

ULTRASONIC SCALING

SWERV [®] Magnetostrictive Scaler	C1
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POWER SCALING SET-UP1

DESCRIPTION	SUGGESTIONS
IMS ULTRASONIC CASSETTE*	IM30HU_
100 Thin SWIVEL, 25k	UI25SS100
Swivel XT, 30k	UI30SSXT

POWER SCALING SET-UP 2

DESCRIPTION	SUGGESTIONS	
Handpiece IMS Cassette	IM60H0	
AE Swivel Direct Flow Set 251	UI25SDSET	
AF SWIVEI DILECT FIOW SET, 25K	or UI30SD7	

*See Section A for rails color coding options of IMS cassette.







SWERV® MAGNETOSTRICTIVE SCALER

The SWERV³ magnetostrictive power scaler combines power and handling in a unique ergonomic design that ensures the comfort of dental professionals, and their patients. It integrates finely tuned electronics that improve control and scaling efficiency in all clinical indications, allowing dental professionals to provide optimal care for every patient, every day.



- Finely tuned electronics provide superior patient and clinician comfort
- Switching power settings is effortless with the color-coded dual power modes
- The smooth surface makes disinfection simple and effective
- The color-coded, lighted display is easy to identify and adjust with the touch of a button
- The auto-purge function helps remove air from waterlines, saving the clinician time between patients



Experience superior clinician comfort with our ergonomic, lightweight handpiece.

SWERV³ HANDPIECE

- A lightweight, well-balanced design reduces clinician fatigue.
- Large diameter handpiece reduces finger pinching for increased clinical comfort.
- Enables use of a relaxed grasp that eliminates undesired pressure points.
- Reduces drag and minimises strain on clinicians' hands.

REPLACEMENT PART CODES

SWERV ³ Barrier Sleeves	UMBS
SWERV ³ Foot Control, On-Off	UMFC
SWERV ³ Power Cord UK	UMCORD-UK
SWERV ³ Power Cord EU	UMCORD-EU
SWERV ³ Water Filters, 10-pack	UMWF
SWERV ³ Water Supply Connector	UMWSC
SWERV ³ Water Supply Set	UMWSS

SWERV³ 30K Handpiece Assembly UMHP30

SWERV³25K Handpiece Assembly UMHP25



MAGNETOSTRICTIVE INSERTS DESIGNS

(All Shown in 30 kHz sise.)



SWIVEL INSERTS



STREAMLINE INSERTS



SWIVEL DIRECT FLOW INSERTS



The Swivel Direct Flow inserts with a gray cone have all of the features of the revolutionary Swivel inserts plus a through-tip water delivery. This design focuses the water flow directly to the tip, reducing excess spray and increasing visibility.



Hu-Friedy ultrasonic inserts are compatible with SWERV³ and all Cavitron* style magnetostrictive ultrasonic scalers.

*Cavitron is a registered trademark of Dentsply International Corporation.



SWIVEL DIRECT FLOW AFTER FIVE INSERTS





SWIVEL INSERTS

In the Swivel inserts with a
black cone, water flows from
the base allowing thorough
irrigation and lavage.

25 kHz Part Code: 30 kHz Part Code:

POWER LEVEL

#10 Universal
UI25SS10
UI30SS10

 Light to heavy deposits

LOW-HIGH

- Tenacious deposits Orthodontic cement



LOW-MEDIUM • Light to moderate deposits even

- in periodontal pockets
- #1000 Triple Bend **UI25SS1000 UI30SS1000** LOW-MEDIUM Light to heavy
 - deposits Beveled edges for tenacious and heavy deposits
 - Orthodontic cement

Swivel XT UI25SSXT **UI30SSXT**

25 kHz: LOW 30 kHz: LOW-MEDIUM

- Tenacious deposits
- Furcation areas

EXPERIENCE FREEDOM AT YOUR FINGERTIPS!

The maneuverability and adaptability you want in ultrasonic scaling, with the exclusive Swivel inserts. With a slight rolling motion of your fingertips, rotate the insert 360° to eliminate the old "start, stop, remove, and readjust" routine required with traditional inserts. Swivel inserts also reduce the torque from the handpiece cord, increasing overall balance for hassle-free scaling.

