## Rate of convergence in the deterministic chaos game

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Let A be the attractor of a contractive iterated function system. During talk, I will discuss relationships between the rate of convergence for a deterministic chaos game algorithm and the box dimension of A, or, more precisely the asymptotics of the map

$$(0,\infty) \ni \varepsilon \mapsto \frac{\ln N(\varepsilon)}{\ln(\frac{1}{\varepsilon})},$$

where  $N(\varepsilon)$  is the minimal number of closed balls of radius  $\varepsilon$  that cover A.

In particular, I will show that strong relationships of this kind hold for typical (in the sense of Baire category) drivers.