

# Fianchetto Retractor

## Description

The **Fianchetto Retractor** is a self-retaining surgical instrument primarily used to hold open the chest wall during thoracic surgeries. Known for its sturdy, ratcheted mechanism and adjustable blades, this retractor provides excellent exposure in procedures involving the rib cage and lungs. It is a critical tool in both human and veterinary thoracotomy operations.

## Specifications

- **Material:** Surgical-grade stainless steel (SS 304 or SS 316)
- **Frame Type:** Rib-spreading with ratchet gear mechanism
- **Blade Movement:** Adjustable lateral movement with locking positions
- **Blade Types:** Solid, fenestrated, or contoured blades
- **Width Adjustment:** Typically up to 12–15 cm spread
- **Sterilization:** Fully autoclavable

## Sizes

Available in various sizes based on species or surgical application:

- **Small:** For small animals or paediatric use (blades 30–50 mm)
- **Medium:** For general thoracic use (blades 50–75 mm)
- **Large:** For large animals or adult human thoracotomy (blades 75–100+ mm)

## Shapes

- U-shaped base with horizontally adjustable arms
- Blades can be straight, curved, or contoured to match thoracic anatomy

## Types

- Standard Fianchetto Retractor
- Paediatric Fianchetto
- Extra-long arm fianchetto for deep thoracic procedures
- Modified designs with silicone blade covers (optional)

## **Material**

- Surgical stainless steel for durability and sterility
- Optional silicone blade protectors for delicate tissue handling

## **Category**

- Surgical Retractors
- Thoracic Surgery Instruments
- Self-Retaining Surgical Equipment

## **Product Form**

- Complete unit with base frame, ratchet mechanism, and removable blades
- Supplied sterile or non-sterile depending on packaging
- Optional accessories: extra blade sets, silicone covers

## **Usage**

Used to retract ribs or thoracic walls in surgical procedures, such as:

- Open thoracotomy
- Lung resections or biopsies
- Cardiac surgeries (in veterinary and human cases)
- Trauma surgeries involving the chest cavity

## **Advantages**

- Provides excellent, stable retraction of the chest wall
- Hands-free operation allows the surgeon unobstructed access
- Durable for repeated use and high-pressure applications
- Adjustable to suit multiple surgical scenarios and species

## **Disadvantages**

- Can exert high pressure on ribs if improperly positioned
- Heavier than some handheld retractors
- May cause soft tissue damage if used without care
- Requires sterilization and maintenance of the ratchet gear

## **Precautions**

- Position blades carefully to avoid rib fracture or nerve injury
- Always check ratchet mechanism before surgery
- Avoid excessive spreading to prevent trauma to intercostal tissues
- Clean and lubricate mechanical parts regularly to ensure smooth function

## **HS / HSN Code**

- **HS Code:** 9018.90
- **HSN Code:** 90189099  
*(Covers surgical instruments and appliances, including retractors)*

## **Handling Instructions**

- Hold frame securely during blade placement
- Ensure even retraction on both sides to prevent tissue stress
- Clean thoroughly post-surgery, especially the ratchet gear
- Store in a sterilized, padded case to avoid damage to blades

## **Sterilization Details**

- Fully autoclavable at 121°C for 15–20 minutes
- Can be disinfected with enzymatic cleaners before autoclaving
- Avoid harsh abrasives on the ratchet teeth or moving parts

## **Veterinary Application**

- Widely used in thoracic surgeries for large and small animals
- Allows for exposure of lungs, heart, and mediastinum in dogs, cats, and livestock
- Common in referral centres, veterinary teaching hospitals, and specialized surgical practices
- Paediatric versions used in small or exotic animals

## **Human Application**

- Standard in human cardiothoracic surgery
- Used during lung resections, open-heart surgeries, trauma thoracotomy, and oesophageal procedures
- Provides firm, reliable rib spreading while minimizing operative disruption

## **Frequently Asked Questions (FAQs)**

**Q1. What is a fianchetto Retractor used for?**

**Answer:** It's used to hold open the rib cage or thoracic cavity during chest surgeries.

**Q2. Is it suitable for veterinary use?**

**Answer:** Yes, it's widely used in veterinary thoracotomies for both small and large animals.

**Q3. Is it reusable?**

**Answer:** Yes, it's made of surgical stainless steel and designed for repeated sterilization and use.

**Q4. Are there different sizes?**

**Answer:** Yes — small, medium, and large sizes are available depending on the patient and procedure.

**Q5. How is it sterilized?**

**Answer:** It can be sterilized by autoclaving or with approved chemical disinfectants.