Week 7 Worksheet

Explain how each of the techniques below can be used for identification of two unknowns in a given mixture:

**Nuclear Magnetic Spectroscopy (NMR)**

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**Thin-Layer Chromatography**

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**Melting Point Determination**

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Imagine that you identified your unknown compounds in a mixture to be propyl-hydroxybenzoate and p-acetophenetidide. What technique would you use to separate the two compounds and why? In which case would a different technique be used?

![propyl-hydroxybenzoate](image)

propyl-hydroxybenzoate

![p-acetophenetidide](image)

p-acetophenetidide