

# **Does sonority influence the syllable segmentation in visual identification? Evidence in French skilled readers.**

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**Abstract:** Many studies focused on the importance of statistical and distributional properties to account for the prelexical and segmental role of syllable-sized units in silent reading in French. We explored how skilled readers segmented printed (pseudo)words when no reliable statistical cues were available around and within the syllable boundary. We were interested in how sonority, a universal phonological element, might be a reliable source for syllable segmentation. We tested 160 native French-speaking adults with pseudowords in which orthographic and phonological statistical properties were (quasi)null for the first three letters including the syllable boundary in a revisited version of the paradigm used by Treiman and Chafetz (1987). Five sonority profiles within the syllable boundaries along a continuum from legal to illegal clusters were designed. Our results showed that segmentation does not strictly depend on statistical cues; participants were also sensitive to the legality of the sonority profile to locate the syllable boundary.