



NOUVAG⁺

+ SOLUTIONS: MANUFACTURED IN SWITZERLAND +

Surgical Powertools

nouvag.com

HighSurg 30: Highspeed Motor System for Neurosurgery with Dual Motor Principle

For over 50 years, NOUVAG has been a leading developer and manufacturer of cutting-edge instruments for the medical technology industry. Our instruments have gained global recognition for their exceptional efficiency and reliability, making them highly esteemed by surgeons worldwide. The HighSurg 30 motor system is specifically designed for neurosurgical procedures, offering an optimized working method through its innovative dual-motor principle. By seamlessly combining two electronic motors, surgeons can effortlessly utilize the handpiece of your choice, ensuring both comfort and precision in your work.

HIGHLIGHTS

- + Quiet Pump Operation
- + Dual Motor-Driven System for Enhanced Control with Motor Speeds of Up to 80,000 RPM
- + Easy-to-read and Multifunctional Display for User-Friendly Operation
- + Highest Safety and Precision
- + Intuitive Control with Multifunctional Foot Switch for Convenient Handling
- + Easy Tube Replacement
- + Individual Programming
- + Low Vibration for Fatigue-Free Operation
- + Wide Range of Handpieces





HighSurg 30

NOUVAG AG - HighSurg 30
PROGRAM 2 MOTOR 1
09:45:58
30.03.18
1:1
300 - 80000 min
AS 5 Ncm
min⁻¹

Program Motor 1/2 Handpiece Enter

Select
Speed
Torque/Frequency
Pump

NOUVAG+

M1 M2

Cranial Perforator Handpiece for Speeds of Up to 1,200 RPM

The Cranial Perforator: A handpiece with an impressive speed of up to 1,200 RPM. With a peak torque of 120 Ncm, it delivers powerful performance. Its robust and sturdy design reflects reliability and durability – manufactured in Switzerland. The single-use perforator drill bits ensure increased safety and eliminate costs for cleaning, reprocessing, and resharping. The perforator drill bits with automatic locking are available in four diameters, each offering two different milling depths of 1.5 mm (for pediatrics) and 3.0 mm (for adults).



SINGLE-USE PERFORATORS

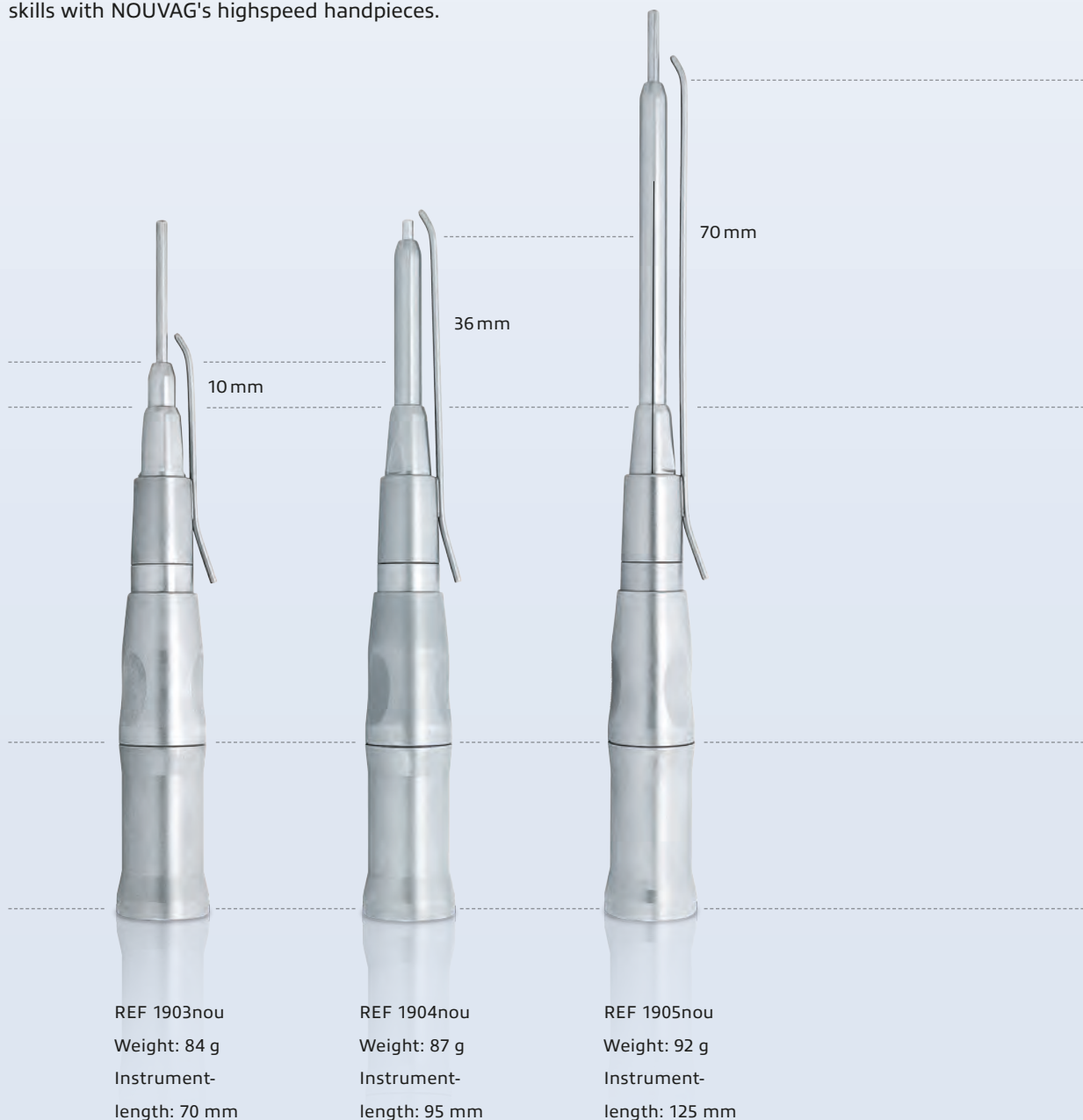
Inner / Outer \varnothing , mm	Skull bone thickness, mm	Adults	Paediatrics	REF
6.0 / 9.0	1.5		+	1978E
6.0 / 9.0	3.0	+		1920E
7.0 / 11.0	1.5		+	1977E
7.0 / 11.0	3.0	+		1976E
9.0 / 13.0	1.5		+	1979E
9.0 / 13.0	3.0	+		1921E
11.0 / 14.0	1.5		+	1980E
11.0 / 14.0	3.0	+		1922E

