NAME

File::Basename - Parse file paths into directory, filename and suffix.

SYNOPSIS

```
use File::Basename;
($name,$path,$suffix) = fileparse($fullname,@suffixlist);
$name = fileparse($fullname,@suffixlist);
$basename = basename($fullname,@suffixlist);
$dirname = dirname($fullname);
```

DESCRIPTION

These routines allow you to parse file paths into their directory, filename and suffix.

NOTE: dirname() and basename() emulate the behaviours, and quirks, of the shell and C functions of the same name. See each function's documentation for details. If your concern is just parsing paths it is safer to use File::Spec's splitpath() and splitdir() methods.

It is guaranteed that

```
# Where path_separator is / for Unix, \ for Windows, etc... dirname(path) . path_separator . basename(path);
```

is equivalent to the original path for all systems but VMS.

fileparse

```
my($filename, $dirs, $suffix) = fileparse($path);
my($filename, $dirs, $suffix) = fileparse($path, @suffixes);
my $filename = fileparse($path, @suffixes);
```

The fileparse() routine divides a file path into its \$dirs, \$filename and (optionally) the filename \$suffix.

\$dirs contains everything up to and including the last directory separator in the \$path including the volume (if applicable). The remainder of the \$path is the \$filename.

```
# On Unix returns ("baz", "/foo/bar/", "")
fileparse("/foo/bar/baz");

# On Windows returns ("baz", 'C:\foo\bar\', "")
fileparse('C:\foo\bar\baz');

# On Unix returns ("", "/foo/bar/baz/", "")
fileparse("/foo/bar/baz/");
```

If @suffixes are given each element is a pattern (either a string or a qr//) matched against the end of the \$filename. The matching portion is removed and becomes the \$suffix.

```
# On Unix returns ("baz", "/foo/bar/", ".txt")
fileparse("/foo/bar/baz.txt", qr/\.[.]*/);
```

If type is non-Unix (see "fileparse_set_fstype") then the pattern matching for suffix removal is performed case-insensitively, since those systems are not case-sensitive when opening existing files.

You are guaranteed that dirs . filename . suffix will denote the same location as the original path.

basename

```
my $filename = basename($path);
my $filename = basename($path, @suffixes);
```

This function is provided for compatibility with the Unix shell command basename(1). It does **NOT** always return the file name portion of a path as you might expect. To be safe, if you want the file name portion of a path use fileparse().

basename() returns the last level of a filepath even if the last level is clearly directory. In effect, it is acting like pop() for paths. This differs from fileparse()'s behaviour.

```
# Both return "bar"
basename("/foo/bar");
basename("/foo/bar/");

@suffixes work as in fileparse() except all regex metacharacters are quoted.
# These two function calls are equivalent.
my $filename = basename("/foo/bar/baz.txt", ".txt");
my $filename = fileparse("/foo/bar/baz.txt", qr/\Q.txt\E/);
```

Also note that in order to be compatible with the shell command, basename() does not strip off a suffix if it is identical to the remaining characters in the filename.

dirname

This function is provided for compatibility with the Unix shell command dirname(1) and has inherited some of its quirks. In spite of its name it does **NOT** always return the directory name as you might expect. To be safe, if you want the directory name of a path use fileparse().

Only on VMS (where there is no ambiguity between the file and directory portions of a path) and AmigaOS (possibly due to an implementation quirk in this module) does dirname() work like fileparse(\$path), returning just the \$dirs.

```
# On VMS and AmigaOS
my $dirs = dirname($path);
```

When using Unix or MSDOS syntax this emulates the dirname(1) shell function which is subtly different from how fileparse() works. It returns all but the last level of a file path even if the last level is clearly a directory. In effect, it is not returning the directory portion but simply the path one level up acting like chop() for file paths.

Also unlike fileparse(), dirname() does not include a trailing slash on its returned path.

```
# returns /foo/bar. fileparse() would return /foo/bar/
dirname("/foo/bar/baz");

# also returns /foo/bar despite the fact that baz is clearly a
# directory. fileparse() would return /foo/bar/baz/
dirname("/foo/bar/baz/");

# returns '.'. fileparse() would return 'foo/'
dirname("foo/");
```

Under VMS, if there is no directory information in the \$path, then the current default device and directory is used.

```
fileparse_set_fstype
   my $type = fileparse_set_fstype();
   my $previous_type = fileparse_set_fstype($type);
```

Normally File::Basename will assume a file path type native to your current operating system (ie. /foo/bar style on Unix, foobar on Windows, etc...). With this function you can override that assumption.

Valid \$types are "MacOS", "VMS", "AmigaOS", "OS2", "RISCOS", "MSWin32", "DOS"

(also "MSDOS" for backwards bug compatibility), "Epoc" and "Unix" (all case-insensitive). If an unrecognized \$type is given "Unix" will be assumed.

If you've selected VMS syntax, and the file specification you pass to one of these routines contains a "/", they assume you are using Unix emulation and apply the Unix syntax rules instead, for that function call only.

SEE ALSO

dirname(1), basename(1), File::Spec