

IO Functions (4A)

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File Access

File access

fopen	opens a file (with a non unicode filename on windows and possible utf8 filename on linux)
freopen	opens a different file with an existing stream
fflush	synchronizes an output stream with the actual file
fclose	closes a file
setbuf	sets the buffer for a file stream
setvbuf	sets the buffer and its size for a file stream
fwide	switches a file stream between wide character I/O and narrow character I/O

Direct Input/Output

Direct

input/output

fread

reads from a file

fwrite

writes to a file

Unformatted Input/Output

Unformatted input/output

fgetc	fgetc	reads a byte/wchar_t from a file stream
getc	getc	
fgets	fgets	reads a byte/wchar_t line from a file stream
fputc	fputc	
putc	putc	writes a byte/wchar_t to a file stream
fputs	fputs	writes a byte/wchar_t string to a file stream
getchar	getchar	reads a byte/wchar_t from stdin
gets	N/A	reads a byte string from stdin until a newline or end of file is encountered (deprecated in C99, removed from C11)
putchar	putchar	writes a byte/wchar_t to stdout
puts	N/A	writes a byte string to stdout
ungetc	ungetc	puts a byte/wchar_t back into a file stream

Formatted Input/Output

Formatted
input/output

scanf wscanf
fscanf fwscanf
sscanf swscanf

reads formatted byte/wchar_t input from stdin,
a file stream or a buffer

vscanf vwscanf
vfscanf vfwscanf
vsscanf vswscanf

reads formatted input byte/wchar_t from stdin,
a file stream or a buffer using variable argument list

printf wprintf
fprintf fwprintf
sprintf swprintf

prints formatted byte/wchar_t output to stdout,
a file stream or a buffer

snprintf

vprintf vwprintf
vfprintf vfwprintf
vsprintf vswprintf
vsnprintf

prints formatted byte/wchar_t output to stdout,
a file stream, or a buffer using variable argument list

File Positioning

File positioning

<code>ftell</code>	returns the current file position indicator
<code>fgetpos</code>	gets the file position indicator
<code>fseek</code>	moves the file position indicator to a specific location in a file
<code>fsetpos</code>	moves the file position indicator to a specific location in a file
<code>rewind</code>	moves the file position indicator to the beginning in a file

Error Handling

Error
handling

clearerr

feof

ferror

clears errors

checks for the end-of-file

checks for a file error

File Operations

Operations
on files

remove	erases a file
rename	renames a file
tmpfile	returns a pointer to a temporary file
tmpnam	returns a unique filename

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