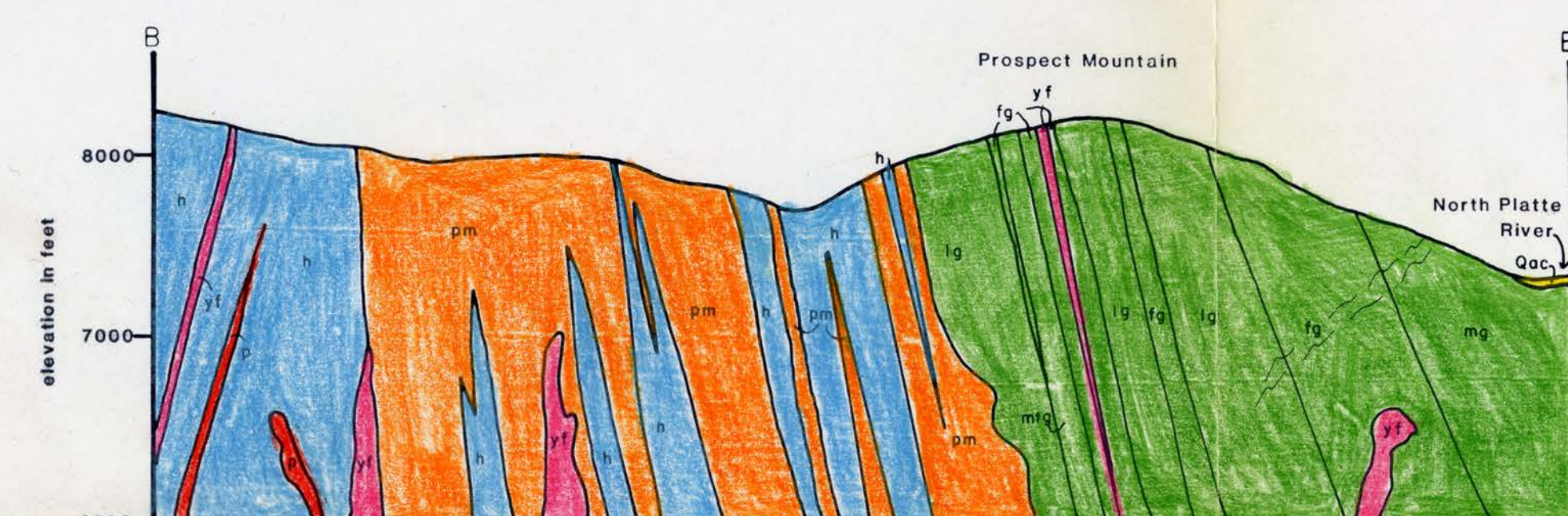
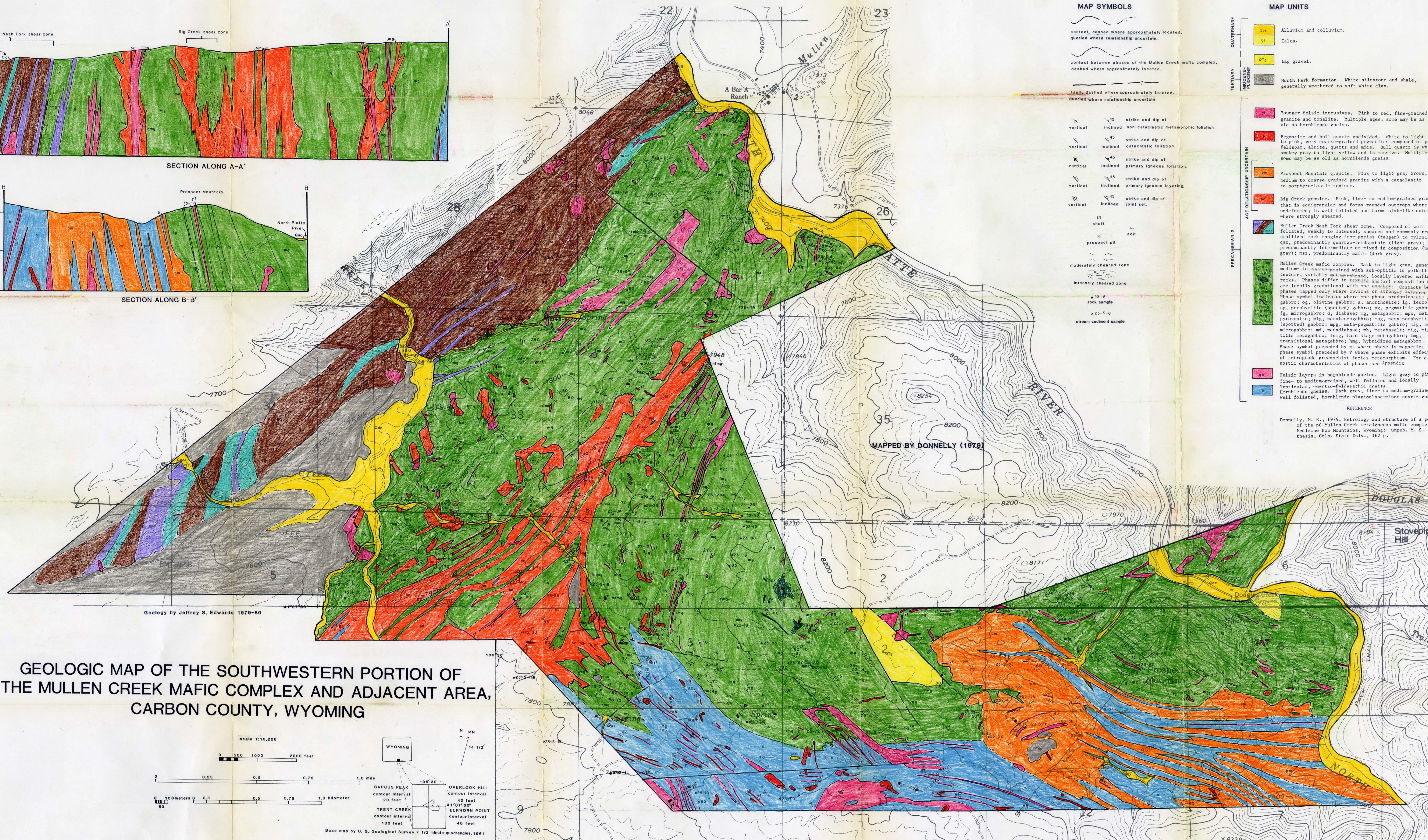