RE-USE PERFORATOR

11.0 / 14.0	3.0	+		1922RE
Support				2053RE

Perfectly Balanced Surgical High-Speed Handpieces Designed for Speeds of Up to 80,000 RPM

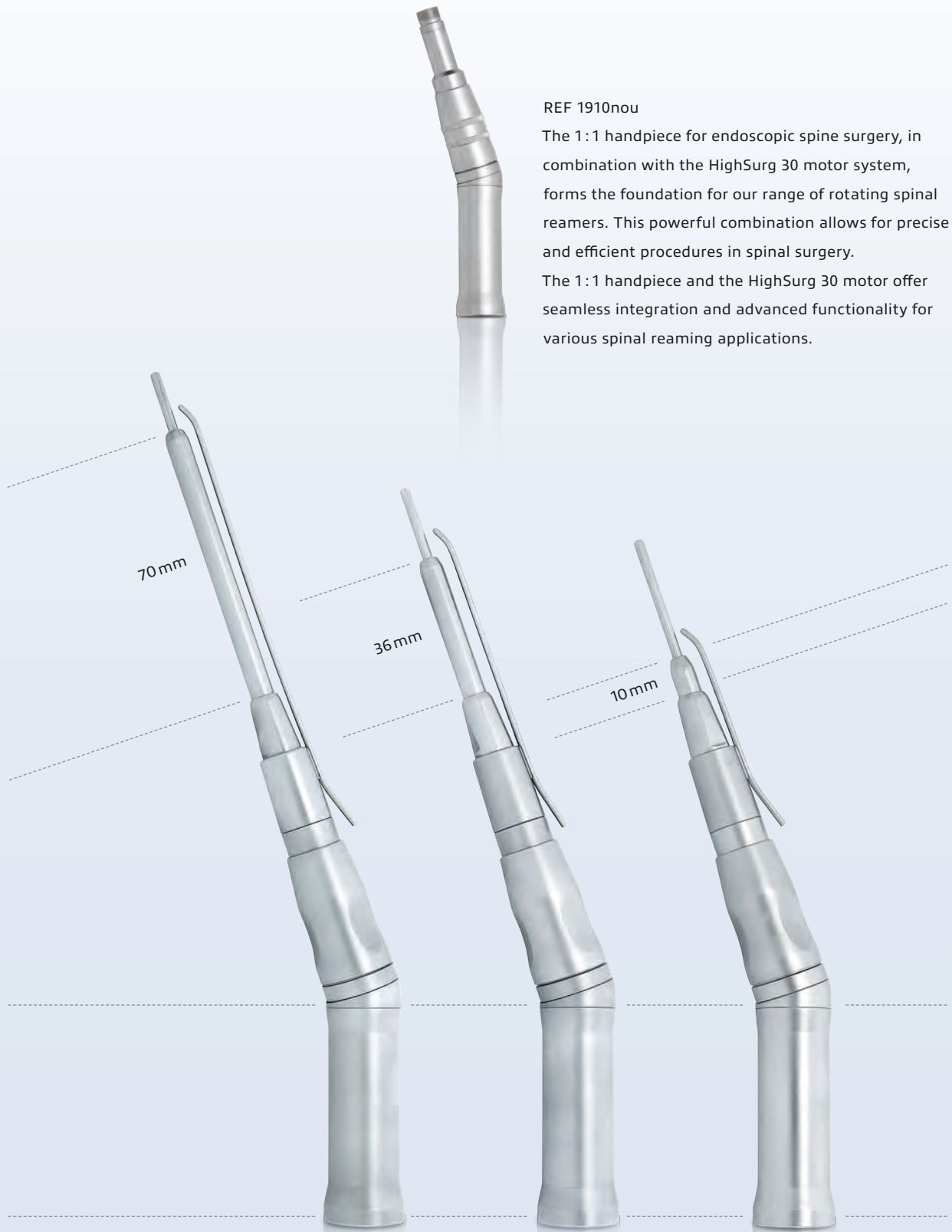
Experience the cutting-edge precision and unparalleled performance of NOUVAG's high-speed handpieces. Engineered with optimal balance and smooth operation in mind, these handpieces excel in a wide range of surgical procedures. With their high rotational speeds, they deliver the power and precision needed for intricate tasks, ensuring seamless surgical performance. Available in various lengths and configurations, these slim and ergonomic handpieces offer fatigue-free operation and are equipped with quick couplings, ensuring easy assembly. Unlock the true potential of your surgical skills with NOUVAG's highspeed handpieces.



REF 1910nou

The 1:1 handpiece for endoscopic spine surgery, in combination with the HighSurg 30 motor system, forms the foundation for our range of rotating spinal reamers. This powerful combination allows for precise and efficient procedures in spinal surgery.

The 1:1 handpiece and the HighSurg 30 motor offer seamless integration and advanced functionality for various spinal reaming applications.



