

Black Hills Fluorite - Peterson, Allen, Wright, Smith each have claims.

Fluorite showings occur sporadically in an area about 2 miles long and perhaps a few hundred feet wide. A number of pits have been dug exposing fluor spar of varying quality and quantity.

The fluorite occurs in veins in porphyry and in limestone. Some of the veins - those in limestone - are bedding veins, others - in porphyry and limestone - cut across the associated rocks. The fluorite has apparently been introduced along fractures in the enclosing rocks. Upon reaching the nearly horizontal bedding of the limestone it spread laterally. The fluorite veins are replacement veins - both the bedding and transecting types.

Although fluorite occurs over a large area, there is considerable doubt that much of this area actually contains fluorite. It may be that only locally - in a number of small veins - does the fluorite occur. It is true that locally the fluorite veins thicken so that fair-sized chunks of rock containing fluorite can be found.

Because much of the fluorite occurs a few feet beneath the present land surface it has been proposed that the area containing fluor spar be stripped and the "ore" then removed. This is perhaps possible but expensive.

Much of the fluorite is not shipping material. Some may not even be milling "ore". The best fluorite shows good cleavage faces and is purple, blue, or colorless. Most of the rest shows good color but is disseminated through rock.

This project seems to be a large-scale one requiring considerable capital for its operation. It is possible - through doubtful - that there is sufficient milling material to warrant opening the property. It would probably take one or two weeks of careful geologic mapping to determine much about the structure.

The veins vary in thickness up to only a few feet. The fluorite pits occur in an area that trends from N. 25° E. to N. 55° E.

Visited with Peterson and oldest son.

Black Hills Fluorite - Peterson, Allen, Wright, Smith each have claims

50-VI-43

Fluorite showings occur sporadically in an area about 2 miles long and perhaps a few hundred feet wide. A number of pits have been dug exposing fluorite of varying quality and quantity.

The fluorite occurs in veins in porphyry and in limestone. Some of the veins - those in limestone - are bedding veins, others - in porphyry and limestone - cut across the associated rocks. The fluorite has apparently been introduced along fractures in the enclosing rocks. Upon reaching the nearly horizontal bedding of the limestone it spread laterally. The fluorite veins are replacement veins - both the bedding and transsecting types.

Although fluorite occurs over a large area, there is considerable doubt that much of this area actually contains fluorite. It may be that only locally - in a number of small veins - does the fluorite occur. It is true that locally the fluorite veins thicken so that fair-sized chunks of rock containing fluorite can be found.

Because much of the fluorite occurs a few feet beneath the present land surface it has been

proposed that the area containing fluorapatite be stopped and the ore then removed. This is perhaps possible but expensive.

Much of the fluorite is, not shipping material. Some may not even be milling "ore". The best fluorite shows good cleavage faces and is purple, blue, or colorless. Most of the rest shows good color but is disseminated through rock.

This project seems to be a large-scale one requiring considerable capital for its operation. It is possible - though doubtful - that there is sufficient milling material to warrant opening the property. It would probably take one or two weeks of careful geologic mapping to determine much about the structure.

The veins vary in thickness up to only a few feet. The fluorite pits occur in an area that trends from $N 25^{\circ} E$ to $N 55^{\circ} E$.

Visited with Peterson & oldest son.