With an 18% larger grip,* finger pinching is reduced, resulting in less hand fatigue** and enhance tactile sensitivity. The lightly textured silicone grips provide a secure, comfortable grasp and are color-coded for easy tip identification.

360° SWIVEL **TECHNOLOGY**



Compared to Hu-Friedy Streamline Inserts. ** Source: Gerwatowski, L.J., McFall, D.B., Stach, D.:Carpal Tunnel Syndrome; Risk Factors and Preventive Strategies for the Dental Hygienist. Journal of Dental Hygiene, February 1992.

Swivel XT is thin enough to provide access into hard-to-reach areas, yet strong enough to effectively remove tenacious deposits even when used on low to medium power.

ULTRASONIC INSERTS



STREAMLINE INSERTS

- Routine scaling is more efficient with our Streamline inserts.
- Inserts have internal water flow delivery water comes directly from the base
- The color-coded resin handles help in instantly identifying the tip style

25 kHz Part Code: 30 kHz Part Code:

POWER LEVEL

#10 Universal Ul1025K Ul1030K

LOW-HIGH

- Light to heavy and tenacious deposits
- Orthodontic cement



#3 Beavertail UI325K UI330K

MEDIUM-HIGH

- Heavy deposits
- Orthodontic cement



#1000 Triple Bend U100025К U100030К

LOW-HIGH

- Light to heavy deposits
- Beveled edges for tenacious and heavy deposits
- Orthodontic cement

25 kHz Part Code: 30 kHz Part Code:

POWER LEVEL



REFERENCE SECTION



MAGNETOSTRICTIVE INSERT CLEANING AND CARE

CLEANING

To clean, rinse thoroughly or, if you choose, fully immerse in a mild ultrasonic cleaning solution (pH 7-10.5) like Hu-Friedy's IMS Enzymax or Enzymax Earth cleaning solutions. Place in ultrasonic cleaning unit for 7-10 minutes or 16-20 minutes if the insert is in a cassette. Thoroughly rinse the insert with tap water and dry completely prior to sterilisation.

STERILISATION

Sterilise Hu-Friedy ultrasonic inserts in an instrument cassette (i.e. IMS instrument cassette) or paper pouch in a steam autoclave. Chemical vapor sterilisation is unacceptable for Swivel inserts. Rapid heat transfer sterilisation and cold liquid/chemical sterilants are not recommended and may void warranty. Avoid contact with corrosive chemicals such as chlorides, sulfates and surface disinfectants. Do not expose to solutions containing phenols.

CARE AND MAINTENANCE

To increase the o-ring life of Hu-Friedy ultrasonic inserts and to prevent water flow from the tip after release of the foot control, take the following steps before placing the insert into the handpiece: Hold the handpiece upright over the sink, activate the foot control and flush the water line for 2 minutes. Fill entire handpiece with water. Gently twist the insert into the handpiece until completely seated.

Swivel and Swivel Direct Flow Inserts:

To maintain a smooth swivel, activate the foot switch and rotate insert 2-3 times.

All Thin Inserts (#100 Swivel, #100 Swivel Direct Flow, Swivel XT 30k and After Five): Use on LOW TO MEDIUM power settings only. Swivel XT 25 kHz should be used on low power only.

WARNING: Do not expose resin or silicone handled ultrasonic inserts to solutions containing phenols, gluteraldehydes, iodophors or to dry heat sterilisation.

Use steam sterilisation (autoclave) only for Swivel and Swivel Direct Flow inserts. Detailed care and maintenance instructions are available upon request.

OPTIMUM EFFICIENCY

Scaling efficiency can significantly diminish with worn insert tips. Inferior performance, patient discomfort, and poor water delivery can result from worn, damaged, bent, or altered tips.

For optimal scaling efficiency, we recommend checking inserts monthly for signs of wear.

Replacement of Worn Inserts Actual Size Guide





All thin inserts (Swivel #100, Swivel XT, Swivel Direct Flow #100) should be used on LOW TO MEDIUM power settings only.

IMPORTANT NOTE: Hu-Friedy and Dentsply are competitors. This chart is not intended to suggest that the respective Dentsply and Hu-Friedy ultrasonic inserts are equivalent or comparable. Instead, this chart suggests an alternative Hu-Friedy brand ultrasonic insert based on the experience and recommendations of clinicians who have previously used the listed Dentsply inserts. Cavitron and Dentsply are registered trademarks of Dentsply International.



