Compilers harnessed the power of computers to make programming easier by allowing programmers to specify calculations by entering a formula using infix notation.  
For example, when a bug in a compiler can make it crash when parsing some large source file, a simplification of the test case that results in only few lines from the original source file can be sufficient to reproduce the same crash.  
To produce machine code, the source code must either be compiled or transpiled.  
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However, while these might be considered part of the programming process, often the term software development is more likely used for this larger overall process – whereas the terms programming, implementation, and coding tend to be focused on the actual writing of code.  
It affects the aspects of quality above, including portability, usability and most importantly maintainability.  
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Many applications use a mix of several languages in their construction and use.  
Programming languages are essential for software development.  
 Implementation techniques include imperative languages (object-oriented or procedural), functional languages, and logic languages.  
To produce machine code, the source code must either be compiled or transpiled.  
 The first step in most formal software development processes is requirements analysis, followed by testing to determine value modeling, implementation, and failure elimination (debugging).  
The source code of a program is written in one or more languages that are intelligible to programmers, rather than machine code, which is directly executed by the central processing unit.  
However, while these might be considered part of the programming process, often the term software development is more likely used for this larger overall process – whereas the terms programming, implementation, and coding tend to be focused on the actual writing of code.