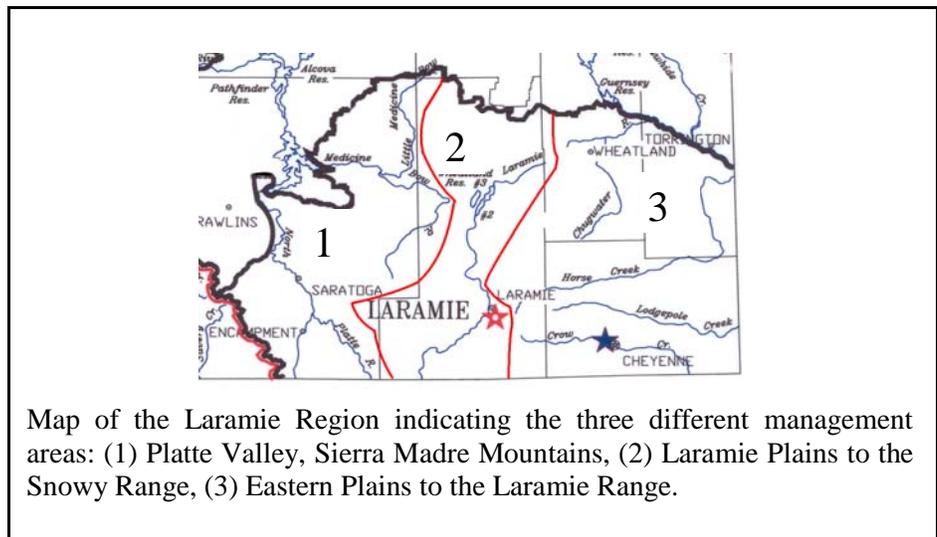




"Conserving Wildlife—Serving People"

The Laramie Region



Inside this issue:

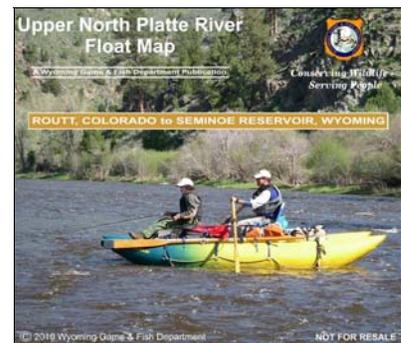
<i>Aquatic Invasive Species</i>	2
<i>Updates on selected waters in Laramie Region</i>	3
<i>Alsop Lake</i>	4
<i>2010-2011 Fishing Regulation changes</i>	5
<i>Meet a native fish</i>	5
<i>Snowy Range Lakes</i>	6
<i>Wheatland Reservoir #3</i>	6
<i>Hydroacoustic Surveys</i>	7
<i>Meet the management team</i>	8

Upper North Platte River Float Map

Special points of interest:

- Wyoming's Free Fishing day is Saturday June 5, 2010!
- Summary of last year's activities.
- Aquatic Invasive Species News.
- Alsop Lake under new management.
- Hydroacoustic Surveys; what and how.

The ever popular Upper North Platte River Float Map will soon be available to the boating public in an updated color version. The original map was published in black and white in 1990 and revised in 1998. The new map details the North Platte River from Routt, Colorado to Seminoe Reservoir, Wyoming. This comprehensive map will contain seven individual river sections detailing river distances between launch points, and identifying facilities such as camping, parking areas, and comfort stations. Land ownership will be indicated by specific colors for Forest Service, Bureau of Land Management, Bureau of Reclamation, State, Game and Fish Managed Lands, and Private lands. River information on rapid ratings and recommended boat types for various flow levels will also be provided. Detailed information is also provided on boating safety,



fishing and wildlife viewing opportunities. The map is in the final stages of review for printing and will be available for the 2010 floating season. This process is a cooperative effort between the Wyoming Game and Fish Department, Forest Service, and Bureau of Land Management.

