# Intestinal helminths of *Amia calva* L. (bowfin) from Green Bottom Wildlife Management Area, Cabell County, West Virginia, April and May 2006.

Submitted by:

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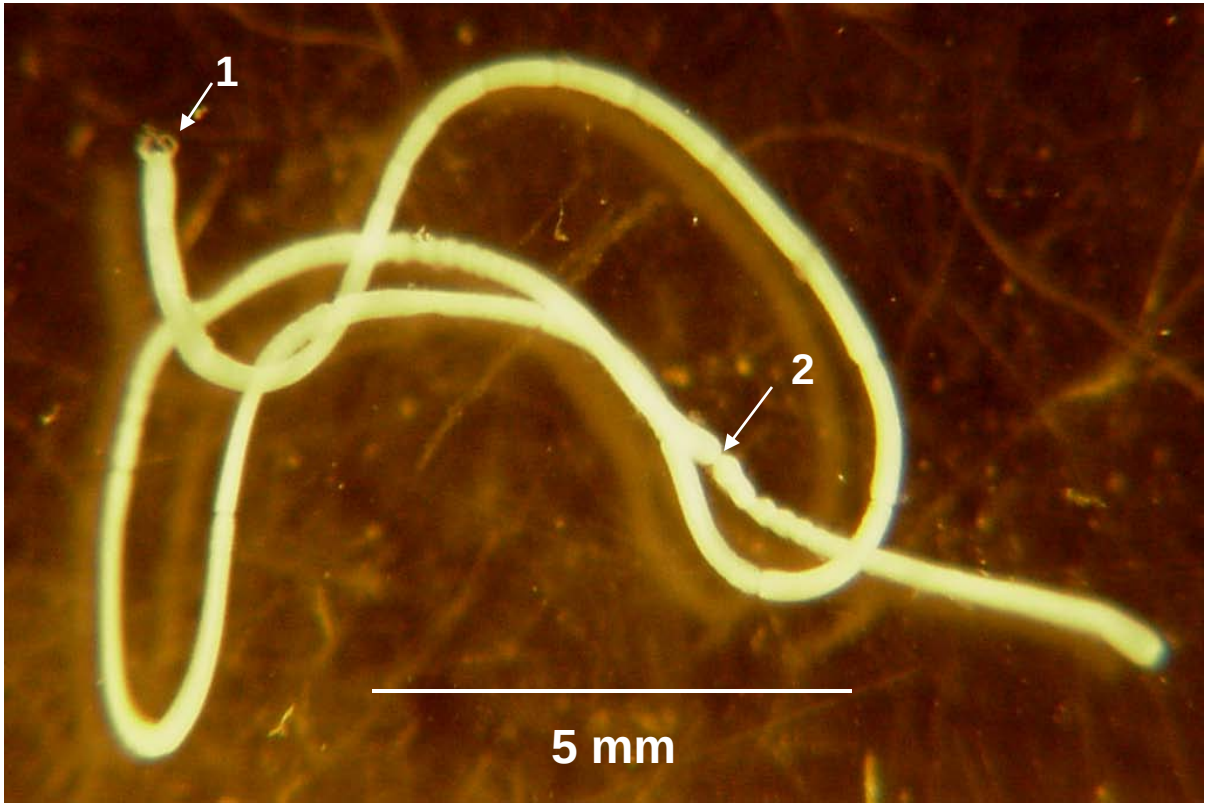
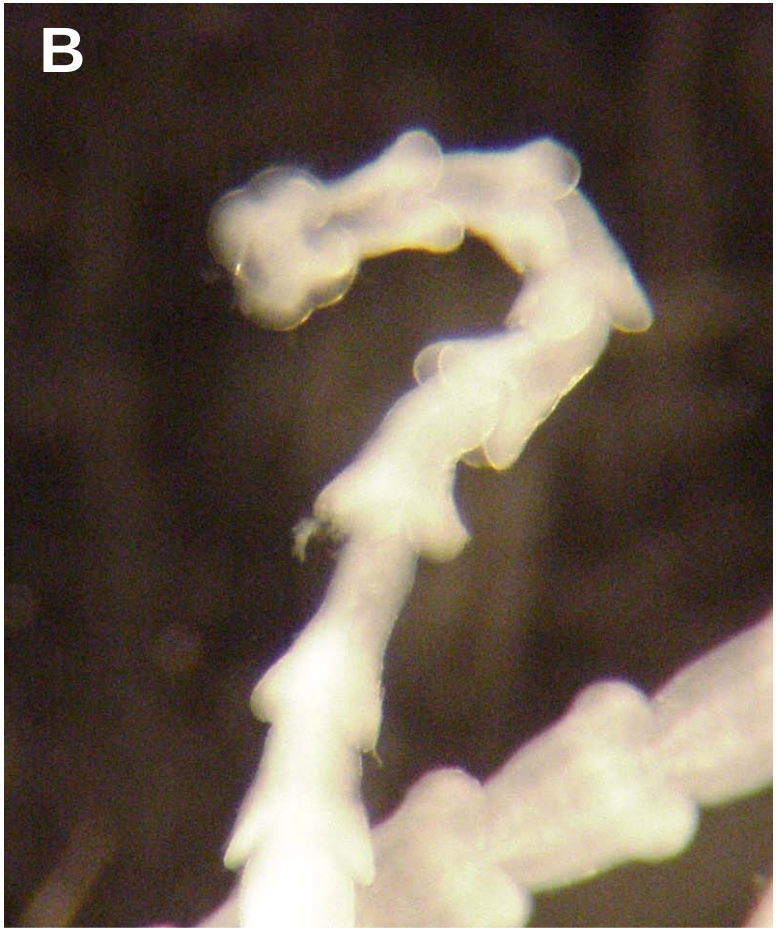
*Haplobothrium globuliforme* -- ex: *Amia calva,* proximal mid-gut.

*Haplobothrium globuliforme* (entire). 1, primary scolex; 2, area of developing secondary scolex.

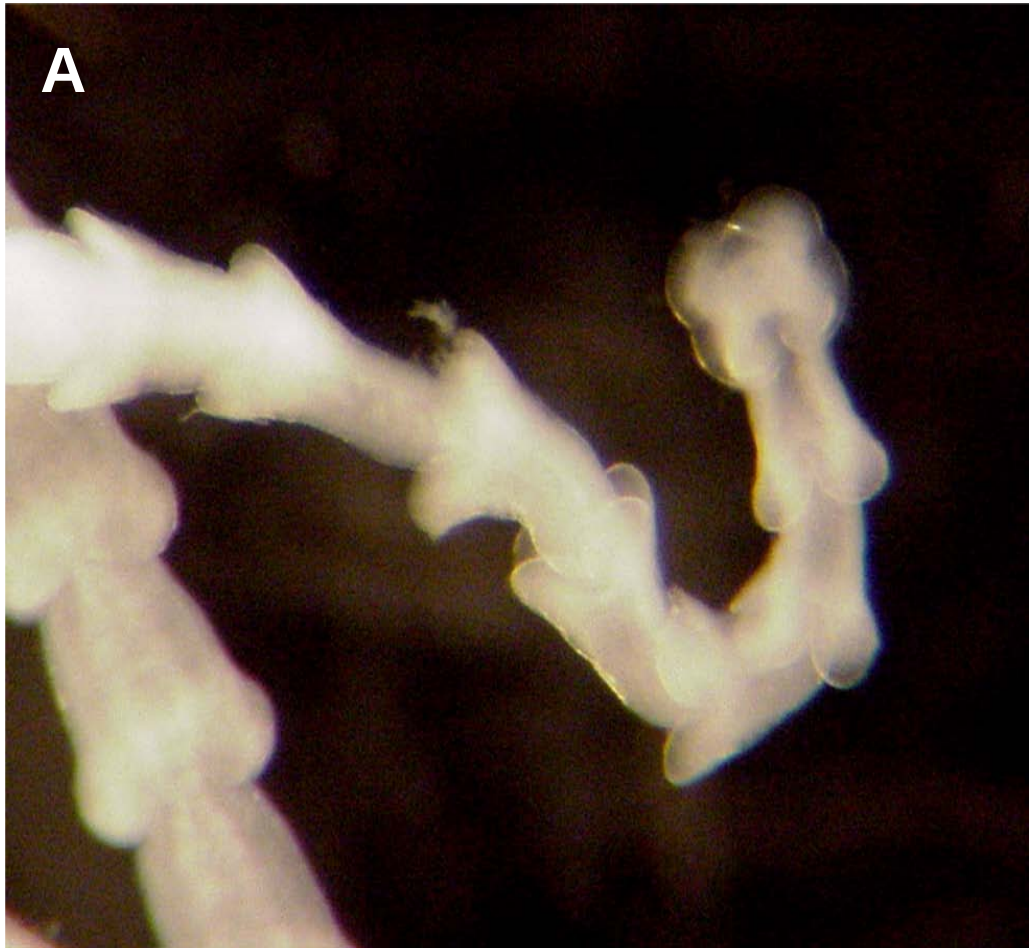


*Haplbothrium globuliforme*: primary scolex (A); secondary scolex (B).

