

Meu projeto

1.0

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Chapter 1

Class Index

1.1 Class List

Here are the classes, structs, unions and interfaces with brief descriptions:

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| Diet | 6 |
| MealPlan | 7 |
| Patients | 8 |
| Period | 9 |

Chapter 2

File Index

2.1 File List

Here is a list of all files with brief descriptions:

| | | |
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| main.c | | 11 |
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Chapter 3

Class Documentation

3.1 Date Struct Reference

```
#include <utils.h>
```

Public Attributes

- int [day](#)
- int [month](#)
- int [year](#)

3.1.1 Member Data Documentation

3.1.1.1 day

```
int Date::day
```

Referenced by [dateInPeriod\(\)](#).

3.1.1.2 month

```
int Date::month
```

Referenced by [dateInPeriod\(\)](#), [main\(\)](#), and [readFile\(\)](#).

3.1.1.3 year

```
int Date::year
```

Referenced by [dateInPeriod\(\)](#), [main\(\)](#), and [readFile\(\)](#).

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

- [utils.h](#)

3.2 Diet Struct Reference

```
#include <utils.h>
```

Public Attributes

- int [ID](#)
- [Date](#) [date](#)
- char [meal](#) [50]
- char [food](#) [50]
- int [calories](#)

3.2.1 Member Data Documentation

3.2.1.1 calories

```
int Diet::calories
```

Referenced by [exceededCalories\(\)](#), [main\(\)](#), and [readFile\(\)](#).

3.2.1.2 date

```
Date Diet::date
```

Referenced by [main\(\)](#), and [readFile\(\)](#).

3.2.1.3 food

```
char Diet::food[50]
```

Referenced by [main\(\)](#), and [readFile\(\)](#).

3.2.1.4 ID

```
int Diet::ID
```

3.2.1.5 meal

```
char Diet::meal[50]
```

Referenced by [main\(\)](#), and [readFile\(\)](#).

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

- [utils.h](#)

3.3 MealPlan Struct Reference

```
#include <utils.h>
```

Public Attributes

- int [ID](#)
- [Date](#) [date](#)
- char [meal](#) [50]
- int [minCal](#)
- int [maxCal](#)

3.3.1 Member Data Documentation

3.3.1.1 date

```
Date MealPlan::date
```

Referenced by [main\(\)](#), and [readFile\(\)](#).

3.3.1.2 ID

```
int MealPlan::ID
```

3.3.1.3 maxCal

```
int MealPlan::maxCal
```

Referenced by [main\(\)](#), and [readFile\(\)](#).

3.3.1.4 meal

```
char MealPlan::meal[50]
```

Referenced by [main\(\)](#), and [readFile\(\)](#).

3.3.1.5 minCal

```
int MealPlan::minCal
```

Referenced by [main\(\)](#), and [readFile\(\)](#).

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

- [utils.h](#)

3.4 Patients Struct Reference

```
#include <utils.h>
```

Public Attributes

- int [ID](#)
- char [name](#) [50]
- int [phoneNumber](#)

3.4.1 Member Data Documentation

3.4.1.1 ID

```
int Patients::ID
```

3.4.1.2 name

```
char Patients::name[50]
```

3.4.1.3 phoneNumber

```
int Patients::phoneNumber
```

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

- [utils.h](#)

3.5 Period Struct Reference

```
#include <utils.h>
```

Public Attributes

- [Date begin](#)
- [Date end](#)

3.5.1 Member Data Documentation

3.5.1.1 begin

```
Date Period::begin
```

Referenced by [dateInPeriod\(\)](#).

3.5.1.2 end

```
Date Period::end
```

Referenced by [dateInPeriod\(\)](#).

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

- [utils.h](#)

Chapter 4

File Documentation

4.1 main.c File Reference

```
#include "utils.h"
#include <stdio.h>
```

Functions

- int [main](#) ()

4.1.1 Function Documentation

4.1.1.1 main()

```
int main ( )
```

References [Diet::calories](#), [Diet::date](#), [MealPlan::date](#), [DIET](#), [Diet::food](#), [MealPlan::maxCal](#), [Diet::meal](#), [MealPlan::meal](#), [MEAL_PLAN](#), [MealPlan::minCal](#), [Date::month](#), [PATIENTS](#), [readFile\(\)](#), and [Date::year](#).