Preventing Aquatic Invasive Species in Wyoming

Aquatic invasive species are organisms that are introduced into new ecosystems where they cause harm and threaten human uses of water resources. Often called "nuisance" species, they can attach to equipment, boats, and clothing used in the water and can then be transferred from one body of water to another. Once established, these species cause significant problems for aquatic ecosystems and the people who use them. Of particular concern are two species posing a significant and immediate threat to Wyoming – zebra and quagga mussels.



What are they?

Zebra and quagga mussels are freshwater, bivalve mollusks, typically with a dark and white pattern on their shells. They are native to Eurasia and were first discovered in the Great Lakes in 1988, most likely transported in the ballast water of ocean-going ships. They are up to an inch long and are often found in clusters attached to hard surfaces such as boats, piers, pipes, and other equipment. Invasive mussels reproduce rapidly. There are no known populations of these mussels in Wyoming to date, but they have rapidly invaded waters across the country and are now present in Colorado, Nebraska and Utah

Impacts to You

The negative impacts of invasive zebra and quagga mussels cannot be overstated. They impede water delivery and increase maintenance costs by clogging pipes, pumps, turbines and filtration systems. Invasive mussels can clog water intakes on motors, overheating and ruining boat engines. Invasive mussels remove plankton from the water. Plankton is the primary food source for forage fish – which in turn are the food of sport fish. The result is often a catastrophic decline in sport fisheries.

How You Can Help

Overland transport on trailered watercraft poses the greatest risk for spreading aquatic invasive species. To prevent the spread of these mussels to Wyoming and protect our resources, we're asking all boaters and anglers to **Drain**, **Clean**, and **Dry**. Drain all water from your equipment and

boat, including the livewell, bilge, and ballast. Clean all mud, plants, and debris from your equipment and boat. Dry your equipment and boat thoroughly before launching in another body of water for at least 5 days in summer, 18 days in spring and fall, and 3 days in winter.

The 2010 Wyoming Legislature passed a new aquatic invasive species bill that allows the establishment of check stations to inspect watercraft for aquatic invasive species and if necessary decontaminate the watercraft. In addition to encountering check stations at boat ramps throughout Wyoming, boaters will need to purchase a Wyoming Aquatic Invasive Species Decal before launching in any waters in Wyoming in 2010.

For more information, call 307-777-4600 or visit <http://gf.state.wy.us/fish/AIS/index.asp>.

To report an aquatic invasive species sighting, or to request assistance with watercraft decontamination call 1-877-WGFD-AIS (1-800-943-3247).

Don't Move a Mussel

BEFORE YOU LAUNCH IN ANY WATER,

*protect your water resource and
boat motor from invasive zebra and
quagga mussels by doing a*

SELF-CHECK

Follow these simple steps to protect your waters:

- ✓ **DRAIN** All water must be drained from your boat. This includes the ballast, bilge, livewell and motor. Leave wet compartments open.
- ✓ **CLEAN** Remove all plants, mud and debris from equipment and boat.
- ✓ **DRY** Dry your boat or equipment 5 days in the summer, 18 days spring/fall or 3 days of freezing.

Help protect Wyoming's
waters by making sure you
Don't Move a Mussel!

Please contact the Wyoming Game and Fish Department if you see attached mussels on your equipment or in Wyoming waters. We can provide more information and assistance in removal. Call 1-877-WGFD-AIS - (877-943-3247)

**WYOMING GAME & FISH
DEPARTMENT**
"Conserving Wildlife - Serving People"

**STOP AQUATIC
HITCHHIKERS!**
www.ProtectYourWaters.net

Updates on selected waters in Laramie Region

Grayrocks Reservoir

Grayrocks Reservoir, which is on the Laramie River, was filled to capacity in 1983. The reservoir at full capacity is 3,547 acres and located 9 miles northeast of the town of Wheatland. The reservoir lies within the Wyoming Game and Fish Department Grayrocks Reservoir Public Access Area. Allowable activities include fishing, boating, hunting, camping, and hiking. Public facilities include parking areas, vault toilets, and boat ramps on the south side of the reservoir. Grayrocks Reservoir received around 17 vertical feet of water in 2008 and received additional water in 2009. Grayrocks Reservoir is sampled annually and in 2009 walleye captured in sampling gear ranged from 9 to 24 inches and weights ranged from 0.3 to 5.5 pounds. The other primary game fish besides walleye in the reservoir is channel catfish. Channel catfish captured in sampling gear in 2009 ranged in length from 15 to 21 inches and weights ranged from 0.9 to 3.5 pounds. Other game fish available to anglers are black crappie, freshwater drum, smallmouth bass, and yellow perch. Around 400,000 walleye fingerling are stocked annually, along with 5,000 channel catfish.