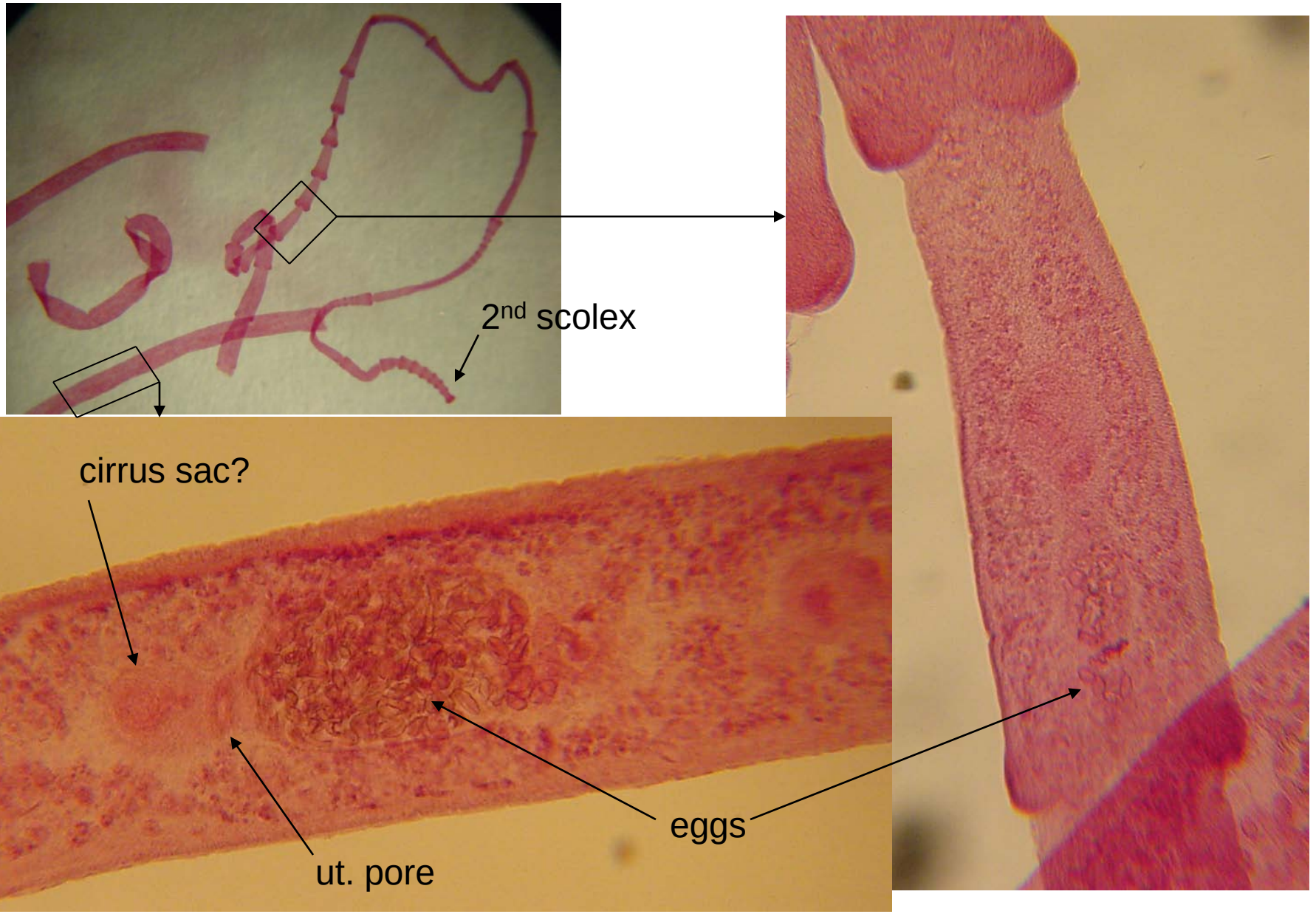
*Haplobothrium globuliforme;* primary scoleces; acetocarmine.

*Haplobothrium globuliforme* -- secondary scoleces; water mount (A); acetocarmine (B).