REF 1908nou
Weight: 121 g
Instrument-length: 125 mm

REF 1907nou
Weight: 116 g
Instrument-length: 95 mm

REF 1906nou
Weight: 110 g
Instrument-length: 70 mm

High-Speed Burrs for Speeds of Up to 80,000 RPM

	Head \varnothing ,	Number of	Shank length		
	mm		cutting edges	70 mm, REF	95 mm, REF
Rose burr Steel	0.8	6	RS.070.008	.	.
	1.0	12	RS.070.010	.	.
	1.4	8	RS.070.014	RS.095.014	RS.125.014
	1.8	8	RS.070.018	RS.095.018	RS.125.018
	2.3	8	RS.070.023	RS.095.023	RS.125.023
	2.7	10	RS.070.027	.	.
	3.1	10	RS.070.031	RS.095.031	RS.125.031
	4.0	12	RS.070.040	RS.095.040	RS.125.040
	5.0	12	RS.070.050	RS.095.050	RS.125.050
	6.0	14	RS.070.060	RS.095.060	RS.125.060














Rose burr Carbide	0.5	6	RC.070.005	RC.095.005	.
	0.8	6	RC.070.008	RC.095.008	.
	1.0	6	RC.070.010	RC.095.010	.
	1.4	6	RC.070.014	.	.
	1.8	6	RC.070.018	RC.095.018	.
	2.3	6	RC.070.023	RC.095.023	RC.125.023
	2.7	8	RC.070.027	.	.
	3.1	8	RC.070.031	RC.095.031	RC.125.031
	3.5	8	RC.070.035	RC.095.035	.
	4.0	10	RC.070.040	RC.095.040	RC.125.040
	5.0	12	RC.070.050	RC.095.050	RC.125.050
	6.0	14	RC.070.060	.	.
	7.0	16	RC.070.070	.	.



