SOM Research Cluster - applications and tools

This is a highlight of the most common and useful system tools and cluster job management options. This will cover most cluster use requests, but is far from exhaustive.

Cluster commands

Starting, stopping and monitoring jobs

<table>
<thead>
<tr>
<th>Command</th>
<th>What does it do?</th>
</tr>
</thead>
<tbody>
<tr>
<td>applications</td>
<td>List of available statistical applications</td>
</tr>
<tr>
<td>choose the application you want to run</td>
<td></td>
</tr>
<tr>
<td>bhosts</td>
<td>Shows cluster workload status/availability</td>
</tr>
<tr>
<td>bhosts -l</td>
<td>this shows additional information about the current state of the cluster</td>
</tr>
<tr>
<td>bjobs</td>
<td>Quick listing of jobs running on the cluster</td>
</tr>
<tr>
<td>bjobs -u all</td>
<td>this shows all jobs, from all users running on the cluster</td>
</tr>
<tr>
<td>bjobs -l</td>
<td>this show additional information about your currently running jobs</td>
</tr>
<tr>
<td>bkill</td>
<td>Terminates jobs currently running on the cluster</td>
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<tr>
<td>bkill 12345</td>
<td>this will kill job with a pid of 12345 : pid can be found using the bjobs command</td>
</tr>
</tbody>
</table>

Linux system tools

The Research cluster also has a number of system tools, including compilers and various scripting languages. The cluster also maintains a number of databases and editing tools. All of these system tools are available to all users and can be accessed through a terminal.

- Python 2.7
- Python 3.5
- Perl
- Ruby
- GCC compiler
- Vim
- LaTeX

Databases can be managed with command line interfaces or with specialized management interfaces, such as MySQL Workbench. For help setting up and managing any databases, please contact contact SOM IT.

- MySQL
- Postgres
- MongoDB