How to do phonemic analysis:

- Check for a minimal pair
  - i.e. a pair of words, with distinct meaning, identical except for the phonetic difference in question.
  - If you find a minimal pair , then the phonetic difference in question is contrastive. The 2 sounds are separate phonemes. No rule needed, you're done.
  - If no minimal pair, continue.
- Check for complementary distribution
  - What does it mean? *Sound Y never occurs in contexts where sound X occurs, and X never occurs in contexts where Y occurs.*
  - Procedure: make an environment chart listing all the phonetic environments (= contexts) where each allophone occurs. Then look over the result: do the sounds occur in overlapping contexts, or is there a pattern – a particular context where one of the sounds occurs, and the other doesn't?
  - If two phonetically similar sounds are in complementary distribution, we assume they are allophones of the same phoneme.
  - If there is a pattern, decide which sound is the phoneme, and posit a rule to account for the allophone(s).
- How to decide on the phoneme:
  - pick the sound with the broadest distribution, i.e. occurring in the broadest range of contexts.
  - Then you can write a rule converting it to allophone in narrow contexts.

Observe that if you find a minimal pair , obviously the 2 sounds can't be in complementary distribution, because the 2 sounds are occurring in exactly the same context

'Phoneme' can be thought of in two ways: as a set of sounds (hence we talk about allophones 'belonging' to a phoneme); but the set typically has one dominant, i.e. most prototypical, member, and we also refer to this member as the phoneme.