

Teslin Lake Bird Banding Station Final Report 2006



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ABSTRACT

The Teslin Lake Bird Banding Station operated during both the spring and fall migration seasons during 2006. The station operated for 30 days from April 16th to June 11th. Over this time period, 802 birds of 48 species were banded and 94 species were observed. During the fall season, the station was operated for 6 days from July 14th to September 3rd. Over this time period, 115 birds of 21 species were banded. The station continues to add to the knowledge of migratory birds in the Teslin region. Aside from gathering biological data, the station has also been successful in providing a unique educational opportunity for visitors of all ages. The station received a total of 113 volunteer hours by individuals assisting in the operation of the station. In addition, 97 visitor hours took place by individuals not assisting with the stations operation, but touring the area and learning about bird banding and bird migration in general.

Cover Photos

Clockwise from upper left; Bohemian Waxwing, Hermit Thrush, male Blackpoll Warbler, male Common Redpoll

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1.0 Introduction

The Teslin Lake Bird Banding Station operated during the spring and fall migrations in 2006. During the fall migration season, operation was limited to 6 days placed sporadically throughout the fall season. The station completed its second year of operation largely due to financial assistance from several government and non-government agencies including Environment Yukon, Canadian Wildlife Service, Northern Research Institute, Lotteries Yukon and the Yukon Bird Club.

The goals of the Teslin Lake Bird Banding Station were to:

- Continue to gather baseline information on birds and bird migration in the Teslin region including specific studies such as feather collecting for DNA analysis and color banding.
- Provide a setting for the public including school groups to learn about birds and bird migration.
- Provide employment and training opportunities for students and volunteers.
- Provide a unique tourist attraction in the community of Teslin.

The banding station serves as a method of carrying out research on birds which is shared through an international database. This is due to the possibility of a banded bird being recaptured across international borders. Many of the birds banded at Teslin Lake are highly migratory spending the winter months as far south as Central and South America. The station also plays a role in education as a place where the public, volunteers and students can take part in a unique, community based research project.

2.0 Methods

Methods of data collection and mist netting were based upon those of the Canadian Migration Monitoring Network (CMMN).

2.1 Study Site

During the 2005 season, the banding station was located on the shoreline on Nisutlin Bay; however, issues associated with the site as a suitable study site led to a new site in 2006. The new site was located on 10 Mile point approximately 10 km northwest of the community of Teslin. The banding station was located in the vegetated riparian zone between Teslin Lake and the Teslin Government Campground.

The vegetation within the site is a mixture featuring a transition from bare gravel lakeshore to shrubs and larger deciduous trees. Also within the site is a small wetland area connected to Teslin Lake which greatly fluctuating water levels. The area is dominated by willow (*Salix* sp.) and alder (*Alnus* sp.) with some mature white spruce (*Picea glauca*), trembling aspen (*Populus tremuloides*) and balsam poplar (*P. balsamifera*) scattered throughout.

2.2 General Methods

The 2006 season was divided into the spring and fall. The spring season began on April 16th, 2006 and finished on June 11th, 2006. The fall season was run sporadically for 6 days between July 14th and September 3rd. Mist nets were used for capturing birds during the spring and fall seasons. Twenty mist nets were used this year as this number has been set as the standard number to be used in future years of operation.

Mist nets were checked for birds every 15 - 30 minutes (depending on bird activity) and birds caught were placed in holding bags and returned to the banding lab. Birds were banded and the following data was collected (if possible):

- species
- band number
- age and criteria used
- sex and criteria used
- un-flattened wing chord
- weight
- fat score (5 point scale)
- status
- date
- time
- location banded
- bander's initials
- trap used
- net captured in
- molt information
- additional comments
- cap presence and length
- tail length, primary projection, bill size, tarsus (flycatchers only)

All age and sex determinations were made according to the Identification guide to North American Birds (Pyle 1997). For measuring the wing length a wing ruler was used with 0.5 mm denominations. Some anatomical measures such as tarsus, and cap length were measured using DiaMax calipers.

Birds were processed as quickly as possible and were released if showing signs of stress. Mist nets were closed upon the onset of inclement weather or when too many birds were captured to allow timely processing. The overall number of net hours per day was variable during both the spring and fall seasons due to inconsistent weather conditions and the amount of manpower available to assist in banding. All birds captured that were previously banded were also processed. For these birds, limited information was gathered to facilitate a faster release.

The weather conditions were recorded twice a day, once at the beginning of the day and once at the end of the day. Information collected at these times included temperature, wind direction and strength, cloud coverage, visibility and precipitation. For every day of operation, an estimated daily total was calculated for every species encountered. This calculation was conducted using the following formula (Estimated Total (ET) = # banded + # recaptured + # observed/heard).

3.0 Results

During the spring season, the station was operated¹ for 30 days from April 16th to June 11th. Over this time period, 802 birds of 48 species were banded (Table 2, Figure 1) and 94 species were observed (Table 3). During the fall season, the station was operated for 6 days sporadically from July 14th to September 3rd. Over this time period, 115 birds of 21 species were banded (Table 2, Figure 2). The effort (net hours) and capture per unit effort (birds per net hour) for the 2006 season can be found below in Table 1 and Figure 4. For a detailed description of each species banded, refer to Appendix 1 and 2. Note that due to a lack of sufficient data, the majority of the figures displayed in this section are focused primarily on the spring season.

¹ Days of operation are defined as days where mist netting was conducted. In addition to these days, observations were taken on days where the weather did not allow mist netting.

Table 1. Net hours and capture per unit effort during the spring and fall of 2006.

Season	Birds Captured	Effort (net hours)	Capture / 100 net hours
Spring	802	2050	39.12
Fall	115	275	41.82
TOTAL	917	2325	39.44

Table 2. Birds banded during the spring and fall of 2006.

