

NUMBER 40, continued
THE PARASITES OF AMPHIBIA

by

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HOST LIST OF TREMATODE PARASITES

- ACRIS GRYGALUS -- U. S. A.
Brachycoelium salamandrae. (in tadpoles and adults), Phyllodistomum coatneyi.
- ALYTES OBSTETRICANS -- Europe.
*Echinoparyphium recurvatum, *Echinostomum revolutum, *Lecithopyge rastellum, *Opisthioglyphe ranae (in tadpoles), *Paralepoderma brumpti (in tadpoles), *P. cloacicola (in tadpoles), *P. progeneticum (in tadpoles), *Ratzia joyeuxi (in tadpoles and adults).
- AMBYSTOMA GRACILE larvae -- U. S. A.
Megalodiscus americanus, Monosotme cercariae of Lehmann, 1956.
- A. JEFFERSONIANUM -- U. S. A.
Brachycoelium salamandrae, Metacercariae of Fischthal, 1955.
- A. MACRODACTYLUM -- U. S. A.
Brachycoelium salamandrae, Telorchis bonnierensis (in larvae).
- A. MACULATUM -- U. S. A.
Brachycoelium salamandrae, *Clinostomum sp? of Fowler, 1947, *Diplostomulum ambystomae, Gorgoderina amplicava.
- A. MICROSTOMUM -- U. S. A.
Brachycoelium daviesi, B. salamandrae.
- A. OPACUM -- U. S. A.
Brachycoelium louisianae, B. salamandrae, B. storeriae, *Diplostomulum ambystomae, Gorgoderina bilobata, Megalodiscus temporatus, Plagitura salamandra.
- A. PUNCTATUM -- U. S. A.
Phyllodistomum americanum.
- A. TIGRINUM -- U. S. A.
Gorgoderina attenuata (in larvae), Megalodiscus temporatus (in larvae), Phyllodistomum americanum.
- A. TIGRINUM -- Mexico.
Haematoloechus pulcher (in larvae), Opisthioglyphe siredonis.
- A. spp? larvae -- U. S. A.
*Cercaria fissicauda.
- "Amphibians" -- U. S. A.
*Cercaria amherstensis, *C. holthauseni,

(* indicates larval forms of parasites)

Haematoloechus pricei, *Haplometrana intestinalis (in skin).

AMPHIUMA MEANS -- U.S.A.

Cephalogonimus amphiumae, Crepidostomum cornutum, Megalodiscus americanus, Telorchis stunkardi, *Stomatotrema guberleti.

A. TRIDACTYLUM -- U.S.A.

Brachycoelium salamandrae, Cephalogonimus amphiumae, *Clinostomum sp? of Bennett & Humes, 1938, Halipegus fusiporus, ? *Lechriorchis sp? of Bennett & Humes, 1938, Megalodiscus americanus, Telorchis reelfooti, T. stunkardi.

"Anuran" tadpoles -- U.S.A.

Macroderoides typicus.

"Batrachians" -- Brazil.

Mesocoelium incognitum.

BOMBINA BOMBINA -- Europe.

Gorgodera cygnoides, Gorgoderina vitelliloba, Haematoloechus asper asper, H. variegatus, H. var. abbreviatus, Hexathyridium affine, Monostoma ellipticum, Opisthodiscus subclavatus, ? *Tetracotyle crystallina.

B. PACHYPUS (= B. variegata) -- Europe.

Gorgodera cygnoides, Haematoloechus variegatus, Opisthodiscus subclavatus.

B. SALSA -- Europe (France).

Gorgoderina vitelliloba.

BOMBINATOR IGENUS -- Europe.

Gorgoderina vitelliloba, Haematoloechus variegatus, H. var. abbreviatus, Opisthodiscus subclavatus.

BUFO AMERICANUS (? = B. lentiginosus)-- Canada.

Gorgoderina simplex, G. translucida, Haematoloechus medioplexus, H. similiplexus, H. variegatus.

B. AMERICANUS -- U.S.A.

*Alaria ansaemoides (in tadpoles), *A. canis (in tadpoles), *A. micradena (in tadpoles), *Diplostomum flexicaudum (in tadpoles and adults), *Echinostomum revolutum, Glythelmins quieta, Gorgodera amplicava, Gorgoderina attenuata, G. simplex, G. translucida, Haematoloechus breviplexus, H. varioplexus, *Strigea elegans (in tadpoles).

B. AMERICANUS -- Mexico.

Haematoloechus breviplexus.

B. ARENARUM (= B. arenarius) -- Brazil.

Gorgoderina rochalamaei.

B. ARENARUM -- Uruguay.

Glythelmins festina.

B. BOREAS -- U.S.A.

Glythelmins quieta (larvae and adults), Gorgoderina aurora, G. translucida, Haplometrana intestinalis, Margeana shastai, Megalodiscus microphagus, Phyllodistomum bufonis.

B. BUFO (= B. vulgaris) -- Africa (Egypt).

*Apharyngostrigea ibis (in tadpoles), Lepoderma ramliani, *Nephrostomum ramosum, Pleurogenes medians.

B. BUFO -- Europe.

Asymphlyodora tincae, Brachycoelium salamandrae, *Distoma bufonis,

- *Echinoparyphium recurvatum, Gorgodera cygnoides, Gorgoderina vitelliloba (larvae and adults in tadpoles and adults), Haematoloechus asper asper, H. variegatus, Haplometra cylindræa, Lecithopyge ranae, L. rastellum, L. rast. subulatum, Monostoma ellipticum, Opisthioglyphe endoloba, O. histrix, O. ranae, O. subclavatus, Pleurogenes claviger, P. medians, Polystoma integerrimum, Prosotocus confusus, ?
*Tetracotyle crystallina. (larval O. endoloba (exper.) in tadpoles).
- B. B. ASIATICUS -- China.
*Coitocaecum sp? of Wu. 1937 (exper.),
Phyllodistomum sinense.
- B. B. FORMOSUS -- Japan.
Mesocoelium lanceatum.
- B. B. JAPONICUS -- Japan.
Loxogenes liberum, Mesocoelium lanceatum, M. minutum.
- B. B. SPINOSUS -- Africa (Morocco).
Opisthioglyphe endoloba, Pleurogenoides ifranensis.
- B. CALAMITA -- Europe.
Opisthioglyphe endoloba, O. ranae,
Pleurogenes claviger, P. medians,
Prosotocus confusus.
- B. CRUCIFER -- Brazil.
*Cliostomum heluans (in tadpoles),
Gorgoderina cryptorchis, G. parvicava,
Mesocoelium incognitum, M. sociale,
Rudolphitrema rudolphi.
- B. D'ORBIGNYI -- Paraguay.
Gorgoderina cryptorchis.
- B. FOWLERI -- Canada.
Gorgoderina simplex, G. translucida.
- B. FOWLERI -- U. S. A.
Brachycoelium salamandrae, Gorgodera amplicava, Gorgoderina attenuata.
- B. GRANULOSUS -- Brazil.
Maicuru solitarium.
- B. LATASTII -- India.
Lepoderma himalayii.
- B. MARINUS -- Argentina.
Margeana linguatula.
- B. MARINUS -- Brazil.
Catadiscus cohni, Gorgoderina cryptorchis,
G. parvicava, Haematoloechus fueilleborni,
Margeana elegans, M. incognitum, M. linguatula, Schistosoma mansoni eggs.
- B. MARINUS -- Colombia.
Mesocoelium incognitum, M. sociale,
M. sp? of Ucross, 1959. (? = Margeana spp.)
- B. MARINUS -- Costa Rica.
Choledocystus intermedius, Gorgoderina megalorchis.
- B. MARINUS -- Cuba.
Schistosoma mansoni eggs.
- B. MARINUS -- Mexico.
Choledocystus intermedius, Gorgoderina megalorchis, Margeana linguatula.
- B. MARINUS -- Puerto Rico.
Schistosoma mansoni eggs.
- B. MARINUS -- Uruguay.
Margeana linguatula.

- B. MARINUS -- Venezuela.
Margeana linguatula.
- B. MAR. BIMACULATUS -- Brazil.
Margeana linguatula.
- B. MAURITANICUS -- Africa.
*Prohemistomum vivax, Sinsinotrema tacapense.
- B. MELANOSTICTUS -- Burma.
Mesocoelium sociale.
- B. MELANOSTICTUS -- China.
*Centrocestus formosanus, *Pharyngostomum cordatum (in tadpoles and adults).
- B. MELANOSTICTUS -- Formosa.
Diplodiscus melanosticti, Margeana staffordi.
- B. MELANOSTICTUS -- India.
Lepoderma himalayii.
- B. MICROTYPANUM -- India.
Harmostomum sp? of Pande, 1938.
- B. MUSICUS (?) -- Brazil (possibly B. marinus).
Margeana linguatula.
- B. PACHYPUS -- Europe.
Gorgodera cygnoides.
- B. PARACNEMIS -- Brazil.
Gorgoderina rochalimai.
- B. PARCNEMIS -- Paraguay.
Catadiscus freitaslenti, Gorgoderina parvicava, Mesocoelium incognitum.
- B. PELTOCEPHALUS -- Cuba.
Mesocoelium crossophorum.
- B. REGULARIS -- Africa.
Halipegus sp? of Porter, 1938,
Mesocoelium mesocoelium, M. monadi,
Opisthodiscus subclavatus, Parapolystoma alluaudi,
Pharyngostomum congolense,
Polystoma africanum, P. mashoni
(? neotenic larvae on tadpoles gills),
Sarumitrema hystatorchis.
- B. REGULARIS -- Mauritius Island.
Lepoderma monplei.
- B. TAITANUS -- Africa.
Parapolystoma alluaudi.
- B. TERRESTRIS -- U.S.A.
Brachycoelium salamandrae, Megalodiscus temperatus,
*Platynosomum fastosum (exper.).
- B. TERRESTRIS -- Brazil.
Margeana linguatula.
- B. VARIABILIS -- Europe.
Opisthioglyphe endoloba, O. ranae,
Pleurogenes claviger, P. medians.
- B. VIRIDIS -- Europe.
*Alaria alata, Gorgodera sp? of Kolendo, 1959,
Halipegus ovocaudatus, Haplometra cylindracea,
Opisthioglyphe endoloba, O. ranae, Opisthodiscus subclavatus,
Pleurogenes claviger, P. medians, Polystoma integerrimum,
Prosotocus confusus, ? *Tetracotyle crystallina.
- B. VIRIDIS -- India.
Diplodiscus mehrai, *Diplostomulum bufonis,
Ganeo bufonis, G. tigrinum, Lepoderma himalayii,
Nenimandijea kashmirensis, Phyllodistomum frequentum,
P. sp? of Kaw, 1950, Pleurogenes bufonis.

- B. VIRIDIS -- Israel.
*Cercaria orospinosa (metacercarial stage).
- B. WOODHOUSII -- U. S. A.
*Alaria sp? of Frandsen & Grundmann, 1960, Haematoloechus coloradoensis.
- B. spp? -- S. America.
Mesocoelium sociale (Paraguay), M. travassosi (Brazil).
- "Bufonid" -- Africa.
Ganeo glottoides africana.
- CERATOPHRYS DORSATA (? = C. cornuta) -- Brazil.
Margeana linguatula.
- CHIROLEPTES BREVIPALMATUS -- Australia.
Brachysaccus juvenilis.
- CHTHONERPETON INDISTINCTUM -- Uruguay.
Margeana linguatula, M. sera.
- CRINIA SIGNIFERA -- Australia.
*Echinoparyphium ellisi (in tadpoles).
- CRYPTOBRANCHUS ALLEGANIENSIS -- U. S. A.
Telorchis cryptobranchi.
- DERMOPHIS MEXICANUS -- Mexico.
Telorchis ratonianus.
- DESMOGNATHUS FUSCUS -- U. S. A.
Brachycoelium mesorchium, B. obesum, B. salamandrae, B. stablefordi, B. trituri, B. sp? of Rankin, 1938, *Diplostomulum desmognathi, Gorgoderina bilobata, Megalodiscus intermedius, M. temperatus, Metacercariae of Rankin, 1937, Phyllodistomum solidum (metacercariae and adults), Plagitura salamandrae.
- D. FUS. AURICULATUS -- U. S. A.
Brachycoelium salamandrae.
- D. OCHROPHAEUS CAROLINENSIS -- U. S. A.
Brachycoelium salamandrae.
- D. PHOCA -- U. S. A.
Brachycoelium elongatum, B. salamandrae, *Diplostomulum desmognathi.
- D. QUADRAMACULATA -- U. S. A.
Brachycoelium elongatum, B. salamandrae, *Diplostomulum desmognathi, *Metacercariae of Rankin, 1937.
- DICAMPTODON ENSATUS -- U. S. A.
Brachycoelium salamandrae, Cephalouterina dicamptodoni, *Euryhelmis pacificus (in larvae), Halipegus occidualis, Megalodiscus americanus, M. microphagus, Phyllodistomum singulare (in larvae).
- DISCOGLOSSUS PICTUS -- Africa.
Pleurogenes medians, *Ratzia parva (= joyeuxi), *R. sp? of Brumpt, 1936.
- D. PICTUS -- Europe.
*Polystoma integerrimum.
- ELEUTHERODACTYLUS RICORDI -- U. S. A.
*Platynosomum fastosum.
- ELOSIA NASUS -- Brazil.
Dolichosaccus amplicava, Gorgoderina cedroi.
- ENSATINA ESCHOLTZII OREGANUS -- U. S. A.
Brachycoelium salamandrae.
- EURYCEA BIS. BISLINEATA -- U. S. A.
Brachycoelium salamandrae, Metacercariae of Fischthal, 1955, Phyllodistomum solidum.

- E. BIS. CIRRIGERA -- U. S. A.
Brachycoelium obesum, B. salamandrae.
- E. BIS. WILDERAE -- U. S. A.
Brachycoelium salamandrae.
- E. LONGICAUDA GUTTOLINEATA -- U. S. A.
Brachycoelium salamandrae, Gorgoderina tenua, Piagitura salamandra.
- E. TYNERENSIS -- U. S. A.
Sphyranura euryceae.
- "Frogs" -- Europe.
*Distoma atriventre, Halipegus ovocaudatus.
- "Frogs" -- Japan and Philippines.
*Echinoparyphium recurvatum metacercariae.
- "Frogs" -- S. Africa.
*Distoma luteum.
- "Frogs" -- U. S. A.
*Cercaria kappa (in tadpoles), *C. merchanti (in tadpoles), *C. pricei (in tadpoles), *C. psi (in tadpoles),
*Distome cysts of Stabler & Pennypacker, 1939.
- "Frog" -- Venezuela.
Haematoloechus lutzi.
- "Frog, Toad and Newt Tadpoles" -- Europe.
*Kasr pleurolophocerca (frog tadpoles only), Leptophallus nigrovenosus (Metacercariae).
- "Frog Tadpoles" -- U. S. A. (serve as paratenic intermediate hosts).
*Alaria arisaemoides, *A. canis (mesocercariae).
- "Green Frog" (? = Rana clamitans) -- Mexico.
Rauschiella tineri.
- GYRINOPHILUS PORPHYRITICUS -- U. S. A.
Brachycoelium salamandrae, Gorgodera cygnoides.
- HEMIDACTYLIUM SCUTATUM -- U. S. A.
Brachycoelium salamandrae.
- HEMIPIPA CARVALHOI -- Brazil.
Catadiscus mirandai.
- HYLA ARBOREA -- Europe.
Asymphlyodora tincae, *Dolichoenterum lemirandi (exper.), *Echinoparyphium recurvatum, Gorgodera cygnoides, Haplometra cylindracea, *Lecithochirium rufoviride (exper.), Lecithopyge ranae, *Opisthioglyphe endoloba (exper. in tadpoles and adults), O. ranae, Opisthodiscus subclavatus, Pleurogenes claviger, P. medians (also metacercariae in tadpoles), Polystoma integerrimum, P. palancai, *Prosorhynchus aculeatus (exper.), *Sphaerostoma brauae, *Szidatia joyeuxi.
- H. ARB. MERIDIONALIS -- Europe.
Polystoma gallieni, P. integerrimum.
- H. AUREA -- Australia.
Brachysaccus anartius, Distomum sp? of Hill, 1936, Dolichosaccus tryphesus, Gorgodera australiensis, Haematoloechus australis, Mesocoelium mesembrinum, Opisthodiscus subclavatus, Pleurogenes solus.
- H. AUREA -- New Zealand.
Gorgodera australiensis, Opisthodiscus subclavatus (? = Diplodiscus megalochrus).

- H. BAUDINII -- Mexico.
Polystoma naevius.
- H. CAERULEA -- Australia.
Brachysaccus symmetricus, Dolichosaccus ischyryus, Mesocoelium mesembrinum, M. microon, *Neodiplostomum intermedium (paratenic host), Opisthodiscus subclavatus.
- H. CINEREA -- U. S. A.
Brachycoelium daviesi, B. salamandrae, *Dasymetra villicaeca (in tadpoles), *Fibricola cratera (in tadpoles and adults), Megalodiscus temperatus, *Neorenifer aniarum (in tadpoles), Polystoma nearcticum (both larvae and adults).
- H. CITROPA -- Australia.
Mesocoelium oligoon.
- H. CREPITANS -- Venezuela.
? *Apatemon gracilis (in tadpoles), *Strigea vaginata.
- H. CRUCIFER -- Canada.
Glythelmins quieta (larvae and adults).
- H. CRUCIFER -- U. S. A.
Brachycoelium salamandrae, *Distoma sp? of Stiles & Hassall, 1894, *Echinoparyphium flexum, Glythelmins pennsylvaniensis (larvae and adults), G. quieta (larvae and adults), G. sp? of Brandt, 1936, Gorgoderid metacercariae of Najarian, 1955, Megalodiscus temperatus (larvae in tadpoles and adults, adults in adults).
- H. EWINGII -- Australia.
Mesocoelium megaloon, Opisthodiscus subclavatus.
- H. EXIMIA -- Mexico.
Megalodiscus americanus.
- H. FREYCINETI -- Australia.
Dolichosaccus diamesus, Pleurogenes freycineti.
- H. GRACILENTA -- Australia.
Mesocoelium microon.
- H. LATOPALMATA -- Australia.
*Neodiplostomum intermedium (in tadpoles and adults).
- H. LESUERII -- Australia.
Parapolystoma bulliense.
- H. PEARSONI -- Australia.
*Neodiplostomum intermedium (in tadpoles and adults).
- H. PHYLLOCHROA -- Australia.
Parapolystoma bulliense.
- H. RANICEPS -- Brazil.
Glythelmins vitellinophilum.
- H. REGILLA -- U. S. A.
Megalodiscus macrophagus (exper. raised in tadpoles and adults), *Paralechriorchis syntomentera (in tadpoles).
- H. RUBRA -- Brazil.
*Strigea vaginata.
- H. SEPTENTRIONALIS -- Cuba.
Polystoma stellai.
- H. SQUIRELLA -- U. S. A.
Polystoma nearcticum (both larvae and adults).
- H. VERSICOLOR -- U. S. A.
*Apharyngostrigea pipientis (in tadpoles), *Cercaria amherstensis (in tadpoles), C. holthauseni (in tadpoles), *Gorgodera

- amplicava (in tadpoles), Polystoma nearcticum (both larvae and adults),
 H. spp? -- Australia.
Dolichosaccus spp? of Johnston, 1912,
Pleurogenes sp? of Roberts, 1936-37.
- H. spp? -- Brazil.
 *Clinostomum heluans, *Echinostoma mephrocystis, *Strigea elegans.
- HYPEROLIUS (= Rappia) CONCOLOR -- Africa (Liberia).
Haplometroides rappiae.
- KALOULA PULCHRA -- China.
 *Pharyngostomum cordatum (in tadpoles and adults).
- LEPTODACTYLUS BOLIVIANUM -- Bolivia.
Margeana linguatula.
- L. CALIGINOSUS -- Brazil.
Catadiscus marinholetzi, C. sp? of Travassos, Freitas & Lent, 1939,
Glythelmins sp? of T., F., & L., 1939, Margeana linguatula.
- L. OCELLATUS -- Panama.
Catadiscus rodriguezi.
- L. OCELLATUS -- Brazil.
Catadiscus inopinatus, C. marinholetzi, C. sp? of Trav., Freitas & Lent, 1939,
 *Distoma repandum, Glythelmins quieta (larvae and adults), G. sp? of Trav., Freitas & Lent, 1939,
Gorgoderina carioca, G. cryptorchis, G. parvicava, G. pugalevskyi, G. rochalamai, Haematoloechus neivai, Halipegus dubius, *Hysteromorpha trilobum (exper. in tadpoles), Margeana elegans, M. linguatula, M. parva, M. repandum,
- L. OCELLATUS -- Paraguay.
Catadiscus inopinatus, C. freitaslenti, Margeana linguatula.
- L. OCELLATUS -- Uruguay.
Catadiscus inopinatus, C. uruguayensis, Margeana linguatula, M. repandum (= M. proximus), M. simulans, Plagiorchis lenti.
- L. OCELLATUS -- Venezuela.
Haematoloechus ozorioi.
- L. PENTADACTYLUS -- Brazil.
 *Alaria alata, Gorgoderina parvicava, Haematoloechus neivai, Margeana linguatula, *Strigea vaginata.
- L. PENTA. LABYRINTHICUS -- Brazil.
Gorgoderina parvicava, Haematoloechus neivai, Margeana elegans, M. linguatula (? = M. palmipedis).
- L. SIBILATRIX -- Brazil.
Opisthodiscus subclavatus.
- L. TYPHONIUS -- Brazil.
Opisthodiscus subclavatus.
- LYMNODYNASTES DORSALIS -- Australia.
Dolichosaccus ischyryus.
- L. PERONII -- Australia.
Brachysaccus anartius, Dolichosaccus tryphesus, Gorgoderina australiensis, Haematoloechus australis, Opisthodiscus subclavatus.
- L. TASMANIENSIS -- Australia.
 *Cercaria angelae (in tadpoles), *C. natans (in tadpoles), Opisthodiscus subclavatus.

