

## Mixtures Study Guide

Learning Target (LT M.4): I can describe the ways (methods/techniques) to separate parts of a mixture.

Essential Questions:

What are mixtures and how are they different from pure substances?

What are the types of mixtures and what are their characteristics?

What methods do we use to separate mixtures?

Vocabulary- Level 7 (Basic):

mixture-

pure substance-

heterogeneous mixture-

homogeneous mixture-

solution-

solvent-

solute-

dissolve-

colloid-

suspension-

boiling-

chromatography-

evaporation-

filtration-

magnets-

screening-

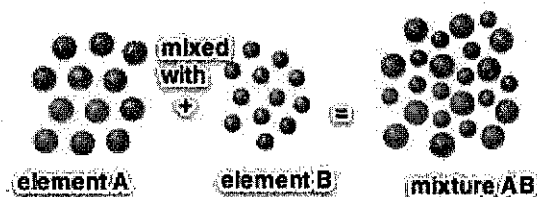
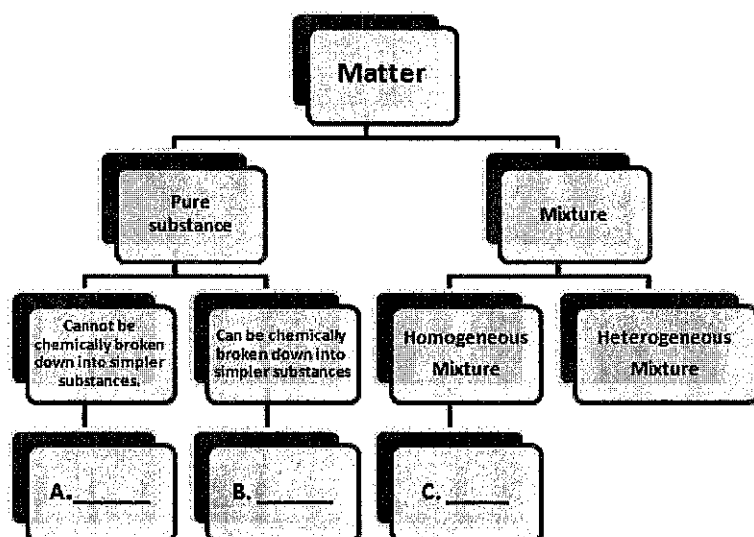
sorting-

**Levels 9 & 10 (Proficient/Advanced):**

Explain how to separate a mixture of sand and iron filings (Hint: this can be done with one separation technique).

Explain how to separate a solution of salt water with sand in it (Hint: This takes at least two techniques as salt is dissolved and can't be filtered by a simple filter)

In the picture below identify label a, b and c as either a solution, element or compound.



The illustration above shows how a mixture might be produced. Substance A and substance B are physically combined (mixed) to produce a mixture (AB). Describe in words and pictures how this process would differ if A and B produced a compound.