



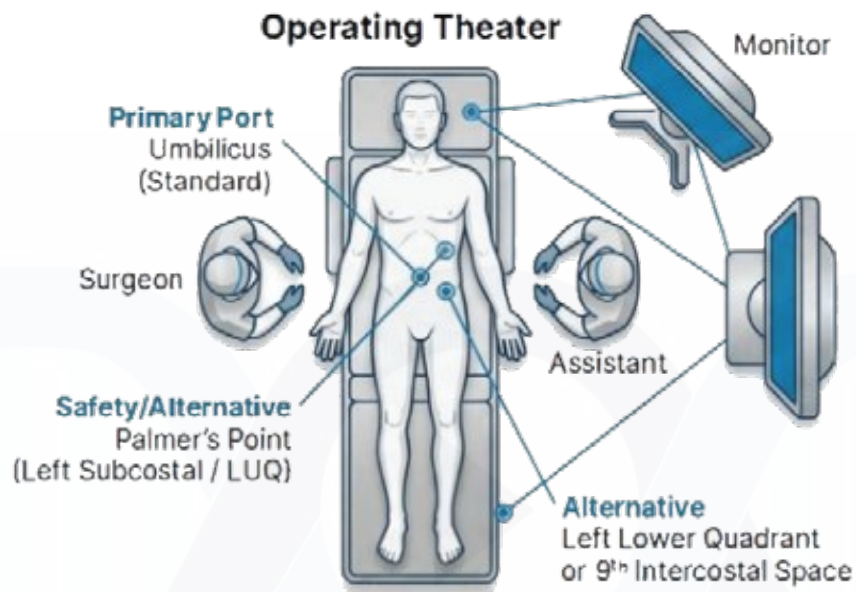
PG Residency Laparoscopy Surgery

Smart Notes. Better Scores.



Laparoscopy Setup & Port Placement

Positioning for Success

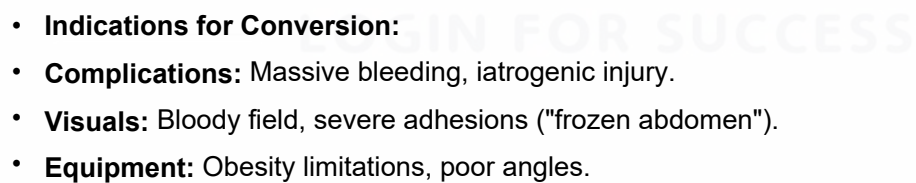


Trauma **Absolute Contraindications**

- Ruptured diaphragm with tension pneumothorax
- Hemodynamic instability

Patient Positioning

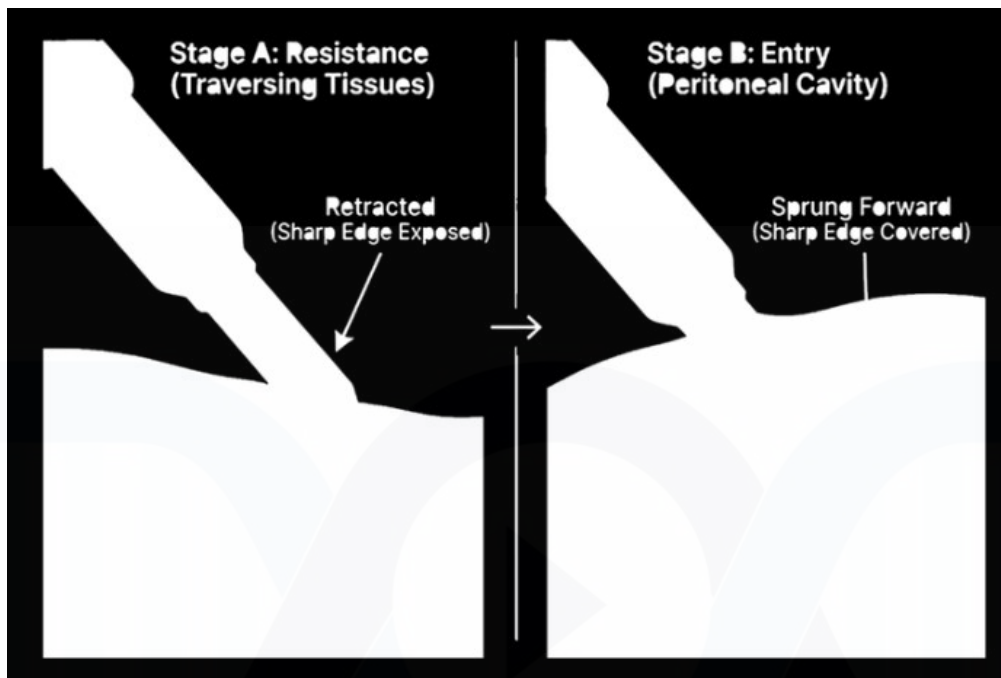
- **Flat:** Males (non-pelvic pathology)
- **Modified Lithotomy:** Females (pelvic pathology) or unclear diagnosis