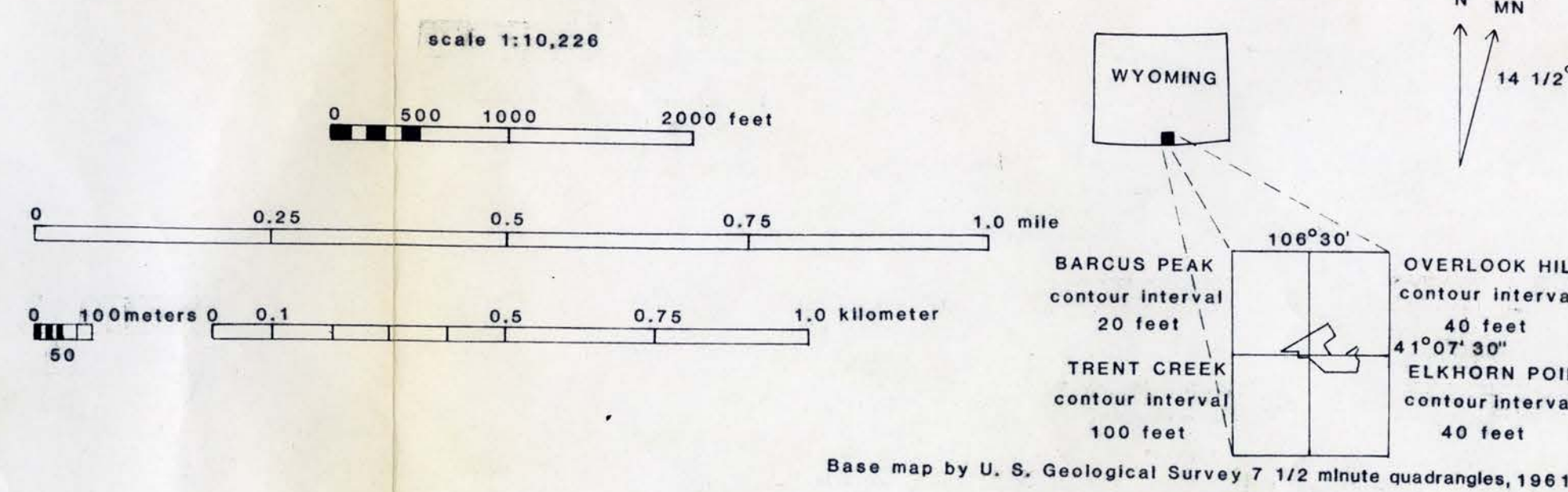
SECTION ALONG A-A'



