

Montana Bureau of Mines and Geology
Open File No. 469

Preliminary Geologic Map of the
Bozeman 30' x 60' Quadrangle,
Southwestern Montana

Compiled and mapped by Susan M. Vuke, Jeffrey D. Lonn,
Richard B. Berg, and Karl S. Kellogg

2002

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

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

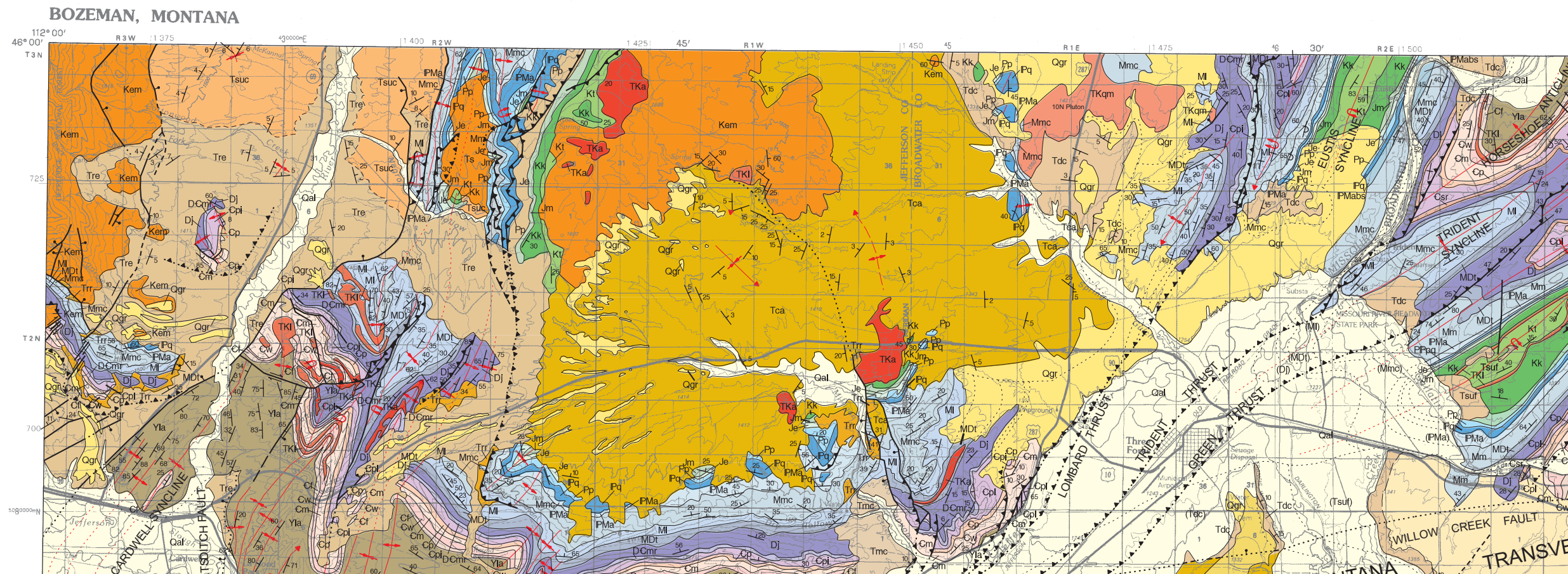
[Digital data link](#)

Note— This map was originally published at a scale of 1:100,000 but the page sizes have been modified to fit average printer capabilities (8½ x 14; legal size paper). There is a an eighth inch overlap on these pages. A full sized colored print of this map can be ordered from the **MBMG Publication Sales Office, 1300 West Park Street, Butte, MT, 59701-8997.**

