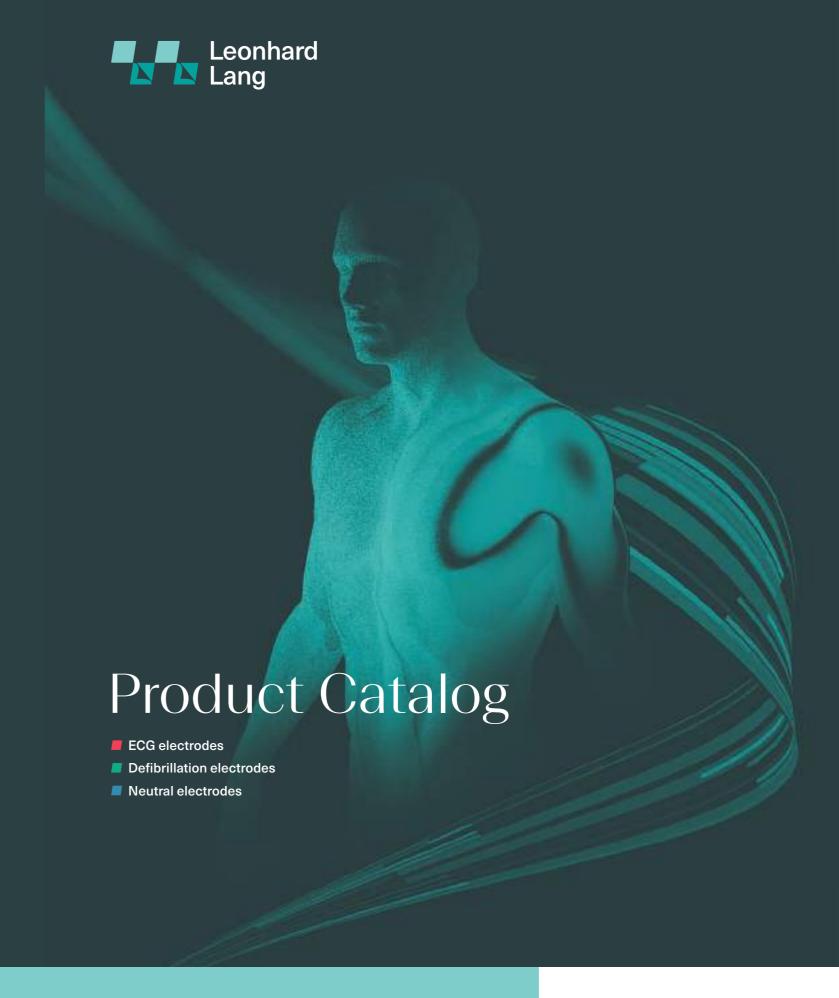
Address

Leonhard Lang GmbH

Archenweg 56 6020 Innsbruck, Austria

Tel. +43 512 334257 Fax +43 512 392210 medical@leonhardlang.at



Who we are

Leonhard Lang's internationally renowned innovation and production center is located in the heart of the Tyrolean Alps.

Founded in 1872, Leonhard Lang has been operating as a family business for more than 150 years. Today, the focus is on medical technology. Over the years, joint top performance has resulted in production, special machine construction, process management, and research and development at the highest level. The electrode systems developed and produced by Leonhard Lang are in use worldwide.





Sustainability

# We will always take the sutainable path

A resource-conserving approach to nature is important. The way we treat our environment today, determines our tomorrow. That is why Leonhard Lang takes action in all its business areas – for the health of future generations.



## Conductive Gels

Electrodes for short-term ECG significantly differ from those for long-term monitoring. Therefore, we have created a selection of conductive gels to meet the specific applications. These gels combine first-class response with reliable conduction quality with high skin-friendliness.



#### Aqua-Wet Gel = LIQUID GEL

Our Aqua-Wet Gel ensures particularly fast signal pick-up at the start of the ECG, regardless of skin preparation. Skintact® ECG electrodes with Aqua-Wet Gel are the best choice for short-term applications.



#### Aqua-Tac Gel = SOLID GEL

Skintact® ECG electrodes with Aqua-Tac gel are used for both long-term and shortterm applications. They can be removed from the skin without leaving any residue.



#### Aqua-Set Gel = SOLID WET GEL

Our Aqua-Set Gel combines the advantages of liquid and solid gel. Its special formula guarantees excellent electrical conductivity. The water content of Aqua-Set Gel ensures rapid reduction of skin resistance.