- L. spp? tadpoles -- Australia.
*Cercaria ameriannae. (enters and encysts).
- MEGALOBATRACHUS JAPONICUS -- China.
Bucephalopsis kweiyangensis, Opisthioglyphe orientalis.
- M. JAPONICUS -- Japan.
Diplodiscus japonicus, Liolope copulans,
Opisthodiscus subclavatus, *Phyllo-
distomum folium.
- MICROHYLA ORNATA -- China.
*Pharyngostomum cordatum (in tadpoles and adults).
- M. PULCHRA -- China.
*Pharyngostomum cordatum (in tadpoles and adults).
- MIXOPHES FASCIOLATUS -- Australia.
*Neodiplostomum intermedium.
- NECTURUS MACULOSUS -- Canada.
? Crepidostomum farionis, Monocaecum baryurum.
- N. MACULOSUS -- U. S. A.
? Crepidostomum cooperi, ? C. cornutum,
? C. farionis, Gorgoderina schistorchis,
Neochasmus umbellus, Sphyrnura oligorchis,
S. osleri (= S. polyorchis),
Telorchis necturi.
- NOTOPHTHALMUS (Triturus) VIRIDESCENS -- Canada.
Brachycoelium salamandrae, Manodistomum occultum.
- N. VIRIDESCENS -- U. S. A.
Brachycoelium obesum, B. salamandrae
(= B. hospitale), B. trituri, *Diplostomum scheuringi (= D. trituri), *Distoma
sp? of Stiles & Hassall, 1894,
- Gorgoderina attenuate, G. intermedia, G. translucida, Manodistomum occultum,
Megalodiscus rankini, M. temperatus,
Metacercariae of Fischthal, 1955,
Plagitura parva, P. salamandra,
Pseudopisthodiscus americanus (? =
Megalodiscus temperatus).
- OOEIDOZYGA LIMA -- China.
Diplodiscus japonicus, *Encyclometra
asymmetrica, *E. koreana, *Pharyngostomum
cordatum (in tadpoles and adults).
- PELOBATES CULTRIPES -- Europe.
Asymphlyodora tincae, *Opisthioglyphe
endoloba (in tadpoles and adults),
Polystoma integerrimum.
- P. FUSCUS -- Europe.
*Distoma sp? of Timofeev, 1900,
*Echinoparyphium recurvatum,
Haplometra cylindracea, Opisthioglyphe
ranae, Polystoma integerrimum.
- PELODYTES PUNCTATUS -- Europe.
*Opisthioglyphe endoloba (in tadpoles and adults).
- PIPA PIPA -- Brazil.
Monostoma sulcatum.
- PLETHODON CINEREUS -- Canada.
Brachycoelium salamandrae.
- P. CINEREUS -- U. S. A.
Brachycoelium louisianae, B. obesum, B. salamandrae,
B. storeriae, B. sp? of Rankin, 1938.
- P. ERYTHRONOTUS -- U. S. A.
Brachycoelium salamandrae.
- P. GLUTINOSUS -- U. S. A.
Brachycoelium elongatum, B. obesum, B.

- salamandrae, B. storeriae, B. sp? of Rankin, 1938.
- P. METCALFI -- U. S. A.
Brachycoelium salamandrae.
- P. YONAHLOSSEE -- U. S. A.
Brachycoelium salamandrae.
- PLEURODELES WALTL -- Europe.
Prosotocus confusus (exper.).
- POLYPEDATES BUERGERI -- Japan.
Cryptotropa kuretani, Gorgoderina kajika,
Mesocoelium japonicum, Pleurolobatus lobatus.
- P. EQUES -- Ceylon.
Mesocoelium marrsi.
- P. LEUCOMYSTAX MEGACEPHALUS -- China.
*Pharyngostomum cordatum (in tadpoles and adults).
- P. MACULATUS -- Ceylon.
Mesocoelium burti.
- P. SCHLEGELI ARBOREA -- Japan.
Polystoma rhacophori.
- PROTEUS ANGUINUS -- Europe (Yugoslavia).
Plagioporus protei.
- PSEUDACRIS NIGRITA -- U. S. A.
*Fibricola cratera (in tadpoles and adults).
- P. NIG. TRISERIATA -- Canada.
Glythelmins quieta (larvae and adults).
- P. NIG. TRISERIATA -- U. S. A.
Brachycoelium daviesi, B. salamandrae,
*Echinoparyphium flexum, *Fibricola cratera (in tadpoles and adults),
Glythelmins quieta (larvae and adults),
Megalodiscus temperatus.
- P. OCCIDENTALIS (= P. brimleyi) -- U. S. A.
Brachycoelium salamandrae, B. trituri,
*Dasymetra villicaeca (in tadpoles),
*Neorenifer aniarum (in tadpoles).
- PSEUDIS MERIDIONALIS -- Uruguay.
Catadiscus corderoi.
- P. PARADOXA -- Venezuela.
Catadiscus pygmaeus, Gorgoderina diaster,
G. parvicava, Haematoloechus neivai,
H. planorbinus (? = H. lutzii).
- PSEUDOPHRYNE BIBRONII -- Australia.
*Paryphostomum tenuicolle (in tadpoles).
- PSEUDOSALAMANDRA (= Hynobius) FUSCUS -- Japan.
Gorgoderina sp? of Pearse, 1932.
- P. STEJNEGERI -- Japan.
Mesocoelium japonicum, M. lanceatum
(= M. pearsii).
- P. TOKYOENSIS -- Japan.
Mesocoelium japonicum, M. lanceatum
(= M. pearsii).
- PSEUDOTRITON MONTANUS -- U. S. A.
Allocreadium pseudotritoni, Gorgoderina amplivava, Gorgoderina bilobata.
- P. RUBER RUBER -- U. S. A.
Allocreadium pseudotritoni, Brachycoelium salamandrae, B. storeriae, Gorgoderina amplivava, G. cygnoides, Gorgoderina bilobata, Metacercariae of Rankin, 1937.
- RANA ADSPERSA -- Africa (S. Rhodesia).
Glythelmins africana, Parapolystoma alluaudi, Sarunitrema hystatorchis.
- R. AESOPUS -- U. S. A.
Brachycoelium salamandrae, Megalodiscus temperatus.

- R. AMURENSIS -- Siberian U. S. S. R.
Haematoloechus nanchangensis bychovskii,
H. schuizei, H. sibericus.
- R. ANGULOSA -- China.
Margeana staffordi (larvae and adults).
- R. AREOLATA -- U. S. A.
Haplometrana intestinalis (= H. utahensis)
(larvae and adults), Megalodiscus
temperatus.
- R. ARVALIS (= R. terrestris) -- Europe.
*Pradesia turgida, *Distoma sp? of
Timofeev, 1900, Gorgodera cygnoides,
Gorgoderina vitelliloba, Haematoloechus
asper asper, H. similis, H. variegatus,
Haplometra cylindracea, Monostoma
ellipticum, Opisthioglyphe endoloba,
O. ranae, O. subclavatus, Pleurogenes
claviger, P. intermedius, P. medians,
Polystoma integerrimum, Prosotocus
confusus, P. mirabilis.
- R. ARV. ALTAICA -- Siberian U. S. S. R.
Haematoloechus sibericus, Pleurogenes
intermedius.
- R. ARV. ISAITSCHIKOVI -- Europe.
Gorgoderina vitelliloba, Haplometra
cylindracea, Opisthioglyphe histrix.
- R. AURORA AURORA -- U. S. A.
Brachycoelium lynchi, *Euryhelmis
squamula, Glyphelmis quieta (larvae
and adults), Gorgoderina aurora, G.
multilobata, Halipegus occidualis,
Margeana californiensis, *Metagoni-
moides oregonensis, *Paralechriorchis
syntomentera (in tadpoles).
- R. AUR. DRAYTONI -- U. S. A.
Cephalogonimus brevicirrus, *Clinostomum
sp? of Ingles, 1936, Glyphelmis
quieta (larvae and adults), Haematoloechus
kernensis, H. oxyorchis, H. tumidus,
Margeana californiensis.
- R. BOYLIi -- U. S. A.
*Clinostomum sp? of Ingles, 1936,
Deropegus (= Halipegus) aspina,
Glyphelmis quieta (larvae and adults),
Gorgoderina multilobata, Haematoloechus
buttensis, H. oxyorchis (exper.), H.
sp. of Lehmann, 1959, Margeana
californiensis, Megalodiscus americanus,
M. temperatus.
- R. CANCRIVORA -- Malaya (Singapore).
Haematoloechus singaporensis, Margeana
staffordi.
- R. CANTABRIGENSIS -- U. S. A.
Megalodiscus temperatus.
- R. CASCADAE -- U. S. A.
*Euryhelmis squamula.
- R. CATESBIANA -- Canada.
*Cercaria vesiculosa, Glyphelmis
quieta (larvae and adults), Gorgodera
amplicava (in tadpoles and adults),
G. cygnoides, Gorgoderina attenuata,
G. simplex, Haematoloechus breviflexus,
H. longiflexus, H. variegatus, H.
varioplexus, Halipegus occidualis,
Loxogenes arcanum, Megalodiscus
temperatus.
- R. CATESBIANA -- U. S. A.
*Alaria mustelae (in tadpoles and adults),
Allassostoma parvum, Amphistome of

Trowbridge & Hefley, 1934,
 *Aurodistomum chelydrae (exper. in tadpoles), Cephalogonimus americanus (= retusus), *Clinostomum complanatum, Dasymetra conferta, D. villicaeca (in tadpoles), *Echinostoma revolutum (in tadpoles and adults), Glythelmins quieta (larvae and adults), G. subtropica, Gorgodera amplicava (= minima) (in tadpoles and adults), G. cygnoides, G. vivata, Gorgoderina attenuata, G. ? vitelliloba, Gyrodactylus sp? of Stunkard & Dunihue, 1933 (on tadpoles), Haematoloechus breviplexus, H. complexus, H. floedae, H. longiplexus, H. medioplexus, H. parvioplexus, H. variegatus, Halipegus amherstensis (in tadpoles and adults), H. eccentricus (in tadpoles and adults), H. occidualis, Loxogenes arcanum, Megalodiscus intermedius, M. temperatus, *Mesostephanus kentuckiensis (in tadpoles), *Neorenifer aniarum (in tadpoles), ? Opisthodiscus subclavatus.

R. CATESBIANA -- Mexico.

Haematoloechus longiplexus.

R. CATESBIANA -- Japan (Zool. Gardens).

Mesocoelium lanceatum (= brevicaecum),

Opisthodiscus subclavatus.

R. CLAMITANS -- Canada.

Cephalogonimus retusus, Gorgodera amplicava,

G. cygnoides, Gorgoderina simplex,

Haematoloechus medioplexus, Halipegus

occidualis, *Lechriorchis primus (in tadpoles).

R. CLAMITANS -- U.S.A.

*Alaria marcianae (in tadpoles), *Alaria

mustelae (in tadpoles and adults),

*Alaria sp? of Olivier, 1940 (in tadpoles), Cephalogonimus americanus (= retusus), C. vesicaudus, *Cercaria amherstensis (in tadpoles), *C. holthauseni (in tadpoles), *Clinostomum complanatum, *Dasymetra conferta (in tadpoles), *D. villicaeca (in tadpoles), *Diplostomum flexicaudum (exper. in tadpoles and adults), *Distoma sp? of Stiles & Hassall, 1894, *Echinoparyphium flexum, *Euparyphium melis (in tadpoles), *Euryhelmis monorchis (in tadpoles and adults), *Fibricola cratera (exper. in tadpoles and adults), Glythelmins quieta (larvae and adults), Gorgodera amplicava (in tadpoles and adults), G. cygnoides, G. vivata, G. sp? of Krull, 1935, *Gorgoderid metacercariae of Najarian, 1955, Gorgoderina attenuata, G. simplex, G. tanneri, G. translucida, G. ? vitelliloba, Haematoloechus breviplexus, H. complexus, H. floedae, H. longiplexus, H. medioplexus, H. parvioplexus, H. similiplexus, Halipegus amherstensis (in tadpoles and adults), H. eccentricus (in tadpoles and adults), H. occidualis, H. sp? of Bouchard, 1951, H. sp? of Krull, 1935, ? Haplometra cylindracea, *Lechriorchis primus (in tadpoles), *L. tygarti (in tadpoles), Loxogenes arcanum (exper.), Loxogenoides bicolor, Megalodiscus temperatus (larvae and adults in tadpoles and adults), *Mesostephanus kentuckiensis (in tadpoles), *Metagonimoides oregonensis (in tadpoles), *Neorenifer aniarum (in tadpoles), *Strigea elegans (in

- tadpoles), Zeugorchis eurinus (in tadpoles).
- R. CYANOPHLYCTIS -- Ceylon.
Pleurogenoides sitapurii.
- R. CYANOPHLYCTIS -- India.
*Clinostomum prognum, Diplodiscus amphichrus magnum, D. sp? of Srivastava, 1934, Ganeo attenuatum, G. gastricus, G. kumaonensis, G. panjabensis, G. srinagarensis, G. tigrinum, G. sp? of Kaw, 1950, Haematoloechus almorai, Halipegus mehransis, H. spindale, H. sp? of Bhalerao, 1936, Mehraorchis ranarum (larvae and adults), Nenimandijea kashmirensis, Phyllodistomum almorai, Pleurogenes gastroporus, P. gast. equalis, P. orientalis, P. sawanensis, Pleurogenoides sitapurii, Prosotocus himalayai, P. indicus, P. infrequentum, P. kashabia, P. paratypus, *Tetracotyle ranae, Tremiorchis ranarum.
- R. DALMATINA -- Europe.
*Echinostomum recurvatum, Haplometra cylindracea allometra, Polystoma integerrimum (larvae and adults on and in tadpoles and adults).
- R. ERYTHRACEA -- Malaya (Singapore).
Diplodiscus sacculosus, Margeana staffordi.
- R. ESCULENTA -- Africa.
Pleurogenes medians, *Prohemistomum vivax, Prosotocus tener.
- R. ESCULENTA -- Europe.
*Alaria alata, Asymphylogora tincae, Brandesia areana (in tadpoles and adults), B. turgida (larvae and adults), Cephalogonimus retusus, *Cercaria incistidata (in tadpoles), *C. vesiculosa (in tadpoles), *C. sp? of Parona, 1894 (in tadpoles), *Codonocephalus urniger, *Distoma acervocalciferum, *D. diffusocalciferum, *D. incistidatum, *D. molini, *D. pelophylacis esculenti, *D. sp? of Bagnis, 1874, *D. sp? forma v & vi of Ercolani, 1882 (exper.), *D. sp? of Perroncito, 1880, *D. sp? of Sonsino, 1896, *D. sp? of Timofeev, 1900, *Echinoparyphium recurvatum, *E. spinigerum, *Echinostomum revolutum, *Encyclometra colubrimurorum, *Euryhelminis squamula (in tadpoles), Gorgodera asymmetrica, G. circava granatensis, G. cygnoides (larvae and adults), G. loossi, G. microovata, G. pagenstecheri, G. varsoviensis, Gorgoderina vitelliloba (larvae in tadpoles, adults in frogs), Haematoloechus asper, H. asper lipsiensis, H. schulzei, H. similis, H. sim. volgensis (= Skrjabinoeces v.), H. variegatus, Halipegus ovocaudatus, Haplometra cylindracea, *Hypoderaeum conoideum, Lecithopyge ranae, L. rastellum, Monostoma ellipticum, Opisthioglyphe endoloba, O. hystrix, O. ranae, Opisthodiscus diplodiscoides, O. subclavatus, Pleurogenes claviger, P. loossi (= Candidotrema l.), P. medians, Polystoma integerrimum, Prosotocus confusus, P. fuelleborni, P. sigalasi, *Ratzia parva, *Szidatka joveuxi, ? *Tetracotyle crystallina, *Tylodelphys excavata.

- R. ESC. JAPONICA -- Japan.
*Echinochasmus elongatus, *Echinostoma cinetorchis (in tadpoles), *E. macrorchis (in tadpoles and adults), Loxogenes liberum, Opisthodiscus subclavatus, Polystoma ozakii.
- R. ESC. LESSONAE -- Europe.
Haematoloechus variegatus.
- R. ESC. RIDIBUNDA -- Africa.
Gorgodera microovata, G. pachenstecheri, G. varsoviensis, Gorgoderina capsensis (metacercariae and adults), G. vitelliloba, Haematoloechus asper asper, H. similis, H. variegatus, Metacercariae of Joyeux & Gaud, 1945, Opisthodiscus diplodiscoides, O. subclavatus, Pleurogenes medians, P. stromi punicus, *Prohemistomulum expeditum, *Prohemistomulum vivax, *Ratzia parva, Sonsinotrema calloti, S. tacapense, *Szidatia joyeuxi.
- R. ESC. RIDIBUNDA -- Japan.
Opisthodiscus subclavatus.
- R. ESC. RIDIBUNDA -- Turkestan.
Gorgodera asiatica, G. dollfusi, G. media, Gorgoderina orientalis, Pleurogenes compactus, P. stromi.
- R. ESC. RIDIBUNDA -- Turkey.
Gorgodera cygnoides, Gorgoderina vitelliloba, Haematoloechus variegatus, Haplometra cylindracea, Opisthio glyphe ranae (? endoloba), Opisthodiscus subclavatus, Prosotocus confusus.
- R. ESC. RIDIBUNDA -- Europe.
*Brandesia turgida, Cephalogonimus retusus, *Codonocephalus urniger, *Distoma cloacicola, *Encyclometra natricis, Gorgodera cygnoides, G. pagenstecheri, G. varsoviensis, Haematoloechus asper asper, H. breviansa (= Skrjabinoeces b.), H. schulzei, H. similis, H. sim. volgensis (= Skrj. v.), H. variegatus, H. var. dubininae, Halipegus ovocaudatus, Haplometra cylindracea, Lecithopyge ranae, *Neodiplostomum major, Opisthodiscus diplodiscoides nigrivasis, O. subclavatus, Pleurogenes claviger, P. medians, P. stromi, Prosotocus confusus, *Xiphidiocercaria tricuspadata.
- R. FUSCIGULA -- S. Africa.
Haematoloechus sp? of Grobbelaar, 1922, Halipegus ovocaudatus.
- R. GRYLIO -- U. S. A.
*Clinostomum complanatum, ? *C. marginatum, Gorgodera amplicava, Gorgoderina attenuata, Haematoloechus longiplexus, *Paramacroderoides echinus (in tadpoles).
- R. GUENTHERI -- China.
*Pharyngostomum cordatum.
- R. HEXADACTYLA -- Ceylon.
Chiorchis (= Pseudochiorchis) burti, Pleurogenoides sitapurii (exper.).
- R. HEXADACTYLA -- India.
Chiorchis (= Pseudochiorchis) burti, Ganeo glottoides, Haematoloechus capyristes, Halipegus longispina, Pleurogenes spaericus.
- R. LIMNOCHARIS -- China, including Manchoukuo.
*Centrocestus formosanus, Diplodiscus

- amphichrus, D. japonicus, *Encyclometra
asymmetrica, *E. koreana, *Pharyngostomum
cordatum.
- R. LONGIROSTRIS -- Africa (Ivory Coast).
Polystoma cachani.
- R. MACRONEMIS -- Europe.
Gorgoderina vitelliloba, Haplometra
cylindracea, Opisthodiscus subclavatus
(metacercariae in tadpoles, adults in adultR. frogs), Polystoma integerrimum.
- R. MACRODON -- Malaya.
Margeana staffordi.
- R. MACULATA -- Brazil.
Haematoloechus neivai.
- R. MAGNA -- Philippines.
*Clinostomum pseudoheterostomum.
- R. MASCARENIENSIS -- Africa.
Glypthelmins africana, Haematoloechus
dollfusinus, H. variegatus, Halipegus
africana, Lepoderma ramlanum,
Mesocoelium mesocoelium (= M.
schwetzi), M. monadi, Polystoma
integerrimum.
- R. MASCARENIENSIS -- Mauritius Island.
Lepoderma monplou.
- R. MONTEZUMAE -- Mexico.
Cephalogonimus robustus, Glypthelmins
quieta (larvae and adults), Gorgoderina
attenuata, G. skarbilovitschi,
Haematoloechus coloradensis, H.
complexus, H. elongatus, H. illimis,
H. macrorchis, H. medioplexus, H.
parcivitellarius, H. varioplexus,
Halipegus amherstensis, H. lernensis
(? = H. occidualis), Margeana
californiensis, Megalodiscus americanus,
M. temperatus.
- R. NIGROMACULATA -- China, including
Manchoukuo.
Diplodiscus amphichrus, Diplorchis
nigromaculatus, Haematoloechus
lobatus, H. sibericus jeholensis, H.
sib. tientsinensis.
- R. NIGROMACULATA -- Japan.
Diplodiscus japonicus, Diplorchis
nigromaculatus, *Echinochasmus
elongatus, *Echinostoma cinetorchis,
*E. macrorchis, *Encyclometra
japonica, Glypthelmins quieta
(larvae and adults), Gorgoderina
japonica, Haematoloechus
nanchangensis major, H. sibericus
japonicus, H. sp? (of Kobayashi,
1921), H. sp? (of Matuda, 1938),
Halipegus japonicus, Loxogenes
liberum, Margeana rugocaudata,
Mesocoelium elongatum, M. lanceatum
(= M. brevicaecum), Opisthodiscus
subclavatus, Pleurogenes japonicus,
Polystoma ozakii, *Proalarioides
serpentis.
- R. NIGRO. CHOSENICA -- Korea.
Diplodiscus amphichrus.
- R. PALMIPES -- Brazil.
Catadiscus propinquus, Haematoloechus
iturbei, H. neivai, Margeana
linguatula(= Glypthelmins palmipedis).
- R. PALMIPES -- Colombia.
Haematoloechus medioplexus (= H. iturbei).
- R. PALMIPES -- Uruguay.
Margeana linguatula.

R. PALMIPES -- Venezuela.

Gorgoderina diaster, G. parvicava,
Haematoloechus lutzi (? = H. tejerae),
H. medioplexus (? = H. iturbei), H.
neivai, (? = H. planorbinus),
 *Lophosicyadiplostomum nephrocystis,
Margeana linguatula (? = Glythelmins
palmipedis).

R. PALUSTRIS -- U. S. A.

*Alaria mustelae (in tadpoles and adults),
Brachycoelium salamandrae, *Clin-
ostomum complanatum, *Euryhelms
monorchis (in tadpoles and adults),
Glythelmins quieta (larvae and adults),
Gorgodera amplicava (larvae and adults
 in tadpoles and in adult frogs), G.
cygnoides, Gorgoderid cysts of Rankin,
 1945, Gorgoderina attenuata,
Haematoloechus medioplexus, Halipegus
 sp? of Bouchard, 1951, ? Haplometra
cylindracea.

R. PIPIENS -- Canada.

Cephalogonimus retusus, *Cercaria
vesiculosa (develops in adults),
 *Distoma nitidum, *Echinoparyphium
flexum, Glythelmins quieta (larvae
 and adults), Gorgodera amplicava, G.
cygnoides, Gorgoderina attenuata, G.
simplex, G. translucida, Haematoloechus
breviplexus, H. medioplexus, H.
similiplexus, H. variegatus, *Lechriorchis
primus, Manodistomum occultum,
Megalodiscus temperatus.