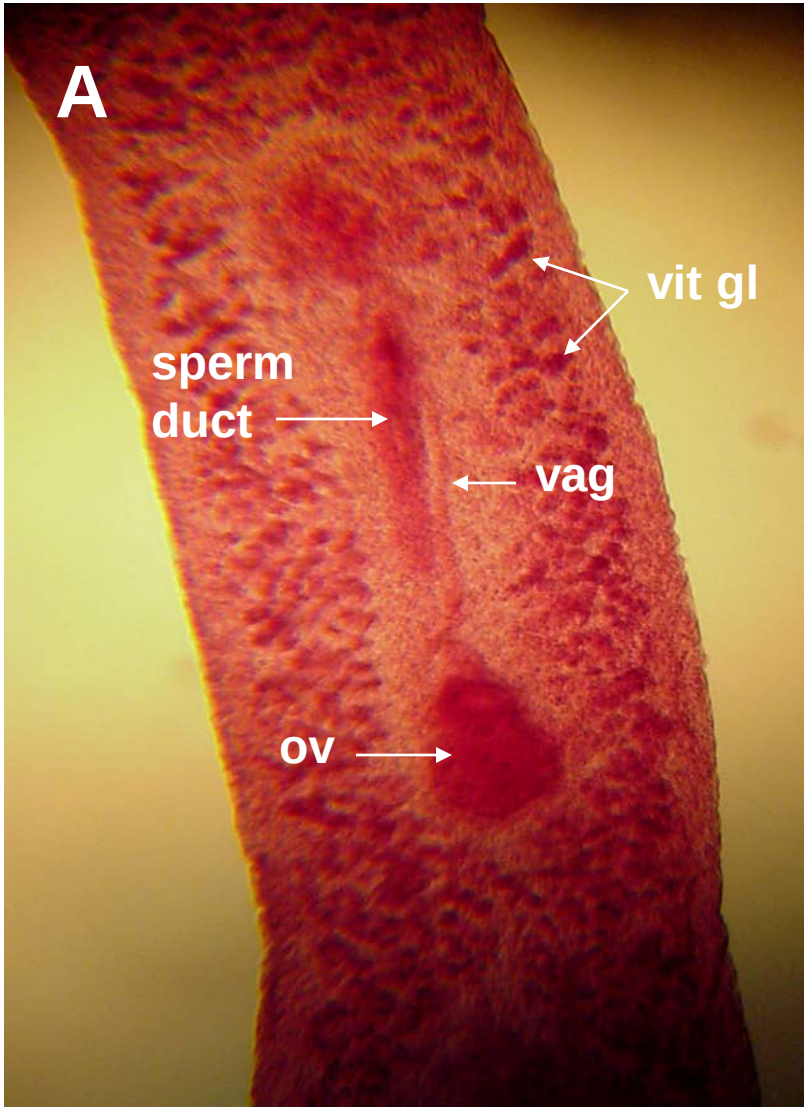


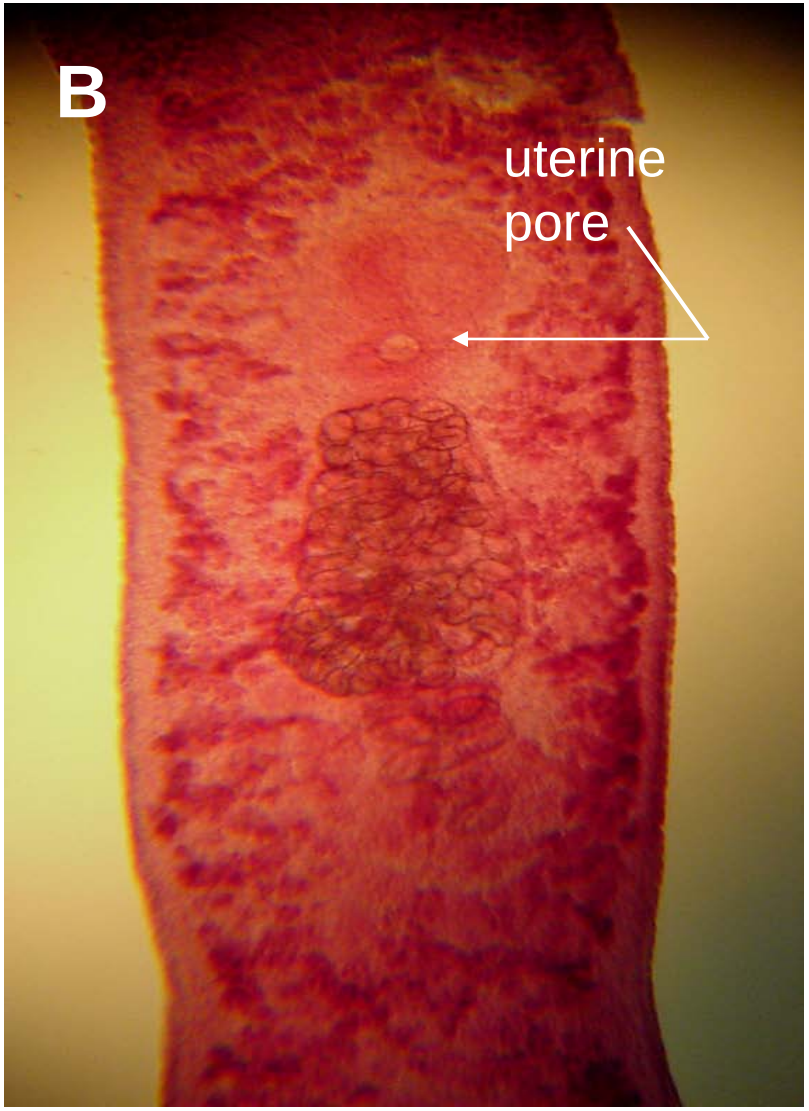

*Haplobothrium globuliforme* secondary individuals; scoleces and proglottids.

# *Haplobothrium globuliforme* – ex: *Amia calva.*

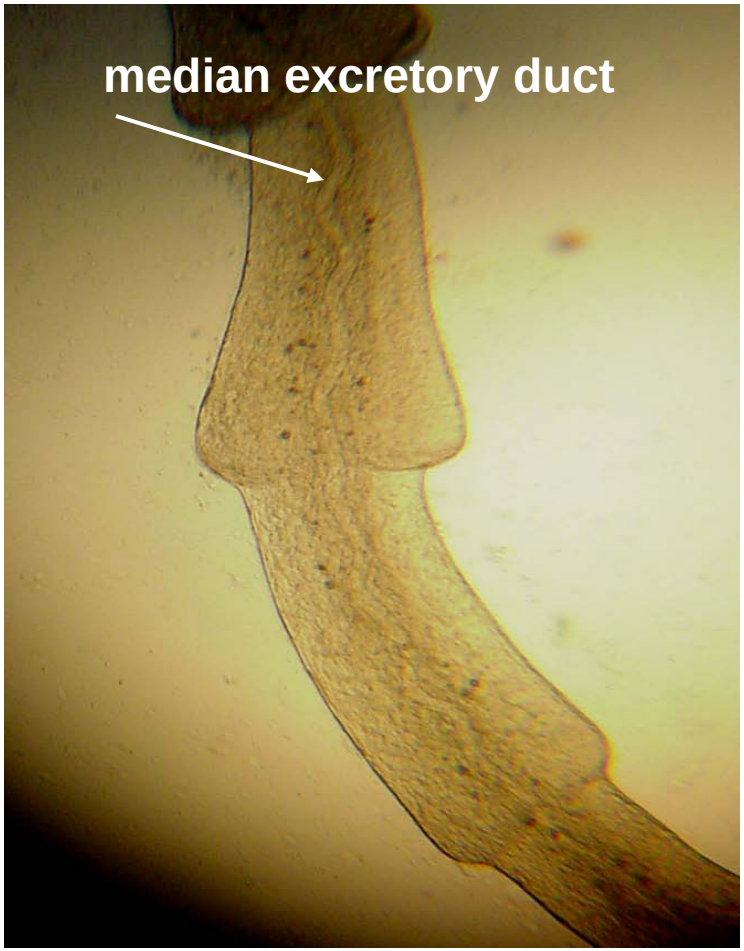


# *Haplobothrium globuliforme*; proglottids (A = mature; B = gravid)



*Haplobothrium globuliforme*; proglottid (water mount).