# ECG electrodes

Decades of experience and ongoing customer collaborations have made Skintact® ECG electrodes an industry standard.

Excellent quality ECG recordings are dependent on three main factors: good skin preparation, superior quality electrodes, and

a continuous unbroken electrical pathway

from the skin to the FCG machine.

Electrodes often have to perform under very strenuous conditions, therefore at Leonhard Lang we dedicate valuable time and attention to the design and construction of our electrodes; we then carefully select only the finest quality materials and component parts to produce them.

Uniquely, we design and build our own machines that are state of the art in manufacturing technology ensuring you quality products that are second to none. "Connect with quality" is our motto and our goal is to provide you with consistently reliable products.

# Backing material

#### PE foam

Demanding conditions, such as use in emergency care or for stress tests challenge the stability and reliability of ECG electrodes. Leonhard Lang's PE foams are the right choice - they are impermeable to liquids and thus protecting the sensor and gel. The thin PE material allows maximum flexibility.

### Microporous Tape

The skin-friendly, microporous tape adapts well to the contours of the body and thus increases wearing comfort. It also allows moisture to pass through. Skintact® ECG electrodes with microporous tape allow the skin to breathe and transpire - which is particularly important for long-term applications.

#### Soft Cloth Backing

Skintact® ECG electrodes made of soft cloth backing offer all the advantages of nonwoven electrodes, but with significantly increased elasticity. Thus, they adapt well to body movements. Electrodes made of soft cloth backing offer a high level of wearing comfort for longterm applications and adhere reliably even to active patients.

#### Clear Tape

The clear tape is transparent. The patient's skin can therefore be observed during the entire wearing period. Clear tape reliably protects the sensor area against liquids.

All our Skintact® products are tested according to applicable standards, ensuring maximum safety and reliable performance.

Skintact® ECG electrodes comply with standard ANSI/AAMI EC12 for ECG electrodes, ISO 10993 for biocompatibility, and the European Medical Device Regulation (MDR).

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# **Skintact®**

# Stress Test & Holter

#### Bonding safe

Skintact® stress test electrodes with reinforced adhesive hold reliably. Even when patients transpire heavily. The PE foam backing is also impermeable to liquids. The ECG electrodes are therefore also suitable for echocardiograms.

## Omfortable to wear

The particularly skin-friendly Skintact® ECG electrodes T-604 B and T-VO01 allow the skin to breathe and ensure excellent wearing comfort, especially during prolonged wear.

#### Easy to handle

The easy-to-open pouch and the peel-off aid of each Skintact® ECG electrode facilitate daily handling. On the Skintact® offset electrodes, the cables can be connected even more conveniently and reduce the risk of squeezing gel onto the electrode surface.

## Innovative electrode technology

The adhesive ring of the T-VO01 made of PE foam protects the gel area and provides additional adhesive strength. In combination with the offset connection it significantly reduces motion artifacts.

#### 

Like all Skintact ECG electrodes also the Skintact offset electrodes are PVC-free.

	Code	Note	Recommended use	Backing	Adhesive	Gel	Dimensions
TO THE STATE OF TH	FS-VB01	Premium electrode with offset connection	Stress test	PE foam	•••	LIQUID GEL	52 x 35 mm
CONTROL OF THE PROPERTY OF THE	FS-VB04	Premium electrode with offset connection and adapter for 4mm banana plug	Stress test	PE foam	•••	LIQUID GEL	52 x 35 mm
STATE OF THE PARTY	FS-50	Impermeable to liquids	Stress test, emergency care, echocardiogram	PE foam	•••	LIQUID GEL	Ø 50 mm
臺	T-VO01	Premium electrode with offset connection and with foam ring around gel surface; breathable backing material	Holter, Event Recording	Microporous Tape	••	LIQUID GEL	66 x 60 mm
•	T-VO02	Premium electrode with offset connection and with foam ring around gel surface; breathable backing material	Holter, Event Recording	Microporous Tape	••	LIQUID GEL	Ø 72 mm
	T-604 B	Breathable backing material, with textured liner for skin preparation	Holter, long-term monitoring ECG Holter	Microporous Tape	••	SOLID GEL	Ø 60 mm

	Packaging		
FS-VB01   FS-50   T-604 B	30/pouch	1200/box	4800/case
FS-VB04	30/pouch	750/box	3000/case
T-VO01   T-VO02	30/pouch	300/box	1800/case



# Resting ECG

## Excellent Conductivity

Skintact® Easitabs provide reliable signals with the Aqua-Tac hydrogel. The Easitab FS-WB00 and FS-WA00 electrodes are particularly suitable for resting ECG especially under demanding conditions.