R. PIPIENS -- U. S. A.

*Alaria arisaemoides (in tadpoles), *A.
canis (in tadpoles), *A. intermedia
 (in tadpoles and adults), *A. micradena

(in tadpoles), *A. mustelae, *A.
marciana, *A. sp? of Frandsen &
 Grundmann, 1960, Allassostoma
parvum (metacercariae in tadpoles,
 adults in adult frogs), *Apharyngostrigea
pipientis (in tadpoles), Cephalogonimus
retusus, *Cercaria elodes (enter
 tadpoles), *Clinostomum complanatum,
 *Diplostomulum vegrandis (in tadpoles),
Diplostomum flexicaudum (in tadpoles
 and adults), *Distoma nitidum, Distome
 metacercariae of Stabler & Pennypacker,
 1939 (in liver of adults), *Echinoparyphium
flexum, *Echinostoma revolutum (in
 tadpoles and adults), *Euryhelms
monorchis (in tadpoles and adults),
 *Fibricola cratera (in tadpoles),
Glythelmins quieta (larvae and adults),
G. subtropica, Gorgodera amplicava
 (= G. minima), G. cygnoides,
Gorgoderina attenuata, *G. sp? of
 Goodchild, 1950 (in tadpoles),
Haematoloechus coloradensis, H.
complexus, H. kerensis, H. longiplexus,
H. medioplexus, H. simplex, H.
variegatus, H. varioplexus, Halipegus
eccentricus (in tadpoles and adults),
H. occidualis, H. sp? of Frandsen &
 Grundmann, 1960, *Lechriorchis
primus, *L. tygarti, Loxogenes
arcanum, Megalodiscus temperatus
 (larvae and adults in tadpoles and
 adults), *Mesostephanus kentuckiensis
 (in tadpoles), Monostoma ornatum,
 ? Opisthodiscus subclavatus,
 *Tetracotyle crystallina (encysted),
 *Zeugorchis eurinus (in tadpoles).

- R. PIPIENS -- Mexico.
Cephalogonimus retusus (= C. americanus),
Gorgoderina attenuata, Haematoloechus
complexus, H. macrorchis, H. medioplexus;
H. varioplexus, Halipegus occidualis
(= H. lernensis), Langeronia macrocirra,
Margeana californiensis, Megalodiscus
americanus.
- R. PIPIENS -- Costa Rica.
Cephalogonimus retusus (= C. americanus),
Glythelmins facioi, Megalodiscus
americanus, M. temperatus.
- R. PIPIENS BRACHYCEPHALA -- U. S. A.
Gorgodera amplicava.
- R. PLANCYI -- China.
Haematoloechus nanchangensis.
- R. PRETIOSA PRETIOSA -- U. S. A.
Glythelmins sp? of Turner, 1958,
Gorgoderina multilobata, G. tanneri, G.
translucida, Haematoloechus parviplxus,
H. similiplexus, Halipegus sp? of
Turner, 1958, Haplometrana intestinalis
(= H. utahensis -- both larvae and
adults).
- R. PRETIOSA and R. SYLVATICA hybrids --
U. S. A.
Gorgoderina translucida, Haematoloechus
parviplxus, Haplometrana intestinalis.
- R. RUGOSA -- Japan.
Diplodiscus amphichrus, D. japonicus,
Diplorchis ranae, *Echinostoma
cinetorchis (in tadpoles), Loxogenes
liberum, Margeana rugocaudata,
Mesocoelium elongatum, M. lanceatum
(= M. breviaecum), M. ovatum,
Opisthodiscus subclavatus.
- R. RUGOSA -- Korea.
Diplodiscus amphichrus.
- R. RUGULOSA -- China.
? *Centrocestus formosanus, Diplodiscus
amphichrus, D. japonicus, *Encyclo-
metra koreana, Ganeo tigrinum
(= G. lingnanensis), Margeana staffordi,
*Pharyngostomum cordatum (in tadpoles
and adults), Pleurogenes taylori.
- R. SEPTENTRIONALIS -- U. S. A.
Cephalogonimus americanus, (= C.
retusus), Glythelmins quieta (larvae
and adults), Gorgoderina attenuata,
G. simplex, G. translucida,
Haematoloechus longiplexus, H.
medioplexus, H. similiplexus, Halipegus
sp? of Bouchard, 1951, Loxogenes
arcanum, Megalodiscus americanus, M.
temperatus.
- R. SPHENOCEPHALA -- U. S. A.
Amphistome of Trowbridge & Hefley,
1934, Brachycoelium georgianum,
B. salamandrae, B. trituri,
*Clinostomum complanatum, Glythelmins
quieta (larvae and adults), G. subtropica,
Gorgodera amplicava, G. cygnoides,
Haematoloechus uniplexus, Halipegus
occidualis, Langeronia provitellaria,
Megalodiscus temperatus, *Neodiplostomum
sp? of Penner, 1938, *Paramacroderoides
echinus.
- R. SPHENOCEPHALA -- Mexico.
Megalodiscus americanus.
- R. STENOCEPHALA -- Brazil.
Megalodiscus temperatus.
- R. SUPERCILIARIS -- Africa (Ivory Coast).

- Polystoma manganoti.
- R. SYLVATICA -- U. S. A.
 *Alaria arisaemoides (in tadpoles), *A. canis (in tadpoles), Brachycoelium salamandrae, *Echinoparyphium flexum (in tadpoles), Gorgoderid metacercariae of Najarian, 1955, Gorgoderid cysts of Rankin, 1945, Gorgoderina attenuata, G. translucida, Haematoloechus varioplexus, *Strigea elegans (in tadpoles).
- R. TEMPORARIA -- Europe.
 *Alaria alata, Allocreadium angusticolle (larvae and adults), Brachycoelium salamandrae, Cephalogonimus retusus, *Cercaria cambrensis I. (in tadpoles), Codonocephalus urniger, *Distoma gyrini (in tadpoles), *Echinoparyphium recurvatum, *Euryhelmis squamula (in tadpoles), Gorgodera cygnoides, G. microovata orientalis, G. pagenstecheri, G. varsoviensis, Gorgoderina skrjabini, G. vitelliloba, G. vit. olssoni (?= G. olssoni), Haematoloechus asper asper, H. similis, H. variegatus, Halipegus ovocaudatus, Haplometra cylindracea, Lecithopyge ranae, L. rastellum, L. rast. cylindriforme, L. rast. subulatum, L. subulatum, ? Lepoderma mentulatum, Opisthoglyphe endoloba, O. ranae, O. subclavatus, Pleurogenes claviger, P. medians (larvae and adults in tadpoles and adults), Polystoma integerrimum, P. uncinatum, Prosotocus confusus, *Tetracotyle crystallina, *Tylodelphys excavata.
- R. TEMP. ORNATIVENTRIS -- Japan and Korea.
Polystoma ozakii.
- R. TIGRINA -- Burma.
Mesocoelium sociale.
- R. TIGRINA -- India.
Diplodiscus amphichrus, D. doyeri, *Encyclometra colubrimurorum, Ganeo glottoides, G. glott. madrasensis, G. korkei, G. kumaonensis, G. tigrinum, Halipegus longispina, H. mehransis, H. meh. minutum, Mehraorchis ranarum (larvae and adults), M. tigrinarum, Phyllodistomum shandrai, Pleurogenes gastroporus, P. gast. equalis, P. medians equalis, P. prayagi, P. sawanensis, Prosotocus confusus indiae, P. indicus, Tremiorchis tigrinarum.
- R. TIGRINA -- Indo-China.
Margeana linguatula, Prosotocus confusus indiae.
- R. TIGRINA -- Pakistan (East).
Ganeo kumaonensis, G. tigrinum, Mehraorchis tigrinarum, Pleurogenes sawanensis.
- R. VIRESCENS -- Japan.
Opisthodiscus subclavatus.
- R. VIRIDIS -- Europe.
Halipegus ovocaudatus.
- R. VITTIGERA -- Philippines.
Glythelmins quieta (larvae and adults), Margeana staffordi, Pleurogenes taylori.
- R. sp? -- Brazil.
 *Distoma repandum.
- R. sp? -- China.
 *Centrocestus formosanus (in tadpoles).

- R. spp? -- Europe.
 "*Distoma agamo" of Ercolani, 1882
 (not used as a scientific name), *Distoma
nigrans (in tadpoles), Gorgodera
pawłowskyi.
- R. sp? -- Guatemala.
Gorgoderina attenuata, G. parvicava.
- R. sp? -- India.
Eupolystoma rajai.
- R. sp? -- Mexico.
Rauschiella tineri.
- R. sp? -- Philippines.
Diplodiscus amphichrus.
- R. sp? -- Siberian U. S. S. R.
Gorgodera cygnoides asiatica.
- RHINODERMA DARWINI -- Chile.
Gorgoderina chilensis.
- RHYACOSIREDON ALTAMIRANI -- Mexico.
Phyllodistomum rhyacosiredonis.
- SALAMANDRA ATRA -- Europe.
Brachycoelium salamandrae.
- S. PALUSTRIS -- Europe.
Opisthodiscus subclavatus.
- S. SALAMANDRA -- Europe.
Brachycoelium salamandrae, *Distoma
glabrum, Gorgodera cygnoides,
Opisthioglyphe endoloba (in tadpoles
 and adults).
- S. spp? larvae -- Europe.
 *Cercaria fissicauda (enters larvae for
 development).
- "Salamander" larvae -- U. S. A.
 *Macroderoides typicus, *Telorchis
bonnerensis.
- SALAMANDRINA TERDIGITATA -- Europe.
Brachycoelium salamandrae.
- SCAPHIOPUS BOMBIFRONS -- U. S. A.
Diplorchis scaphiopi.
- S. COUCHII -- U. S. A.
Diplorchis americana.
- SIPHONOPS ANNULATUS -- Brazil.
 *Distoma monas (not a Mesocoelium sp. --
 Freitas, 1958, Cheng, 1960).
- SIREN LACERTINA -- U. S. A.
Cephalogonimus amphiumae, *Clinostomum
marginatum, *Diplostomulum scheuringi
 (= D. trituri), *D. sirenis, *D. sp?
 of Manter, 1938, *Distoma sirenis
lacertinae, Gorgodera amplicava
 (= G. minima), *Monostomulum
aspersum, *Stomatotrema guberleti.
- "Tadpoles" -- Africa.
 *Kasr pleurolophocerca.
- "Tadpoles" -- Australia.
 *Echinoparyphium ellisi (exper.),
 *Echinostoma revolutum.
- "Tadpoles" -- Europe.
 *Echinostoma revolutum, *Lecithopyge
ranae.
- "Tadpoles" -- Japan.
 *Echinostoma hortense, *E. revolutum.
- "Tadpoles" -- Manchukuo.
 *Echinostoma campi.
- "Tadpoles" -- Puerto Rico.
 *Pibeiroia ondatrae (? = Cercaria marini).
- "Tadpoles" -- U. S. A.
 *Alaria arisaemoides, *Cercaria
compactisoma, *C. ranae, *C. welleri,

- *Echinostoma revolutum, *Euparyphium melis, *Fibricola texensis, *Macroderoides typicus, *Megalodiscus microphagus, *Neoreniker kansensis, *N. wardi, *N. sp? (of McCoy, 1928), *Pneumatophilus variabilis, *Telorchis bonnerensis, *T. medius.
- "Tadpoles" -- S. America.
*Echinostoma revolutum.
- "Tadpoles" (toads) -- Europe.
*Euryhelms squamula.
- "Tadpoles" (tree-frogs) -- Brazil.
*Strigea vaginata.
- "Tadpoles" (Anura & Urodela) -- Europe.
*Distoma nigrans, *Echinostoma revolutum, *Lecithopyge rastellum, *Leptophallus nigrovenosus, *Paralepoderma cloacicola, *Zeugorchis signatus.
- TARICHA GRANULOSUS -- U. S. A.
Brachycoelium salamandrae, Megalodiscus americanus, Telorchis sp? of Weatherly & Canaris, 1961.
- T. TOROSUS -- U. S. A.
Halipegus occidualis, *Paralechriorchis syntomentera.
- "Toad" -- Costa Rica.
Margeana linguatula (? = Glypthelms palmipedis).
- TRITURUS ALPESTRIS -- Europe.
Brachycoelium salamandrae, Haematoloechus variegatus, Opisthioglyphe endoloba, Opisthodiscus subclavatus.
- T. CRISTATUS -- Europe.
Brachycoelium salamandrae, Digenea
- larvae of Bykhovskii, 1932,
Diplodiscus unguiculatum, *Distoma depressum, Opisthioglyphe endoloba, Opisthodiscus subclavatus, Pleurogenes claviger, P. medians.
- T. HELVETICUS -- Europe.
Opisthioglyphe endoloba (larvae and adults in tadpoles and adults), Opisthodiscus subclavatus, Pleurogenes claviger.
- T. MARMORATUS -- Europe.
Brachycoelium salamandrae, Opisthioglyphe endoloba (larvae and adults in tadpoles and adults).
- T. MERIDIONALIS -- U. S. A.
Brachycoelium meridionalis (? = B. daviesi), B. salamandrae, Manodistomum occultum.
- T. PAI MATUS -- Europe.
Brachycoelium salamandrae (larvae and adults), *Echinoparyphium recurvatum, *Echinostoma revolutum, *Paralepoderma brumpti (in tadpoles), *P. cloacicola, *P. progeneticum.
- T. PYRRHOGASTER -- Japan.
Brachycoelium salamandrae, *Distome cysts of Pearse, 1932, Mesocoelium elongatum, Opisthodiscus subclavatus, *Phyllodistomum folium, P. patellare.
- T. VULGARIS -- Europe.
Asiotrema trituri (in tadpoles and adults), Brachycoelium salamandrae, *Cercaria micracantha (enter adults), *Distoma inclusum, Opisthioglyphe ranae, Opisthodiscus subclavatus, Pleurogenes claviger, P. medians.

T. sp? -- Europe.

*Euryhelmis squamula (in larvae).

TYLOTOTRITON ANDERSONI -- Japan.

Mesocoelium lanceatum.

URAEOTYPHLUS OXYURIS -- India.

Gorgoderina carli.

XENOPUS LAEVIS -- S. Africa.

*Cercaria xenopi (in tadpoles), Diplodiscus doyeri, *Diplostomulum xenopi (in heart), *Distomid of Grobbelaar 1922 (either a Brachycoeliid or an Heterolopid), *Echinostoma xenopi, Halipegus rhodesiensis, Heterolope sp? of Grobbelaar, 1922, Metacercariae of Southwell & Kirscher, 1937, *Neascus sp? of El'ian et al., 1953, Opisthioglyphe endoloba, O. xenopi, Opisthodiscus subclavatus, Polystoma integerrimum, Protopolystoma xenopi, Strigeid metacercariae of Elkin et al., 1953, *Tylodelphys excavata (in specimens dying in the Zool. Garden, London, England).

NUMBER 40, continued
THE PARASITES OF AMPHIBIA

by
A. C. Walton
Knox College, Galesburg, Illinois

TREMATODA: List of Parasites arranged alphabetically according to Families
under MONOGENEA and DIGENIA.

MONOGENEA

GYRODACTYLIDAE:

GYRODACTYLUS sp? of Stunkard & Dunihue,
1933. Adults on skin of Rana catesbiana
tadpoles -- U.S.A.

POLYSTOMATIDAE:

DIPLORCHIS AMERICANA. From bladder of
Scaphiopus couchii -- U.S.A.

D. NIGROMACULATUS. From bladder of
Rana nigromaculata -- China.

D. RANAE. From bladder of Rana rugosa --
Japan.

D. SCAPHIOPI. From bladder of Scaphiopus
bombifrons -- U.S.A.

EUPOLYSTOMA RAJAI. From bladder of
Rana sp? -- India.

PARAPOLYSTOMA ALLUAUDI. From bladder
of Bufo regularis, B. taitanus, Rana
adpersa -- Africa.

P. BULLIENSE. From bladder of Hyla
lesuerii, H. phyllochroa -- Australia.

POLYSTOMA AFRICANUM. From bladder of
Bufo regularis -- Liberia.

P. CACHANI. From bladder of Rana longirostris --
Ivory Coast, Africa.

P. GALLIENI. From bladder of Hyla arborea
meridionalis -- Europe.

P. INTEGERRIMUM. From bladder and cloaca
of Rana mascareniensis, Xenopus laevis --
Congo & S. Africa; Bufo bufo, B. viridis,
Discoglossus pictus (larvae only), Hyla
arborea, H. a. meridionalis, Pelobates
cultripes, P. fuscus, Rana arvalis,
R. dalmatina, R. esculenta, R. macrocnemis,
R. temporaria -- Europe.

Life history: Eggs develop directly into
larvae which may mature on gills or in
bladder of host.

P. MANGENOTI. From bladder of Rana
superciliaris -- Ivory Coast, Africa.

P. MASHONI. From bladder of Bufo regularis --
S. Rhodesia, Africa.
Life history: Larvae as neotenic parasites
on gills of tadpoles of Bufo regularis --
S. Rhodesia.

P. NAEVIUS. From bladder of Hyla baudinii --
Mexico.

P. NEARCTICUM. From gills, bladder, genital
duets, kidneys of Hyla versicolor -- U.S.A.

Life history: Eggs hatch in water, larvae mature on gills of Hyla cinerea, H. squirella, H. versicolor -- U.S.A. Eggs of gill generation of adults may develop internally in host. Two generations of adults possible.

P. OZAKII. From bladder of Rana temporaria ornativentris -- Japan, Korea.

P. PALANCAI. From bladder of Hyla arborea -- Spain.

P. RHACOPHORI. From bladder of Polypedates schlegeli arborea -- Japan.

P. STELLAI. From bladder of Hyla septentrionalis -- Cuba.

P. UNCINATUM. From cloaca of Rana temporaria -- Europe.

PROTOPOLYSTOMA XENOPI. From bladder of Xenopus laevis -- S. Africa. (A primitive but not neotenic genus).

SPHYRANURA EURYCEAE. From skin and gill bases of Eurycea tynerensis -- U.S.A.

S. OLIGORCHIS. From gills of Necturus maculosus -- U.S.A.
Life history: Eggs hatch in water and free-swimming larvae attach to gills of host.

S. OSLERI. From skin and gills of Necturus maculosus -- Canada.

S. POLYORCHIS. (possibly = S. osleri). From skin and gills of Necturus maculosus -- U.S.A.
Life history: Eggs hatch in water and free-swimming larvae attach to gills of host.

INCERTAE SEDIS:

HEXATHYRIDIIUM AFFINE. From cloaca of Bombina bombina -- Europe.

Monostome cercariae of Lehmann, 1956.
Encysted on rectal mesentery of larval Ambystoma gracile -- U.S.A.

DIGENEA:

ALLOCREADIIDAE:

ALLOCREADIUM ANGUSTICOLLE. Adults from Rana temporaria -- Europe. Usually in fish. Life history: Cercaria from Gammarus pulex; Metacercariae from Rana temporaria.

A. PSEUDOTRITONI. Adults in intestines of Pseudotriton montanus, P. ruber ruber -- U.S.A.

CREPIDOSTOMUM COOPERI. Adults in intestine of Necturus maculosus -- U.S.A.
Life history; Xiphidiocercariae from Musculium transversum, Pisidium spp.; Metacercariae in nymphs of Hexagenia spp. Adults normally in fish -- U.S.A.

C. CORNUTUM. Adults from intestines of Amphiuma means, Necturus maculosus -- U.S.A.
Life history: Cercariae are Ophthalmoxiphidiocercariae; progenetic Metacercariae in Cambarus spp?; Adults normally in fish, occasionally in Cambarus -- Canada, U.S.A.

C. FARIONIS. Adults from intestine of Necturus maculosus -- Canada, U.S.A.
Life history: Ophthalmoxiphidiocercariae (Cercaria ussuriensis) from Pisidium spp? -- U.S.A.; Metacercariae in

Gammarus pulex -- Europe, and Ephemera danica -- U. S. A.; adults usually in fresh-water fish (trout, etc.) -- Europe, Canada, U. S. A.

PLAGIOPORUS PROTEI. From small intestine of Proteus anguinus -- Yugoslavia.

SPHAEROSTOMA BRAMAE. Metacercaria in Hyla arborea -- Europe.

Life history: Cercariae (Cercaria micrura) in snails (Bythnia spp.); Metacercariae normally in snails, leeches (Herpobdella spp.), fish, and (?) mosquitoes; adults in various fresh-water fishes -- Europe.

BRACHYLAEMIDAE:

HARMOSTOMUM sp? of Pande, 1938.

Adult from Bufo microtypanum -- India.

BUCEPHALIDAE:

BUCEPHALOPSIS KWENANGENSIS. Adults from intestine of Megalobatrachus japonicus -- Kweiyang, China.

DOLICHOENTERUM LAMIRANDI. Metacercariae (exper.) in Hyla arborea -- Europe. (Normally in fish). Cercariae and adults not known.

PROSORHYNCHUS ACULEATUS.

Metacercariae (exper.) in Hyla arborea -- Europe. (normally in minnows, -- Asia, Europe. Adults in fish -- Asia, Europe, South America.

CEPHALOGONIMIDAE:

CEPHALOGONIMUS AMPHIUMAE. Adults from the intestine of Amphiuma means, A. tridactylum, Siren lacertina -- U. S. A.

C. BREVICIRRUS. Adults from the intestine of Rana aurora draytoni -- U. S. A.

C. RETUSUS. (= C. americanus, = C. europaeus). Adults from the intestine of Rana esculenta, R. esc. ridibunda, R. temporaria -- Europe; Rana calmitans, R. pipiens -- Canada; Rana catesbiana, R. clamitans, R. pipiens, R. septentrionalis -- U. S. A.; Rana pipiens -- Mexico and Costa Rica.

(Lent & Freitas, 1940, do not agree with above synonymy)

Life history: Cercariae (Cercaria minor) from snail (Lymnaea stagnalis) -- Europe; Metacercariae in larval Phryganeidae -- U. S. A.

C. ROBUSTUS. Adults from intestine of Rana montezumae -- Mexico.

C. VESICAUDUS. Adults from intestine of Rana clamitans -- U. S. A.

CLINOSTOMIDAE:

CLINOSTOMUM COMPLANATUM (= C. attenuatus, e. p.; = C. gracile; = C. heterostomum).

Life history: Ophthalamoxiphidiocercariae from the Sphaeriidae -- U. S. A.

Metacercariae from muscle cysts in Rana catesbiana, R. clamitans, R. grylio, R. palustris, R. pipiens, R. sphenoccephala -- U. S. A. Adults from Botaurus lentiginosus, etc. -- U. S. A.

C. HELUANS.

Life history: Cercaria (Discranocercaria ocellifera) from Australorbis glabratus, Planorbis spp? -- Brazil; Metacercariae (immature in Hyla spp? and tadpoles of

Bufo crucifer) mature in Procilia vivipara -- Brazil; Adults in Ardea caerulea, Nyctocorax gardinii -- Brazil.

C. MARGINATUM.

Life history: Cercariae from snails -- Brazil, Europe, U. S. A.; Metacercariae from fish, and snakes -- Brazil; Europe; and Rana grylio, Siren lacertina -- U. S. A.; Adults from birds (Heron in U. S. A.) -- Brazil, Europe, U. S. A.

C. PROGNUM. Metacercariae in Rana cyanophylctis -- India.

C. PSEUDOHETEROSTOMUM.

Life history: Ophthalmoxiphidiocercariae from the Sphaeriidae -- Philippines; Metacercaria encysted in femoral muscles of Rana magna -- Philippines; Adults not known.

C. sp? of Bennett & Humes, 1938. Metacercariae in mouth of Amphiuma tridactylum -- U. S. A.

C. sp? of Fowler, 1947. Metacercariae from dermal cysts of Ambystoma maculatum -- U. S. A.

C. sp? of Ingles, 1936. Metacercariae from muscle cysts on head of Rana aurora draytoni, R. boylei -- U. S. A.

COITOCAECIDAE:

COITOCAECUM sp? of Wu, 1937. Metacercariae (exper.) in Bufo bufo asiaticus -- China. (normally found in shrimp).

