

LEGEND AND DESCRIPTION OF TERRAIN UNITS

SYMBOL	NAME	SURFICIAL DEPOSITS		LANDFORM		COMMENTS
		MATERIAL	THICKNESS (metres)	TOPOGRAPHY	SLOPES (degrees)	
///	man-made terrain	diamicton, rubble, gravel, sand	>2	plain	0-3	landfill
I	glacier ice	ice and snow	>20	rolling, sloping, crevassed	1-30	steep slopes occur in areas of ice falls
O	organic terrain	peat, muck	<15	plain	0-3	bogs, fens, swamps
O	organic blanket	peat, muck	>1	takes form of underlying surface	0-10	
	organic veneer	peat, muck	0.5-1	takes form of underlying surface	0-15	
Ch	landslide	diamicton, blocks and rubble of local bedrock	>3	hummocky, rolling	0.35-0.15	includes landslides involving bedrock and landslides involving unconsolidated Quaternary sediments
Cf	talus debris flow fan	gravel, diamicton	>5	fan	5-30	includes fans with entrenched channels and fans close to local base level
Ca	talus	blocks and rubble of local bedrock	>2	apron, sheet	25-35	little or no vegetation on presently active slopes
Cb	colluvial blanket	colluvium	>1	takes form of underlying surface	1-35	includes slopewash, minor talus, talus stabilized by vegetation
Cv	colluvial veneer	colluvium	0.5-1	takes form of underlying surface	1-40	includes slopewash, minor talus, talus stabilized by vegetation
Al	alluvial fan	gravel and sand	>5	fan	1-20	includes terraced fan remnants (ATF), fans with entrenched channels, and fans close to local base level
Ap	floodplain	gravel and sand	>2	plain with shallow channels	0-3	includes low benches subject to occasional flooding
Ax	valley floor complex	alluvium and colluvium	>2	plain, fan, terraces, lower valley walls	0-35	includes Ap, At, Ai, and Cf. Differentiation of these units is not possible at scale of map.
Av	alluvial veneer	gravel and sand	0.5-1	takes form of underlying surface	0-20	
At	river terrace	gravel and sand	>2	terrace and scarp	0-3	generally one to several metres of sand overlying gravel
Ad	delta	gravel and sand	>5	terrace	0-5	marine delta
Am	lenses, ice stagnation terrain	gravel and sand	>10	rolling, hummocky	0-15-0-30	unit deposited in contact with stagnant glacier ice; interbeds of diamicton commonly present in unit
As	esker	gravel and sand	>10	ridge	0-30	unit deposited beneath and within stagnant glacier ice
Ats	glaciofluvial blanket	gravel and sand	>1	takes form of underlying surface	0-20	
Atv	glaciofluvial veneer	gravel and sand	0.5-1	takes form of underlying surface	0-20	
AF	glaciofluvial fan	gravel and sand	>10	fan	1-20	ice-contact feature, commonly with kettles
AT	terrace	gravel and sand	>10	terrace and scarp	0-3	ice-contact feature, commonly with kettles
AD	delta	gravel and sand	>10	terrace, fan	0-20	proglacial and ice-contact lacustrine and marine deltas
Lm	rolling glaciolacustrine terrain	silt, clay, minor sand (locally with dropstones)	>2	rolling	0-10	ice-marginal depositional environment, relict lake floor
LH	glaciolacustrine terrace	silt, clay, minor sand (locally with dropstones)	>2	terrace	0-3	
Lb	glaciolacustrine blanket	silt, clay, minor sand (locally with dropstones)	>1	takes form of underlying surface	0-10	
Lv	glaciolacustrine veneer	silt, clay, minor sand (locally with dropstones)	0.5-1	takes form of underlying surface	0-15	
Wm	rolling glaciomarine terrain	silt, clay (locally with dropstones)	>2	rolling	0-10	proglacial depositional environment, relict seafloor
Wp	glaciomarine plain	silt, clay (locally with dropstones)	>2	plain	0-2	proglacial depositional environment
Wb	glaciomarine blanket	silt, clay (locally with dropstones)	>1	takes form of underlying surface	0-15	
Wv	glaciomarine veneer	silt, clay (locally with dropstones)	0.5-1	takes form of underlying surface	0-20	
Mm	ground moraine	fill	>2	rolling	0-15	constructional moraine topography (not controlled by form of underlying unit)
Mb	fill blanket	fill	>1	takes form of underlying surface	0-20	
Mv	fill veneer	fill	0.5-1	takes form of underlying surface	0-25	
Dm	drift	fill, gravel, and colluvium	>2	ridged, rolling	0-15	constructional drift topography (not controlled by form of underlying unit)
Dd	drift blanket	fill, gravel, and colluvium	>1	takes form of underlying surface	0-25	
Dv	drift veneer	fill, gravel, and colluvium	0.5-1	takes form of underlying surface	0-30	
Ua	terrace scarp, river banks	all types of unconsolidated Quaternary sediments	>20 (scarp height)	steep erosional slopes	>30	unit consists of several stratigraphic units of contrasting lithologies, in places with a blanket or veneer of colluvium
R	bedrock			rolling, sloping, hummocky, ridged	0-60	thin (<0.5m) or no cover of unconsolidated Quaternary sediments
Ra	canyon walls, river banks			steep slopes	>45	Ra used mainly in conjunction with Us for canyon walls

