In accordance with the Manitoba Environment Act (C.C.S.M. c. E125)

THIS LICENCE IS ISSUED TO:

VILLAGE OF SHOAL LAKE; APPLICANT

The following limits, terms and conditions shall be complied with in connection with the operation of a wastewater treatment lagoon located in section 4, township 17, range 23 WPM in the Rural Municipality of Shoal Lake servicing the Village of Shoal Lake and with the discharge of treated effluent to the waters of Shoal Lake:

1. The applicant shall not discharge effluent from the wastewater treatment lagoon system where:
   a. the organic content of the effluent, as indicated by the five day biochemical oxygen demand, is in excess of 30 milligrams per litre;
   b. the fecal coliform content of the sewage effluent, as indicated by the MPN Index, is in excess of 200 per 100 millilitres of sample;
   c. the total coliform content of the sewage effluent, as indicated by the MPN Index, is in excess of 1500 per 100 millilitres of sample.

2. The applicant shall not discharge sewage effluent from the wastewater treatment lagoon system between November 1st of any year and May 15th of the following year without receiving prior approval from the Director.

3. The applicant shall maintain and operate the wastewater treatment lagoon system in such a manner that:
   a. the release of offensive odours is minimized;
   b. the organic loading on the primary cell, as indicated by the five day biochemical oxygen demand, is not in excess of 56 kilograms per hectare per day.

4. The applicant shall not discharge effluent from the primary cell of the wastewater treatment lagoon system except to the secondary cell of the lagoon.
5. The applicant shall ensure that the effluent from the wastewater treatment lagoon system is discharged, only across lands authorized by the land owners for that purpose.

6. The applicant shall prior to the construction of dykes for the wastewater treatment lagoon expansion:
   a. remove all organic topsoil from the area where the dykes will be constructed; or,
   b. remove all organic material for a depth of 0.3 metres and a width of 3.0 metres from the area where the dyke will be built, providing all the lagoon dykes are lined with clay or other suitable material as required by Clause 7, to a minimum thickness of one metre measured perpendicular to the face of the side wall.

7. The applicant shall construct the wastewater treatment lagoon system with clay or other suitable material such that all interior surfaces of the wastewater treatment lagoon system are underlain with a minimum of 1 metre of soil having a hydraulic conductivity of $1 \times 10^{-7}$ centimetres per second or less.

8. The applicant shall arrange with the designated Environment Officer a mutually acceptable time and date for any required soil sampling between the 15th of May and the 1st of November of any year, unless prior approval, by the Director, is given.

9. The applicant shall either:
   a. subject undisturbed soil samples from the completed wastewater treatment lagoon to hydraulic conductivity tests, the number and location of samples to be specified by an Environment Officer up to a maximum of twenty samples; or,
   b. where undisturbed soil samples cannot be taken, test the soil of 4 plane surfaces of the wastewater treatment lagoon system for hydraulic conductivity in a manner and by an insitu field test method as prescribed by an Environment Officer.
10. The applicant shall, not less than 2 weeks before the wastewater treatment lagoon system is placed in operation, submit to the Director the results of the tests carried out pursuant to Clause 9.

11. The applicant shall, in the case of physical or mechanical breakdown of the wastewater collection or treatment system:
   a. notify the Director immediately;
   b. identify the repairs required to the wastewater collection or treatment system;
   c. complete the repairs in accordance with the written instructions of the Director.

12. The applicant shall install a fence around the wastewater treatment lagoon to limit access.

13. The applicant shall on or before September 1, 1989 file a Proposal with the Department whereby:
   a. the lagoon effluent will be diverted so as not to enter the waters of Shoal Lake, or;
   b. the phosphorus content of the effluent is not in excess of 1.0 milligrams per litre.

14. This Licence replaces Licence No. 610 which is hereby rescinded.

FILE NO: 171.2