## Bonding safe and convenient

All Skintact® Easitabs feel soft and stick absolutely reliably. Nevertheless, they are removed after application without irritation or loss of hair.

## Superior Safety

Proper use of Skintact® Easitabs eliminates cross infection whereas suction electrode bred bacteria and fungi.

	Code	Note	Backing	Adhesive	Gel	Dimensions
SET VECTOR	RT14	Easitab, 10 pcs / card	Paper/PET	••	SOLID WET GEL	34 x 14 mm
A SECTION OF THE PERSON OF THE	RT34	Easitab, 10 pcs / card	Paper/PET	••	SOLID WET GEL	34 x 22 mm
The Carlotte of the Carlotte o	RT74	Easitab, 10 pcs / card	Paper/PET	••	SOLID WET GEL	34 x 26 mm
	FS-WA00 /10	Easitab, for particularly demanding conditions, 10 pcs / card	PE foam	•••	LIQUID GEL	45 x 32 mm
10000	FS-WB00 /10	Easitab, for particularly demanding conditions, 10 pcs / card	PE foam	•••	LIQUID GEL	37 x 28 mm
	FS-RB4 /5	With adapter for 4mm banana plug, 5 pcs / card	PE foam	•••	LIQUID GEL	44 x 28 mm

	Packaging		
RT14   RT34   RT74	100/pouch	500/box	5000/case
FS-WA00 /10	50/pouch	500/box	3000/case
FS-WB00 /10	100/pouch	500/box	3000/case
FS-RB4 /5	50/pouch	1500/box	6000/case

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# Monitoring

#### Adhere even better

 ${\tt Skintact} \begin{tabular}{l}{\tt Skintact} \begin{tabular}{$ 

## Easy to handle

An easy-to-open pouch and the peel-off aid for easy use.

## Water repellent

All foam ECG electrodes are impermeable to liquids and thus protect the sensor.

	Code	Note	Backing	Adhesive	Gel	Dimensions
	FS-521	Impermeable to liquids, ideal for short-term monitoring and for use in the operating room	PE foam	•••	SOLID GEL	50 x 35mm
# R - 1	F-601	Impermeable to liquids, ideal for short-term monitoring and for use in the operating room	PE foam	••	SOLID GEL	Ø 50 mm
	F-55	Impermeable to liquids, ideal for short-term monitoring and for use in the operating room; Large adhesive area, Alternative: F-50 with 50mm diameter	PE foam	••	LIQUID GEL	Ø 55 mm
44	F-TB1	Impermeable to liquids, ideal for short-term monitoring and for use in the operating room	PE foam	••	SOLID GEL	55 x 50mm
	CT-601	Skin reaction easily and quickly detectable	Transparent Clear Tape	••	SOLID GEL	Ø 50 mm
=	T-60	More comfort for patients due to breathable backing material, ideal for long-term monitoring	Microporous Tape	••	LIQUID GEL	Ø 60 mm
-	T-601	More comfort for patients due to breathable backing material, ideal for long-term monitoring	Microporous Tape	••	SOLID GEL	Ø 50 mm
100 mg	W-601	More comfort for patients due to breathable backing material, ideal for long-term monitoring	Soft Cloth	••	SOLID GEL	Ø 50 mm

	Packaging		
FS-521   F-601   F-TB1 CT-601   T-601   W-601	30/pouch	1500/box	6000/case
F-55   T-60	30/pouch	1200/box	4800/case



# Universal

#### Lower cost

Our Skintact® ECG electrodes on cards of 6 or 10 pieces offer the usual Leonhard Lang quality at reasonable prices.

## Fast and comfortable

These electrodes come on cards of 6 or 10 pieces. A perforation makes two handy strips from one card.

## Feel free to leave the gloves on

The label material overlaps the electrode and creates a lift tab which allows the clinical staff to handle the electrode easily even when wearing surgical gloves.

