networks models

introduction to *network science in Python* (*NetPy*)

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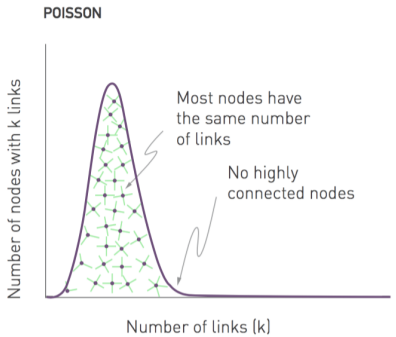
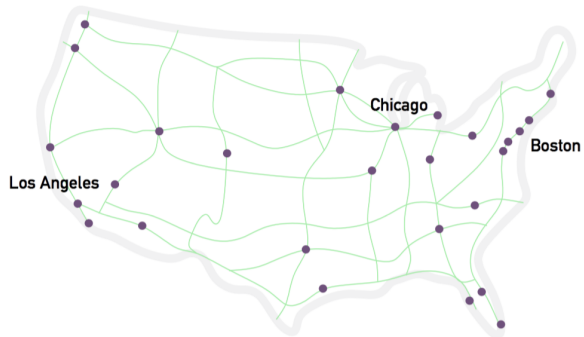
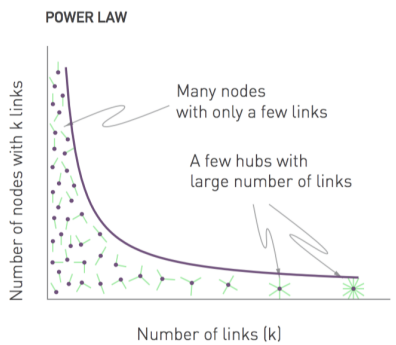
networks *scale-free*

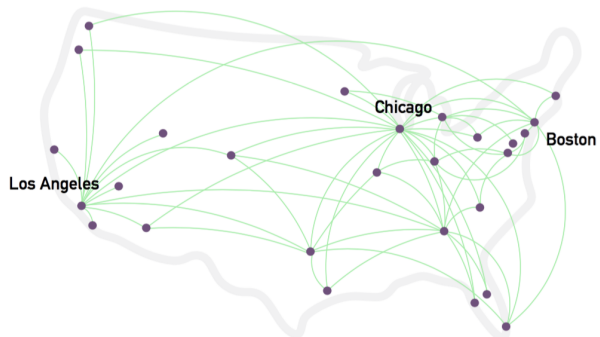
— *power-law* degree distribution $p_k \sim k^{-\gamma}$ [Pri65]

— *preferential attachment* *scale-free* model [BA99]





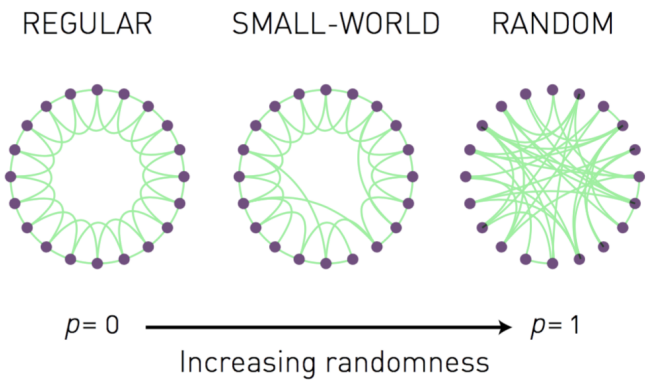


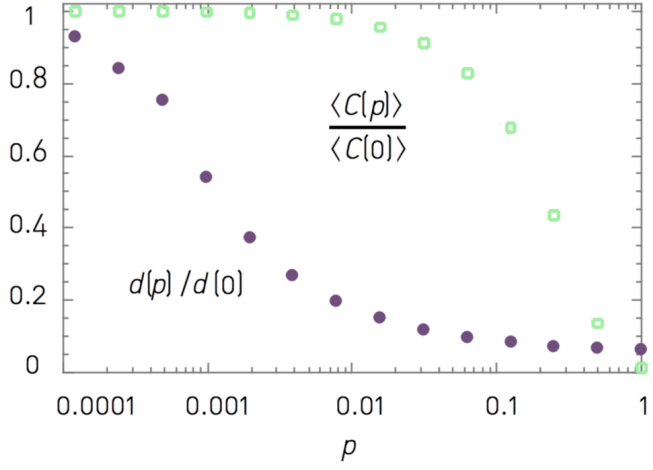


networks *small-world*

— *coexistence* of $\langle C \rangle \gg 0$ and $\langle d \rangle \simeq \frac{\ln n}{\ln \langle k \rangle}$

— *link rewiring small-world* model [WS98]





networks *references*

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