

Montana Bureau of Mines and Geology
Open File No. 434

Geologic Map of the
Harlowton 30' x 60' Quadrangle,
Central Montana

by Edith M. Wilde and Karen W. Porter

2001

To view a full scale version of this map, [click here](#).

For the text files with the map information, [click here](#).

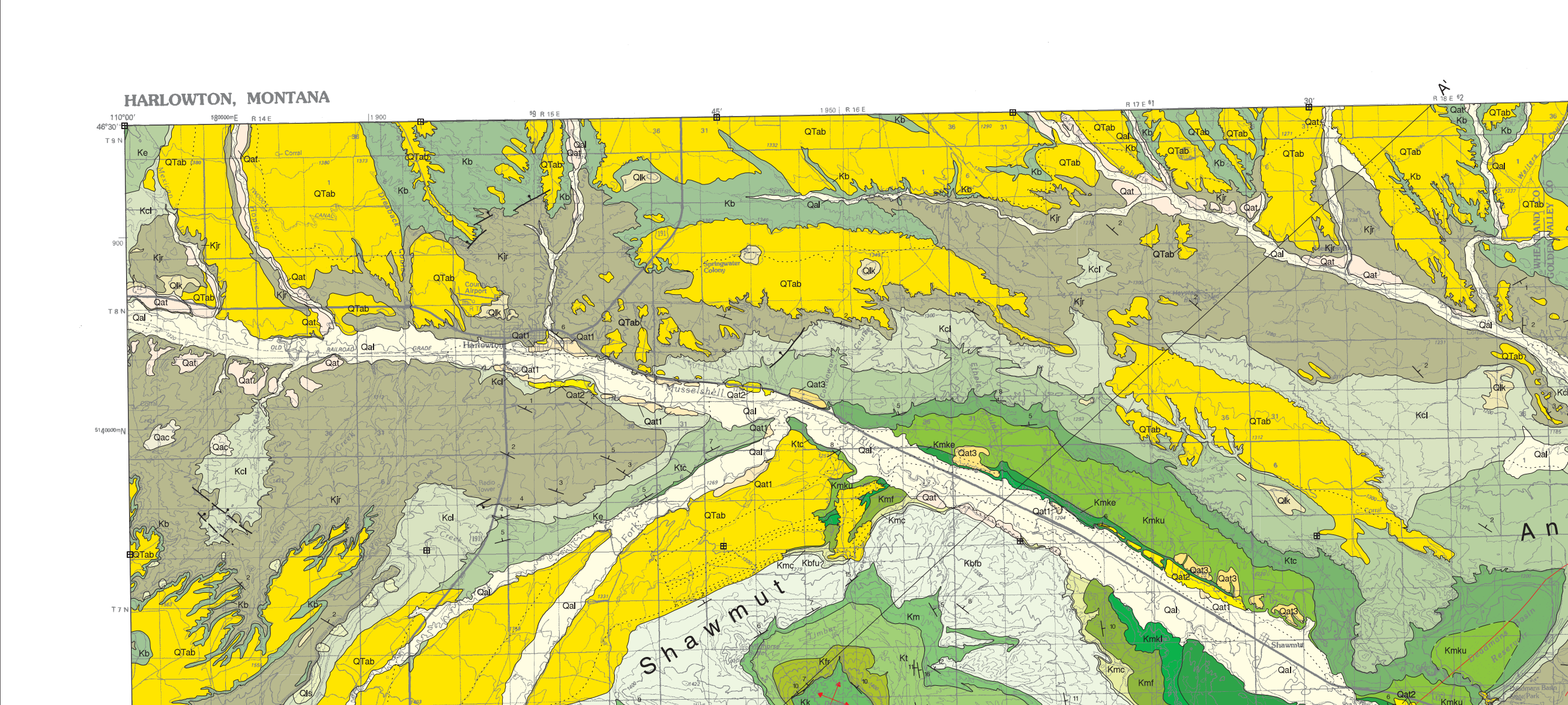
[Digital data link](#)

