

Beaumont

Origination: 4/23/2021
Effective: 4/23/2021
Last Approved: 4/23/2021
Last Revised: 4/23/2021
Next Review: 4/23/2023
Document Contact: [Rebecca Bacarella: Mgr](#)
[Laboratory](#)
Area: [Laboratory-Hematology](#)
Key Words:
Applicability: [Royal Oak](#)

Post Vasectomy Check- RO

Document Type: Procedure

I. PURPOSE AND OBJECTIVE:

The purpose of this procedure is to guide the laboratory in performing a post vasectomy check.

II. PRINCIPLE:

Following a vasectomy, no sperm should be present in seminal fluid. Presence of sperm can indicate that the procedure was not successful and may result in an unplanned pregnancy. This test is performed only to indicate the presence or absence of sperm following a vasectomy procedure. Post vasectomy checks are performed for **Outreach (formerly BRL) clients only**.

III. SPECIMEN COLLECTION AND HANDLING:

Type:	Seminal fluid collected in a sterile container.
Anticoagulant:	None
Amount:	Minimal sample size is 1.0 mL Optimum sample size is 3.0 mL
Specimen Handling:	Specimen must be well mixed before being analyzed.
Timing:	Receipt of specimen is preferred within 24 hours of collection. Keep at room temperature.
Criteria for unacceptable specimens:	Inappropriate volumes are unacceptable and must be re-collected.

IV. EQUIPMENT/REAGENTS:

- Microscopic Glass Slide
- Pipet
- Coverslip
- Microscope
- Sealant (Cytoseal 60™ or equivalent) – available commercially from Fisher Healthcare. Store at room temperature until manufacturer's expiration date on bottle or until quality deteriorates.

V. QUALITY CONTROL:

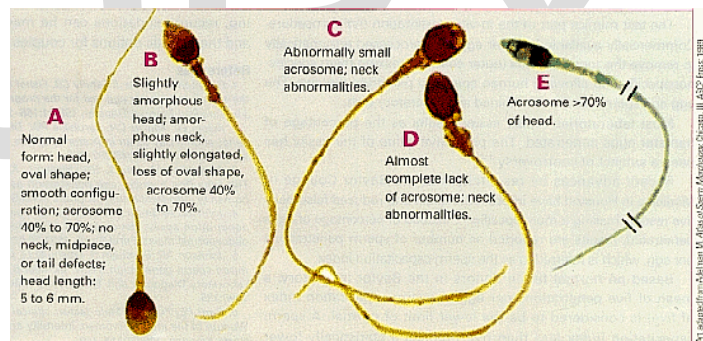
Control slides should be made from known positive and negative cases and read with each batch of patients. Document control results on Post Vas Check Quality Control Record. Proficiency (i.e. accuracy and reliability) testing is accomplished at least twice per year by participation in a College of American Pathologist (CAP) proficiency program or equivalent.

VI. PROCEDURE:

- A. Mix seminal fluid by inverting the container 10-20 times by hand.
- B. Using pipet, place 1-2 drops of specimen on glass slide. Coverslip specimen.
- C. Scan slide under 20X power (dry objective), looking for the presence of sperm. (See Figure 1.)
If no sperm are seen, concentrate an aliquot of the specimen by spinning at 1000g (2900 rpm) for 15 minutes. Pour off supernatant, leaving about 250 mcL of specimen/ sediment in the tube. Remix specimen and plate again. Repeat step 3 above.
- D. Report in LIS as "Present" or "Absent".
- E. Add Laboratory Information System (LIS) comment "Verified by Concentrated Smear".
- F. Seal coverslipped slide(s) with sealant and allow to air dry.
- G. File slide(s) in slide box in drawer.

VII. EXPECTED VALUES:

Figure 1. Microscopic Appearance of Sperm



The expected results for this test are the absence of sperm.

VIII. LIMITATIONS:

The presence of sperm will vary from the length of time since the vasectomy. If only one week, you may expect to still see sperm. If 6 months since vasectomy and sperm is still seen, suspect an incomplete procedure.

IX. NOTES:

- A. This test is performed only to indicate the presence or absence of sperm following a vasectomy procedure.
- B. This test is to be performed for Outreach (formerly BRL) clients only.
- C. Figure 1 is only intended to show the microscopic appearance of sperm.

X. REFERENCES:

- A. Stahler, M., PhD. Reproductive Endocrinology, WBH. Personal Communication, 6/96.
- B. Yablonsky, T. Male Fertility Testing. Lab Med, Vol. 27, Number 6, June 1996, pp. 378-383.
- C. Baker, DJ et al. Semen Evaluations in the Clinical Laboratory. Lab Med, Vol. 25, Number 8, August 1994, pp. 509-514.
- D. Henry, JB. Clinical Diagnosis and Management by Laboratory Methods. 18th Ed. Philadelphia: WB Saunders Co, 1991: 500.
- E. Sampson, J. MLO. Tips From the Clinical Experts. March 1998: 15.
- F. Corea, M, MD. The Diagnosis of Azoospermia Depends on the Force of Centrifugation. Fertility and Sterility, Vol. 83, No. 4. April 2005.

Attachments

No Attachments

Approval Signatures

Step Description	Approver	Date
CP Chief Medical Director	Peter Millward: Chief, Pathology Service Line	4/23/2021
Hematology Medical Director Designee	Ann Marie Blenc: System Med Dir, Hematopath	4/23/2021
Policy and Forms Steering Committee Approval (if needed)	Gail Juleff: Project Mgr Policy	4/23/2021
Policy and Forms Steering Committee Approval (if needed)	Rebecca Bacarella: Mgr Laboratory	4/22/2021
System Manager	Rebecca Bacarella: Mgr Laboratory	4/22/2021
	Rebecca Bacarella: Mgr Laboratory	4/22/2021

Applicability

Royal Oak