Diamond ball burr	0.6		DA.070.006	DA.095.006	DA.125.006
	0.8		DA.070.008	DA.095.008	DA.125.008
	1.0		DA.070.010	DA.095.010	DA.125.010
	1.4		DA.070.014	DA.095.014	DA.125.014
	1.8		DA.070.018	DA.095.018	DA.125.018
	2.3		DA.070.023	DA.095.023	DA.125.023
	2.7		DA.070.027	DA.095.027	.
	3.1		DA.070.031	.	DA.125.031
	3.5		DA.070.035	DA.095.035	.
	4.0		DA.070.040	DA.095.040	DA.125.040
	5.0		DA.070.050	DA.095.050	DA.125.050
	6.0		DA.070.060	DA.095.060	DA.125.060
	7.0		DA.070.070		.



		Head Ø, mm	Number of cutting edges	Working- length, mm	Shank length 70 mm, REF	Shank length 95 mm, REF	Shank length 125 mm, REF
Diamond ball burr coarse		2.3	.	.	DC.070.023	DC.095.023	DC.125.023
		3.1	.	.	DC.070.031	DC.095.031	DC.125.031
		4.0	.	.	DC.070.040	DC.095.040	DC.125.040
		5.0	.	.	DC.070.050	DC.095.050	DC.125.050
		6.0	.	.	DC.070.060	DC.095.060	DC.125.060
Diamond ball burr extra coarse		3.0	.	.	.	DEC.095.030	DEC.125.030
		4.0	.	.	.	DEC.095.040	DEC.125.040
Diamond ball burr mega coarse		3.0	.	.	DMC.070.030	.	.
		4.0	.	.	DMC.070.040	.	.
Diamond egg burr		4.0	.	.	DAE.070.040	.	.
Cross-cut cylinder burr		4.0	10	9.0	CB.070.040	.	CB.125.040
		5.0	12	10.0	CB.070.050	.	.
Cross-cut bud burr		4.0	10	8.0	BB.070.040	BB.095.040	.
		5.0	12	9.5	BB.070.050	.	.
Egg-shaped burr		4.0	10	9.5	.	EB.095.040	EB.125.040
		6.0	14	9.5	.	.	EB.125.060
Pear-shaped burr		6.0	14	10.0	.	PB.095.060	PB.125.060
Acorn for spinal surgery		7.5	8	9.3	.	AB.095.075	AB.125.075
Neuro burr spinal surgery		1.8	2	3.0	.	.	NB.125.018
		3.0	2	4.0	.	.	NB.125.030
Wirepass drill		1.0	2	10.0	.	WD.095.010	WD.125.010
		1.2	2	10.0	.	WD.095.012	WD.125.012
		1.5	2	6.6	.	.	WD.125.015

Product Matrix: Rotating Spine Burrs and Support Sleeves for Endoscopic Spine Procedures

A Outer Support sleeve, open ↓

REF 1918nou →

	REF Burr	Burr Shape	Working length, mm	Head Ø, mm	PU
Inner-Ø 3.2 mm	1750nou	Diamond, round	225	5.0	3
Outer-Ø 4.0 mm	1751nou	Hardened Steel, round	225	5.0	3
Working length 185 mm	1752nou	Bud	230	5.0	3

REF 1753nou →

	REF Burr	Burr Shape	Working length, mm	Head Ø, mm	PU
Inner-Ø 3.0 mm	1762nou	Hardened Steel, round	270	3.0	3
Outer-Ø 3.5 mm	1763nou	Diamond, round	270	3.0	3
Working length 232 mm	1764nou	Diamond, round	272	3.7	3
	1765nou	Hardened Steel, round	270	3.5	3

REF 1748nou →

	REF Burr	Burr Shape	Working length, mm	Head Ø, mm	PU
Inner-Ø 3.2 mm	1745nou	Hardened Steel, round	270	3.0	3
Outer-Ø 4.0 mm	1746nou	Diamond, round	270	3.0	3
Working length 232 mm	1766nou	Hardened Steel, round	270	3.5	3
	1747nou	Diamond, round	272	3.7	3

REF 1916nou →

	REF Burr	Burr Shape	Working length, mm	Head Ø, mm	PU
Inner-Ø 3.0 mm	1755nou	Hardened Steel, round	354	3.0	3
Outer-Ø 3.5 mm	1756nou	Diamond, round	354	3.0	3
Working length 316 mm	1759nou	Hardened Steel, round	354	3.5	3
	1757nou	Diamond, round	355	3.7	3

