



April through June 2009
Volume 9, Issue 2

Clam Lake Elk Herd News

The sportsman lives his life vicariously. For he secretly yearns to have lived before, in a simpler time. A time when his love for the land, water, fish and wildlife would be more than just a part of his life, it would be his state of mind.

~ Jim Slinsky ~



During the calving season we depend on volunteers of all ages.

Crosley Diapa &
call # 268

Current Status

By: Laine Stowell and Matt McKay

At the end of March we estimated that there were 134 elk in the herd. During the second quarter of 2009 we had experienced 3 verified mortalities (all 3 by wolves) before the start of calving season, resulting in 131 elk at the end of the 2008/2009 **ELK YEAR** (an **ELK YEAR** ends at the start of the next calving season). Since calving season started May 20th we've also had 8 calves die and one yearling bull hit on Highway 77. We have also had about 40 calves born. Extrapolating these losses proportionately, and considering productivity this calving season, results in a net population estimate of **153 elk**. Balancing losses with additional collared animals, we currently have **81 elk** with functioning radio collars

Elk Calving Season

The results of the 2008 calving season demonstrated the importance of the timing of green up on calf development and survival. This year we monitored the progression of spring "green up". The snow left the Clam Lake area by mid March (earlier than normal), and ice was off area lakes by mid April. By May 5th ditches were 40-50% green, by May 8th they were 70%+ green. Aspens started leaf out on May 11th and maples on May 12th.

We began daily monitoring of potential mothers on May 18th, but were distracted by mortality signals on both the 18th and 19th. The first day of full cow monitoring was May 20th and the first day of searching was May 21st, when we found our first calf. M266 was estimated 1 day old so the new Elk Year of 2009/2010 began May 20, 2009.

From May 21st to June 9th we found 20 calves, 7 females, 12 males and 1 unknown (the bear only left a few pieces of rib and some hair). The observed sex ratio is 17 males to 10 females (171 males: 100 females). Because we lost 3 pregnant cows prior to calving we had to adjust our estimated number of calves born down to 39 calves. During calving season we lost 8 of the 20 calves found, 4 due to bears, 3 due to unknown causes and 1 due to a natural accident. The extrapolated observed loss of 40 percent resulted in an estimated loss of 16 of those 39 calves born, or 23 living calves as of June 24, 2009. No doubt we'll lose more during the next 11 months.

In addition to elk project and DNR staff (including a crew from the BWM CO), 151 volunteer searchers from the Rocky Mountain Elk Foundation, Natural Resources Foundation, Glidden and Hayward High Schools, the Fox River Environmental Academy, and various Elk supporters, local and from around the state, helped search for elk calves. Credit goes to the many helpers who gave their time, in some cases traveling hundreds of miles, to help find calves.

Partnerships

We continue to provide support to UWSP and USFS on their elk related projects. The Wisconsin Safari Club International approved on May 24, 2009, a \$25,333 grant for expansion of the motorist elk crossing warning system, contributing the "lion's share" for this project. On May 1st the RMEF Project Advisory Committee approved \$41,000 worth of Elk Project Grants, \$22,442 of elk project grants for 3 WDNR projects (\$800 for the Glidden High School monitoring of the Butternut group of elk; \$8,975 for WDNR elk monitoring of the Clam Lake Elk Herd; and \$12,667 for expansion of the motorist elk crossing warning system). The RMEF Director of Conservation, Tom Toman, approved all 3 WDNR projects on June 11, 2009. Work on the warning system expansion will begin immediately after the WI Dept. of Transportation approval of WDNR's permit applications for said project. We hope to have the project completed by November.

