

FAXED  
MARCH 15 2001

Facsimile  
Mackenzie Valley Environmental Impact Review Board

**To:**

Ranjit Soniassy (as coordinator for DIAND)	669-2701 -
Kathryn Emmett (as coordinator for all GNWT departments)	873-0114 -
Steve Harbicht (as coordinator for DOE branches/programs)	873-8185 -
Pete Cott, DFO,	669-4941 -
Iannick Lamirande, NRCan, Ottawa	(613) 995-5719 -
Doug Tate, Nahanni National Park Reserve,	(867) 695-2446 -
Ken Weagle, MVLWB, Yellowknife	873-6610 -
Pauline Campbell, Nahanni Butte Dene Band, Nahanni Butte	(867) 602-2910 -
Rita Cli, Liidli Koe First Nation, Fort Simpson	(867) 695-2665 -
Bruce Leclaire, SAO, Villa	(867) 695-2005 -
Alison de Pelham, Deh Cho First Nations, Fort Simpson	(867) 695-2038 -
Greg Yeoman, CPAWS, Yellowknife	873-9593 -
Alexandra Borowiecka, Ecology North, Yellowknife	920-2986 -
Peter Campbell, Canadian Zinc Corp., Vancouver	(604) 688-2043 - enj

**From:** Louie Azzolini, EAO  
**Pages:** 3 including this cover  
**Date:** Thursday, March 15, 2001  
**File:** EA00-002 and EA002a Canadian Zinc Corporation  
**Subject:** **Technical Reports prepared by Government for the Review Board by Government Experts**

Please find attached the technical reports prepared by The Government of the Northwest Territories (GNWT), Department of Fisheries and Oceans (DFO), Environment Canada (EC), and the Nahanni National Park Reserve (NNPR).

Please call me at 867-873-9189 if there is anything about the Technical Reports you want to discuss.

The document accompanying this transmission contain confidential information intended for a specific individual and purpose. The information is private, and is legally protected by law. If you are not the intended recipient, you are hereby notified that any disclosure, copying, distribution, or taking any action in reference to the contents of this telecopied (faxed) information is strictly prohibited. If you have received this communication in error, please notify us immediately by telephone and return the original to us by regular mail.

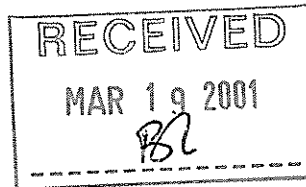
From.....

MVEIRB  
P.O. Box 938  
Yellowknife, NT X1A 2N7  
Phone (867) 873-9189  
Fax (867) 920-4761

116 b



Parks Canada Parcs Canada



FEED FAX THIS END

**FAX**

To: ROLAND SEMJANOV'S

Dept.: MUEIRB

Fax No.: 867-920-4761

No. of Pages: 4

From: DOUGLAS TATE

Date: 19 MARCH

Company: NANPR

Fax No.: 867-695-3151

Comments: \_\_\_\_\_

Post-it™ tax pad 7803E

Nahanni National Park Reserve  
PO Box 348, Fort Simpson, NT  
X0E 0N0

19 March, 2001

Mackenzie Valley Environmental Impact Review Board  
200 Scotia Centre, PO Box 938  
Yellowknife, NT  
X1A 2P6

Attn: Luciano Azzolini / Roland Semjanovs

**RE: Further Comments on Canadian Zinc Corporation (CZN) Proposals  
Land Use Permit Application MV2000C0030**

Dear Sirs,

Please find attached the additional comments from Nahanni National Park Reserve to the Review Board, regarding the Environmental Assessment Reports for the two Canadian Zinc Corporation proposals: Cat Camp Fuel Cache Retrieval, and Diamond Drilling Program. These comments follow our review in Yellowknife, on 16 March, 2001, of the Draft Reclamation Costing Model for Prairie Creek Minesite.

If there are any further questions, please contact our office at (867)695-3151, or (867)695-2446 (Fax).

Sincerely,

Charles Blyth  
Suprintendent, Nahanni National Park Reserve

Prepared by:  
Douglas Tate  
Conservation Biologist  
Nahanni National Park Reserve



**Comments on Canadian Zinc Corporation's (CZN) Proposal and EA Reports  
Cat Camp Fuel Cache Recovery Program  
Mineral Exploration Drilling Program - Prairie Creek Mine  
Land Use Permit Application MV2000C0030**

**19 March, 2001**

Prepared for:

Mackenzie Valley Environmental Impact Review Board

Prepared by:

Parks Canada, Nahanni National Park Reserve

Parks Canada, Nahanni National Park Reserve (NNPR) is pleased to provide its technical knowledge and assistance to the Review Board, on the aforementioned proposals and Environmental Assessment Reports by Canadian Zinc Corporation (CZN). We hope that the following information is of assistance to the Board in making its decision.

