Entanglement entropy via string theory
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Abstract
We briefly review the AdS/CFT correspondence discovered in string theory over a decade ago and its application to the computation of entanglement entropy in a conformal field theory, where a quantum field theory problem is converted to a geometrical problem. Non-trivial matches with field theory computations have been found in the case of 1+1 d CFT. We will discuss recent progress in extending the proposal to include CFTs of general central charges, and finding quantitative matches with higher dimensional CFTs.

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