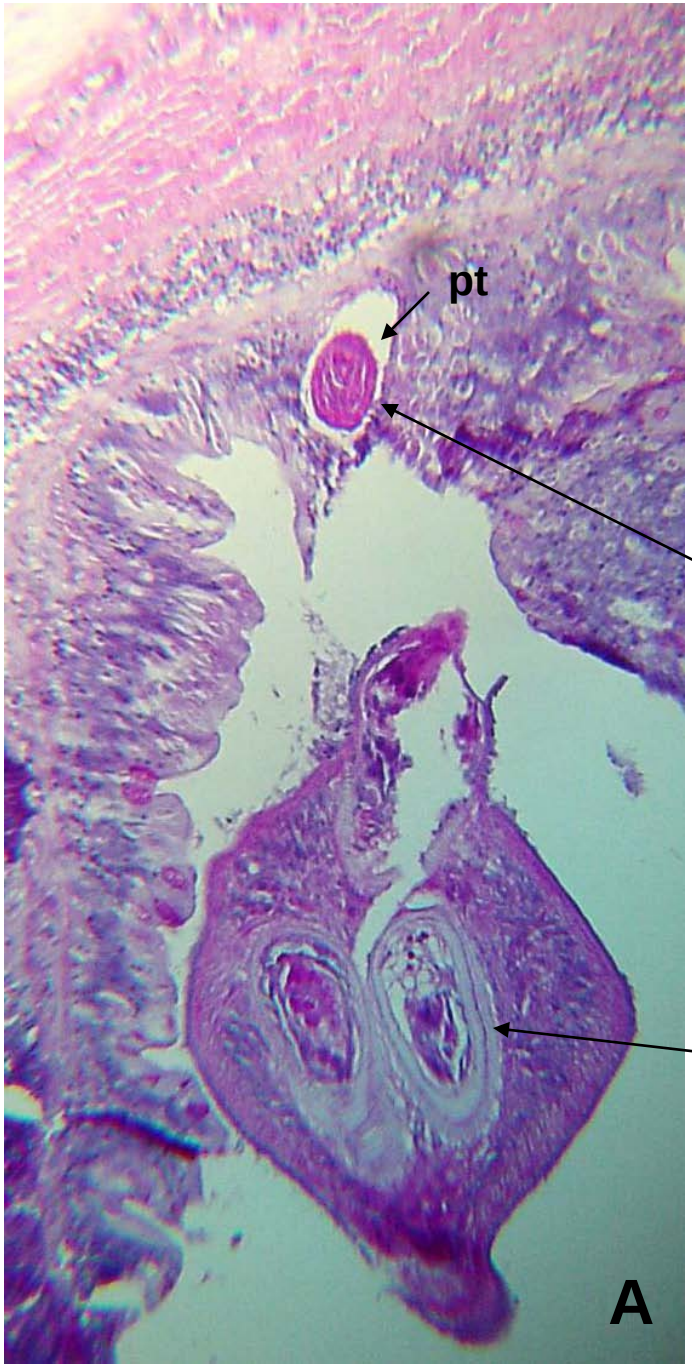
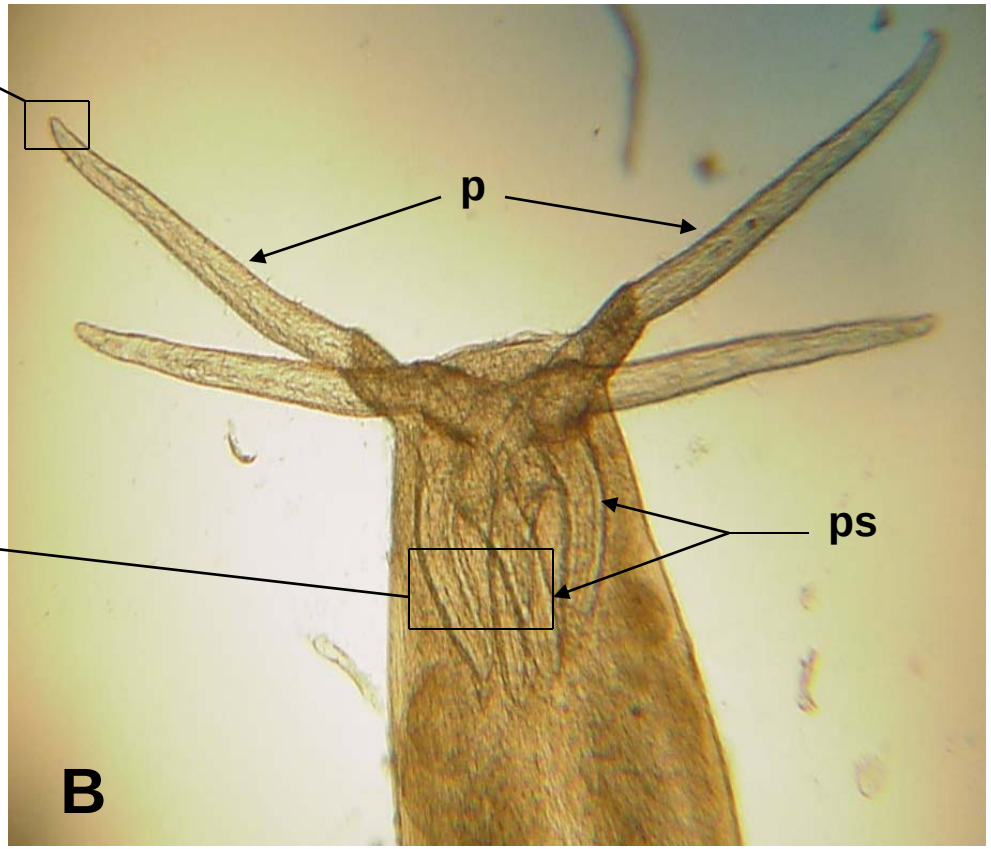
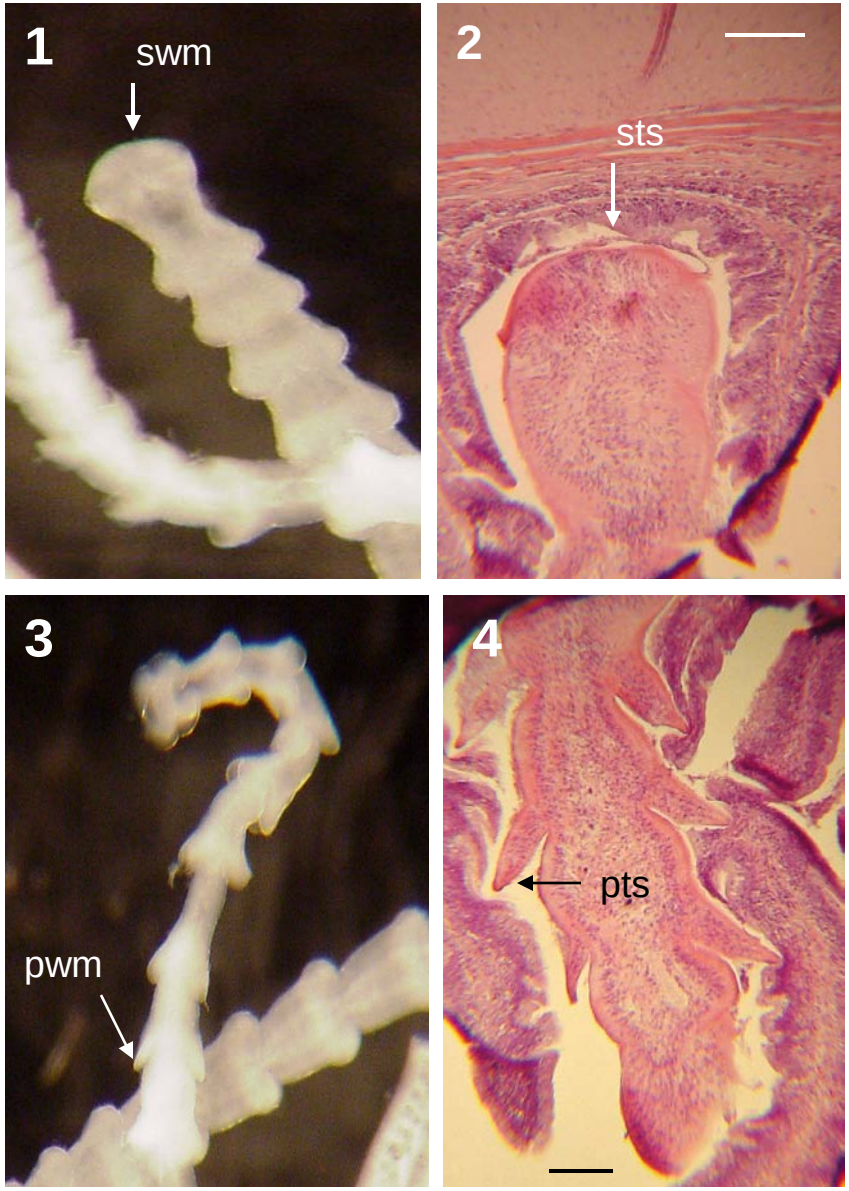



Plate I. *Haplobothrium globuliforme*; primary scolex. Tissue section (A); whole mount (B). p = proboscides; ps = proboscide sheath; pt = proboscide tip.

