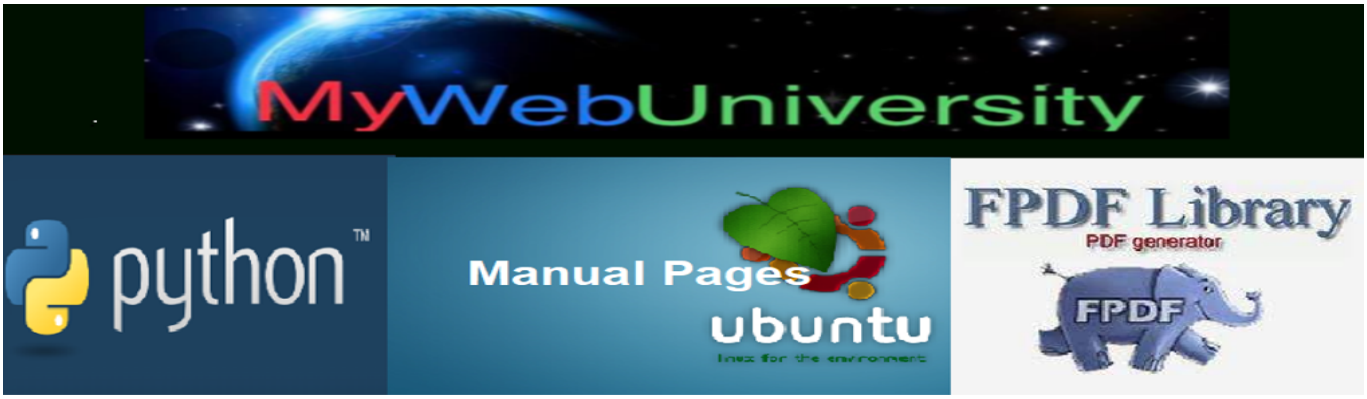

Rocky Enterprise Linux 9.2 Manual Pages on command 'tclsh8.6.1'

$ man tclsh8.6.1

NAME

tclsh - Simple shell containing Tcl interpreter

SYNOPSIS

tclsh ?-encoding name? ?fileName arg arg ...?

DESCRIPTION

Tclsh is a shell-like application that reads Tcl commands from its standard input or from a file and evaluates them. If invoked with no arguments then it runs interactively, reading Tcl commands from standard input and printing command results and error messages to standard output. It runs until the exit command is invoked or until it reaches end-of-file on its standard input. If there exists a file .tclshrc (or tclshrc.tcl on the Windows platforms) in the home directory of the user, interactive tclsh evaluates the file as a Tcl script just before reading the first command from standard input.

SCRIPT FILES

If tclsh is invoked with arguments then the first few arguments specify the name of a script file, and, optionally, the encoding of the text data stored in that script file. Any additional arguments are made available to the script as variables (see below). Instead of reading commands from standard input tclsh will read Tcl commands from the named file; tclsh will exit when it reaches the end of the file. The end of the file may be marked either by the physical end of the medium, or by the character, ?\032? (?\u001a?, control-Z). If this character is present in the file, the tclsh application will read

text up to but not including the character. An application that requires this character in the file may safely encode it as ?\032?, ?\x1A?, or ?\u001a?; or may generate it by use of commands such as format or binary. There is no automatic evaluation of .tclshrc when the name of a script file is presented on the tclsh command line, but the script file can always source it if desired.

If you create a Tcl script in a file whose first line is

```
#!/usr/local/bin/tclsh
```

then you can invoke the script file directly from your shell if you mark the file as exe? cutable. This assumes that tclsh has been installed in the default location in /usr/lo? cal/bin; if it is installed somewhere else then you will have to modify the above line to match. Many UNIX systems do not allow the #! line to exceed about 30 characters in length, so be sure that the tclsh executable can be accessed with a short file name.

An even better approach is to start your script files with the following three lines:

```
#!/bin/sh
# the next line restarts using tclsh \
exec tclsh "$0" ${1+"$@"}
```

This approach has three advantages over the approach in the previous paragraph. First, the location of the tclsh binary does not have to be hard-wired into the script: it can be anywhere in your shell search path. Second, it gets around the 30-character file name limit in the previous approach. Third, this approach will work even if tclsh is itself a shell script (this is done on some systems in order to handle multiple architectures or operating systems: the tclsh script selects one of several binaries to run). The three lines cause both sh and tclsh to process the script, but the exec is only executed by sh. sh processes the script first; it treats the second line as a comment and executes the third line. The exec statement cause the shell to stop processing and instead to start up tclsh to reprocess the entire script. When tclsh starts up, it treats all three lines as comments, since the backslash at the end of the second line causes the third line to be treated as part of the comment on the second line.

You should note that it is also common practice to install tclsh with its version number as part of the name. This has the advantage of allowing multiple versions of Tcl to exist on the same system at once, but also the disadvantage of making it harder to write scripts that start up uniformly across different versions of Tcl.

Tclsh sets the following global Tcl variables in addition to those created by the Tcl li? brary itself (such as env, which maps environment variables such as PATH into Tcl):

argc Contains a count of the number of arg arguments (0 if none), not including the name of the script file.

argv Contains a Tcl list whose elements are the arg arguments, in order, or an empty string if there are no arg arguments.

argv0 Contains fileName if it was specified. Otherwise, contains the name by which tclsh was invoked.

tcl_interactive

Contains 1 if tclsh is running interactively (no fileName was specified and standard input is a terminal-like device), 0 otherwise.

PROMPTS

When tclsh is invoked interactively it normally prompts for each command with ?% ?. You can change the prompt by setting the global variables tcl_prompt1 and tcl_prompt2. If variable tcl_prompt1 exists then it must consist of a Tcl script to output a prompt; in? stead of outputting a prompt tclsh will evaluate the script in tcl_prompt1. The variable tcl_prompt2 is used in a similar way when a newline is typed but the current command is not yet complete; if tcl_prompt2 is not set then no prompt is output for incomplete com? mands.

STANDARD CHANNELS

See Tcl_StandardChannels for more explanations.

SEE ALSO

auto_path(3tcl), encoding(3tcl), env(3tcl), fconfigure(3tcl)

KEYWORDS

application, argument, interpreter, prompt, script file, shell