

1:50000 SURFICIAL GEOLOGY MAP SERIES - ISLAND OF NEWFOUNDLAND
D.R. Grant
Geological Survey of Canada

GENETIC OR PROCESS/ENVIRONMENT CATEGORIES OF TERRAIN CLASSIFICATION

	R	C	S, T	F	GF	L	H	O	E
	FLUVIAL	COLLUVIAL	NEOGLACIAL	FLUVIAL	GLACIOFLUVIAL	LACUSTRINE	NEGLACIAL	ORGANIC	ROLIAN
GEOMORPHIC									
concealed	observed only by vegetation								
weathered	fractured (foliation)		minimised, "washed" and subdued by wave action						blowouts
eroded	channelled by former streams of glacial meltwater, in a braided or parallel pattern								
gullied	dissected by modern ravines in a dendritic pattern								
karst									
plain	plain	plain	plain	floodplain	outwash plain	plain	plain	"high bog" plain	
vee	thin enough - usually less than 10 feet thick - to reveal geomorphic fabric of underlying formation								
ridged	corrugated with parallel stratification ridges, igneous and tectonic foliation	terraces	transverse elements and recessional, ribbed, de Gooz moraines	point bars	ashritic complex	beach bars, strandlines and wave-cut benches		string bog	dunes
hummocky			ablation and chaotic disintegration moraine						palsa dunes
drumloid			longitudinal elements: drumlins, flutes, strap-and-tail hills						
linear	fractured	solifluction lines		meander scars				vegetation stripes	
delta				delta				delta	
fin		talus cone		alluvial fan				apron	
apron		scarp slope		terrace	beach	terrace	beach		
terrace		antiplanation (terrace) bench		terrace	beach	terrace	beach		

SYMBOLS

- Boundary of terrain units; defined, approximate, transitional
- Longitudinal low-flow features
- Drumlin, drumloid, fluting
- Crag-and-tail hill
- Niche moraine
- Stratification (those s. Indian Pond, D.W. Alley)
- Transverse low-flow features
- Crestline of end moraine; prominent and continuous, rounded and broken
- Ribbed moraine, de Gooz moraine, minor moraine, stream
- Lake, crevasse filling
- Solifluction lines in colluvial and organic terrain
- Stratification ridges in sedimentary and volcanic rocks; igneous and tectonic foliation
- Depressional lineament along fracture or fault trace
- Abandoned channel of former meltwater stream
- Emerged shorelines of former proglacial lake or marine submergence
- Landslide scar
- Scarp of terrace, bench, delta
- Marl sediment in lake or pond
- Location of sample
- Spring
- Sinkhole, pond
- Location of radiocarbon-dated organic material