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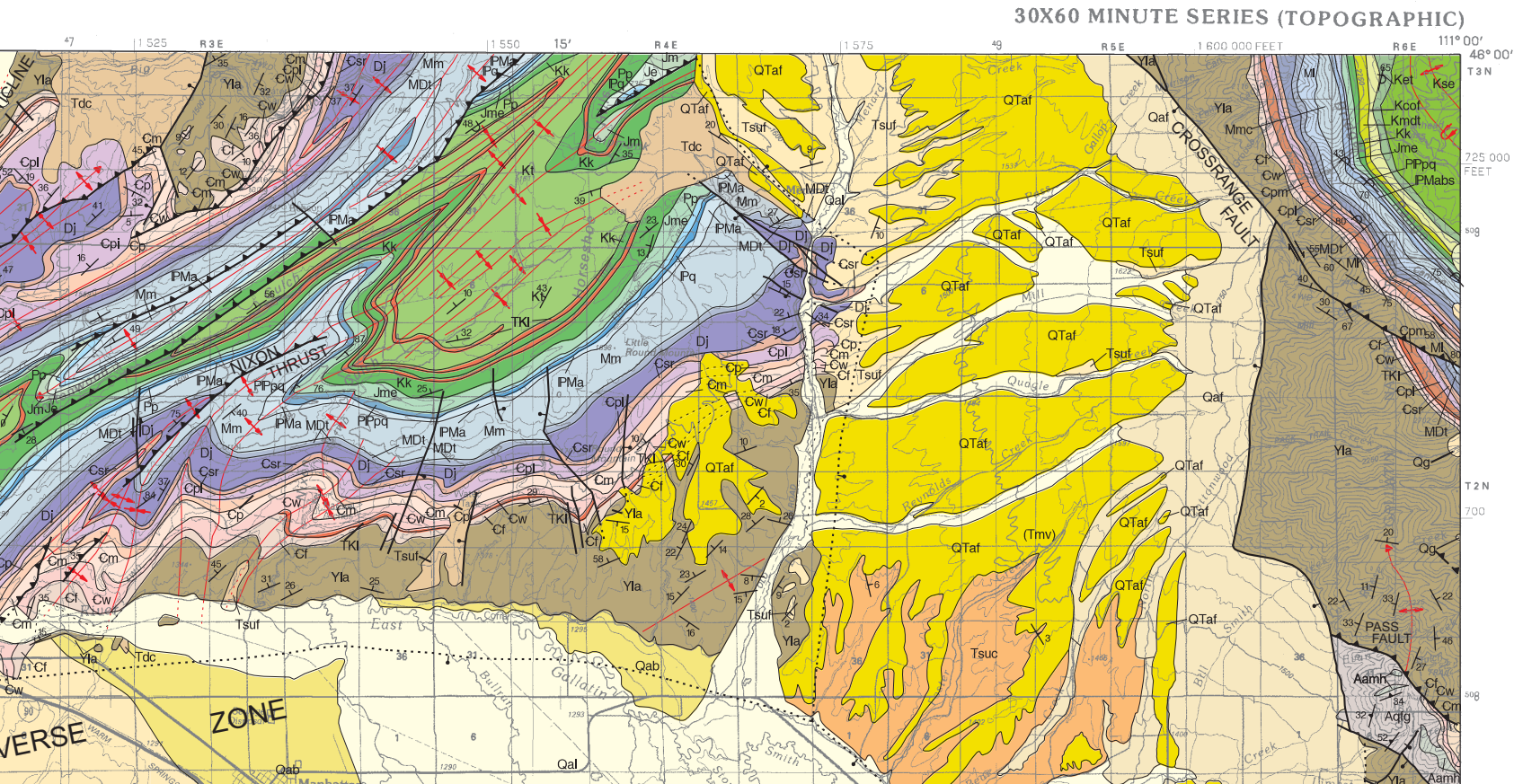
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