LYSK Lygiagrečiųjų skaičių sparčioji paieška (LSSP)

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Chapter 1

Lygiagretieji skaičiavimai

Chapter 2

Class Index

2.1 Class List

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

Sieve
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Chapter 3

Class Documentation

3.1 Sieve Class Reference

A class to hold our sieve from an arbitrary starting point.

`#include <sieve.h>`

Public Member Functions

- Sieve (std::int64_t end, std::int64_t start=3, const std::vector< std::int64_t > &prime_list={})
  Generate a sieve.
- void process_sieve ()
  Process the sieve. Can be called separately, but nothing will break if you don't.
- std::int64_t getnumprimes ()
  Get the number of primes we found in the sieve.
- const std::int64_t * getprimes ()
  Get primes.
- const std::vector< std::int64_t > & getprimevector ()
  get primes, but a vector.

3.1.1 Detailed Description

A class to hold our sieve from an arbitrary starting point.

3.1.2 Constructor & Destructor Documentation

3.1.2.1 Sieve()

```
Sieve::Sieve (
            std::int64_t end,
            std::int64_t start = 3,
            const std::vector< std::int64_t > & prime_list = {} )
```

Generate a sieve.

Parameters

end	What number do we wish to end our sieve on. Must be odd.
start	What number do we wish to start our sieve on. Must be odd and default to 3.
prime_list	A vector of initial primes to mark. This is used in the segmented sieve.

3.1.3 Member Function Documentation

3.1.3.1 getnumprimes()

```
std::int64_t Sieve::getnumprimes ( )
```

Get the number of primes we found in the sieve.

Returns

number of primes in sieve.

3.1.3.2 getprimes()

```
const std::int64_t * Sieve::getprimes ( )
```

Get primes.

Returns

Primes.

3.1.3.3 getprimevector()

```
const std::vector< std::int64_t > & Sieve::getprimevector ( )
```

get primes, but a vector.

Returns

the same primes, but a vector.

The documentation for this class was generated from the following files:

- sieve.h
- sieve.cpp

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