CREDO® healNeuroSpeed®StentPTA Balloon Catheter

Antithrombogenic coating* For vessel diameters from 2.0 – 4.5 mm Approved for acute (LVO) and elective stenting Balanced radial force especially for the treatment of intracranial stenoses

*The antithrombogenic properties were demonstrated in non-clinical tests



HEAL TECHNOLOGY

ORDERING INFORMATION | CREDO® heal with NeuroSpeed®

Labelled CREDO® heal Dimensions (mm)	Reference Number	Stent Diameter (mm)	Stent Length (mm)	Recommended Vessel Diameter (mm)	Required Catheters for Delivery
3.0 × 15	01-001930	3.0	15	2.0-2.5	
3.0 × 20	01-001931	3.0	20	2.0-2.5	
3.0 × 25	01-001932	3.0	25	2.0 – 2.5	
3.0 × 30	01-001933	3.0	30	2.0 – 2.5	
4.0 × 15	01-001940	4.0	15	2.5-3.5	
4.0 × 20	01-001941	4.0	20	2.5-3.5	NeuroSpeed®
4.0 × 25	01-001942	4.0	25	2.5 – 3.5	PTA Balloon Catheter
4.0 × 30	01-001943	4.0	30	2.5 - 3.5	
5.0 × 15	01-001950	5.0	15	3.5-4.5	
5.0 × 20	01-001951	5.0	20	3.5-4.5	
5.0 × 25	01-001952	5.0	25	3.5-4.5	
5.0 × 30	01-001953	5.0	30	3.5-4.5	

Labelled NeuroSpeed® Dimensions (mm)	Reference Number	Balloon Diameter (mm)	Balloon Working Length (mm)	ID (Inch)	OD dist. / prox. (French)	Usable Length (cm)
1.5 × 8	01-000605	1.5	8	0.0165	2.7 / 3.7	150
2.0 × 8	01-000600	2.0	8	0.0165	2.7 / 3.7	150
2.5 × 8	01-000601	2.5	8	0.0165	2.7 / 3.7	150
3.0×8	01-000602	3.0	8	0.0165	2.7 / 3.7	150
3.5 × 8	01-000603	3.5	8	0.0165	2.7 / 3.7	150
4.0×8	01-000604	4.0	8	0.0165	2.7 / 3.7	150

Inflation Pressure (bar)	NeuroSpeed® Diameter (mm)						
	1.5	2.0	2.5	3.0	3.5	4.0	
2.0	1.21	1.72	2.09	2.42	3.06	3.26	
4.0	1.37	1.84	2.33	2.78	3.25	3.72	
6.0	1.50*	2.00*	2.50*	3.00*	3.50*	4.00*	
8.0	1.67	2.16	2.65	3.22	3.69	4.23	
10.0	1.85	2.27	2.75	3.38	3.83	4.37	
12.0	2.02	2.39	2.87	3.54	3.97**	4.53**	
14.0	2.20**	2.52**	2.98**	3.73**	-	-	

* Nominal pressure ** Rated burst pressure

All changes or modifications, may they be technical or other, or changes in the availability of products are expressively reserved. Please contact your local Acandis[®] representative for product availability and information on compatible (micro)catheters. Not available for sale in the United States.



engineering stroke solutions



ACCERO[®] heal Stent

ACCLINO[®] heal Stent

> **CREDO®** heal Stent



DERIVO[®] 2heal[®] **Embolisation Device**



Next Generation of Antithrombogenic Coating







HEAL TECHNOLOGY

Antithrombogenic Anti-inflammatory Endothelialisation-promoting



Natural fibrin network before endothelialisation



An entirely new approach for rapid healing of vascular lesions after device implantation

The HEAL Technology imitates the last step of natural haemostasis by forming a thin and fully cured fibrin network on the implant surface.

In conjunction with covalently bound heparin to the fibrin network, the HEAL coating exhibits an unique combination of antithrombogenic, anti-inflammatory and endothelialisation-promoting properties.



Prof. Dr. Meltem Avci-Adali Research Director Thoracic and Cardiovascular Surgery, University Hospital Tübingen, Germany

"In preclinical studies, HEAL coated devices have shown significant minimisation of thrombogenic and inflammatory responses. Together with the simultaneous potential to promote endothelialisation, HEAL technology represents a promising strategy to improve the treatment of patients with endovascular diseases, such as intracranial aneurysms."

Antithrombogenic - reduced risk of device thrombosis

The fibrin-heparin coating passivates the surface and reduces platelet activation and coagulation cascade.

Deposits from the blood and thrombogenicity of vascular devices are significantly reduced. Thereby the coating is non-eluting and has no pharmacological effect.



SEM images of uncoated and HEAL coated devices after incubation in a Chandler Loop with human blood

Anti-inflammatory - reduced risk of inflammatory reactions

Fibrin network

Heparin

SC5b-9 is a plasma protein from the complement system. *In vitro* investigations indicate a very low activation of the immune system with HEAL coated devices comparable to the control group (blood without device).

The complement system is significantly less activated by DERIVO[®] 2heal[®] compared to other commercially available coated flow diverters.



Atomic Force Microscope image of HEAL coated glass

Endothelialisation-promoting - accelerates healing of implant lesion

Wound healing assay using HUVECs* indicate that HEAL coated nitinol surfaces do not impede endothelial cell proliferation compared to an uncoated TiO2 surface. Moreover, the fibrin-heparin coating promotes endothelial cell covering.

PP <u>
PD 20 μm</u>

*Human Umibical Vein Endothelial Cells.

Wound healing assay using HUVECs