

Курс "Администрирование суперкомпьютеров"

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High Performance Linpack

<http://www.netlib.org/benchmark/hpl/>

```
$ cd hpl-*
```

```
$ cp Make.Linux_PII_CBLAS Make.myhpl
```

High Performance Linpack

ARCH = myhpl

TOPdir = /home/user/path-to-hpl

MPdir =

MPlib =

MPinc =

LAdir =

LAlib =

LAinc =

High Performance Linpack

F2CDEFS =

CC = mpicc

LINKER = mpif77

High Performance Linpack

```
$ make arch=myhpl
```

```
$ cd bin/myhpl
```

```
$ mpirun -np NNN ./xhpl
```

High Performance Linpack — HPL.dat

HPL.out output file name (if any)
6 device out (6=stdout,7=stderr,file)
2 # of problems sizes (N) **Число задач**
10000 20000 N_s
2 # of N_b s **Число разбиений блоков**
1 2 NB_s
0 PMAP process mapping
3 # of process grids (P x Q) **Число сеток**
2 1 4 P_s
2 4 1 Q_s

High Performance Linpack — HPL.dat

T/V	N	NB	P	Q	Time	Gflops
WR00L2L2	5000	1	1	1	43.92	1.898e+00
HPL_pdgesv() start time Sat Dec 8 16:11:41 2012						
HPL_pdgesv() end time Sat Dec 8 16:11:41 2012						

=====
||Ax-b||_oo/(eps*(||A||_oo*||x||_oo+||b||_oo)*N)= 0.0249893 PASSED
=====

Finished 1 tests with the following results:
1 tests completed and passed residual checks,
0 tests completed and failed residual checks,
0 tests skipped because of illegal input values.