HU-FRIEDY ULTRASONIC INSERTS									
Tip Style	Handle Color	25 kHz	30 kHz						
SWIVEL									
#10 Universal	lavender	UI25SS10	UI30SS10						
#100 Thin	black	UI25SS100	UI30SS100						
#1000 Triple Bend	orange	UI25SS1000	UI30SS1000						
Swivel XT	purple	UI25SSXT	UI30SSXT						
SWIVEL DIRECT FLOW									
#10 Universal	lavender	UI25SD10	UI30SD10						
#100 Thin	black	UI25SD100	UI30SD100						
#1000 Triple Bend	orange	UI25SD1000	UI30SD1000						
After Five Straight	dark blue	UI25SDS	UI30SDS						
After Five Right	red	UI25SDR	UI30SDR						
After Five Left	teal	UI25SDL	UI30SDL						
STREAMLINE									
#10 Universal	lavender	UI1025K	UI1030K						
#100 Thin	black	UI25K100S	UI30K100S						
#1000 Triple Bend	orange	UI100025K	UI100030K						
#3 Beavertail	yellow	UI325K	UI330K						

DENTSPLY CAVITRON** INSERTS

Tip Style	25 kHz	30 kHz
TFI #10 Straight	grey	black
TFI #1000 Straight Triple	grey	black
CTI-10S THINsert		purple
FSI-10	dark blue	dark blue
FSI-SLI 10S	green	green
FSI-1000	dark blue	dark blue
FSI-SLI 10S	green	green
FSI-SLI 10R	green	green
FSI-SLI 10L	green	green
TFI #10 Straight	grey	black
TFI #1000 Straight Triple	grey	black
Bend TFI #3 Thin Beavertail	grey	black







Clinicians who use FSI® and Focused Spray® and FSI-SLI Focused Spray Slimline inserts may consider Swivel Direct Flow as an alternative.**



POWER DISPERSION



MAGNETOSTRICTIVE INSERT APPLICATION CHART

	10 L'	*100/2,24/	**/000/	Shinet +	*39 ^{60/10}	Atter File	Original Poly
Light to moderate deposits	٠	•	•				•
Heavy deposits Orthodontic cement	•		•		•		•
Light to moderate deposits in periodontal pockets		•		•		•	
Tenacious subgingival deposits	٠		•	٠			•
Furcation areas				٠		٠	
Developmental concavities						•	

By varying the surface of the magnetostrictive insert tip on the tooth you can increase deposit removal efficiency (concave and convex surfaces) or increase patient comfort (lateral surfaces).



SYMMETRY PIEZO TIPS: E-SERIES TIPS, S-SERIES TIPS



Hu-Friedy Symmetry tips are compatible with: E-Series tips are compatible with all EMS generators. S-Series tips are compatible with Symmetry IQ®, Satelec/Acteon and NSK piezo generators.

SCALING TIPS



AFTER FIVE

These probe sized tips are designed to enhance access into periodontal pockets and improve adaptation in interproximal areas, allowing the clinician to more thoroughly debride difficult to reach areas to achieve better clinical results.





PERIO



Universal Perio E-Series: not available USU

Thin tip used to remove light deposits and plaque. Tip features smooth edges for safe removal of soft and hard deposits.

POWER LEVEL MED



Left Perio

E-Series: not available

US4L Standard diameter contra-angle tip used to remove calculus on all surfaces of premolars and molars, especially difficult to reach interproximal surfaces.

POWER LEVEL LOW

Right Perio E-Series: not available US4R

Standard diameter contra-angle tip used to remove calculus on all surfaces of premolars and molars, especially difficult to reach interproximal surfaces.

LOW

3 Perio UEP3

USP3

Thin-bladed curette-like tip used to remove heavy deposits and necrotic cementum on anteriors and premolars.

LOW

DIAMOND-COATED



Left Diamond UE2LD

US2LD

Thin, contra-angle diamondcoated finishing instrument used for removal of residual debris and designed to enhance access to deep periodontal pockets and furcations.

POWER LEVEL LOW

Right Diamond UE2RD US2RD

Thin, contra-angle diamondcoated finishing instrument used for removal of residual debris and designed to enhance access to deep periodontal pockets and furcations.