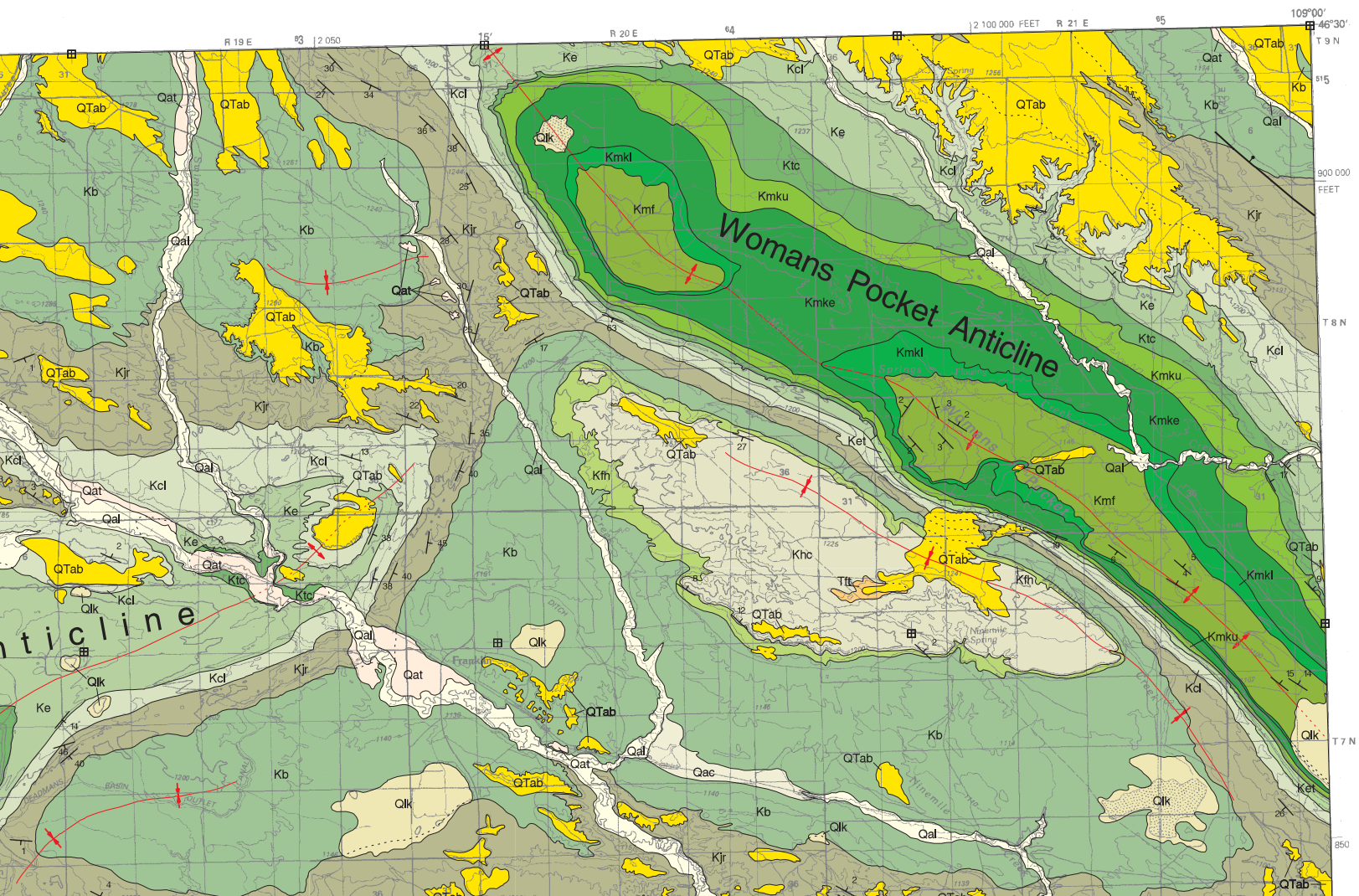
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