

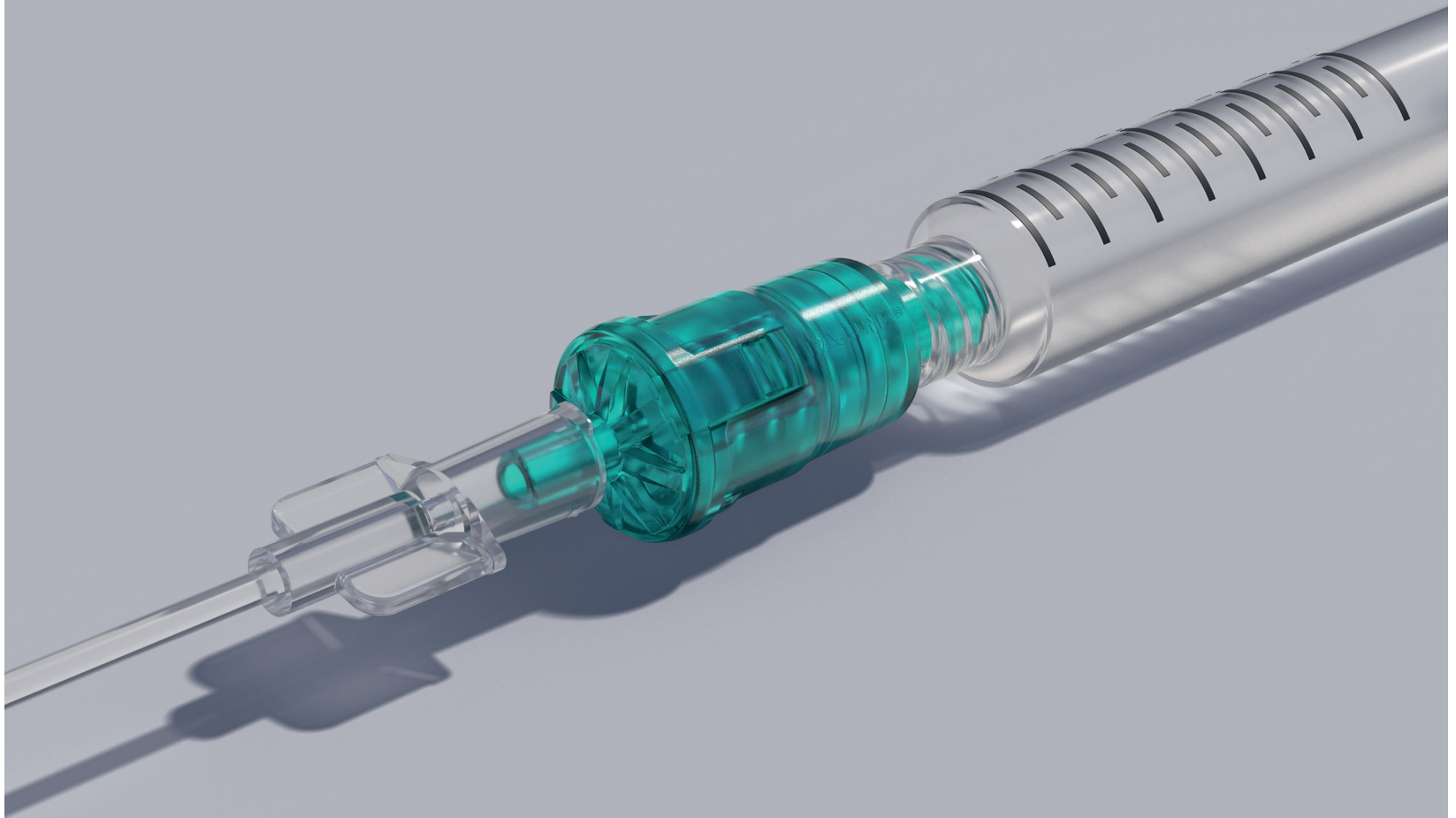
# PAJUNK®



REGIONAL ANAESTHESIA  
& PAIN MANAGEMENT

## *NerveGuard*

*Automatic Injection  
Pressure Limiter*



MADE IN GERMANY 

## NerveGuard

# The Automatic Injection Pressure Limiter

Ultrasound-guided localisation of peripheral nerves and the associated real-time visualisation provide crucial benefits in regional anaesthesia.<sup>1</sup> Nonetheless, it is clear that this does not reduce the incidence of permanent nerve damage.<sup>2</sup> Even in combination with nerve stimulation, intrafascicular injections cannot be ruled out.<sup>1,3,4,5</sup> The causes include incorrect positioning of the needle along with exceeding critical injection pressures. With the NerveGuard, developed by Pajunk, the injection pressure is automatically limited to avoid nerve damage.



Also available in **NRFit**<sup>®</sup>



For single shot applications  
in diameters of  
**20G / 21G / 22G**

## HOW IT WORKS



- ▶ Automatically blocks injections when injection pressure exceeds the limit value
- ▶ No monitoring and no visual control necessary

## BENEFITS



- ▶ Detects incorrect needle positioning (fascia or nerve contact)
- ▶ Prevents intrafascicular injections in cases of excessive pressure
- ▶ Provides important information regarding position correction
- ▶ Avoids nerve damage and increases patient safety

1. Choquet O., Capdevila X. Ultrasound-guided nerve blocks: the real position of the needle should be defined. *Anaesth. Analg.* 2012 May; 114(5): 929-930  
2. Neil J. M., Brull R., Horn J. L., Liu S. S., McCartney C. J., Perlas A., Salinas F. V., Tsui B. C. The Second American Society of Regional Anesthesia and Pain Medicine Evidence-Based Medicine Assessment of Ultrasound-Guided Regional Anesthesia. *Reg. Anaesth. Pain Med.* 2016 March-April; 41(2): 181-194  
3. Roberts C., Hadzic A., Somasundaram L., Iwata T., Godsden J., Xu D., Sala-Blanch X. Intraneural injection with low-current stimulation during popliteal sciatic nerve block. *Anesth.* 2009 Aug; 109(2): 673-677  
4. Vassiliou T., Müller H. H., Limberg S., De Andres J., Steinfeldt T., Wiesmann T. Risk evaluation for needle-nerve contact related to electrical nerve stimulation in a porcine model. *Acta Anaesth. Scand.* 2016 Mar; 60(3): 400-406

Description	Item no.	Item no. NRFit <sup>®</sup>	PU
NerveGuard / single / sterile / For single shot applications in diameters of 20G / 21G / 22G	001151-38M	001163-38M	10

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