LOW

Straight Diamond

US1D



Thin, straight diamond-coated finishing instrument used for removal of residual debris and designed to enhance access to deep periodontal pockets primarily in anterior areas.

LOW

SYMMETRY HANDPIECE AND ACCESSORIES



GUARDIAN WRENCH/TIP CARRIER

Symmetry Piezo Tips come in the Guardian Wrench Tip Carrier for safe and easy connection to the handpiece.

Wrenches also hold the tip during cleaning and sterilisation to prevent loss of or damage to the tip.



Scaling Wrench/ Tip Carrier

Use primarily on medium to

high power (in orange mode

or scaling mode if applicable).

MEDIUM-HIGH



Scaling Wrench/ Tip Carrier

LOW-MEDIUM

Use primarily on low to medium power (in blue mode or scaling mode if applicable).

S-SERIES USP3 Visp3 Perio Wrench/ Tip Carrier

Use primarily on low

power (in green mode or

perio mode if applicable).

LOW

POWER LEVEL

CASSETTES

HANDPIECE CASSETTE DOUBLE SHOWN



Handpiece Cassette Single

Symmetry handpiece not included. Dimensions: 1.5" x 8" x 1.25" (38 mm x 203 mm x 32 mm)

Handpiece Cassette Double

Symmetry handpiece not included. Dimensions: 3" x 8" x 1.25" (76 mm x 203 mm x 32 mm)



Wrench Cassette (Blue) IMIQ38

Accommodates three Symmetry Piezo Tips in Guardian Wrenches. Exterior Dimensions: 5.63" x 1.95" x 1.77" (143 mm x 49.5 mm x 45 mm)

REPLACEMENT PART

ack Replacement Wrench	USRTW	Water Filter Case	UPWFC
Handpiece Lux	UPHPL	Irrigation Connector (120 V only)	UPIC
Handpiece Sheath	UPHPLS	Bulb (set of 3 replacements)	UPB
Foot Control	UPFC	Spanner Wrench 5 x 8 inch (2 pcs)	UPSW
Water Tube (2 mm)	UPWT	Power Cord (AC 230 V) EU	UPCORD-EU
Water Filter Set (2 mm)	UPWTS	Power Cord (AC 230 V) UK	UPCORD-UK
Water Filter	UPWF		



PIEZO REFERENCE

CHARACTERISTICS OF TIP MOVEMENT

The smooth linear movement generated by piezoelectric systems creates a stroke pattern that is similar to hand instrumentation. Adapting the lateral surface of the piezo tip against the tooth surface (similar to a hand instrument) will increase clinical efficiency.



ESSENTIALS OF POWER DISPERSION

- Most of the energy is dispersed at the point of tip (1).
- The lateral surfaces of the tip (2) are moving in a linear pattern, similar to the stroke of a bladed hand instrument.
- · Adaptation of this lateral surface provides the most efficient deposit removal.
- Adapt the terminal 2-3 mm of tip for optimal performance.
- When concave front or convex back surfaces (3) are adapted to the tooth surface, the instrument will chatter against the surface rather than effectively remove deposit.

PIEZO TIP ADAPTATION

- Adapt the lateral surface to the tooth for optimal performance.
- Maintain tip angulation near 0° parallel to tooth surface.
- To minimise the risk of root damage, never adapt tip at a 90° angle.
- Use little or no lateral pressure and let the tip do the work for you.
- When concave front or convex back surfaces are adapted to the tooth surface, the instrument will chatter against the surface rather than effectively instrument.

SENSORY OBSERVATIONS

- · Smooth vibration enhances tactile sense for instrumentation.
- The smooth motion of the tip is an excellent option for patients with root sensitivity.
- · Piezo tip vibration is very smooth and quiet when adapted correctly on a lateral surface.
- Deposits are pulverised, resulting in a slurry of debris that is visible in the water at the back of the mouth.
- Calculus is generally not removed in big chunks as commonly seen during magnetostrictive instrumentation.





Lateral surface of tip in use

To achieve the greatest efficiency and patient comfort, it is best to adapt the lateral sides of your piezoelectric instrument to the surface of the tooth.