Research on the Clam Lake Elk Herd

Prevalence and intensity of meningeal worms (*Parelaphostrongylus tenuis*) and liver flukes (*Fascioloides magna*) in elk (*Cervus elaphus*) of northern Wisconsin: by **Trina M. Weiland**...a thesis submitted in partial fulfillment of the requirements of the degree Master of Science in Natural Resources (Wildlife), College of Natural Resources, University of Wisconsin, Stevens Point, Wisconsin, May 2008. Ms. Weiland found no eggs of meningeal worms (*P. tenuis*) in 292 elk fecal samples collected during 2006 and 2007. Her findings were that *P. tenuis* is not currently causing significant problems in the elk herd, however, she recommended continued periodic monitoring, using elk serum testing, to identify any changes to this status. Prevalence of *F. magna* eggs in elk fecal samples ranged from a low of 27.6% in summer 2007 to a high of 61.7% in winter 2007. Overall drier conditions in 2007 resulted in lower fluke intensity in 2007. Higher intensities and prevalence were observed in Winter compared to other seasons due to the several months development needed between ingestion of metacercariae (an infective dormant stage of juvenile fluke) and development of egg producing adults. Ms. Weiland also found different prevalence and intensities between different elk subgroups with high levels in the “Wayside” and 1029 groups and lower levels in the 208 elk group. She speculated that this may have been due to different habitat aspects of the areas used by these respective groups. One general characteristic between the areas used by the 208 group and the combined Wayside/1029 group is fewer residences within the 208 group and more aquatic, especially riparian habitats in the Wayside/1029 areas. In other words, the 208 group occupies areas with less of a “recreational feeding” history and with less habitats that would provide livelihood for the gastropod alternate hosts. Though higher elk losses due to meningeal worms and liver flukes were observed from 2003 through 2005, Ms. Weiland observed lower levels of intensity and prevalence of both meningeal worms and liver flukes from 2006 through 2007 and these parasites do not present a significant threat at this time. This is likely due to the high degree of cooperation by residents in the area in reducing recreational feeding of deer and elimination of elk feeding, thereby lowering the risk of mortality due to these parasites in recent years. Trina Weiland’s study results corroborates that reduction of elk parasite impacts currently observed.

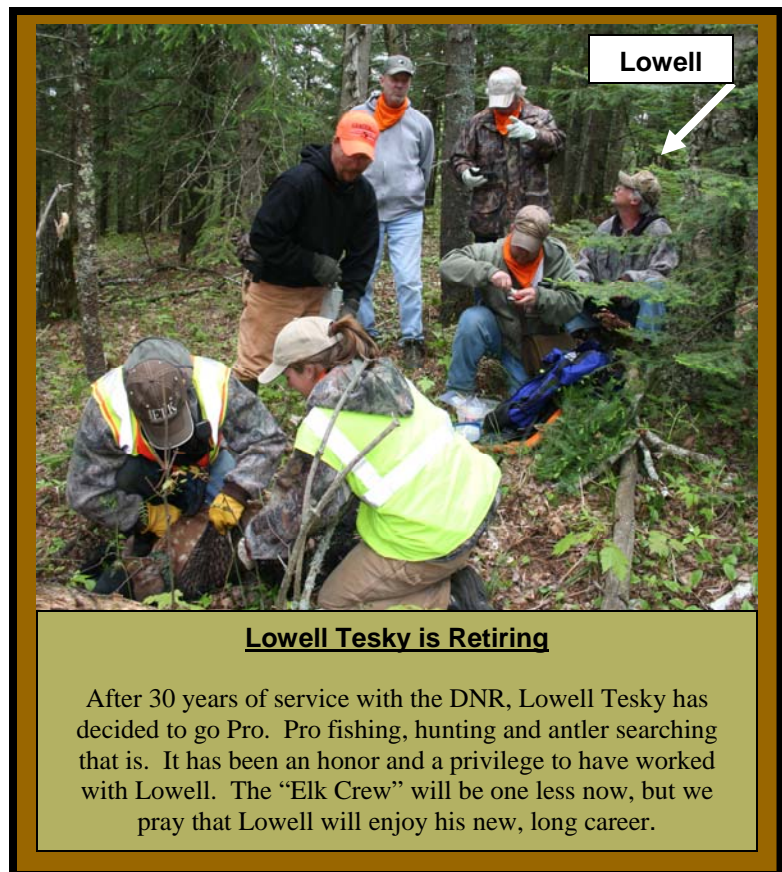
In early May we applied 100 pounds of fertilizer per acre on the 3 treatment areas of the ELF Line forage quality project. After the first significant rain fall after fertilizer application we placed 30 forage exclusion cages on treatment and control areas for biomass measurements and to measure herbivory impacts. In the next few weeks we’ll conduct a second plant composition survey, measure biomass production and submit samples to test forage quality. In the next quarter or so, we’ll analyze results and develop recommendations.

Elk Education

During this quarter we gave 21 elk presentations to a total of 869 participants. We also gave 4 print and 1 radio interviews. The new elk display was set up during the Madison Deer and Turkey Expo, the La Crosse RMEF Banquet and the Hayward Musky Festival.

