

This is a minor release. The primary focus of this release was to correctly handle and manage file permissions for the two different file system workloads: shared file (AKA container mode, commonly called N-to-1) and file_per_proc (AKA flat file mode, commonly called N-to-N)

Cleaned-up MPI/IO Patching Process

Ticket #87 (from old Sourceforge.net repository): Cleaned-up files and added necessary logic to handle patching for MPICH2 and OpenMPI 1.4.x and 1.6.

Changing N-to-N Directory Permissions Broken

Issue #84: Ensured that the files under a directory had their ownership and permissions changed to match the directory that contains them.

Made mlog More Clear with Respect to Types

Issue #95: Made some changes to mlog and type casting to make it type-correct.

Fixed N-to-N Overwrite Pattern on N-to-1 Mount Point

Issue #96: N-to-N files were not reporting the correct size when they were overwritten using an N-to-1 mount point. They now report the correct sizes after each overwrite.

Fixed N-to-1 (Container Mode) Permission Bit Setup

Issue #97: PLFS represents a file in this mode as a combination of directories and files. The permissions on the directories, in particular, have to have certain bits set in order to allow the specified access to the underlying files that represent the PLFS file.

Fixed Makefile.am for OpenMPI 1.6.x Patch

Issue #98: 'make dist' didn't work for OpenMPI 1.6.x. We fixed the Makefile.am so that it does work.

Fixed Unlink with New Permission Scheme

Issue #99: After implementing the new permissions scheme for PLFS files, we fixed unlink so that it worked correctly.

Transferred Permissions Fixes to Parallel Operations Branch

Issue #100: We are working on making certain file operations parallel. That is in another branch. We wanted to make sure that all the permissions work was transferred to that branch so that the permissions work persists in future releases.

Fixed Rename in Container Mode

Issue #101: Renaming files in container mode was not working. It is now.

Fixed Handling of Truncation on File Creation

Issue #103, 104, and 107: There were some issues with files being incorrectly truncated when they were created. MPI and POSIX do things differently. It now behaves correctly for all cases.

Use `plfs_access` instead of `lstat`

Issue #106: In the MPI/IO interface we were using `lstat`. We are using `plfs_access` instead.

Correctly Handle Use of `MPI_MODE_EXCL`

Issue #108: Fixed the MPI/IO interface to correctly return an error when `MPI_MODE_EXCL` is used and the file exists.