

rocks which are of most importance as the possible source of the metal. But, as is well known, the productive material has, up to the present, been almost exclusively confined to the gravels of the valleys.

These deserve somewhat careful study, since two possibilities present themselves ; the gravels have either been derived from rocks of the same character as those now visible to the Klondike district, or they have been derived from rocks of a different nature which have been entirely removed : in the latter case there would be no particular reason to search for gold in the schists themselves.

I may say at once, that so far as I was able to see, the gravels contain nothing that might not have been obtained by the mechanical destruction of rocks identical with those which now constitute the main mass of the Dome and the surrounding heights.

Among the minerals which I have seen from the gravels are Magnetite, Hæmatite, Rutile, Pyrites, Graphite, Kyanite, Garnet, Cassiterite, Epidote and Tourmaline. These are all minerals which may well occur as constituents of the schists, few of them have suffered much alteration, and like the pebbles of the gravel, they show no signs of having been transported any considerable distance. The pyrites, indeed, is usually in perfectly sharp crystals, but it is possible that these have been derived from the undisturbed bed-rock. On Hunker Creek I saw also barytes, which occurs in the gravel, and mispickel from the schist.

The gold is generally flattened, but comparatively slightly worn. Although crystals, or even crystalline and dendritic pieces, are rare, those which have been found preserve in many instances almost their original sharpness of outline, and are neither broken nor much rounded.

In some of the creeks, on Hunker, for example, and notably, I believe, on Mint Gulch, the gold is very dark in colour ; closer examination shows this darkening to be merely due to a super-