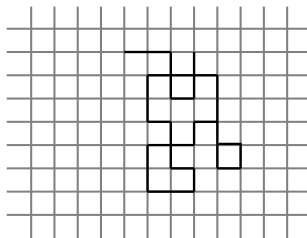


I am interested in learning about the range of a walk on a finitely generated amenable group.



By range I mean that we take a walk $(S_n)_{n \in \mathbb{N}}$ and then look at the set $R_n = \{S_i : i = 0, \dots, n-1\}$ of places visited in n steps

- ▶ How does $|R_n|$ grow?
- ▶ How does the boundary of R_n grow?
- ▶ What is known about the large deviation

$$\psi(x) = \limsup_{n \rightarrow \infty} -\frac{1}{n} \log \mathbb{P}(|R_n| \geq nx)$$

I am not interested in answering these questions, but rather in relating existing knowledge to entropy estimates of certain dynamical systems.