

# INFORMATION

Yukon Agriculture Branch Quarterly Bulletin

Winter 2009

Volume 22 Issue 4



## MESSAGE FROM THE AGRICULTURE BRANCH

Seasons greetings! The leaves are gone and the crops have been harvested for another year, so it's time to reflect on some of the events that marked the agriculture calendar in 2009.

For the second year in a row, a central Yukon couple were recipients of the Yukon Farmers of the Year award. Grant Dowdell and Karen Digby won this year in recognition of their terrific market garden operation. Their farm is located upstream from Dawson City on the Yukon River. The quality of the produce coming from this farm over the past thirty years or so has been a real benefit for area residents and a shining example of what local agriculture can contribute to the community.

The Farmer of the Year award was presented at the annual North of 60° Agriculture Banquet held in Whitehorse this past November. The banquet featured an array of fine Yukon grown foods. As usual, the banquet was a sell out and a great way to celebrate the end of the growing season and enjoy the harvest. During the two days leading up to the banquet, the Agriculture branch hosted a conference aimed at various aspects of growing Yukon agriculture, including new and young farmers in Yukon. Seminars on opportunities in agriculture, the agriculture land program, funding programs and adding value to primary production were presented to identify the agriculture potential that exists up here. It was a real pleasure for us to see new interest in the industry and to participate in discussions with some potential new entrants.

This fall also saw the first fall sale of services by the mobile abattoir. Even though the two for the price of one sale was only on for the month of October, we saw increased use of the abattoir's services by new producers that had never used the facility before, more use by existing producers and a record number of animals through the facility since it began operation in 2006. Watch for a spring sale coming later this May!

Other milestones in 2009 included the launch of the Growing Forward programs in April, an advanced gardening course held in Dawson through the Yukon College in May, and the development of the Dawson community gardening project. The Fireweed Community Market worked on planning its future with a detailed participant survey and 4-H has added new clubs. These are just a few items of note in another busy year.

On behalf of all of us at the Agriculture branch, we wish you a festive close to 2009 and all the best in the coming new year.

Tony Hill  
Director  
Agriculture Branch

N60 AGRICULTURE CONFERENCE	2
FARMER OF THE YEAR	3
ALASKA PRODUCTION STATS	4
GROWING FORWARD FUNDING	5
WINTER FARM MANAGEMENT	6
YUKON AGRICULTURE LAND DISPOSITIONS	9
CLASSIFIEDS	10
ANNOUNCEMENTS	10

MERRY CHRISTMAS TO ALL

## NORTH OF 60 AGRICULTURE CONFERENCE 2009

FRIDAY, NOVEMBER 6 AND SATURDAY, NOVEMBER 7, 2009  
HIGH COUNTRY INN, WHITEHORSE

## GROWING YUKON AGRICULTURE

I've been with the Agriculture Branch for a few years now and I have never seen a room as packed as the Saturday afternoon at the High Country Inn. It was quite a weekend.

All day Friday we had Gary Morton over from Nova Scotia to present the Canadian Farm Business Management Council's Value Plus workshop. Gary had some great suggestions to diversify the farm, including 60 or so ways to use a squash. Gary looked at examples from throughout Canada of on-farm value adding. If you want to learn more from Gary join him February 22 on Agriwebinar.com for an online presentation on adding new value to your farm. Agriwebinar.com is a convenient website where you can listen to speakers on a whole range of agriculture topics.

Saturday kicked off with a New and Young Farmers forum. This workshop examined some of the opportunities available to farmers in Yukon. Presentations from David Murray, Tony Hill, Bradley Barton and guest speakers Melissa Dumont and Danielle Vinette helped provide context for the industry on what can be done.

Melissa Dumont from the Canadian Farm Business Management Council joined the discussion to inform everyone of the Step-Up Program. The program provides opportunities for on-farm internships in various regions across Canada. The Canadian Farm Business Management Council has a range of expertise including assistance with transition and farm succession. They also host the Agriwebinar.com website noted above.