CYATHOCOTILIDAE:

MESOSTEPHANUS KENTUCKIENSIS

(? = Prohemistomum chandleri).

Life history: Cercariae (Cercaria kentuckiensis) from Goniabasis spp? -- U. S. A.; Metacercariae encyst in small fish and in tadpoles of Rana catesbiana, R. clamitans, R. pipiens -- U. S. A.; Adults probably in birds (exper. in chicks) -- U. S. A.

DICROCOELIDAE:

BRACHYCOELIUM DAVIESI. From Ambystoma microstomum, Hyla cinerea, Pseudacris nigrita triseriata -- U. S. A.

B. ELONGATUM. From Desmognathus phoca, D. quad. quadrimaculatus, Plethodon glutinosus -- U. S. A.

B. GEORGIANUM. From Rana sphenoccephala -- U. S. A.

B. LOUISIANAE. From Ambystoma opacum, Plethodon cinereus -- U. S. A.

B. LYNCHI (= Lecithodendrium lynchi). From Rana aurora aurora -- U. S. A.

B. MERIDIONALIS. From Triturus meridionalis -- U. S. A.

B. MESORCHIUM. Adults from Desmognathus f. fuscus -- U. S. A. (infection through eating snails).

Life history: Cercaria from land snails, Agriolimax agrestis, Mesodon thyroideus, Praticollea berlandieriana -- U. S. A.; Metacercaria develop in snails such as Agriolimax agrestis, Anguispira alternata, Bulimulus alternatus, Polygera texasiana, Praticollea berlandieriana -- U. S. A.

B. OBESUM (= B. ovale). Adults from Desmognathus f. fuscus, Eurycea bislineata

cirrigera, Notophthalmus viridescens,
Plethodon cinereus, P. glutinosus --
U.S.A.

Life history: Eggs contain non-motile
miracidia when released with feces of
salamander; Xiphidocercariae and
Metacercariae in snails such as
Agriolimax agrestis, Zonitoides ligerus --
U.S.A.

B. SALAMANDRAE (= B. crassicolle, B.
hospitale, B. dorsale, B. spp? of Rankin,
1938). Adults from Bufo bufo, Rana
temporaria, Salamandra salamandra,
Salamandrina terdigitata, Triturus
alpestris, T. cristatus, T. marmoratus,
T. palmatus (also metacercariae), T.
vulgaris -- Europe; Triturus pyrrhogaster --
Japan; Acris gryllus, Ambystoma
jeffersonianum, A. macrodactylum, A.
maculatum, A. microstomum, A. opacum,
Amphiuma tridactylum, Bufo fowleri, B.
terrestris, Desmognathus fuscus, D. f.
auriculatus, D. ochrophaeus carolinensis,
D. phoca, D. quadramaculatus, Dicamptodon
ensatus, Ensatina escholtzii oregonus,
Eurycea bislineata, E. b. cirrigera, E.
b. wilderae, E. longicauda guttolineata,
Gyrinophilus porphyriticus, Hemidactylum
scutatum, Hyla cinerea, H. crucifer
Notophthalmus viridescens, Plethodon
cinereus, P. erythronotus, P. glutinosus
P. metcalfi, P. yonahlossee, Pseudacris
brimleyi (= P. occidentalis), P. nigrita
triseriata, Pseudotriton ruber, Rana aesopus,
R. palustris, R. sphenoccephala, R.
sylvatica, Taricha granulosa, Triturus
meridionalis -- U.S.A.; Notophthalmus
viridescens, Plethodon cinereus -- Canada.

B. STABLEFORDI. From Desmognathus
fuscus fuscus -- U.S.A.

B. STORERIAE (= B. dorsalis). From
Ambystoma opacum, Plethodon cinereus,
P. glutinosus, Pseudotriton r. ruber --
U.S.A.

B. TRITURI. From Desmognathus f. fuscus,
Notophthalmus viridescens, Pseudacris
brimleyi, Rana sphenoccephala -- U.S.A.

LEPTOPHALLUS NIGROVENOSUS (= Brachycoelium nigrovenosum).

Life history: Cercariae in snails (Lymnea
spp.) -- Europe; Metacercariae in
tadpoles of frogs, newts and toads --
Europe; Adults normally in snakes --
Europe.

MESOCOELIUM BURTI. Adults from
intestine of Polypedates maculatus --
Ceylon.

M. CROSSOPHORUM. Adults from intestine
of Bufo peltacephalus -- Cuba.

M. ELONGATUM. Adults from intestines of
Rana nigromaculata, R. rugosa, Triturus
pyrrhogaster -- Japan.

M. INCOGNITUM (= M. waltoni). Adults
from intestines of Bufo crucifer, B.
marinus and other "Batrachians" --
Brazil; Bufo marinus -- Colombia; Bufo
paracnemis -- Paraguay.

M. JAPONICUM. Adults from intestines of
Polypedates (?= Rhacophorus buergeri,
Pseudosalamandra (Hynobius) stejnegeri,
P. (H.) tokyoensis -- Japan.

M. LANCEATUM (= M. brevicacum; = M.

- pearsei). Life history: Cercariae and Metacercariae from Euhadra quaesita -- Japan; Adults from intestines of Bufo bufo formosus, B. b. japonicus, Pseudosalamandra stejnegeri, P. tokyoensis, Rana catesbiana (introduced), R. nigromaculata, R. rugosa, Tylototriton andersoni and snakes (Elaphe & Eumeces spp.) -- Japan.
- M. MARRSI. Adults from intestine of Polypedates eques -- Ceylon.
- M. MEGALON. Adults from intestine of Hyla ewingii -- Australia.
- M. MESEMBRINUM. Adults from intestines of Hyla aurea, H. caerulea -- Australia.
- M. MESOCOELIUM (= M. schwetzi). Adults from intestines of Bufo regularis, Rana mascareniensis -- Congo, Africa.
- M. MICROON. Adults from intestines of Hyla caerulea, H. gracilentata -- Australia.
- M. MINUTUM. Adults from intestine of Bufo b. japonicus -- Japan.
- M. MONADI. Adults from intestines of Bufo regularis, Rana mascareniensis -- Liberia, Africa.
- M. MONAS. Metacercariae from intestine of Siphonops annulatus -- Brazil. (normally in Amphibaena sp? -- Brazil). (not Mesocoelium according to Cheng, 1960).
- M. OLIGOON. Adults from intestine of Hyla citropus -- Australia.
- M. OVATUM. Adults from intestine of Rana rugosa -- Japan.
- M. SOCIALE. Adults from intestines of Bufo melanostictus, Rana tigrina -- Burma; Bufo crucifer -- Brazil; Bufo marinus -- Columbia; Bufo sp? -- Paraguay. (S. Amer. forms possibly not M. sociale).
- M. TRAVASSOSI. Adults from intestine of Bufo spp? -- Brazil.
- M. sp? of Ucross, 1959. Adult from intestine of Bufo marinus -- Colombia.
- PLATYNOSOMUM FASTOSUM.
Life history: Cercariae from Subulina octona -- U.S.A.; 2nd. intermediate host, Isopods -- U.S.A.; 3rd. intermediate hosts, Lizard (Anolis, etc.), Eleutherodactylus ricordi (nat. infection) and Bufo terrestris (exper. infection) -- U.S.A.; Adults in cats, opossum, mice, skunks -- U.S.A.
- ECHINOSTOMIDAE:
ECHINOCHASMUS ELONGATUS.
Life history: Cercariae from Viviparus spp. -- Japan; Metacercariae in Rana esculenta japonica, R. nigromaculata -- Japan; Adults from dog, mouse, rat -- Japan.
- ECHINOPARYPHIUM ELLISI.
Life history: Cercaria (C. ellisi) from Lymnaea lessoni & Simlimnea subaquatilis -- Australia; Metacercariae in freshwater mollusks & tadpoles of Crinia signifera -- Australia; Adults in Black Swan (Chenopsis atrata) -- Australia.
- E. FLEXUM.
Life history: Cercaria from Gyraulis parvus, Lymnaea palustris, Physa gyrina -- U.S.A.;

Metacercariae from kidneys of tadpoles of Rana clamitans, R. pipiens, R. sylvatica and kidneys of adult Hyla crucifer, Pseudacris negrita triseriata, Rana clamitans, R. pipiens, R. sylvatica -- U.S.A.; Adults from water birds -- U.S.A.

E. RECURVATUM.

Life history: Cercariae from species of Bulinus, Cyclas, Lymnaea, Physa, Pisidium, Planorbis, Valvata, Viviparus spp. -- Europe, Philippines, Japan; Metacercariae encysted in liver and kidneys of Alytes obstetricans, Bufo bufo, Hyla arborea, Pelobates fuscus, Rana dalmatina, R. esculenta, R. temporaria, Triturus palmatus --- Europe; and "Frogs" -- Japan, Philippines; Adults from intestines of water birds, Chickens, Doves, mice (exper.), dogs (exper.) -- Europe, Japan, Philippines.

E. SPINIGERUM.

Life history: Cercaria (C. spiniferum) from Planorbis corneus -- Germany; Metacercariae in Rana esculenta -- Germany; Adults in birds -- Europe.

ECHINOSTOMA CAMPI.

Life history: Cercariae from Lymnaea spp. -- Manchukuo; Metacercariae in amphibian tadpoles -- Manchukuo; Adults from dogs and rats -- Manchukuo.

E. CINETORCHIS (? = E. revolutum).

Life history: Cercariae from snails -- China, Japan; Metacercariae from tadpoles of Rana esculenta japonica, R. nigromaculata, R. rugosa -- China, Japan; Adults from rodents and (?) dogs -- China, Japan.

E. HORTENSE.

Life history: Cercariae from Lymnaea japonica, L. pervia -- Japan; Metacercariae from amphibian tadpoles -- Japan; Adults from rats -- Japan.

E. MACRORCHIS.

Life history: Cercariae from snails -- Japan; Metacercariae from tadpoles and adults of Rana esculenta japonica -- Japan; Adults in rodents and (?) man -- Japan.

E. NEPHROCYSTIS (? = E. distinctum, ? = E. revolutum). Life history: Cercariae from Physa spp. -- Brazil; Metacercariae from Hyla spp. -- Brazil; Adults in birds -- Brazil.

E. REVOLUTUM (= Planaria melis Goeze, 1782, e.p., = P. teres Goeze, 1782, e.p., = Fasciola melis of Schrank, 1788, e.p., = Festucaria anatis Schrank, 1788, e.p., = Planaria putorii Gmelin, 1782, e.p., = Fasciola putorii Gmelin, 1790, e.p., = F. anatis of Gmelin, 1790, = F. armata Rudolphi, 1793, e.p., = Distomum anatis fuscae Viborg, 1795, = Fasciola ferox Rudolphi, 1795, e.p., = Distomum melis of Zeder, 1800, e.p., = D. anatis of Zeder, 1800, = Fasciola trigonocephala Rudolphi, 1802, e.p., = F. revoluta Froelich, 1802, = Distoma echinatum Zeder, 1803, e.p., = D. ferox of Zeder, 1803, e.p., = D. armatum of Zeder, 1803, e.p., = D. trigonocephalum of Rudolphi, 1809, e.p., = Monostomeus anatis of Rafinesque, 1815, = Distomum echinocephalum Rud., 1819, = D. oxycephalum Rud., 1819, = Echinostoma ferox of Blainville, 1828,

e.p., = E. echinatum of Blainv., 1828, Distomum dilatatum Fischer, 1840, = Fasciola echinata of Nordmann, 1840, = Distomum radiatum Dujardin, 1845, = D. faligulae ferinae Diesing, 1858, = D. armatum of Molin, 1858, = Echinostoma trigonocephalum of Cobbold, 1860, = E. echinocephalum of Cobbold, 1860, = E. dilatatum of Cobbold, 1860, = E. oxycephalum of Railliet, 1896, = E. mendax Dietz, 1909, = E. paraulum Dietz, 1909, = E. sudanense Odhner, 1911, = E. acuticauda Nicoll, 1914, = E. callawayensis Barker & Noll, 1915, = E. coalitum Barker & Beaver, 1915, = E. armigerum Barker & Irvine, 1915, = E. limicoli Johnson, 1920, = E. columbae Zunker, 1925, = E. miyagawai Ishii, 1932, = E. armatum of Beaver, 1937, = ? E. distinctum Dietz, 1909, = ? E. cinetorchis Ando & Ozaki, 1923, = ? E. erraticum Lutz, 1924, = ? E. neglectum Lutz, 1924, = ? E. nephrocystis Lutz, 1924, = ? E. microrchis Lutz, 1924). Life history: Cercariae (Cercaria echinata p.p., = Histrionella ephemera, = Cercaria echinatoides, = C. echinifera, = Distomum echiniferum, = D. echiniferum paludinae, = Homocercaria echinata, = Nephrocephala echinata, = Cercaria echinostomi revoluti, = C. trivolvis, = C. helvetica xxiv of Dubois, 1928, = ? C. catellus, = ? Furcocerca catellus, = ? Dicronophorus catellus) from 11 species of snails -- Cosmopolitan; Metacercariae from 20 species of mollusca, ? Planaria spp., Ameriurus melas, and tadpoles and adults of Bufo americanus, Rana catesbiana, R. pipiens -- U.S.A., and 11 species of tadpoles and/or adults of Asiatic, Australian,

European and S. American amphibia -- Cosmopolitan, Adults from 41 spp. of birds and 9 spp. of mammals -- Cosmopolitan.

E. XENOPI.

Life history: Cercariae from Lymnaea, Physopsis spp. -- Africa; Metacercariae from brain and subcutaneous tissues of Xenopus laevis -- Africa; Adults not yet recognized.

EUPARYPHIUM MELIS (= Planaria teres duplici pero e.p., = Fasciola melis, = Echinostoma melis, = Isthmiophora melis). Life history: Cercariae from Stagnicola emarginata angulata -- U.S.A.; Metacercariae encysted in tails of tadpoles (Rana clamitans, etc.) -- U.S.A.; Adults (exper.) in ferret and mink -- U.S.A. (better known in Europe and often confused with Echinostoma revolutum).

HYPODERAEUM CONOIDEUM (= Cuculanus conoideus, = Distoma echinatum of Diesing, 1850; = D. excavatum, = D. militare; = Echinostoma conoideum, = Psilochasmus lecithosus). Life history: Cercariae (Cercaria echinatoides e.p., = Nephrocephala apinifera, = Cercaria spinifera) from snails -- Europe; Metacercariae from Rana esculenta -- Europe; Adults in intestines of water-fowl, chickens, doves and (?) dogs -- Europe and (?) Mexico.

NEPHROSTOMUM RAMOSUM.

Life history: Cercariae from Planorbis boissyi -- Egypt; Metacercariae from cysts on tadpoles of Bufo bufo -- Egypt; Adults from Ardeola ibis ibis -- Egypt.

PARYPHOSTOMUM TENUICOLLE.

Life history: Cercariae from snails (Amerianna pectorosa, A. pyramidata, A. tenuistriata, Lymnaea lessoni) -- Australia; Metacercariae from fish, and tadpoles of Pseudophryne bibronii -- Australia; Adults in Phalacrocorax spp. -- Australia.

GORGODERIDAE:

GORGODERA (Antodera) AMPLICAVA (= Distoma cygnoides e.p., =? Gorgodera minima). Life history: Cercariae (Cercaria gorgodera amplivava, = C. circava) from Musculium (Sphaerium) partumeium -- U. S. A.; Metacercaria from Helisoma antrosa, H. trivolvis, Lymnaea traskii, Physa halei, P. heterostropha, Pseudosuccinea columella, Cambarus sp?, Enallagma nymphs, larvae of Ambystoma maculatum, tadpoles of Hyla versicolor, Rana catesbiana, R. clamitans, R. palustris -- U. S. A. Adults from bladder of Ambystoma maculatum, Bufo americanus, B. fowleri, Pseudotriton montanus, P. ruber, Rana catesbiana, R. clamitans, R. palustris, R. pipiens, P. pip. brachycephala, R. sphenoccephala, Siren lacertina -- U. S. A.; Rana catesbiana, R. clamitans, R. pipiens -- Canada.

G. (Mediodera) ASIATICA. Adults from bladder of Rana esc. ridibunda -- Asia.

G. (Mediodera) ASYMMETRICA. Adults from bladder of Rana esculenta -- Europe.

G. AUSTRALIENSIS. Adults from bladder of Hyla aurea, Lymnodynastes peronii -- Australia; Hyla aurea -- New Zealand.

G. CIRCAVA GRANATENSIS. Adults from bladder of Rana esculenta -- Spain.

G. (Gorgodera) CYGNOIDES (= Distoma cygnoides, = D. hylae). Life history: Cercariae (Cercaria gorgoderae cygnoides, = C. macrocerca e.p. = Acanthocephala macrocerca) from Sphaerium corneum, S. draparnaldii, Lymnaea spp., Pisidium spp. -- Europe; Metacercariae in Epitheca sp., and bladder of Rana esculent -- Europe; Adults from bladder of Rana esc. ridibunda -- Turkestan; Bombina bombina, B. pachypus, Bufo bufo, Hyla arborea, Rana arvalis, R. esculenta, R. esc. ridibunda, R. temporaria, Salamandra salamandra -- Europe; Rana catesbiana, R. clamitans, R. pipiens -- Canada; Gyrinophilus porphyriticus, Pseudotriton ruber, Rana catesbiana, R. clamitans, R. palustris, R. pipiens, R. sphenoccephala -- U. S. A.

G. (Gorgodera) CYGNOIDES ASIATICA (= G. amplivava asiatica). Adults from bladder of Rana sp. -- Kirghiz Republ., U. S. S. R., Asia.

G. (Postodera) DOLLFUSI. Adults from bladder of Rana esc. ridibunda -- Central Asia.

G. (Gorgodera) JAPONICA (= G. cygnoides of Seno, 1907). Adults from bladder of Rana nigromaculata -- Japan.

G. (Postodera) LOOSI (= Distoma cygnoides of Looss, 1894). Adults from bladder of Rana esculenta -- Europe.

G. (Mediodera) MEDIA. Adults from bladder of Rana esc. ridibunda -- Turkestan.

G. (Gorgodera) MICROOVATA. Adults from bladder of Rana esc. ridibunda -- Africa; Rana esculenta -- Europe.

- G. (G.) MICROOVATA ORIENTALIS. Adults from bladder of Rana temporaria -- Macedonia, Europe.
- G. MINIMA (= G. amplicava of Looss, 1899). Adults from bladder of Rana catesbiana, R. pipiens, Siren lacertina -- U.S.A.
- G. (Mediodera) PAGENSTECHEI (= Distoma cygnoides of Pagenstecher, 1857). Life history: Cercariae (Cercaria gorgoderae pagenstecheri, = C. macrocerca of Thiry, 1859) from Sphaerium corneum, S. drapernaldii -- Europe; Metacercariae in Agrion & Epithea larvae -- Europe; Adults from bladder of Rana esculenta, R. esc. ridibunda, R. temporaria -- Europe; Rana esc. ridibunda -- Tunisia, Africa.
- G. (Mediodera) PAWLOWSKYI. Adults from bladder of Rana sp? -- U.S.S.R., Europe.
- G. (Postodera) VARSOVIENSIS (= G. varschoviensis). Life history: Cercariae (Cercaria gorgoderae varsoviensis) from snails (Pisidium fossarinum, Sphaerium corneum, S. drapernaldii) -- Europe; Metacercariae in larvae of Agrion & Epithea spp. -- Europe; Adults from bladder and cloaca of Rana esculenta, R. esc. ridibunda, R. temporaria -- Europe; Rana esc. ridibunda -- Tunisia, Africa.
- G. VIVATA. Life history: Cercariae from Sphaerium simile -- U.S.A.; Metacercariae in Sialis sp., Cambarus immunis, Libellula spp., Erythemis simplicicollis -- U.S.A.; Adults from bladder of Rana catesbiana, R. clamitans -- U.S.A.
- G. sp? of Krull, 1935. Life history: Cercariae from Musculium partumeium -- U.S.A.; Metacercariae in Helisoma antrosa -- U.S.A.; Adults from bladder of Rana clamitans -- U.S.A.
- G. sp? of Kolendo, 1959. Adults from bladder of Bufo viridis -- Europe. Gorgoderid metacercariae of Najarian, 1955. From Hyla crucifer, Rana clamitans, R. sylvatica -- U.S.A.
- GORGODERINA (Some authorities would place all species in Phyllodistomum).
- G. (Gorgorinma) ATTENUATA. Life history: Cercariae from Sphaerium occidentale, Tetragoneuria cynosura -- U.S.A.; Metacercariae not yet identified; Adults from bladder of Rana catesbiana, R. pipiens -- Canada; Bufo americanus, B. fowleri, Notophthalmus v. viridescens, Rana catesbiana, R. clamitans, R. grylio, R. palustris, R. pipiens, R. septentrionalis, R. sylvatica -- U.S.A.; larval Ambystoma tigrinum, Rana montezumae, R. pipiens -- Mexico; Rana spp. -- Guatemala.
- G. (G.) AURORA. Adults from bladder of Bufo boreas, Rana aurora -- U.S.A.
- G. (G.) BILOBATA. Adults from bladder of Ambystoma opacum, Desmognathus fuscus, Pseudotriton montanus, P. r. ruber -- U.S.A.
- G. (G.) CAPSENSIS. Life history: Cercariae not identified; Metacercariae in muscle cysts of Rana esc. ridibunda -- N. Africa; Adults from bladder of Rana esc. ridibunda -- N. Africa.

