

## Appendix D: 2007 Publications, Presentations and Theses Supported by the Whirling Disease Initiative

### Peer-Reviewed Publications

Arsan, E. L.; Atkinson, S. D.; Hallett, S. L.; Meyers, T.; Bartholomew, J. L. Expanded geographical distribution of *Myxobolus cerebralis*: first detections from Alaska. *Journal of Fish Diseases*. 2007. 30:483-491

Arsan L, S. Hallett, and J. Bartholomew. *Tubifex tubifex* from Alaska and their susceptibility to *Myxobolus cerebralis*. *Journal of Parasitology*. In press, 2008.

Bartholomew, Jerri L.; Lorz, Harriet V.; Atkinson, Stephen D.; Hallett, Sascha L.; Stevens, Donald G.; Holt, Richard A.; Lujan, Kenneth; Amandi, Antonio. Evaluation of a management strategy to control the spread of *Myxobolus cerebralis* in a Lower Columbia River tributary. *North American Journal of Fisheries Management*. 2007. 27: 542-550

DuBey, Robert J.; Caldwell, Colleen A.; Gould, William R. Relative susceptibility and effects on performance of Rio Grande cutthroat trout and rainbow trout challenged with *Myxobolus cerebralis*. *Transactions of the American Fisheries Society*. 2007. 136:1406-1414

Granath, Willard O., Jr.; Gilbert, Michael A.; Wyatt-Pescador, Elizabeth J.; Vincent, E. Richard. Epizootiology of *Myxobolus cerebralis*, the causative agent of salmonid whirling disease in the rock creek drainage of west-central Montana. *Journal of Parasitology*. 2007. 93:104-119

Hallett, S. L. and J. L. Bartholomew. Effects of water flow on the infection dynamics of *Myxobolus cerebralis*. *Parasitology*. In press, 2008.

Hedrick, R. P.; Petri, B.; McDowell, T. S.; Mukkatira, K.; Sealey, L. J. Evaluation of a range of doses of ultraviolet irradiation to inactivate waterborne actinospore stages of *Myxobolus cerebralis*. *Diseases of Aquatic Organisms*. 2007. 74:113-118

Lukins, H. J., A. V. Zale, and F. T. Barrows. 2007. A packed-bed filtration system for collection of *Myxobolus cerebralis* triactinomyxons. *Journal of Aquatic Animal Health* 19:234-241.

Rasmussen C, Zikovitch J, Winton JR, Kerans B, 2007. Variability in triactinomyxon production from *Tubifex tubifex* populations from the same mitochondrial DNA lineage infected with *Myxobolus cerebralis*, the causative agent of whirling disease in salmonids. *Journal of Parasitology*. In press, 2008

Thompson, Kevin G. Use of site occupancy models to estimate prevalence of *Myxobolus cerebralis* infection in trout. *Journal of Aquatic Animal Health*. 2007. 19:8-13

## Presentations

### 2007 Whirling Disease Symposium “Resistance on Two Fronts” Denver, Colorado, February 12-13, 2007

Investigating competition among lineages of *T. tubifex* and the potential for biological control of whirling disease in natural streams. Dana Winkelman and Christine Clapp, Colorado Cooperative Fish and Wildlife Research Unit, and Kevin Thompson, Colorado Division of Wildlife.

Rapid natural selection for whirling disease resistance in rainbow trout from Harrison Lake, Montana. Mark P. Miller, Utah State University and E. Richard Vincent, Montana Fish, Wildlife, & Parks.

Multi-gene phylogenetic analysis of *Tubifex tubifex*. Charlotte Rasmussen and James R. Winton, Western Fisheries Research Center; Ronald P. Hedrick, University of California, Davis, and Katherine A. Beauchamp, Leetown Science Center, USGS.

Development and release of *Myxobolus cerebralis* in four genetic lineages of its oligochaete host *Tubifex tubifex*. Dolores V. Baxa and Ronald P. Hedrick, University of California, Davis, and Barry Nehring, Colorado Division of Wildlife.

Variability in *Triactinomyxon* production from genetically similar *Tubifex tubifex* populations infected with *Myxololus cerebralis*, the causative agent of whirling disease in salmonids. Charlotte Rasmussen and James R. Winton, Western Fisheries Research Center; Julie Zikovich and Billie Kerans, Montana State University.

Susceptibility of different geographical and genetic populations of *Tubifex tubifex* to infection by *Myxobolus cerebralis* in the Pacific Northwest. Sascha Hallett, Leyla Arsan and Jerri Bartholomew, Oregon State University

Geographical differences in *Tubifex tubifex*: density and infections with *Myxobolus cerebralis*. Deborah Iwanowicz, Vicki Blazer, and Bane Schill, National Fish Health Research Laboratory

Relationships among stream habitat, *Tubifex tubifex* and *Myxobolus cerebralis* in Yellowstone National Park, USA. Julie D. Alexander and Billie L. Kerans, Montana State University; Todd M. Koel, Yellowstone National Park

First detection of *Myxobolus cerebralis* in Alaska: implications and risk for further dissemination. Leyla Arsan, Stephen Atkinson, Sascha Hallett and Jerri Bartholomew, Oregon State University; Theodore Meyers Alaska Department of Fish and Game

A method to identify hatchery of origin in rainbow trout: implications for disease transmission. Daniel Gibson-Reinemer, Brett Johnson, Dana Winkelman, Pat Martinez, Colorado State University.

The viability of *Myxobolus cerebralis* myxospores after passage through the alimentary canal of avian piscivores in the greater Yellowstone ecosystem. Billie L. Kerans, Montana State University; Todd M. Koel, Yellowstone National Park; Scott C. Barras, USDA National Wildlife Research Center, Mississippi Field Station; John S. Wood, Pisces Molecular LLC.

**2007 Annual Meeting, American Fisheries Society  
San Francisco, California, August 30-September 6, 2007**

Best student paper award: Movement of Anglers, Sediment Transport, and the Implications for Carrying Aquatic Nuisance Species. Kiza K. Gates, Christopher S. Guy, Alexander V. Zale, Montana Cooperative Fishery Research Unit, and Travis B. Horton, Montana Fish, Wildlife and Parks.

Investigating competition among lineages of *T. tubifex* and the potential for biological control of whirling disease in natural streams. Christine Clapp and Dana Winkelman, Colorado Cooperative Fish and Wildlife Research Unit, and Kevin Thompson, Colorado Division of Wildlife.

**Wild Trout IX Symposium  
West Yellowstone, Montana, October 10-12, 2007**

Angler movement patterns and the implications for transport of aquatic nuisance species. Gates, Kiza, Montana State University.

The Whirling Disease Initiative. Kajsa Stromberg, Montana Water Center.

**Theses and Dissertations**

E. Leyla Arsan. Potential for Dispersal of the Non-native Parasite *Myxobolus cerebralis*: Qualitative Risk Assessments for the State of Alaska and the Willamette River Basin, Oregon. 2007. Oregon State University.

Gates, Kiza Kristine. Myxospore detection in soil and angler movement in Southwestern Montana: implications for whirling disease transport. 2007. MS Thesis, Montana State University.  
<http://etd.lib.montana.edu/etd/2007/gates/GatesK0507.pdf>