Leazenby Lake (pictured below)

Leazenby Lake is a Wyoming Game and Fish Department Public Access Area located 8 miles south of Laramie off of Highway 287. The northern portion of the lake is on state land, while the southern portion has a public pedestrian easement for fishing that exists 50 feet above the high water line. There is a rustic outhouse available and the only allowable public activity is fishing. The lake was sampled in early spring 2009. Brook trout captured in sampling gear ranged in length from 8 to 18 inches. Rainbow trout captured in sampling gear ranged in length from 7 to 25 inches. This lake is stocked annually with brook and rainbow trout.



North Platte River

Each year a population estimate is obtained from one of five representative sections of the North Platte River, upstream from Seminole Reservoir. In 2009, the river section from the USFS Pickeroon Campground downstream 2 river miles was sampled. The 2009 population estimate of trout larger than 6 inches was 1,300 fish per mile. About 70% of these trout were brown trout and the remainder were rainbow trout. The trout population estimate was much higher than the previous estimate obtained in 2004. Both brown and rainbow trout averaged 10 inches and ranged from 2 to 19 inches in length.



North Platte River brown trout

Lower North Crow Reservoir

Lower North Crow Reservoir is located within the Wyoming Game and Fish Department John and Annie Woodhouse Public Access Area. Allowable public activities are fishing, wildlife viewing, hunting, and hiking. There are outhouses available. The reservoir is about 6 surface acres and is stocked with catchable rainbow trout annually. Brown trout are also stocked annually to help control an abundant sucker population. Rainbow trout average about 8 inches, but brown trout up to 6 pounds have been caught.

Alsop Lake under new management



Alsop Lake is a very popular 50-acre lake located only a few miles from Laramie. The lake is a Wyoming Game and Fish Department Public Access Area. Allowed activities are fishing, waterfowl hunting, and boating. There is a parking area, outhouse, and concrete boat ramp. A public pedestrian easement for fishing exists 50 feet above the high water line around a majority of the western portion of the lake, while the eastern portion is location on state land. Like other Plains Lakes it suffered from low water during the late 1990s and early 2000s. By 2002 fish stocking had ceased and game fish left in the lake had winterkilled. Excess irrigation and stock water flows filled the lake in 2005. Snake River cutthroat were stocked, grew quickly and fishing opportunity was once again restored at this popular lake. From 2006 through 2008 rainbow trout were stocked in the lake. A combination of Snake River cutthroat, Colorado River cutthroat and rainbow trout were stocked in 2009.

A consistent supply of water is necessary to keep Alsop Lake full and maintain the fishery. An agreement between the Wyoming Game and Fish Department and two local landowners was obtained in 2008 to provide enough water to fill the lake. This agreement was renewed in 2009.

Anglers have expressed a desire for trophy fishing opportunities in southeast Wyoming. Diamond Lake provided trophy fishing, but the lake went dry in the late 1990s. With a consistent water supply available for Alsop Lake the Laramie Fisheries Management Crew determined Alsop Lake could fill the void left by Diamond Lake for a trophy fishery. A regulation was proposed and approved

by the Wyoming Game and Fish Commission for the 2010-2011 fishing regulations.

The new regulation at Alsop Lake requires that the creel limit is two (2) fish per day or in possession. All trout less than 16 inches shall be released to the water immediately. Fishing is permitted by the use of flies and lures only. Artificial flies and lures means manmade flies and lures. No power bait or chemically enhanced plastics. The use or possession of bait is prohibited in areas or on waters where fishing is permitted by the use of artificial flies and lures only.