	Code	Note	Backing	Adhesive	Gel	Dimensions
	F-RG /6	also available with enhanced adhesion (FS-RG /6), also available as solid gel version (F-RG1 /6, FS-RG1 /6)	PE foam	••	LIQUID GEL	41 x 32mm
	FS-RG1 /10	Also available on card of 6 (FS-RG1 /6)	PE foam	•••	SOLID GEL	41 x 32mm
The state of the s	FS-TC1 /10	Also available on card of 6 (FS-TC1 /6)	PE foam	•••	SOLID GEL	41 x 35mm
	F-TF /6	Also available with enhanced adhesion (FS-TF /6)	PE foam	••	LIQUID GEL	51 x 43mm

	Packaging		
F-RG /6   F-TF /6 FS-TF /6   FS-RG /6	30/pouch	1200/box	4800/case
FS-RG1 /10   FS-TC1 /10	50/pouch	1500/box	6000/case
FS-RG1 /6   FS-TC1 /6	30/pouch	1500/box	6000/case

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# Pediatrics & neonates

## Size and adhesive for pediatrics

Skintact® ECG electrodes for pediatrics and neonates are available in smaller sizes and with a gentle adhesive.

## With an optional carbon snap

Thanks to our wide product range, children's ECG electrodes are also available with the option of a carbon snap or a offset connector.

## Pre-wired

For neonates, we offer pre-wired electrodes to avoid pressure necroses.

	Code	Note	Backing	Adhesive	Gel	Dimensions
•	F-261	Small electrode for the smallest patients	PE foam	••	SOLID GEL	Ø 26 mm
AND PARTY OF THE	F-301	for pediatrics and neonates	PE foam	••	SOLID GEL	Ø 30 mm
Electric Control of Co	F-40	for pediatrics	PE foam	••	LIQUID GEL	Ø 40 mm
Element graduate graduate	F-401	for pediatrics	PE foam	••	SOLID GEL	Ø 40 mm
The state of the s	F-VK01	with offset connection	PE foam	••	LIQUID GEL	45 x 30mm
STATE OF STA	T-401	Breathable backing material	Microporous Tape	••	SOLID GEL	Ø 40 mm
STATE OF STA	W-401	Breathable backing material	Soft Cloth	••	SOLID GEL	Ø 40 mm
•••	W-130C /3	For pediatrics and neonates, X-ray/MR conditional, adhesive area fully covered with gel	Soft Cloth	••	SOLID GEL	Ø 30 mm
900	PD50-SF (150)	With pre-attached 50 cm copper leads with safety plug	Soft Cloth	••	SOLID GEL	24 x 23 mm
<b>*</b>	PD50-SFC	With pre-attached 50 cm carbon leads with safety plug, suitable for use during x-ray	Soft Cloth	••	SOLID GEL	24 x 23 mm
999	PD50-F4C	With pre-attached 50 cm carbon leads with socket for 4mm banana plug, suitable for use during x-ray	Soft Cloth	••	SOLID GEL	24 x 23 mm
	Packag	ing				

	Packaging		
F-40	30/pouch	1200/box	
F261   F301   F-401   T401 W-401   W-130C /3	30/pouch	1500/box	
PD50-SF (150)   PD50-SFC   PD50-F4C	3/pouch	150/box	
F-VK01	50/pouch	500/box	3000/case

# MR-conditional & radiotranslucent

### Oarbon snaps save time and costs

MR-conditional Skintact® ECG electrodes are equipped with carbon snaps. This saves time and costs: If the electrodes have already been applied, they do not have to be removed before X-ray or MRI examinations.

## Skintact® Tab ,N' Snap - Two connection systems

Skintact® Tab ,N' Snap are equipped with two connection systems. This means that the electrodes do not need to be exchanged when the patient is handed over.

	Code	Note	Backing	Adhesive	Gel	Dimensions
Electrical and Electr	F-40C	X-ray/MR conditional for pediatrics	PE foam	••	LIQUID GEL	Ø 40 mm
	F-401C	X-ray/MR conditional for pediatrics	PE foam	••	SOLID GEL	Ø 40 mm
	F-50C	X-ray/MR conditional, also available with enhanced adhesion (FS-50C)	PE foam	••	LIQUID GEL	Ø 50 mm
(100 mg) (100 mg) (100 mg) (100 mg)	F-601 C	X-ray/MR conditional	PE foam	••	SOLID GEL	Ø 50 mm
The state of the s	FS-WA10C	Premium electrode with Tab'n'Snap connection, X-ray/MR conditional, 10 pcs/ card	PE foam	•••	SOLID GEL	32 x 45 mm
•••	W-130C /3	For pediatrics and neonates, X-ray/MR conditional, adhesive area fully covered with gel	Soft Cloth	••	SOLID GEL	Ø 30 mm
	FS-RGC /10	Universal use for adults and children, X-ray/MR conditional, 10 pcs/ card	PE foam	•••	LIQUID GEL	41 x 32mm

