

Memorandum

3300-1-6-4 (G3 Bio)

25 February 2008

Distribution List

CFB SUFFIELD NATIONAL WILDLIFE AREA
ANNUAL REPORT 2007

References: A. 1262-1-6 (Comd) Sub-delegation of Ministerial powers pursuant to Subsection 4.4(2) of the Canada Wildlife Act, 20 May 2004
B. 3300-1-6-4 (G3 NWA Coord) CFB Suffield National Wildlife Area Annual Report 2006, 26 Feb 2007

Introduction

1. The CFB Suffield National Wildlife Area (NWA) is 458 km² of natural grassland along the South Saskatchewan River on the eastern side of the Base. The NWA was formally designated by the registration of the *Regulations Amending the Wildlife Area Regulations* on 12 June 2003.

2. This NWA is unique amongst the federal network of NWAs in that the Minister of Environment has delegated administration and enforcement authority for the area to the Minister of National Defence, who in turn has delegated that authority to the CFB Suffield Base Commander (B Comd) (Ref A). Environment Canada (EC) continues to provide advisory support for management of the NWA in accordance with a draft Memorandum of Understanding between EC and the Department of National Defence (DND).

Aim

3. In accordance with Ref A, the aim of this report is to summarize the major activities undertaken within and related to the NWA during the 2007 calendar year.

Legislative Authority Summary

4. All activities in the NWA are conducted at the discretion of the B Comd, or his delegated representative, in compliance with the *Wildlife Area Regulations* of the *Canada Wildlife Act*.

5. Permits. Evaluation of activities within the NWA and issuance of NWA permits continued:

- a. 12 applications for non-routine activities were received;

- b. 11 permits were issued (9 Scientific, 2 Military) (from 33 in 2006); and
 - c. one permit was denied.
6. Permits are in place for routine activities performed by organizations requiring regular access to the NWA:
- a. two new permits were issued, bringing the total number of routine activity permits in force to six; and
 - b. four routine activity permits were in development at the end of 2007.
7. Infractions. Zero infractions were recorded.
8. In ref B, an infraction was recorded regarding EnCana's small mammal trapping programme (permit #2006-006(18)). Although EC Enforcement determined that a clear infraction was not present, EC did indicate the intention of a permit condition was not upheld, and recommended that the B Comd issue a letter to EnCana outlining his concerns with the conduct and outcome of the small mammal research programme. A letter of discontent was sent to EnCana in November 2007.
9. Wildlife Officer Appointment. Pursuant to subsection 11(1) of the *Canada Wildlife Act*, and the Ministerial sub-delegation, the B Comd is authorized to designate Wildlife Officers to enforce the Act within the CFB Suffield NWA. A designation document for designating Base Military Police (MP) was drafted and submitted for legal review in December 2005. The DND legal department approved use of the designation document in March 2007. The B Comd designated the CFB Suffield MPs as of December 2007. Additional training provided by EC Enforcement is expected in 2008.
10. Signage. Boundary signage deficiencies were identified and provided to the G3 Field Engineer section to be addressed. Four large NWA signs were ordered; two were installed in 2007; installation of small NWA boundary signs is ongoing.

Activity Summary

11. Policy, Procedures, and Agreements.
- a. applications for permits were assessed for compliance with the NWA purpose and management goals, relevant legislation, DND/CF policies, and the Range Standing Orders. One application triggered an environmental assessment under the *Canadian Environmental Assessment Act* (CEAA);

- b. a Memorandum of Understanding (MOU) outlining the cooperative process between CFB Suffield and Canadian Wildlife Service (CWS) for the operation of the NWA continued to undergo revision and legal review;
- c. the Range Standing Orders for the NWA were updated; and
- d. the NWA Management Strategy continued to undergo review by the DND legal department and CWS. The feedback was incorporated into a final draft; the strategy is expected to be implemented in 2008.

