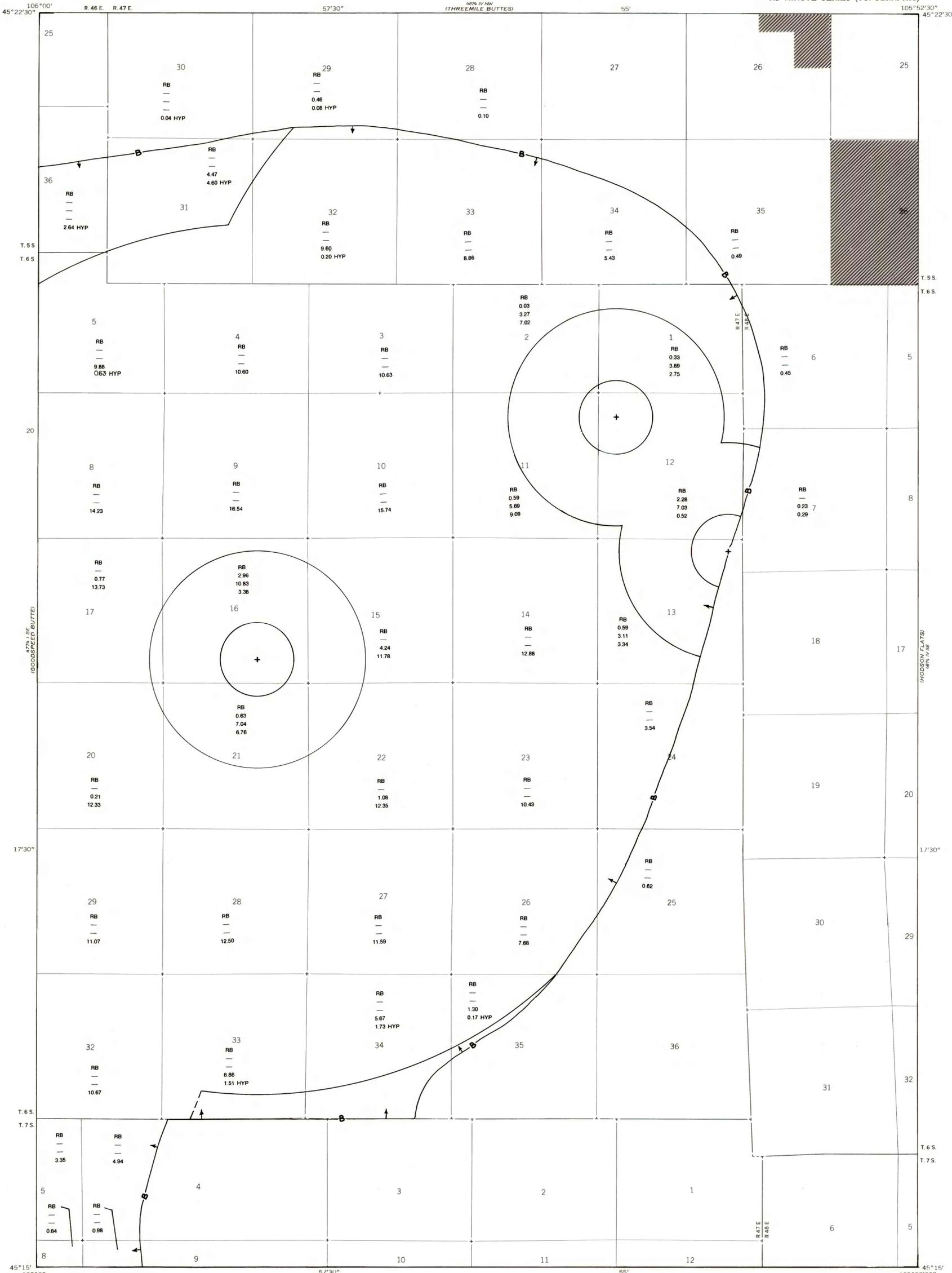


OPEN-FILE REPORT
This report has not been edited for conformity with
U.S. Geological Survey editorial standards or
stratigraphic nomenclature.



EXPLANATION

NON-FEDERAL COAL LAND—Land for which the Federal Government does not own the coal rights.

BOUNDARY OF COAL 5 FEET OR MORE THICK—Drawn along the outcrop of coal bed and/or the inferred contact between burned and unburned coal, and/or the 5-foot coal isopach, and/or an insufficient data line. Arrows point toward area of coal 5 feet or more thick.

POINT OF MEASUREMENT ON COAL BED

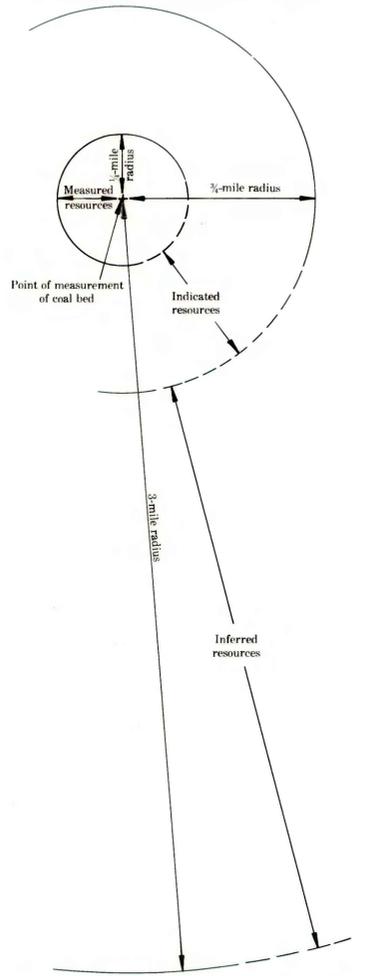


DIAGRAM SHOWING COMPONENT AREAS OF IDENTIFIED COAL RESOURCES—Shows arcuate boundary lines enclosing areas of measured, indicated, and inferred coal resources. Boundaries of areas are dashed where projected from an adjacent quadrangle. Areas of measured, indicated, or inferred resources may be present on this map without their outer boundaries being shown. Coal resources beyond the inferred category are hypothetical resources.

LEGEND

RB (Measured resources)
— (Indicated resources)
886 (Inferred resources)
1.51 HYP (Hypothetical resources)

IDENTIFIED AND HYPOTHETICAL COAL RESOURCES—Showing totals for Reserve Base (RB) and Hypothetical (HYP) resources, in millions of short tons, for each section or part(s) of a section of Federal coal land outside the stripping-limit line. Dash indicates no resources in that category.

NOTE: Recovery factors have not been established for underground development of coal in this quadrangle. Therefore, Reserves (R) were not calculated for the coal bed in areas outside the stripping-limit line.

NOTE: No stripping-limit line is shown because there is more than 500 feet of overburden above the coal that is 5 feet (1.5 m) or more thick.

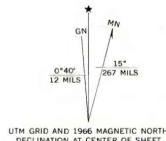
To convert short tons to metric tons, multiply short tons by 0.9072.

To convert feet to meters, multiply feet by 0.3048.

To convert miles to kilometers, multiply miles by 1.61.

Base map from U.S. Geological Survey, 1966

Compiled in 1977



**COAL RESOURCE OCCURRENCE MAP OF THE PHILLIPS BUTTE QUADRANGLE,
POWDER RIVER COUNTY, MONTANA
BY
COLORADO SCHOOL OF MINES RESEARCH INSTITUTE
1979**