



ISTITUTO ITALIANO
DI TECNOLOGIA

Modern C++

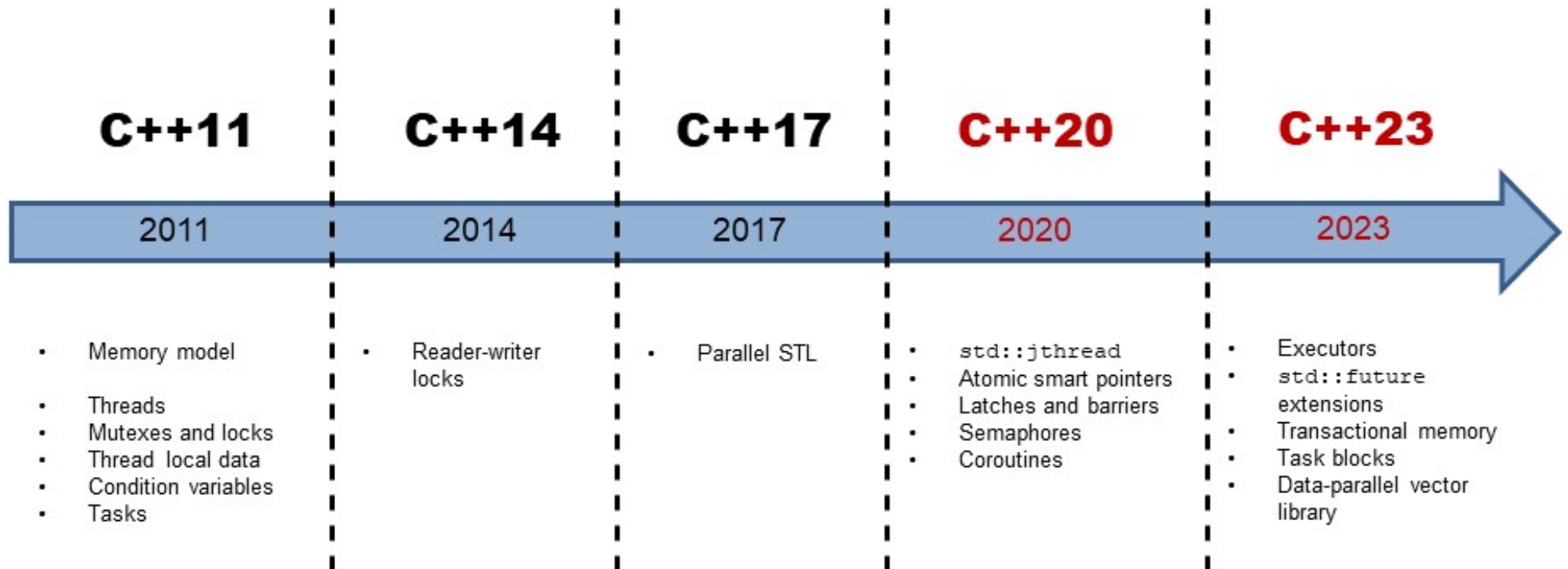
2023

Modern C++



Modern C++: from 98/03 to 11, 14, 17

Modern C++



Prerequisites

To fully understand the course, it is required:

- Basic knowledge of standard C++98

The program

1 Presentation of the course, tools

30 May 2023, [14:00, 17:00]

2 Prerequisites: refresh of C++98

31 May 2023, [14:00, 17:00]

3 The basics: nullptr, auto, type aliases, initializer list, uniform initialization

1 June, [14:00, 17:00]

4 The basics: range-based loops, constexpr, scoped enums, override and final.

13 June, [14:00, 17:00]

5 Advanced topics: Lambda functions, STL containers, algorithms

20 June, [14:00, 17:00]

6 Advanced topics: Move semantics, Smart pointers

21 June, [14:00, 17:00]

The program

7 Advanced topics: Multithread

22 June, [14:00, 17:00]

8 Advanced topics: New features in C++20

26 June, [14:00, 17:00]

9 Hands on code

27 June, [14:00, 17:00]

10 Correction and discussion of the final assignment

28 June, [14:00, 17:00]

The final assignment

- In mid June you will fork a GitHub repository with some code to develop / questions to answer / report to write / ...
- You will develop the assignment and push on your fork.
- We shall review the assignment in the last lesson.