Danielle Vinette presented AgriTalent.ca, a new website launched to promote opportunities in agriculture from coast to coast (to coast). This resource provides concise listings of training and learning programs in agriculture offered across Canada. It was developed for producers, farm managers and other workers in the agriculture sector, as well as those without any agricultural experience but seeking learning opportunities.

In the afternoon, we reviewed the Growing Forward initiatives (see page 5 for more information on the programs). All of the information is available online at [www.agriculture.gov.yk.ca](http://www.agriculture.gov.yk.ca).

The conference finished off with a greenhouse technologies workshop with guest speakers from Alaska and Yukon.

Meriam Karlsson of the University of Alaska provided a detailed overview of site locations, lighting, heat retention, and plastic coverings. She also provided information about the Chena Hot Springs Resort and their use of the geothermal heating to produce heat for the greenhouse and electricity for lighting. Electricity use is the single most expensive component of greenhouse production into the shoulder seasons. The system created at Chena Hot Springs is a great option to expand production into the shoulder seasons and throughout the year.

For more information go to [www.chenahotsprings.com](http://www.chenahotsprings.com).

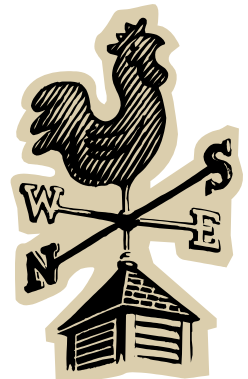
Roy Ness provided information on backyard greenhouse production, detailing some of the crops he grows in the greenhouse and different methods of production.

Bob Sharp provided an overview of the heat retention system he uses in his greenhouse. Bob uses a system of pipes and 45 gallon drums to heat water and move it through the greenhouse, helping to cool the greenhouse during the day and warm the greenhouse at night.

Saturday's evening Yukon Grown Banquet was very well attended. Foods were supplied by a range of Yukon farmers - Circle D Ranch supplied the elk hip and sausage; Yukon Grain Farm supplied the potatoes, autumn roots and kale; Lendrum/Ross farm supplied the goat meat and feta, halloumi and chevre cheeses; Icy Waters supplied the char; and the Alpine bakery supplied the organic breads. The evening's music was supplied by the Andrea McColeman Trio. The banquet is always a great opportunity to catch up with folks and see how the year went on.

It was a great conference, thanks to everyone who attended.

Matt Ball



## NORTH OF 60 AGRICULTURE CONFERENCE 2009

## FARMER OF THE YEAR FOR 2009

GRANT DOWDELL AND  
KAREN DIGBY

During the Agriculture Banquet on Saturday evening, Archie Lang, Minister for Energy, Mines and Resources presented this year's Farmer of the Year award to Grant Dowdell and Karen Digby.

The following is an excerpt from a letter of nomination by Joanne Jackson Johnson.

*I feel that Grant is long overdue for this award. He has been farming for almost thirty years on an island about 8 miles upriver from Dawson City, having first cleared the land, mostly by hand.*

*I had heard about the farm from Yukoners, and was very interested to see it. I got the chance in 2005, when Brian Lendrum, Susan Ross and I went for a visit. My impression of it falls into the category of "died and gone to Heaven, utterly blew me away," etc. I couldn't have imagined such a place. It was August and the crops were at their harvestable best. I got a tour of the three or so acres and saw Klondike sized cabbages, broccoli, carrots, even zucchini and corn growing outside. There was also a fabulous greenhouse (with its own water tower) full of tomatoes, cukes and eggplant. On the Sunday evening we helped Grant harvest carrots, cauliflower, beets, and zucchini for the Dawson stores and restaurants. They would be loaded that evening and taken to town in the "big" boat the next morning.*

*Since that year, Grant has teamed up with Karen Digby who brought goats onto the island, providing manure, and she also brought an expertise for growing flowers. Her bouquets now grace all of the hotels in town. The pair, who attend the Saturday markets on the waterfront, as well as supplying restaurants and grocery stores, are one of the best examples of farmers supplying a local market in the Yukon. In 2007 I ordered a couple of cabbages from them to make sauerkraut. When I picked them up on a trip to Dawson in August, I found that two cabbages totaled eighteen pounds!*

Congratulations to you both.



