

# Product Specification

Form Ref. ST-62000 Rev.: A4

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# STERIKING® See-through Self-sealable Pouches

The STERIKING® See-through Self-sealable pouches are intended for use as packing material for medical devices in sterilization by steam, ethylene oxide gas, or by formaldehyde in health care establishments. The common steam sterilization conditions are 3 minutes at 134°C or 15 minutes at 121°C. The products are for single use only.

# **Conformity to International Standards**

The STERIKING® See-Through range of peel packages conform to the international product standards and norms: ISO 11607-1:2006, ISO 11607-2:2006 and EN 868-5:2009.

The products are registered under Class 1 as accessories in compliance with the European Medical Device Directive 93/42/EEC and its amendment 2007/47/EC. To show compliance with MDD the CE mark is printed on the label of the transport carton.

The products are registered by FDA under 510(k) Premarket Submission Nos. K803293 and K953776.

Wipak Oy is certified to ISO 9001:2008; ISO 13485:2003; ISO 14001:2004; OHSAS 18001: 2007 and ISO 22000:2005.

STERIKING® sterilization packages are designed, validated, and manufactured to suit their intended purposes.

#### **Technical Data & Performance Characteristics**

The STERIKING® See-Through packages are constructed of medical grade paper (70g/m²) that is heat-sealed together with a multiply PET/PP-plastic laminate (12/40 microns. Pouches are intended for closing tightly with adhesive strip.

### **Specific Product Features**

#### **Dimensions and Tolerances**

Width: nominal +/- 1 mm Length: nominal +/-3 mm

## **Heat Seal Design**

The seal is formed to facilitate easy opening. The width and the strength of the seal are specified in order to achieve the optimum strength necessary for autoclaving and at the same time to facilitate easy opening of the pack. The seal is ribbed having 3 aligned sealed lines and the total width is minimum 6 mm.

#### **Heat Seal Strength**

Flat pouches: Minimum strength tested with tail supported

up to 100 mm wide 140 N/m (2,1 N/15 mm) wider than 100 mm 165 N/m (2,5 N/15 mm)

### **Direction of Peel**

The correct direction of peel is marked on each individual pouch in order to ensure safe opening without breaks and/or fiber tear.

#### Lot Coding

Each pouch bears a code number enabling traceability of the production history.

The code is YYMM (year / month) e.g. 1201 = January 2012 etc. Converting lane numbering offers added value for production traceability.

### **Chemical Indicators**

conform to ISO 11140-1:2005 class 1: Process indicators

Steam indicator changes from red to brown and

EO gas from transparent to gold





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The paper is a high-weight medical grade with improved barrier and water repellent properties. The controlled pore size provides for effective air evacuation and steam penetration. The specially treated surface facilitates strong sealing against the film but allows fiber-free peeling off without breaks. The paper conforms to the requirements of the European EN 868-3:2009 and it is free from dirt, toxic substances and odor.

Medical Grade Paper						
Property	Test Method	Unit	Typical	Tolerances		
Grammage	ISO 536	g/m²	70	67-73		
Tensile strength, MD	ISO 1924-2	kN/m	7,3	>5,1		
Tensile strength, CD	ISO 1924-2	kN/m	4,0	>2,6		
Tear strength, MD	ISO 1974	mN	700	>550		
Tear strength, CD	ISO 1974	mN	750	>550		
Burst strength	ISO 2758	kPa	400	>270		
Air permeability	ISO 5636-3	µm/Pa·s	13	5,3-14,2		
Air resistance Gurley	ISO 5636-5	S	11	9-20		
Sterilization method	Steam, gas					

The Wipak Multi-X film is transparent, non-toxic and heat sealable with medical grade paper. It can be sterilized at the extreme sterilization conditions of 140 °C (284° F) for 10 minutes. In addition it can be sterilized using low temperature sterilization methods (other than irradiation). The materials have been permitted for use in contact with food and drugs by the German BGA and the American FDA.

Multi-X9 Film					
Property	Method	Unit	Nominal		
Thickness		μm	52		
Weight		g/m²	53		
Tear strength, MD	ISO 6383-2	mN	300		
Tear strength, CD	ISO 6383-2	mN	300		
Elongation at break, MD	ISO 527-3	%	70		
Elongation at break, CD	ISO 527-3	%	70		
Sterilization method	steam, gas				

MD= machine direction, CD= cross direction Test conditions: 23°C, 50 RH-%

#### Storage Recommendations & Shelf Life

It is recommended that the STERIKING® products are kept in the original, closed transport carton and are stored in dry and clean conditions protected from direct sunlight and excessive moisture.

It is recommended that the products are put to their end use within 3 years of manufacture. The recommended "Best before" date and the manufacturing date are stated on the carton label. However, depending on the requirements of the user, products older than three years may still be useable if the storage conditions have been according to the recommendations. No collapsing of performance of the product will take place after any time period. In the cases where the recommended expire date has been exceeded it is advisable to test the product prior to use.

#### **Restrictions in Use**

The STERIKING® standard range of See-through packages is not suitable for sterilization by irradiation or by hot, dry air at the temperatures over 140 °C. Some restrictions may also be valid when plasma sterilization processes are concerned.





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#### Sales and Transport Packing

Pouches are bound with a plastic or paper strip into bundles of 100 pieces. These bundles are first packed into a bleached cardboard dispenser, 2 bundles each. The dispensers are then packed into a polyethylene (LDPE) dust cover and then finally into an unbleached corrugated cardboard case (partially recycled and further recyclable). The case is closed with adhesive coated polypropylene tape. Cases are palletized to reusable wooden EUR size pallet and covered by plastic pallet-tightening bands (PET). Partially recycled and further recyclable cardboard-sheet is placed on the bottom of the pallet.

Please refer to the local/national regulations regarding waste disposal.

Labelling: Each case bears a label with the necessary information/instructions for the contents of the case in accordance with ISO 11607-1:2006 and EN 868-5:2009.

#### In Case of Complaint

In event of any complaint, the lot number and identification code must be provided by the complainant. For evaluation of claimed product, a defective sample (or a digital photo) and description of the defect together with an unused specimen must be made available to Wipak.

STERIKING® is a registered trade mark of Wipak Oy.

#### Steriking® Self-seal Plus

Code	Size (mm)	Sales Packing
		(Pouches/Case)
SS-T1	90 x 200	1 000
SS-T2	90 x 250	1 000
SS-T3A	100 x 640	1 000
SS-T4	130 x 270	1 000
SS-T4A	130 x 380	1 000
SS-T5A	190 x 330	1 000
SS-T6	250 x 400	600
SS-T7	300 x 450	600

This specification refers to the named product group and shall be valid until the next revision. Other product related documents may be available upon request.

The information contained here is to our knowledge accurate and reliable as of the date of the publication. Wipak extends no warranties and makes no representations as to the accuracy or completeness of the information contained herein, and assumes no responsibility regarding the consequences of its use or for any printing errors. It is the customer's responsibility to inspect and test our products in order to satisfy himself as to the suitability of the products for the customer's particular purpose and suitability to the actual circumstances the product is exposed to. The customer is also responsible for the appropriate, safe and legal use, processing and handling of our products especially when recommendations for safe use and storage are given. Nothing herein shall constitute any warranty, nor is a protection from any law or patent to be inferred