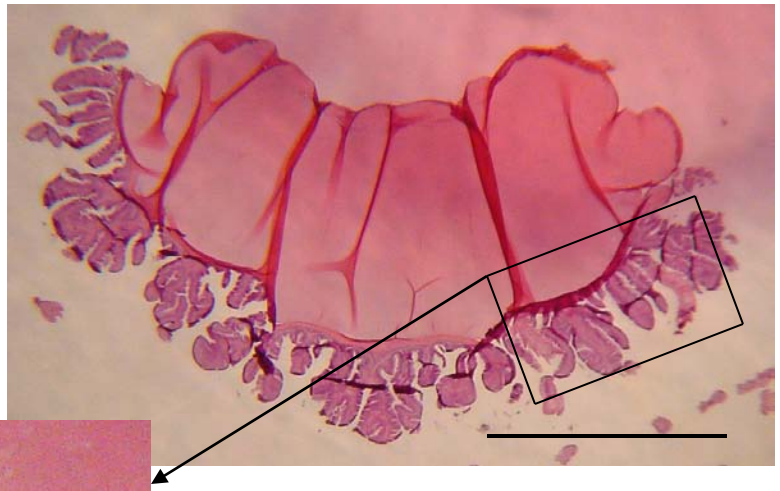




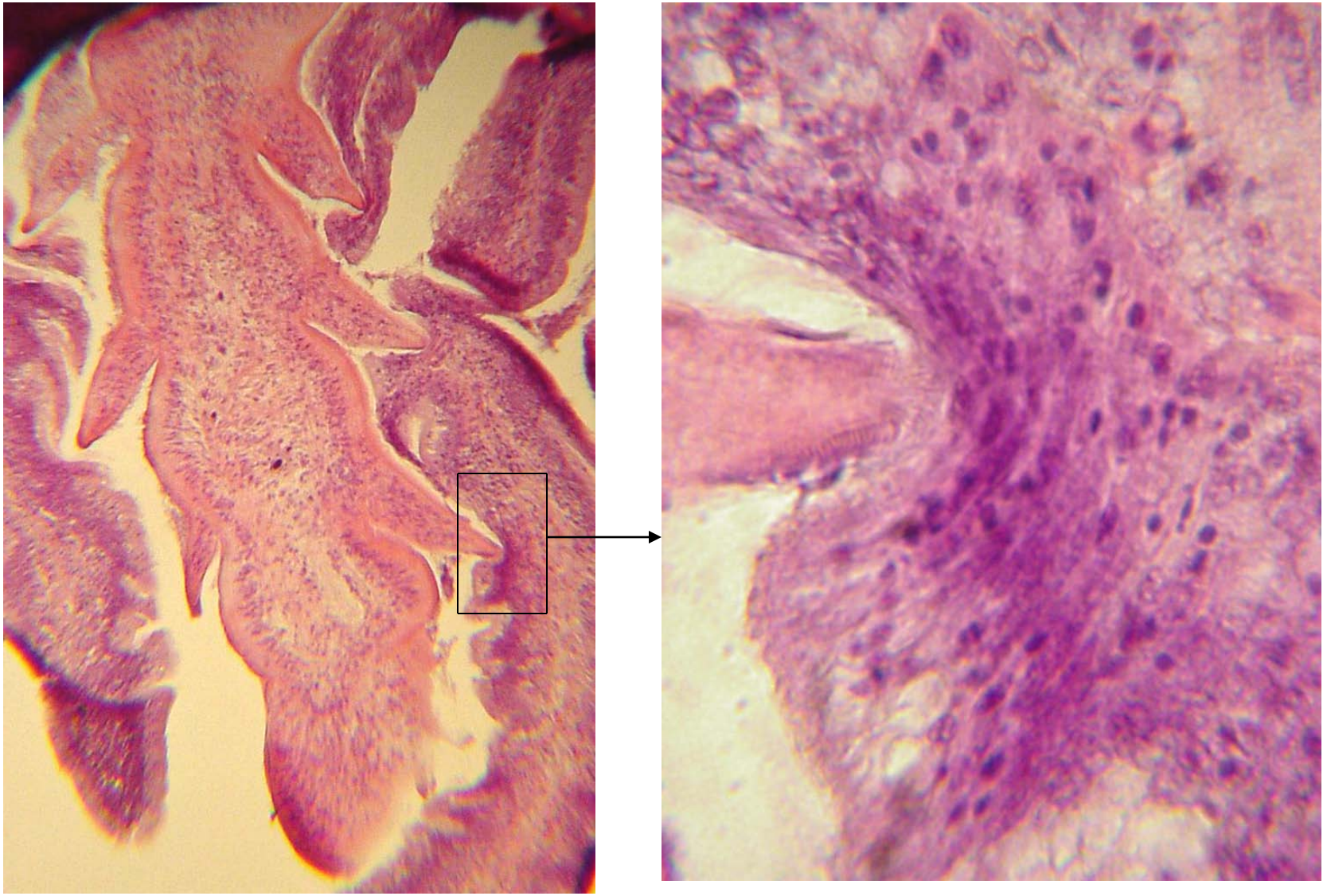

Figs. 1 – 4. *Haplobothrium globuliforme* from bowfin mid-gut: swm = scolex water mount; sts = scolex tissue section; pwm = proglotted water mount; pts = proglottid tissue section. Scale bars in Figs. 2 and 4 = 100 *u*m.


*Haplobothrium globuliforme* 2nd scolex in intestinal epithelium (proximal mid-gut) of bowfin. Section at 10 *u*m; H & E.
Scale bar = 100 *u*m.
Terms tentative.

*Amia clava* mid-gut infected with *Haplobothrium globuliforme*.
Scale bar = 3 mm.



*Haplobothrium globuliforme* proglottids from 2nd scolex in intestinal epithelium of bowfin. Sections at 10 *u*m; H & E.



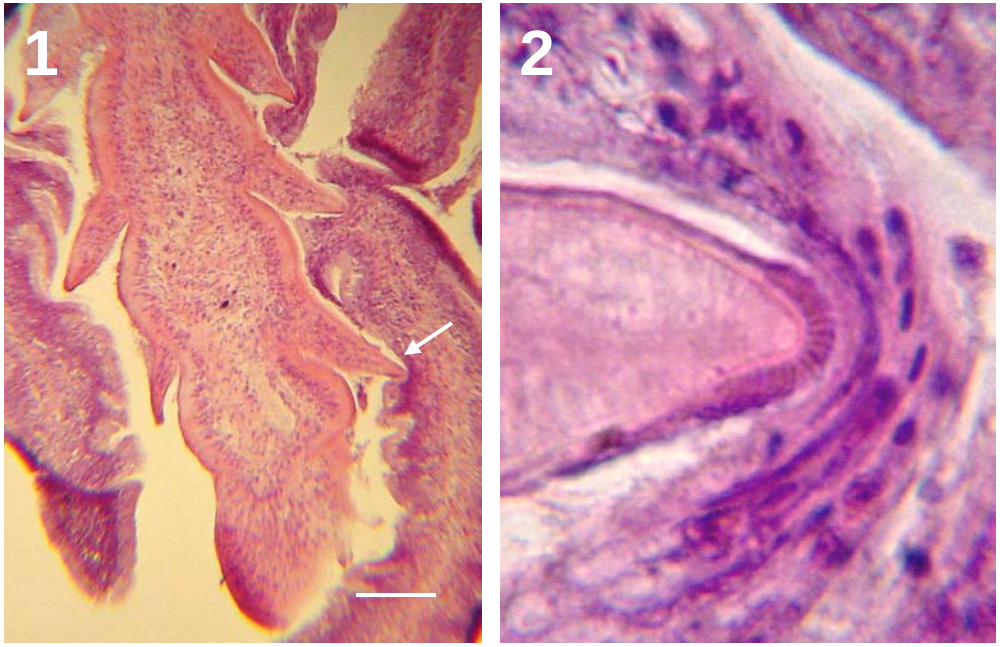
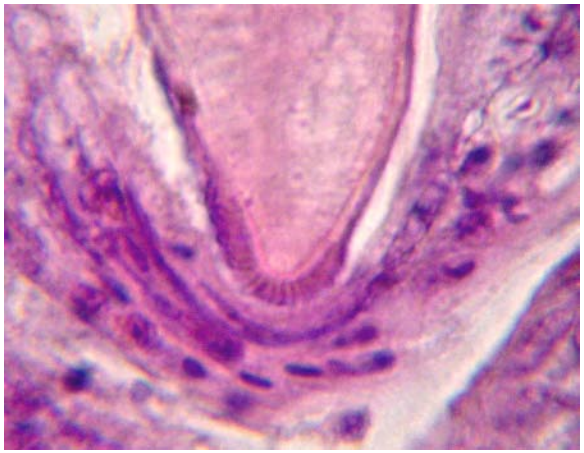
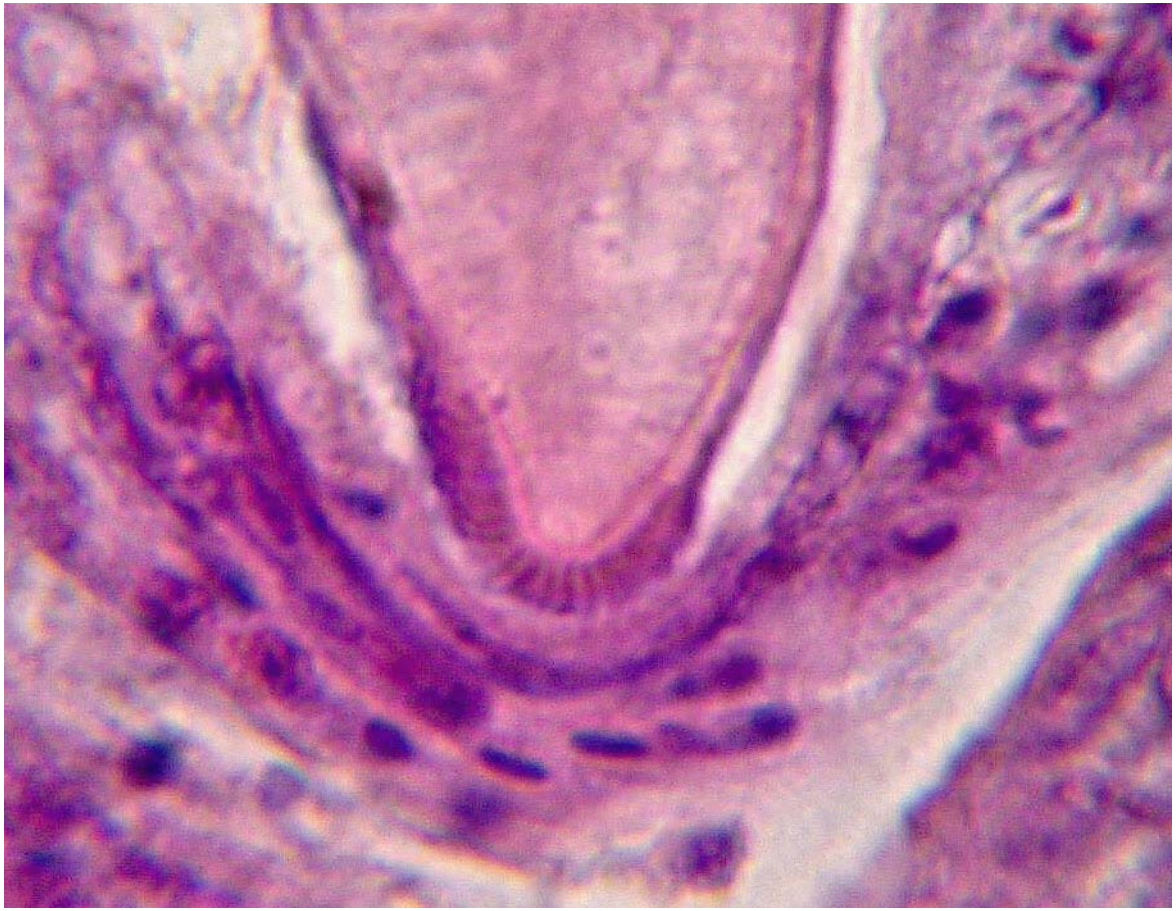



Fig. 1. *Haplobothrium globuliforme* (entire) in bowfin proximal mid-gut. Arrow indicates enlarged area in Fig. 2. Scale bar = 100 *u*m.