The document entitled *Draft Reclamation Costing Model for Prairie Creek Minesite* (hereafter referred to as the reclamation model) was reviewed by Chuck Blyth and Douglas Tate of Nahanni National Park Reserve. This review took place in company of Gary Magee of the Department of Indian Affairs and Northern Development (DIAND), in Yellowknife, NT, on 16 March 2001. Nahanni National Park Reserve would like to acknowledge CZN and Mr. Magee for the opportunity to review the reclamation model.

As the reclamation model contained only estimated costs of various reclamation options, and the mitigative measures required for each option, the financial information contained therein did not appear to be of a sensitive or confidential nature, in our opinion. No information on financial assets of the company (CZN) was stated or implied in the models. However, the information will be kept in confidence, and none of the calculations from the model regarding monetary requirements for reclamation are cited in this comment.

The reclamation model presents financial costing estimates of three options (methods) for reclamation of the minesite surface lease at Prairie Creek and one for the airstrip lease north of the minesite. The three minesite scenarios involve a range of alternatives for on-site disposal or removal of equipment and structures associated with the leases.

Despite the primarily cost-estimating intent, the model proved to be a useful document in considering reclamation of the Cat Camp site, and mitigative measures for the proposed exploration drilling program. Useful information was noted in the assumptions for the models, including standard industry practices for reclamation of industrial sites. These points highlighted a lack of information considered and/or provided in the CZN EA Reports for the proposed activities.

Soil contamination is a consideration in the reclamation model, which includes a soil sampling program (sampling grid) to determine the extent of contamination. Only passing reference was made to removal of contaminated soil in the CZN EA Report for the fuel cache removal, there was no statement regarding a plan for testing the extent of contamination. The models also include soil replacement, which is not detailed in the EA Reports.

Contamination from the presence of poly-chlorinated biphenyls (PCBs) on site is also raised as a potential concern in the reclamation model. The CZN EA Reports make no mention of such testing, or contingency (cleanup) plan.

A water sampling program is part of the models for final reclamation. The EA Reports for the Cat Camp and Mineral Exploration proposals do not describe a water sampling program. The EA Reports presume negligible effects on water quality and aquatic habitat, but there are no proposed programs designed to ensure this outcome.

Another issue addressed in the reclamation model is revegetation of disturbed sites. In contrast, the EA Reports do not address revegetation in any detail. This sort of rehabilitation work should definitely be factored in to work plans at drill sites, road construction sites, Cat Camp, etc.

*Alternatives*

The CZN EA Report estimates 150,000 – 175,000 litres of fuel at Cat Camp. On-site incineration of the fuel was one of the alternatives considered, as it is a common reclamation practice, and often the low-cost alternative. The cost of incineration has been estimated at between \$0.18 - \$0.51 / litre in similar situations. Therefore, the disposal of Cat Camp fuel would have an approximate total cost of \$27,000.00 - \$89,250.00. Locations in the eastern arctic have even higher per litre costs.

The CZN EA Report estimates costs of flying out the fuel with helicopter as \$50,000.00, and cites this amount as prohibitively expensive. This amount is not expensive relative to these incineration costs, and allows for cost recovery from sale of the fuel, or possibly through reuse at the minesite.

The CZN EA Report does not cite any cost estimate for their 'preferred option' of building an all-weather road to the Cat Camp site. It is quite possible that the re-engineering and construction of the winter access into an all-weather road will be far more expensive than the helicopter fly-out option, even when the value of the fuel is taken into consideration. With no budget analysis of road construction costs, or other financial modelling of the various options, it is not possible to rank the alternatives in terms of cost.

*agree that a quarter both ways of copying det.*

*agree*

Additional details of the road proposal are missing. There is little information provided on the actual engineering required, such as the number, location and type of stream crossings. The reclamation model does not even consider an all-weather road as an option for final reclamation of the minesite. In our opinion, this is likely due to the prohibitive cost of construction.

Note

One other concern regarding the proposed road construction and use is in regard to the age of the equipment. Are the Volvo rock trucks which CZN proposes to use for fuel hauling safe to use for this purpose and on the road as currently designed, according to current safety codes and practices?

Considering the cost of the proposed road construction, NNPR suggests that a security deposit be in place to cover the cost of completing the work, in the event CZN is not financially capable, and does not fully remove the fuel.