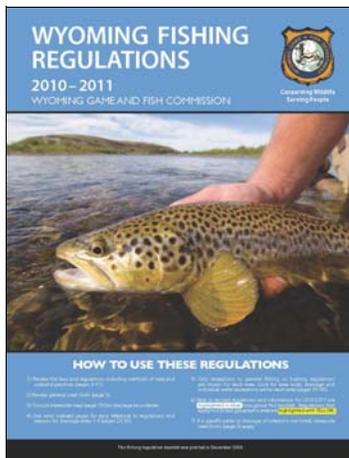
With the new regulation and a more stable water supply southeast Wyoming anglers again have a designated trophy fishery. The new regulation took effect on January 1, 2010. It will take some time for fish to grow and for the fishery to develop. Expect slower catch rates than at other waters, but the fish caught should be worth the effort.



I'll be waiting...

2010-2011 Fishing Regulations

Anglers need to be aware of new fishing regulations for waters in southeast Wyoming. It is always a good idea to check the regulations prior to fishing, but it is particularly important to check for any changes at the beginning of an even numbered year like 2010. Any changes in the regulations will be highlighted in blue in the new regulation booklet. Changes that apply to an entire drainage are highlighted in yellow. Please pick up a regulation booklet at your nearest Game and Fish Department office, license selling agent or online at <http://gf.state.wy.us>. Fishing regulations are used to protect or enhance specific fisheries. They can also be used to provide a diversity of angling opportunity.



Alsop Lake - On January 1, 2010 the creel and possession limit for trout at Alsop Lake was lowered to two trout and all trout less than 16 inches must be immediately released. In addition fishing will be permitted by the use of artificial flies and lures only. This regulation will establish a trophy fishing lake in the Laramie Region.

Turpin Creek Reservoir - There has been some confusion among anglers in telling the difference between brook trout and splake on Turpin Creek Reservoir in Carbon County. Consequently, beginning January 1, 2010 the creel limit on trout in Turpin Creek Reservoir, including brook trout, will be six fish per day or in possession with no more than one fish exceeding twenty inches.



All Streams and Rivers in the Laramie Region – The creel limit for trout in the Medicine Bow, Laramie and North Platte River drainages will be standardized at three trout per day or in possession with no more than one trout over 16 inches in possession. In the North Platte River this regulation applies from the USGS gauging station weir above Seminole Reservoir upstream to the Wyoming-Colorado state line. The regulation applies to the mainstream and all tributary streams in the drainage. Streams in southeast Wyoming are managed as wild fisheries. The new creel limits are designed to protect and maintain these wild fisheries. Remember that a special regulation for brook trout (six brook trout per day or in possession) in the Pole Mountain District of the Medicine Bow - Route National forest is still in effect.



River carpsucker

Meet your native fish

The river carpsucker is native to watersheds east of the Continental Divide in Wyoming, but have not been collected from the Niobrara and South Platte watersheds. It is a sucker species that can commonly reach sizes between 12 and 15 inches. It is silver-colored with a long, sickle-shaped dorsal fin. It is often confused with the quillback, another native species. River carpsucker is found in large, turbid rivers. It is also common in reservoirs. This species is likely a food source for many species of birds, mammals and fish. It is also a good indicator of stream health, where they are native. Conservation of the river carpsucker within its native range in Wyoming is important to help maintain the diversity of native fishes in the state.

Snowy Range Lake Stocking Program



The Snowy Range Lakes are an important recreation area for the residents of Albany, Carbon, and Laramie counties in Wyoming, as well as non-resident users. The Snowy Range Lakes lie within the Medicine Bow-Routt National Forest. In 1970, 16,645 acres of the forest were designated as a scenic area and closed to vehicular travel. There are many lakes within the Medicine Bow-Routt National Forest and not all are included in this article. Many Snowy Range Lakes have naturally reproducing trout populations, but some need to be maintained through stocking due to lack of available spawning habitat. Lakes within the roadless area which receive stocked fish are East Glacier Lake, Golden Lake, Shelf Lake #1, Shelf Lake #2, and South Gap Lake.