Karen Digby with a beautiful bouquet



Harvest from their farm

**PRODUCTION IN ALASKA**RANKING OF MARKET VALUE OF AGRICULTURE PRODUCTS SOLD  
FROM THE 2007 CENSUS

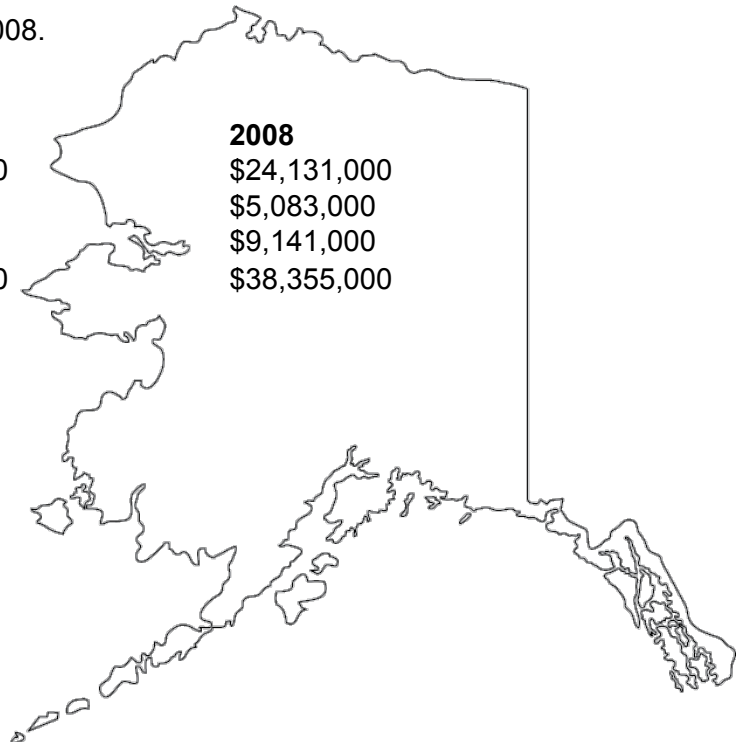
Item	Farms	Sales (\$)	Total Sales (%)
Total sales	686	57,019,000	100
Aquaculture	51	28,540,000	50.1
Nursery, greenhouse, floriculture and sod	138	15,478,000	27.1
Other crops and hay	201	4,328,000	7.6
Vegetables, melons, potatoes and sweet potatoes	95	4,281,000	7.5
Milk and other dairy products from cows	7	1,487,000	2.6
Cattle and calves	75	768,000	1.3
Other animals and other animal products	66	731,000	1.3
Grains, oilseeds, dry beans and dry peas	21	587,000	1.0
Horses, ponies, mules, burros and donkeys	44	247,000	0.4
Hogs and pigs	50	242,000	0.4
Poultry and eggs	88	207,000	0.4
Fruits, tree nuts, and berries	41	75,000	0.1
Sheep, goats and their products	40	48,000	0.1

The Alaska Division of Agriculture reported a total of 35 organic farms in the state. By completing a first ever Organic Production Survey, the United States Department of Agriculture (USDA) will gather additional data on how the growth of organic farming is changing the face of agriculture. The results of the survey will be released in February of 2010. (From Alaska Farm Reporter, USDA, Alaska field office, August 20, 2009)

More information is available online through United States Department of Agriculture, National Agriculture Statistics Service at [www.agcensus.usda.gov](http://www.agcensus.usda.gov).

There are 680 farms listed in Alaska in both 2007 and 2008.  
The gross farm sales breakdown as follows:

	<b>2007</b>	<b>2008</b>
Final crop output	\$27,347,000	\$24,131,000
Final animal output	\$6,677,000	\$5,083,000
Services and forestry	\$7,759,000	\$9,141,000
Final agricultural sector output	\$41,782,000	\$38,355,000



## GROWING FORWARD - FUNDING FOR YOUR FARM



Winter is about the best time to look over the funding available through the Canada-Yukon Growing Forward Agreement. This funding agreement was signed in April of 2009 and has a number of programs to help you on the farm.

