

Problem 2

Sample Batch script:

```
#!/bin/sh
##SBATCH --partition=general-compute
#SBATCH --time=00:05:00
#SBATCH --nodes=1
#SBATCH --ntasks-per-node=1
#SBATCH --constraint=CPU-L5520
##SBATCH --mem=24000
# Memory per node specification is in MB. It is optional.
# The default limit is 3GB per core.
#SBATCH --job-name="hw1-8node"
#SBATCH --output=hw1-8-ibm.out
#SBATCH --mail-user=npaliwal@buffalo.edu
#SBATCH --mail-type=END
##SBATCH --requeue
#Specifies that the job will be requeued after a node failure.
#The default is that the job will not be requeued.

echo "SLURM_JOBID"=$SLURM_JOBID
echo "SLURM_JOB_NODELIST"=$SLURM_JOB_NODELIST
echo "SLURM_NNODES"=$SLURM_NNODES
echo "SLURMTMPDIR"=$SLURMTMPDIR

cd $SLURM_SUBMIT_DIR
echo "working directory = "$SLURM_SUBMIT_DIR

srun lstopo --whole-system topo-8nodes.pdf

echo "All Done!"
```

Output files:

8 Node

```
SLURM_JOBID=436866
SLURM_JOB_NODELIST=d07n40s01
SLURM_NNODES=1
SLURMTMPDIR=/scratch/436866
working directory = /ifs/user/npaliwal/hw1
All Done!
```

12 Node

```
SLURM_JOBID=436825
SLURM_JOB_NODELIST=k08n16s02
SLURM_NNODES=1
SLURMTMPDIR=/scratch/436825
working directory = /ifs/user/npaliwal/hw1
All Done!
```

32 Node AMD

```
SLURM_JOBID=436823
SLURM_JOB_NODELIST=k07n28
SLURM_NNODES=1
SLURMTMPDIR=/scratch/436823
working directory = /ifs/user/npaliwal/hw1
All Done!
```

32 Node Intel

```
SLURM_JOBID=436824
SLURM_JOB_NODELIST=f07n13
SLURM_NNODES=1
SLURMTMPDIR=/scratch/436824
working directory = /ifs/user/npaliwal/hw1
All Done!
```