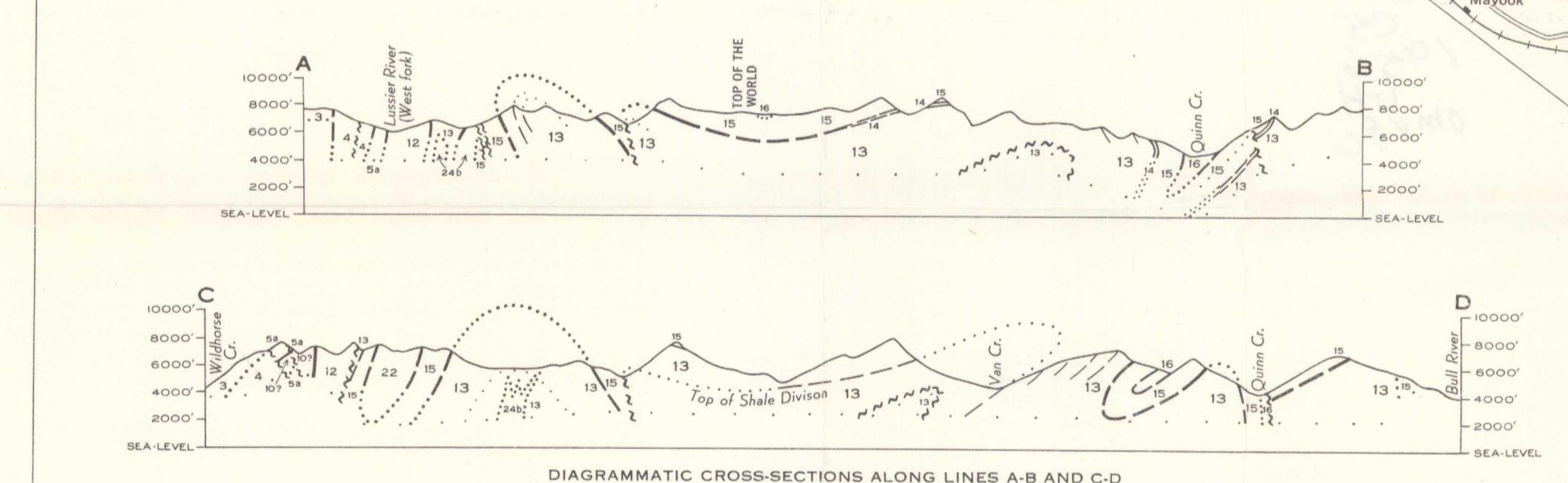


PRELIMINARY SERIES

- LEGEND**
- QUATERNARY**
PLEISTOCENE AND RECENT
25 Till, gravel, sand, silt, alluvium
- CRETACEOUS AND (?) TERTIARY**
LOWER CRETACEOUS AND (?) LATER
24 24a, quartz monzonite (White Creek batholith); 24b, monzonite, quartz monzonite, granodiorite
- TRIASSIC**
23 SPRAY RIVER FORMATION: dark siltstone and silty shale
- DEVONIAN (?) OR CRETACEOUS (?)**
22 Shale, limestone, conglomerate, tuff, volcanic breccia, greenstone
- PENNSYLVANIAN AND (?) PERMIAN**
21 ROCKY MOUNTAIN FORMATION: dolomitic or limy sandstone, quartzite, sandy dolomite and limestone, siltstone, chert
- MISSISSIPPIAN**
20 Undifferentiated Eschaw and Banff formations and Rundle group;
20a. EXSHAW FORMATION: black shale; black limestone;
BANFF FORMATION: dark cherty limestone and laminated silty limestone, grey limestone, limy siltstone, ferrid in part;
20b. RUNDLE GROUP: grey crystalline limestone, crinoid in part, dark fine-grained limestone, cherty in part, all commonly ferrid
- DEVONIAN**
UPPER DEVONIAN
19 PALLISER FORMATION: Lower (main) Member: massive mottled grey limestone, nodular limestone. Upper Member: thin-bedded nodular shaly limestone
- 18 Basal beds: buff and orange weathering dolomite, sandy dolomite, limestone (may be older); ZAIRLOME GROUP: Lower Part: fine-grained black and grey limestone, stromatolitic and coralline in part; dolomite. Upper Part: shale and limestone; ALEXO FORMATION: sandstone and sandy limestone; argillaceous limestone
- MIDDLE (?) AND UPPER DEVONIAN**
17 Limestone, shale, siltstone, dolomite, gypsum (?)
- MIDDLE DEVONIAN AND (?) EARLIER**
16 Basal unit: buff and orange weathering dolomite, sandy dolomite, dolomitic sandstone and shale; white quartzite; conglomerate; BURNAIS FORMATION: gypsum, dolomite, limestone; HARROGATE FORMATION: fine-grained black limestone; shaly limestone; shale
- ORDOVICIAN AND SILURIAN**
UPPER ORDOVICIAN AND LOWER AND (?) MIDDLE SILURIAN
15 BEAVERFOOT-BRISCO FORMATION: dolomite, limestone; conglomerate locally at base, thin graptolitic shale near top
- ORDOVICIAN**
14 GLENOGLE FORMATION: graptolitic shale and fine-grained siltstone, generally limy; shaly limestone; WONA FORMATION: quartzite, sandstone
- CAMBRIAN AND ORDOVICIAN**
UPPER CAMBRIAN AND LOWER ORDOVICIAN
13 MCKAY GROUP: limestone, shale, intraformational limestone conglomerate
- CAMBRIAN**
MIDDLE AND/OR UPPER CAMBRIAN
12 JUBILEE AND ELKO FORMATIONS: dolomite
- MIDDLE CAMBRIAN**
11 BURTON FORMATION: shale, limestone; sandstone, conglomerate at base
- LOWER AND (?) MIDDLE CAMBRIAN**