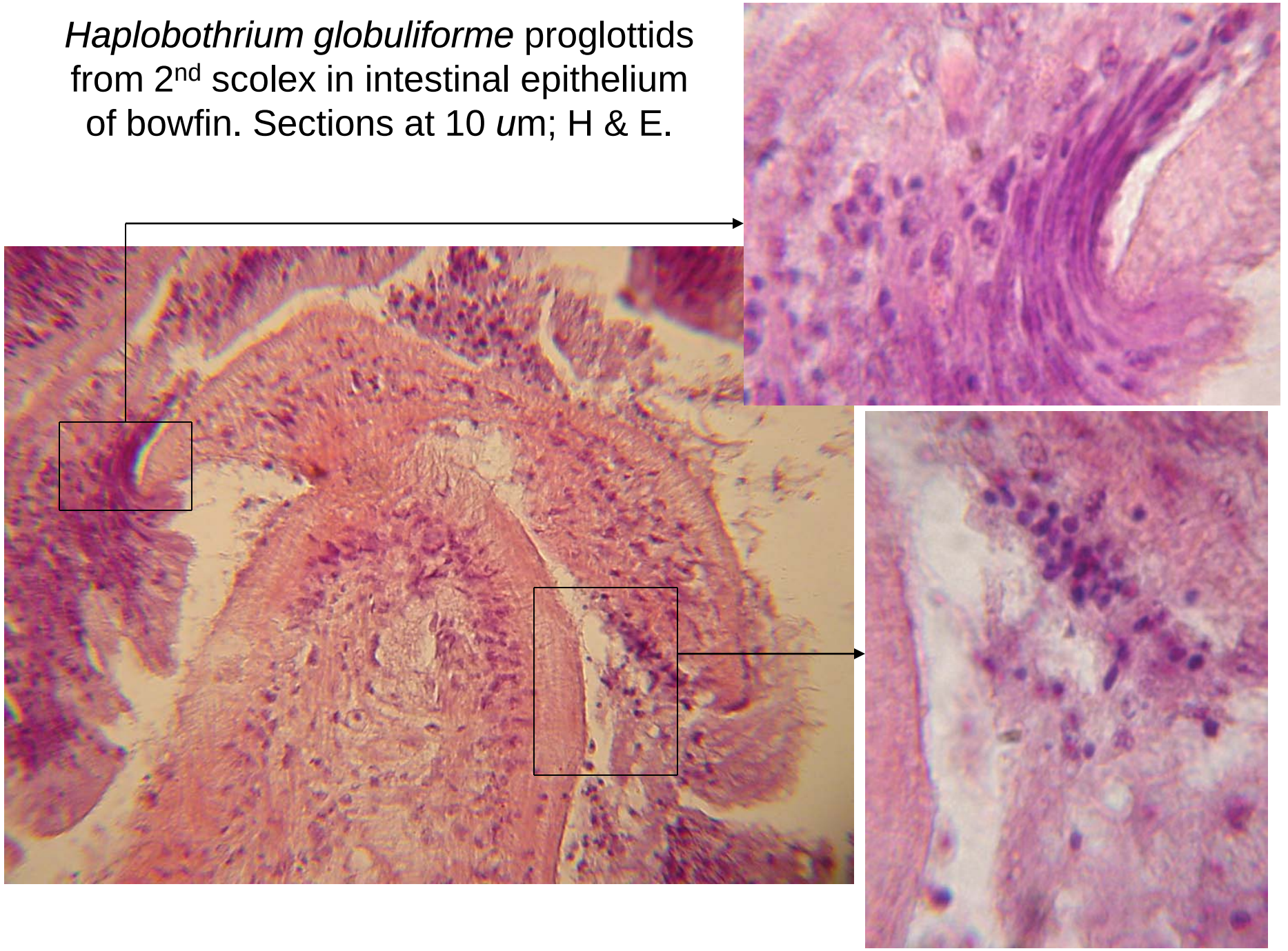
Fig. 2. [Describe host tissue response]. f = fibroblast; i = parasite integument; m = macrophage; j = macrophage/fibroblast?



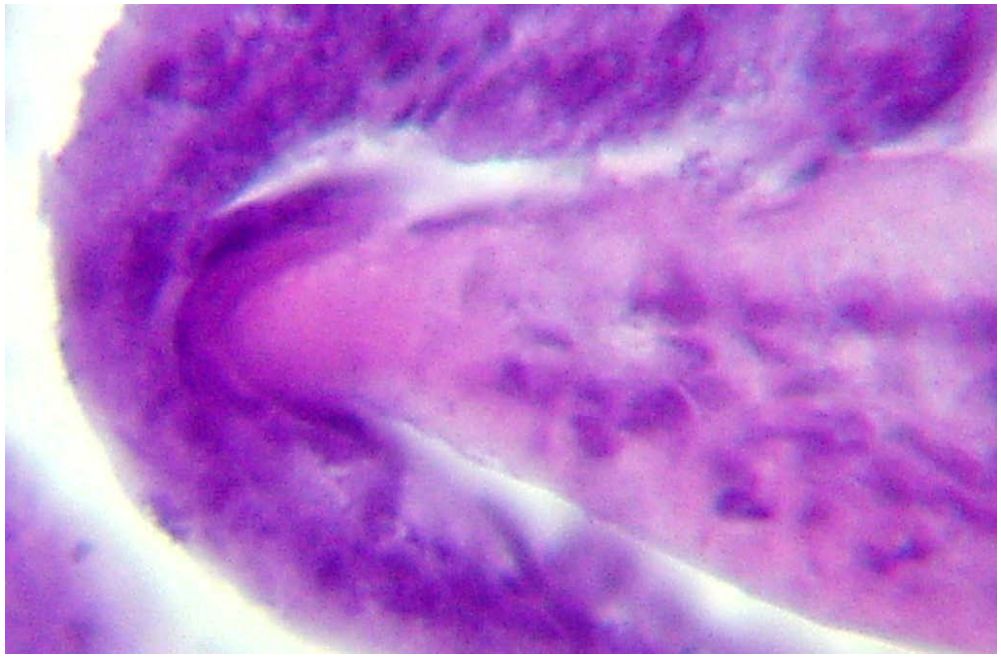
*H. globuliforme*, tip of posterior margin of proglottid.

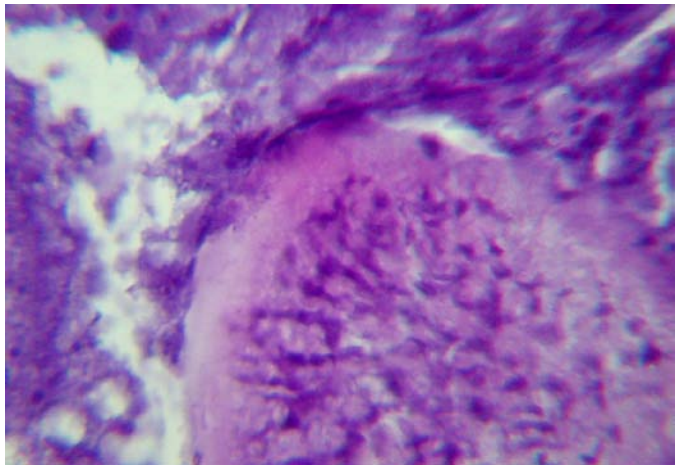


*Haplobothrium globuliforme* proglottids from 2nd scolex in intestinal epithelium of bowfin. Sections at 10 *u*m; H & E.