SPECIES	# Banded		SPECIES	# Banded	
	Spring	Fall		Spring	Fall
Alder Flycatcher	38	18	Olive-sided Flycatcher	11	
American Pipit	2		Orange Crowned Warbler	25	1
American Redstart	6	4	Pine Grosbeak	2	
American Robin	35	5	Pine Siskin	1	
American Tree Sparrow	13	1	Purple Finch	3	
Belted Kingfisher		8	Red-winged Blackbird	1	
Black Capped Chickadee	4	3	Ruby Crowned Kinglet	51	3
Blackpoll Warbler	21	4	Rusty Blackbird	3	
Bohemian Waxwing	40		Savannah Sparrow	2	2
Boreal Chickadee	3		Say's Phoebe	2	
Brewer's Sparrow		1	Solitary Sandpiper		2
Chipping Sparrow	3		Spotted Sandpiper	2	
Common Redpoll	107		Swainson's Thrush	35	10
Common Yellowthroat	17	4	Tennessee Warbler	4	
Dark Eyed Junco	137	5	Warbling Vireo	1	4
Eastern Phoebe	1		Western Tanager	1	
Fox Sparrow	3		Western Wood-pewee	2	
Gray-cheeked Thrush	2		White Crowned Sparrow	13	
Hammonds Flycatcher	5		White Winged Crossbill	5	
Hermit Thrush	1		Wilson's Warbler	54	5
Horned Lark	3		Varied Thrush	1	
Hybrid Chickadee	1		Yellow-bellied Flycatcher	1	
Least Flycatcher	4		Yellow-bellied Sapsucker	2	
Lincoln's Sparrow	6	1	Yellow Warbler	50	19
MacGillvary's Warbler	1		Total Individuals	802	115
Myrtle Warbler	63	5	Total Species	48	21
Northern Waterthrush	14	10			

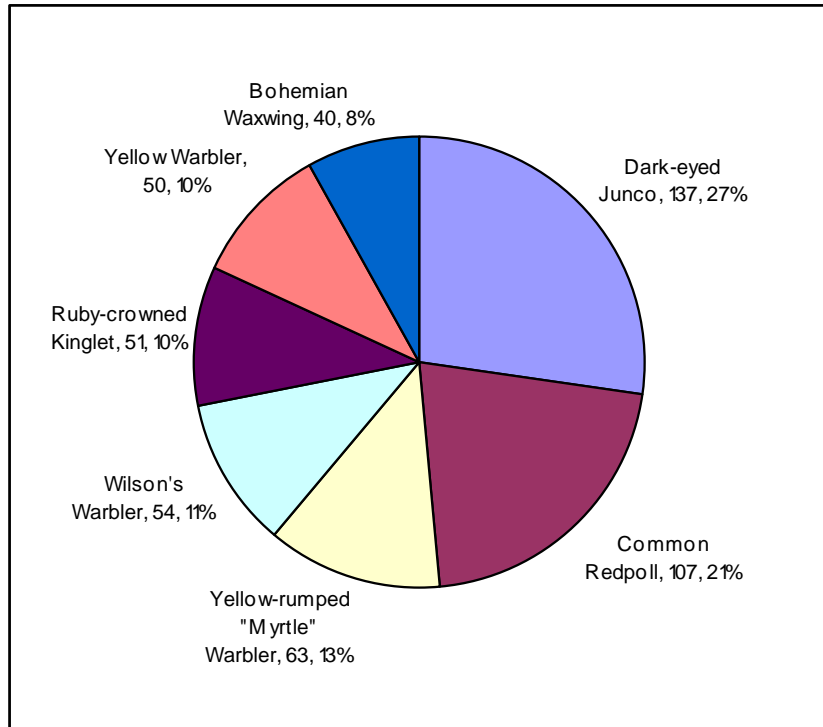


Figure 1. Composition of species banded during the spring season of 2006.

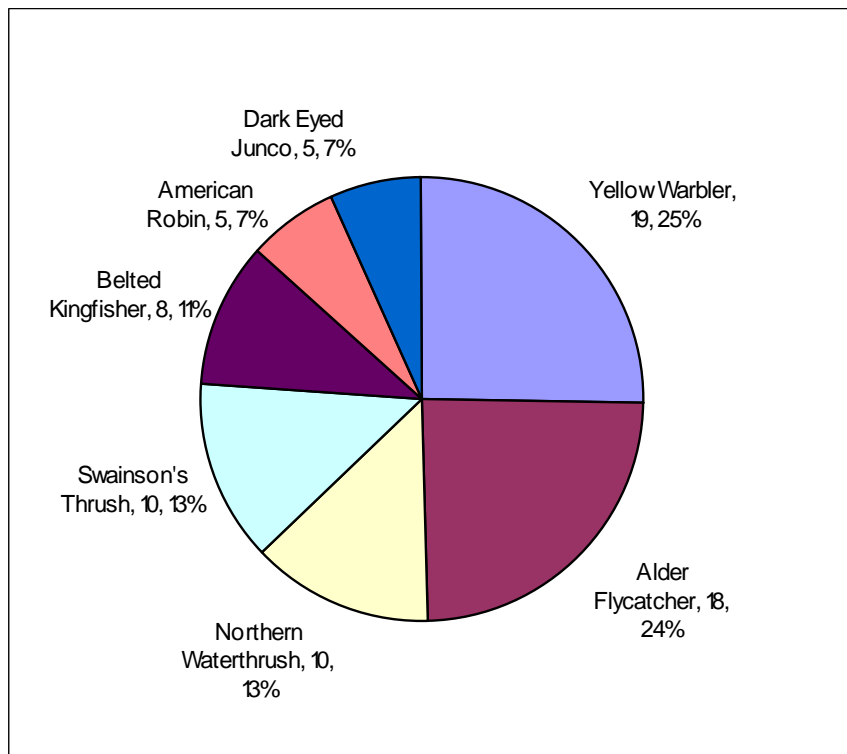


Figure 2. Composition of species banded during the fall season of 2006.

