

Solving Stochastic Programs with GPUs: A Literature Review

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We present a computational study exploring methods for solving Stochastic Linear Programs (SLPs) on Graphics Processing Units (GPUs). We examine the operator splitting approach of O'Donoghue et al. and the Primal Dual Hybrid Gradient method of Chambolle and Pock, with the aim of specializing both to exploit the unique sparse structures inherent in SLPs. Our work focuses on adapting these methods to enhance computational efficiency and scalability for large-scale problems.

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