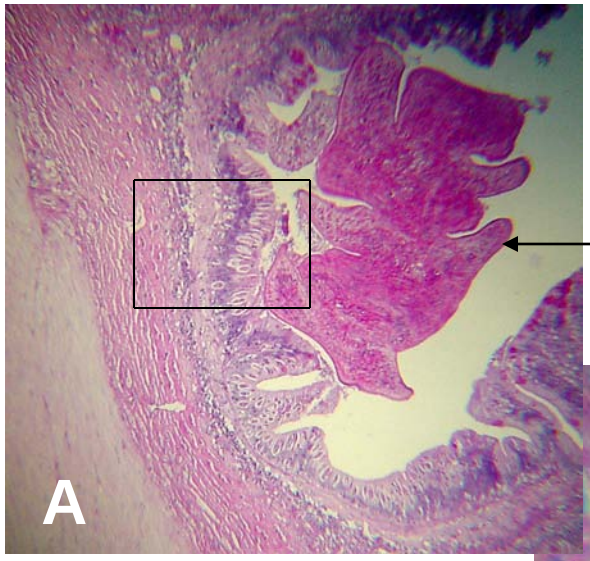


# *Haplobothrium* in bowfin, GBWMA



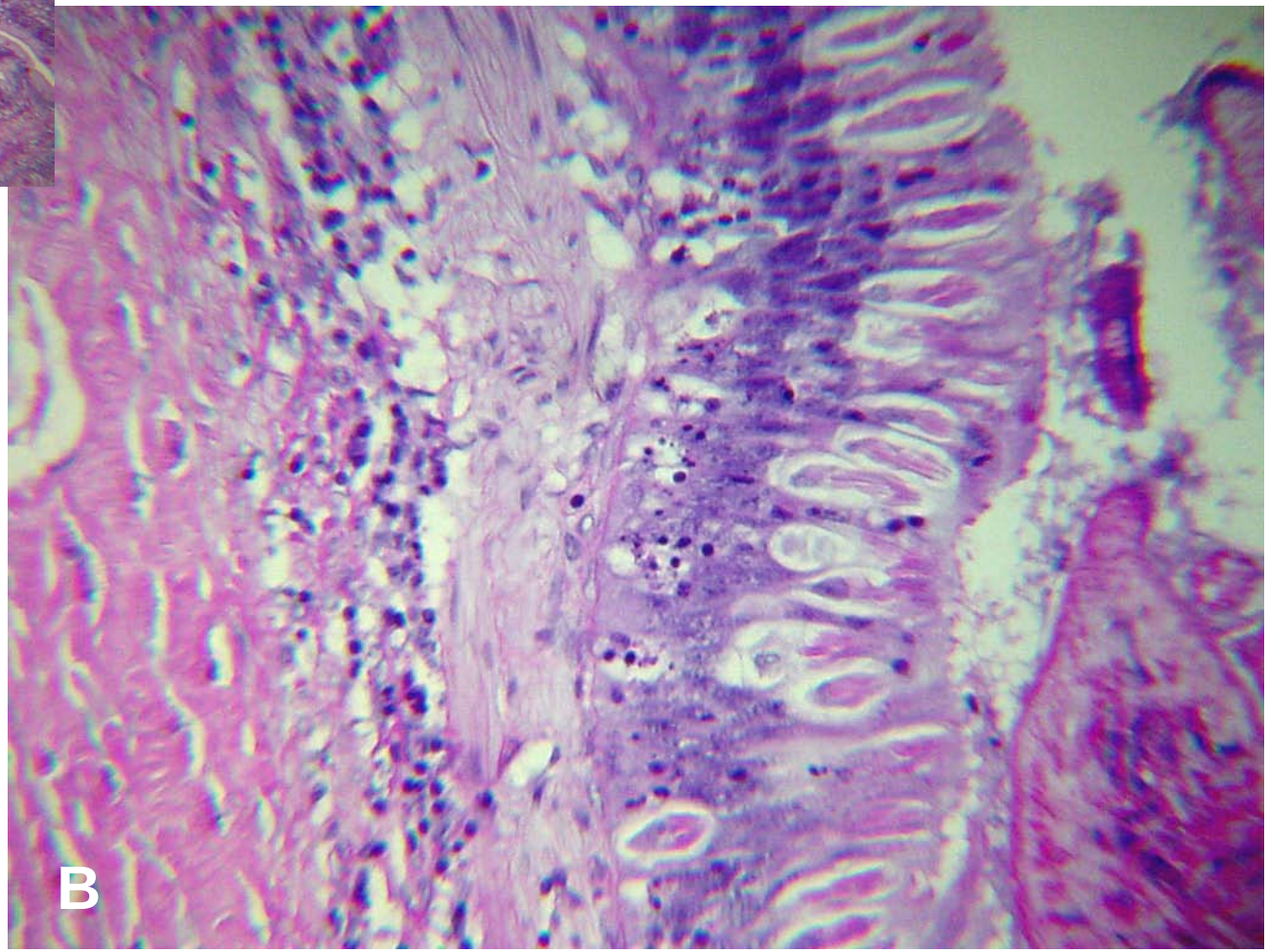


Bowfin mid-gut (PAS, 6 *u*m): g = goblet cell, o = *Eimeria* oocyst?, t = tapeworm. Scale bar = 0.3 mm.



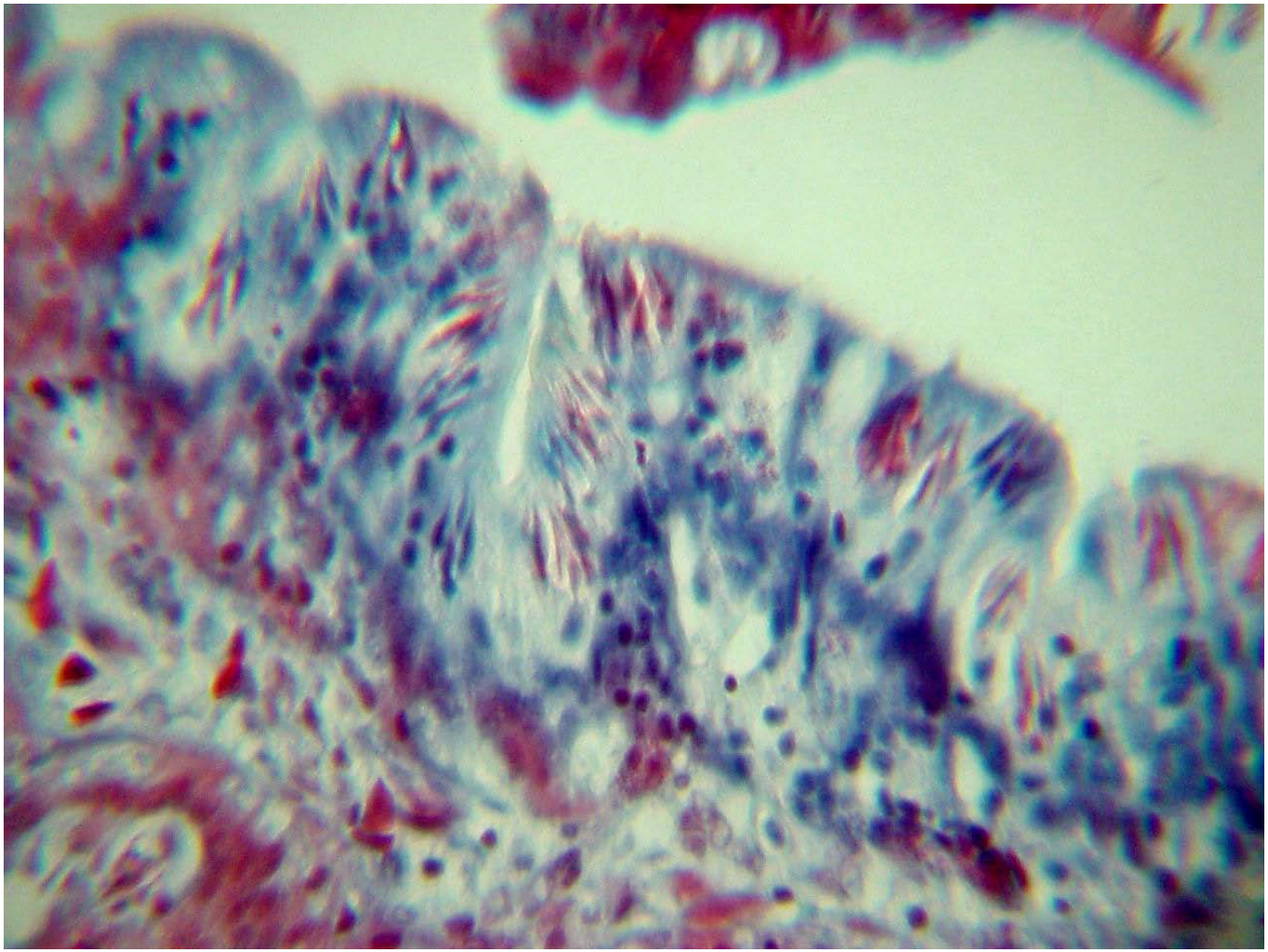

*H. globuliforme*

*Eimeria* sp.(life cycle stages?) in gut epithelium.

