

LITHOLOGIC DESCRIPTION OF ROCK SPRINGS WELL NO. 1-2
SESENW SEC 15 T 18 N R 106 W SWEETWATER COUNTY, WYOMING

February 18, 1966

By
George F. Dana

Footage	Description	Remarks
40.5-40.7	Sandstone, gray, very fine to fine-grained silty, calcareous, pyritic.	
40.7-43.6	Shale, oil, light gray to mostly medium dark gray, finely laminated.	
43.6-45.9	Shale, oil, light gray-green to medium gray to olive drab, abundant iron sulphide crystals from 43.6-44.9, occasional crystals 44.9-45.9. Inclusions of limestone, brown to purple, dense, fractured and oil-stained at 44.3, 44.4, 44.7.	
45.9-46.6	Shale, oil, medium gray, slightly limey.	
46.6-48.2	Shale, oil, dark gray to sooty black, finely laminated.	
48.2-48.5	Sandstone, buff, tan, very fine to fine-grained fairly tight, shaley in part.	
48.5-49.4	Shale, oil, same as 46.6-48.2.	
49.4-49.7	Ash, clay and sandstone, white to yellow and buff, very fine-grained, porous, loosely cemented, fractured with fractures filled with particles of gray oil shale, banded with shale varves near top and on bottom of section.	
49.7-50.0	Shale, oil, dark gray.	
50.0-51.4	Shale, oil, light gray, olive drab, dark gray, with limestone seams at 50.6 to 50.8, 51.1, iron sulphide crystallization abundant to 50.8.	
51.4-52.7	Shale, oil, medium gray, slightly calcareous.	
52.7-57.0	Shale, oil, dark gray to sooty black, occasional laminations with lighter gray shale.	
57.0-57.1	Ash, clay, sandstone, white to yellow to tan, very fine-grained, argillaceous, extensively fractured with fractures filled with dark shale particles, slightly porous.	
57.1-57.8	Shale, oil, medium to dark gray with 2 zones of gray-green, iron sulphide crystals, one layer gray sandstone at 51.6.	

Footage	Description	Remarks
57.8-58.1	Limestone, usually as concretionary bodies or as inclusions, tan to purple, dense, fractured with fractures filled with brown resinous residue.	
58.1-60.3	Shale, oil, gray-green, medium brown, olive drab to dark gray, abundant iron sulphide crystallization, limestone as nodules, tan to brown at 58.6, 58.7, 58.9, and 59.1.	
60.3-60.4	Limestone, brownish-purple, finely crystalline, dense, fractured, dolomitic.	
60.4-60.9	Shale, oil, grayish purple to medium gray, trace green, silty, some iron sulphide crystals.	
60.9-62.2	Shale, oil, medium gray to dark gray, large purple limestone inclusion at 61.4.	
62.2-62.4	Sandstone, yellowish-tan to gray and brown, very fine to fine-grained, fairly tight, dirty fractured with fractures filled with gray and black shale, pyritic in part, oil-stained.	
62.4-62.8	Shale, oil, dark gray to sooty black, laminated with thin brown shales.	
62.8-63.5	Shale, oil, dark gray to black.	
63.5-64.3	Shale, oil, medium gray, slightly calcareous, thin limey zones 63.5 to 63.7, conchoidal fracturing of the shale.	
64.3-64.5	Sandstone, gray to brown, fine-grained, highly fractured, limestone fragments are oil stained, pyritic.	
64.5-65.4	Shale, oil, medium gray, laminated with thin light gray layers minor crystals of iron sulphide. From 65.2-65.3 and 65.3-65.4 are limestone zones, tan and shades of purple, argillaceous, dense.	
65.4-66.6	Shale, oil, dark gray to black, occasional thin tan limestone bed.	
66.6-67.0	Sandstone, pink to tan and buff, very fine-grained, slightly dolomitic, fairly porous, oil-stained, interbedded with dark calcareous shales near base 66.9-67.0. M-BED	
67.0-67.4	Shale, oil, black, with occasional very thin, tan to brown, limestone laminae.	

Footage	Description	Remarks
67.4-68.7	Shale, oil, greenish-gray to medium brownish-gray, some thick laminae layers of light brown, limestone, dense, argillaceous.	
68.7-69.1	Limestone, tan to light brown, argillaceous, dense.	
69.1-69.2	Shale, oil, medium gray-green, very thin bands of limestone.	
69.2-69.4	Limestone, brown to purple, finely crystalline, sucrosic in part, dense, some argillaceous around top zone.	
69.4-69.5	Shale, oil, medium brown to olive drab, interbedded with zone of sandstone veinlets, salt and pepper, very fine, grained, slightly calcareous.	
69.5-70.4	Shale, oil, gray-green, olive drab to brownish gray, several zones of iron sulphide crystals and tan, argillaceous limestone beds at 69.9 and 70.1.	
70.4-70.8	Shale, oil, medium gray to medium brown, grading in color downward.	
70.8-71.0	Shale, oil, dark gray to black, interbedded with light brown limestone layers, argillaceous, dolomitic.	
71.0-71.2	Sandstone, white, pink, maroon, very fine to fine grained, porous with inclusion of coal at base.	
71.2-71.5	Limestone, lavender to purple, dense, finely crystalline with zone of oil shale, dark gray, at 71.3-71.4.	
71.5-71.9	Shale, oil, dark gray to brownish-black, partly calcareous.	
71.9-72.1	Shale, light gray to light gray-green, conchoidal fracturing.	
72.1-72.4	Shale, oil, dark brownish gray, finely laminated.	
72.4-72.5	Ash, clay and sandstone, white to maroon, very fine-grained, argillaceous, finely fractured with fractures filled with dark shale and quartz, slight oil-stain, some iron stain.	
72.5-75.3	Shale, oil, light gray to light brownish green, conchoidal fractures, thickly banded with tan to buff limestones, argillaceous.	

Footage	Description	Remarks
75.3-76.3	Shale, oil, gray-green.	
76.3-76.6	Limestone, tan to buff, argillaceous, dense.	
76.6-77.7	Shale, oil, medium gray-green to tannish green, with tan arenaceous limestone beds at 76.7 and 77.1.	
77.7-78.0	Sandstone, brown to tan, very dolomitic very fine-grained, dense and tight, with some thin layers of black shale, contorted.	
78.0-78.8	Shale, oil, black, and dolomitic limestone, gray to tan to brown, abundantly laminated, occasional limestone inclusions.	
78.8-79.4	Shale, banded light and dark gray with some tan and some pseudostylolites.	
79.4-80.0	Shale, oil, dark gray to black, pseudostylolites throughout matrix.	