

Province of British Columbia Ministry of Environment WATER MANAGEMENT BRANCH MEMORANDUM

W.S. Hodge Senior Technician Groundwater Section Water Management Branch Date: October 17, 1985 File: 93 J/2 #3

## Re: Observation Well Investigation - Prince George Area

## Ferguson Lake Area

A field investigation of the Ferguson Lake area near Prince George was conducted between October 8 - 11, 1985. The purpose of the investigation was to confirm groundwater use in the area, attempt to locate an unused well suitable for use as an observation well, and to select possible drill sites should it be necessary to drill an observation well. The area covered for this investigation is shown on Figure 1.

The study area is located approximately 15 kilometres north of Prince George, west of Highway 97. This area has been subdivided in recent years and along with development an increase in well density has occurred. It should be noted, however, that many of the subdivided lots are for sale and have not yet been built on. Several wells have been drilled on the lots which are not yet sold. These wells are not being used. I telephoned Louie Matte (Matte Bros. Construction), who according to our well logs owns a great many of these lots, to see if it would be possible to use one of the wells which wasn't presently being used as an observation well. Mr. Matte was very reluctant to allow the Ministry to monitor water levels in any of his wells as these lots could be sold at any time and it would be necessary to put these wells into production. Some wells will be used to supply water to a number of lots.

Most of the residents I spoke with mentioned having varying degrees of water quality problems. The main complaint seemed to be a high iron content in the water and a few mentioned silting problems. None of the residents I spoke with had a water quantity problem even though the area experienced a drier than normal summer.

Since no suitable drilled well was found for use as an observation well, two sites were selected as possible drill sites. Both sites are along the N. Kelly Rd. right-of-way, with the preferred site being just south of Spiritwood Rd. (Figure 2). The alternate site is located near the intersection of N. Kelly Rd. and Eaglecrest Rd. Mr. Denis Bretecher with the District Highways office in Prince George has given verbal approval to drill at either location. I have contacted Inland Natural Gas, B.C. Tel, B.C. Hydro, and Prince George Cablevision and have verified that there are no cables or pipelines directly underneath the proposed drill sites.

NPK W. S. Hodge MW W-372 Oct 22/85

.... /2

Outr. Bretecher did mention that if drilling was to take place in January - March that the road allowance may have snow in excess of 5 feet which would have to be removed for drill rig access. Other than snow conditions the drill rig access is good (see attached photos).

## Beaverley Area

On October 10, 1985 I visited the Beaverley area west of Prince George in order to stake a possible drill site for a proposed observation well. Fred Chwojka visited this area in November 1983 and mapped out several possible drill sites along the road allowance. Since that time District Highways has extensively upgraded the ditching in the area making these sites unsuitable for an observation well. I have staked a site along the Muralt Rd. road allowance (Figure 3) near Candida Rd.. Muralt Rd. itself stops short of the proposed drill site and so do the power lines (see attached photo). Mr. Bretecher visited this site and has given preliminary approval for this drill site. I also contacted Inland Natural Gas and B.C. Tel who have verified there are no underground utilities at this location.

Dave Kuly

Dave Kalyn Technician Groundwater Section Water Management Branch

Attach.







BEAVERLEY SITE



LOOKING WEST ALONG MURALT RD. ACROSS CANDIDA RD. NOTE LAST POWER POLE ON LEFT

Oct. 10/85

## FERGUSON LAKE AREA - NEAR PRINCE GEORGE



PREFERRED PROPOSED DRILL SITE ALONG WEST SIDE OF N. KELLY RD.



LOOKING NORTH ALONG N. KELLY RD. NEAR SPIRITWOOD RD. (ON RIGHT). PROPOSED DRULL SITE ON LEFT OPPOSITE LOT 22

Oct. 10/85

FERGUSON LAKE AREA - NEAR PRINCE GEORGE



ALTERNATE PROPOSED DRILL SITE ALONG SOUTH SIDE OF N. KELLY RD.



LOOKING WEST ALONG N. KELLY RD. FROM INTERSECTION OF EAGLECREST RD. PROPOSED DRILL SITE ON LEFT.