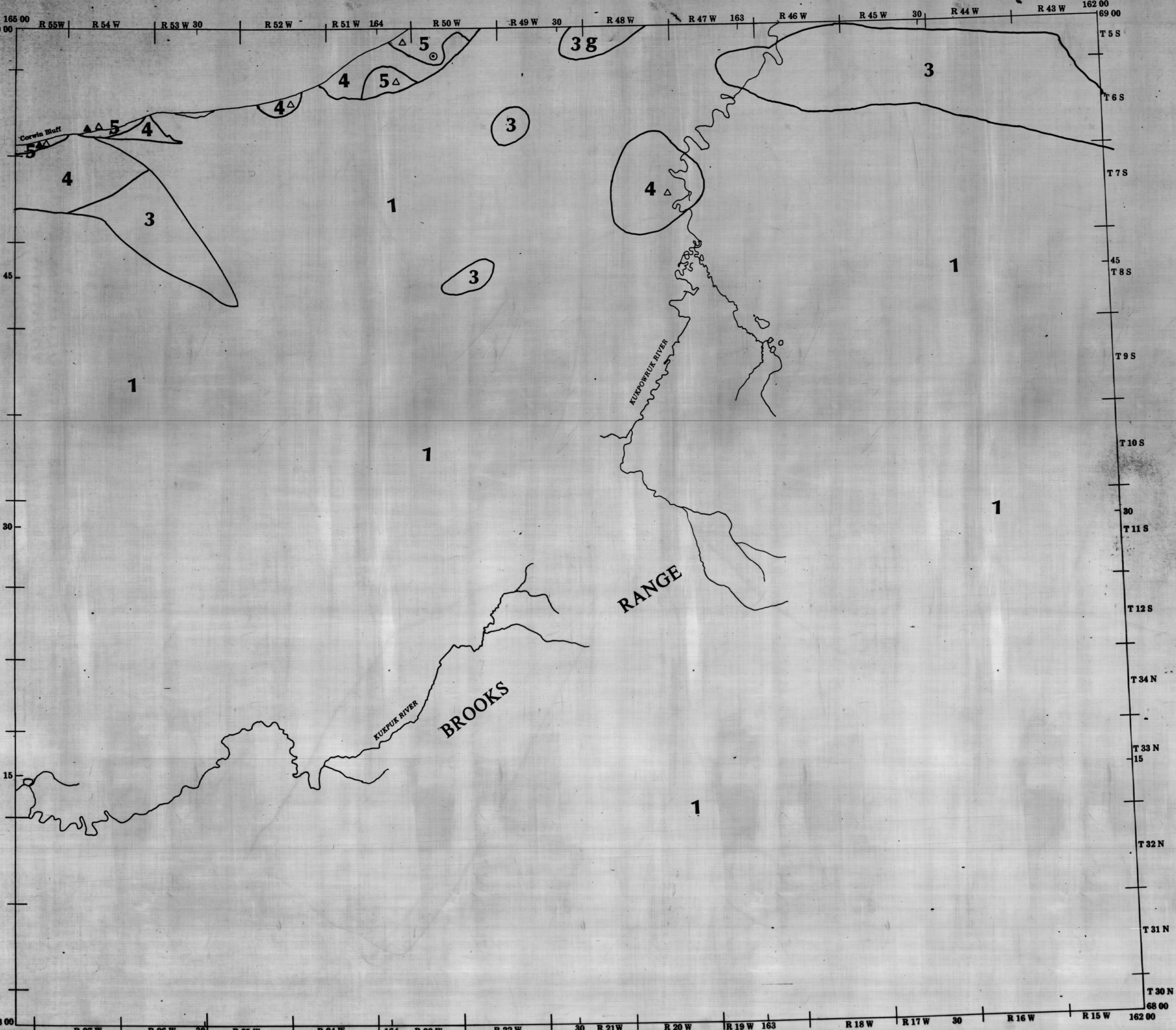


ALASKA DIVISION OF GEOLOGICAL & GEOPHYSICAL SURVEYS

EXPLANATION

SUMMARY: DELONG MOUNTAINS QUADRANGLE

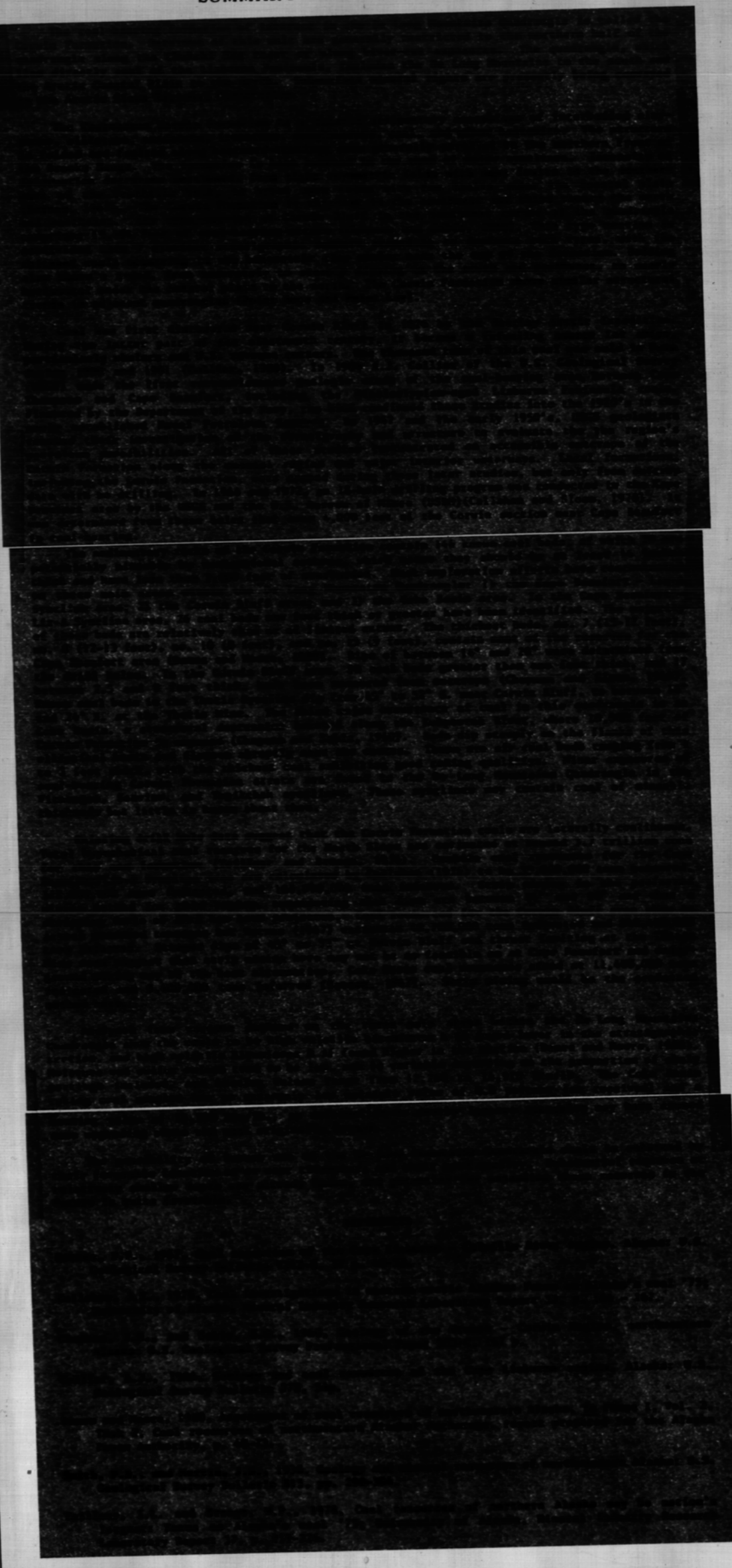
GLOSSARY



COAL RESOURCE RATING CRITERIA

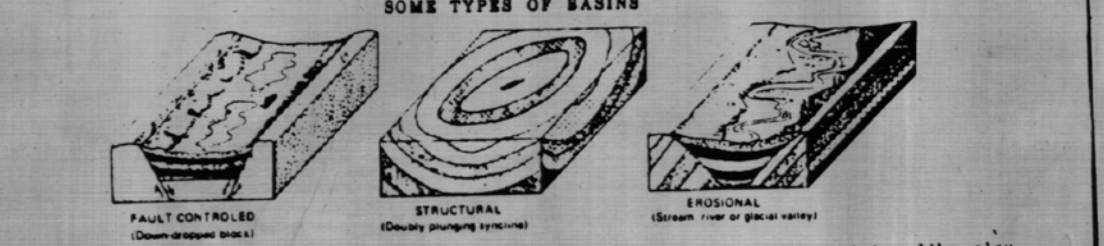
The following resource rating criteria are presented on a scale of 1 - low to 5 - high potential. A rating of 1 indicates virtually no possibility for substantial coal discoveries...

- 1 Very low to low possibility for substantial coal discoveries; sedimentary and other rock units vary from map to map; this rating based almost entirely on published general, broad-brush geological maps.
2 Low to medium possibility for substantial coal discoveries; these ratings based mostly on published general, broad-brush geology.
3 Medium to high possibility for substantial coal discoveries.
4 Known coal, lesser occurrences, and/or less well studied than 5's.
5 Known coal, medium to large measured resources (see Glossary) of usable quality coal.

