

Parallel Orthogonal Recursive Bisection

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Outline

1 Introduction

2 Implementation

- main
- KD tree
 - Building the tree
 - Searching the tree
- Parallel sorting
 - Changes
 - adaptBins
- Searching the tree

3 Validation

- MATLAB visualisations
- Other tests

4 Results

5 Conclusions

Introduction

Implementation

buildTree serial parallel getSortDim

serial 501

review

conversion to function rank 0 multiple communicators

old new alternate

Validation

MATLAB Demos:

- 2D
- 3D

tiny/huge radii multiple nodes

Results

Conclusions