

# Tour of C++, A (C++ In-Depth Series)

To Download this book in many format Visit :

<https://wocoentala.org/source1/1ef1a41f52f8775858fc2ca0beafd14b>

---

In *A Tour of C++*, Second Edition, Bjarne Stroustrup, the creator of C++, describes what constitutes modern C++. This concise, self-contained guide covers most major language features and the major standard-library components—not, of course, in great depth, but to a level that gives programmers a meaningful overview of the language, some key examples, and practical help in getting started.

Stroustrup presents the C++ features in the context of the programming styles they support, such as object-oriented and generic programming. His tour is remarkably comprehensive. Coverage begins with the basics, then ranges widely through more advanced topics, including many that are new in C++17, such as move semantics, uniform initialization, lambda expressions, improved containers, random numbers, and concurrency. The tour even covers some extensions being made for C++20, such as concepts and modules, and ends with a discussion of the design and evolution of C++.

This guide does not aim to teach you how to program (for that, see Stroustrup's *Programming: Principles and Practice Using C++*, Second Edition), nor will it be the only resource you'll need for C++ mastery (for that, see Stroustrup's *The C++ Programming Language*, Fourth Edition, and recommended online sources). If, however, you are a C or C++ programmer wanting greater familiarity with the current C++ language, or a programmer versed in another language wishing to gain an accurate picture of the nature and benefits of modern C++, you can't find a shorter or simpler introduction than this tour provides. Bjarne Stroustrup is the designer and original implementer of C++ and the author of *Programming: Principles and Practice Using C++*, 2nd Edition, and *The C++ Programming Language*, 4th Edition, among others. Having previously worked at Bell Labs, AT&T Labs - Research, and Texas A&M University, he is currently Managing Director in the technology division of Morgan Stanley in New York City. The recipient of numerous honors, including The National Academy of Engineering 2018 Charles Stark Draper Prize for Engineering "for conceptualizing and developing the C++ programming language, Dr. Stroustrup is a member of the National Academy of Engineering, an AT&T Fellow, an AT&T Bell Laboratories Fellow, an IEEE Fellow, and an ACM Fellow. He was voted into Electronic Design's Engineering Hall of Fame in 2013. His research interests include distributed systems, simulation, design, programming techniques, software development tools, and programming languages, and he remains actively involved in the ANSI/ISO standardization of C++. Dr. Stroustrup holds an advanced degree from the University of Aarhus in his native Denmark and a Ph.D. in Computer Science from Cambridge University, England.

#### Other Books

*3D Integration in VLSI Circuits*. Currently, the term 3D integration includes a wide variety of different integration methods, such as 2.5-dimensional (2.5D) interposer-based integration, 3D integrated circuits (3D ICs), 3D systems-in-package (SiP), 3D heterogeneous integration, and monolithic 3D ICs. The goal of this book is to provide readers with an understanding of the latest challenges and issues in 3D integration. TSVs are not the only technology element needed for 3D integration. There are numerous other key enabling technologies

required for 3D integration, and the speed of the development in this emerging field is very rapid. To provide readers with state-of-the-art information on 3D integration research and technology developments, each chapter has been contributed by some of the world's leading scientists and experts from academia, research institutes, and industry from around the globe. Covers chip/wafer level 3D integration technology, memory stacking, reconfigurable 3D, and monolithic 3D IC. Discusses the use of silicon interposer and organic interposer. Presents architecture, design, and technology implementations for 3D FPGA integration. Describes oxide bonding, Cu/SiO<sub>2</sub> hybrid bonding, adhesive bonding, and solder bonding. Addresses the issue of thermal dissipation in 3D integration.

□ □ □ □ □ . The goal of this book is to provide readers with an understanding of the latest challenges and issues in 3D integration. TSVs are not the only technology element needed for 3D integration."