



DEPARTMENT OF INDIAN AFFAIRS AND NORTHERN DEVELOPMENT
OIL AND MINERAL DIVISION

Application for a Drilling Authority

This notice of intention to begin drilling operations, in triplicate, and where required a plan of survey approved by the Surveyor General showing the target area or the site of the well must be submitted and approved before commencing operations.

In compliance with the "Canada Oil and Gas Land Regulations" application is hereby made for approval to drill:

Name and number of well: Chevron SOBC WM Whitefish YF J-70

Location: Unit J Section 70 Grid 67-10-137-15
 Latitude 67° 09' 32" Longitude 137° 26' 44"
 Unique Well Identifier: 300J706710137150
 Universal Well Location Reference: Lat. 67.15889 Long. 137.44555

Elevation Ground: 1070 K.B. 1935 feet above sea-level.
 Well is expected to produce from Johnson Creek formation at a depth of about 6700 Expected total final depth 8000
 Area assigned to well: Wildcat (for District Conservation Engineer's use only)

Permit No. 2727 Lease No. 49,920
 Permittee, licensee or lessee: Western Minerals Ltd.
 Exploratory Licence No. 1541, l.e. No. for SOBC - 1501
 Surface owned by Crown

Petroleum and natural gas rights owned by Crown
 We propose to use the following strings of casing either cementing or lining them as indicated below

| Casing Size O.D. (Inches) | Weight (lb. / ft.) | Grade | New or Used | Estimated Depth | Sacks of Cement |
|-------------------------------|--------------------|--------|-------------|-----------------|-----------------|
| 1. 19" double wall | 147.1 | Welded | New | 65 | 150 |
| 2. Insulated and Refrigerated | (Approx.) | | | | |
| 3. | | | | | |
| 4. 13-3/8" | 54.5 | API | New | 900 | 950 |
| 5. | | | | | |

Expected water, gas, and oil horizons and type of control equipment: Blackleg, Johnson Creek
 Hydril GR 12-900, Shafter 1.7" - 900 Hydraulic Double Gate, Hydril Model 80 Accumulator, Remote Controls w/Standby Nitrogen Bottles, 3000 psi Manifold

Well will be drilled with Rotary Rig No. 15 by G.P. Drilling Division
 1332 Calgary House, Calgary, Alberta
 (Drilling contractor or company)
 Western Drilling Ltd.

Responsible agent of applicant: R. K. Cannon Contractor's Business Licence No. 1000
 At well Address: 400 - 5th Ave. S.W. Calgary
 At well Address: 400 - 5th Avenue S.W., Calgary

It is understood that if changes become necessary, notice of the change of plan will be submitted
 Dated at Calgary this 13 day of December 1972
 Signed by: R. K. Cannon Company: Chevron Standard Limited
 Title: Project Manager Operator's Licence No. 1502

Form to be submitted to District Conservation Engineer

APPROVED

This application has been examined and approved subject to the following conditions:

PLEASE SEE ATTACHED SHEET FOR CONDITIONS OF APPROVAL

Dated Jan. 11 1973 District Conservation Engineer

*Forms to be submitted to District Conservation Engineer
 Department of Indian Affairs and Northern Development*

CHEVRON SOBC WM WHITEFISH YT J-70

N 67° 09' 32"
W 137° 26' 44"

Geological Prognosis
Estimated KB 7-1085

| <u>Formation</u> | <u>Depth (KB)</u> |
|----------------------------|-------------------|
| Blackie (Top) | 3070 |
| Blackie (Base) | 3960 |
| Mid Albian Unconformity | 4889 |
| Johnson Creek Silt | 5309 |
| G. T. Shale | 5809 |
| Johnson Creek Sand | 6700 |
| Post Devonian Unconformity | 7700 |

Base of permafrost estimated at 400 to 450 feet.



MINIMUM I.D. 13 5/8" FOR 9 5/8" CASING

NOTE - ALL FITTINGS IN THE MANIFOLD MAY BE SCREWED FITTINGS

CHEVRON STANDARD LIMITED
 SPACER SPOOL
 AND
 WING VALVE ASSEMBLY

| | | |
|--------------|----------|------------|
| SCALE | DRAWN | DATE |
| Not To Scale | E. W. W. | FEB 10, 70 |
| | | A-9057E |

FC-11