Chameleon Assignment "Examiner's Notes"

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Hello all,

I hope everyone feels prepared for the final competition! There are just a couple of quick things to mention regarding the Chameleon homework.

OSU Bandwidth Test

Unfortunately, I've discovered a mistake in the sample instructions for running the point-to-point bandwidth test; if run as indicated in the setup doc, I believe that the test may only be performed between two processes on the same node, rather than across two separate machines. Obviously, since this was an error on our part, scores were not penalized for failing to run a cross-node benchmark. Any team who achieved a max bandwidth of >1 Gb/s (the max speed of the regular ethernet connection) received full marks.

The purpose of this deliverable was to [ideally] ensure that teams are able to set up MPI communication over the Omni-Path interface.

Bootstrapping Nodes

Hopefully, the open-ended question prompt got you thinking about how to streamline the process of adopting compute nodes into a cluster. Of course, by this point in the competition, you've already had a trial by fire with Hero HPL runs.

I very much enjoyed reading the responses and seeing the heterogeneity in teams' approaches! Almost every team described a reasonable execution plan for how they'd go about using some combination of shell scripts, filesystem snapshots, Ansible, Terraform, cloud-init scripts, and more to quickly provision or expand a cluster.

