GSET - Programming with Mr. Hill

Tristan Hill

Tennessee Technological University

Summer 2021

Module 1 - Creating a Program

Module 1 - **Creating a Program**

- Learning to Program

- Choosing a Language

- C++ Program Structure

- Compiling and Linking Source

- Up Next ...

Learning to Program

Programming is a skill that requires a lifetime of learning, and now is a great time to start.

- New Problems
- New Languages
- New Hardware

Learning to Program

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Choosing a Language

Question: How many programming languages exist today?

- A.NET

- A-0 System
  ...

- B

- Bash

- Fortran

- C

- C–

- C++ ...

- Python

- Java

- JavaScript

- MATLAB

- Tex ...
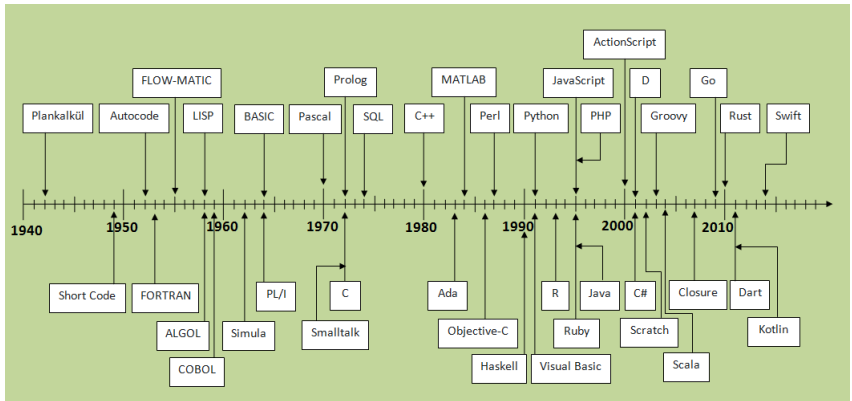
Answer:

Choosing a Language

Image: Java Concept Of The Day

Choosing a Language

Modern Programming Languages

- C++

- Python

- JavaScript

Why is C++ important for scientists and engineers?

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C++ Program Structure
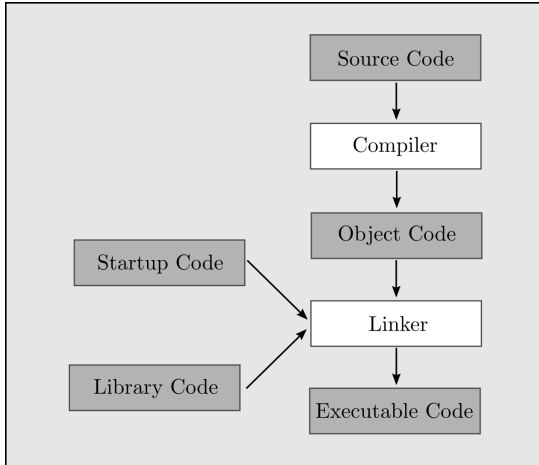
Look at the program from the previous tutorial.

```
/*
Hello World - June 3, 2021
This is a comment
*/

#include <stdio.h>

int main()
{
    printf("Hello World");

    return 0;
}
```

Learning to Program
Choosing a Language
C++ Program Structure
Compiling and Linking Source
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Compiling and Linking Source

How does the computer run your code?

Compiled	Interpreted

Compiling and Linking Source

Image: T. Hill from C++ Primer Plus by Stephen Prata

Up Next ...

- **Next:** We are going to learn about Variables, Expressions and Assignment.