

## Data access on widely distributed worker nodes with xrootd/SRM

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Data access on widely distributed worker nodes within ROOT framework Using cheap disks attached to processing nodes becomes extremely economically beneficial over expensive centralized storage. Nevertheless, an aggregation of those many distributed storage elements into a single usable pool turned to be problematic. However, the ROOT/Xrootd project allows such aggregation with data access optimization and dynamic population capabilities unique to this package. We would like to present a use case of Xrootd in a production environment (RHIC/STAR) data analysis framework its performance monitoring and performance tuning exercise we have applied. We would like to present how, in production analysis environment, large amount of widely distributed data is managed within the ROOT framework using low latency data access software suite Xrootd/Scalla. The RHIC/STAR use case, its performance monitoring and performance tuning will be explained. Furthermore, we will present the status of the integration of grid middleware component SRM (Storage resource manager) in Xrootd for space management. We will give an architectural overview of this solution showing integration of these two technologies as well as status of development and testing phase. Our focus would be also oriented on presenting future plans such as multi-caches support within a one node, improving access to a mass storage system or interoperability with other SRM-aware tools.

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