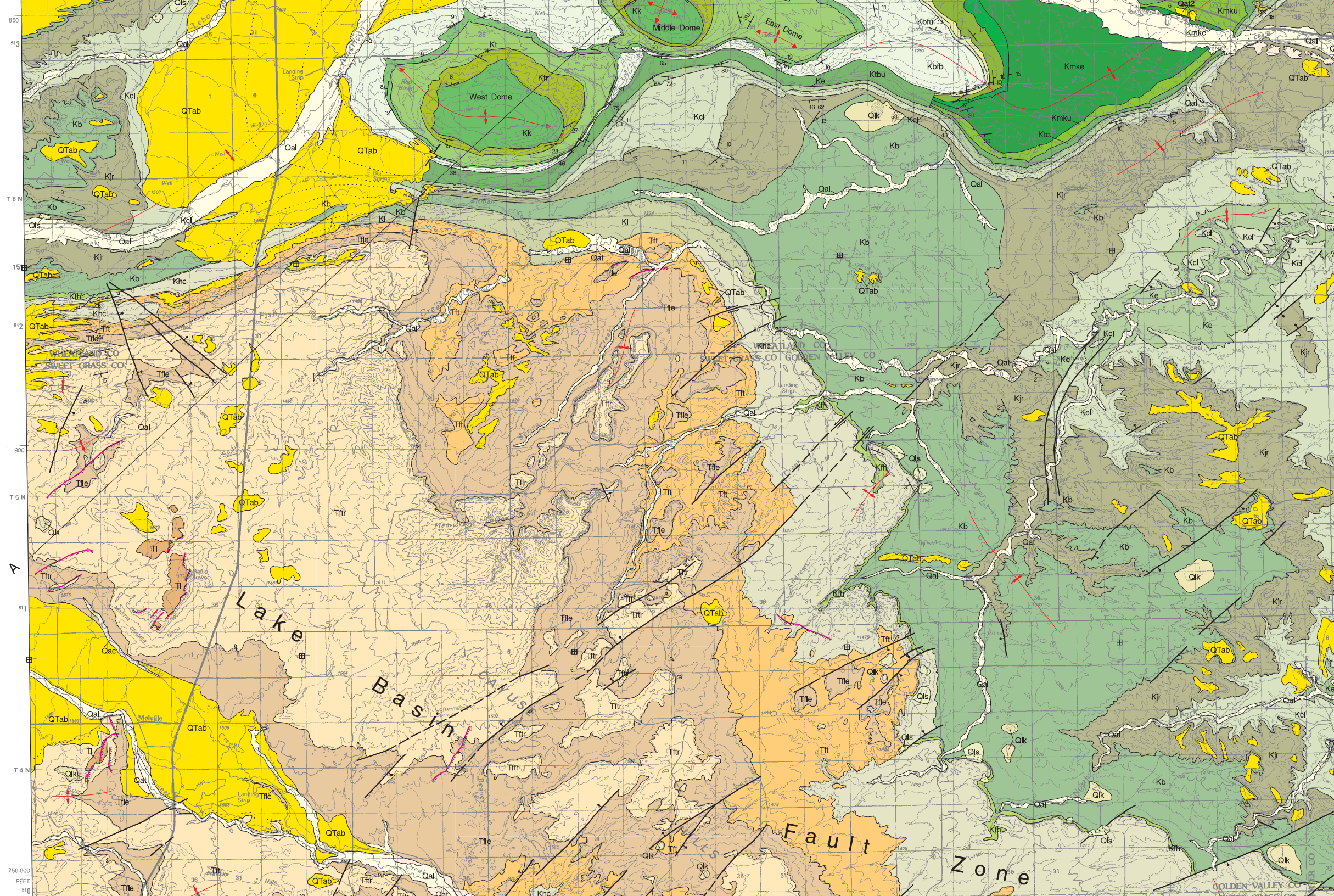
Open File MBMG 434, Plate 1 of 1
Geologic Map, Harlowton 30'x60' Quadrangle