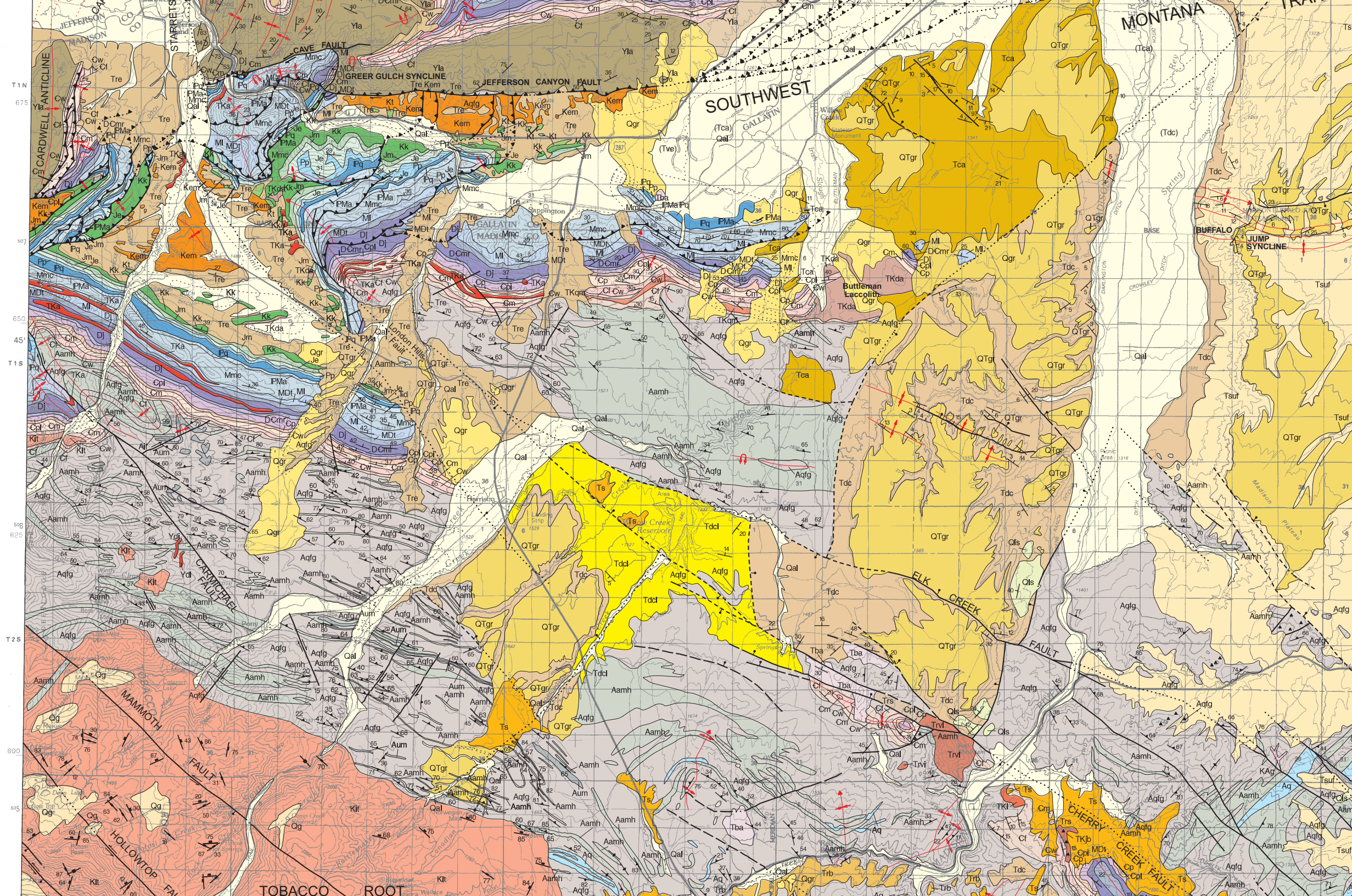
Open File MBMG 469, Plate 1 of 1
Geologic Map, Bozeman 30'x60' Quadrangle



