

### Abstract

We prove that for  $1 < c < 4/3$  the subsequence of the Thue–Morse sequence  $\mathbf{t}$  indexed by  $\lfloor n^c \rfloor$  defines a normal sequence, that is, each finite sequence  $(\varepsilon_0, \dots, \varepsilon_{T-1}) \in \{0, 1\}^T$  occurs as a contiguous subsequence of the sequence  $n \mapsto \mathbf{t}(\lfloor n^c \rfloor)$  with asymptotic frequency  $2^{-T}$ .