



TO _____
FILE NO. 4186-82/2

JAN 05 2001

DOCUMENT NO. 212842

Department of
Environment and Labour
Environmental Support Services

5151 Terminal Rd.
PO Box 697
Halifax, NS
B3J 2T8

2001-002

Mark McLean, BSc., MES
Environmental Assessment Officer

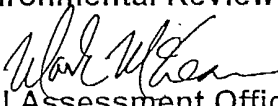
Tel: (902) 424-2387
Fax: (902) 424-3571

Our file no: 40100-30-13

MEMORANDUM

TO: Don Feldman, NSDEL
Kate Moir, NSDEL
Barry Sabeau, NSDNR
John Campbell, NSDNR
Dwight Alaffe, NSDNR
Jim LeBlanc/Stewart Sampson NSDEL
Barry Jeffrey, Environment Canada
Reg Sweeney, DFO
Elizabeth Pugh, NSDTPW

cc: Chris Daly
Manager, Environmental Review

FROM: Mark McLean 
Environmental Assessment Officer

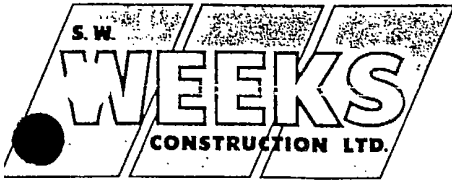
DATE: January 5, 2001

SUBJECT: S.W. Weeks Construction Ltd.'s DRAFT Environmental
Assessment for an expansion of the quarry at Troy,
Inverness County

On January 3, 2001, S.W. Weeks Construction Ltd. submitted a DRAFT environmental assessment document for a proposed expansion of an existing quarry near Troy, Inverness County. The quarry has operated near Troy, 7.5 km north of Port Hastings, since NSDEL Industrial Approval was granted in 1999 under the ownership of A.J. Beaton. The current quarry is almost fully developed and is approximately 3 ha in area. S.W. Weeks Construction Ltd. has requested an expansion of the quarry site to a total of 8 ha.

Please provide your comments on this DRAFT EA document by January 22, 2001.

.../2



DRAFT

1.0 THE UNDERTAKING

- 1.1 Name of Undertaking : Troy Quarry – Permit Amendment
1.2 Location of Undertaking : Troy, Inverness County, Nova Scotia

2.0 PROPONENT DESCRIPTION

- Name of Proponent : S.W. Weeks Construction Limited
Postal Address : P.O. Box 760
New Glasgow, N.S.
B2H 5G2
Street Address : 90 Pine Street
New Glasgow, N.S.
Telephone No. : (902) 755-3777
Fax No. : (902) 755-2580
Chief Executive Officer : Donald J. Campbell

Contact Person for Purposes of Environmental Assessment:

- Name : Donald J. Campbell
Official Title : Chief Executive Officer
Telephone No. : (902) 755-3777
Fax No. : (902) 755-2580

3.0 NATURE OF THE UNDERTAKING

3.1.1 Purpose /Reason for the Undertaking:

The expansion of the existing quarry now being operated under an environmental permit (# 97-1AE-105) for quarries under four hectares.

The need for additional stockpile area for aggregates is limiting the existing quarry advancement. As additional aggregates are produced which the market place requires, the existing area which would normally be rehabilitated as the quarry advances, is now required for additional stockpiles.

3.1.2 Other Methods of Carrying out the Undertaking:

There is only one method involved in the extraction of rock from the existing deposit. This involves drilling and blasting the existing bedrock and crushing the blasted rock providing different grades of aggregate as required by the market place.

4.0 DESCRIPTION OF THE UNDERTAKING

4.1.1 Site Location Mapping : Survey Key Plans

4.1.2 Latitude, Longitude : N 51^o 47' 17" E, S 51^o 36' 05" W
(Centre of Site) N 38^o 23' 42" W, S 38^o 23' 42" E

The location of the undertaking is along Trunk 19 at Troy, Inverness County approximately 7.5 kilometers from the Port Hastings Rotary. The closest residence to the existing quarry face is 900 meters. The residence belongs to Joe and Sandra MacDonald, part owners of the 50 acre quarry site being leased to S.W. Weeks Construction Limited. The undertaking is an expansion of an existing quarry operation which has been active since July, 1999 under environmental approval # 97-1AE-105.

4.2 *Construction Details:*

4.2.1 The Troy Quarry, which has been in full operation since July 1999 was developed in the following stages:

- Initial sedimentation ponds were constructed prior to grubbing the bedrock area to intercept and retain sediment laden runoff so that sediment may settle out. These were built as a single control measure consisting of an excavated basin, a spillway, and a straw filter and built of impervious common material.

Sediment that is accumulated by the sediment ponds shall be removed once it reaches a depth of one-half of the effective height of the pond and stockpiled to be used for future rehabilitation of the site.