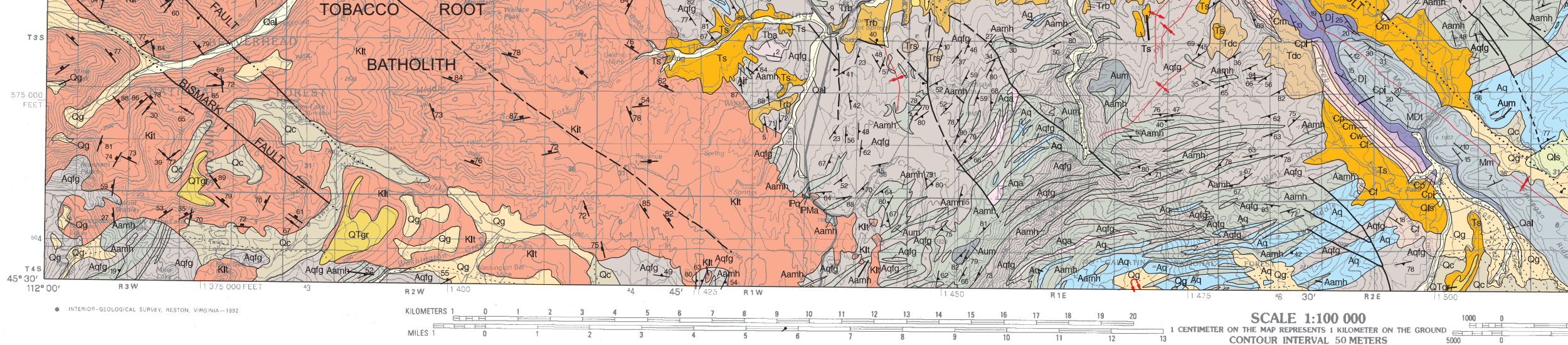
MAP UNITS

Qal	Alluvium of modern channels and flood plains
Qc	Colluvium
Qls	Landslide deposit
Qaf	Alluvial fan deposit
Qat	Alluvium of alluvial terrace deposit
Qafo	Alluvial fan deposit, older
Qgr	Gravel
Qab	Alluvium of braid plains
Qg	Glacial deposits, undivided
QTgr	Gravel
QTaf	Alluvial fan deposit
QTdf	Debris flow deposit
Tsuf	Sediment or sedimentary rock, upper Ter. finer-grained
Tsuc	Sediment or sedimentary rock, upper Ter. coarser-grained
Tdc	Dunbar Creek Formation
Tdcl	Dunbar Creek Formation, lower
Tca	Climbing Arrow Formation
Tmc	Milligan Creek Formation
Trb	Red Bluff Formation
Tre	Renova Formation
Trr	Red Hill member, informal, of Renova Formation
Ts	Sediment or sedimentary rocks, undivided
Tav	Absaroka Volcanics
Trvl	Rhyolite, vitrophyre
Trs	Rhyolite sediment





Trs	Rhyolite sediment
Tba	Basalt
TKjb	Jasperoid breccia
TKI	Latite
TKqm	Quartz monzonite
TKa	Andesite
TKda	Dacite
KIt	Intrusive rock of Tobacco Root Batholith, undivided
Kem	Elkhorn Mountains Volcanics
Kag	Granite
Kse	Sedan Formation
Ket	Eagle and Telegraph Creek Formations, undivided
Kcof	Cody Shale and Frontier Formation, undivided
Kmdt	Mowry Shale and Thermopolis Formation, undivided
Kt	Thermopolis Formation
Kk	Kootenai Formation
Jme	Morrison Formation and Ellis Group, undivided
Jm	Morrison Formation
Je	Ellis Group, undivided
Td	Dinwoody Formation
Pp	Phosphoria Formation
Pq	Quadrant Formation
PPpq	Phosphoria and Quadrant Formation, undivided
PMa	Amsden Formation
PMabs	Amsden and Big Snowy Formations
PMpa	Phosphoria, Quadrant Formations, Amsden Formations
Mm	Madison Group, undivided
Mmc	Mission Canyon Limestone
MI	Lodgepole Limestone
Msr	Snowcrest Range Group
MDt	Three Forks Formation
DJ	Jefferson Formation
Djm	Jefferson Formation and Maywood Formation, undivided
DCmr	Maywood Formation and Red Lion Formation, undivided
Cgs	Grove Creek and Snowy Range Formations
Csr	Snowy Range Formation
Cpl	Pilgrim Limestone
Cpm	Park and Meagher Formation, undivided
Cp	Park Shale
Cm	Meagher Limestone