- G. (G.) CARLI. Adults from bladder of Uraeotyphlus oxyuris -- India.
- G. (G.) CEDROI. Adults from bladder of Elosia nasus -- Brazil.
- G. (G.) CHILENSIS. Adults from bladder of Rhinoderma darwini -- Chile.
- G. (G.) CRYPTORCHIS. Adults from bladder of Bufo crucifer, B. marinus, Leptodactylus ocellatus -- Brazil; Bufo d'orbygnyi -- Paraguay.
- G. (G.) INTERMEDIA. Adults from bladder of Notophthalmus viridescens -- U. S. A.
- G. (G.) MEGALORCHIS. Adults from bladder of Bufo marinus -- Costa Rica; Mexico.
- G. (G.) OLSSONI. Adults from bladder of Rana temporaria -- Poland.
- G. (G.) ORIENTALIS. Adults from bladder of Rana esc. ridibunda -- Turkestan.
- G. (G.) PARVICAVA (= Gorgodera diaster, = G. permagna, = Pleorchis cygnoides). Life history: Cercariae from Cyclas bahiensis; Pisidium spp. -- Brazil; Metacercariae not yet identified; Adults from bladder of Bufo crucifer, B. marinus, Leptodactylus ocellatus, Leptodactylus, L. penta. labyrinthicus -- Brazil; Bufo paracnemis -- Paraguay; Pseudis paradoxa, Rana palmipes -- Venezuela; Rana spp. -- Guatemala.
- G. (G.) SCHISTORCHIS. Adults from bladder of Necturus maculosus -- U. S. A.
- G. (G.) SIMPLEX (= G. opaca). Adults from bladder of Bufo americanus, B. fowleri, Rana catesbiana, R. clamitans, R. pipiens -- Canada; Rana clamitans, R. septentrionalis -- U. S. A.
- G. (G.) TANNERI. Adults from bladder of Rana clamitans, R. pretiosa -- U. S. A.
- G. (G.) TENUA. Adults from bladder of Eurycea longicauda guttolineata -- U. S. A.
- G. (G.) TRANSLUCIDA. Adults from bladder of Bufo americanus, B. fowleri, Rana pipiens -- Canada; Bufo americanus, B. boreas, Notophthalmus viridescens, Rana clamitans, R. pretiosa, cross between R. pretiosa and R. sylvatica, R. septentrionalis, R. sylvatica -- U. S. A.
- G. (G.) VITELLILOBA.
Life history: Cercariae (Cercaria gorgoderae vitelliloba, = C. macrocerca) from Sphaerium corneum, S. drapernaldii -- Europe; Metacercariae (exper.) in Sphaerium corneum and tadpoles of Bufo vulgaris, Rana esculenta -- Europe; Adults from bladder of Rana esc. ridibunda -- Morocco, Africa; Rana esc. ridibunda -- Turkestan, Asia; Bombina bombina, B. salsa, Bombinator igneus, Bufo bufo, Rana arvalis, R. arv. isaitschikovi, R. esculenta, R. microcnemis, R. temporaria -- Europe; ? Rana catesbiana, ? R. clamitans -- U. S. A.
- G. (G.) VITELLILOBA forma OLSSONI. Adults from bladder of Rana temporaria -- Europe.
- G. (Metagorgoderina) CARIOCA. Adults from bladder of Leptodactylus ocellatus -- Brazil.

- G. (M.) DIASTER. Adults from bladder of Pseudis paradoxa, Rana palmipes -- Venezuela.
- G. (M.) KAJIKA (= Microlecithus kajika). Adults from bladder of Polypedates (? = Rhacophorus) buergeri -- Japan.
- G. (M.) MULTILOBATA. Adults from bladder of Rana aurora, R. boylei, R. pretiosa -- U.S.A.
- G. (M.) PIGULEVSKYI (= G. permagna of Pigulevsky, 1953). Adults from bladder of Leptodactylus ocellatus -- Brazil.
- G. (M.) ROCHALAMAI. Adults from bladder of Bufo arenarum, B. paracnemis, Leptodactylus ocellatus -- Brazil.
- G. (M.) SKARBILOVITSCHI. Adults from bladder of Rana montezumae -- Mexico.
- G. (M.) SKRJABINI. Adults from bladder of Rana temporaria -- Europe.
- G. sp? of Goodchild, 1950. Juveniles from urinogenital system of tadpoles of Rana pipiens -- U.S.A.
- G. sp? of Pearse, 1932. Adult from bladder of Pseudosalamandra (= Hynobius) fuscus -- Japan.
- Gorgoderine Cercariae.
- CERCARIA COELOCERCA. From Musculium transversum texasense -- U.S.A.
- C. DONECERCA. From Musculium partumeium -- U.S.A.
- C. MITOCERCA. From Actinonaias carinata -- U.S.A.
- C. SPHAEROCERCA. From Musculium transversum -- U.S.A.
- C. STEFLMANI. From Sphaerium aureum declive -- U.S.A.
- PHYLLODISTOMUM (? = Catoptrioides, ? = Gorgoderina).
- P. ALMORAI. Adults from bladder of Rana cyanophlyctis -- India.
- P. AMERICANUM.
Life history: Cystocercous cercariae from Pisidium sp. -- U.S.A.; Metacercariae encysted in damselfly naiads and caddisfly larvae -- U.S.A.; Adults from bladder of Ambystoma punctatum, A. tigrinum -- U.S.A.
- P. BUFONIS. Adults from bladder of Bufo boreas -- U.S.A.
- P. COATNEYI. Adults from bladder of Ambystoma maculatum -- U.S.A.
- P. FOLIUM (= Distomum duppicatum, = Rhopalocerca tardigrada, = Phyllodistomum pseudofolium).
Life history: Cercariae (Cercaria folii, = C. duplicatum) from mollusca and crustacea -- Asia, Europe; Metacercariae from Megalobatrachus japonicus, Triturus pyrrhogaster -- Japan; Adults normally from fish -- Asia, Europe.
- P. FREQUENTUM. Adults from bladder of Bufo viridis -- India.
- P. PATELLARE (= P. entercolpium). Adults from bladder of Triturus pyrrhogaster -- Japan.
- P. RHYACOSIREDONIS. Adults from bladder

- of Rhyacosiredon altamirani -- Mexico.
- P. SHANDRAI. Adults from bladder of Rana tigrina -- India.
- P. SINENSE. Adults from ureters of Bufo bufo asiaticus -- China. (normal host is Chinese catfish).
- P. SINGULARE. Adults from bladder of larval Dicamptodon ensatus -- U. S. A.
- P. SOLIDUM.
Life history: Cercariae (Cercaria conica) from Pisidium abditum, P. pusillum -- U. S. A.; Metacercariae from naiads of Argia, Enallagma, Ischura and Libellula spp.) -- U. S. A. Adults from bladder of Desmognathus fuscus, Eurycea bis. bislineata -- U. S. A. (Juveniles reported from larval Desmognathus fuscus -- U. S. A.).
- P. sp? of Kaw, 1950. Adults from bladder of Bufo viridis -- India.
- HEMIURIDAE:
- DEROPEGUS ASPINA. Adults from stomach of Rana boylii -- U. S. A. (normally in Salmonoid fish). (not a Halipegus sp.)
- HALIPEGUS (? = Genarchella, ? = Vitellotrema).
- H. AFRICANUS.
Life history: Cercariae from hepatopancreas of Biomphalaria ketagae -- Belg. Cong; Metacercariae in Cyclops sp? -- Belg. Congo; Adults from under tongue of Rana mascareniensis -- Belg. Cong.
- H. AMHERSTENSIS.
Life history: Cystophorous cercariae from Physa gyrina -- U. S. A.; Metacercariae in Cyclops viridis -- U. S. A.; Adults from tadpoles and adults of Rana catesbiana, R. clamitans -- U. S. A.; Rana montezumae -- Mexico.
- H. DUBIUS (? = H. spindale). Adults from mouth cavity of Leptodactylus ocellatus -- Brazil.
- H. ECCENTRICUS.
Life history: Cystophorous cercariae from Physella parkeri, P. sayii crassa, Helisoma trivolvis -- U. S. A.; Metacercariae in Cyclops leuckarti, C. vulgaris, Mesocyclops obsoletus -- U. S. A.; Adults from ear canals of tadpoles and adults of Rana catesbiana, R. clamitans, R. pipiens -- U. S. A.
- H. FUSIPORUS (= Vitellotrema fusipora, ? = Genarchopsis ozaki). Adults from stomach of Amphiuma tridactylum and snake (Francia abacura) -- U. S. A.
- H. JAPONICUS (? = H. occidualis). Adults from under tongue of Rana nigromaculata -- Japan.
- H. LERNENSIS (? = H. occidualis). Adults from eustachian tubes of Rana montezumae, R. pipiens -- Mexico.
- H. LONGISPINA (? = H. ovocaudatus). Adults from mouth and intestines of Rana hexadactyla, R. tigrina -- India.
- H. MEHRANSIS. Adults from stomach of Rana cyanophlyctis, R. tigrina -- India.
- H. MEHRANSIS MINUTUM. Adults from stomach of Rana tigrina -- India. (Probably only a variant: sub-specific rank not justified).

- H. OCCIDUALIS (= Distoma ovocaudatum of Nickerson, 1898). Life history: Parthenitae in Physa parkeri -- U. S. A.; Rediae in Physa sayii crassa, Helisoma antroea -- U. S. A.; Cercariae from Cyclops serrulatus, C. vernalis, C. vulgaris -- U. S. A.; Metacercariae in Lestes rectangularis, Libellula incesta naiads -- U. S. A.; Adults from mouth, ear canals and pharynx of Rana catesbiana, R. clamitans -- Canada; Dicamptodon ensatus, Rana aurora aurora, R. catesbiana, R. clamitans, R. pipiens, R. sphenoccephala, Taricha torosa -- U. S. A.; Rana montezumae, R. pipiens -- Mexico.
- H.OVOCAUDATUS (= H. kessleri, = H. rossicus). Life history: Cercariae (Cercaria cystophora) from Planorbis carinatus, P. contortus, P. marginatus, P. planorbis, P. rotundatus, Spirolina vortex -- Europe; Metacercariae from Calopteryx virgo -- Europe; Adults in mouth cavity of Bufo viridis, Rana esculenta, R. esc. ridibunda, R. temporaria, R. viridis and "frogs" -- Europe; Rana fuscigula -- S. Africa.
- H. RHODESIENSIS. Adults from stomach of Xenopus laevis -- S. Rhodesia, Africa.
- H. SPINDALE. s from intestine of Rana cyanophlyctis -- India.
- H. sp? of Bhalero, 1936. Adults from intestine of Rana cyanophlyctis -- India
- H. sp? of Bouchard, 1951. Adults from mouth cavity and ear canals of Rana clamitans, R. palustris, R. septentrionalis -- U. S. A. (probably H. eccentricus).
- H. sp? of Frandsen & Grundmann, 1960. Adults from mouth of Rana pipiens -- U. S. A.
- H. sp? of Krull, 1935. Adults from intestine of Rana clamitans -- U. S. A.
- H. sp? of Porter, 1938. Adults from intestine of Bufo regularis -- S. Africa.
- H. sp? of Turner, 1958. From intestine of Rana p. pretiosa -- Yellowstone Park, U. S. A.
- LECITHOCHIRIUM RUFOVIRIDE.
Life history: Cercariae not identified as yet; Metacercariae (exper.) in Hyla arborea and normally in small fish -- Europe; Adults from fish -- Europe and ? U. S. A.
- HETEROPHYIDAE:
- CENTROCESTUS FORMOSANUS (= Stamnosoma sp.). Life history: Cercariae from Melania tuberculata chinensis -- China; Metacercariae in tadpoles or adults of Bufo melanostictus, Rana limnocharis, R. rugulosa -- China (also in many fish); Adults from small intestines of Herons, dogs, cats, exper. in many lab. animals. -- China, Formosa, Philippines. (also reported from man, but record of doubtful validity).
- EURYHELMIS MONORCHIS.
Life history: Cercariae from Pomatiopsis lapidaria -- U. S. A.; Metacercariae encysted in skin or subcutaneous tissues of tadpoles and adults of Rana clamitans, R. palustris, R. pipiens -- U. S. A.; Adults from Mustela vison and (exper.) in cats and rats -- U. S. A.

- E. PACIFICUS.
Life history: Cercariae not yet identified; Metacercariae in Dicamptodon ensatus -- U.S.A.; Adults from minks, muskrats, water shrews -- U.S.A.
- E. SQUAMULA (= Distoma squamula).
Life history: Cercariae unknown; Metacercariae encysted in skin of larval Rana esculenta, R. temporaria, Triturus sp?, and "toads" -- Europe, and doubtfully identified from Rana aurora, R. cascadae -- U.S.A.; Adults from Putorius putorius and (exper.) from cats -- Europe.
- KASR PLEUROLOPHOCERCA (= K. aini).
Life history: Cercariae (Cercaria pleurolophocera, = C. indicae vii of Sewell from Cleopatra bulimoides, Melania (Melanoides) tuberculata-- Africa, India; Metacercariae in Gambusia affinis and frog tadpoles -- Africa; Adults from intestines of cat and man--Africa.
- METAGONIMOIDES OREGONENSIS
Life history: Cercariae from Goniabasis nigrina, G. silicula--U.S.A.; Metacercariae will enter and develop in Rana aurora, R. pipiens and tadpoles of R. clamitans--U.S.A.; Adults from racoon and (exper.) hamster--U.S.A.
- NEOCHASMUS UMBELLUS. Adults from intestine of Necturus maculosus -- U.S.A.
- LECITHODENDRIIDAE:
- BRANDESIA AREANA. From adults and tadpoles of Rana esculenta -- Europe.
- B. TURGIDA. Life history: Cercariae not known; Metacercariae in pyloric cysts in Rana arvalis, R. esculenta, R. esc. ridibunda -- Europe; Adults from intestine of Rana esculenta -- Europe.
- CANDIDOTREMA LOOSSI (= Pleurogenes loossi). Adults from intestine of Rana esculenta -- Europe and Morocco, Africa.
- CEPHALOUTERINA DICAMPTODONI.
Adults from intestine of Dicamptodon ensatus -- U.S.A.
- CRYPTOTROPA KURETANII (= Cryptotrema duretanii). Adults from intestine of Polypedates (? = Rhacophorus buergeri -- Japan.
- GANEO ATTENUATUM. Adults from intestine of Rana cyanophlyctis -- India.
- G. BUFONIS. Adults from intestine of Bufo viridis -- India.
- G. GASTRICUS. Adults from stomach of Rana cyanophlyctis -- India.
- G. GLOTTOIDES. Adults from intestine of Rana hexadactyla, R. tigrina -- India.
- G. GLOTTOIDES AFRICANA. Adults from intestine of "Bufonid" -- Africa. (Possibly of specific rank as G. africana).
- G. GLOTTOIDES MADRASENSIS. Adults from intestine of Rana tigrina -- India. (Possibly of specific rank as G. madrasensis). (see Kaw, 1950).
- G. KORKEI. Adults from intestine of Rana tigrina -- India.
- G. LINGNANENSIS (?= G. tigrinum). Adults from intestine of Rana rugulosa -- China.
- G. KUMAONENSIS (?= G. lingnanensis, ? = G. tigrinum). Adults from intestines of Bufo viridis, Rana cyanophlyctis, R. tigrina -- India.

- G. PANJABENSIS. Adults from intestine of Rana cyanophlyctis -- India.
- G. SRINAGARENSIS. Adults from intestine of Rana cyanophlyctis -- India.
- G. TIGRINUM (? = G. kumaonensis, ? = G. lingnanensis). Adults from intestines of Rana rugulosa -- China, Bufo viridis, Rana cyanophlyctis, R. tigrina -- India.
- G. sp? of Kaw, 1950. Adults from intestine of Rana cyanophlyctis -- India.
- LANGERONIA MACROCIRRA. Adults from intestine of Rana pipiens -- Mexico.
- L. PROVITTELLARIA. Adults from small intestine of Rana sphenoccephala -- U. S. A.
- LOXOGENES (? = Pleurogenes).
- L. ARCANUM (= Brandesia medians).
Life history: Cercariae not known; Metacercariae encysted in such dragonfly nymphs as Celithemis eponina, Epicordula princeps, Erythemis simplicicollis, Gomphus spicatus, G. villosipes, Libellula exusta, L. luctuosa, Pachydiplax longipennis, Plathemis lydia, Tetragoneuria cynosura & T. spinigera -- U. S. A.; Adults from visceral cysts and intestines of Rana catesbiana -- Canada; Rana catesbiana, R. clamitans, R. pipiens, R. septentrionalis -- U. S. A.
- L. LIBERUM.
Life history: Cercariae from Bulinus kiushuensis, B. striatulus japonicus -- Japan; Metacercariae in Crocothemis servilis, Gomphus meianopus, Orthetrum albistylum & Sympetrum darwinianum nymphs -- Japan; Adults from liver of Bufo bufo japonicus, Rana esc. japonica, R. nigromaculata, R. rugosa -- Japan.
- LOXOGENOIDES BICOLOR.
Life history: Cercariae (? Cercaria nyxetica) from digestive gland of Goniobasis depygis -- U. S. A. (xiphidiocercaria); Metacercariae in naiads of Ephemeroptera & Odonata -- U. S. A.; Adults from bile ducts of Rana clamitans -- U. S. A.
- MEHRAORCHIS RANARUM.
Life history: Cercariae not known; Metacercariae from intestines of Rana cyanophlyctis, R. tigrina -- India; Adults from intestines of Rana cyanophlyctis, R. tigrina -- India.
- M. TIGRINARUM. Adults from stomach of Rana tigrina -- India, E. Pakistan.
- NENIMANDIJEA KASHMIRENSIS. Adults from intestines of Bufo viridis, Rana cyanophlyctis -- India.
- PLEUROGENES BUFONIS. Adults from intestine of Bufo viridis -- India.
- P. CLAVIGER (= Fasciola ranae e. p., = Distoma retusum e. p., = D. medians e. p., = D. neglectum. D. tacapense probably not to be regarded as belonging here). Life history: Cercariae (Cercaria ornata, = C. armata major, = C. pseudo-armata), xiphidiocercariae from Bythnia tentaculata, Lymnaea stagnalis, Planorbarius corneus, Radix limosa -- Europe; Metacercariae in Hydrachna concharum and larvae of Dytiscus & Ptyganea spp. -- Europe; Adults from the intestines of Bufo bufo, B. calamita,

- B. variabilis, B. viridis, Hyla arborea, Rana arvalis, R. esculenta, R. esc. ridibunda, R. temporaria, Triturus cristatus, T. helveticus, T. vulgaris -- Europe.
- P. FREYCINETI. Adults from intestine of Hyla freycineti -- Australia.
- P. GASTROPORUS. Adults from intestines of Rana cyanophlyctis, R. tigrina -- India.
- P. GASTROPORUS EQUALIS. Adults from intestines of Rana cyanophlyctis, R. tigrina -- India. (probably not a valid subspecies, but only a variant).
- P. INTERMEDIUS. Adults from intestines of Rana arvalis (? terrestris) altaica -- Siberia, Rana terrestris (? = arvalis) -- Poland, Europe.
- P. JAPONICUS.
Life history: Cercariae from Bulinus kiushuensis -- Japan; Metacercariae in Neocaridina denticulata -- Japan; Adults from the intestine of Rana nigromaculata -- Japan.
- P. LOBATUS. (? to Pleurolobatus, Kaw, 1944). Adults from bile ducts of Polypedates (? = Rhacophorus) buergeri -- Japan.
- P. MEDIANS (= ? Distoma tacapense, = D. medians e.p.). Life history: Cercariae from Bithynia tentaculata -- Africa; Metacercariae in Agrion and beetle larvae, and tadpoles of Hyla arborea, Rana temporaria -- Europe; Progenetic metacercariae from Gammarus pulex, Sialis lutaria -- Europe; Adults from intestines of Bufo bufo, Rana esculenta, R. esc. ridibunda -- Africa; Bufo bufo, B. calamita, B. variabilis, B. viridis, Hyla arborea, Rana arvalis, R. esculenta, R. esc. ridibunda, R. temporaria, Triturus cristatus, T. vulgaris -- Europe.
- P. MEDIANS EQUALIS. Adults from the intestine of Rana tigrina -- India. (probably only a variant, not a valid sub-species).
- P. ORIENTALIS. Adults from the intestine of Rana cyanophlyctis -- India.
- P. PRAYAGI. Adults from the intestine of Rana tigrina -- India.
- P. SAWANENSIS. Adults from the intestines of Rana cyanophlyctis, R. tigrina -- India, E. Pakistan.
- P. SOLUS. Adults from the intestine of Hyla aurea -- Australia.
- P. SPHAERICUS. Adults from the intestine of Rana hexadactyla -- India.
- P. STROMI. Adults from the intestine of Rana esc. ridibunda -- Turkestan.
- P. STROMI PUNICUS. Adults from the intestine of Rana esc. ridibunda -- Tunisia.
- P. TAYLORI. Adults from intestines of Rana rugulosa -- China; Rana vittigera -- Philippines.
- P. spp? of Roberts, 1936-37. Adults from the intestines of Hyla spp? -- Australia. (Travassos, 1930, transferred many species of Pleurogenes to Pleurogenoides, but Kaw, 1954, reduced Loxogenes, Pleurogenoides, Pleurobates and Loxogenoides in synonymy to Pleurogenes).

(Such complete synonymy is not accepted here).

PLEUROGENOIDES COMPACTUS. Adults from intestine of Rana esc. ridibunda -- Turkestan.

P. IFRANENSIS. Adults from the intestines of Bufo bufo spinosus -- Morocco.

P. SITAPURII.

Life history: Cercariae not known; Progenetic metacercariae in fresh-water crab (Parathelphusa ceylonensis) -- Ceylon; Adults from the intestines of Rana cyanophlyctis, R. hexadactyla (exper.) -- Ceylon; Rana cyanophlyctis -- India.

PROSOTOCUS CONFUSUS (= Distoma clavigerum e.p., = D. endolobum e.p., = D. clavigerum confusum, = Pleurogenes confusus).

Life history: Cercariae not known; Metacercariae in Aeschna, Cordula and water beetle larvae -- Europe; Adults from duodenum of Bufo bufo, B. calamita, B. viridis, Rana arvalis, R. esculenta, R. esc. ridibunda, R. temporaria -- Europe; Rana esc. ridibunda -- Turkey in Asia

P. CONFUSUS INDIANA. Adults from the intestine of Rana tigrina -- India; Tonkin, China.

P. FUELLEBORNI. Adults from the intestine of Rana esculenta -- Europe.

P. HIMALAYAI. Adults from the intestine of Rana cyanophlyctis -- India.

P. INDICUS. Adults from the intestines of Rana cyanophlyctis, R. tigrina -- India.

P. INFREQUENTUM. Adults from the intestine of Rana cyanophlyctis -- India.

P. KASHABIA. Adults from the intestine of Rana cyanophlyctis -- India.

P. MIRABILIS. Adults from the intestine of Rana terrestris (?=arvalis) -- Poland.

P. PARATAPUS. Adults from the intestine of Rana cyanophlyctis -- India.

P. SIGALASI. Adults from the intestine of Rana esculenta -- France.

P. TENER (= Distoma tener, = D. tacapense e.p., = Pleurogenoides tener). Adults from the intestine of Rana esculenta -- N. Africa; Europe.

SONSINOTREMA CALLOTI. Adults from the intestine of Rana esc. ridibunda -- Tunisia, Africa.

S. TACAPENSE (= Distoma tacapense, = Pleurogenes claviger e.p., = P. medians e.p., = P. tener e.p.). Adults from the intestines of Bufo mauritanicus, Rana esc. ridibunda -- Africa.

LILOPIDAE:

LILOPE COPULANS.

Life history: Cercariae not known; Metacercariae in Moroco steindachneri -- Japan; Adults from the intestine of Megalobatrachus japonicus -- Japan.

MICROPHALLIDAE:

MONOCAECUM BARYURUM. Adults from the intestine of Necturus maculosus -- Canada.

MONORCHIIDAE:

ASYMPHYLODORA TINCAE (= Fasciola tincae, = F. eriocis e.p., = D. punctum, = D. hyalinum, = D. perlatum, = D. globiporum tincae, = D. ferruginosum, = D. exspinosum, = D. imitans, = Asymphylodora kubanicum, = A. macrostoma). Life history: Cercariae (Cercarium paludinae impurae inermis) from snails -- Europe; Metacercariae from planaria, leeches, snails -- Europe; Adults from intestines of Bufo bufo, Hyla arborea, Pelobates cultripes, Rana esculenta -- Europe. (normally in fish).