\* Does not occur as a dominant unit on this sheet

Explanation of letter notation

A combination of letters is used to designate each map unit or component of compound map units, e.g. Ap. The upper case letter indicates the broad genetic class. The lower case letter(s) indicates morphology. The texture of the most map units is implicit in the genetic type (see 'material' in above table), in such cases no specific textural symbol is used. Where the texture of a unit is different from the dominant or expected texture indicated in the table, a lower case textural symbol precedes the upper case genetic symbol, e.g. Cf. Proglacial modification or erosion of a unit is indicated by an upper case letter which follows the lower case morphological symbol and is separated from it by a dash, e.g. Cf-A. Compound map units are designated by more than one group of letters separated by a colon, e.g. Ap-At. These areas consist of more than one component that could not be separated at the scale of the map. The component to the left of the colon is dominant to that to the right. One term placed above another, e.g. Cf, indicates a stratigraphic succession within the unit. No compound symbolization is used for sediment veneers overlying bedrock - unless otherwise indicated, the presence of the veneer symbol, e.g. Ov, indicates that the underlying unit is rock.

ELUC (1976) provides a complete description of a letter notation system similar to the one used here.

ELUC (1976) Terrain classification system, Victoria, British Columbia, 56p. (available from Assessment and Planning Division, Ministry of Environment, Parliament Buildings, Victoria).

Texture	Genetic class	Morphologic subdivision	Process or form modifiers
g - gravel	X - man-made	L <sup>g</sup> - glaciolacustrine	a - apron
r - sand	I - ice	W <sup>g</sup> - glaciomarine and marine	p - pinnacled
f - silt and clay	D - organic	M - moraine	r - ridged
s - silt	C - colluvial	d - fan	s - steep slopes
A - alluvial	D - drift	t - fan	t - terraced
AF - glaciofluvial	U - undifferentiated	h - hummocky	v - veneer
	R - bedrock	m - rolling	x - complex

Stratigraphic sections

Environment	Facies	Stratigraphic sections
Water > Ice	Water > Ice	Glaciofluvial and fluvial sand
Marine	Ice > Water	Glaciofluvial and fluvial gravel
Lacustrine		Ice-contact sand, minor diamicton
Fluvial		Ice-contact gravel, minor diamicton
Glacial		Till, minor ice-contact sand, gravel
		Bedrock
		Gradational contact
		Elevation in metres
		Radiocarbon sample number

Environment facies classification of deposits

Unit does not occur on this sheet  
 \* Unit thicknesses are approximate.  
 Information supplied by J.E. Armstrong (unpublished notes)

Geological symbols

Geological symbols (defined, approximate, assumed)	Abandoned channel (small, large)	Beach
Glacial striae (direction of ice movement known, unknown)	Escarpment	Landslide scar (small, large)
Drumlin	Avulsion track	Debris flow track
Drumlinoid ridges, flutings	Location of representative stratigraphic section	Major gravel pit
Crag and tail	Radiocarbon date	
Clippe		
Ice-contact face		
Moraine ridge		
Esker (direction of flow known, unknown)		
Kettle hole (small, large)		