#### Conclusions

for RB agrees ~~that~~ with NNPR  
 Nahanni National Park Reserve is of the opinion that the alternative cleanup methods for the Cat Camp fuel cache, including flying the fuel out and the use of a winter road, are rejected without adequate justification. No solid financial analysis is provided to backup the conclusion that a road is needed. <sup>and that</sup>

Also, the EA Report states on page 4, "the sole objective of this program is to mitigate a known environmental risk". If environmental risk mitigation is the sole objective, then environmental impact considerations should be the deciding factor on the methods of removal, and a fly-out or winter road removal appears to have the least impact on the environment, and are the preferred options for maintaining ecological integrity.

The technical report submitted by Resources, Wildlife and Economic Development also concludes that, if a road rather than fly-out is required, that a winter removal program is preferable.

With respect to both the Mineral Exploration program and the fuel cache removal, the reclamation report has brought to light several additional deficiencies in the proponent's EA Reports. These include implementation of a water quality program, soil contamination sampling (including PCB testing), and revegetation at disturbed sites.

Nahanni National Park Reserve also shares concerns expressed in the Technical Report submitted by the Department of Fisheries and Oceans (DFO). The CZN applications to build a portion of an all-weather road, advance exploration, and incrementally increase operational capacity amounts to piecemeal permitting of a mining operation. Their EA Reports refer to putting the entire mine into production, so the operation should be assessed as such.

Nahanni National Park Reserve  
PO Box 348, Fort Simpson, NT  
X0E 0N0

19 March, 2001

Mackenzie Valley Environmental Impact Review Board  
200 Scotia Centre, PO Box 938  
Yellowknife, NT  
X1A 2P6

Attn: Luciano Azzolini / Roland Semjanovs

**RE: Further Comments on Canadian Zinc Corporation (CZN) Proposals  
Land Use Permit Application MV2000C0030**

Dear Sirs,

Please find attached the additional comments from Nahanni National Park Reserve to the Review Board, regarding the Environmental Assessment Reports for the two Canadian Zinc Corporation proposals: Cat Camp Fuel Cache Retrieval, and Diamond Drilling Program. These comments follow our review in Yellowknife, on 16 March, 2001, of the Draft Reclamation Costing Model for Prairie Creek Minesite.

If there are any further questions, please contact our office at (867)695-3151, or (867)695-2446 (Fax).

Sincerely,

*Original signed by:*

Charles Blyth  
Superintendent, Nahanni National Park Reserve

Prepared by:  
Douglas Tate  
Conservation Biologist  
Nahanni National Park Reserve

**Comments on Canadian Zinc Corporation's (CZN) Proposal and EA Reports  
Cat Camp Fuel Cache Recovery Program  
Mineral Exploration Drilling Program - Prairie Creek Mine  
Land Use Permit Application MV2000C0030**

**19 March, 2001**

Prepared for:

Mackenzie Valley Environmental Impact Review Board

Prepared by:

Parks Canada, Nahanni National Park Reserve

Parks Canada, Nahanni National Park Reserve (NNPR) is pleased to provide its technical knowledge and assistance to the Review Board, on the aforementioned proposals and Environmental Assessment Reports by Canadian Zinc Corporation (CZN). We hope that the following information is of assistance to the Board in making its decision.

The document entitled *Draft Reclamation Costing Model for Prairie Creek Minesite* (hereafter referred to as the reclamation model) was reviewed by Chuck Blyth and Douglas Tate of Nahanni National Park Reserve. This review took place in company of Gary Magee of the Department of Indian Affairs and Northern Development (DIAND), in Yellowknife, NT, on 16 March 2001. Nahanni National Park Reserve would like to acknowledge CZN and Mr. Magee for the opportunity to review the reclamation model.

NB. \* || As the reclamation model contained only estimated costs of various reclamation options, and the mitigative measures required for each option, the financial information contained therein did not appear to be of a sensitive or confidential nature, in our opinion. No information on financial assets of the company (CZN) was stated or implied in the models. However, the information will be kept in confidence, and none of the calculations from the model regarding monetary requirements for reclamation are cited in this comment.

The reclamation model presents financial costing estimates of three options (methods) for reclamation of the minesite surface lease at Prairie Creek and one for the airstrip lease north of the minesite. The three minesite scenarios involve a range of alternatives for on-site disposal or removal of equipment and structures associated with the leases.