OPISTHORCHIDAE:

RATZIA JOYEUXI (= Opisthorchis (Brachymetra) joyeuxi).

Life history: Cercariae from A. nicola dupotetiana -- Europe; Metacercariae & adults in tadpoles of Alytes obstetricans, adults of Discoglossus pictus -- Europe. (adults normally in snakes).

R. PARVA (= Brachymetra parva ? = B. joyeuxi)

Life history: Cercariae not known; Progenetic metacercariae in Discoglossus pictus, Rana esc. ridibunda -- Africa; Rana esculenta -- Europe; Adults normally in snakes (Zamenis hippocrepis) -- Africa; Europe.

R. sp? of Brumpt, 1936. Metacercariae in Discoglossus pictus -- Africa. (possibly R. parva).

PLAGIORCHIIDAE:

PLASSOSTOMA PARVUM.

Life history: Cercariae (Cercaria inhabilis, = C. eriocis (inta)) from Helisoma antrosa,

Planorbis involvis -- U. S. A.; Metacercariae from Cambarus propinquus, tadpoles of Rana pipiens, on leaves of pond lily (Nymphaea sp). -- U. S. A.; Adults from colon and cloaca of Rana catesbiana, R. pipiens -- (normally in Chelydra serpentina). U. S. A.

- CATADISCUS COHNI. Adults from the intestine of Bufo marinus -- Brazil.
- C. CORDEROI. Adults from intestine of Pseudis meridionalis -- Uruguay.
- C. FREITASLENTI. Adults from the intestines of Bufo paracnemis, Leptodactylus ocellatus -- Paraguay. (also in snakes).
- C. INOPINATUS. Adults from intestine of Leptodactylus ocellatus -- Brazil, Paraguay, Uruguay.
- C. MARINHOLUTZI. Adults from intestines of Leptodactylus caliginosus, L. ocellatus -- Brazil.
- C. MIRANDAI. Adults from the intestine of Hemipha carvalhoi -- Brazil.
- C. PROPINQUUS. Adults from the intestine of Rana palmipes -- Brazil.
- C. PYGMAEUS (= Diplodiscus pygmaeus). Adults from the intestine of Pseudis paradoxa -- Venezuela.
- C. RODRIGUEZI. Adults from the intestine of Leptodactylus ocellatus -- Panama.
- C. URUGUAYENSIS. Adults from the intestine of Leptodactylus ocellatus -- Uruguay.

- C. sp? of Travassos, Freitas & Lent, 1939. Adults from the intestines of Leptodactylus caliginosus, L. ocellatus -- Brazil.
- DIPLODISCUS AMPHICHRUS (= D. a. magnus, = D. mehrai, = D. sinicus). Adults from intestines and cloaca of Rana limnocharis, R. rugulosa -- China; R. nigromaculata -- Manchukuo; Rana nigromaculata chosonica, R. rugosa -- Korea; Rana cyanophlyctis, R. tigrina -- India; Rana rugosa -- Japan; Rana spp. -- Philippines.
- D. DOYERI. Adults from the rectum of Xenopus laevis -- S. Africa; ? Rana tigrina -- India.
- D. JAPONICUS. Life history: Miracidia enter Anisus (Gyraulus) hiemantium -- Japan; Adults from intestines of Megalobatrachus japonicus, Ooeidozygia lima, Rana limnocharis, R. rugulosa -- China; Megalobatrachus japonicus, Rana nigromaculatus, R. rugosa -- Japan.
- D. MELANOSTICTI. Adults from the intestine of Bufo melanostictus -- Formosa.
- D. SACCULOSUS. Adults from the rectum of Rana erythraea -- Malaya.
- D. UNGUICULATUM (= Amphistoma unguiculatum, = A. subclavatum e.p.). Adults from the rectum of Triturus cristatus -- Europe.
- D. sp? of Srivastava, 1934. Adults from the intestine of Rana cyanophlyctis -- India.
- MEGALODISCUS AMERICANUS (= Diplo-discus americanus). Adults from intestines of larval Ambystoma gracile and adults of Amphiuma means, A. tridactylum, Dicamptodon ensatus, Rana boylei, R. septentrionalis, Taricha granulosa -- U. S. A.; Hyla eximia, Rana montezumae, R. pipiens, R. sphenoccephala -- Mexico; Rana pipiens -- Costa Rica.
- M. INTERMEDIUS (= Diplo-discus intermedius). Adults from the rectum of Desmognathus fuscus, Rana catesbiana -- U. S. A.
- M. MIRCOPHAGUS (= Diplo-discus microphagus). Life history: Cercariae from Menetus cooperi, Gyraulus sp? -- U. S. A.; Cercariae encyst in skin of adult amphibia or enter intestines of tadpoles and develop; Adults from intestine, rectum & bladder of Bufo borealis, Dicamptodon ensatus -- U. S. A.
- M. RANKINI. Adults from intestine of Notophthalmus viridescens -- U. S. A.
- M. TEMPORATUS (= Diplo-discus subclavatus e.p., = D. temporatus, = Megalodiscus ranophilus, = Opisthodiscus americanus, e.p., = Megalodiscus montezumae, = Pseudopisthodiscus americanus of Yamaguti, 1959). Life history: Cercariae (Cercaria caryi, = C. megalura) from snails Goniobasis virginica, Helisoma antrosom pericaricatum, H. campanulatum smithii, H. trivolvis -- U. S. A.; Metacercariae in skin of adults and in tadpoles of Hyla crucifer, Rana clamitans, R. pipiens -- U. S. A.; Adults from intestines and rectum of Rana catesbiana, R. pipiens -- Canada; Ambystoma

opacum, Bufo terrestris, Desmognathus fuscus, Hyla cinerea, H. crucifer, Notophthalmus viridescens, Pseudacris triseriata, Rana aesopus, R. areolata, R. boylei, R. cantabrigdensis, R. catesbiana, R. clamitans, R. pipiens, R. sphenoccephala -- U. S. A.; Ambystoma tigrinum larvae, Rana montezumae -- Mexico; Rana pipiens -- Costa Rica; Rana stenocephala -- Brazil.

OPISTHODISCUS DIPLODISCOIDES. Adults from intestines of Rana esculenta -- Europe; Rana esc. ridibunda -- N. Africa.

O. DIPLODISCOIDES NIGRIVASIS (probably should be of specific rank). Adults from the intestine of Rana esc. ridibunda -- Europe.

O. SUBCLAVATUS (= Fasciola subclavata ore sessili e.p., = F. ranae e.p., = Hirudo tuba, = Amphistoma unguiculatum e.p., = A. clavatum, ? = Diplodiscus megalochrus, ? = D. microchrus). Life history: Cercariae (Cercaria diesingii, = Redia gracilis, = Diplocotyle mutabilis e.p., = Cercaria diplocotylea, = C. amphistomi subclavati) from snails -- Europe, Africa, Australia, Japan; Metacercariae in Planorbis contortus, P. planorbis, P. rotundatus, P. spirorbis, Segmentina nitida, Sphaerium corneum, Spirolina vortex and tadpoles of Rana macrocnemis -- Europe, and Planorbis phillipii -- Africa; Adults from intestines of Bufo regularis, Rana esc. ridibunda, Xenopus laevis -- Africa; Rana esc. ridibunda -- Asia; Hyla aurea, H. caerulea, H. ewingii, Lymnodynastes peronii, L. tasmaniensis -- Australia; Hyla aurea --

New Zealand; Bombina bombina, B. pachypus, Bombinator igneus, Bufo bufo, B. variabilis, B. viridis, Hyla arborea, Rana arvalis, R. esculenta, R. esc. ridibunda, R. macronemis, R. temporaria, Salamandra palustris, Triturus alpestris, T. cristatus, T. helveticus, T. vulgaris -- Europe; Megalobatrachus japonicus, Rana catesbiana (introduced), R. esc. japonica, R. nigromaculata, R. rugosa ? R. virascens, Triturus pyrrhogaster -- Japan; Leptodactylus sibilatrix, L. typhonius -- Brazil; Rana catesbiana R. pipiens -- U. S. A. (the U. S. and the Brazilian records are probably erroneous).

PSEUDOCHIORCHIS BURTI (= Chiorchis burti). Adults from the intestine of Rana hexadactyla -- Ceylon.

PARAMPHISTOMATIDAE:

ASIOTREMA TRITURI.

Life history: Cercariae belonging to the "armatae polyadena" group come from the snail Coretus corneus -- Poland; Metacercariae in cladoceran Simocephalus exspinosus -- Poland; Adults from both larval and adult Triturus vulgaris -- Poland.

CHOLEDOCYSTUS INTERMEDIUS. Adults from gall bladder and bile ducts of Bufo marinus -- Mexico, Costa Rica; Bufo horribilis -- Panama.

DASYMETRA CONFERTA.

Life history: Cercariae from Physa integra -- U. S. A.; Metacercariae from tadpoles of Rana catesbiana, R. clamitans -- U. S. A.; Adults from Natrix spp. -- U. S. A.

- D. VILLICAECA.
Life history: Cercariae from Physa helei -- U. S. A.; Metacercariae in tadpoles of Hyla cinerea, Pseudacris occidentalis, Rana catesbiana, R. clamitans -- U. S. A.; Adults from Natrix spp. -- U. S. A.
- DOLICHOSACCUS AMPLICAVA (= Opisthioglyphe amplivava). Adults from the intestine of Elosia nasus -- Brazil.
- D. DIAMESUS. Adults from the intestine of Hyla freycinet -- Australia.
- D. ISCHYRUS. Adults from intestines of Hyla caerulea, Lymnodynastes dorsalis -- Australia.
- D. JUVENILIS (= Opisthioglyphe juvenilis). Adults from the intestine of Chiroleptes brevipalmatus -- Australia.
- D. TRYPHESUS (= Opisthioglyphe tryphesus). Adults from intestine of Hyla aurea, Lymnodynastes peronii -- Australia.
- D. spp? of Johnston, 1912. Adults from the intestines of Hyla spp? -- Australia.
- ENCYCLOMETRA ASYMMETRICA.
Life history: Cercariae not know; Metacercariae from Ooeidozyga lima, Rana limnocharis -- China; Adults from snakes (Enhydris, Natrix & Ptyas spp.) -- China.
- E. COLUBRIMURORUM (= Distomum colubri murorum; = D. allostomum; = D. caudatum; = D. subflavum; = Odhneria bolognensis; = Paraplagiorchis timotheevi; = Encyclometra bolognensis; = Orthorchis natricis).
Life history: Cercariae from Helix carthusiana -- Europe, India; Metacercariae in Rana esculenta -- Europe; Rana tigrina -- India. Adults in water snakes -- Europe, India.
- E. JAPONICA.
Life history: Cercariae not known; Metacercariae in abdominal muscles of Rana nigromaculata -- Japan; Adults from snake (Elaphe quadrivirgata) -- Japan.
- E. KOREANA.
Life history: Cercariae not known; Metacercariae in Ooeidozyga lima, Rana limnocharis, R. rugulosa -- China, Adults from snakes (Takydromus, Calotes, Natrix spp.) -- China, Korea.
- E. NATPICIS. Metacercariae in Rana esc. ridibunda, Natrix tessellata -- European Russia.
- GLYPTHELMINS AFRICANA (? to Reynoldstrema by Cheng, 1959). Adults from intestines of Rana adspera -- S. Rhodesia and Rana mascariensis -- Belg. Congo.
- G. FACIOI. Adults from intestine of Rana pipiens -- Costa Rica.
- G. RESTINA (= Choledocystus festina). Adults from bile ducts of Bufo arenarum -- Uruguay.
- G. PALMIPEDIS (possibly a synonym of G. linguatula and belongs in genus Margeana). Adults from intestines of Bufo marinus -- Argentina; Bufo marinus, Leptodactylus o. ginosus, L. ocellatus, L. pentadactylus, L. penta. labyrinthicus -- Brazil; Leptodactylus ocellatus -- Paraguay; Rana palmipes -- Uruguay; R. palmipes -- Venezuela; "Toad" -- Costa Rica.
- G. PENNSYLVANIENSIS.
Life history: Cercariae from Helisoma

- trivolvus -- U. S. A.; Metacercariae encyst in skin of Hyla crucifer -- U. S. A.; Adults from the intestine of Hyla crucifer -- U. S. A.
- G. QUIETA (= Distoma quietum; = Opisthioglyphe endoloba e.p.; = Glyphelmins californiensis; = G. parva; = G. rugocaudata; = G. shastai; = G. staffordi, = G. subtropica). Life history: Xiphidiocercariae (Cercaria hemifophura, = C. mesotyphla) from Physa gyrina, p. g. hildrethiana -- U. S. A.; Metacercariae in skin and intestines of same amphibia as are hosts of adults -- Cosmopolitan; Adults from intestines of Hyla crucifer, Pseudacris nigrita triseriata, Rana catesbiana, R. pipiens -- Canada; Bufo americanus, B. boreas, Pseudacris nigrita triseriata, Rana aurora, R. a. draytoni, R. boylei, R. catesbiana, R. clamitans, R. palustris, R. pipiens, R. septentrionalis, R. sphenoccephala -- U. S. A.; Rana montezumae, R. pipiens -- Mexico; Leptodactylus ocellatus -- Brazil; Rana rugulosa -- China; Rana angulosa, R. nigromaculata, R. rugosa -- Japan; Rana vittigera -- Philippines.
- G. STAFFORDI (? = G. quieta). Adults from intestines of Bufo melanostictus -- Formosa; Rana vittigera -- Philippines; Rana cancrivora, R. erythracea, R. macrodon -- Malaya.
- G. SUBTROPICA (? = G. quieta). Adults from intestines of Rana catesbiana, R. pipiens, R. sphenoccephala -- U. S. A.
- G. VITELLINOPHILUS. Adult from the intestine of Hyla raniceps -- Brazil.
- G. sp? of Brandt, 1936, Adult from the intestine of Hyla crucifer -- U. S. A.
- G. sp? of Trvassos, Freitas & Lent, 1939. Adults from intestine of Leptodactylus caliginosus, L. ocellatus -- Brazil.
- G. sp? of Turner, 1958. Adults from the intestine of Rana p. pretiosa -- Yellowstone Park, U. S. A.
- HAEMATOLOECHUS (H.) ALMORAI (= Pneumonoeces almorai). Adults from lungs of Rana cyanophlyctis -- India.
- H. (H.) ASPER (= Distoma variegatum e.p.; ? = Monostoma bombynae, ? = M. ellipticum, = Pneumonoeces asper, = Haematoloechus Anomoeicithus) asper asper). Life history: Cercariae not known; Metacercariae from Calopteryx virgo, Culex sp? -- Europe; Adults from lungs of Rana esc. ridibunda -- Africa; Bombina bombina, Bufo bufo, Rana esculenta, R. esc. ridibunda, R. temporaria, R. terrestris (? = arvalis) -- Europe.
- H. (A.) ASPER LIPSIENSIS. Adults from the lungs of Rana esculenta -- Europe (Germany).
- H. (H.) AUSTRALIS (= Pneumonoeces australis). Adults from lungs of Hyla aurea, Lymnodynastes peronii -- Australia.
- H. (S.) BREVIANSIS (= Skrjabinoeces breviansis, = Pneumonoeces similis e.p.). Adults from the lungs of Rana esc. ridibunda -- Russia in Europe.
- H. (H.) BREVIPLEXUS (= Pneumonoeces

- breviplexus, = Pneumobites breviplexus, =? H. (H.) FLOEDAE (? = H. breviplexus, ? = Haematoloechus floedae). Adults from lungs of Rana catesbiana, R. pipiens -- Canada; Bufo americanus, Rana catesbiana, R. clamitans -- U. S. A.; Bufo americanus -- Mexico.
- H. (A.) BUTTENSIS. Adults from the lungs of Rana boylei -- U. S. A.
- H. (H.) CAPYRISTES (= H. variegatus capyristes, = Pneumonoeces capyristes). Adults from the lungs of Rana hexadactyla -- India.
- H. (O.) COLORADENSIS (= Pneumonoeces coloradensis, = Ostiolum coloradensis). Adults from lungs of Bufo woodhousii, Rana pipiens -- U. S. A.; Rana montezumae -- Mexico.
- H. (O.) COMPLEXUS (= Pneumonoeces complexus, = Ostiolum complexus). Life history: Cercariae from Pseudosuccinea columella -- U. S. A.; Metacercariae in Argia sp?, Chromagrion conditum, Eallagma divergens, Holotania incesta, Lestes vigilax, Pachydiplax longipennis, Sympetrum vinicum, Tetragoneuria cynosura -- U. S. A.; Adults from lungs of Rana catesbiana, R. clamitans, R. pipiens -- U. S. A., Rana montezumae, R. pipiens -- Mexico.
- H. (O.) DOLFUSINUS (= Pneumonoeces variegatus of Dollfus, 1950). Adults from the lungs of Rana mascareniensis -- Belg. Cong.
- H. (O.) ELONGATUS. Adults from the lungs of Rana montezumae -- Mexico.
- H. (H.) FUELLEBORNI (= Pneumonoeces fuelleborni). Adults from the lungs of Bufo marinus -- Brazil.
- H. (O.) ILLIMIS. Adults from the lungs of Rana montezumae -- Mexico.
- H. (I.) ITURBEI (= Pneumonoeces iturbei). Adults from lungs of Rana palmipes -- Brazil; Venezuela.
- H. (H.) JEHOLENSIS (= H. sibiricus jeholensis, = Pneumonoeces jeholensis). Adults from the lungs of Rana nigromaculata -- Korea; Manchukuo.
- H. (H.) KERNENSIS. Adults from lungs of Rana aurora draytoni, R. pipiens -- U. S. A.
- H. (H.) LOBATUS (= Pneumonoeces lobatus). Adults from the lungs of Rana nigromaculata -- Manchukuo.
- H. (H.) LONGIPLEXUS (= Pneumonoeces longiplexus, = Pneumobites longiplexus). Life history: Cercariae not known; Metacercariae in Lestes vigilax -- U. S. A.; Adults from lungs of Rana catesbiana -- Canada; Rana catesbiana, R. clamitans, R. grylio, R. pipiens, R. septentrionalis -- U. S. A.; Rana catesbiana -- Mexico.
- H. (H.) MACRORCHIS. Adults from lungs of Rana montezumae, R. pipiens -- Mexico.
- H. (O.) MEDIOPLEXUS (= Pneumonoeces

- medioplexus, = Ostiolum formosum).
Life history: Ornate xiphidiocercariae from Planorbis armiger -- U. S. A.; Metacercariae in Sympetrum spp. -- U. S. A.; Adults from lungs of Bufo americanus, Rana clamitans, R. pipiens -- Canada; Bufo americanus, Rana catesbiana, R. clamitans, R. palustris, R. pipiens, R. septentrionalis -- U. S. A.; Rana montezumae, R. pipiens -- Mexico; Rana palmipes -- Colombia.
- H. (A.) NANCHANGENSIS. Adults from the lungs of Rana plancyi -- China.
- H. (A.) NANCHANGENSIS BYCHOVSKII (= H. schultzei e.p.). Adults from the lungs of Rana amurensis -- Siberia.
- H. (A.) NANCHANGENSIS MAJOR (= Pneumonoeces nanchangensis major). Adults from the lungs of Rana nigromaculata -- Japan.
- H. (A.) NEIVAI (= Pneumonoeces neivai, = P. pseudis, ? = P. planorbinus). Adults from lungs of Leptodactylus ocellatus, L. pentadactylus, L. penta. Labyrinthicus, Pseudis paradoxa Rana macula -- Brazil; Rana palmipes -- Venezuela.
- H. (O.) OXYORCHIS (= H. confusus, = Ostiolum oxyorchis).
Life history: Cercariae from Helisoma parvum, H. vermicularis, Planorbis (Gyraulius) parvus -- U. S. A.; Metacercariae in Plathemis lydia, Sympetrum illotum larvae -- U. S. A.; Adults (exper.) from the lungs of Rana aurora draytoni, R. boylei -- U. S. A.
- H. (A.) OZORIOI. Adults from the lungs of Leptodactylus ocellatus -- Uruguay, Venezuela.
- H. (O.) PARCIVITELLARIUS. Adults from the lungs of Rana montezumae -- Mexico.
- H. (H.) PARVIPLEXUS (= Pneumonoeces parviplexus, = Pneumobites parviplexus).
Life history: Cercariae from Gyraulius parvus -- U. S. A.; Metacercariae in Sympetrum spp. larvae -- U. S. A.; Adults from lungs of Rana catesbiana, R. clamitans, R. pretiosa, R. pretiosa & R. sylvatica hybrids -- U. S. A.
- H. (H.) PLANORBINUS (= H. pseudis, = Pneumonoeces planorbinus, ? = Haematoloechus neivai, possibly a nomen nudum). Adults from lungs of Pseudis paradoxa, Rana palmipes -- Venezuela.
- H. PRICEI.
Life history: Cercariae of "Prima" group (Cercaria pricei) from Pseudosuccinea columelia -- U. S. A.; Metacercariae not known; Adults are an Haematoloechus sp., occurring in amphibia (Rothchild, 1940).
- H. (O.) PULCHER. Adults from the lungs of Ambystoma tigrinum larvae -- Mexico.
- H. (H.) SCHULZEI (= Pneumonoeces schulzei). Adults from lungs of Rana esculenta, R. esc. ridibunda -- Germany; Rana amurensis -- Siberia.
- H. (H.) SIBERICUS (= Pneumonoeces sibericus). Adults from lungs of Rana amurensis, R. arvalis altaica -- Siberia.