	Packaging		
F-40C   F-50C   FS-50C	30/pouch	1200/box	4800/case
F-401C   F-601C   W-130C /3 FS-RGC /10	30/pouch	1500/box	6000/case
FS-WA10C	50/pouch	1500/box	6000/case

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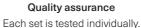
In emergency cases not only the clinician's skills are required but also reliable ranges of life saving products like defibrillation electrodes. These products must perform dependably, even under adverse conditions as every second may count. Leonhard Lang's engineering team has developed reliable and safe multifunctional defibrillation electrodes. They can be used for external defibrillation, non-invasive pacing, synchronized cardioversion and monitoring.

### Advantages of Skintact® defibrillation electrodes:

- Overlapping gel elimination of tin edge exposure minimises the risk of burns
- Adhesion even on perspiring skin
- Maximum contact area and minimum impedance reduce thermal and mechanical stress on the skin
- Multifunctional the electrodes do not need to be changed for different applications.









# Clear application instructions Clear two-color instructions for the

Clear, two-color instructions for the correct placement of the electrodes.



### Quick and easy

An extended peel-off aid facilitates application and removal.

All our Skintact® products are tested according to applicable standards, ensuring maximum safety and reliable performance.

Skintact® Easibeat Multifunction Defibrillation electrodes meet the relevant clauses of IEC 60601-2-4 for Cardiac Defibrillators, and do comply with ISO 10993 for biocompatibility and the European Medical Device Regulation (MDR).

Skintact®

# Defibrillation electrodes

When every second counts, patients around the world can rely on our Skintact® defibrillation electrodes.

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Easibeat
Multifunctional
Defibrillation
electrodes for Adults

Used for external defibrillation, non-invasive pacing, synchronized cardioversion, and monitoring for adults and children.

	Code	Connector compatible with	Cable length
	DF20N	Physio - Control: Lifepak 12, Lifepak 15, Lifepak 20/20e, Lifepak 500, Lifepak 1000, Comen S1, Comen S5, Comen S8	1,2 m
	DF20NC	Physio - Control - preconnect: Lifepak 12, Lifepak 15, Lifepak 20/20e, Lifepak 500, Lifepak 1000	1,2 m
1	DF27N	Philips Heartstart: FR2, FR2+, FR3 (electrode self-test is not supported) With adapter cable M3508A or With adapter cable M3507A and adapter 05-10200: Philips Heartstart MRx, XL, XL+ / Efficia DFM100	2,0 m
John State of the	DF28N	<b>Zoll:</b> E Series, M Series, R Series, X Series	1,2 m
	DF28NC	<b>Zoll – preconnect:</b> E Series, M Series, R Series, X Series	1,2 m
The same of	DF25N	Schiller: Schiller FRED, DG1002, DG3002, DG2000EDOS	2,0 m
The same	DF43N	Nihon Kohden: With pad adaptor JC-755V: TEC-5500 Series, TEC-7600 Series, TEC-7700 Series With pad adaptor JC-855V: TEC-8300 Series	2,0 m
1	DF26N	Philips: With adapter cable M3507A: Philips HeartStart MRx, XL, XL+, Efficia DFM100	1,2 m

	Packaging		
all SKINTACT® Easibeat Multifunction Defibrillation electrodes	1/pouch	10/box	60/case



Easibeat
Multifunctional
Defibrillation
electrodes for
pediatrics

Used for external defibrillation, non-invasive pacing, synchronized cardioversion and monitoring of pediatric patients.