4.2 utils.c File Reference

```
#include "utils.h"
#include <stdio.h>
```

Functions

- int [readFile](#) (char *path, void *data, int max_size, [FileType](#) fileType)
- int [dateInPeriod](#) ([Date](#) date, [Period](#) period)
- int [exceededCalories](#) ([Diet](#) *diet, int max_size, int calories, [Period](#) period)

4.2.1 Function Documentation

4.2.1.1 dateInPeriod()

```
int dateInPeriod (
    Date date,
    Period period )
```

References [Period::begin](#), [Date::day](#), [Period::end](#), [Date::month](#), and [Date::year](#).

Referenced by [exceededCalories\(\)](#).

4.2.1.2 exceededCalories()

```
int exceededCalories (
    Diet * diet,
    int max_size,
    int calories,
    Period period )
```

References [Diet::calories](#), and [dateInPeriod\(\)](#).

4.2.1.3 readFile()

```
int readFile (
    char * path,
    void * data,
    int max_size,
    FileType fileType )
```

References [Diet::calories](#), [Diet::date](#), [MealPlan::date](#), [DIET](#), [Diet::food](#), [MealPlan::maxCal](#), [Diet::meal](#), [MealPlan::meal](#), [MEAL_PLAN](#), [MealPlan::minCal](#), [Date::month](#), [PATIENTS](#), and [Date::year](#).

Referenced by [main\(\)](#).

4.3 utils.h File Reference

Classes

- struct [Date](#)
- struct [Period](#)
- struct [Patients](#)
- struct [Diet](#)
- struct [MealPlan](#)

Enumerations

- enum [FileType](#) { [PATIENTS](#) , [DIET](#) , [MEAL_PLAN](#) }

Functions

- int [readFile](#) (char *path, void *data, int max_size, [FileType](#) fileType)
- int [exceededCalories](#) ([Diet](#) *diets, int calories, [Period](#) period)

4.3.1 Enumeration Type Documentation

4.3.1.1 FileType

enum [FileType](#)

Enumerator

| | |
|---------------------------|--|
| PATIENTS | |
| DIET | |
| MEAL_PLAN | |

4.3.2 Function Documentation

4.3.2.1 exceededCalories()

```
int exceededCalories (  
    Diet * diets,  
    int calories,  
    Period period )
```

4.3.2.2 readFile()

```
int readFile (  
    char * path,  
    void * data,  
    int max_size,  
    FileType fileType )
```

References [Diet::calories](#), [Diet::date](#), [MealPlan::date](#), [DIET](#), [Diet::food](#), [MealPlan::maxCal](#), [Diet::meal](#), [MealPlan::meal](#), [MEAL_PLAN](#), [MealPlan::minCal](#), [Date::month](#), [PATIENTS](#), and [Date::year](#).

Referenced by [main\(\)](#).

4.4 utils.h

[Go to the documentation of this file.](#)

```
1 //DataTypes
2 typedef struct {
3     int day;
4     int month;
5     int year;
6 } Date;
7
8 typedef struct {
9     Date begin;
10    Date end;
11 } Period;
12
13 typedef struct {
14     int ID;
15     char name[50];
16     int phoneNumber;
17 } Patients;
18
19 typedef struct {
20     int ID;
21     Date date;
22     char meal[50];
23     char food[50];
24     int calories;
25 } Diet;
26
27 typedef struct {
28     int ID;
29     Date date;
30     char meal[50];
31     int minCal;
32     int maxCal;
33 } MealPlan;
34
35 typedef enum {
36     PATIENTS,
37     DIET,
38     MEAL_PLAN
39 } FileType;
40
41 //Funcoes
42 int readFile(char *path, void *data, int max_size, FileType fileType);
43 int exceededCalories(Diet *diets, int calories, Period period);
```

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