12. Research / Surveys.

- a. researchers from the University of Calgary (lead: Darren Bender) have been studying the Ord's kangaroo rat (*Dipodomys ordii*) (provincially-listed as Endangered) on Base since the mid-1990s to understand the effects of extreme population fluctuations exhibited by the species, and the threats to its survival including habitat destruction and parasitism. Population monitoring continued in 2007 to support identification of critical habitat;
- b. University of Calgary (lead: Darren Bender) continued manipulation and monitoring of experimentally reactivated sand dune habitats. Year two of this three-year Interdepartmental Recovery Fund (IRF)-funded study included the addition of fire and grazing treatments. Grazing by native ungulates was encouraged at treatment sites through the application of salt blocks. The G3 FOS crews performed prescribed burns at selected fire treatment locations. Two weather stations were installed (Gr 366 952, Gr 224 741) to support the project. This research directly supports goals presented in the Recovery Plan developed by the Alberta Ord's Kangaroo Rat Recovery Team, of which the Base is a member;
- c. University of Alberta (lead: Laura Hamilton) conducted research on the impact of industrial habitat disturbance on two representative bird species: Sprague's pipit (*Anthus spragueii*; SARA-listed as Threatened) and Chestnut-collared longspur (*Calcarius ornatus*). The study measured the effects of pipeline construction and presence of exotic grasses on territory size and nesting success;
- d. CWS (lead: Troy Wellicome) continued research to identify habitat associations and ultimately critical habitat for the burrowing owl (*Athene cunicularia*) (federally-listed as Endangered). A Species At Risk Act (SARA) permit (2005 - #01AB) was obtained from CWS;
- e. CWS (leads: Brenda Dale) continued visual and auditory breeding bird surveys in the Northern and Southern blocks of the NWA (ongoing on Base since 1999);

- f. CWS (lead: Darcy Henderson) conducted visual surveys for the plant species-at-risk (tiny cryptanthe (*Cryptantha minima*); small-flowered sand verbena (*Tripterocalyx micranthus*); smooth goosefoot (*Chenopodium subglabrum*)). A SARA permit was not required;
 - g. CWS (lead: Darcy Henderson) conducted visual surveys to identify the extent of crested wheatgrass (*Agropyron pectiniforme*) invasion from seeded rights-of-way;
 - h. G3 Biology continued the long-term vegetation monitoring programme based on ecological range sites being implemented over a five-year period. Thirty-three permanent vegetation monitoring sites were established in 2007, bringing the current total to 175; a total of 325 sites are planned to be established in the NWA by 2009;
 - i. G3 Biology conducted fieldwork to locate and control leafy spurge in the NWA. Treatment locations were established to test and evaluate various control methods. Chemical treatment (glyphosate) was applied to 14 sites. Biocontrol using the brown-legged flea beetle (*Aphthona lacertosa*) was applied to 13 treatment sites. Beetles were obtained in Ward County, North Dakota, under permit from the Canadian Food Inspection Agency. Further application and monitoring will continue in 2008;
 - j. G3 Biology assessed the crested wheatgrass (*Agropyron cristatum*) footprint on industrial lease sites and the degree of invasion of the species from old pipelines to newer pipelines within the NWA;
 - k. G3 Biology assessed the vegetation parameters between on and off-lease areas after minimal disturbance shallow gas development within the NWA to determine whether significant differences were detectable in vegetative cover, litter, bare soil, and range health; and
 - l. G3 Biology performed surveys for sharp-tailed grouse (*Tympanuchus phasianellus*) in April 2007; 14 new leks were observed in the Northern block of the NWA.
13. Military / Industrial / Agricultural.
- a. there were no military exercises conducted within the NWA during 2006. As per routine practice for ensuring safety, portions of the NWA were periodically templated as ricochet areas for exercises occurring in the Military Training Area. 4AD Regiment retrieved drones from the NWA that were fired in an adjacent ADATS exercise;

