

Brain Challenge: Rocks and Minerals

Mineral Identification Activity:

The following table is provided for use in a hands-on activity of mineral identification.















The presenter or teacher needs to provide:

- Mineral specimens for the children to handle
- Copper coins, dull knives, steel files
- Streak plates
- Magnets
- Hand lenses




The children can be divided into small groups. The table gives clues to help the children to identify the mineral specimens. The mineral specimens can be labelled with numbers or letters for the children to complete the table.

BRAIN CHALLENGE

Rocks and Minerals: 🔍 Can you identify the minerals with the help of these clues?

Mineral	Colour	Lustre 	Hardness 	Specific Gravity 	Streak 	Other Clues	Number?
Galena	Grey with reddish tinge	Metallic Dull	Scratches with copper coin 	7.6 	Grey black	May have a cubic shape 	
Graphite	Dark grey to pale grey Black	Metallic Dull	Scratches with fingernail 	2.3 	Grey to Black	Feels greasy, Colour rubs off in the hand	
Magnetite	Iron Black	Metallic Dull	Scratches with steel file 	5.2	Black	Magnetic 	
Hematite	Grey black Red brown Tarnishes	Metallic Dull	Scratches with steel file 	5.3	Red to Red Brown	Kidney Ore  , Roses 	

Malachite	Light green to Black green	Glassy Silky Dull	Scratches with knife 	3.95	Light Green	May be globular 	
Pyrite	Brassy Yellow Brown to rust-red weathering skin	Metallic	Scratches with steel file 	5.2	Greenish Black	May have a cubic shape  Known as 'Fool's Gold'	
Talc	Colourless White Greenish	Pearly Greasy	Scratches easily with fingernail 	2.8 	White	Feels greasy	
Halite	Colourless White Grey Brown Red	Glassy	Scratches with fingernail 	2.2 	White	May have a cubic shape  Known as 'Salt'	
Quartz	Colourless White	Glassy	Quartz scratches glass 	2.65 	White	May find six-sided prisms with pyramid ends	
Calcite	Colourless White Different Colours	Glassy	Scratches with copper coin 	2.8 	White	May see double refraction or twinning	
Gypsum	Colourless White Different colours	Glassy Pearly Silky	Scratches with fingernail 	2.4 	White	May see twinning or roses 	
Muscovite	Colourless	Glassy Pearly Metallic	Hard to scratch with fingernail  , Scratches with copper coin 	2.88 	White	Breaks in one direction to form thin flat sheets 	

Apatite	Colourless White Different colours	Greasy Glassy	Scratches with knife 	3.22	White	Hexagonal 	
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