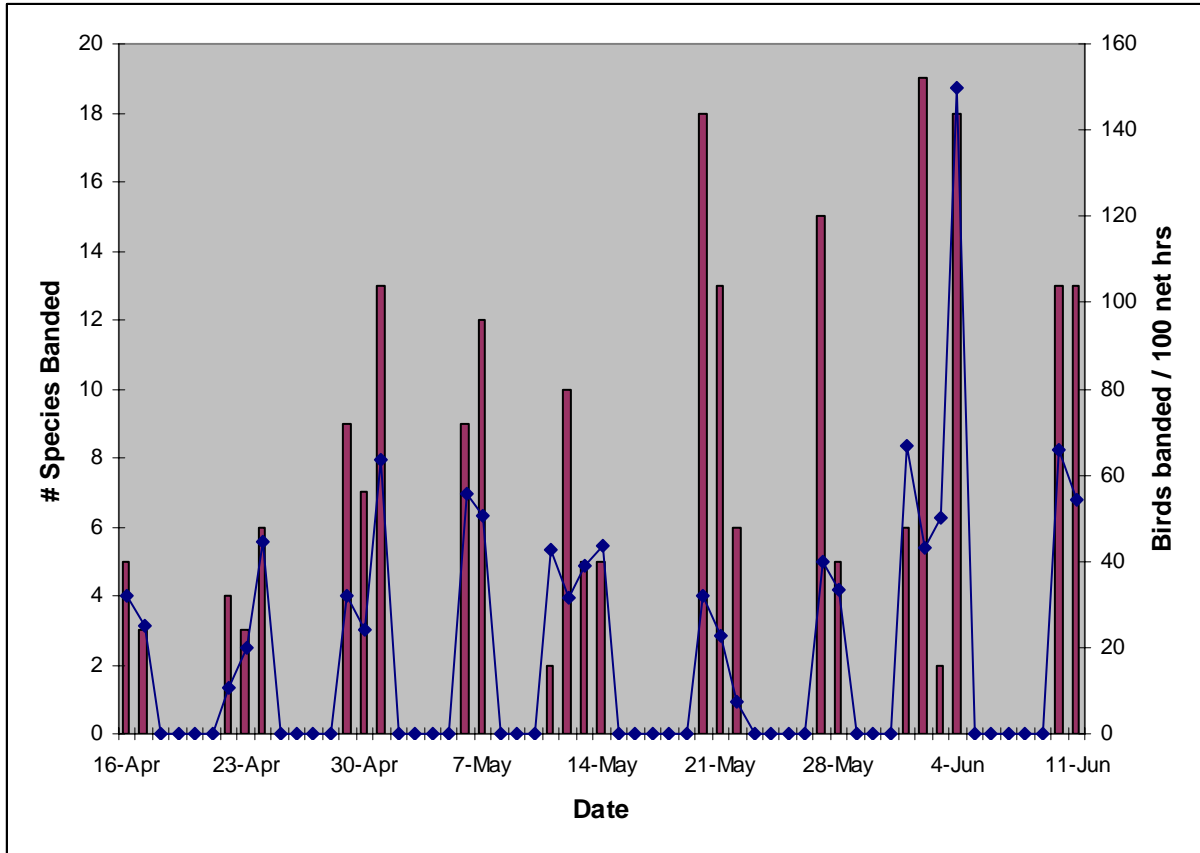


Figure 3. Summary of species banded and birds / 100 net hours during the spring of 2006.

Table 3. Observations of birds during the spring season of 2006.

Species	Bird Days	# days recorded	Species	Bird Days	# days recorded	Species	Bird Days	# days recorded
Common Loon	22	11	Yellow Bellied Sapsucker	29	15	Western Tanager	1	1
Red-necked Grebe	11	6	Downy Woodpecker	3	3	Bohemian Waxwing	223	19
Greater White Fronted Goose	6	2	Hairy Woodpecker	16	14	Tennessee Warbler	11	6
Canada Goose	68	8	Northern Flicker	32	14	Orange Crowned Warbler	55	16
Trumpeter Swan	20	5	Olive Sided Flycatcher	38	8	Yellow Warbler	141	12
Tundra Swan	6	2	Western Wood Pewee	4	3	Myrtle Warbler	198	21
American Wigeon	2	2	Yellow Bellied Flycatcher	1	1	Townsend's Warbler	1	1
Mallard	8	4	Alder Flycatcher	50	8	Blackpoll Warbler	46	7
Green Winged Teal	2	2	Least Flycatcher	7	6	Northern Waterthrush	62	12
Common Goldeneye	24	5	Hammond's Flycatcher	55	16	MacGillivray's Warbler	2	3
Unidentified Goldeneye	45	6	Say's Phoebe	5	5	American Redstart	12	5
Common Merganser	158	13	Eastern Phoebe	1	1	Common Yellowthroat	53	9
Red-breasted Merganser	16	5	Warbling Vireo	7	6	Wilson's Warbler	124	14
Osprey	1	1	Gray Jay	6	7	American Tree Sparrow	25	9
Bald Eagle	12	10	Common Raven	47	26	Chipping Sparrow	10	5
Northern Harrier	28	12	Horned Lark	36	4	Savannah Sparrow	10	8
Sharp-shinned Hawk	2	3	Tree Swallow	48	13	Fox Sparrow	16	6
Red Tailed Hawk	2	2	Violet Green Swallow	20	8	Lincoln's Sparrow	22	13
Ruffed Grouse	47	24	Bank Swallow	6	3	White Crowned Sparrow	46	18
Killdeer	9	7	Cliff Swallow	43	8	White Throated Sparrow	1	1
Lesser Yellowlegs	33	8	Barn Swallow	5	4	Dark Eyed Junco	342	25
Greater Yellowlegs	1	1	Unidentified Swallow	45	1	Lapland Longspur	2	1
Yellowlegs spp	7	6	Black Capped Chickadee	65	27	Red Winged Blackbird	3	4
Solitary Sandpiper	5	5	Boreal Chickadee	16	13	Rusty Blackbird	59	10
Spotted Sandpiper	13	9	Hybrid Chickadee (Mountain X Boreal)	1	1	Brown Headed Cowbird	8	8
Wilson's Snipe	36	10	Ruby Crowned Kinglet	163	24	Pine Grosbeak	2	1
Bonaparte's Gull	46	9	Gray Cheeked Thrush	3	3	Purple Finch	32	18
Mew Gull	24	9	Swainson's Thrush	93	12	White Winged Crossbill	99	17
Herring Gull	139	20	Hermit Thrush	4	4	Common Redpoll	449	26
Arctic Tern	14	7	American Robin	166	24	Pine Siskin	7	4
Short Eared Owl	1	1	Varied Thrush	18	13	TOTAL	3938	NA
Belted Kingfisher	19	13	American Pipit	16	9			

