

ColdFusion 5 Process Tree, and Forcing Shutdown

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Here's some information that might be helpful in some situations where you're trying to stop ColdFusion 5 (and earlier) but don't want to (or can't) use the stop script. But even then, there may be a **very rare circumstance** where you cannot even kill the processes as root.

This might also be helpful to better understand how the many CF processes (threads) show up on Linux. The process trees show the relationship of the pids in the tree, and its easy to see what pid is the parent and which are the children.

Normal process listing for ColdFusion 5 on Linux at startup

Only one process has a parent pid of "1", a.k.a root

COMMAND: `ps -ef | grep cold`

```
[root@merlot bin]# ps -ef | grep cold
nobody 575 1 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfexec
nobody 576 575 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfexec
nobody 577 576 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfexec
nobody 578 577 4 14:15 ? 00:00:00 /opt/coldfusion/bin/cfserver
nobody 579 577 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfrdsservice
nobody 580 577 0 14:15 ? 00:00:00 /bin/sh /opt/coldfusion/JRun/bin
nobody 581 576 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfexec
nobody 582 576 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfexec
nobody 641 579 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfrdsservice
nobody 643 641 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfrdsservice
nobody 647 641 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfrdsservice
nobody 658 641 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfrdsservice
nobody 661 580 12 14:15 ? 00:00:02 /opt/coldfusion/jre/bin/i386/nat
nobody 681 661 0 14:15 ? 00:00:00 /opt/coldfusion/jre/bin/i386/nat
nobody 682 681 0 14:15 ? 00:00:00 /opt/coldfusion/jre/bin/i386/nat
nobody 683 681 0 14:15 ? 00:00:00 /opt/coldfusion/jre/bin/i386/nat
nobody 684 681 0 14:15 ? 00:00:00 /opt/coldfusion/jre/bin/i386/nat
nobody 685 578 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfserver
nobody 686 685 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfserver
nobody 690 685 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfserver
nobody 691 685 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfserver
nobody 692 685 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfserver
nobody 693 685 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfserver
nobody 694 685 0 14:15 ? 00:00:00 /opt/coldfusion/bin/cfserver
nobody 695 681 0 14:15 ? 00:00:00 /opt/coldfusion/jre/bin/i386/nat
nobody 696 681 0 14:15 ? 00:00:00 /opt/coldfusion/jre/bin/i386/nat
nobody 699 681 0 14:15 ? 00:00:00 /opt/coldfusion/jre/bin/i386/nat
nobody 700 681 0 14:15 ? 00:00:00 /opt/coldfusion/jre/bin/i386/nat
nobody 701 681 0 14:15 ? 00:00:00 /opt/coldfusion/jre/bin/i386/nat
```

Normal process tree for ColdFusion 5 on Linux at startup

COMMAND: `ps tree -p | grep cf`

```
[root@merlot bin]# ps tree -p | grep cf
|-cfexec (66) ---cfexec (67) +-cfexec (68) +-cfrdsservice (70) ---cfrdsservice (78) +-cfrdsservice (93)
| | | | -cfrdsservice (94)
| | | `--cfrdsservice (95)
```

```

| | |-cfserver(269)---cfserver(2644)--cfserver(59)
| | | |-cfserver(75)
| | | |-cfserver(76)
| | | |-cfserver(77)
| | | |-cfserver(78)
| | | `--cfserver(79)
| |-cfexec(72)
| `--cfexec(73)
[root@merlot bin]#

```

Using expanded process listing to find parent cfexec
and using "kill -15" (graceful shutdown) to kill tree