2

The Veress Needle

Mechanics&MandatorySafety Tests



Safety Verification (Pre-insufflation)

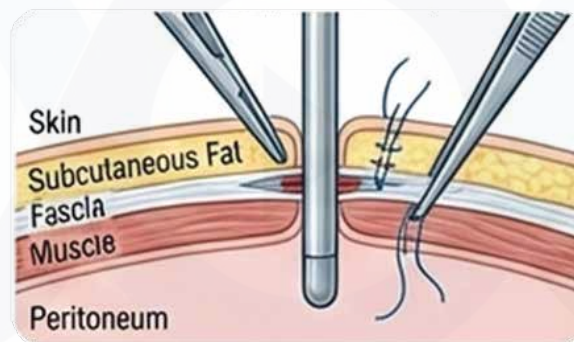
- **Click Test:** 2 clicks (umbilicus) indicates fascia + peritoneum traversal.
- **Aspiration Test:** Syringe check negative for blood or bowel content.
- **Drop Test:** Saline flows freely down the needle.
- **VIP Test:** Initial pressure must be <10 mmHg.

Trocars & Entry Systems

Selection & The Hasson Technique

TYPE	ICON	DESCRIPTION
Disposable		Sharp, expensive, shield mechanism
Reusable		Stainless steel, cost-effective, maintenance heavy
Optical		Direct vision entry
Bladeless		Radial dilation (separates fibers)

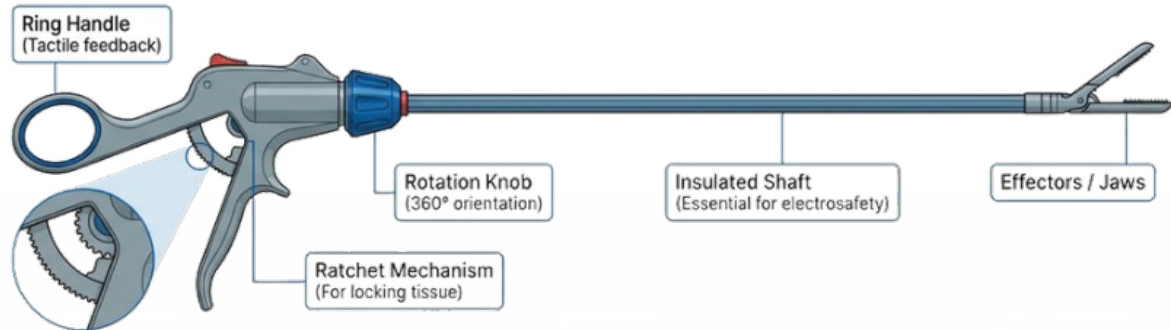
The Hasson Technique (Open)



- **Featured Highlight:** SurgicalBlueonline + Brushed Steel
- **Description:** Directdissectiontoperitoneum + Blunt Obturator + Fascial Sutures to seal.
- **Primary Indication:** **Safest method** for patients with previous surgeries or adhesions.