3.1 Band Returns

During the previous two years, there have been no foreign¹ band recoveries. However; during this spring's operation, a banded bird was captured (ie-band return²) which was banded at the same site during a preliminary testing of the site on July 16th, 2005. This particular bird was a female Yellow Warbler (see photo below). This phenomenon of banded birds returning to the original banding site in following years is common at many banding stations including Albert Creek which often has large numbers of returning local breeders.



Photo 1. Female Yellow Warbler recaptured on May 21st, originally banded at the same site on July 16th, 2005.

3.2 Additional Studies

In addition to regular banding activities, a number of additional studies were also conducted. Teslin participated (Pam Sinclair, CWS) in a project in where Rusty Blackbirds were color banded in order to learn more about the sensitive boreal species. Feathers were also collected from this species for stable isotope to help aid in learning more about breeding and wintering areas utilized by Yukon Rusty Blackbird. Both Teslin Lake and Albert Creek stations also participated in an international project involving the collection of feather samples from all species (3-5 individuals from each species) for DNA barcoding analysis (Charles Francis, CWS). Teslin Lake was able to collect samples from species which had not yet been collected in Canada (Say's Phoebe, Olive-sided Flycatcher). An additional study undertaken by both Teslin Lake and Albert Creek stations was funded by the Northern Research Institute to investigate changes on body condition (ie-fat score and body weight) on birds during migratory stopover. This project will require further data collection and more research will continue to be collected by both the Teslin Lake and Albert Creek stations.

¹ This term is given to a bird which was banded at a site other than Teslin Lake.

² This term is given to a bird which was banded at Teslin Lake and returned to the site in the year(s) following being initially banded.

3.3 Visitors and Volunteers

Table 4 shows the number of hours spent at the banding station by visitors, volunteers and paid workers. Visitors were defined as people who visited the station (often for a short time) and did not take part in bird banding activities. Volunteers were people who took part in the operation of the station (often extensively) without being financially compensated. Paid hours were spent by individuals being paid to be at the station. This category includes the Bander In Charge (Ben Schonewille) and a paid assistant (Jukka Juntenen).

Table 4. Hours spent at the banding station visitors, volunteers and paid workers¹.

	Visitor Hours	Volunteer Hours	Paid Hours
Spring	97	112.75	184.25
Fall	NA	NA	30
TOTAL	97	112.75	214.25

4.0 Discussion

The Teslin Lake Banding Station continues to be add a great deal of information pertaining to the migration and distribution of migratory birds in the Teslin region. As was the case in 2005, a few species were captured which are not typically found in the Teslin area. Some species (particularly neotropical migrants) are at the northwest or northern extent of their continental range. Since the inception of this project, a number of species have been banded or observed at the site which observed/captured for the first time. The bird banding station at Teslin Lake provides much needed data on avifauna of the region. The species can be divided into families, each of which are discussed in the following sections.

4.1 Waterbirds

For the sake of simplification, the waterbirds category includes loons, grebes, ducks, geese and swans. A total of 13 species within this category were observed during the spring of 2006. Small numbers of geese and swans were observed early in the season (late April, early May). A variety of ducks were observed in low numbers, most often flying over the study site. The majority of waterbirds were observed later in the season after the ice was melted from Teslin Lake. Common Loons and Red-necked Grebes were heard daily during the open water season. Common Mergansers were also observed frequently, including a sizable congregation of 124 individuals on May 22nd.

4.2 Hawks, Eagles and Falcons

No hawks, eagles or falcons were banded; however, five species within this group were observed. The most common species observed was the Northern Harrier (12 days) which was most often observed flying along the shoreline. Bald Eagles were also observed fairly frequently (10 days) Other hawks (observed in low numbers) included Sharp-shinned Hawk and Red-tailed Hawk. A single Osprey was also observed flying over Teslin Lake on June 4th. Observations of raptors at the Teslin Lake station are

¹ Paid hours include only those hours spent at the banding station and do not include the very extensive amount of time spent doing office duties such as data entry, analysis and reporting.

lacking as these species may be easily over looked while opportunistically observing other species such as the warblers, sparrows, etc which are the primary focus of the banding station.