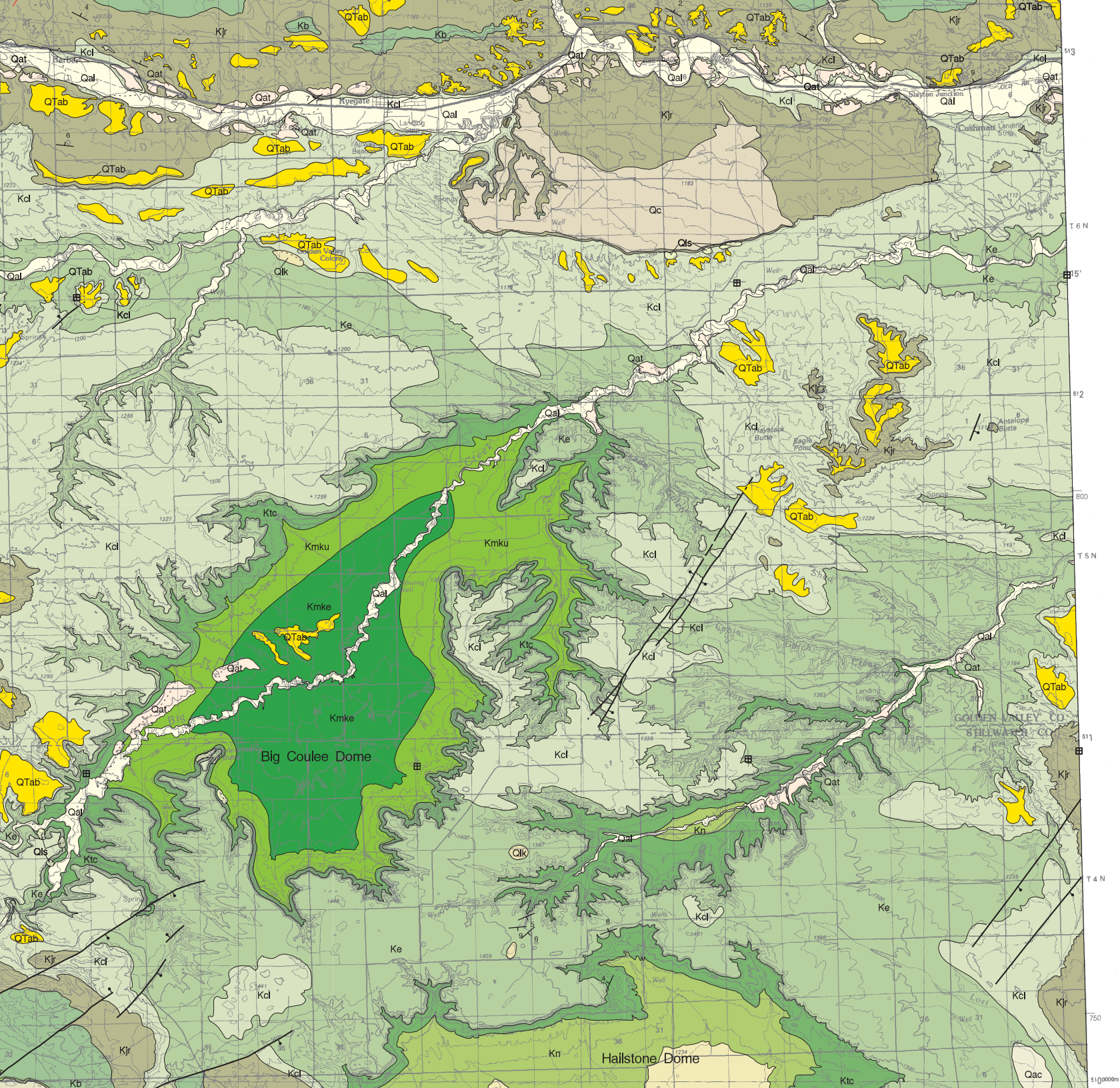




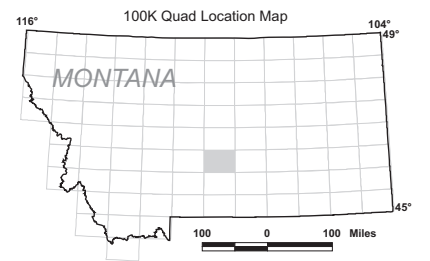
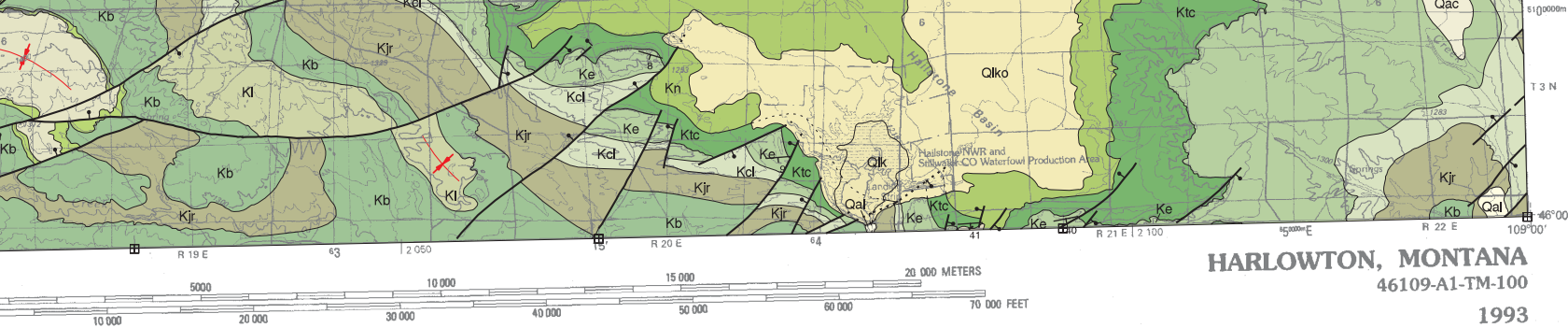
MAP UNITS

