Datasets and problem complexity is growing faster than performance of personal computational system. There are many technological developments which are helping delay this.

But more users are finding themselves attracted to HPC as the best solution to solve their computational tasks. But HPC systems have a very different environment; Linux CLI, shared environment, batch submission.
What's The Solution?

There is a major issue that researchers don't know how to use such systems, and "dumbing down" the interface is not a solution for performance and control reasons.

The formal curriculum in higher education hasn't caught up with the problem; leaving HPC centres themselves to provide the training, but most engineers are not advanced adult educators!

The international HPC Certification Forum has been established to address at least the issue of examination. Formed at the 2018 International Supercomputing Conference in Frankfurt. Follows the explicit goal of a "HPC Driving License" for researchers.

HPC CF will provide a summative multiple choice examination across different levels of skills and against particular competencies.
Eco-System Contributions

The HPC CF specifically does not provide content or engage in delivery. This provides organisational independence. However, the skills and competencies of the examinable content of HPC CF can serve as learning objectives for content and delivery providers.

Content and delivery providers have a better scope than the HPC CF; can feed back information for errors, omissions, and especially new technologies. This feedback mechanism is the best way that HPC educators can contribute to the HPC CF eco-system!

There are, of course, other ways to contribute; join the mailing lists, join the Slack channel, join the governance committee. But the best way for educators, right now, is add exam questions!

General Participation: www.hpc-certification.org/participate/

Wiki and Exam Content: www.hpc-certification.org/wiki/status
References

[10] Lane, Jo. Scientific supercomputing: Teaching practical skills for credit, Presentation to eResearchNZ, Dunedin, Feb 14, 2020
THANKS FOR WATCHING
& LISTENING PATIENTLY