4.3 Shorebirds

Seven species of shorebirds were observed, 2 of which were banded. The lone species of plover, the Killdeer, was observed on 7 days. This species was most often seen flying along the gravel shoreline of Teslin Lake and is a likely local breeder as a pair of individuals was observed at the end of the spring season. The Wilson's Snipe, a large shorebird was observed very frequently within the study site during early May. No individuals of this species was captured; however, the mist nets used at the banding station are not designed for large birds such as Wilson's Snipe which could easily escape from the nets. Both species of yellowlegs (greater and lesser) were observed daily in low numbers along the margins of the small wetland within the study site. The Spotted Sandpiper was also observed daily along the lakeshore later in the season and was likely a local breeder. Two individuals of this species were also captured and banded early in June (Photo 2). During the fall season, the lone shorebird species banded was a pair of hatch year (HY) Solitary Sandpipers. These individuals were frequently observed foraging along the flooded margins of the marsh within the study site. This species was also observed infrequently (5 days) in the same habitat during the spring season.



Photo 2. Spotted Sandpiper banded on June 10th.

4.4 Gulls and Terns

Three species of gulls were observed regularly at the Teslin station, these are Herring, Mew and Bonaparte's Gulls. The most common species observed (20 days) was the Herring Gull which has a documented breeder colony on a small rocky island directly across Teslin Lake.

4.5 Owls

One species of owl (Short-eared Owl) was observed early in the morning hours of April 17th where it was perched in a small aspen tree adjacent to the marsh.

4.6 Kingfishers

The Belted Kingfisher (the only species present in the Yukon) was observed somewhat frequently (13 days) during the spring season. During the brief fall season this species was much more common and was observed foraging for frogs within the marsh. A total of 8 individuals (all HY) were banded and provided a unique opportunity to view this unique species up close.



Photo 3. A Belted Kingfisher (HY) banded in the early morning on July 31st.

4.7 Woodpeckers

Four species of woodpecker were observed during the spring of 2006 and one was banded. The most commonly observed species, Northern Flicker, was heard on a daily basis but was not banded. Two Yellow-bellied Sapsuckers were banded (Photo 4) and many more individuals were observed / heard throughout the spring season. As its name suggests, this species feeds primarily on tree sap (birch preferred) and is responsible for the gridwork of sap “wells” observed on trees throughout much of the Yukon. Pairs (male and female) of both Hairy and Downy Woodpeckers were observed and these species were likely breeding within or adjacent to the study site.



Photo 4. Female Yellow-bellied Sapsucker banded on May 27th (left) and a close-up of a male banded on June 2nd.

4.8 Flycatchers

The majority of flycatchers are highly migratory; many of which are neotropical migrants, a term given to species which inhabit temperate regions (such as the Yukon) during the summer and over winter in tropical areas. Some species, such as the Olive-sided Flycatcher winter as far south as Peru and Brazil. In the spring of 2006, the study site proved to be an excellent location for flycatchers with 8 species observed, all of which were banded. This statistic included four of five regular occurring species of Empidonax flycatchers in the Yukon. The two most common species were Hammond's (Photo 5) and Alder Flycatcher; however the Alder was banded in high numbers (38) as opposed to 4 Hammond's Flycatcher. The Alder Flycatcher was also the only member of this family banded during the fall season with 18 individuals banded (56% HY). It is likely that both of these species were local breeders within the study site. Other species of Empidonax flycatchers banded were the Least (4) and Yellow-bellied Flycatchers (1).



Photo 5. Hammond's Flycatcher (left) banded on May 5th and Yellow-bellied Flycatcher (right) banded on June 11th.

Aside from Empidonax flycatchers, the next most common species was the Olive-sided Flycatcher (Photo 6) with 11 individuals banded. This is a relatively high number of individuals of this species as it is infrequently banded across much of Canada. This species has also begun to show a decline in numbers in recent years, therefore data collected pertaining to this species will likely become very valuable in the near future. One of the most exciting captures of the spring season was an Eastern Phoebe (Photo 6) which was banded on May 27th. In the Yukon, this species is typically restricted to the extreme southeast and the individual banded constituted the lone record for the Teslin region. Other flycatchers banded during the spring season included Western Wood-pewee (2) and Say's Phoebe (2).



Photo 6. Olive-sided Flycatcher (left) banded on May 14th and Eastern Phoebe (right) banded on May 27th.

4.9 Vireos

The lone species of vireo observed was the Warbling Vireo, which was observed on 6 days during the spring season. One individual was banded during the spring and 4 (25% HY) during the fall. This species was seen most often in the larger aspen and cottonwood trees within the study site.



Photo 7. Warbling Vireo banded on June 1st.

4.10 Crows and Jays

While no members of this family were banded at the station during 2006, two species were observed. The Common Raven was observed on a daily basis whereas Gray Jays were observed on 7 days.

4.11 Larks

The lone species of lark found in the Yukon, the Horned Lark, was observed on 4 days. Small groups of this species were observed feeding on the muddy ground in the marsh. Three individuals were banded on May 7th.



Photo 8. Male (left) and female (right) Horned Larks banded on May 7th.

4.12 Swallows

Although no members of this family were banded, five different species were observed. The most commonly observed species was the Tree Swallow followed by Violet-green, Cliff, Bank and Barn Swallows. Aside from the Tree Swallows, which were observed frequently individually or in pairs, the other species were seen primarily in multi-species foraging flocks over the marsh. These feeding congregations were seen most often on cool mornings.

4.13 Chickadees and Nuthatches

Three species of chickadee were observed and banded during the spring season. Both the Black-capped and Boreal Chickadee were banded during the spring and recaptured very often. It was likely that these two species were local breeders within the study site. Three juvenile (HY) Black-capped Chickadees were also banded during the fall season.

The most intriguing chickadee that was banded was what appeared to be a hybrid Boreal x Mountain Chickadee. (Photo 9). Consultation with Cameron Eckert (Yukon Environment) revealed that this bird had apparent characteristics of both species. This bird was banded on May 20th, was identified as a male (by cloacal protuberance) and was captured alongside a Boreal Chickadee (sex unknown). Another interesting fact of this bird was that it was captured in the very scattered shrubs along the shoreline which is not typical habitat for this species.