Despite the primarily cost-estimating intent, the model proved to be a useful document in considering reclamation of the Cat Camp site, and mitigative measures for the proposed exploration drilling program. Useful information was noted in the assumptions for the models, including standard industry practices for reclamation of industrial sites. These points highlighted a lack of information considered and/or provided in the CZN EA Reports for the proposed activities.

Soil \* Soil contamination is a consideration in the reclamation model, which includes a soil sampling program (sampling grid) to determine the extent of contamination. Only passing reference was made to removal of contaminated soil in the CZN EA Report for the fuel cache removal, there was no statement regarding a plan for testing the extent of contamination. The models also include soil replacement, which is not detailed in the EA Reports.

PCBs \* Contamination from the presence of poly-chlorinated biphenyls (PCBs) on site is also raised as a potential concern in the reclamation model. The CZN EA Reports make no mention of such testing, or contingency (cleanup) plan.

\*  
Water. A water sampling program is part of the models for final reclamation. The EA Reports for the Cat Camp and Mineral Exploration proposals do not describe a water sampling program. The EA Reports presume negligible effects on water quality and aquatic habitat, but there are no proposed programs designed to ensure this outcome.

\*  
Revegetation. Another issue addressed in the reclamation model is revegetation of disturbed sites. In contrast, the EA Reports do not address revegetation in any detail. This sort of rehabilitation work should definitely be factored in to work plans at drill sites, road construction sites, Cat Camp, etc.

### *Alternatives*

The CZN EA Report estimates 150,000 – 175,000 litres of fuel at Cat Camp. On-site incineration of the fuel was one of the alternatives considered, as it is a common reclamation practice, and often the low-cost alternative. The cost of incineration has been estimated at between \$0.18 - \$0.51 / litre in similar situations. Therefore, the disposal of Cat Camp fuel would have an approximate total cost of \$27,000.00 - \$89,250.00. Locations in the eastern arctic have even higher per litre costs.

- \* The CZN EA Report estimates costs of flying out the fuel with helicopter as \$50,000.00, and cites this amount as prohibitively expensive. This amount is not expensive relative to these incineration costs, and allows for cost recovery from sale of the fuel, or possibly through reuse at the minesite.
- \* The CZN EA Report does not cite any cost estimate for their 'preferred option' of building an all-weather road to the Cat Camp site. It is quite possible that the re-engineering and construction of the winter access into an all-weather road will be far more expensive than the helicopter fly-out option, even when the value of the fuel is taken into consideration. With no budget analysis of road construction costs, or other financial modelling of the various options, it is not possible to rank the alternatives in terms of cost.



Additional details of the road proposal are missing. There is little information provided on the actual engineering required, such as the number, location and type of stream crossings. The reclamation model does not even consider an all-weather road as an option for final reclamation of the minesite. In our opinion, this is likely due to the prohibitive cost of construction.

\* Safety. One other concern regarding the proposed road construction and use is in regard to the age of the equipment. Are the Volvo rock trucks which CZN proposes to use for fuel hauling safe to use for this purpose and on the road as currently designed, according to current safety codes and practices?

\* security deposit. Considering the cost of the proposed road construction, NNPR suggests that a security deposit be in place to cover the cost of completing the work, in the event CZN is not financially capable, and does not fully remove the fuel.

### Conclusions

\* Nahanni National Park Reserve is of the opinion that the alternative cleanup methods for the Cat Camp fuel cache, including flying the fuel out and the use of a winter road, are rejected without adequate justification. No solid financial analysis is provided to backup the conclusion that a road is needed.

Also, the EA Report states on page 4, "*the sole objective of this program is to mitigate a known environmental risk*". If environmental risk mitigation is the sole objective, then environmental impact considerations should be the deciding factor on the methods of removal, and a fly-out or winter road removal appears to have the least impact on the environment, and are the preferred options for maintaining ecological integrity.

The technical report submitted by Resources, Wildlife and Economic Development also concludes that, if a road rather than fly-out is required, that a winter removal program is preferable.

With respect to both the Mineral Exploration program and the fuel cache removal, the reclamation report has brought to light several additional deficiencies in the proponent's EA Reports. These include implementation of a water quality program, soil contamination sampling (including PCB testing), and revegetation at disturbed sites. \* Drilling

Nahanni National Park Reserve also shares concerns expressed in the Technical Report submitted by the Department of Fisheries and Oceans (DFO). The CZN applications to build a portion of an all-weather road, advance exploration, and incrementally increase operational capacity amounts to piecemeal permitting of a mining operation. Their EA Reports refer to putting the entire mine into production, so the operation should be assessed as such.