
Modern C++ C++11 / C++14 / C++17

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The logo for KDAB, featuring a stylized white lightning bolt icon to the left of the text 'KDAB' in white, all on a blue background.

KDAB

The Qt, OpenGL and C++ Experts

Introduction

- Introduction to Modern C++
 - Compiler Support

Important C++11/14/17 Language Changes

- nullptr
- Uniform Initialization
- C++98 Exceptions Refresher
- noexcept
- Rvalue References and Move Semantics
- Miscellanea
- Attributes
- Explicit Virtual Overrides
- Type Inference
- C++98 Containers and Algorithms Refresher
- Range-Based for Loop
- Lambdas

Important C++11/14/17 Language Changes (2)

- Defaulted & Deleted Members
- Generalized Constant Expressions
- Constructors
- Strongly-Typed Enums
- Structured Bindings
- Guaranteed Copy Elision

C++11/14/17 Library Additions

- Multithreading
 - Basics
 - Asynchronous Execution
 - Utilities
 - Atomics
- Language Support & Diagnostics Libraries
- Vocabulary Types
- String Processing
- General Utilities Libraries
- Functional Programming
- Smart Pointers
- Containers & Algorithms
- Filesystem

C++11/14/17 Template Changes

- Templates
- Variadic Templates
- constexpr if
- Perfect Forwarding
- Class Template Deduction

Optional Topics

- Alignment Control
- Expression SFINAE
- The C++11 Memory Model
- Special User-Defined Types
- The Tuple Protocol
- Inline Namespaces
- User-Defined Literals
- Random Numbers
- Regular Expressions