### sgrep

Generated by Doxygen 1.8.9.1

Thu Dec 10 2015 12:49:38

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# **Data Structure Index**

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Here	are the data structures with brief descriptions:	
	ron data	

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# File Index

### 2.1 File List

Here is a list of all documented files with brief descriptions:

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## **Data Structure Documentation**

3.1 sgrep\_data\_ Struct Reference

**Data Fields** 

• int dummy\_var\_to\_to\_make\_gcc\_shut\_up

The documentation for this struct was generated from the following file:

• sgrep\_data.h

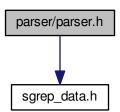
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### **File Documentation**

### 4.1 parser/parser.h File Reference

Functions for parsing command line options.

#include "sgrep\_data.h"
Include dependency graph for parser.h:



#### **Macros**

- #define PARSE OK 0
- #define PARSE\_BAD\_INDATA 1

#### **Functions**

• int parse (int argc, char \*\*argv, sgrep\_data \*data)

The function parses a command line and stores the settings in the variables in the sgrep\_data structure.

#### 4.1.1 Detailed Description

Functions for parsing command line options.

#### **Author**

Henrik Sandklef

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Date

9 dec 2015

The function is used to parse the command line options. The function stores the information gathered during parsing in the sgrep\_data structure.

#### 4.1.2 Function Documentation

4.1.2.1 int parse (int argc, char \*\* argv, sgrep\_data \* data)

The function parses a command line and stores the settings in the variables in the sgrep\_data structure.

#### **Parameters**

argc	- the number of strings to parse
argv	- the strings to parse
data	- a pointer to sgrep_data. Set the variables according to the arguments.

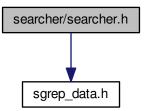
#### Returns

0: success, 1: bad indata

#### 4.2 searcher/searcher.h File Reference

Functions for finding string in lines (strings)

#include "sgrep\_data.h"
Include dependency graph for searcher.h:



#### Macros

- #define SEARCHER\_OK\_MATCHES 0
- #define SEARCHER\_OK\_NO\_MATCHES 1
- #define SEARCHER BAD INDATA 2
- #define **SEARCHER\_OUT\_OF\_MEM** 2

#### **Functions**

int search\_string (char \*indata, sgrep\_data \*sdg)

Searches for a string (found in sdg) in indata.

• int search\_file (sgrep\_data \*sdg)

The function searches for regexp in each line of the FILE in.

void free\_data (sgrep\_data \*sgd)

The function frees all allocated data in the sgrep\_data struct supplied as an argument.

#### 4.2.1 Detailed Description

Functions for finding string in lines (strings)

**Author** 

Henrik Sandklef

Date

9 dec 2015

These functions are used to search for strings in string. The functions keep track of the number of matches and the search string itself by using the corrsponding variables in the sgrep\_data struct.

#### 4.2.2 Function Documentation

4.2.2.1 void free\_data ( sgrep\_data \* sgd )

The function frees all allocated data in the sgrep\_data struct supplied as an argument.

**Parameters** 

```
sgd - the data to free
```

#### 4.2.2.2 int search\_file ( sgrep\_data \* sdg )

The function searches for regexp in each line of the FILE in.

Given a valid search string (the needle), in the variable reg\_exp in sgrep\_data this functions checks if the string can be found in each of the lines in the variable in in sgred\_data.

If any of the indata is NULL, the function returns 2.

Note

This function is allowed to print matching strings to stdout. It should be noted that it would be better to leave this to some other module.

#### **Parameters**

sda	- struct containing string to search for and file where to search in
oug	Strade domaining string to occitor for and me where to occitor in

#### Returns

0: at least on match, 1: no matches found, 2: bad indata

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4.2.2.3 int search\_string ( char \* indata, sgrep\_data \* sdg )

Searches for a string (found in sdg) in indata.

Given a valid search string (the needle), in the variable reg\_exp in sgrep\_data this functions checks if the string can be found in the indata (haystack).

If any of the indata is NULL, the function returns 2.

#### **Parameters**

in	- streams to find lines in, which in turn will be checked for matches
sdg	- struct containing string to search for

#### Returns

0: at least on match, 1: no matches found, 2: bad indata

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