Photo 9. Hybrid Chickadee (left) and Boreal Chickadee (right) banded on May 20th.

4.14 Kinglets

The lone species of kinglet observed and banded was the Ruby-crowned Kinglet. During the spring season, a total of 51 individuals were banded from mid April until the end of May. Given the number of recaptures, it is likely that a portion of the individuals banded were local breeders. During the fall season, 3 individuals (100% HY) were banded. The Yukon's second species of kinglet, the Golden-crowned Kinglet was not observed or banded in the spring or fall seasons.

4.15 Thrush

Five species of thrush were observed during the spring season, all of which were banded. The American Robin was encountered throughout the entire spring season with 35 individuals banded between April 24th and June 11th. Individuals of this species captured were likely both migrants and local breeders as a portion of the individuals banded were recaptured often. During the fall, five individuals of this species were banded, four of which were HY individuals. The next most common thrush species was the Swainson's Thrush which was recorded on a daily basis beginning of May 20th. The 35 individuals banded in the spring were likely a mix of migrants and local breeders as indicated by recaptured birds. Nine of the ten individuals banded during the fall season were HY birds. Both the Gray-cheeked and Hermit Thrush are less common species of this family and this was illustrated in the number of these species banded during the spring season. The Hermit Thrush was heard singing on 3 days at the end of April / beginning of May and a lone individual was banded on May 7th. The Gray-cheeked Thrush was recorded on three days at the end of May / beginning of June with 2 individuals banded. The final species of thrush encountered, the Varied Thrush, was recorded frequently (13 days) and a single individual was banded on June 2nd.



Photo 10. Hermit Thrush (left) banded on May 7th and Gray-cheeked Thrush (right) banded on June 4th.

4.16 Pipits

The American Pipit is the one species within this family observed at the station. This species was observed on 9 days which 2 individuals banded on June 4th.

4.17 Waxwings

The lone species of waxwing observed this spring was the Bohemian Waxwing, which was observed on 19 days. This species was observed in high numbers on a few days (37 on May 1st, 50 on May 7th) as a large flock was in the area feeding on berries left from the previous summer. A total of 40 individuals were banded, 34 of which were on May 7th. The name “Waxwing” is derived from the waxy deposits found on the birds secondary flight feathers. The number and size of these tips are related to the age and sex of the bird. As a general rule, older males have more and larger tips whereas young females have fewer, shorter waxy appendages. Older birds also have more yellow on the primary flight feathers and larger yellow tips on the tail than younger birds.



Photo 11. Second year female Bohemian Waxwing (left) and closeup of wing and tail of after second year male (right).

4.18 Warblers

Warblers constituted 32% of all birds banded during the spring season and 45% of birds banded during the fall. Eleven species were banded during the spring and eight species during the fall.

The Orange-crowned Warbler (Photo 12) is a species which is likely a migrant through the study site. This species was observed on 16 days in the spring and had a high count of 5 individuals banded on May 20th. This species is widespread across much of the Yukon so the individuals banded may be migrating much further north. The closely related Tennessee Warbler was encountered on far fewer days (6 days) much later in the season (high count of 6 individuals observed on June 4th). This species is much more common in the southeastern Yukon and is somewhat rare elsewhere in the territory.



Photo 12. Orange-crowned Warbler (left) banded on May 20th and male Tennessee Warbler (right) banded on June 2nd.

The Yellow-rumped “Myrtle” Warbler was the most common warbler species observed in the spring (recorded on 21 days). Low numbers of this species were likely breeding within the study site. The highest daily count for this species was 54 individuals on May 1st. During the fall season, 5 individuals (100% HY) were banded. The Yellow Warbler was also commonly observed at the study site, particularly during June. During the spring, the highest daily count was of 32 individuals on June 2nd. A large number of individuals were recaptured at the site during the fall season indicating a number of local breeders. Of the 19 individuals banded during the fall, 84% were HY birds. The flooding that occurred at the study site during June was likely a benefit to this species which typically breeds in riparian vegetation.

The Townsend’s Warbler is somewhat rare and localized in the Yukon where it is most common in mature white spruce forest, typically in river valleys. A single male Townsend’s Warbler was observed but not banded on June 4th during a significant migration movement of a number of warbler species. This particular bird was observed in the low willows along the shoreline in a mixing flock of other warblers, primarily Blackpoll Warblers. The Blackpoll Warbler (Photo 13) was fairly common during the spring season with 21 individuals banded and a high count of 35 observed on June 4th. During the fall season, four (75% HY) individuals were banded. Two of the HY individuals were banded in July (30th and 31st) which indicates that this species likely bred near the study site. The presence of this species so early in the season is not typical at the Albert Creek Banding Station where this species is not usually encountered before mid August.



Photo 13. Adult male Blackpoll Warbler (left) banded on June 2nd and a hatch year Blackpoll Warbler (right) banded on July 30th.

Both the Northern Waterthrush and Common Yellowthroat are warbler species most often associated with wetland habitats during the breeding season. Both these species were encountered in the highest numbers late in the spring season when the study site was heavily flooded. It was likely that the individuals banded of these species were primarily local breeders. Both species were banded in modest numbers during the fall season. The Northern Waterthrush was one of the most common species banded during the fall, with the vast majority (50%) being hatch year individuals. Family groups of this species were captured often with the fall and constituted one or two adult birds alongside two or three hatch year birds in obvious juvenile plumage.

The Wilson's Warbler was encountered in moderate numbers throughout the month of May and early June, with a peak count of 23 individuals observed on June 4th. A modest 54 individuals were banded which is significantly less than the spring capture at Albert Creek which is typically over 450 individuals.

