

# FreeBSD MACB Timestamps

M	Last data Modification
A	Last data Access
C	Last file status Change
B	Birth
Resolution	Default: 1000 nanosecond (1 $\mu$ s)
M/A/C/B	M/A/C/B is updated to current time
m/a/c/b	M/A/C/B is inherited from m/a/c/b of source file/dir
.	M/A/C/B is not modified

Mount Option	Description
(default)	MACB updates are all performed
noatime	A is never updated

	New File/Dir touch, mkdir	File Read /Execute cat, exec()	Symlink Read/Follow readlink	File Write >, >>	File/Dir Change chmod, chown	New/Delete Hardlink ln, rm	File/Dir Rename mv	Local File Move mv	Local Dir Move mv	Volume File/Dir Move cp	File/Dir Copy (new) cp	File Copy (existing)
M	M	.	.	M	.	.	.	.	M	m	M	M
A	A	A	.	.	.	.	.	.	.	a	A	.
C	C	.	.	C	C	C	C	C	C	C	C	C
B	B	.	.	.	.	.	.	.	.	m	B	.

	Dir Traversal cd	Dir Listing ls	Dir: New/Rename Child (File/Dir/Hardlink) touch, mkdir, ln, mv, cp	Dir: Delete Child (File/Dir/Hardlink) rm, mv	Dir: Child Read/Exec/Write/Change cat, readlink, >>...
M	.	.	M	M	.
A	.	.	.	.	.
C	.	.	C	C	.
B	.	.	.	.	.