10 CRANBROOK FORMATION: quartzite, grit, conglomerate; sandstone; EAGER FORMATION: shale, limestone, siltstone, sandstone
- WINDERMERE**
9 TOBY FORMATION: conglomerate, argillite, sandstone
- PURCELL**
UPPER PURCELL
8 MOUNT NELSON FORMATION: argillite, dolomite, quartzite
- 6 ROOSVILLE FORMATION: grey and green argillite and siltstone, partly dolomitic and buff-weathering, grey quartzite; buff and orange weathering dolomite and limestone; sigmoidal structures
- 5a. GATEWAY FORMATION: grey and green argillite and siltstone, commonly dolomitic and buff-weathering, buff and orange weathering dolomite, grey quartzite; purple and red siltstone and argillite; salt casts, sigmoidal structures;
5b. PHILLIPS FORMATION: purple quartzite, siltstone, and argillite
- 4 KITCHENER-SIYEH FORMATION: Kitchener (main) Part: grey and green argillite and dolomitic argillite, grey dolomite, sandy in part (dolomitic rocks weather buff to orange); quartzite. Siyeh Part: laminated green and grey argillite, locally purple argillite. Purcell Extrusions (at top): andesitic lava and tuff
- LOWER PURCELL**
3 CRESTON FORMATION: grey and green argillite and argillaceous quartzite, grey, white, and purple quartzite
- 2 ALDRIDGE FORMATION: rusty-weathering dark laminated argillite, grey and rusty-weathering grey argillaceous quartzite and quartzite
- 1 FORT STEELE FORMATION: white siliceous quartzite, grey argillaceous quartzite, dark argillite, grey and black dolomitic and calcareous argillite; dolomite



Geology by H. M. A. Rice, 1935; G. B. Leech, 1956; G. B. Leech and R. L. Langenheim, 1957; Compilation by G. B. Leech

Main highways
Other roads
Trail
Cabin
Indian Reserve boundary
Intermittent lake and stream
Marsh
Contours (interval 1,000 feet)

Approximate magnetic declination, 21° 54' East

Cartography by the Geological Cartography Unit, 1958

In response to public demand for earlier publication, Preliminary Series maps are now being issued in this simplified form, thereby effecting a substantial saving in time. There is no loss of information, but the maps will be clearer to read if all or some of the map-units are hand-coloured.

As photographs covering this area may be obtained through the National Air Photographic Library, Topographical Survey, Ottawa, Ontario

PUBLISHED 1959
COPIES OF THIS MAP MAY BE OBTAINED FROM THE DIRECTOR, GEOLOGICAL SURVEY OF CANADA, OTTAWA

MAP 20-1958
(TO ACCOMPANY PAPER 58-10)
FERNIE
(WEST HALF)
KOOTENAY DISTRICT
BRITISH COLUMBIA

Scale: One Inch to Two Miles = $\frac{1}{126,720}$
Miles
0 2 4 6

Geographical names subject to revision

5-1-2 Fernie (W/2), B.C.
A. Geol. Map 20-1958