MSIM 715/815 – Fall 2025

Homework #1:

Due September 16 by 11:59pm via Canvas

1. Familiarize yourself with User Documentation on Wahab (OnDemand web portal, shell login, the notion of a job script, scheduler, queue, etc.). Learn how to login using terminal application and OnDemand portal. Submit:
   (a) A list of URLs, which you've studied for the documentation.
   (b) A screenshot of your being logged in the OnDemand portal of the Wahab or Turing cluster.

2. Copy the *slurmHex.c* and *slurmHex_script_template* to Wahab.
   Modify *slurmHex_script_template* such that **slurm** successfully executes a sequence of `srun` commands (from its Section 3), **each on a minimum required number of nodes**, as follows:
   (a) Add `#SBATCH` commands with proper arguments in the script header (Section 1 of the script).
   (b) Change the `cd` command argument to the correct path to your executable and script.

   Submit:
   I. State the `squeue` commad with appropriate arguments to find out all the running jobs in the system owned by a user.
   II. Provide a copy of your modified *slurmHex_script_template* that you've executed.
   III. Provide a copy of your output file from the execution of your script.
   IV. State the node names on which the script was executed.
   V. For each of the `srun` commands, after the script execution fill in the following table:

Srun arguments:	**-N1 -n2**	**-N2 -n4**	**-N3 -n8**	**-N3 -n16 --ntasks-per-node=5**
Number of nodes used				
Total number of tasks executed				
Resulting maximum number of tasks per node				