Subclass of effective martingales: completeness phenomenon

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A supermartingale martingale is left-c.e. if it can be approximated by a computable non decreasing array of supermartingales. It is well known that Martin-Löf randomness (also called 1-randomness) can be defined as reals on which no left-c.e. supermartingale succeed.

Is there a complexity notion (for supermartingale) weaker than that of left-c.e.ness yet suffices to define 1-randomness;or are there some "predictble"" left-c.e. supermartingales yet suffice to define 1-randomness?

Kasterman considered the left-c.e. supermartingales that are biased at each point and as to how biased is partially-decidable (known as kastergale). Hitchcock considered a subclass of kastergale where the supermartingale's biased proportion is Σ_1^0. Muchnick considered the supermartingales that only bet at even or odd steps (special cases of muchgale) and showed that they cannot define 1-randomness. Our analysis indicates that if a reasonable subclass of left-c.e. supermartingales defines 1-randomness, then a single member of that class can do so. For instance, we prove that even the union of kastergale and muchgale cannot define 1-randomness. This is a joint work with George Barmpalias.