The lakes in the roadless area are stocked biannually by helicopter. East Glacier Lake is 7 surface acres in size and is stocked with Bear River cutthroat. Golden Lake is 5 surface acres and stocked with Bear River cutthroat. Shelf Lake #1 is only about 3 surface acres and was stocked with Bear River cutthroat biannually from 2000-2004. Shelf Lake #1 was stocked with golden trout in 2006 and is scheduled to be stocked with golden trout in 2010. Shelf Lake #2 is about 6 surface acres and was stocked with Bear River cutthroat biannually from 2000-2004. Shelf Lake #2 was stocked with golden trout in 2006 and scheduled to be stocked golden trout in 2010. South Gap Lake is one of the larger lakes within the roadless area at 44 surface acres. It has been stocked since 2000 with a combination of Bear River cutthroat and rainbow trout biannually.

It's Back! Wheatland Reservoir #3

Southeast Wyoming reservoirs and the anglers that fish them have suffered through 9 long years of drought. While it is too early to be overly optimistic, a couple of good water years are cause for some celebration.

Wheatland Reservoir #3 goes through boom and bust cycles. When full the 7,250 acre reservoir provides excellent fishing, but because of its 1920's water right it is one of the last reservoirs to receive water each year. It was last filled in 1990. The reservoir provides great angling for large trout when there is water, but during the drought no water was added, water levels declined, stocking ceased in 2003 and finally the fishery turned from trout to carp.

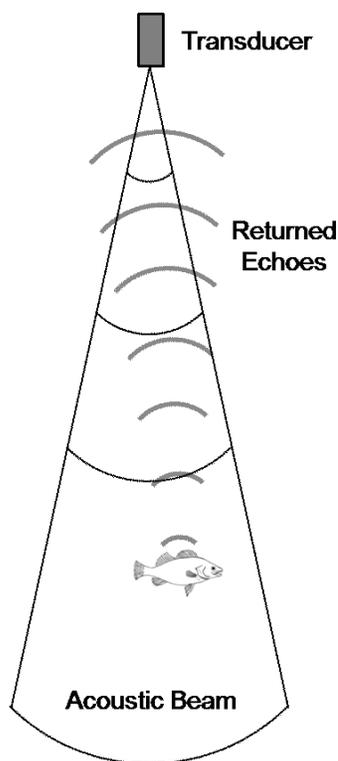
During the spring and summer of 2009 stream flows in the Laramie River were better than they had been since the early 1990's. As a result water was available to partially fill the reservoir to the bottom of the boat ramp. This was enough water that the Laramie Fisheries Management Crew felt that fish stocking could resume.

Usually fish stocking is planned at least 2 years in advance. With no prior notice the Fish Culture Section was able to react to the reservoir's sudden need. There were 28,400 5 to 7 inch fish available that were stocked immediately. Then all available fish eggs and space in several hatcheries were utilized to provide 237,000 1 to 3 inch fish for stocking in the fall of 2009. With this effort a total of 265,400 fish were stocked. Species stocked were Colorado River cutthroat, Snake River cutthroat, Bear River cutthroat, brown trout and rainbow trout.

The fish stocked during the summer and fall of 2009 will grow quickly in the productive waters of Wheatland #3. Growth projections indicate that by the fall of 2010 there should be a fishing opportunity for 10 to 12 inch fish. By late spring 2011 these first fish should be reaching 14 inches or more in length. Plans are in place to continue stocking up to 200,000 small fish in 2011 and 2012 if they are available in the hatchery system. Even if no more water is added a fishery will exist for at least 4 years.

Using hydroacoustic surveys to assess fish populations

Hydroacoustics is the use of transmitted sound waves to detect submerged objects. It was first developed for military use in the early 1900s and the earliest records of using hydroacoustics to count fish date back to the 1930s. The Wyoming Game and Fish Department has been using hydroacoustics to assess fish populations since 1996. The basic principle is that sound waves are emitted from a transducer. These waves travel through the water column until they encounter an object with a different density than the surrounding water (e.g., a fish's swim bladder, lake bottom). Some of the sound wave is reflected by the object and returned to the transducer as an echo (See picture below).