The American Redstart was a welcome surprise during the spring season. This species is typically considered rare and very localized in the Yukon outside of the southeastern portion of the territory. A total of 6 individuals were banded over the period of June 2nd – 11th. This is another species which was likely breeding at the study site as four individuals (75% HY) were banded during the fall along with the recapture of 3 individuals banded during the spring. Male American Redstarts obtain their black and orange (Photo 14) when they are in their second year. For example, the second year male in Photo 14 can be seen molting from its yellow/gray plumage to its orange/black plumage.

The lone male MacGillvary's Warbler (Photo 15) was banded on June 4th. This is another species which is rare and localized at the northern extent of its range in the Teslin region.



Photo 14. Second year male American Redstart banded on July 30th in the process of molting into the adult male black and orange plumage.



Photo 15. After second year male American Redstart (right) banded on June 2nd and male MacGillivray's Warbler (right) banded on June 4th.

4.19 Tanagers

The Western Tanager is the only species of tanager normally found in the Yukon. This species is somewhat rare west of Watson Lake; however, there are scattered records from across southern Yukon including a record from Teslin. One female Western Tanager (Photo XX) was banded on June 4th. As was the case with most rarities encountered during the spring season, this bird was captured directly along the shoreline of Teslin Lake.



Photo 16. Female Western Tanager banded on June 4th.

4.20 Sparrows

The sparrows are a large family of primarily ground dwelling granivores (seed eaters), many of which are often captured in high numbers at most banding stations. This is mostly due to the ground dwelling habitats of these birds which make them much more susceptible to being caught in mist nets and baited ground traps. During the spring season, nine species of sparrows were observed, eight of which were banded. The most numerous sparrow encountered was the Dark-eyed (Slate-colored) Junco with 137 individuals banded and highest daily total of 83 individuals on May 1st during a significant movement of sparrows. White-crowned, Fox and American-tree Sparrows were banded, albeit it much lower than expected numbers. During 2005, the entire Teslin area was overloaded with numerous sparrows including these three species. This year, these species were nearly absent throughout much of the Teslin region and this was reflected in the capture rates for these three species.



Photo 17. Fox Sparrow (left) banded on April 29th and Lincoln's Sparrow (right) banded on April 29th

Three additional sparrow species encountered in low numbers during the spring season were Lincoln's (6), Savannah (2) and Chipping (3) Sparrows. The most notable sparrow observed during the spring season was a singing White-throated Sparrow on June 2nd.

During the fall season, by far the most notable sparrow encountered was a HY Brewer's (Timberline) Sparrow (Photo 18). The Timberline race of the Brewer's Sparrow breeds in subalpine areas from northern British Columbia through the Yukon and into southwestern Alaska. This was a remarkable capture as this species is highly localized in the Yukon where it is well known from alpine breeding areas such as Mt Macintyre, White Mountain and Montana Mountain. This bird which was banded on September 3rd constituted one of the only lowland records for the Yukon as this species is very rarely observed in migration.



Photo 18. Hatch year Brewer's (Timberline) Sparrow banded on September 3rd.

Other sparrows encountered during the fall included Dark-eyed (Slate-colored) Junco, Savannah Sparrow, American-tree Sparrow and Lincoln's Sparrow.

4.21 Blackbirds

The most commonly observed blackbird was the Rusty Blackbird (recorded on 10 days with a highest daily total of 32 individuals on May 1st). Despite the high numbers observed, a mere three individuals were banded. This species escapes easily from mist nets and the windy conditions on days with high numbers present likely decreased the number of individuals captured. Rusty Blackbirds are treated in a unique way at the banding station as they are fitted with a light blue color band in addition to the regular number stamped aluminum leg band. The purpose of color banding is to potentially sight these birds and identify their banding location without having to capture the bird.



Photo 19. Male Rusty Blackbird (left) banded on May 1st and male Red-winged Blackbird (right) banded on June 2nd.

The Red-winged Blackbird was observed infrequently at the station with its characteristic call heard on 4 days during the spring season. Once the study began to flood, a lone male individual was seen daily and was banded on June 2nd. The final species of this family observed was the Brown-headed Cowbird which was observed on 8 days.

4.22 Finches

The finch family was very well represented at the station during the spring season. The Common Redpoll was especially common (107 individuals banded). This species was also recorded on a daily basis while a high daily total of 35 on April 23rd. Many individuals captured in early May were in breeding condition and the first of eight HY (Photo 20) birds was banded on May 12th. Other finches banded in low numbers included the nomadic White-winged Crossbill, Pine Siskin and Pine Grosbeak.



Photo 20. Hatch year Common Redpoll (left) banded on May 12th and adult male Purple Finch (right) banded on May 7th.

5.0 Conclusion and Recommendations

Despite not being able to operate the station continuously during the spring or fall seasons, the station was still extremely successful in monitoring bird migration in the Teslin region. Furthermore, the very high diversity of species observed and banded was somewhat remarkable as relatively few days were operated compared to the Albert Creek Banding Station.

Aside from the collection of scientific data, the station has been successful in attracting visitors from far and near. Furthermore, members of the public were able to utilize the station as a method in increasing their knowledge of birds and scientific data collection.

In the 2007 season, the spring season will be operated at a minimum. If sufficient funding is secured, the station may also operate during the fall season which will likely yield impressive numbers of birds banded.

