Hewlett Packard Enterprise

CHAPEL 1.29.0/1.30.0 RELEASE NOTES: PROPOSED PRIORITIES FOR THE NEXT SIX MONTHS

Chapel Team

December 15, 2022 / March 23, 2023

PROPOSED PRIORITIES FOR THE NEXT SIX MONTHS

- **Chapel 2.0**
  - Standard module stabilization: Map, List, IO, Owned/Shared, Math, BigInteger, Domains, Sync/Single/Atomics, ...
  - Language stabilization: ergonomics of generics, ref-maybe-const intents, special naming, tuple semantics
- **'Dyno' Compiler Rework:** frontend integration, separate and incremental compilation examples
- **Performance Tuning and Portability:** HPE Cray EX, locale per NIC/socket user interface, ...
- **GPU Support:** distributed arrays, additional NVIDIA and AMD GPU support, performance studies
- **User Support:** Arkouda, CHAMPS, ChplUltra, ChOp, lattice-symmetries, other user Qs and requests, ...
- **Outreach and growing the user base:** talks, CHIUW, social media, blog, papers, tutorials, ...
- **Build, Test, Release:** reduce triage load and noise, other improvements for developers

THANK YOU

https://chapel-lang.org
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