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FISH TREATMENT

I. General

Fish will be treated according to “Guidelines For Use of Fishes in Field Research” presented by the American Society of Ichthyologists and Herpetologists, American Fisheries Society, and the American Institute of Fisheries Research Biologists. Returning unneeded fish to the water is incorporated into the sample design of the Missouri River project.

II. Methods

- A. Retrieve all nets on time
- B. Return unneeded fish if the fish seems healthy
- C. Hold fish in an aerated live box
- D. Fish which will be kept and used in later analyses or which have been injured severely by a capture method need to be euthanized immediately after capture by one of the following techniques.
 - 1. For large specimens (longer than 100mm), euthanize the fish by delivering a heavy blow to the head with a blunt object (Strange 1983), severing of the spinal cord between the dorsal fin and gills, or complete decapitation.
 - 2. For small fish (shorter than 100mm), euthanize the fish using an overdose of MS-222 (tricaine methanesulfonate).
 - a. A small container of the MS-222 solution should be kept ready for this purpose (concentration of 250-500 mg/L).
 - b. Leave the fish in the solution until they become unconscious.
- E. All fish must be euthanized before any collection or examination and extraction procedure which will prove fatal can be performed.

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- Strange, R.J. 1983. Field examination of fish. Pages 337-347 in L.A. Neilsen and D.L. Johnson [eds]. Fisheries Techniques. American Fisheries Society, Bethesda MD

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