6.0 Acknowledgements

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- Canadian Wildlife Service (CWS)
- Yukon Bird Club (YBC)

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APPENDIX 1 – Spring Daily Totals

SPECIES	9-Apr	16-Apr	17-Apr	22-Apr	23-Apr	24-Apr	29-Apr	30-Apr	1-May	6-May	7-May	11-May	12-May	13-May	14-May	20-May	21-May
Alder Flycatcher																1	
American Pipit																	
American Redstart																	
American Robin						1	3		2	3	3		6		1	2	
American Tree Sparrow				1		1			1	2	7						1
Black Capped Chickadee		2					1	1									
Blackpoll Warbler																	
Bohemian Waxwing									1	5	34						
Boreal Chickadee		1	1													1	
Chipping Sparrow																	
Common Redpoll	6	3	11	3	14	7	10	7	6	6	14		5	2	3	2	1
Common Yellowthroat																3	2
Dark Eyed Junco		2		1	5	10	3	10	59	24	3		4	3		2	2
Eastern Phoebe																	
Fox Sparrow							1		2								
Gray-cheeked Thrush																	
Hammonds Flycatcher							1			1			2			1	
Hermit Thrush											1						
Horned Lark											3						
Hybrid Chickadee																1	
Least Flycatcher																1	
Lincoln's Sparrow							1									2	2
MacGillvary's Warbler																	
Myrtle Warbler								2	26	1	6	2	2			8	4
Northern Waterthrush																	3
Olive-sided Flycatcher															1		
Orange Crowned Warbler								1	2		2		2			5	4
Pine Grosbeak									2								
Pine Siskin										1							
Purple Finch							2				1						
Red-winged Blackbird																	
Ruby Crowned Kinglet		2		2	1	11	10	3	4	5	3	1	5	2	1	1	
Rusty Blackbird									3								
Savannah Sparrow																1	
Say's Phoebe													1	1			
Spotted Sandpiper																	
Swainson's Thrush																2	2
Tennessee Warbler																	
Varied Thrush																	
Warbling Vireo																	
Western Tanager																	
Western Wood-pewee																	
White Crowned Sparrow						1			3		1		2			3	2
White Winged Crossbill			2					1	1								1
Wilson's Warbler													4	2	1	10	10
Yellow Warbler																3	2
Yellow-bellied Flycatcher																	
Yellow-bellied Sapsucker																	
Daily Totals	6	10	14	7	20	31	32	25	112	48	78	3	33	10	7	49	36
Daily Species Totals	1	5	3	4	3	6	9	7	13	9	12	2	10	5	5	18	13

SPECIES	22-May	27-May	28-May	1-Jun	2-Jun	3-Jun	4-Jun	5-Jun	6-Jun	7-Jun	8-Jun	9-Jun	10-Jun	11-Jun	SPRING TOTAL
Alder Flycatcher		5		2	10	1	2						11	6	38
American Pipit							2								2
American Redstart					3								2	1	6
American Robin		1		2	1								2	8	35
American Tree Sparrow															13
Black Capped Chickadee															4
Blackpoll Warbler	1	5			1		14								21
Bohemian Waxwing															40
Boreal Chickadee															3
Chipping Sparrow		1												2	3
Common Redpoll	1				1								2	3	107
Common Yellowthroat					5		2						2	3	17
Dark Eyed Junco		1			2		2						2	2	137
Eastern Phoebe		1													1
Fox Sparrow															3
Gray-cheeked Thrush		1					1								2
Hammonds Flycatcher															5
Hermit Thrush															1
Horned Lark															3
Hybrid Chickadee															1
Least Flycatcher					1		2								4
Lincoln's Sparrow													1		6
MacGillivray's Warbler							1								1
Myrtle Warbler	2	2		1	5		1							1	63
Northern Waterthrush		3	2		3		2						1		14
Olive-sided Flycatcher		2	2				6								11
Orange Crowned Warbler	3	3		1	2										25
Pine Grosbeak															2
Pine Siskin															1
Purple Finch															3
Red-winged Blackbird					1										1
Ruby Crowned Kinglet															51
Rusty Blackbird															3
Savannah Sparrow							1								2
Say's Phoebe															2
Spotted Sandpiper													1	1	2
Swainson's Thrush		6	2		13	1	2						3	4	35
Tennessee Warbler					2		2								4
Varied Thrush					1										1
Warbling Vireo					1										1
Western Tanager							1								1
Western Wood-pewee							2								2
White Crowned Sparrow													1		13
White Winged Crossbill															5
Wilson's Warbler	3	2	2	1	4		7						3	5	54
Yellow Warbler	1	16	2	5	17		1						2	1	50
Yellow-bellied Flycatcher														1	1
Yellow-bellied Sapsucker		1			1										2
Daily Totals	11	50	10	12	74	2	51	0	0	0	0	0	33	38	802
Daily Species Totals	6	15	5	6	19	2	18	0	0	0	0	0	13	13	48

APPENDIX 2 – Fall Daily Totals

SPECIES	14-Jul	30-Jul	31-Jul	5-Aug	6-Aug	3-Sep	FALL TOTAL
Alder Flycatcher			7	5	2	4	18
American Redstart		3	1				4
American Robin	1	2			2		5
American Tree Sparrow						1	1
Belted Kingfisher		1	2	2	1	2	8
Black Capped Chickadee	1	2					3
Blackpoll Warbler		1	1		1	1	4
Brewer's Sparrow						1	1
Common Yellowthroat		1		1		2	4
Dark Eyed Junco		1		3		1	5
Lincoln's Sparrow					1		1
Myrtle Warbler	1		1			3	5
Northern Waterthrush	4	1		2	1	2	10
Orange Crowned Warbler						1	1
Ruby Crowned Kinglet		1				2	3
Savannah Sparrow					1	1	2
Solitary Sandpiper				1	1		2
Swainson's Thrush		3	1	2	3	1	10
Warbling Vireo	1		3				4
Wilson's Warbler			2	1		2	5
Yellow Warbler		4	2	2	7	4	19
Daily Totals	8	20	20	19	20	28	115
Daily Species Totals	5	11	9	9	10	15	21