Qal	Alluvium of modern channels and flood plains
Qat	Alluvium of alluvial terrace deposit
Qat1	Alluvium of youngest alluvial terrace level
Qat2	Alluvium of second youngest alluvial terrace level
Qat3	Alluvium of third youngest alluvial terrace level
Qls	Landslide deposit
Qac	Alluvium-colluvium
Qc	Colluvium
Qlk	Lake deposits
Qlko	Older lake deposits
QTab	Alluvium of braid plains
Ttr	Tongue River Member of Fort Union Formation
Tle	Lebo Member of Fort Union Formation
Tft	Tullock Member of Fort Union Formation
Ti	Intrusive rocks, undivided
Kl	Lance Formation
Khc	Hell Creek Formation
Kfh	Fox Hills Formation
Kb	Bearpaw Shale
Kjr	Judith River Formation





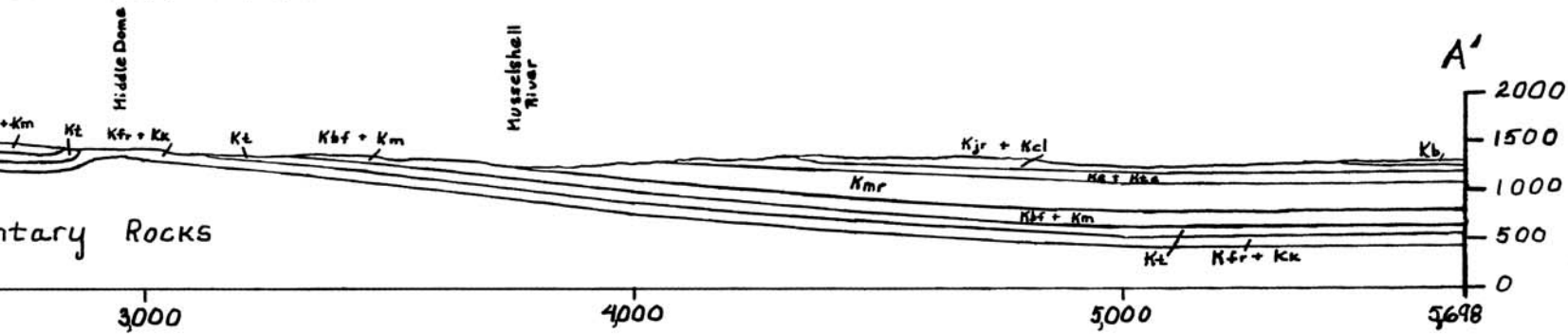
- | | |
|------|---|
| Kcl | Claggett Shale |
| Ke | Eagle Formation |
| Ktc | Telegraph Creek Formation |
| Ket | Eagle and Telegraph Creek Fms., undivided |
| Ktbu | Telegraph Ck. Fm. through upper member of Belle Fourche Fm. |
| Kn | Niobrara Formation |
| Kmku | Upper unit, informal, of Kevin Member of Marias River Fm. |
| Kmke | Eldridge glauconitic beds of Kevin Member of Marias River Fm. |
| Kmkl | Lower unit, informal, of Kevin Member of Marias River Fm. |
| Kmf | Ferdig Member of Marias River Formation |
| Kmc | Cone Member of Marias River Formation |
| Kbfu | Upper member, informal, of Belle Fourche Formation |
| Kbtb | Big Elk Sandstone Member of Belle Fourche Shale |
| Km | Mowry Shale |
| Kt | Thermopolis Shale |
| Kfr | Fall River Sandstone |
| Kk | Kootenai Formation |



Quad index

WHITE SULPHUR SPRINGS	BIG SNOWY MOUNTAINS	MUSSEL- SHELL
RINGLING	HARLOWTON	ROUNDUP
LIVINGSTON	BIG TIMBER	BILLINGS

SECTION A A'



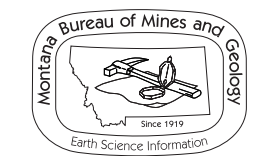
Unit Thicknesses, Meters (ft./3.28)

Tf+r	100+
Tf1e	76
Tf2	61m
Kl	137
Kb	168
Kjr	107
Kcl	61
Ke	116
Ktc	36
Kmk	152
Kmf	122
Kc	30

Kbf	61
Km	100
Kebu	188
Kt	152
Kfr	30
Kk	91

See text for unit names + descriptions
Surficial deposits not shown

NOTE: It is possible that the approximately 1,400-m section shown below West and Middle Domes includes rocks older than Cambrian. Because the Shawmut Anticline lies just south of the Montana aulacogen of the Proterozoic Belt Basin as generally mapped (Nelson, 1993), it is possible that these rocks could be either Archean crystalline or Proterozoic sedimentary rocks, or both.



Maps may be obtained from
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