EXPLANATORY NOTES

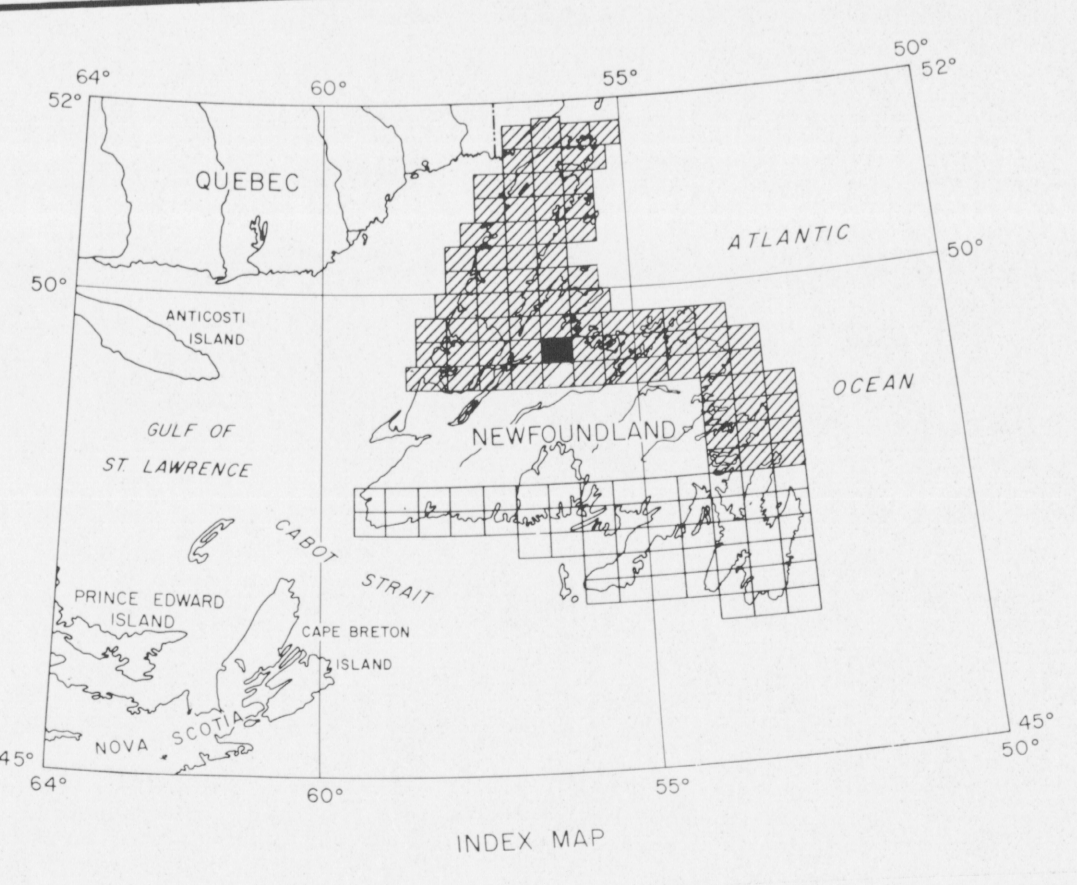
COMPLEXES
When two or more classes of terrain are interposed in a mosaic or repeating pattern on a scale too small to warrant meaningful differentiation, the proportion of each component in the combination is given in a three-position designation set off by slashes denoting arbitrary percentages. For example "mv/O" means to 40% boggy areas, and less than 15% scattered rock outcrops, and 45% indicates more than 60% bedrock concealed by vegetation and less than 15% outcrop.

MORPHOLOGIC OVERPRINT
Where a sequence of geomorphic processes has produced a multi-aspect or compound terrain fabric, the geomorphic modifier suffixes are appended in the inferred order of superposition. "mv/O" means that a mass of till has been moulded into a meander or drumloid form, then mantled with hummocky till during ablation, and finally channelled by former meltwater streams.

TRANSITIONAL ASSOCIATIONS
Locally, two or more terrain units are juxtaposed by reason of related origin, temporal sequence, or ambiguous geomorphic distinction. Such situations are identified by a compound designation marked by a hyphen. Examples are: an outwash plain that slopes down and is transitional to a marine terrace ("GFp - R") or some and kettle glaciofluvial topography that blends with hummocky disintegration moraine ("Och - mv").

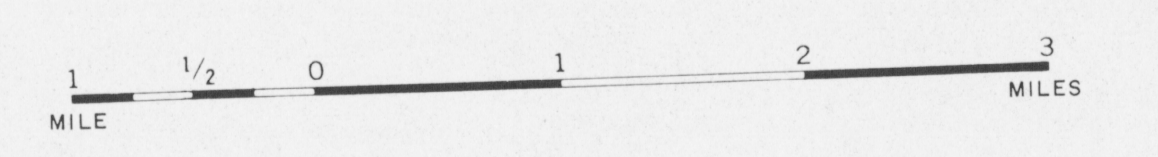
STRATIGRAPHIC SEQUENCE
Natural exposures are rare, except along coasts, and are minimally shallow along roads, but where materials of different origin or texture are known to be superimposed, or can be reasonably confidently inferred, the sequence is indicated in conventional order using horizontal separators, such as "mv/O", which indicates that this marking has developed over a marl mantle on drumloid till.

TEXTURAL MODIFIERS
Ordinarily, textural characteristics are implied by the genetic or geomorphic assignment, but occasionally more specific grain-size information is available either from ground observation or inferred from distinctive morphology, or where circumstances significantly differ from that usually associated with a particular process, as in the case of a purely sand cover, or a gravelly alluvial plain. Textural designations are: "s" for gravel and rubble; "g" for gravel and sand; "f" for silt and clay; "m" for fine sand and silt; "a" for silt and clay. Combinations such as "gs" signify a stony pelite, like the sort of "silt" produced by the accumulation of icerafted debris at the terminus of a floating glacier.



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D.R. GRANT
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