Blockchain is referred as Distributed Ledger Technology (DLT),  which makes the history of any digital asset unalterable and transparent through the use of fragmentation and cryptographic hashing. It was first introduced in 1991 by researchers Stuart Haber and W. scott Stornetta.

We can understand blockchain technology by Google Doc. When we create a document and share it with a group of people, the document is distributed instead of copied or transferred. This creates a fragmented distribution chain that gives everyone access to the document at the same time. No one is locked out awaiting changes from another party, while all modifications to the document are being recorded in real-time, making changes completely transparent. Also in blockchain system information are recorded in a way that it is difficult and impossible to change, hack the system.

Blockchain consists of three basic parts. They are:

1. Record: Any type of information.
2. Block: Bundle of different records.
3. Chain : Contains all the blocks linked together.

For each blockchain transaction the blockchain used goes through same procedure.

1. The transaction is recorded in a record.
2. The trade is checked to make sure it is valid.
3. When every transaction is verified and accepted as real, it is added to a block.
4. After the block is complete blocks can contain many transactions and then it is added to the chain.

Blockchain is built as the platform bitcoin is built on. That means bitcoin protocol is built on a blockchain. So bitcoin is depended on blockchain. Blockchain allows bitcoin and other cyptocurrencies to conduct their business without the need for a central authority. This reduces any risk with the transaction and also eliminates many of the processing and transaction fees. It gives to countries which have unstable currencies more stable infrastructure, more applications. For bitcoin in the blockchain is the history of all bitcoin transactions. Computers that makeup bitcoin’s network are called nodes. If one node has error in it’s data it can use other nodes as reference to correct itself. Because of this bitcoin’s blockchain is irreversible.

As the nature of Bitcoin’s blockchain is fragmented all transactions can be transparently viewed by personal node or blockchain explorers. Each node has it’s own copy of chain that is updated when new blocks are validated and added. That is why it is possible to track Bitcoin wherever it goes.

Bitcoin uses blockchain cause it is very secure. In blockchain when a block is added it is extremely difficult to go back to that block and alter the contents. Because each block contains own hash. Hash codes turns digital information into a string of letters and numbers. So for example, if hacker tries to change the blockchain and steal the Bitcoin then hacker were to alter their own single copy, it would no longer match with everyone else. When every copies are checked and cross referenced hacker’s copy would not match and then it will be turned away as corrupt.

So blockchain and bitcoin is interrelated. Bitcoin is completely based on blockchain. Blockchain provides accuracy, cost reductions, fragmentation, efficient transactions, security, transparency all the things necessary in Bitcoin.