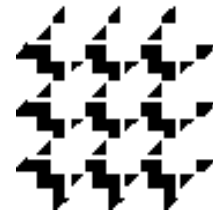


DIMACS

Center for Discrete Mathematics & Theoretical Computer Science
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CoSP – DIMACS REU SEMINAR TALK
Monday, June 23, 2020, 12:00am EDT
Webex meeting

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Understanding machine learning with statistical physics

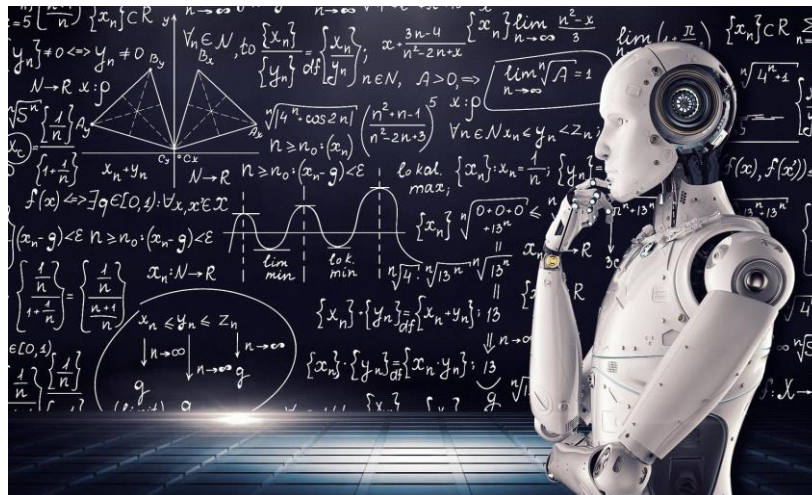


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Abstract

The affinity between statistical physics and machine learning has a long history. This is reflected even in the machine learning terminology that is in part adopted from physics. I will describe the main lines of this long-lasting friendship in the context of current theoretical challenges and open questions about deep learning. Theoretical physics often proceeds in terms of solvable synthetic models. I will describe the related line of work on solvable models of simple feed-forward neural networks.

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