- b. Range Control personnel conducted routine activities within the NWA including hunting patrols, road maintenance, fire suppression, seed collection, and biological fieldwork. A five-year permit for these routine activities was renewed in 2007;
- c. Defence Research and Development Canada (DRDC) continued its routine use of the area of the Experimental Proving Ground (EPG) that overlaps with the NWA (area Falcon North of Coyote Road, including The Hogsback) as a buffer and overflight area for experiments conducted in other areas of the EPG. A five-year permit for these routine activities was issued in 2007;
- d. EnCana upgraded ten existing gas metering sites in the NWA with solar-powered Supervisory Control and Data Acquisition (SCADA) systems to allow for remote transmission of well production data;
- e. EnCana conducted ongoing routine activities related to the maintenance of existing shallow gas wells in the NWA. A routine activity permit for ongoing servicing of oil and gas infrastructure within the NWA was approved by the B Comd. EnCana formally challenged the requirement for a permit in November 2007. DOJ response is pending;
- f. the panel review environmental assessment (EA) for EnCana's proposal to drill 1275 wells within the NWA continued. EnCana submitted its environmental impact statement (EIS) for review and comment, and the intervenors prepared submissions in response to the EIS. The panel members toured the NWA (see para 13b). The hearing is expected to occur in early 2008;
- g. EnCana Corporation (lead: Joel Heese) conducted pre-disturbance site assessments at three potential well site locations associated with the panel review. Each assessment included a land survey for drilling location, environmental survey of vegetation, wildlife, and historical resources, and on-site consultation with EIS team members and First Nations representatives;
- h. evaluation is pending for a well abandonment in the Middle Sand Hills (approximately Gr 387 034) conducted by EnCana in Feb 2005. Assessment of this site and other potential well abandonment sites will be considered by the Range Sustainability Section (RSS) Remediation Group;
- i. follow-up on EnCana's post-construction reclamation practices in the NWA including several trail reclamation projects was deferred to 2008 and will be considered by the RSS Remediation Group;

- j. the PFRA continued its routine grazing and maintenance operations within selected portions of the Southern block of the NWA. A five-year permit for these routine activities was issued in 2006; and
 - k. the PFRA was authorized to maintain occasional use of the Van Will Corral at Gr 211 768 (previously slated for decommissioning as a condition of installation of the corrals at Gr 203 689.) The corral will be used for spring delivery of livestock. An amendment to the routine activity permit was issued.
14. Promotion / Outreach / Collaboration.
- a. in April 2007, CWS transferred ownership of the Gate 24 accommodation trailer to DND. Six researchers resided in the trailer throughout the 2007 field season;
 - b. on 12-13 June 2007, representatives of the Panel, Panel Secretariat, EnCana, CWS, Health Canada, DND, and other intervenors toured the NWA to increase their familiarity with the area and associated land use issues in support of their involvement with the EnCana panel review EA process;
 - c. on 12 July 2007, a group of representatives from the Alberta Wilderness Association (AWA) (24 participants) toured the NWA to learn about the grassland ecosystem and view wildlife. This was one of an ongoing series of tours conducted by the AWA to showcase ecosystem values and the importance of conserving wildlife habitats in landscapes across Alberta;
 - d. on 19-20 July 2007, the annual Suffield Environmental Advisory Committee tour occurred including one site visit within the NWA;
 - e. on 5 September 2007, the Director General of CWS and the Director General of Environmental Protection toured the Base including site visits in the NWA; and
 - f. on 12 September 2007, the annual Suffield Grazing Advisory Committee meeting occurred including several site visits within the NWA.

Future Activities

15. The following initiatives are planned for 2008:
- a. continued refinement of the permitting process;
 - b. issuance of remaining routine activity permits;

- c. implementation of the NWA Management Strategy;
- d. implementation of the NWA MOU between the Base and CWS;
- e. continued management of invasive species;
- f. assessment and remediation of legacy disturbances (e.g., industrial sites, flax bale piles); and
- g. training of Base MPs designated as wildlife officers under the *Canada Wildlife Act*.

Conclusion

16. Developments during 2007 continued to refine the NWA management process at CFB Suffield. The implementation of activities proposed for 2008 will further enhance management of the NWA and enforcement of its protective measures.

Delaney Boyd
G3 Bio
4574

Distribution List

Action

G3

Information

RTAM O
B Env O
RCO
Ops WO