer's declaration - electromagnetic immunity

The IPR-EVO is intended for use in the electromagnetic environment specified below. The customer or the user of the IPR-EVO should assure that it is used in such an environment.

Immunity test	IEC60601 test level	Compliance level	Electromagnetic environment - guidance
Conducted RF GB/T 17626.6	3Vrms 150 kHz to 80MHz	Not Applicable	Portable and mobile FRO communications equipment should be used no closer to any part of the IPR-EVO, including CV-215, CV-215I, CV-215 GUN,cables, than the recommended separation distance calculated from the equation applicable to the frequency of the transmitter. Recommended separation distance $d=1.2 \sqrt{P}$ $d = 1.2 \sqrt{P}$ 80MHz to 800MHz $d = 2.3 \sqrt{P}$ 800MHz to 2.5GHz
Radiated RF GB/T 17626.3	10V/m 80MHz to 2.5 GHz	10V/m	Where P is the maximum output power rating of the transmitter in watts (W) according to the transmitter manufacturer and d is the recommended separation distance in meters (m). Field strengths from fixed RF transmitters as determined by an electromagnetic site survey, should be less than the compliance level in each frequency range. Interference may occur in the vicinity of equipment marked with the following symbol: 

Note 1: At 80MHz and 800MHz, the higher frequency range applies.

Note 2: These guidelines may not apply in all situations. Electromagnetic propagation is affected by absorption and reflection from structures, objects and people.

Field strengths from fixed transmitters, such as base stations for radio (cellular/cordless) telephones and land mobiles radios, amateur radio, AM and FM radio broadcast and TV broadcast cannot be predicted theoretically with accuracy. To assess the electromagnetic environment due to fixed RF transmitters, an electromagnetic site survey should be considered. If the measured field strength in the location in which the IPR-EVO is used exceeds the applicable RF compliance level above, the IPR-EVO should be observed to verify normal operation. If abnormal performance is observed, additional measures may be necessary, such as reorienting or relocating the IPR-EVO

b Over the frequency range 150kHz to 80MHz, field strengths should be less than 3 V/m.

Guidance and manufacturer's declaration - electromagnetic immunity

The IPR-EVO is intended for use in the electromagnetic environment specified below. The customer or the user of the IPR-EVO should assure that it is used in such an environment.

Recommended separation distances between portable and mobile RF communications equipment and the IPR-EVO

The IPR-EVO is intended for use in an electromagnetic environment in which radiated RF disturbances are controlled. The customer or the user of the IPR-EVO can help prevent electromagnetic interference by maintaining a minimum distance between portable and mobile RF communications equipment (transmitters) and the IPR-EVO as recommended below, according to the maximum output power of the communications equipment.

Rated maximum output power of transmitter W	Separation distance according to frequency of transmitter m		
	150kHz to 80MHz $d = 1.2 \sqrt{P}$	80MHz to 800MHz $d = 1.2 \sqrt{P}$	800MHz to 2.5GHz $d = 2.3 \sqrt{P}$
0.01	Not Applicable	0.12	0.23
0.1	Not Applicable	0.38	0.73
1	Not Applicable	1.2	2.3
10	Not Applicable	3.8	7.3
100	Not Applicable	12	23

For transmitters rated at a maximum output power not listed above, the recommended separation distance d in meters (m) can be estimated using the equation applicable to the frequency of the transmitter, where P is the maximum output power rating of the transmitter in watts (W) according to the transmitter manufacturer.

Note 1:At 80 MHz and 800 MHz, the separation distance for the higher frequency range applies.

Note 2: These guidelines may not apply in all situations.

Electromagnetic propagation is affected by absorption and reflection from structures, objects and people.



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FDA Owner Operator Number: 10051861

European representative:
Quaser S.r.l., Via Aprutina 152, 62018 Potenza Picena (MC), Italy

You must report us any serious incidents occurring in connection with the medical device we supplied, as also to the competent authority of the member state in which you are located.