All of the programs and details are available online at [www.agriculture.gov.yk.ca](http://www.agriculture.gov.yk.ca).

In this issue we'll highlight the **Market Development Initiative**.

This initiative provides resources to investigate and capture new market opportunities and enhance the competitive capability of the industry.

#### Eligible activities

Activities may include, but are not limited to:

- marketing and agri-food promotional activities;
- market development strategies;
- participation in marketing events;
- supporting marketing organizations including farmers' markets and agri-tourism ventures.

#### Eligible costs

Costs may include, but are not limited to:

- consultant fees;
- development and design of brochures, logos, labels, signage and packaging;
- cooperative farm market venues;
- travel costs and participation fees at marketing events;

- other costs associated with market development strategies and agriculture awareness activities.

#### Eligible applicants

Individuals, farm groups, cooperatives, non-profit organizations and governments.

#### Eligible funding

Assistance may be provided for up to 50% of the actual project costs for individuals, up to 75% of the actual costs for farm groups or cooperatives, and up to 100% of the actual project costs for government and non-profit organizations.

Looking to explore new markets for your farm products?

Through **Growing Forward**, the Government of Canada and the Government of Yukon are providing funding to investigate and capture new market opportunities as well as to enhance the competitiveness of your farm.

Visit [www.agriculture.gov.yk.ca](http://www.agriculture.gov.yk.ca) or pick up your programming guide today to learn more.

**Growing Forward**  
Expanding agriculture markets in Yukon

WINTER FARM MANAGEMENT

TRAPPING SNOW MOISTURE

Trapping snow can be an important tool in replenishing soil moisture.

Planning for winter starts right at harvest by manipulating crop stubble to trap more snow. Several methods of snow management are inexpensive and do not disrupt harvesting operations.

Uniform standing stubble is the simplest method of snow trapping. The higher the stubble, the greater the potential to trap snow. A uniform standing stubble also reduces evaporation of soil water in the spring before seeding. Straw deflectors and clippers have been developed to leave strips of taller crop when swathing. Where double swathing is practiced, every second pass can be cut higher and laid onto the first swath. The resulting high-low stubble pattern will increase the winter snow catch.

Where the crop is very short, leaving unharvested strips one foot wide every swath width will improve snow catch significantly.

Long-term research has recorded average gains of about 13 mm (half an inch) of extra water from snow trapping per year (data from Agriculture and Agri-Food Canada).

Field shelterbelts can also be used to reduce evaporation and trap snow. Since the zone of protection provided by a single shelterbelt is limited, a series of shelterbelts is required to protect the whole field and are planted perpendicular to the direction of the prevailing wind. In Alberta, two to four rows are commonly planted per quarter section (approximately 160 acres).

Snow fences can also be used instead of trees where the soils are

too shallow to support tree growth. A fence of boards, steel slats or even baled straw can provide some snow trapping benefit.

The height of the fence will determine the amount of snow collected; the higher the fence, the greater the snow collection. The porosity of the fence will determine the geometry of the snow accumulation. A solid wall will have a large snow accumulation on the windward side and very little snow on the leeward side with an area of air turbulence. A porous fence will allow snow to drift through to accumulate on the leeward side.

A snow fence constructed of horizontal boards having a 50% porosity is 25% more efficient than one constructed of vertical boards.

Ridges can also be used to trap snow, however, this practice is not widely used. The ridges can be formed mechanically, perpendicular to the prevailing winds. The effect is the same as a solid fence. If the ridge does not consolidate after plowing, it can be eroded by wind and melting snow.

continued on next page ...