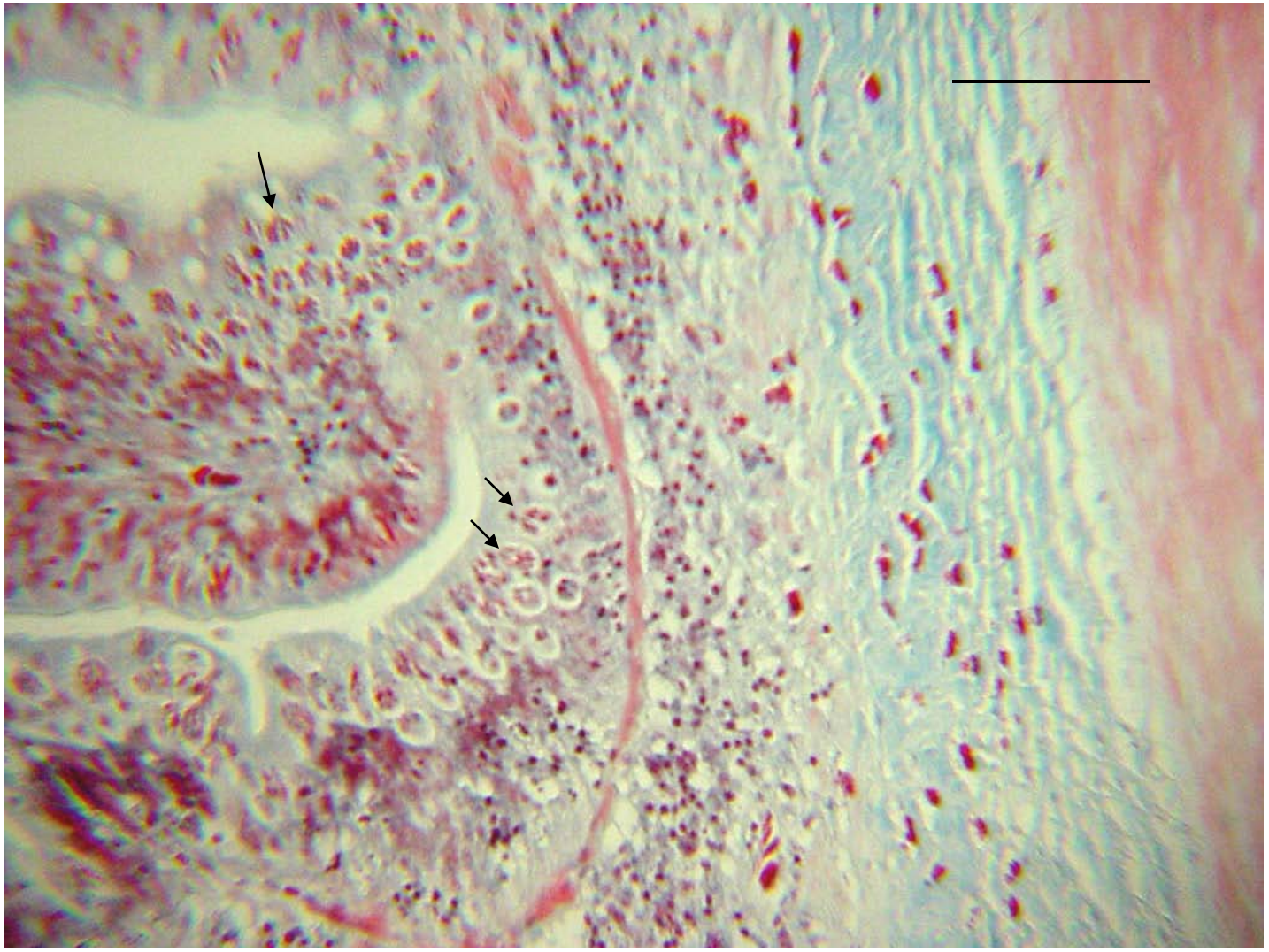



Bowfin mid-gut (PAS, 6 *u*m). B represents enlarged area shown in box of A.

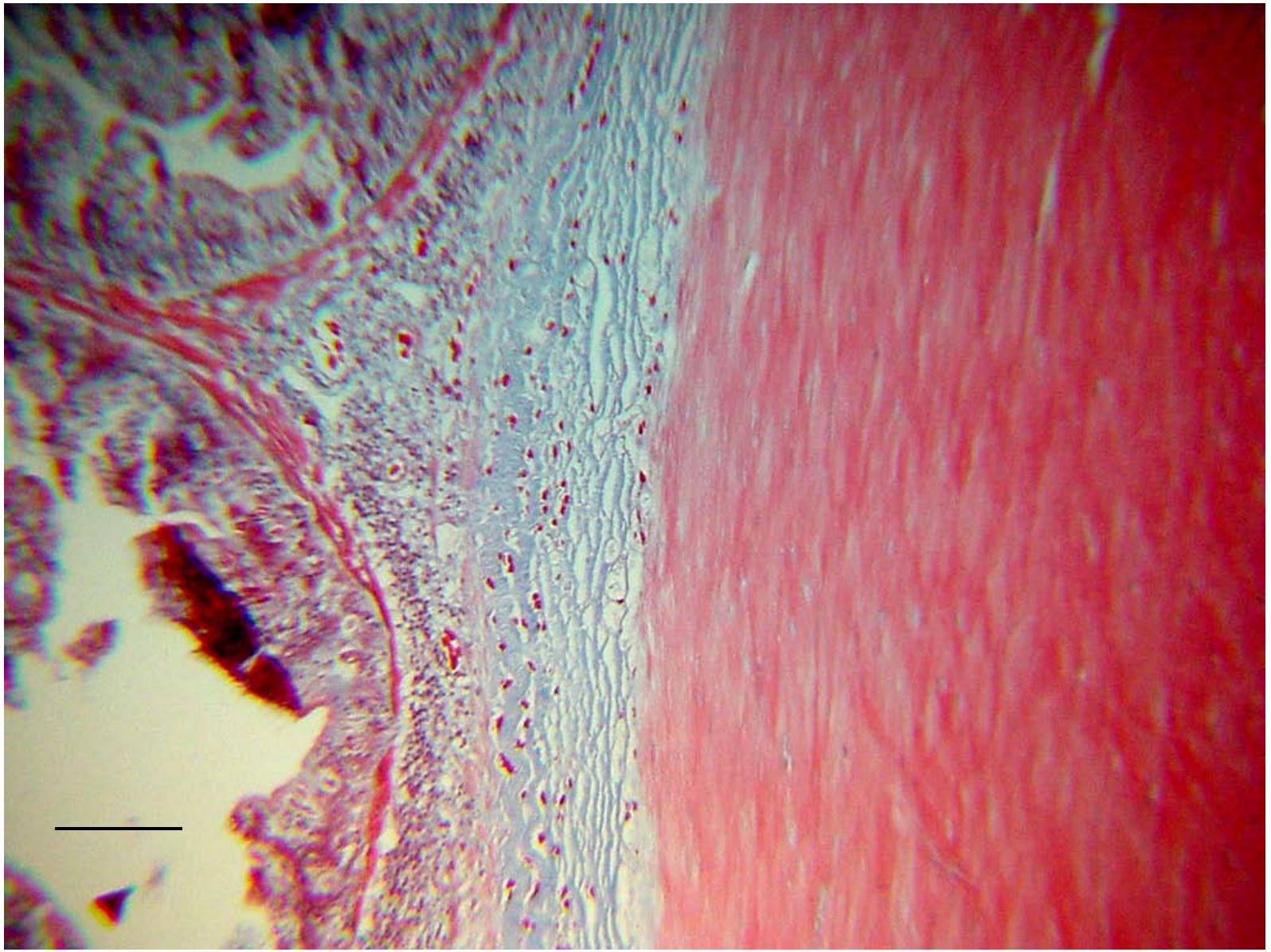
Bowfin mid-gut epithelium; trichrome, 4 *u*m. Schizonts of *Eimeria*? with merozoites. Merozoite length approximately 5 *u*m.



Bowfin mid-gut (trichrome, 6 *u*m). *Eimeria* sp. schizonts? (arrows). Scale bar = 50 *u*m.



Bowfin mid-gut; trichrome, 4 *u*m. Scale bar = 100 *u*m.



*Macroderoides typicus* (Semichon's acid carmine).

# *Macroderoides typicus*; water mount