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Section: Parasitology Manual	Subject Title: Collection and Laboratory Procedures for Specimens Other Than Stool or Blood	
Issued by: LABORATORY MANAGER	Original Date: March 13, 2000	
Approved by: Laboratory Director	Revision Date:	

Urines

PRINCIPLE

Urine samples can be submitted for the detection of *Schistosoma hematobium* or for the presence of *Trichomonas vaginalis*. Adult *Schistosomes* take up residence near the bladder and start to release eggs. The eggs migrate to bladder and are released when the host urinates. *T. vaginalis* lives in the vagina and can produce a frothy secretion which can be released during urination.

SPECIMEN

- For *Schistosoma hematobium*, obtain the last few drops of urine passed about or shortly after noon.
- For *T. vaginalis*, obtain the first portion of voided urine.

PROCEDURE

- 1) Spin urine sample at 500 g for 5 minutes.
- 2) Examine sediment under low power.

QUALITY CONTROL

- Ensure that the microscope has been calibrated in the last year or after any alteration to the optics and that the results of the calibration are displayed on the microscope base.
- As it may not be possible to have a positive control specimen to use with this procedure, the technologist should review the appearance and size of the organisms present to ensure that they match reference material (i.e. *Bench Aids for the Diagnosis of Intestinal Parasites* (WHO)).

LIMITATIONS OF PROCEDURE

- Schistosome eggs hatch when they come into contact with fresh water therefore care should be taken to avoid adding water to a specimen.
- Schistosome egg viability may be affected by chlorinated water sources.

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- *Trichomonis* does not have a cyst form therefore care must be taken to avoid conditions that will damage these organisms and make identification difficult.

REPORT

- Presence of schistosome eggs and if observed report flame cell activity.
- Report the presence of *T. vaginalis*.

AUTHOR

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REFERENCES

Garcia LS, Bruckner DA. Diagnostic Medical Parasitology. 3rd Edition. ASM Press, Washington DC. Pp 371-392 1997.

Gillespie, S.H. and Hawkey, P.M. Medical Parasitology: A Practical Approach. IRL Press New York 1994 pp191-208