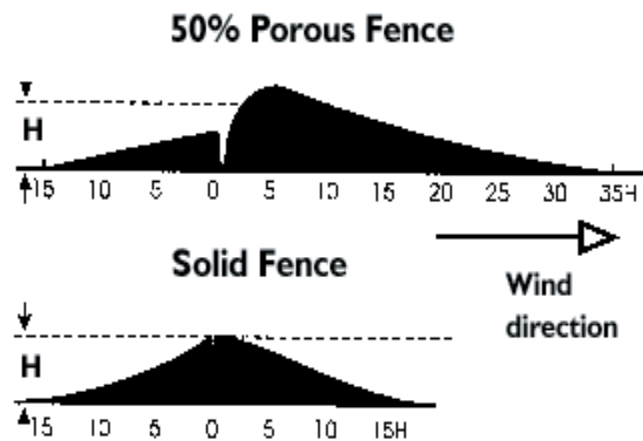
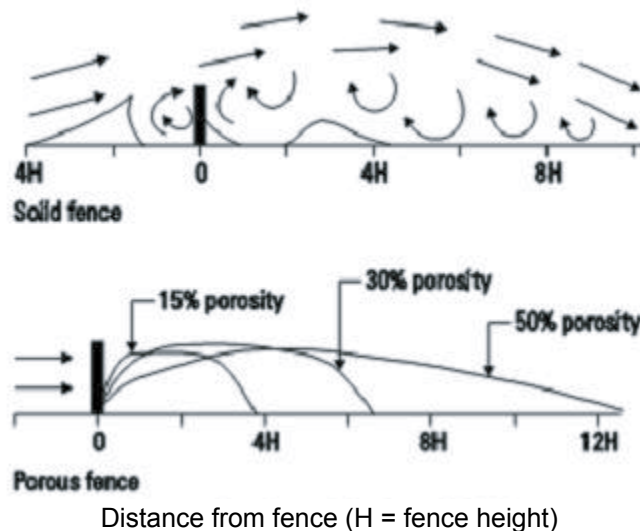


Figure from PFRA



Snow drifting due to solid and porous snow fences. Figure from BC Agriculture, Food and Fisheries.

## WINTER FARM MANAGEMENT

**Trapping Water to Increase Water Supply of Dugouts**

The water supply of some surface water dugouts can be enhanced using effectively placed snow fences. For most small water storage projects such as dugouts, the water supply is almost entirely based on snowmelt runoff. Design and installation for snow fences used to trap snow are as follows:

- 1) Snow fence type – The Wyoming style snow fence is the most effective, using horizontal boards with spacings equal to the width of the board.
- 2) Snow fence height – In general, a snow fence should be 2 – 2.5 metres (roughly 6.5 feet – 8 feet) depending on the type of the fence.

3) Location – The snow fence should be on the upwind side, so that the trapped snow is deposited in the dugout.

4) Filling the snow fence with snow – The upwind fetch length of the dugout should be sufficient to fill the snow fence with snow. The fetch is the length of the area serving as a source of blowing snow to a downstream location.

5) Gaps – A gap of 10% – 15% of the total snow fence height between the ground and fence should be maintained. This reduces the tendency of the fence to be buried.

*Adapted from:*

*Government of Alberta, Agriculture and Rural Development - [http://www1.agric.gov.ab.ca/\\$department/deptdocs.nsf/all/agdex2073](http://www1.agric.gov.ab.ca/$department/deptdocs.nsf/all/agdex2073)*

*Agriculture and Agri-Food Canada - [http://www.agr.gc.ca/pfra/drought/info/snowfence\\_e.htm](http://www.agr.gc.ca/pfra/drought/info/snowfence_e.htm)*

*University of Idaho - <http://www.cnr.uidaho.edu/extforest/January,%202009.htm>*

*Fencing Factsheet. BC Agriculture, Food and Fisheries. <http://www.agf.gov.bc.ca/resmgmt/publist/300Series/307230-1.pdf>*

*Snow Capture by Crop Residues. Donald K. McCool, Brenton S. Sharratt, John R. Morse. United States Department of Agriculture, Pullman Washington. [Encyclopedia of Water Science](#).*



A second cut being taken off of a farm in the Takhini Valley last summer.

## WINTER FARM MANAGEMENT

## SNOW AS A WATER SOURCE FOR WINTERING BEEF CATTLE

**Introduction**

The University of Alberta has conducted several studies and has found that there is no increase in energy use or need for increased feeding when using snow as a water source. The heat provided through feed digestion appears to be sufficient to melt snow and warm the resulting water to body temperature.

