AN ORDER OF THE CLEAN ENVIRONMENT COMMISSION

UNDER THE CLEAN ENVIRONMENT ACT

RE: THE CLEAN ENVIRONMENT COMMISSION and WESTROC INDUSTRIES LIMITED, Applicant,

WHEREAS pursuant to the provisions of The Clean Environment Act, Westroc Industries Limited filed a proposal with the Department of Mines, Resources and Environmental Management in connection with the operation of an open pit gypsum mine with sound emissions and with discharge of mine water effluent to a settling basin and then via local ditches to Lake Manitoba, the said mine being located at L.S. 1, 2, 3, 4, 7, 8, 9 and 10 of Section 22, Township 20, Range 10 WPM in the Local Government District of Alonsa, Manitoba;

AND WHEREAS in the absence of limits being prescribed by a Regulation under the said Act, the said proposal was referred to The Clean Environment Commission for the prescribing of limits;

AND WHEREAS no representation was made to the Commission by any person who is or who is likely to be affected by an Order of the Commission prescribing limits in connection with the said operation;

AND WHEREAS the Commission considered the proposal on the 10th day of April, 1978;

IT IS HEREBY ORDERED THAT

1. In this Order,

(a) "impulsive characteristics" means hammering type sounds having peaks one second or more apart - i.e., less than 60 impacts per minute.

(b) "predominant discrete tone(s)" means a sound having one-third octave band sound level which, when measured in a one-third octave band, exceeds the arithmetic average of the sound levels on the two adjacent one-third octave bands on either side of such one-third octave band by:
1. Cont'd...

(b) (i) 5 dB for such one-third octave band with a centre frequency from 500 Hertz to 20,000 Hertz, inclusive, provided such one-third octave band sound level exceeds the sound level of each adjacent one-third octave band, or;

(ii) 8 dB for such one-third octave band with a centre frequency from 160 Hertz to 400 Hertz, inclusive, provided that such one-third octave band sound level exceeds the sound level of each adjacent one-third octave band, or;

(iii) 15 dB for such one-third octave band with a centre frequency from 25 Hertz to 125 Hertz, inclusive, provided such one-third octave band sound level exceeds the sound level of each adjacent one-third octave band.

(c) "linear peak sound pressure level" means the maximum absolute sound pressure as measured using a peak pressure level detector which meets or exceeds the requirements of International Electrotechnical Commission (I.E.C.) Publication 179(1973) PRECISION SOUND LEVEL METERS - Additional characteristics for the measurement of impulsive sounds, (including section 4.51), using "linear" weighting network and "peak hold" meter response, or the equivalent.

(d) "peak particle velocity" means the maximum instantaneous velocity experienced by the particles of a medium, when set into transient vibratory motion, and is the vector sum of three orthogonal components (vertical, tangential and radial).

2. The Applicant shall ensure that sounds emitted from the site of the said operation, exclusive of blasting, do not result in a one-hour equivalent continuous sound level*, as measured beyond the property line of the site of the said operation and within 15 meters of a residence which was in existence on the date of issuance of this Order, in excess of the sound level limits of the following table:
2. Cont'd . . .

<table>
<thead>
<tr>
<th></th>
<th>(i) During May to September, Inclusive</th>
<th>(ii) During October to April, Inclusive</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Day-time 0700-2200 Night-time 2200-0700</td>
<td>Day-time 0700-2200 Night-time 2200-0700</td>
</tr>
<tr>
<td>(a) For continuous or intermittent sounds which have neither significant impulsive characteristics nor predominant discrete tone(s).</td>
<td>60 dBA 50 dBA</td>
<td>65 dBA 55 dBA</td>
</tr>
<tr>
<td>(b) For continuous or intermittent sounds which have significant impulsive characteristics or predominant discrete tone(s).</td>
<td>55 dBA 45 dBA</td>
<td>60 dBA 50 dBA</td>
</tr>
</tbody>
</table>

3. The Applicant shall ensure that blasting operations at the site of the said operation are carried out within the following limits:

(a) no blasts are detonated between the hours of 6:00 p.m. and 8:00 a.m.;

(b) the linear peak sound pressure level as measured beyond the property line of the said operation is not in excess of 150 decibels linear peak sound pressure level;

(c) the linear peak sound pressure level as measured beyond the property line of the said operation and within 15 meters of a residence which was in existence on the date of issuance of this Order is not in excess of 130 decibels linear peak sound pressure level;
3. Cont'd . . .

(d) ground transmitted vibration, as measured in the ground beyond the property line of the said operation and within 15 meters of any maintained building which was in existence on the date of issuance of this Order is not in excess of a peak particle velocity of 50 millimeters per second;

(e) ground transmitted vibration, as measured in the ground beyond the property line of the said operation and within 15 meters of a residence which was in existence on the date of issuance of this Order is not in excess of a peak particle velocity of 12 millimeters per second.

4. The Applicant shall ensure that the concentration of non-filtrable residue in the effluent sampled at the outfall of the said settling basin is not in excess of 30 milligrams per litre.

5. The Applicant shall ensure that no discharge of effluent from the said operation takes place when the discharge will result in or is likely to result in flooding along the drainage route, without express written permission of the Resident Administrator of the Local Government District of Alonsa, or his delegate.

Order No. 801
Dated at the City of Winnipeg this 12th day of MAY, 1978.

H.M. Sleigh,
Acting Chairman,
The Clean Environment Commission.

C-b-1755

* As measured in terms of the equivalent continuous sound level averaged over a one hour period, using a sound level monitoring device which equals or surpasses the requirements of Canadian Standards Association Standard Z 107.1 - 1973 - (or the equivalent) for Type 2 sound level meters, operated in the "A - weighting network" and "slow" meter response.