

NetSolve and Its Application

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Abstract

This talk will look at future directions for network-enabled server. These Grid based tools will allow users to present a numerical problem to a server and let the server make decision on the most appropriate method and platform based on the best available software and hardware resources in a dynamic fashion. NetSolve is a project that aims to bring together disparate computational resources connected by computer networks. It is a RPC based client/agent/server system that allows one to remotely access both hardware and software computers. Currently, a wide range of applications have integrated and make use of the NetSolve system. For example: Subsurface Modeling, Cellular Microphysiology, Nuclear Engineering, Image Processing, Geographical Analysis, and Programming and Visualization Environment.