REF 1914nou →

	REF Burr	Burr Shape	Working length, mm	Head Ø, mm	PU
Inner-Ø 3.2 mm	1911nou	Hardened Steel, round	354	3.0	3
Outer-Ø 4.0 mm	1912nou	Diamond, round	354	3.0	3
Working length 316 mm	1738nou	Hardened Steel, round	354	3.5	3
	1913nou	Diamond, round	355	3.7	3
	1784nou	Hardened Steel, round	354	4.0	3

B Outer Support sleeve
with protective cover ↓

REF 1749nou →

Inner-Ø 3.2 mm

Outer-Ø 4.0 mm

Working length 240 mm

REF Burr	Burr Shape	Working length, mm	Head Ø, mm	PU
1745nou	Hardened Steel, round	270	3.0	3
1746nou	Diamond, round	270	3.0	3

REF 1915nou →

Inner-Ø 3.2 mm

Outer-Ø 4.0 mm

Working length 323 mm

REF Burr	Burr Shape	Working length, mm	Head Ø, mm	PU
1911nou	Hardened Steel, round	354	3.0	3
1912nou	Diamond, round	354	3.0	3

C Outer Support sleeve
with angled
protective cover ↓

REF 1737nou →

Inner-Ø 3.2 mm

Outer-Ø 4.0 mm

Working length 325 mm

REF Burr	Burr Shape	Working length, mm	Head Ø, mm	PU
1911nou	Hardened Steel, round	354	3.0	3
1912nou	Diamond, round	354	3.0	3

Burr Shape →

Diamond, round

Hardened Steel, round

Bud



Outer Tube Type →

A open

B with protective Cover

C with angled protective Cover



Electronic Motor 21 with 7.5 Ncm Torque for Various Medical Applications

The Electronic Motor 21 by NOUVAG is a durable and powerful motor suitable for various medical applications. With its high torque of 7.5 Ncm, it delivers reliable and strong performance for different surgical procedures. The attached handpiece is securely held in place during use, ensuring a safe and controlled application with no undesired rotation. Experience the dependable and precise performance of the Electronic Motor 21 for exceptional medical interventions.



HIGHTORQUE // REF 2099NOU

- + Electronic Motor 21 with Anti-Rotation Feature
- + Motor Speeds of Up to 50,000 RPM
- + Very High Torque of Up to 7.5 Ncm
- + Minimal Vibrations

HIGHSPEED // REF 2098NOU

- + Electronic Motor 21 with Anti-Rotation Feature
- + Motor Speeds of Up to 80,000 RPM
- + Very High Torque of Up to 4.0 Ncm
- + Minimal Vibrations

Electronic Motor 21 with Speeds of Up to 80,000 RPM – Delivering Peak Performance for Precise Results

This variant of the Electronic Motor 21 allows for precise and accurate application with our 1:1 handpieces in combination with diamond or carbide burrs. With the Electronic Motor 21, surgeons can confidently perform even the most demanding milling tasks with high precision. It provides reliable power and ensures exact outcomes for their surgical procedures.