- H. (H.) SIBERICUS JAPONICUS (= Pneumonoeces sibericus japonicus).
Life history: Cercariae not known; Metacercariae in Deilelia phaon, Sympetrum frequense larvae -- Japan; Adults from the lungs of Rana nigromaculata -- Japan.
- H. (H.) SIMILIPLEXUS (= Pneumonoeces similiplexus, ? = Haematoloechus varioplexus). Adults from lungs of Bufo americanus, Rana pipiens -- Canada; Rana clamitans, R. p. pretiosa, R. pipiens, R. septentrionalis -- U.S.A.
- H. (S.) SIMILIS (= H. similigenus).
Life history: Cercariae from Planorbis planorbis -- Europe; Metacercariae in larvae of Calopteryx & Coenagrion spp., -- Europe; Adults from lungs of Rana arvalis (? = terrestris), R. esculenta, R. esc. ridibunda, R. temporaria -- Europe; R. esc. ridibunda -- N. Africa.
- H. (S.) SIMILIS VOLGENSIS (= Skrjabinoeces volgensis). Adults from the lungs of Rana esc. esculenta -- European Russia.
- H. SINGAPORENSIS. Adults from the lungs of Rana cancrivora -- Malaya.
- H. (A.) TEJERAE (= Pneumonoeces tejerae, = H. iutzi). Adults from the lungs of Rana palmipus -- Venezuela.
- H. (H.) TIENTSINENSIS (? = H. sibericus). Adults from the lungs of Rana nigromaculata -- China.
- H. (A.) TUMIDUS. Adults from the lungs of Rana aurora draytoni -- U.S.A.
- H. (O.) UNIPLEXUS (? = H. floedae). Adults from the lungs of Rana sphenoccephala -- U.S.A.
- H. (H.) VARIEGATUS (= Distoma variegatum, = D. cylindricum, = Brachylaemus variegatus, = Pneumonoeces variegatus, = Pneumobites variegatus).
Life history: Cercariae (Cercaria anopheles, = Agamodistomum anopheles) (host not mentioned), enter insect larvae; Metacercariae in larvae of Anopheles maculipennis, Culex spp., Calopteryx spp. -- Cosmopolitan; Adults from lungs of Bombina bombina, B. variegata (= B. pachypus), Bombinator igneus, Bufo bufo, Rana esculenta, R. esc. ridibunda, R. temporaria, Triturus alpestris -- Europe; Rana esc. ridibunda, R. mascareniensis -- Morocco, Belg. Congo; Rana esc. ridibunda -- Turkestan; Bufo americanus, Rana caucasiensis, R. pipiens -- Canada; Rana catesbiana, R. pipiens -- U.S.A.
- H. (H.) VARIEGATUS ABBREVIATUS (= Pneumonoeces var. abbreviatus). Adults from lungs of Bombina bombina, Bombinator igneus -- Europe.
- H. (H.) VARIEGATUS DUBININAE. Adults from the lungs of Rana esc. ridibunda -- Volga Delta, European Russia.
- H. (H.) VARIOPLEXUS (= Pneumonoeces varioplexus, ? = Haematoloechus similiplexus). Adults from lungs of Bufo americanus, Rana pipiens, R. sylvatica -- U.S.A.; Rana catesbiana -- Canada; Rana montezumae -- Mexico.
- H. sp? of Grobbelaar, 1922. Adults from the lungs of Rana fuscigula -- S. Africa.
- H. sp? of Kobayashi, 1920. Adults from the lungs of Rana nigromaculata -- Japan.

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H. sp? of Lehmann, 1959. Adults from the lungs of Rana boylei -- U.S.A.

H. sp? of Matuda, 1938. Adults from the lungs of Rana nigromaculata -- Japan. (Near H. lobatus & H. variegatus).

HAPLOMETRA CYLINDRACEA (= Distoma cylindraceum, = D. variegatus e.p., = Fasciola cylindracea, = Brachylaemus cylindraceum).

Life history: Xiphidiocercariae from Lymnaea ovata, Radix limosa, R. pereger -- Europe; Metacercariae from water beetle (Ilybius fuliginosus) -- Europe; Adults from lungs of Bufo bufo, B. viridis, Hyla arborea, Pelobates fuscus, Rana arvalis (? = terrestris), R. arv. isaitschikovi, R. esculenta, R. esc. ridibunda, R. macrocnemis, R. temporaria -- Europe; Rana clamitans, R. palustris -- U.S.A. (U.S. records of doubtful validity).

H. CYLINDRACEA ALLOMETRA. Adults from the lungs of Rana daimatina -- Europe.

HAPLOMETRANA INTESTINALIS (= H. utahensis).

Life history: Cercariae from Physa gyrina, P. ampullacea Physella utahensis -- U.S.A.; Metacercariae may develop in skin of amphibia; Adults from the intestines of Bufo boreas, Rana areolata, R. pretiosa, R. pretiosa X R. sylvatica hybrids -- U.S.A.

HAPLOMETROIDES RAPPIDAE. Adults from the intestine of Hyperolius (Rappia) concolor -- Liberia.

LECHRIORCHIS PRIMUS.

Life history: Cercariae from Physella spp. -- U.S.A.; Metacercariae in tadpoles of Rana clamitans, R. pipiens -- Canada, U.S.A.; Adults from snakes (Thamnophis spp.) -- Canada, U.S.A.

L. TYGARTI.

Life history: Cercariae from Physella spp. -- U.S.A.; Metacercariae in tadpoles of Rana clamitans, R. pipiens -- U.S.A.; Adults from snakes (Thamnophis spp.) -- U.S.A.

?L. sp? of Bennett & Humes, 1938.

Metacercariae in mouth of Amphiuma tridactylum -- U.S.A.

LECITHOPYGE (= Dolichosaccus according to Travassos, 1930).

L. RANAE (= Fasciola ranae e.p.; = Opisthioglyphe ranae e.p.).

Life history: Xiphidio cercariae (Cercaria hambergensis), from Lymnaea palustris, L. stagnalis, Radix limosa -- Europe; Metacercariae in Limnophilus flavicornis, L. griseus, L. lunatus, L. rhombicus & various tadpoles -- Europe; Adults from intestines of Bufo bufo, Hyla arborea, Rana esculenta, R. esc. ridibunda, R. temporaria -- Europe.

L. RASTELLUM (= Distoma rastellus, = Opisthioglyphe rastellus).

Life history: Xiphidiocercariae (Cercaria limnaeae ovatae, = Distomum limnophili) from Lymnaea auriculata, L. palustris, L. stagnalis, Radix limosa -- Europe; Adults from intestines of Bufo bufo, Rana esculenta, R. temporaria -- Europe.

- L. RASTELLUM CYLINDRIFORME. Adults from the intestine of Rana temporaria -- Europe.
- L. RASTELLUM SUBULATUM. Adults from intestines of Bufo bufo, Rana temporaria -- Europe. (possibly = L. subulatum from Rana temporaria).
- LEPODERMA HIMALAYII. Adults from intestines of Bufo latastii, B. melanostictus, B. viridis -- India.
- L. MENTULATUM (= Distoma mentulatum, = D. colubri natrix intestinalis, = D. col. nat. tassellati, = D. lacertae, = Brachylaemus mentulatum, = Plagiorchis mentulatus). Adults normally in reptiles and ? from intestine of Rana temporaria -- Europe.
- L. (Plagiorchis) MONPLOI. Adults from intestines of Bufo regularis, Rana mascareniensis -- Mauritius.
- L. (Plagiorchis) RAMLIANUM (= Distoma ramlianium).
Life history: Cercariae from Bulinus contortus -- Egypt; Metacercariae in Physa acuta, Planorbis boissyi, insect naiads -- Egypt; Adults from intestines of Bufo bufo, Rana mascareniensis, chameleon -- Egypt.
- MACRODEROIDES TYPICUS (= Pleisiorcreadium typicum).
Life history: Xiphidiocercariae from Helisoma trivolvis, H. campanulata, H. camp. smithii, Stagnicola emarginata angulata -- U. S. A.; Metacercariae in salamander larvae and anuran tadpoles -- U. S. A.; Adults from fish (Amia calva) -- U. S. A.
- MAICURU SOLITARIUM. Adults from intestine of Bufo granulosis -- Brazil.
- MANODISTOMUM OCCULTUM (? = Zeugorchis aequatus, ? = Plagitura salamandra). (Synonymy doubtful -- Stunkard, 1936). Adults from intestine and muscle cysts of Notophthalmus viridescens, Rana pipiens -- Canada; Notophthalmus viridescens, Triturus meridionalis -- U. S. A.
- MARGEANA CALIFORNIENSIS (= Glythelmin californiensis, ? = G. quieta). Adults from intestines of Rana aurora, R. a. draytoni, R. boyllii -- U. S. A.; Rana montezumae, R. pipiens -- Mexico.
- M. ELEGANS (= Choledocystus elegans, = Glythelmin elegans). Adults from gall bladders of Bufo marinus, Leptodactylus ocellatus, L. penta, labyrinthicus -- Brazil.
- M. LINGUATULA (= Distoma linguatula, = Glythelmin linguatula, = Haplometra palmipedis, = Metorchis leptodactylus). Adults from intestines of Bufo marinus -- Argentina; Leptodactylus bolivianum -- Bolivia; Bufo marinus, B. musicus, B. terrestris, Ceratophrys cornuta, C. dorsata, Leptodactylus caliginosus, L. ocellatus, L. pentadactylus, L. penta. labyrinthicus -- Brazil; Leptodactylus ocellatus -- Paraguay; Bufo marinus, Chthonerpeton indistinctum, Leptodactylus ocellatus, Rana palmipes -- Uruguay; Bufo marinus, Rana palmipes -- Venezuela; Bufo marinus -- Mexico. (A record from Rana tigrina -- Fr. Indo China is of doubtful validity).

- M. PARVA (= Glyphelmins parva, ? = G. quieta). Adults from the intestine of Leptodactylus ocellatus -- Brazil.
- M. PROXIMUS (= Glyphelmins proximus, = ? Rauschiella repandum). Adults from the intestine of Leptodactylus ocellatus -- Uruguay.
- M. REPANDUM (= Distoma repandum, = Glyphelmins repandum, ? = G. proximus, ? = Microderma repandum, = Rauschiella repandum). Adults from the intestine of Leptodactylus ocellatus -- Brazil, Uruguay.
- M. RUGOCAUDATA (= Enodiotrema rugocaudata, = Glyphelmins rugocaudata, ? = G. quieta). Adults from intestines of Rana nigromaculata, R. rugosa -- Japan.
- M. SERA (= Glyphelmins sera, ? = G. linguatula). Adults from the intestine of Chthonerpeton indistinctum -- Uruguay.
- M. SHASTAI (= Glyphelmins shastai, ? = G. quieta). Adults from the intestine of Bufo boreas -- U.S.A.
- M. SIMULANS (= Glyphelmins simulans). Adults from the intestine of Leptodactylus ocellatus -- Uruguay.
- M. STAFFORDI (= Glyphelmins staffordi, ? = G. quieta). Adults from intestines of Rana rugulosa -- China; Bufo melanostictus -- Formosa; Rana vittiger -- Philippines.
- MONOSTOMA ELLIPTICUM (= M. bombynae, = Cyclocoelium ellipticum). Adults from lungs of Bombina bombina, Bufo bufo, Rana arvalis, R. esculenta -- Europe. (Seemingly near Haematoloechus, possibly near H. variegatus).
- NEORENIFER ANIARUM (= Distoma aniarum, = Renifer aniarum, = R. natricis, = R. texanus).
Life history: Cercariae from Physa helei -- U.S.A.; Metacercariae in tadpoles of Hyla cinerea, Pseudacris occidentalis, Rana catesbiana, R. clamitans -- U.S.A.; Adults from snakes (esp. Natrix spp.) -- U.S.A.
- N. KANSENSIS (= Renifer kansensis).
Life history: Cercariae from Physa anatina, P. integra -- U.S.A.; Metacercariae in tadpoles -- U.S.A.; Adults from snakes (Coluber constrictor, Lampropeltis getulus) -- U.S.A.
- N. WARDI.
Life history: Cercariae from Physa gyrina -- U.S.A.; Metacercariae encysted in tadpoles -- U.S.A.; Adults from snake (Natrix sipedon fasciata) -- U.S.A.
- N. sp? (= Renifer sp? of McCoy, 1928).
Life history: Cercariae (Cercaria ramonae) from Physa anatina, P. integra -- U.S.A. Metacercariae encysted in tadpoles and young catfish -- U.S.A.; Adolescaria in snake (Natrix sipedon) -- U.S.A. (mature adults not found).
- N. metacercariae of Najarian, 1955. From Rana pipiens -- U.S.A.
- OPISTHIOGLYPHE ENDOLOBA (= Distoma endolobum, = D. clavigerum e.p.; = D. retusum e.p.; = D. rastellus e.p.; = Opisthioglyphe ranae e.p.).
Life history: Xiphidiocercariae (Cercaria gibba of Ssinitzin, 1905; = C. armata e.p.; = Distoma tarda; = D. hirudinis e.p.; = Hepatostomum hirudinum e.p.; =

- Tetracotyle typica e.p.; = Distoma signatum; = D. muris; = D. ascidia; = D. lagena e.p.) from Bythnia tentaculata, Lymnaea ovata, Planorbis corneus, Radix pereger, Stagnicola palustris) -- Europe; Metacercariae in Clepsine campanulatum, Hirudo vulgaris, Nephelis vulgaris, Gammarus pulex, Anabotia nervosa, Cloen dipterum, Ephemera vulgata, Limnophilus griseus, L. rhombicus, Phryganea flavicornis, Tubifex tubifex, Chironomid larvae, Agrion sp?) -- Europe; (exper develop in tadpoles and / or adults of Bufo bufo, Hyla arborea, Pelobates cultripes, Pelodytes punctatus, Rana esculenta, Salamandra salamandra, Triturus helveticus, T. marmoratus, and fishes Gambusia sp. & Phoxinus sp. -- Europe); Adults from intestines of Bufo b. spinosus, Xenopus laevis -- Africa; Bufo bufo, B. calamita, B. viridis, Rana arvalis, R. esculenta, R. temporaria, Salamandra salamandra, Triturus alpestris, T. cristatus -- Europe.
- O. HISTRIX (= Monostoma histrix). Adults from the intestines of Bufo bufo, Rana arvalis isaitschikovi, R. esculenta -- Europe.
- O. ORIENTALIS. Adults from the intestine of Megalobatrachus japonicus -- China.
- O. RANAE (= Distoma ranae e.p.). Adults from Bufo bufo, B. calamita, B. viridis, Hyla arborea, Pelobates fuscus, Rana esculenta, R. temporaria, R. terrestris (? = arvalis), Triturus vulgaris -- Europe.
- O. SIREDONIS (= Distoma siredonis). Adults from the intestine of Ambystoma tigrinum -- Mexico.
- O. XENOPI.
Life history: Cercariae from Lymnaea natalensis -- S. Africa; Metacercariae in skin of Xenopus laevis tadpoles -- S. Africa; Adults probably from amphibia such as Xenopus spp. -- S. Africa.
- PARALECHRIORCHIS SYNTOMENTERA (= Zeugorchis syntomentera, = Pseudoreinifer syntomentera).
Life history: Cercariae from Physa gyrina -- U.S.A.; Metacercariae in tadpoles of Hyla regilla, Rana aurora and adults of Taricha torosus -- U.S.A.; Adults from snakes (esp. Thamnophis spp.) -- U.S.A.
- PARALEPODERMA BRUMPTI (= Plagiorchis brumpti).
Life history: Xiphidiocercariae from Planorbis planorbis -- Europe; Progenetic metacercariae in tadpoles of Alytes obstetricans, Triturus palmata -- Europe; Adults' definitive host not yet determined.
- P. CLOACICOLA.
Life history: Cercariae from Planorbis planorbis -- Europe; Metacercariae in tadpoles, including Alytes obstetricans -- Europe; Adults from snakes (Natrix spp.) -- Europe.
- P. PROGENETICUM. Progenetic metacercariae in tadpoles of Alytes obstetricans -- Europe.
- PARAMACRODEROIDES ECHINUS (possibly belongs in Family Macroderoididae).
Life history: Cercariae from Helisoma duryi -- U.S.A.; Metacercariae in Gambusia affinis, Jordanella floridae, Heterandria

- formosa, Mollienisia latipinna, Fundulus spp., tadpoles of Rana grylio, adults of R. sphenoccephala -- U.S.A.; Adults from fish (Lepisosteus platyrhincus) -- U.S.A.
- PLAGIORCHIS LENTI. Adults from the intestine of Leptodactylus ocellatus -- Uruguay.
- PLAGITURA PARVA.
Life history: Xiphidiocercariae from Helisoma antrosa -- U.S.A.; Metacercariae in Campeloma spp., Lymnaea stagnalis, Physella heterostropha, Pseudosuccinea columella, Corydalis cornuta larvae -- U.S.A.; Adults from the intestine of Notophthalmus viridescens -- U.S.A.
- P. SALANAMDRA (? = Manodistomum occultum).
Life history: Cercariae from Gyraulus sp., Pseudosuccinea columella -- U.S.A.; Metacercariae in Pseudosuccinea columella, dragonfly larvae, adult aquatic beetles -- U.S.A.; Adults from intestines of Ambystoma opacum, Desmognathus fuscus, Eurycea longicauda guttolineata, Notophthalmus viridescens -- U.S.A.
- PNEUMATOPHILUS VARIABILIS (= Distoma variabile, = Renifer variabilis).
Life history: Xiphidiocercariae from Physa integra -- U.S.A.; Metacercariae in tadpoles -- U.S.A.; Adults from snake (Natrix sipedon) -- U.S.A.
- RAUSCHIELLA TINERI. Adults from the intestine of a "Green Frog" -- Mexico.
- REYNOLDSTREMA AFRICANA (= Glypthelmins africana). Adults from the intestine of Rana mascareniensis -- Belg. Congo.
- RUDOLPHITREMA RUDOLPHI (= Rudolphiella (preocc.) rudolphi). Adults from the intestine of Bufo crucifer -- Brazil.
- SARUMITREMA HYSTATORCHIS. Adults from intestines of Bufo regularis, Rana adspersa -- S. Rhodesia.
- SKRJABINOECES BREVIANSIA (see; Haematoloechus (S.) breviansa).
- S. VOLGENSIS (see: Haematoloechus (S.) similis volgensis).
- STROMATREMA GUBERLETI.
Life history: Cercariae from Physa gyrina, P. halei -- U.S.A.; Metacercariae encysted in walls of digestive canals of Amphiuma means, Siren lacertina -- U.S.A.; Adults from snake (Farancia sp.) -- U.S.A.
- TREMIORCHIS RANARUM (= Centrovitus pentadelphi).
Life history: Cercariae from fresh-water snails -- India; Metacercariae not known; Adults from small intestines of Rana cyanophlyctis, R. tigrina -- India.
- ZEUGORCHIS EURINUS (= Caudorchis eurinus).
Life history: Cercariae from Physella spp. -- U.S.A.; Metacercariae from tadpoles of Rana clamitans, R. pipiens -- U.S.A.; Adults from snakes (esp. Thamnophis spp.) -- U.S.A.
- Z. SIGNATUS (= Distoma signatum, ? = D. nigrovenosum, = Caudorchis signatus).
Life history: Cercariae from snails -- Europe; Metacercariae in frog tadpoles -- Europe; Adults from water snakes (Tropidonotus spp.) -- Europe.

PSILOSTOMIDAE:

RIBEIROIA ONDATRAE (= Psilostomum ondatrae).

Life history: Cercariae (Cercaria marini) from Australorbis sp. -- Puerto Rico; Metacercariae in small fish and tadpoles -- Puerto Rico; Adults from Green Heron, Pelican, and (exper.) parakeet & pigeon -- Puerto Rico.

SCHISTOSOMATIDAE

SCHISTOSOMA MANSONI. Eggs carried by Bufo marinus as mechanical vector -- Brazil, Puerto Rico.

STRIGEIDAE:

ALARIA ALATA (= Planaria alata oder dubia, = Alaria vulpes, = Festucaria alata, = Distoma vulpina, = Fasciola vulpis, = F. alata, = Distoma alatum, = Hemistomum alatum, = Diplostomum alatum, = Conchosomum alatum, = Alaria sp? of Lutz, 1933).

Life history: Cercariae (Cercaria alariae alatae) are dicranocercariae from Planorbis spp. -- Brazil; Mesocercariae (Pseudodiplostomulum) in Leptodactylus pentadactylus -- Brazil; Metacercariae (Diplostomulum) in lungs of kittens (exper.) -- Brazil; Adults from intestines of various Canidae -- S. America, Europe, Australia. (Potekhina, 1951, reports finding Mesocercariae from Planorbis planorbis, P. vortex, developing in Bufo viridis, Rana esculenta, R. temporaria, and becoming adults in dogs and foxes -- European Russia).

A. ARISAEMOIDES.

Life history: Cercariae from snails (Planorbula & Helisoma spp.) -- U.S.A.; Mesocercariae encysts in tadpoles (abnormal host), but experimentally those taken from tadpoles of Bufo americanus, Rana pipiens, R. sylvatica -- U.S.A., will complete life cycle in a fox (the normal adult host).

A. CANIS.

Life history: Same results as for A. arisaemoides. (snails, tadpoles, fox) -- U.S.A.

A. INTERMEDIA.

Life history: Cercariae from Planorbula armigera, Helisoma trivolvis -- U.S.A.; Mesocercariae (Mesocercaria intermedia) encysted in muscles and kidney tissues of Rana pipiens tadpoles and / or adults (usually in snake Thamnophis sirtalis) -- U.S.A.; Metacercariae in rats and mice (exper.) -- U.S.A.; Adults experimentally raised in cats and dogs -- U.S.A.

A. MARCIANAE.

Life history: Cercariae (Cercaria marciana) from Helisoma campanulatum smithii, H. trivolvis -- U.S.A.; Mesocercariae (Agamodistomum marciana, = Mesocercaria marciana) in tadpoles of Rana clamitans, R. pipiens, and in snakes (Thamnophis eques, T. marciana, T. sirtalis) -- U.S.A.; Metacercariae and adults not certainly known.

A. MICRADENA.

Life history: Cercariae (Cercaria micradena) from Lymnaea palustris elodes -- U.S.A.; Metacercariae (Diplostomum micradaenum) in tadpoles of Bufo americanus, Rana pipiens

-- U.S.A.; Adults (exper.) in pigeon -- U.S.A.

A. (Paralaria) MUSTELAE.

Life history: Cercariae (Cercaria alariae mustelae) from Planorbula armigera -- U.S.A.; Mesocercariae (Mesocercaria alariae mustelae) in tissues of tadpoles and adults of frogs, esp. Rana catesbiana, R. clamitans, R. palustris, R. pipiens -- U.S.A.; Metacercariae (Metacercaria alariae mustelae) encysted in muscle tissues and free in lungs of mice, mink, raccoons, rats -- U.S.A.; Adults from muskrats, raccoons, mink, weasels, and (exper.) from cats, dogs, ferrets -- U.S.A.

A. sp? of Frandsen & Grundmann, 1960. Mesocercariae encysted in Bufo woodhousii, Rana pipiens -- U.S.A.

APATEMON GRACILIS (= Amphistoma gracile, = Holostomum gracile, = H. variegatum e.p., = H. variabile, = Strigea gracilis).

Life history: Cercariae (Cercaria burti, = C. pseudoburti) from both branchiate and pulmonate snails -- Cosmopolitan; Metacercariae (Tetracotyle burti) from leeches -- Cosmopolitan; Adults from palmate birds -- Europe, Japan, N. America. (Cercariae (Dicranocercaria molluscipeta, = Cercaria molluscipeta) from snails -- Venezuela; Metacercariae (Tetracotyle iturbei) from snails, leeches and tadpoles of Hyla crepitans -- Venezuela; and Adults from ducks -- Venezuela, probably not Apatemon gracilis).

APHARYNGOSTRIGEA IBIS.

Life history: Cercariae (Cercaria apharyngostrigea ibis) from Bullinus dybowsky, Planorbis boissyi, Pyrgophysa forskali -- Egypt; Metacercariae (Tetracotyle ibis) encysted in tadpoles of Bufo bufo -- Egypt; Adults from Ardeola ibis ibis -- Egypt.