Upcoming Events

We’ll be continuing work on the ELF Line forage fertilization pilot project, monitoring the 81 radio collared elk, submitting permit applications to DOT for expansion of the motorist warning system, meeting with WDNR wildlife health staff regarding elk project protocols, monitoring the 2009 elk rut, and conducting a number of elk education presentations during the upcoming quarter.



Lowell Tesky is Retiring

After 30 years of service with the DNR, Lowell Tesky has decided to go Pro. Pro fishing, hunting and antler searching that is. It has been an honor and a privilege to have worked with Lowell. The “Elk Crew” will be one less now, but we pray that Lowell will enjoy his new, long career.

Elk Health

This quarter we had verified losses of 12 elk (3 wolves, 4 bears, 1 vehicle, 1 accident, 3 unknown). The previous high quarterly observed loss was 9 during the first quarter of 2005. On May 11 we received a mortality signal for F175. It had been killed and eaten by wolves. There were no remains suitable for collection except the radio collar. F175 was 4 years old and there was a 92% probability that she had been pregnant. On May 18 we received a mortality signal for F145. It too had been killed and eaten by wolves. The kill site was 2 miles east of F175's kill site. F145 was 5 years old and there was also a 92% probability that she had been pregnant. Similar circumstances to F175. On May 19 we received a mortality signal for F125. Again, she had been killed by wolves, and again her kill site was 2 miles east of F145's kill, she was 7 years old and 92% probability that she had been pregnant. It's apparent that a wolf pack, probably the Ghost Lake Pack, has learned that pregnant cows are vulnerable during these last stages of pregnancy. All 3 animals had been with groups of cows only a day or 2 before being killed, so it is likely these groups were being tested by the wolves and these 3 cows were the losers. It is likely that their advanced pregnancy was the issue that caused the wolves to separate them from the cow/calf groups they had accompanied just before death. This is the first time we've observed this hunting behavior and success on the herd. Time will tell whether this pack regularly exploits these pregnant cows. In addition to losing these 3 prime aged cows we also lost the 3 calves they held and all future productivity from these cows and any female calves they would have produced. These facts have been factored into our current population estimate.

In addition to these losses we also lost 8 of the 20 calves we found, 4 to bears, 1 probably due to exposure (still to be determined and considered "unknown"), 1 to an accident (calf got under a dead fall and died from the struggles to release itself), and 2 from unknown causes (one whole calf recovered that will be necropsied by our wildlife health experts). Because we estimate we found half of the calves born, we've also had to extrapolate these losses 2 fold. On June 13 we lost M241 in a vehicle collision within 100 yards of a flashing yellow motorist warning light at about 3-4 am. It was apparent from the condition of the yearling bull and vehicle parts nearby that M241 had been hit by a semi-tractor unit. A local resident reported the fatally injured elk to the Sawyer County Sheriff's Department, but no accident was reported by the driver of the semi.

On June 30th we had a mortality signal for calf M273. It turned out that M273 was found in the West Fork of the Chippewa River. It is unclear what the cause of death was and because of the current in the river the mortality signal was delayed. This resulted in degradation of the carcass to the point that we did not collect it for necropsy.

THINGS TO COME:

September Bugling Season

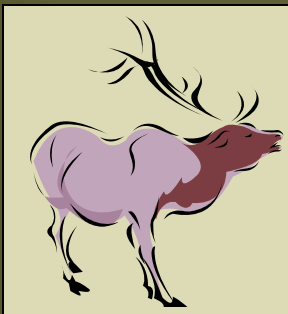
- Bulls begin to shed their velvet in mid August
- By late August some bulls begin to bugle
- Peak bugling is Sept. 10th – 20th
- Places to listen include: *4 miles east of Clam Lake to 8 miles west of Clam Lake off Hwy 77, as well as 4 miles south of Clam Lake on Cty Hwy GG.*

Note:

- Please do not chase or harass elk or any other wildlife when viewing.
- Be sure to pull completely off the highway when listening or viewing

Thank You!

**FOR MORE INFORMATION ABOUT ELK IN WISCONSIN,
PLEASE CONTACT**



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Or on our Web Site at:

<http://dnr.wi.gov/org/land/wildlife/Elk/>