- Grubbing the bedrock and laydown areas for the crushers and stockpiles was completed. This material was placed in stockpiles in two locations and seeded to be saved for revegetation when final rehabilitation of the quarry is carried out.
- The laydown areas were leveled up and all exposed areas were covered with blasted material. This stabilized the disturbed areas preventing any siltation from being generated from this area.
- The working face of the quarry was cleared and grubbed. Due to the quick rise in elevation at the rock face (200 feet in 250 feet) it was necessary to remove all overburden from an area of 5 acres in one operation. This allowed all overburden material from the working face to be stockpiled in one area for future revegetation. The exposed rock surface is now stabilized with no possibility of surface sediment laden water being generated. There is now enough rock surface ready for processing to eliminate the need for future grubbing for approximately 5 – 10 years.
- Additional sedimentation ponds (two) were constructed at the lower end of the leased property as an added precaution to catch any sediment laden water missed by the primary ponds.
- Natural runoff from the site now drains to the existing sedimentation ponds via rock lined drainage ditches.
- An existing access road was upgraded during the construction phase of the quarry development. This included widening the road, gravelling and paving with hot mix asphalt, hydroseeding all disturbed areas, including ditches and back slopes. A sound berm was built at the lower end of the access road to cut down the sound of truck traffic. The asphalt roadway prevents fugitive dust from leaving the site which would otherwise be an irritant to nearby residences.

4.2.2 Approximately 90% of construction at the quarry site is complete as of December, 2000.

The only required construction needed for this application is to level and cover with blasted rock, additional area for future stockpiles. All necessary environmental controls are in place. This work was carried out during the initial development stages.

4.2.3 The proposed date for preparing the additional area for stockpiles would be May 1,2001.

4.3 *Operation:*

4.3.1 a) The quarry operation involves the manufacture of aggregates by blasting onsite bedrock and then crushing the blasted rock to various sizes as per market demand.

b) The actual crushing operation will be carried out with portable crushing equipment set up at the quarry for approximately 1 – 1 1/2 months, two times per year. (Expected production – 100,000 tonne per year).

c) The access road is complete, stockpile areas are in place and disturbed areas have been either seeded or covered with blasted rock.

d) This is a high quality bedrock used for highway construction projects and also local market requirements. No washing of aggregates are carried out at the quarry.

e) The discharge points to the environment are all identified and are preceded by a sedimentation control pond.

f) No hazardous materials are used on this site. All oil changes for onsite equipment is contracted out to Atlantic Tractors and Equipment Ltd. of Halifax. Used oil and filters are removed from the site by this company. There are no bulk fuel tanks on site. Equipment is fuelled daily by Irving Oil Limited.

g) It is anticipated that there will be a maximum of two blasts per year, between April and December, which will be sub-contracted out to a professional blasting company, Archibald Drilling and Blasting (1986) Ltd. who are responsible for the blast designs and methods.

h) The final contours of the quarry will be better defined as the advancement of the quarry is established.

4.3.2 *Operating Schedule:*

The quarry will be selling aggregates based on twelve hours per day, five days per week, forty weeks per year (weather permitting).

The quarry has been in full operation since July, 1999.

This is a permanent operation.

- 4.4 This operation will employ a quarry foreman and one loader operator full time while the quarry is open.
When production is taking place, an additional five employees will be on site during this period.

5.0 DESCRIPTION OF THE ENVIRONMENT

- 5.1 The quarry site is approximately 1.0 kilometer from Trunk 19 at Troy with the closest residence being 900 meters from the quarry face. There are no watercourses or wetland nearby. The bedrock elevations are very steep and require long term planning to effectively remove the rock for processing. The area in front of the rock face is a gradual sloping surface which makes it quite easy to manage the surface runoff. There are no environmentally sensitive areas near this quarry operation.
- 5.2 The total area under lease for this quarry is 50 acres. It is anticipated that the total area required to provide stockpile area for the numerous aggregate products along with the working face area and the grubbed bedrock area would be approximately 20 acres.
- 5.3 There were no sensitive aspects of the biophysical environment encountered during the operation of the existing quarry which is now under permit.
- 5.4 This quarry was developed under an existing environmental permit. During the development stage, every effort was made to least impact the local area. The access road to the quarry paved to eliminate fugitive dust and suppress the sound of truck traffic entering and leaving the quarry. A sound berm was built along the access road to lessen the impact of truck traffic both visually and audibly.

6.0 ENVIRONMENTAL IMPACTS AND IMPACT MITIGATION

There is no potential for pollutants at this site. Once aggregates are produced and placed in stockpile by mobile equipment, one front end loader will be used to load trucks on a daily basis.

Any dust created from the temporary crushing operation will be suppressed with water available on site.

Any oil changes carried out on site are contracted out to a service company which removes used oils and filters at that time.

7.0 WETLAND DISTURBANCE

There are no wetlands in ^{OR}~~an~~ near this area.

8.0 PROJECT - RELATED DOCUMENTS

- 8.1 This quarry is presently operating with an under 4.0 hectare permit issued December 15, 1998 (Approval # 97-1AE-105)
- 8.2 Environmental work performed is as described under Section 4.2.

9.0 SCHEDULE

The registration of the Troy Quarry is required by April 1, 2001. This would allow the preparation of expanded stockpile areas prior to anticipated further production in approximately July - August 2001.

10.0 APPROVAL OF THE UNDERTAKING

The approval required for this quarry operation is an amendment of the existing approval to all the disturbed areas for this operation to be in excess of 4.0 hectares. All aspects of the existing approval would be unchanged. This request is being made for the sole purpose of having more laydown area for aggregate stockpiles.

11.0 FUNDING

This quarry development has been 100% financed by S.W. Weeks Construction Limited with no government agency funding.

JANUARY 4, 2001
DATE



DONALD J. CAMPBELL
CHIEF EXECUTIVE OFFICER