PIEZO TIP CLEANING AND CARE

CLEANING & STERILISATION

- Piezo tips remain in the Wrench during the complete cleaning, disinfection and sterilisation reprocessing cycle.
- Clean using ultrasonic cleaner or thermodisinfector.
- Steam sterilise for at least 4 minutes at 270°F/132°C or 30 minutes at 250°F/121°C. Do not heat above 275°F/135°C.
- Recommend at least 30 minute dry time after sterilisation cycle.
- Clean, disinfect, inspect and steam sterilise before each use following the respective equipment manufacturer's users instructions.
- Do not expose to phenols, iodophors or dry heat sterilisation.
- Detailed care and maintenance instructions are available upon request or go to Hu-Friedy.eu

TIP INSTALLATION

- 1. Your Hu-Friedy Piezo tip comes with its own wrench.
- 2. Attach tip to handpiece using the Wrench by aligning the threaded end of the tip to the handpiece.
- Rotate the wrench clockwise. Once the instrument is screwed all the way in, give an extra quarter of a turn to obtain the required torque. Incomplete tightening may cause the tip to become loose or lack vibration.
- 4. When using the Wrench without a tip previously inserted into the tip carrier, take the following step: place the Wrench over the tip by slipping tip through the small hole in the bottom, closed end of the tool. This will position the tip within the Wrench for safety and convenience.

TIP REMOVAL

- 1. Hold the handpiece vertically. Insert the tip through the hole in the bottom of the Wrench.
- 2. Depress wrench slightly while rotating to fully secure tip to wrench.
- 3. Turn the wrench counter-clockwise to loosen and remove tip from handpiece.
- 4. Once removed from handpiece, do not remove the tip from the wrench carrier.

OPTIMUM EFFICIENCY

Scaling efficiency can significantly diminish with worn tips. Inferior performance and poor water delivery can result from worn, damaged, bent, or altered tips. For optimal scaling efficiency, we recommend checking tips regularly for signs of wear.

APPLICATION CHART

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	250	5	00/	Oly V	ŝ	44	2 Q	Cop -	075, Q	Ars	L'IL.
Light to moderate supragingival deposits	•	•	•		•				•		
Heavy supragingival deposits	•			•					•		
Light to moderate deposits in shallow pockets		•	•		•		•		•	•	
Light to moderate deposits in deep periodontal pockets					•		•	•		•	
Moderate to heavy deposits in deep periodontal pockets						•					
Furcation areas								•		•	







E-SERIES & S-SERIES POWER SETTINGS CROSS REFERENCE

HU-FRIEDY	APPLICATION				POWER SE	TTING		
TIP	HU-FRIEDY	SATELEC	NSK	POWER P5	SATELEC P5	SATELEC SP NEUTRON	NSK VARIOS	EMS MINI-PIEZON
USS10	SCALING	SCALING	SCALING	MED	7-9	8-10	Min-3	
UES10	SCALING			MED				1-6
USP10	SCALING	SCALING	SCALING	MED	7-8	8-10	Min-3	
UEP	SCALING			MED				1-6
US100	SCALING	SCALING	SCALING	MED	4-6	6-8	Min-1	
UE100	PERIO			LOW				1-3
UE100M	PERIO			LOW				1-3
USU	PERIO		PERIO	LOW	7-8	1-6	Min-4	
USP3	PERIO		PERIO	LOW	1-3	1-4	Min-4	
UEP3	PERIO			LOW				1-3
US4R	PERIO		PERIO	LOW	1-3	1-4	Min-4	
US4L	PERIO		PERIO	LOW	1-3	1-4	Min-4	
US1D	PERIO		PERIO	LOW	1-3	1-4	Min-4	
UE1D	PERIO			LOW				1-3
US2RD	PERIO		PERIO	LOW	1-3	1-4	Min-4	
UE2RD	PERIO			LOW				1-3
US2LD	PERIO		PERIO	LOW	1-3	1-4	Min-4	
UE2LD	PERIO			LOW				1-3

HU-FRIEDY E-SERIES & S-SERIES ITEM CODE CROSS REFERENCE

HU-FRIEDY	USS10	UES10	US100	UE100	UE100M	USP10	UEP	USU	USP3	UEP3	US4R	US4L	US1D	UE1D	US2RD	UE2RD	US2LD	UE2LD
SATELEC*	S1		10Z			10P		PFU	H3		H4R	H4L	H1		H2R		H2L	
NSK VARIOS*	G1		G6			G4		P20	P10						PD3		PD2	
EMS*		A		PS	PL3		Р											