

<https://sites.google.com/a/fullerton.edu/activeprofessor/4-subjects/x86-programming/library-software/string-integers-floats?authuser=0>

This page is in development. When completed this will be a collection library functions related to these three main groups of data, namely: cstrings, integers of various sizes, and floating point numbers of various sizes. Each function in this group will be licensed by LGPL3.0 open source license and may be re-used freely in application programs.

The projection is that this group of library functions will include the following;

```
char * doubletoa(double);
char * doubletol(double);
long length(char [ ]);
long atolong(char [ ]);
bool isdecimaldigit(char c);
bool iswhitespace(char c);
bool isfloat(char [ ]);
```

The C language library <ctype.h> includes these functions in its collection.

```
int isdigit(char); //Is the parameter a decimal digit?
```

```
int isspace(char); //Is the parameter one of the six recognized white space characters?
```

The C language library <stdlib.h> includes these functions in its collection.

```
double atof(const char* s);
```

```
int atoi(const char* s);
```

```
long atol(const char* s);
```

```
bool isfloat(char [ ]); Checks the parameter for capability to be converted to floating point number of size 32 or 64 bits.
```

```
long atolong(char [ ]); Convert the parameter string to the corresponding signed long integer
```