Geology by J.J. Clague, 1975-1977

Geological cartography by R.V. Polvin, Geological Survey of Canada

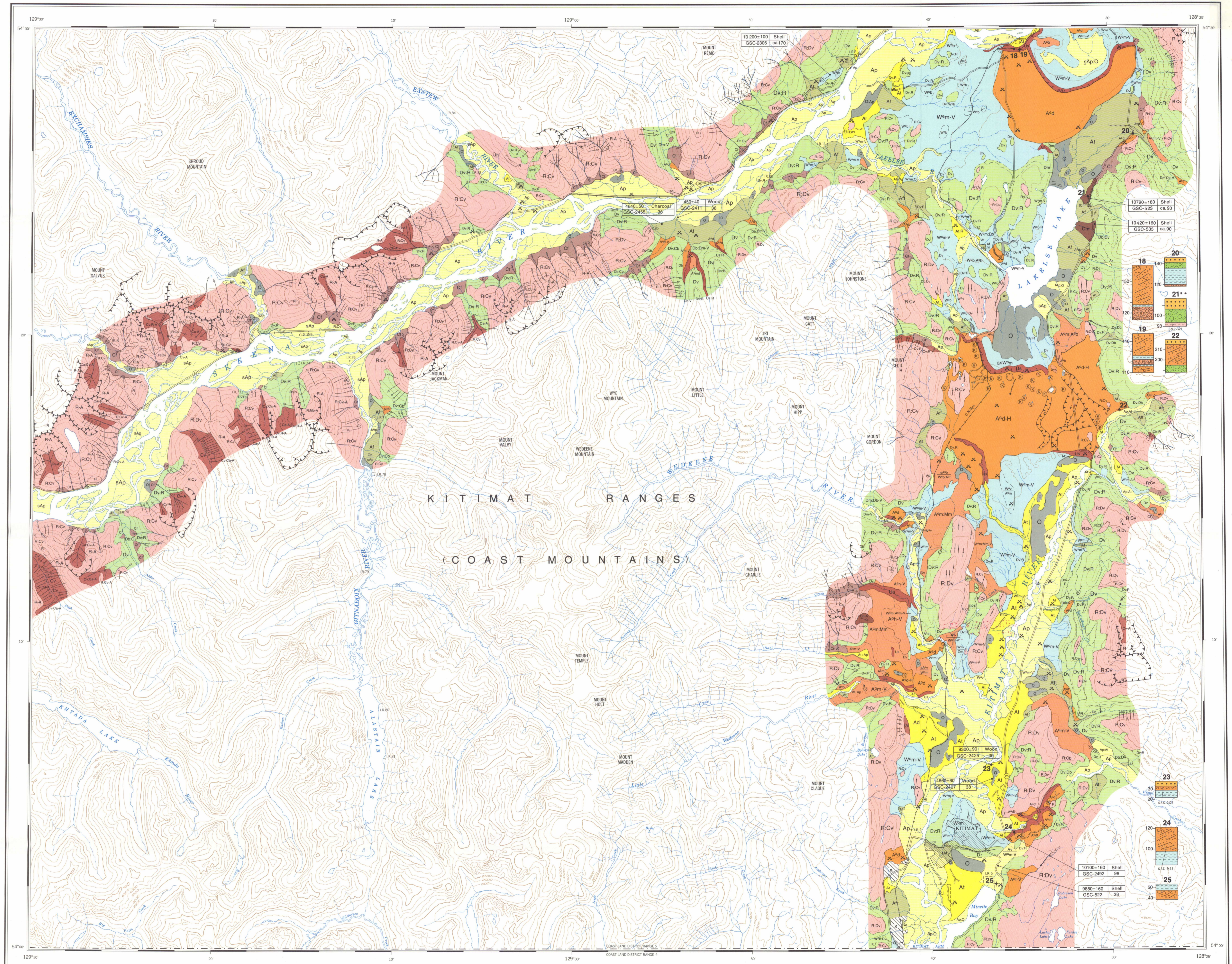
Any revisions or additional geological information known to the user would be welcomed by the Geological Survey of Canada

Base map cartography by the Geological Survey of Canada from 1:50 000 scale maps 103-1/2, 103-1/3, 103-1/6, 103-1/7 and parts of 103-1/4 and 103-1/8 published by the Survey and Mapping Branch in 1956, 1961, 1965 and 1974

Copies of the various topographical editions of this map may be obtained from the Canada Map Office, 615 Booth Street, Ottawa, Ontario, K1A 0E9

Approximate magnetic declination 1981, 29°50' E. East, decreasing 8.0' annually

Elevations in feet above mean sea level



MAP 1557A  
 SURFICIAL GEOLOGY  
**SKEENA RIVER - BULKLEY RIVER AREA**  
 SHEET 2  
 BRITISH COLUMBIA  
 Scale 1:100 000

Kilometres 0 2 4 6 8  
 Miles 0 2 4

Universal Transverse Mercator Projection  
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MAP 1557A  
 SKEENA RIVER - BULKLEY RIVER AREA  
 BRITISH COLUMBIA

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