Studies conducted in 1980 compared the performance of cows given:

- 1) continuous water (from a heated bowl)
- 2) restricted water (access to a heated bowl for a 15 minute period immediately following feeding)
- 3) snow only (no access to liquid water)

The trial ran from the first snowfall that remained on the ground (January 9th) to March 19th, 1980. All cows were fed a diet of half timothy hay and half barley grain. There were no differences in cow live weight or in fat depth among the three groups. A similar study at the same time with a smaller number of cows showed no difference in urine chemistry, rectal temperature or total water turnover among the three groups.

The two trials indicated:

- Cows consuming only snow as a water source showed no signs of major physical stress;
- Snow consumption caused no increase in energy required to maintain body weight; and,

- Calves ate their daily feed at a slower rate than calves with access to water. They tended to eat more frequently during the day and alternated feeding with snow intake. Animals provided with water tended to drink only once or twice a day.

**Management of Snow Fed Cows**

Careful management of snow feeding is essential to maintain the health and welfare of the cattle.

There are a few points to take into consideration:

- Snow as the only water source is not recommended for lactating cows or those in poor body condition.
- An alternate water source must be in place if snow conditions change.
- Snow must be clean and easily accessible. Ice crusted, wind blown and trampled snow are not considered adequate.
- It takes about 10 cm of snow to get 1 cm of water. Feed intake for a mature cow should be between 2 and 2.5 percent of body weight. A drop in feed consumption could indicate insufficient water intake.
- Consider the amount of snowfall and openness of fields. A large open space with no wind protection will result in wind-blown snow which is not easily accessible to cattle.
- Cows in pens or confined to small fields may not have a sufficient supply of snow to act as a water source.



- Ensure cows are receiving a well balanced ration. Poorly fed cattle will be prone to rumen compaction, regardless of water source.
- Discuss snow feeding with someone who has experience. Be well informed.

**Behaviour Changes with Snow Feeding**

Eating snow is a learned behaviour. It can take four to five days for all cows to become snow eaters. Be prepared for restlessness and bellowing. Novice snow eaters will adapt faster if they are with animals who have become accustomed to snow. Some changes in feeding and drinking patterns have been noted when cattle are not given access to water. If bellowing and restlessness persist after four or five days, there is need to re-evaluate the situation.

*Adapted from: Snow as a Water Source for Wintering Beef Cattle. Manitoba Agriculture, Food and Rural Initiatives.*



## AGRICULTURAL LAND DISPOSITIONS

### AGRICULTURE LAND DISPOSITION CONTINUES AT A CONSISTENT RATE

Year after year, the average number of agreements for sale issued for Yukon agricultural land has been 10 to 12. At the same time, the average number of titles issued has also been 10 to 12. This can be interpreted to mean that each year, we have about 10 to 12 new agricultural land development projects, and 10 to 12 completed projects. This trend has been consistent for over 20 years.

#### The 2008 calendar year

Number of Agreements for Sale issued: 12  
 Total disposition area: 352 ha  
 Number of agricultural titles: 13  
 Total titled area: 638 ha

#### 2009 (to the end of November)

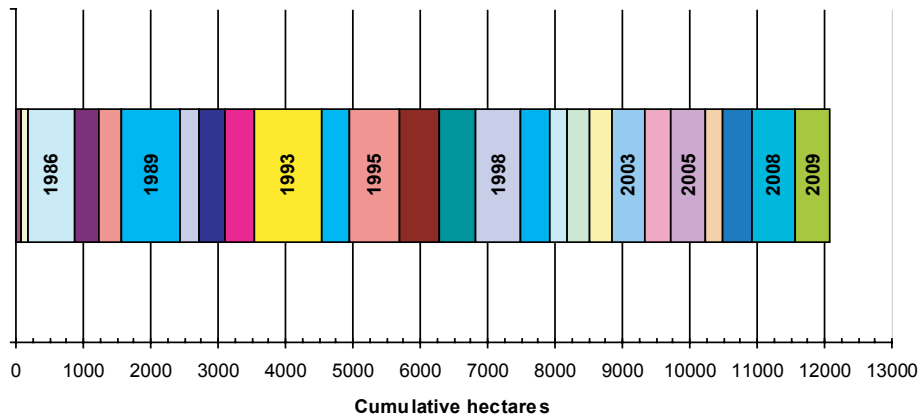
Number of Agreement for Sale issued: 11  
 Total disposition area: 416 ha  
 Number of agricultural titles: 10  
 Total titled area: 506 ha

The average parcel size based on the data of the past many years is approximately 40 hectares (100 acres).

