



UNDERSTAND YOUR CHOICES

Varicocele: compare the repair options

Embolization and microsurgery answer the same problem in different ways.

A varicocele is a group of enlarged scrotal veins. Many need no treatment. Repair may be considered for persistent bothersome pain, testicular growth concerns, or selected fertility problems after an examination and appropriate testing.

Featured option: varicocele embolization

Dr. Shusterman prefers discussing embolization early when repair is appropriate. A specialist uses a small catheter to block abnormal veins, avoiding a scrotal incision. It can reduce recovery burden, but it is not automatically the best choice for every patient or every fertility problem.

Two routes to redirect abnormal venous flow**Embolization**

A catheter blocks the abnormal vein from inside.

Microsurgery

An incision allows selected veins to be tied off.

1**Establish the goal**

Is the concern pain, fertility, growth or another diagnosis?

2**Assess both routes**

Review anatomy, semen results when relevant, prior repair and specialist expertise.

3**Track the outcome**

Agree on symptom review and, for fertility, a semen-testing and couple-based plan.



COMPARE THE OPTIONS

Benefits, burdens & fit

Use this comparison to prepare for a shared decision.

OPTION	WHY CONSIDER IT	WHAT TO WEIGH
Observation and symptom measures	Reasonable for many painless varicoceles with no fertility or testicular concern.	A finding on ultrasound alone does not prove repair will improve fertility. New or unusual swelling needs assessment.
Percutaneous embolization	Image-guided catheter treatment using coils and/or other agents; usually outpatient with local numbing and possible sedation.	Contrast and radiation, access-site bleeding, vein injury, unintended embolization and recurrence are possible. Sometimes the vein cannot be reached.
Microsurgical varicocelectomy	An incision allows abnormal veins to be tied off while preserving important structures.	Has established fertility evidence in selected men; risks include recurrence, hydrocele, bleeding and rare testicular-artery injury.
Other surgical approaches	Open non-microsurgical or laparoscopic repair may be appropriate in selected circumstances.	Anesthesia, recovery and recurrence/hydrocele risks differ; ask why that technique is recommended.

Not every option is right for every person. Confirm the treatment, provider and location at your consultation.



BRING THIS PAGE TO YOUR VISIT

Your questions. Your next step.

A useful appointment ends with a plan you understand.

Questions to ask

- ☐ Does this varicocele actually need repair?
- ☐ Am I a candidate for embolization and microsurgery?
- ☐ Which option has the strongest evidence for my specific goal?
- ☐ If access fails or veins recur, what would happen next?

What you can do now

- For fertility, evaluate both partners rather than attributing every difficulty to a varicocele.
- Pain may have another cause and may persist despite a technically successful repair. Pregnancy is not guaranteed.
- AUA/ASRM guidance supports considering surgery for palpable varicocele with infertility and abnormal semen parameters; embolization should be compared honestly with that evidence.

When to seek urgent care

Sudden severe testicular pain, fever with scrotal redness, rapid swelling or a new firm lump needs urgent assessment. Do not delay emergency evaluation while arranging an elective varicocele consultation.

My next step / follow-up date: _____

Further reading & sources

1. ACR/RSNA RadiologyInfo - treatment information
2. American Urological Association - guideline

Further reading: A Urology Consult in a Book, by David Shusterman, MD.



HOW OUR PRACTICE APPROACHES CARE

Modern tools. Less burden.

Our office approach is separate from the general treatment comparison.

The least invasive effective path

We prioritize effective care with less procedural burden when it fits your diagnosis, anatomy and goals. Our interventional service invests in advanced imaging for targeted procedures; equipment and manufacturers change over time. Imaging, contrast, radiation and anesthesia are discussed for your particular treatment.

Focused ultrasound expertise

Our practice provides modern in-office ultrasound for urology, gynecology and interventional care. Experienced, dedicated ultrasound technologists focus on these specialties, with much of their work in urology. An in-house radiologist interprets images, and treating physicians trained in image interpretation also review relevant studies. Ultrasound uses no ionizing radiation; CT, MRI or other tests may still be needed.

Prompt answers and a clear follow-up plan

We usually generate ultrasound reports and explain the findings and follow-up to patients the same day. Some studies need additional review, and turnaround varies. Ask what the result means and what happens next. Confirm your service and location before visiting.

More of your evaluation in one place

In-office blood collection and urine testing can reduce separate testing visits; preparation and result timing depend on the test. Bladder ultrasound can measure urine remaining after urination. For suitable men, we favor noninvasive UroCuff pressure-flow assessment when it can answer the question, rather than routine catheter-based urodynamics. These tests are not interchangeable; complex cases may need additional studies.