SECTION ALONG B-B'



GEOLOGIC MAP OF THE SOUTHWESTERN PORTION OF THE MULLEN CREEK MAFIC COMPLEX AND ADJACENT AREA, CARBON COUNTY, WYOMING



MAP SYMBOLS

contact, dashed where approximately located, queried where relationship uncertain.

contact between phases of the Mullen Creek mafic complex, dashed where approximately located.

fault, dashed where approximately located, queried where relationship uncertain.

strike and dip of vertical inclined strike and dip of vertical inclined strike and dip of vertical inclined strike and dip of vertical inclined strike and dip of vertical inclined

shaft prospect pit moderately sheared zone intensely sheared zone 23-8 rock sample 23-5-8 stream sediment sample

MAP UNITS

QUATERNARY
Alluvium and colluvium.
Talus.
Lag gravel.

TERTIARY
North Park formation. White siltstone and shale, generally weathered to soft white clay.

AGE RELATIONSHIP UNCERTAIN
Younger felsic intrusives. Pink to red, fine-grained granite and tonalite. Multiple ages, some may be as old as hornblende gneiss.
Pegmatite and bull quartz undivided. White to light gray to pink, very coarse-grained pegmatite composed of potash feldspar, albite, quartz and mica. Bull quartz is white to smoky gray to light yellow and is massive. Multiple ages, some may be as old as hornblende gneiss.
Prospect Mountain granite. Pink to light gray brown, medium to coarse-grained granite with a cataclastic to porphyroclastic texture.
Big Creek granite. Pink, fine- to medium-grained granite that is equigranular and forms rounded outcrops where undeformed; is well foliated and forms slab-like outcrops where strongly sheared.
Mullen Creek-Nash Fork shear zone. Composed of well foliated, weakly to intensely sheared and commonly recrystallized rock ranging from gneiss (augen) to mylonite; qtz, predominantly quartz-feldspathic (light gray); sz, predominantly intermediate or mixed in composition (medium gray); msz, predominantly mafic (dark gray).

PRECAMBRIAN X
Mullen Creek mafic complex. Dark to light gray, generally medium- to coarse-grained with sub-ophitic to poikilitic texture, variably metamorphosed, locally layered mafic rocks. Phases differ in texture and/or composition and are locally gradational with one another. Contacts between phases mapped only where obvious or strongly inferred. Phase symbol indicates where one phase predominates: gabbro; og, olivine gabbro; a, anorthosite; lg, leucogabbro; sg, porphyritic (spotted) gabbro; pg, pegmatitic gabbro; fs, microgabbro; d, diabase; mg, metagabbro; mp, metapyroxenite; alg, meta-leucogabbro; msg, meta-porphyrific (spotted) gabbro; mpg, meta-pegmatitic gabbro; mfg, meta-microgabbro; md, metabasalt; mb, metabasite; mbs, magnetitic metagabbro; lmsg, late stage metagabbro; tmg, transitional metagabbro; hmg, hybridized metagabbro. Phase symbol preceded by mt where phase is magnetic; phase symbol preceded by r where phase exhibits effects of retrograde greenschist facies metamorphism. For diagnostic characteristics of phases see Appendix.

Felsic layers in hornblende gneiss. Light gray to pink, fine- to medium-grained, well foliated and locally lenticular, quartz-feldspathic gneiss.
Hornblende gneiss. Dark gray, fine- to medium-grained, well foliated, hornblende-plagioclase-minor quartz gneiss.

REFERENCE

Donnelly, M. E., 1979, Petrology and structure of a portion of the Mullen Creek mafic complex, Carbon County, Wyoming, unpub. M. S. thesis, Colo. State Univ., 162 p.

