Also, those involved with software development may at times engage in reverse engineering, which is the practice of seeking to understand an existing program so as to re-implement its function in some way.  
Normally the first step in debugging is to attempt to reproduce the problem.  
However, Charles Babbage had already written his first program for the Analytical Engine in 1837.  
However, because an assembly language is little more than a different notation for a machine language, two machines with different instruction sets also have different assembly languages.  
This is interpreted into machine code.  
There are many approaches to the Software development process.  
As early as the 9th century, a programmable music sequencer was invented by the Persian Banu Musa brothers, who described an automated mechanical flute player in the Book of Ingenious Devices.  
Languages form an approximate spectrum from "low-level" to "high-level"; "low-level" languages are typically more machine-oriented and faster to execute, whereas "high-level" languages are more abstract and easier to use but execute less quickly.  
For this purpose, algorithms are classified into orders using so-called Big O notation, which expresses resource use, such as execution time or memory consumption, in terms of the size of an input.  
Text editors were also developed that allowed changes and corrections to be made much more easily than with punched cards.  
Some text editors such as Emacs allow GDB to be invoked through them, to provide a visual environment.  
However, Charles Babbage had already written his first program for the Analytical Engine in 1837.  
Programming languages are essential for software development.  
 Following a consistent programming style often helps readability.  
 Programs were mostly entered using punched cards or paper tape.