Accessories

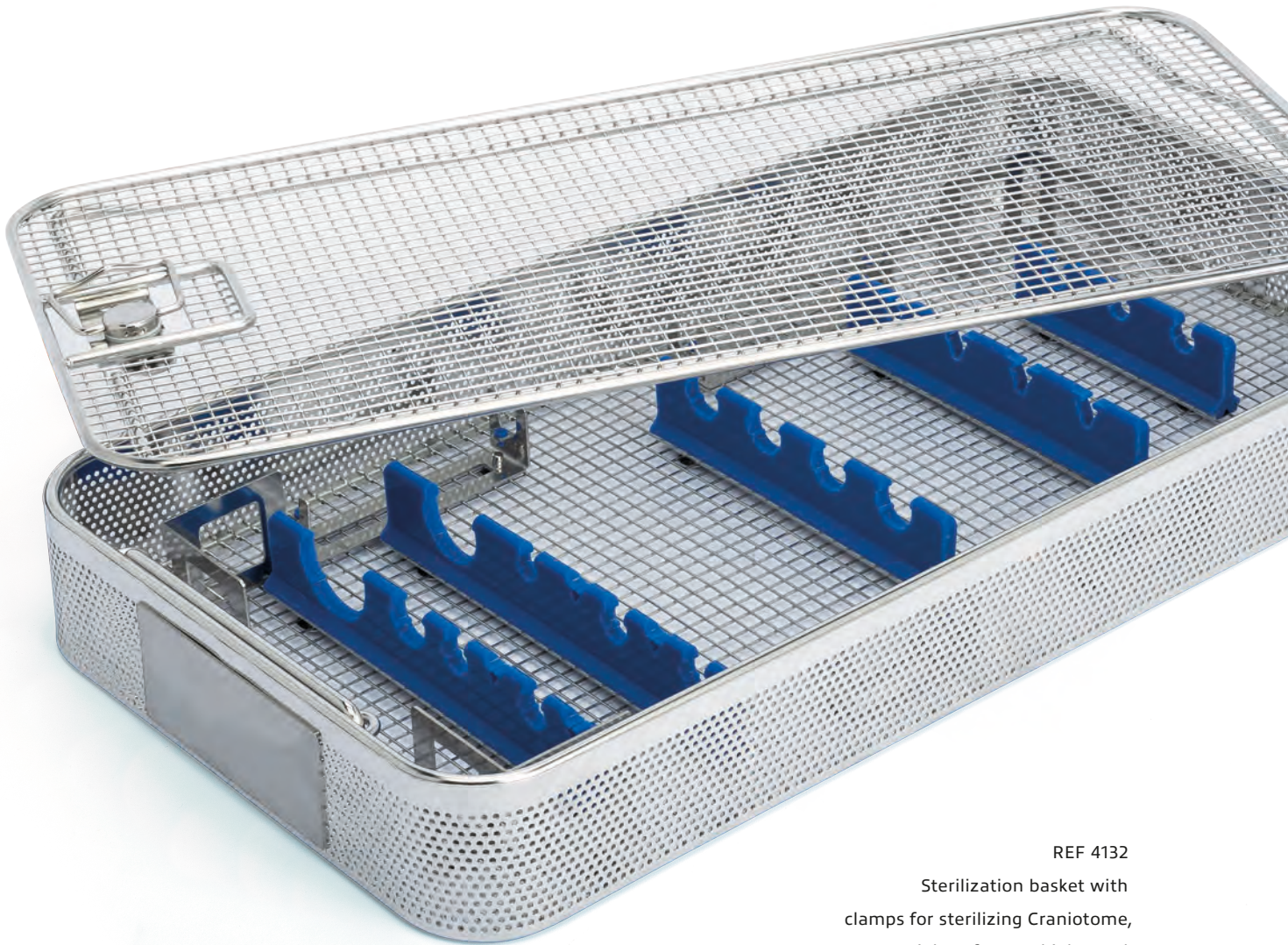
REF 1898

Vexio Cart: Modern rolling cart with two shelves, lockable antistatic wheels, and an integrated cable channel for power supply with 3 outlets.

Optional REF 1894

Bottle holder





REF 4132
Sterilization basket with
clamps for sterilizing Craniotome,
Cranial Perforator, highspeed
handpieces, and electronic motors;

Optional REF 4134
Cover for sterilization basket



REF 6024
Tube set for the peristaltic pump of the
HighSurg 30



REF 1029
Plastic case with foam insert for the
transportation and storage of the
HighSurg 30 with accessories

Technical Data

HighSurg 30	REF 3365
Operating voltage, switchable	100 V~ / 115 V~ / 230 V~ 50–60 Hz
Power consumption	120 VA
Protection class	Class I
Classification of application part	Typ BF (Body Floating)*
Max. torque	7.5 Ncm
Dimensions (W x D x H)	260 x 250 x 110 mm
Weight	3.7 kg
Foot switch IP Code	IPX8

* Application parts are instruments that are used with the device.

Cranial perforator	REF 1924nou
Speed range	80–1,200 RPM
Max. torque	120 Ncm
Motor coupling	INTRA, ISO 3964
Instruments coupling	Hudson

Craniotome	REF 1926nou
Speed range	1,000–60,000 RPM
Motor coupling	INTRA, ISO 3964

Elektronikmotor 21	REF 2099nou 2098nou
Power consumption	120 VA
Max. speed	300–50'000 300–80'000 U/min
Max. torque	7.5 4 Ncm
Coupling	INTRA, ISO 3964
Weight, with cable	340 g
Cable length	2.9 m

Surgery handpiece	REF 1903nou–1908nou
Transmission	1:1
Max. speed	80,000 RPM
Motor coupling	INTRA, ISO 3964

VEXIO Cart	REF 1898
Load capacity	65 kg
Electro-Box	Power strip with device connectors
Stand space	530 x 610 mm
Total height	1,160 mm
Shelf, footprint	420 x 450 mm

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