	Code	Connector compatible with	Cable length
(3)	DF31G	<b>Physio – Control:</b> Lifepak 12, Lifepak 15, Lifepak 20/20e	1,2 m
The same	DF32G	Philips Heartstart: With adapter cable M3508A or With adapter cable M3507A and adapter 05-10200: Philips Heartstart MRx, XL, XL+ / Efficia DFM100	1,2 m
The same of	DF30G	<b>Zoll:</b> E Series, M Series, R Series, X Series	1,2 m
Sep.	DF37G	Nihon Kohden: With pad adaptor JC-755V: TEC-5500 Series, TEC-7600 Series, TEC-7700 Series With pad adaptor JC-855V: TEC-8300 Series	2,0 m

	Packaging		
all SKINTACT® Easibeat Multifunction Defibrillation electrodes	1/pouch	10/box	60/case

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Maximising the full potential of advanced electrosurgery in today's market, not only requires the surgeon's skills but also a reliable rang of active and passive accessories. These accessories should offer safety and comfort without compromise to both patient and clinican. Leonhard Lang's range of Skintact Cool Contact Electrosurgical Neutral electrodes and pencils provide the highest degree of safety.

#### Advantages of Skintact® neutral electrodes:

- Skintact® Cool Contact neutral electrodes are available for adults and children, split and unsplit, with or without a preattached cable
- The unique overlapping gel technology minimizes the risk of burns due to elimination of aluminum edge exposure.
- The round leading edge geometry of universal Neutral electrodes disperses current more efficiently thus maintaining a cooler interface between patient and neutral electrode.
- The peel-off aid allows easy removing from its cover or the patient's skin.
- The flexible, thin foam of the RS and RO series and the lowprofile fabric of the WR series are impermeable to liquids. They adapt to the body surface and provide safety.
- Ouplex labels reduce the documentation effort.





All our Skintact® products are tested according to applicable standards, ensuring maximum safety and reliable performance.

Skintact® Cool Contact Electrosurgical Neutral electrodes meet the relevant clauses of IEC 60601-2-2 for high frequency surgical equipment, and do comply with ISO 10993 for biocompatibility and with the Medical Device Directive (MDD). The transition to comply to the European Medical Device Regulation (MDR) is initiated and will be performed soon.



# Neutral electrodes

Especially in electrosurgical procedures, it is important that electrodes and accessories provide absolute safety.

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# Neutral electrodes

	Code	Туре	Size	Weight Limit	Conductive Area
1	RO21 RO21/5	split	universal	> 5 kg	107 cm <sup>2</sup>
-	WR21 WR21/5	split	universal	> 5 kg	90 cm <sup>2</sup>
	RS25 RS25/5	split	adult	> 15 kg	118 cm <sup>2</sup>
	R\$27 R\$27/5	split	adult	> 15 kg	120 cm <sup>2</sup>
-	RS26**	split	paediatric	5 - 15 kg	66 cm <sup>2</sup>

# Neutral electrodes with cables

	Code	Туре	Size	Weight Limit	Conductive Area
<b>6</b> 0	RO21A30	split	universal	> 5 kg	107 cm²
<b>6</b>	WR21A30	split	universal	> 5 kg	90 cm <sup>2</sup>
<b>O</b>	RS25A30	split	adult	> 15 kg	118 cm <sup>2</sup>
<b>©</b>	RS27A30	split	adult	> 15 kg	120 cm <sup>2</sup>
	RS26A30**	split	paediatric	5 - 15 kg	66 cm <sup>2</sup>

<sup>\*</sup> On request we also offer Neutral electrodes for specific types with 5m cable. \*\* Power & Current Information: maximum 120 Watt

Packaging			
for all SKINTACT® Neutral electrodes	1/pouch	50/box	
for all SKINTACT® Neutral electrodes with Code /5	5/pouch	50/box	



# Pencils & Tip Cleaner

- Single use eliminates risk of cross infection
   Sterile, easy to open packaging
   More cost effective than cleaning reusable versions

	Code	Info	Cable length	Connector	Quantity per box
000	HCP-01	Sterile Fingerswitch Pencil, standard blade	3 m	3 Pins at 4 mm each	50 pcs
00	HCP-02	Sterile Fingerswitch Pencil, standard blade	3 m	1 Pin at 5 mm	50 pcs
000	HCP-05	Sterile Fingerswitch Pencil, standard blade	5 m	3 Pins at 4 mm each	50 pcs
	TC 1001	Sterile Tip Cleaner			100 pcs

# Reusable Cables

Reusable Neutral electrode Cable with embossed lot number for easy tracking.

	Code	Cable length	Connector
-	NEK300A NEK500A	3 m 5 m	REM™ (Valleylab™)
No.	NEK300D NEK500D	3 m 5 m	6,3 mm jack (Standard)
	NEK300H NEK500H	3 m 5 m	6,3 mm jack (Erbe)

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