GROUND SQUIRREL CONTROL IN SOUTHWEST UTAH

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Beaver County



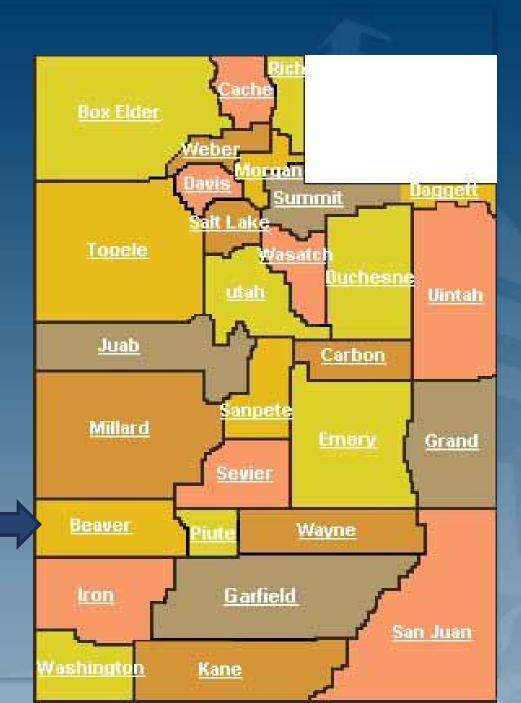
Research funded by WESTERN SARE



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Beaver County |



Beaver County

- Reaver County is a rural county with a population of 6500.
- Over 21,000 acres of alfalfa hay is raised in the county annually.
- The majority of this high quality alfalfa is sold to the dairies in southern California.



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Townsend Ground Squirrel



- Is a small gray squirrel found in Nevada and Western Utah.
- and other agronomic crops.
- They breed in March and have litters of 8-10 babies in April.

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Hundreds of acres of alfalfa ground in western Beaver County are currently infested.

The problem has increased substantially the last few years.







The squirrels are costing farmers over \$100,000 each year.

They started out just infesting the fence lines but now are covering the whole fields.

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Current control programs were not taking care of the problem.







- Once the alfalfa greens up it is hard to get the squirrels to eat the bait.
- Shooting is fun but very time consuming.
- fumigating are effective but very time consuming



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For the past two years we have held a series of public meetings to educate land owners on the best way to control the squirrels.

Dr. Terry Mesmer, USU
Extension Wildlife
Specialist, has helped us
implement a new baiting
program where we could get
better control by applying a
pre-bait and then a bait
before the alfalfa greens up.



To determine the effectiveness of the prebaiting program we set up a trial where we compared the effects of no baiting, baiting, and prebaiting.



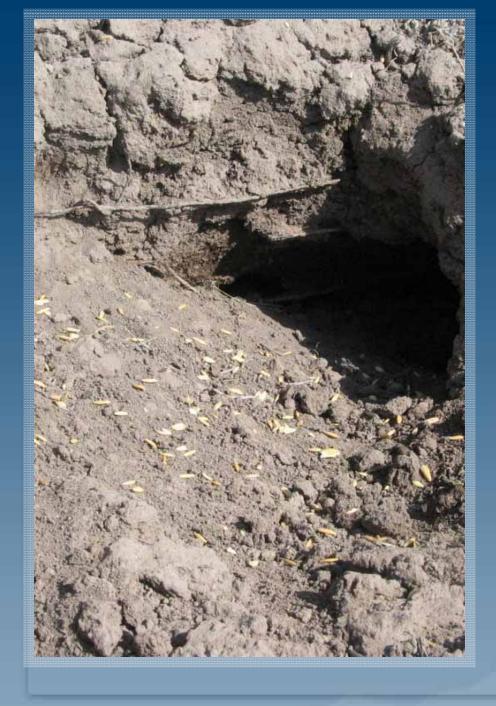






We selected 12 plots, 3 each in 4 different farmers fields. Each plot was 150 ft X 150 ft and at least 1000 ft from each other.





Each treatment consisted of a plot that was prebaited with oats and then baited with zinc phosphide,

1 plot baited with zinc phosphide without prebaiting

1 control plot that received no treatment.

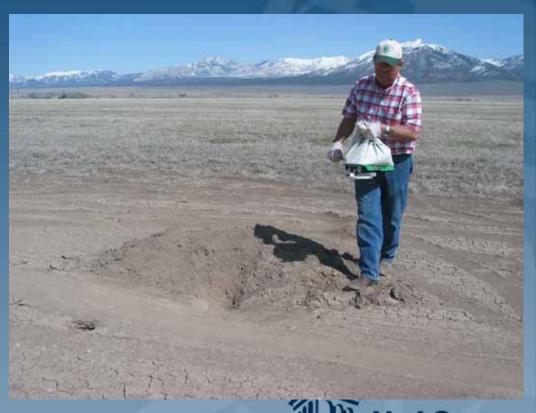
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Squirrel Observations

- each plot was observed each day for 3 days before any baiting took place
- The plots were observed for another 3 days after the treatments were applied.



bait was applied to the plots using a hand spreader.



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Farmers are able to use 4 wheelers to spread the bait quickly and effectively





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Beaver County treated all of the county right a ways







Results of the ground squirrel control trial – 2009 & 2010

	Before baiting	After Baiting	% Change
Control 2009	5.4 squirrels6.3	3.6 squirrels	33%
2010		4.3	32% 32.5
Bait Only 2009	8.3 squirrels6.3	3.4 squirrels	59%
2010		3.3	52% 55.5
Prebait – Bait 09 2010	10.7 squirrels6.9	2.7 squirrels2.3	75% 66% 71%



Follow up survey of farmers on the Milford Flat

- The farmers who returned surveys estimated that they spent over \$17,000 controlling squirrels.
- of the farmers tried the pre-baiting, baiting program.
- The majority of the farmers feel like this new baiting program really lowered the number of squirrels this past year.



