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A suggested list of appraisal points of material is as follows:

- 1. Material. On page 32 is a compiled list of various kinds of lithic materials including some seven groups and sub-classes. This list is far from complete and includes only those materials with which I am familiar.
- 2. Chemical Composition. Minerals are made up of many, many ites and the complete list and breakdown will have to be left to the qualified mineralogists.
- 3. Chemical Composition This represents the porportion, the arrangement of and the relation to the different elements and compounds involved in the materials useful for the flaked stone industry.
- 4. Refractive Index. This index is an accurate method of indicating

 the reflection and absorption of light in solids. The re
 fractive index should be much the same as texture in degree,

 however, texture is only relative while the refractive index has

 a numerical value. Various minerals may have different light

 absorbing values that would have no bearing on texture.
- 5. Color. Color is an excellant aid in the initial sorting of detritus,

 debitage, flake assemblages and accumulations of material rejects

 discarded by people of the stone age. Certain distinctive colors

do afford a key to the points of origin even tho the textures do not always remain the same.

- 6. Source. The importance of material source has been previously discussed.

 the character of external flakes and discards can contribute much information regarding the source (also see No.15, Cortex)
- 7. Geographical Area. The geographical area deals with the spacial distribution of material from known quarry sites and the transportation and trade routes of certain (special) materials. If the distribution is great, it would seem to indicate a material of special quality for the flakes tool industry.
- 8. Geological Occurance. Geological occurance can be useful when the material is found in place. Certain attributes, types of crystallization, textures, colors and qualities may be directly influenced by the geological nature in which it was formed. The finding of a deposit of usable material in place will do much towards a more accurate identific tion of a material in question than a flake found on the furface.
- 9. Light Transmission. Light transmission is an important identifying feature being useful in determining the colors by a transparency rather than a reflected light. If one will moisten a thin flake,— or a thick one broken to a sharp edge then hold it towards a bright light one will be able to see the degree of transluency as well as the mineral structure. The wetting of the surface

is also good to bring out the true color of the reflected light and, as the same time, aid in revealing the structure which may be characteristic to that particular material. It is often difficult to determine the difference between ignumbrite and obsidian in the field but upon holding a thin edge to of a flake towards a bright light the ignumbrite is generally opaque or a very uneven distribution of coloring matter in the form of granules while obsidian has a uniform distribution of color with different degrees of translucency.