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As academic and industrial computational needs rise, organisations employ the use of computer clusters in order to keep up with these computational needs and CERN is no exception. Several distributed software frameworks exist, each of which solves a particular problem. However, these frameworks assume total control of cluster resources making it difficult to run them concurrently on the same cluster. Additionally, it is apparent that there is no scheduling algorithm or policy that satisfies all types of jobs. Apache Mesos, a meta-scheduler for distributed systems, tries to mitigate this problem without resorting to statically partitioning a cluster. In this work we have explored ways of integrating the Dynamic Deployment System (DDS) at CERN with Mesos. As a result, DDS jobs can be run on a Mesos governed cluster.

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