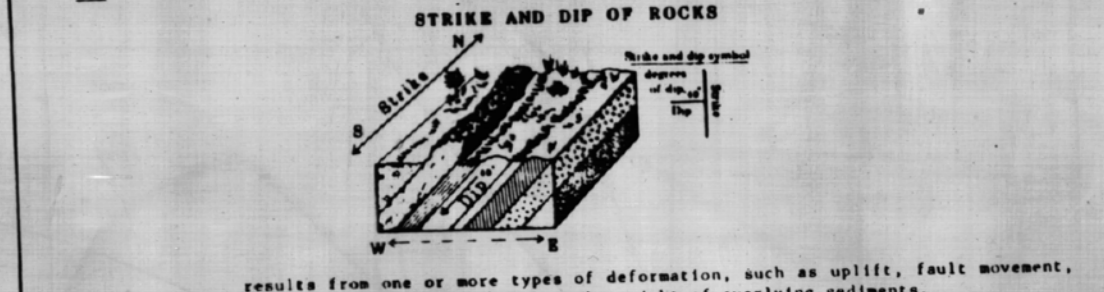


anticline/syncline - Back structures formed from the large-scale folding of massive rock units; the upward folded portion of the rock is the anticline, with an inverted U-shaped cross section; the downward folded part is the syncline, with a U-shaped cross section.

ash - Residual mineral impurities left after the combustion of coal. High-ash coal has more than 15% total ash; coal with less than 8% total ash is low-ash coal.
ASTM - American Society for Testing Materials; sets many specifications for materials and standards for materials testing used in the United States.



bone coal - Coal that contains a high percentage of incombustible impurities like clay, dirt, or rock fragments; if the material contains over 12% ash, it is considered to be carbonaceous rock rather than coal and is not included as coal in resource calculations.
Btu - British thermal unit; one Btu equals the amount of heat needed to raise the temperature of one pound of water one degree Fahrenheit; the standard unit used in the United States to describe the heating value of fuels (and coal) other than countries use kilocalories per kilogram as a standard thermal unit.

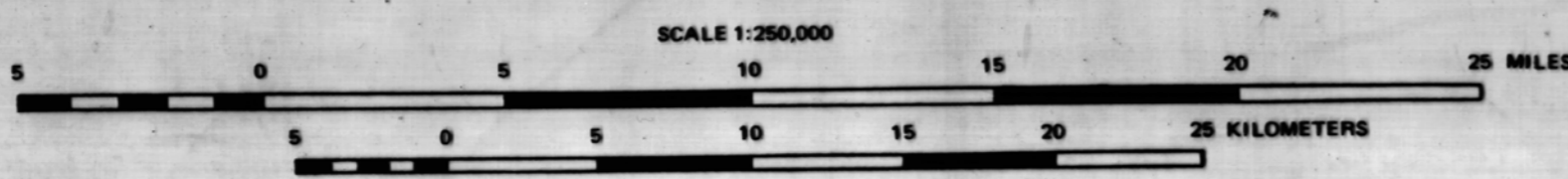
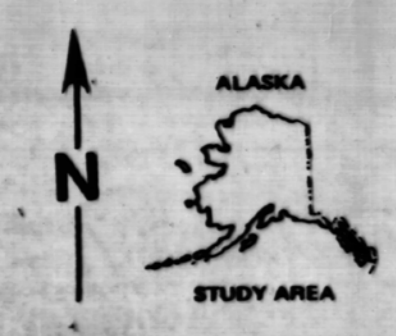


Fixed Carbon - The solid residue, other than ash, obtained by destructive distillation of coal; determined by definite prescribed ASTM methods.
strike - The line formed by the intersection of the dip plane of a tabular rock unit with the horizontal; for example, if the dip is 30 degrees toward the west, then the strike is north-south (see 'dip').
stripping ratio - The ratio of overburden (soil and rock covering the coal) to coal being mined by strip mining methods; reserve estimates usually omit coal deposits with stripping ratios higher than about 10; because these are seldom economic.

Table with 2 columns: Rank, Btu/lb, and Fixed Carbon %.

The many types of coal in Alaska are classified, or ranked, according to physical and chemical properties. A coal's rank is determined by laboratory testing of its properties using ASTM standardized methods. Rank is based primarily on heating value (Btu/lb) and content of certain physical components. Rank is based primarily on heating value (Btu/lb) and content of certain physical components.

Alaska Department of Natural Resources logo and contact information.



LOCATION INDEX table with columns for Range and Township coordinates.

SYMBOLS: Former Coal Mine, Coal Outcrop or Prospect, Coal Float (General Location), Drilling Done in this Area.

Each number rating, 1 through 5, has typical typical levels of data confidence. A rating of 1 often implies limited geological data as well as a lack of coal potential. A rating of 5 often implies more and better data, as well as greater coal potential.