Instrument Anatomy

Handles, Shafts, & Ergonomics



DATA SPECIFICATIONS

Standard Length: 33–36 cm.
Bariatric Length: 45 cm.

Handle Variants: Pistol Grip (High force/Staplers), Axial (Hooks/Suction).
Ergonomics: Ideal grip angle 140–143 degrees to reduce fatigue.

Distal Effectors: Know Your Tips

Traumatic vs. Atraumatic Design

Maryland Dissector



Atraumatic (Manipulation)

Cobra/Alligator



Traumatic (Resection/Removal)

Metzenbaum Scissors



Cutting

Needle Holder



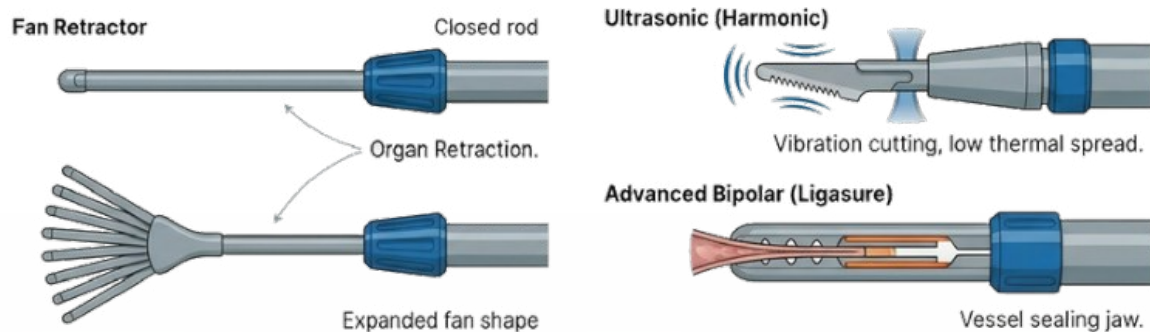
Suturing (Tungsten carbide)

DATA SPECIFICATIONS

- **Graspers:** Selected based on tissue fragility.
- **Scissors:** Usually connected to electrosurgery; serrated edges prevent tissue slip.
- **Clip Applicators:** Titanium or Polymer clips for vessel ligation.

Advanced Instruments & Energy

Exposure and Hemostasis



DATA SPECIFICATIONS

- **Retractors:** Fan (expands inside), Goldfinger/Nathanson (Liver retraction).
- **Articulation:** Tips with "wrist dexterity" for difficult angles or SILS.
- **Suture Passers:** Essential for port closure and hernia repair.

Mechanics & Maintenance: Ensuring Function and Safety



Maintenance Protocols

- **Cleaning:** Disassemble → Enzymatic/Ultrasonic clean → Rinse immediately (Bio-burden removal).
- **Insulation Check:** Mandatory to prevent capacitive coupling and bowel burns. (Warning in Arterial Red)
- **Sterilization:** Autoclave (Standard) or Low-temp (Sensitive items).

Complications & Future Trends

Risks of Instrumentation



Complications

- **Insulation Failure:** Causes thermal injury outside visual field.
- **Direct Injury:** Visceral perforation or vascular injury during blind entry.
- **Retrieval:** Lost parts require immediate retrieval (laparoscopic or open).

Future Trends

- Robotic Integration & Smart Instruments {Haptic feedback}.
- 3D Printing (Patient-specific design).

Clinical Modernism - Surgical Technique & Safety Protocols



Surgery

Clinical Case

Structured Clinical Case Videos



Watch Now →

PG Residency + NEET SS 2 + 1 Combo **NEW**

One Plan. Two Goals. Your Best Future.

Designed for PG Residents preparing for
both **PG Residency & NEET SS.**



Structured Learning

Subject-wise &
Systematic



Consistent Practice

High-yield QBank +
Regular Tests



Smart Revision & Recall

Revision Notes +
Memory Boosters



FREE Access
in PG Year 1



Pay Only for
PG Year 2 & Year 3



Lock
Today's Price

2 Goals. 1 Plan.

Finish Strong in **PG Residency.**
Crack **NEET SS.**

Subscribe Now