A. PIPIENTIS.

Life history: Cercariae from Planorbula armigera -- U.S.A.; Metacercariae (Tetracotyle pipientis) in tadpoles of Hyla versicolor, Rana pipiens -- U.S.A.; Adults (exper.) in domestic pigeon -- U.S.A.

CODONOCEPHALUS URNIGER (= Amphistoma urnigerum, = Holostomum urnigerum, = Diplostomum mutabile, = Codonocephalus mutabile).

Life history: Cercariae not known; Metacercariae encysted in Rana esculenta, R. esc. ridibunda, R. temporaria -- Europe; Adults possibly Strigea cornu from birds (Ginetzinskaya, 1949, fed out successfully in Ixobrychus minutus, but identification not certain) -- Europe.

DIPLOSTOMUM FLEXICAUDUM.

Life history: Cercariae (Cercaria flexicauda, = C. diplostomi flexicaudi) from Lymnaea emarginata angulata, L. humilis modicella, L. palustris, L. stagnalis appressa, L. stag. perampla -- U.S.A.; Metacercariae (Diplostomulum flexicaudum, = D. gigas) in eye lens and tissues of tadpoles and (exper.) adults of Bufo americanus, Rana clamitans, R. pipiens (normally in fish) -- U.S.A.;

Adults from digestive tract of gull (Larus smithsonianus) -- U.S.A.

DIPLOSTOMULUM AMBYSTOMAE.

Metacercariae free in body cavity of Ambystoma maculatum, A. opacum -- U.S.A. Adults not known.

D. BUFONIS. Metacercariae from body cavity of Bufo viridis -- India.

D. DESMOGNATHI. Metacercariae from body cavities of Desmognathus fuscus, D. phoca, D. quadramaculata -- U.S.A.

D. SCHEURINGI (= D. trituri).

Life history: Cercariae from Helisoma anceps -- U.S.A.; Metacercariae in eye, brain, intestine of Notophthalmus viridescens, Siren lacertina (also in fish) -- U.S.A.; Adults not known.

D. SIRENIS. Metacercariae in pericardial cavity of Siren lacertina -- U.S.A.

D. VEGRANDIS.

Life history: Cercariae (Cercaria vegrandis), host not stated -- U.S.A.; Metacercariae in muscles of tadpoles of Rana pipiens and snakes (Thamnophis spp.) -- U.S.A.

D. XENOPI. Metacercariae in heart of Xenopus laevis -- Africa (possibly related to the Proterodiplostomidae, from reptiles).

D. sp? of Manter, 1938. Metacercariae in intestinal cysts from Siren lacertina -- U.S.A.

FIBRICOLA CRATERA (= Hemistomum craterum, = Fibricola laruei, = F. nana).
Life history: Cercariae from Physa gyrina,

P. sayii -- U.S.A.; Metacercariae from muscles and body cavity of tadpoles or adults of Hyla cinerea, Pseudacris nigrita, P. nig. triseriata, Rana clamitans, R. pipiens -- U.S.A.; Adults from raccoon (Procyon lotor) and White Ibis -- U.S.A.

F. TEXENSIS (= Theriodiplostomum texensis).
Life history: Cercariae (? Cercaria kappa) from Physa anatina -- U.S.A.; Metacercariae in body cavity of tadpoles and other cold-blooded vertebrates -- U.S.A.; Adults from raccoons (Procyon sp.) -- U.S.A.

HYSTEROMORPHA TRILOBA (= Distoma trilobum, = Hemistomum trilobum, = Proalaria triloba, = Diplostomum trilobum).
Life history: Cercariae (Cercaria hystermorphae trilobae) are dicranocercariae from Planorbis immunis -- Brazil; Metacercariae (Diplostomulum trilobum) experimentally raised in tadpoles of Leptodactylus ocellatus (normally in fish) -- Brazil; Adults from such birds as Ardea, Egretta, Herodias, Nyctanassa, Nyctocorax, Pelecanus, Phalacrocorax spp. -- Brazil, N. America, Europe.

LOPHOSICYADADIPILOSTOMUM NEPHROCYSTIS
(= Neodiplostomum nephrocystis; = Triplostomum nephrocystis).

Life history: Cercariae not known; Metacercariae in renal cysts from Rana palmipes -- Venezuela; Adults (near Alaria) experimentally in Accipiteran (Pitangus sulphuratus) -- Venezuela.

NEODIPILOSTOMUM (Cercariae from snails; Diplostomula frequently found in tadpoles and adults of frogs; Adults usually in mammals or birds).

N. BRANCHIOCYSTIS (= Triplostomum branchiocystis).

Life history: Cercariae not known; Metacercariae in bronchial cysts in Rana palmipes -- Venezuela; Adults (like Alaria) experimentally raised in bird (Pitangus sulphuratus) -- Venezuela.

N. INTERMEDIUM.

Life history: Cercariae from Pettancyclus assimilis -- Australia; Diplostomula in tadpoles and/or adults of Hyla latopalmata, H. pearsoni, Mixophes fasciolatus -- Australia; Adults from Hydromys chrysogaster, Rattus assimilis -- Australia. (Lizards and Hyla caerulea may serve as paratenic hosts of diplostomula and white rats and chicks as experimental host for adult development).

N. MAJOR. Metacercariae in Rana esc. ridibunda -- European Russia.

N. sp? of Penner, 1938.

Life history: Cercariae not known; Metacercariae (Diplostomulum type) in muscles of Rana sphenoccephala -- U. S. A.; Immature adults experimentally raised in white rats -- U. S. A. (possibly Fibricola lucida).

PHARYNCOSTOMUM CONGOLENSE.

Adults from Bufo regularis -- Belg. Congo.

P. CORDATUM (= Hemistomum cordatum; = Alaria cordata, = Holostomum linguaeformis).

Life history: Cercariae from Segmentina calothus -- China; Metacercariae (Diplostomulum mutadomum) in tadpoles and/or adults of Bufo melanostictus, Kaloula pulchra, Microhyla ornata, M. pulchra, Oceidozyga lima, Polypedates

leucomystax megacephalus, Rana guentheri, R. limnocharis, R. rugulosa, various snakes, shrews, skinks, and ? fish -- China (exper. transferred to rats, chicks, ducks, owls. Snakes serve as accumulator hosts); Adults in cats, both wild and domestic -- China, Europe.

PROALARIOIDES SERPENTIS.

Life history: Cercariae not known; Metacercariae in breast and thigh muscles of Rana nigromaculata -- Japan; Adults from the intestines of snakes (Elaphe climacophora, E. quadrivirgata) -- Japan.

PROHEMISTOMUM VIVAX (= P. spinulosum).

Life history: Cercariae (Cercaria vivax e.p.; = C. prohemistomi vivacis) from Cleopatra bulimoides -- Egypt; Metacercariae (Prohemistomulum vivax) in fish (Gambusia & Tilapia spp.) and Bufo mauritanicus, Rana esculenta, R. esc. ridibunda -- Africa; Adults from Egyptian kite (Milvus migrans aegyptius) and (exper.) cats & dogs -- Egypt.

PROHEMISTOMULUM EXPIDITUM.

Metacercariae in the Malpighian glomeruli of Rana esc. ridibunda -- Africa.

STRIGEA ELEGANS.

Life history: Cercariae from Gyraulius parvus -- U. S. A.; Mesocercariae in tadpoles of Bufo americanus, Rana clamitans, R. sylvaticus -- U. S. A.; Tetracotyles in Thamnophis sirtalis, Anas boschas, Bubo virginianus -- U. S. A.; Adults from Nyctea nyctea, Bubo virginianus -- U. S. A.

S. VAGINATA (= Holostomum vaginatum, = H. microcephalum, = Strigea ophiocystis, = Gongylura vaginata).

Life history: Cercariae (Dicranocercaria gyrinipeta, = Cercaria gyrinipeta, = C. strigeae vaginatae) from Planorbis spp., Spirulina anatina, S. melea -- Brazil; Mesocercariae (Mesocercaria strigeae vaginatae, = Distoma tetracystis e.p.) in muscle cysts of Hyla crepitans, H. rubra, H. spp?, Leptodactylus pentadactylus -- Brazil; Metacercariae (Tetracotyle vaginata, = T. ichthyocystis, = T. ophiocystis, = T. theriocystis, = T. gyrinipeta) in muscle cysts and lungs of young frog-eating birds, snakes, and mammals (exper. in pigeons) -- Brazil; Adults from intestines of Raptorial birds (Cathartes urubitinga, Spizaetus ornatus) -- Brazil.

SZIDATIA JOYEUXI (= Prohemistomum joyeuxi, = Gogatea joyeuxi).

Life history: Cercariae (Cercaria joyeuxi, = C. vivax e.p., = C. szidatiae joyeuxi) from Cleopatra bulimoides, Melanopsis algeriensis, M. duometi, M. praemorsa, M. pseudoferussaci, M. tunetana) -- Tunisia; Metacercariae (Diplostomulum joyeuxi, = Prohemistomulum joyeuxi) in muscle cysts of fish and Hyla arborea, Rana esculenta -- Europe; Rana esc. ridibunda -- Tunisia; Adults from intestines of Malpolon monspessulanus -- Algeria; Tropidonotus natrix persa, T. viviperinus -- Tunisia.

TETRACOTYLE CRYSTALLINA (= Distoma crystallinum). Metacercariae reported from muscle cysts in Rana pipiens -- U.S.A. (European records from Bombina

bombina, Bufo bufo, B. viridis, Rana esculenta, R. temporaria of doubtful validity).

T. RANAE. Metacercarian from cysts in Rana cyanophlyctis -- India.

TYLODELPHYS EXCAVATA (= Fasciola excavata, = Holostomum excavatum, = Hemistomum excavatum, = H. pileatum, = Proalaria excavata, = Diplostomum excavatum, = Distoma excavata, = Prodiplostomum excavatum).

Life history: Cercariae (Cercaria tylodelphydis excavatae, = Cercaria B. of Szidat, 1924) from Planorbis corneus -- Europe; Metacercariae (Dubium ranarum, = Diplostomum rachiaeum, = Tylodelphys rhachidis, = T. rhachiaea, = Tetracotyle rhachiaea, = Diplostomulum rhachiaeum) in eye and brain tissue of Rana esculenta, R. temporaria, Xenopus laevis (Zool. gardens) -- Europe; Adults from intestine of Ciconia ciconia, C. nigra, Nycticorax nycticorax, Podiceps cristatus -- Europe.

Strigeid Cercariae:

CERCARIA ELODES.

Life history: Cercaria from lymnaeid snails -- U.S.A.; Metacercariae (near Diplostomum micradaenum) in notochord of tadpoles of Rana pipiens -- U.S.A.; Adult possibly an Alariid.

C. VESICULOSA (= Cercaria I of Baer, 1827, = C. vesiculosa, = C. microcotyle, = C. chlorotica, = C. pugnax, = Eucercaria vesiculosa, = Xiphidiocercaria vesiculosa, = X. microcotyla, = Cercaria (Acanthocephala) vesiculosa, = C. (A.)

- vesiculifera) from Cleopatra bulimoides, Ena obscura, Melania tuberculata, Planorbarius corneus, Viparius viparius -- Europe; Metacercariae (Cystagora tetracystis, = Distoma tetracystis, = D. tetracystis ranae esculentae, = Agamodistomum tetracystis, = Diplostomulum tetracystis) encysted in throat muscles of Rana catesbiana, R. pipiens -- Canada, Rana esculenta -- Europe; Metacercariae (Distoma putorii e.p., = Agamodistomum putorii, = Diplostomulum putorii) encysted in throat muscles of Foetorius putorius -- Europe; Adult not known, but probably in members of the Mustelidae.
- NEASCUS sp? of Elkan & Murray, 1952. Ametacercarial form from the lateral line of Xenopus laevis (Zool. Gard., London).
- TELORCHIIDAE:
- AURODISTOMUM CHELYDRAE (= Distoma chelydrae, = Pterygotomascholas attenuatus, = Tetrapapillotrema concavocorpa). Life history: Xiphidiocercariae (Cercaria concavocorpa), from Helisoma trivolvis -- U.S.A.; Metacercariae (exper.) in Rana catesbiana tadpoles -- U.S.A.; Adults from Chelydra serpentina -- U.S.A.
- BRACHYSACCUS ANARTIUS (= Opisthioglyphe anartius). Adults from intestines of Hyla aurea, Lymnodynates peronii -- Australia.
- B. SYMMETRICUS (= Opisthioglyphe symmetricus). Adults from the intestine of Hyla caerulea -- Australia.
- TELORCHIS BONNERENSIS. Life history: Miracidia enter Physa gyrina, P. propinqua, and (exper.) P. ampullacea -- U.S.A.; Xiphidiocercariae enter Musculium spp., and tadpoles of frogs and salamander larvae -- U.S.A.; Adults developed only in larvae of Ambystoma macrodactylum (never in adults) -- U.S.A.
- T. CRYPTOBRANCHI (= Cercorchis cryptobranchi). Adults from intestine of Cryptobranchus alleganiensis -- U.S.A.
- T. MEDIUS (= Cercorchis medius, = C. bairdii). Life history: Xiphidiocercariae from Physella integra -- U.S.A.; Metacercariae encysted in tadpoles -- U.S.A.; Adults from turtle (Chrysemys, etc.) -- U.S.A.
- T. NECTURI (= Cercorchis necturi). Adults from the intestine of Necturus maculosus -- U.S.A.
- T. PATONIANUS (= Cercorchis patonianus). Adults from the intestine of Dermophis mexicanus -- Mexico.
- T. REELFOOTI (= Cercorchis reelfooti). Adults from the intestine of Amphiuma tridactylum -- U.S.A.
- T. SIRENIS (= Cercorchis sirenis). Adults from the intestine of Siren lacertina -- U.S.A.
- T. STUNKARDI (= Cercorchis stunkardi, = C. amphiumae). Adults from intestines of Amphiuma means, A. tridactylum -- U.S.A.
- T. sp? of Weatherly & Canaris, 1961. Adults from the intestine of Taricha granulosa -- U.S.A.

INCERTAE SEDIS:

Amphistome of Trowbridge & Hefley, 1934.
Adults from cloaca of Rana catesbiana, R. sphenoccephala -- U.S.A.

CERCARIA (Furcocercaria) AMERIANNAE

Johnston & Beckwith, 1947. From Amerianna pectorum -- Australia, enter and develop in tadpoles of Lymnodynastes spp.

C. AMHERSTENSIS Rankin, 1939.

Xiphidiocercariae from Pseudosuccinea columella enter and develop in tadpoles of Hyla versicolor, Rana clamitans, and become adult (? a plagiorchid) in the intestine of amphibians and reptiles -- U.S.A.

C. ANGELAE Johnston & Simpson, 1944.

Strigeid type cercariae from Amerianna spp. enter and develop in tadpoles of Lymnodynastes tasmaniensis -- Australia.

C. CAMBRENSIS I of Wright, 1927.

Cercariae from Lymnaea truncatula enter and develop in tadpoles of Rana temporaria -- Europe.

C. COMPACTISOMA of Byrd & Reiber, 1940.

Cercariae from Helisoma enter and form Echinostome type of metacercaria in tadpoles and (exper.) minnows -- U.S.A.

C. ELLISI of Johnston & Simpson, 1944

(= Echinoparphium ellisi). Cercariae (45-spined echinostome type) from Amerianna spp., Corbiculina angasi, Limnaea lessoni, Planorbis isingi, Plotiopsis tatai enter tadpoles of Crinia signifera -- Australia.

C. FISSICAUDA of La Valette St. George, 1855. Cercariae from Limnaea stagnalis, Physa alexandrina -- Egypt, Scrobicularia tenuis -- Europe, Limnaea stagnalis -- U.S.A. develop into metacercariae in brain and heart tissues of Salamandra spp. -- Europe; Ambystoma spp. -- U.S.A.

C. HOLTHAUSENI of Rankin, 1939.

Xiphidiocercariae from Pseudosuccinea columella develop into metacercariae in tadpoles of Hyla versicolor, Rana clamitans and form a Zeugorchid-type adult in intestines of amphibians and reptiles -- U.S.A.

C. INCISTIDATA of Perroncito, 1880. A metacercarian form encysted in stomach wall of Rana esculenta -- Europe.

C. KAPPA of Brooks, 1948. Develop into metacercaria in frog tadpoles -- U.S.A. (possibly the cercariae of Fibricola texensis).

C. MERCHANTI of Rankin, 1939. Cercariae from Pseudosuccinea columella develop into metacercariae in nymphs of damselflies and dragonflies -- U.S.A. (adults possibly an Haematoloechus sp.)

C. MICRACANTHA of Diesing, 1858 (= C. armata of Filippi, 1855). Cercariae from Stagnicola palustris develop into metacercariae encysted in stomach wall of Triturus vulgaris -- Europe.

C. NATANS of Johnston & Muirhead, 1949.

Echinostome type cercariae from Amerianna spp., Planorbis spp. -- Australia, developed experimentally in tadpoles of Lymnodynastes tasmaniensis.

- C. (Velocercaria) OROSPINOSA of Ullman, 1954. Cercariae from Melanopsis praemorsa develop into metacercariae in tadpoles of Bufo viridis -- Israel. (adults probably in fish).
- C. PSI of Brooks, 1948. Develops into metacercariae in frog tadpoles -- U.S.A. (possibly cercaria of Uvulifer ambloplitis).
- C. RANAE of Cort & Brackett, 1938. Cercariae from Stagnicola emarginata angulata, S. exilis, S. palustris elodes develop into diplostomula in tadpoles -- U.S.A. (cause of "Bloat Disease").
- C. WELLERI of McMullen, 1938. Xiphidio-cercariae from Helisoma antrosa enter into tadpoles -- U.S.A.
- C. XENOPI of Porter, 1938. Cercariae from Physopsis africana enter and encyst in the skin of Xenopus laevis tadpoles -- S. Africa. (adults probably monostomes)
- C. sp? of Parona, 1894. Metacercarian form encysted in Rana esculenta -- Europe.
- Digenea larvae of Bykhovskii, 1932. Encysted in Triturus cristatus -- Europe.
- DISTOMA ACERVOCALCIFERUM of Gastaldi, 1854. Metacercarian form from intestinal cysts in Rana esculenta -- Europe.
- D. AGAMO of Ercolani, 1882. Not used as a specific name. Refers to immature forms found in Rana spp. -- Europe. (not the D. agamos of Linstow, 1872, for immature forms found in Gammarus pulex -- Europe).
- D. ATRIVENTRE of Weinland, 1856. Cercariae (Cercaria atriventre) from Physa heterostropha enter into frogs -- Europe.
- D. BUFONIS of Linstow, 1877. Metacercarial forms from intestinal cysts in Bufo bufo -- Europe.
- D. CLOACICOLA of Lühe, 1909. Metacercariae in cloaca of Rana esc. ridibunda -- Volga Delta, Russia; Adults develop in Anser anser -- Russia.
- D. DEPRESSUM of Polonio, 1859. Metacercarian forms in intestinal cysts of Triturus cristatus -- Europe.
- D. DIFFUSOCALCIFERUM of Gastaldi, 1854. Metacercarian forms in intestinal cysts in Rana esculenta -- Europe.
- D. GLABRUM of Creplin, 1846. Metacercarian forms in intestinal cysts in Salamandra salamandra -- Europe.
- D. GYRINI of Linstow, 1884. Metacercarian forms in peritoneal cysts in Rana temporaria -- Europe.
- D. INCLUSUM of Polonio, 1859. Metacercarian form in intestinal cysts in Triturus vulgaris -- Europe.
- D. LUTEUM of Gilchrist, 1918. Cercariae from Physa tropica become metacercariae and eventually adults in the intestines of frogs -- S. Africa.
- D. MOLINI of Polonio, 1859. Metacercarian forms in intestinal cysts in Rana esculenta -- Europe.

- D. NIGRANS of Dujardin, 1845
(= Brachylaima advena, renamed).
Metacercariae in tadpoles of Rana spp.,
and adults in Sorex spp. -- Europe.
- D. NITIDUM of Stafford, 1905 (= Holostomum nitidum). Metacercariae in Rana pipiens
-- Canada; U.S.A.
- D. PELOPHYLACIS ESCULENTI of
Wedl, 1849 (= D. wedlii of Cobbold,
1860). Metacercariae in intestinal
cysts in Rana esculenta -- Europe
- D. REPANDUM of Rudolphi, 1819.
Metacercariae encysted in Leptodactylus
ocellatus, Rana sp? -- Brazil.
- D. SIRENIS of Braun, 1893 (= D. sirenis
lacertinae of Vaillant, 1863). Meta-
cercariae in intestinal cysts in Siren
lacertina -- U.S.A.
- D. sp? of Bagnis, 1874. From Rana
esculenta -- Europe.
- D. sp? V & VI forma of Ercolani, 1882.
Cercariae from Planorbis corneus,
Metacercariae enter Rana esculenta
(exper.) -- Europe.
- D. sp? of Hill, 1936 (see Young, 1939).
From Hyla aurea -- Australia.
- D. sp? of Perroncito, 1880. From Rana
esculenta -- Europe.
- D. sp? of Sonsino, 1896. From Rana
esculenta -- Europe.
- D. sp? of Stiles & Hassall, 1894. From
Hyla crucifer -- U.S.A.
- D. sp? of Stiles & Hassall, 1894. From
Notophthalmus viridescens -- U.S.A.
- D. sp? of Stiles & Hassall, 1894. From
Rana clamitans -- U.S.A.
- D. sp? of Timofeev, 1899. From
Pelobates fuscus -- Europe.
- D. sp? of Timofeev, 1899. Metacercariae
in intestinal cysts in Rana arvalis --
Europe.
- D. sp? of Timofeev, 1899. From Rana
esculenta -- Europe.
- Distome cysts of Pearse, 1932. Metacer-
cariae in intestinal cysts in Triturus
pyrrhogaster -- Japan.
- Distome cysts of Stabler & Pennypacker,
1939. Metacercariae in liver cysts in
"frogs" -- U.S.A.
- "Distomid" of Grobbelaar, 1922. From
gall bladder of Xenopus laevis -- S.
Africa. (possibly a Brachycoeliniid).
- "Distomid" of Grobbelaar, 1922. From
body cavity of Xenopus laevis -- S.
Africa. (possibly a Heterolopid).
- Metacercaria of Joyeux & Gaud, 1945. From
intranmuscular tissue of Rana esc.
ridibunda -- N. Africa.
- Metacercariae of Rankin, 1937. From
Desmognathus fuscus, D. quadramaculata,
Pseudotriton ruber -- U.S.A.
- Metacercariae of Southwell & Kirschner,
1937. From pericardial sac of
Xenopus laevis -- S. Africa.
- MONOSTOMA ORNATUM of Leidy, 1856.
From body cavity of Rana pipiens --
U.S.A.

MONOSTOMULUM ASPERUM of Brandes,
1892. Metacercariae in subcuticular
cysts on Siren lacertina -- U. S. A.

XIPHIDIOCERCARIA TRICUSPIDATA of
Riech, 1927. Cercariae from Stagnicola
palustris develop in Rana esc. ridibunda
-- Europe.