DR. CHIRAG GUPTA | UROLOGY & ANDROLOGY

Testicular Sperm Aspiration (TESA)

Patient guide | Sperm retrieval procedures

Use this guide to prepare questions for your urologist. Your individual plan may differ.

What it is

TESA uses a fine needle to aspirate tissue and fluid from the testicle; a laboratory examines the sample for sperm.

When it may be considered

TESA may be considered for selected people with azoospermia when sperm retrieval is part of a fertility plan. The suspected cause matters: in obstructive azoospermia, sperm may be retrieved from the epididymis or testicle. For non-obstructive azoospermia, guideline-based care generally discusses microdissection TESE rather than relying on aspiration alone.

What happens

The clinician numbs the area or provides an appropriate nerve block or anaesthetic, then passes a fine needle through the skin into the testicle to aspirate a sample. No surgical incision is made for the needle entry. The laboratory checks the sample for sperm. If retrieved, sperm may be used for ICSI or frozen when suitable.

Preparing for the procedure

Discuss medicines, allergies, bleeding problems, prior procedures and the plan if sperm are not found. Ask whether you need to fast, arrange transport, coordinate with the fertility laboratory or change any medicines. Follow the written instructions from your own care team.

Recovery and possible risks

Temporary soreness, bruising or swelling can occur. Possible risks include bleeding, infection, pain, no usable sperm being found, injury to testicular tissue and needing another procedure. Follow the clinician’s instructions about activity, scrotal support, pain relief and follow-up.

Questions to discuss

Why is aspiration recommended in my case? Is my azoospermia obstructive or non-obstructive? What is the next option if TESA does not find sperm? How will the sample be used or stored?

Sources for further reading

• Urology Care Foundation - Sperm Retrieval
• AUA/ASRM Guideline - Male Infertility, Part II

General educational information only; it is not a diagnosis or a substitute for advice from your treating clinician. Follow instructions specific to you.