Chord: Checkpoint-Based Scheduling Using Hybrid Waiting List in Shared Clusters

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Highlights

- We proposed a new scheduling architecture with hybrid waiting list.
- The hybrid waiting list makes the resumption of tasks regularly.
- We proposed a novel checkpoint-based scheduling approach by using hybrid waiting list, named Chord.
- Chord can efficiently improve the performance of low-priority tasks as well as the efficiency of the whole cluster.
- We conducted extensive experiments injecting tasks from the Google cloud trace logs to validate the superiority of Chord.