



CVMFS

Preload capability

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Google Summer of Code



CernVM
File system



Introduction and motivation

- **CVMFS - The CernVM File System**
- **Delivers scientific software**
 - that is used by the HEP community
 - to tens of thousands of client nodes worldwide
- **The per-file granularity of distribution and caching leads to poor performance especially in case of cold caches**
- **Loading of interdependent files and libraries required for certain applications can be improved**



Implementation roadmap

- **Introduced bundle content type**
 - Bundles allow concatenation of multiple regular files
- **Support on the server-side**
 - Recognize .cvmfsbundles files
 - Create and store bundles
- **Support on the client-side**
 - Download bundle if it doesn't already exist, instead of a single file



Project development

[PR#2736](#) Support for `.cvmfsbundles` file

[PR#2741](#) Introduce bundles content type

[PR#2742](#) Extend catalog table

[PR#2743](#) Client-side support



Thank you

Project report at
rohittopi.github.io/gsoc/gsoc21-project-report