COMMAND: ps -awxf | grep cold

```

[root@merlot root]# cd /opt/coldfusion/bin
[root@merlot bin]# ./start
[root@merlot bin]# ps -awxf | grep cold
1360 ? S 0:00 /opt/coldfusion/bin/cfexec
1361 ? S 0:00 \_ /opt/coldfusion/bin/cfexec
1362 ? S 0:00 \_ /opt/coldfusion/bin/cfexec
1363 ? S 0:00 | \_ /opt/coldfusion/bin/cfserver
1436 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
1453 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
1469 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
1470 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
1471 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
1472 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
1473 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
1364 ? S 0:00 | \_ /opt/coldfusion/bin/cfrdsservice
1372 ? S 0:00 | | \_ /opt/coldfusion/bin/cfrdsservice
1383 ? S 0:00 | | \_ /opt/coldfusion/bin/cfrdsservice
1384 ? S 0:00 | | \_ /opt/coldfusion/bin/cfrdsservice
1385 ? S 0:00 | | \_ /opt/coldfusion/bin/cfrdsservice
1365 ? S 0:00 | \_ /bin/sh /opt/coldfusion/JRun/bin/jrun -start default
1443 ? S 0:02 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -Djrun.roo
1465 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -Djrun
1466 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
1467 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
1468 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
1474 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
1475 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
1476 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
1477 ? R 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
1478 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
1366 ? S 0:00 \_ /opt/coldfusion/bin/cfexec
1367 ? S 0:00 \_ /opt/coldfusion/bin/cfexec

```

COMMAND: kill -15 1360

```

[root@merlot bin]# kill -15 1360
[root@merlot bin]# ps -awxf | grep cold
1436 ? S 0:00 /opt/coldfusion/bin/cfserver
1453 ? S 0:00 \_ /opt/coldfusion/bin/cfserver
1470 ? S 0:00 \_ /opt/coldfusion/bin/cfserver
1472 ? S 0:00 \_ /opt/coldfusion/bin/cfserver
1473 ? S 0:00 \_ /opt/coldfusion/bin/cfserver
[root@merlot bin]# ps -awxf | grep cold
[root@merlot bin]#

```

Using expanded process listing to find parent cfexec and using "killall -v cfexec" (graceful shutdown) to kill tree verbosely

COMMAND: ps -awxf | grep cold

```
[root@merlot bin]# ./start
[root@merlot bin]# ps -awxf | grep cold
2329 ? S 0:00 /opt/coldfusion/bin/cfexec
2330 ? S 0:00 \_ /opt/coldfusion/bin/cfexec
2331 ? S 0:00 \_ /opt/coldfusion/bin/cfexec
2332 ? S 0:00 | \_ /opt/coldfusion/bin/cfserver
2409 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
2422 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
2438 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
2439 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
2440 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
2441 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
2442 ? S 0:00 | | \_ /opt/coldfusion/bin/cfserver
2333 ? S 0:00 | \_ /opt/coldfusion/bin/cfrdsservice
2341 ? S 0:00 | | \_ /opt/coldfusion/bin/cfrdsservice
2356 ? S 0:00 | | \_ /opt/coldfusion/bin/cfrdsservice
2357 ? S 0:00 | | \_ /opt/coldfusion/bin/cfrdsservice
2358 ? S 0:00 | | \_ /opt/coldfusion/bin/cfrdsservice
2334 ? S 0:00 | \_ /bin/sh /opt/coldfusion/JRun/bin/jrun -start default
2412 ? S 0:02 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -Djrun.roo
2434 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -Djrun
2435 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
2436 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
2437 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
2443 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
2444 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
2445 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
2446 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
2447 ? S 0:00 | \_ /opt/coldfusion/jre/bin/i386/native_threads/java -D
2335 ? S 0:00 \_ /opt/coldfusion/bin/cfexec
2336 ? S 0:00 \_ /opt/coldfusion/bin/cfexec
```

COMMAND: killall -v cfexec

```
[root@merlot bin]# killall -v cfexec
Killed cfexec(2329) with signal 15
Killed cfexec(2330) with signal 15

Killed cfexec(2331) with signal 15
Killed cfexec(2335) with signal 15
Killed cfexec(2336) with signal 15
[root@merlot bin]# ps -awxf | grep cold
[root@merlot bin]#
```