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Identifying and ranking influential spreaders in complex networks by neighborhood coreness

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***Highlights (for review)**

- The k-shell decomposition correctly identifies influential spreaders in complex networks.
- The monotonicity of the k-shell index is worse than other centrality measures.
- We propose an efficient ranking method by balancing the degree and the coreness of a spreader.
- The proposed method outperforms other measures in the scale-free network with community structure.