Year	Titles	Size (ha)
1983	1	8
1984	2	68
1985	4	95
1986	14	699
1987	11	357
1988	10	347
1989	17	853
1990	8	291
1991	12	390
1992	9	421
1993	25	1,017
1994	12	400
1995	15	742
1996	14	606
1997	14	538
1998	13	657
1999	9	446
2000	8	241
2001	11	328
2002	15	350
2003	14	490
2004	9	371
2005	10	528
2006	7	249
2007	13	437
2008	13	638
2009	11	555
<b>Total</b>	<b>300</b>	<b>12,122</b>

**Total 29,819 Acres**

Below is a graph that shows the cumulative hectares released through the Yukon Agricultural Land Program from 1983 to the end of November 2009. Neither this graph nor the table above show the agriculture titles released through the federal land program that predated 1983.



## CLASSIFIEDS



## HAY

Yukon grown hay, clean timothy brome mix, stored inside.  
Phone: (867) 393-3477

## HEAVY EQUIPMENT

UNIFOREST winch, 6 ton hydraulic skidding winch with remote control and PTO shaft, 80m 1/2" cable with 5 jocker hooks. \$6,500  
Phone: (867) 660-4124

Rock-O-Matic TM12  
12' Rock Picker, \$3,000 OBO  
Phone: (867) 667-2252

## MISC

6 boxes of 28,000 lb baling twine. \$90 will deliver.  
Contact Merv.  
Phone: (867) 634-2666

2" Banjo poly self-priming centrifugal pump with 6 HP Briggs engine. 11700 GPH and has never been used. Cost \$600 new, for sale \$300 OBO.  
Phone: (867) 633-4379

## THREE-LEGGED CHICKEN

Fred was driving down the Burma road when suddenly a chicken darted on to the road in front of him. He slammed on his brakes, but realized that the chicken was speeding off down the road at about 50 kilometers per hour. Intrigued, he tried to follow the bird in his truck, but he couldn't catch up to the chicken. Seeing it turn into a small farm, Fred followed it. To his astonishment, he realized that the chicken had three legs. Looking around the small farm, he noticed that every one of the chickens had three legs.

The farmer came out of his house, and Fred said, "Three-legged chickens? That's astonishing!"

The farmer replied, "Yep. I bred them that way because I love drumsticks."

Fred was curious. "How does a three-legged chicken taste?"

The farmer smiled. "Dunno. Haven't been able to catch one yet."

## ANNOUNCEMENTS

## RENTAL EQUIPMENT

Yukon Agriculture Association has a new no till seed drill and an aerator available for rent. For more information contact the Yukon Agricultural Association (867) 668-6864 or admin@yukonag.ca

## ORGANIC VERIFICATION OFFICER

Seeking an individual with membership in the International Organic Inspector Association (IOIA). If you are interested please contact Claire (867) 393-1949 or Matt at the Agriculture Branch.



Season's greetings from the Agriculture Branch

## InFARMation is:

A Government of Yukon newsletter published by the Department of Energy, Mines and Resources, Agriculture Branch. If you would like to add or remove your name from the newsletter mailing list, comment on an article or contribute a story, please feel free to contact us.

## Agriculture Branch Contact Information:

Energy, Mines and Resources,  
Agriculture Branch  
P.O. Box 2703, Whitehorse, YT, Y1A 2C6

(867) 667-5838 | Fax: (867) 393-6222  
toll-free outside of Whitehorse  
1-800-661-0408 ext. 5838

E-mail: agriculture@gov.yk.ca

Online: www.agriculture.gov.yk.ca

Visit: Agriculture Branch on the third floor, room 320 of the Elijah Smith Building, 300 Main Street in Whitehorse.