The Wyoming Game and Fish Department collects hydroacoustic data via mobile surveys. Two transducers are attached to a boat using a pole mount (picture to right). One transducer is mounted parallel to the water surface, approximately one meter below the surface. This is the sidelooking transducer and is used to record fish in the top six meters of the water column, up to 50 meters out from the boat. A second transducer is mounted perpendicular to the water surface (i.e., downlooking) and is used to record fish at depths greater than six meters down to the bottom. The boat travels a predetermined path following either parallel or zig-zag transects. The configura-

tion within the echo sounder limits the effectiveness of this equipment to waters deeper than eight meters.

Once the data is analyzed it can be used for assessing fish populations. The most basic use of hydroacoustic data is simply to calculate the volume of water sampled and divide the number of fish counted by that volume to get a density estimate. This density estimate can then be multiplied by the total volume of water in the lake to get a population estimate. Alternatively, because the depth of each fish is known, density and population estimates can be calculated by depth. One of the disadvantages of hydroacoustics is that the species of fish sampled is unknown; however, concurrent netting data can be used to partition the number of fish by species. Alternatively, life history characteristics (e.g., depth or temperature preferences) can be used to exclude non-target species from the estimates.

Examples of the use of hydroacoustics in Wyoming include density and population estimates of rainbow trout in Alcova and Pathfinder reservoir and abundance estimates of rainbow, cutthroat, and lake trout in Buffalo Bill Reservoir. Waters within the Laramie Region sampled with hydroacoustics in 2009 were Hog Park and Rob Roy reservoirs.

Hydroacoustics is a very powerful tool for assessing fish populations, but it must be used in conjunction with other gears to most accurately assess fish populations. As with all gears, hydroacoustics has its limitations, but sound scientific methods and advances in technology have allowed users to overcome many of these limitations.



Wyoming Game and Fish Department

Wyoming Game and Fish Department

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The Wyoming Game and Fish E-newsletter is now available for those who want to keep up with developments on line. If you are interested in signing up, go to: <http://gf.state.wy.us/newsview/frmSubscribe.aspx>.

FISH DIVISION MISSION STATEMENT

"As stewards of Wyoming's aquatic resources, we are committed to conservation and enhancement of all aquatic wildlife and their habitats for future generations through scientific resource management and informed public participation. We will use an integrated program of protection, regulation, propagation, restoration and control to provide diverse, quality fisheries resources and angling opportunities. Our efforts will balance the productive capacity of habitats with public desires."

Many Thanks to Newsletter Contributors: Steve Gale, Lee McDonald, Christina Barrineau, Mike Snigg, Travis Neebling, and Beth Bear. Color illustrations of game fish used in this newsletter provided by artist Michelle LaGory.

Mike Snigg has been on the Laramie Fisheries Management Crew since 1985. He was promoted in August of 2003 from regional fisheries biologist to regional fisheries supervisor. Mike has over 30 years with the Department. After obtaining his Bachelor's from Simpson College in Iowa, he worked for the Department for several years, and received his Master's from UW.



Mike Snigg

Steve Gale was hired as a regional fisheries biologist in June of 2005. He was raised in North Platte, Nebraska. Steve received his Bachelor's in Fisheries and Wildlife Management from the University of Nebraska in 2000. He completed his Master's in Fisheries Management from Montana State University in 2005.



Lee McDonald

Lee McDonald transferred to the regional fisheries biologist position from the Fish Culture Section in June 2006. Prior to this assignment he was Superintendent of the Como Bluff Fish Hatchery in Rock River, Wyoming. Lee has over 30 years with the Department. Lee came to Wyoming from Pueblo, Colorado in 1975. He received his BS in Fishery Science from Colorado State University in 1978.



Christina Barrineau

Christina Barrineau was hired as the regional aquatic habitat biologist in August of 2004. She is originally from South Carolina and moved to Wyoming in 2000. Christina received her Bachelor of Science degree from Warren Wilson College in Asheville, North Carolina in 2000. She received a Master's in Zoology from the University of Wyoming in 2003.



Steve Gale