![東京大学 THE UNIVERSITY OF TOKYO]

The Path to the Use of The University of Tokyo's Supercomputers by Corporations

The Information Technology Center, The University of Tokyo (hereafter, "the Center") provides a part of the computational resources of the supercomputers operated by the Center to corporations. The objective is to support corporations that require large-scale high-performance parallel computing systems, as well as corporations engaged in manufacturing through computational simulations.

Applications and Usage System

Applications to use the supercomputers of The University of Tokyo are submitted to and processed through the Center. Various systems, shown in the table below, have been established to enable corporations to make use of The University of Tokyo's supercomputers. In addition, a part of the computational resources of The University of Tokyo's supercomputers have been allocated to the Joint Usage/Research Center for Interdisciplinary Large-scale Information Infrastructures (JHPCN) and High Performance Computing Infrastructure (HPCI) programs. Hence, corporations may also use The University of Tokyo's supercomputers under the corporate slots of these programs.

Application	Usage system		Cost	Unit for period of use	Prior screening	Application period	Requirement to submit reports	Disclosure of reports
Information Technology Center, The University of Tokyo	Parallel programming workshop with trial account		Free of charge	1 month	Nil	About 10 times per year	Nil	Nil
	Trial use system	Corporate/ Personal use	Fee required	1 year or less	Nil*	At any time	Report on results	Disclosed (Max. extension of 2 years)
		Corporate/ Group use (free of charge)	Free of charge	1-3 months	Yes	Twice a year (around February and August)	Report on results	Disclosed (Max. extension of 2 years)
		Corporate/ Group use (fee required)	Fee required	1 year or less	Yes	Twice a year (around February and August)	Report on results	Disclosed (Max. extension of 2 years)
	Corporate use system		Fee required	1 year or less	Yes	Twice a year (around February and August)	Report on results	Disclosed (Max. extension of 2 years)
	Joint research with academic institution		Fee required**	1 year or less	Nil	At any time	Nil	Nil
JHPCN	Industrial joint research project		Free of charge	1 year	Yes	Once a year (around January)	Report on use/ Presentation at symposium	Disclosed
HPCI ***	Use projects (for demonstration purposes)		Free of charge	1 year or less than 1 year	Yes	Once a year (around November)	Report on use/ Report on results (paper, patent, etc.)	Disclosed (Max. extension of 2 years)

Supercomputer systems available for use

Oakforest-PACS	Reedbush-U	Reedbush-H	Reedbush-L
✧ **World-class computational performance** ・Node structure CPU: Knights Landing Memory: 112 GB ・System performance: Computational performance: 25PFLOPS Memory capacity: 900TByte ・Equipped with fast file cache systems	✧ **Excellent usability** ・Node structure CPU: Broadwell-EP Memory: 256 GB ・System performance: Computational performance: 508TFLOPS Memory capacity: 107 TByte ・Equipped with fast file cache systems	✧ **GPU offering excellent cost-performance** ・Node structure CPU: Broadwell-EP Memory: 256 GB GPU: Pascal×2 ・System performance: Computational performance: 1.287~1.418 PFLOPS ・Equipped with NVlink	✧ **Enhanced functions for AI, DL, data analysis** ✧ Points to note (compared to Reedbush-H) ・Pascal×4/ node ・Node performance 20TFLOPS ・Suitable for long jobs Batch jobs: 168 hours Interactive jobs: 24 hours

✧ If you have any questions, please inquire with the Research Support Team, Information Strategy Group, Information Systems Department (uketsuke(at)cc.u-tokyo.ac.jp).