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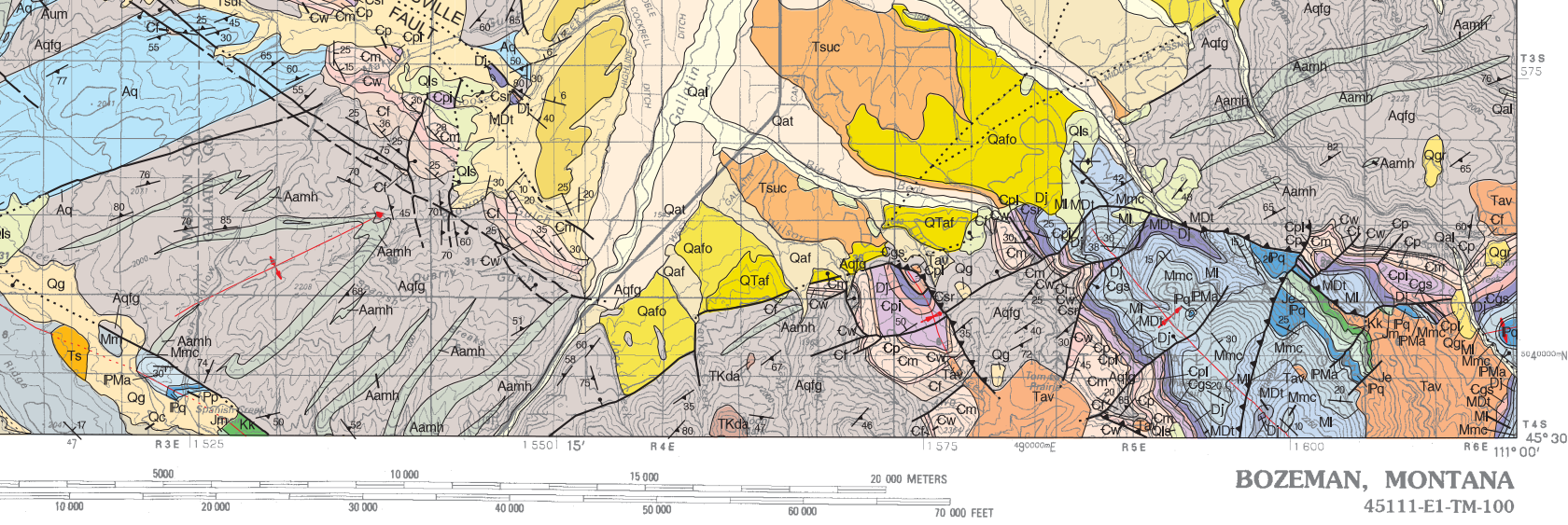
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Revised	Date
Map and text (minor)	1/03

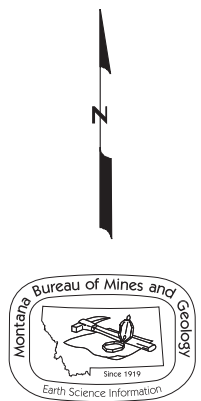
Partial support has been provided by the STATEMAP component of the
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GIS production: Ken Sandau, John Dillon and Paul Thale, MBMG



Cm	Meagher Limestone
Cpf	Park, Meagher, Wolsey and Flathead Formations
Cw	Wolsey Shale
Cl	Flathead Formation
Yla	Lahood Formation
Aqfg	Quartzofeldspathic gneiss
Aqf	Quartzofeldspathic gneiss
Aamh	Amphibolite and hornblende gneiss
Aum	Ultramafic rock
Aqa	Quartzite and amphibolite
Aq	Quartzite
Alf	Banded iron formation

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3MG. Map layout: Susan Smith, MBMG.



Maps may be obtained from
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