

A New World Order For Future Tech Stars

How a Fast Growing and Mysterious Industry Is Crying Out For Highly Skilled Tech Professionals With A Different View Of the World's Economy

There is something big happening in the technology world. It's still in its infancy so many people can't see it happening. Nor understand it. Banks and financial services companies are going crazy though. It is being viewed as the equivalent of the Internet boom of the '90s. The framework is in place but the applications are not yet developed. It is an industry experiencing unprecedented demand for highly specialised professionals. And the demand will only continue to grow in the next 10 years.

We're talking about Blockchain. The trusted network which caters for the verification of everyday transactions without the need for an intermediary like a bank or governing body. In other words, Blockchain is a technology for distributed, decentralised verification of transactions and update of digital ledgers. The digital ledgers contain the transactions made in Bitcoin—or other cryptocurrencies—and are recorded chronologically and publicly.

Computer hardware that carries the Blockchain technology for a specific 'product' such as Bitcoin or Litecoin verify transactions and support the network. As more computers join the network, the more secure and decentralised the network becomes. By contributing to the network with computer hardware power, the so-called miner may get two types of rewards:

1. A new coin for the transaction, and / or
2. A transaction fee paid by the sender or the recipient.

The first application of Blockchain technology was Bitcoin—created in 2009 by a person or group of people going by the pseudonym Satoshi Nakamoto. They deployed this open-source code onto the Internet and people started using and developing on it. Satoshi, or the group, have since disappeared and are no longer contactable via email.

Below is the first email sent by Satoshi outlining the terms of the new blockchain technology.

Bitcoin v0.1 released

Satoshi Nakamoto [satoshi at vistomail.com](mailto:satoshi@vistomail.com)

Thu Jan 8 14:27:40 EST 2009

Announcing the first release of Bitcoin, a new electronic cash system that uses a peer-to-peer network to prevent double-spending. It's completely decentralized with no server or central authority.

See bitcoin.org for screenshots.

Download link:

<http://downloads.sourceforge.net/bitcoin/bitcoin-0.1.0.rar>

Windows only for now. Open source C++ code is included.

- Unpack the files into a directory
- Run BITCOIN.EXE
- It automatically connects to other nodes

If you can keep a node running that accepts incoming connections, you'll really be helping the network a lot. Port 8333 on your firewall needs to be open to receive incoming connections.

The software is still alpha and experimental. There's no guarantee the system's state won't have to be restarted at some point if it becomes necessary, although I've done everything I can to build in extensibility and versioning.

You can get coins by getting someone to send you some, or turn on Options->Generate Coins to run a node and generate blocks. I made the proof-of-work difficulty ridiculously easy to start with, so for a little while in the beginning a typical PC will be able to generate coins in just a few hours. It'll get a lot harder when competition makes the automatic adjustment drive up the difficulty. Generated coins must wait 120 blocks to mature before they can be spent.

There are two ways to send money. If the recipient is online, you can enter their IP address and it will connect, get a new public key and send the transaction with comments. If the recipient is not online, it is possible to send to their Bitcoin address, which is a hash of their public key that they give you. They'll receive the transaction the next time they connect and get the block it's in. This method has the disadvantage that no comment information is sent, and a bit of privacy may be lost if the address is used multiple times, but it is a useful alternative if both users can't be online at the same time or the recipient can't receive incoming connections.

Total circulation will be 21,000,000 coins. It'll be distributed to network nodes when they make blocks, with the amount cut in half every 4 years.

first 4 years: 10,500,000 coins
next 4 years: 5,250,000 coins
next 4 years: 2,625,000 coins
next 4 years: 1,312,500 coins
etc...

When that runs out, the system can support transaction fees if needed. It's based on open market competition, and there will probably always be nodes willing to process transactions for free.

Satoshi Nakamoto

The Cryptography Mailing List

Unsubscribe by sending "unsubscribe cryptography" to [majordomo at metzdowd.com](mailto:majordomo@metzdowd.com)

The original email where everything started in January 2009.

Nakamoto claims to be a 37-year-old male living in Japan. But some speculate he is unlikely to be Japanese due to his use of perfect English and his bitcoin software not being documented or labelled in Japanese. Despite its mysterious origins, Blockchain is undeniably an ingenious invention. And it is evolving into something much bigger.

By allowing digital information to be distributed but not copied, blockchain technology has created the backbone of a new type of Internet, allowing safe and secure transactions to occur without the need of a centralised organisation controlling (or manipulating) data.

Bitcoin has been called “Digital Gold”. And for a good reason. Because Blockchains can make other types of digital value. Like the Internet (or your car), people don’t need to know how the Blockchain works to use it. But it is making advances into several parts of our lives including finance, health, logistics, social media and how your data is stored.

When you think of any transaction requirement that can greatly benefit by being independent from any central party, decentralised, ultra-secure or that requires some type of validation, there is a very high chance that a Blockchain solution is being created or will be created for it. This means higher demand for Blockchain developer and consultant professionals.

The high demand for a Blockchain skill set is prompting professional services companies to look for a solution on how to upskill professionals in this area. Renato Dayan, founder and CEO of Outsource Fitch says:

“It is a new profession. Blockchain is creating new skill requirements and new jobs”.

Renato is working with technology professionals in the Philippines to develop their Blockchain skill set in that country.

“We are hiring professionals with some type of Information Technology skill set and upskilling them to learn Blockchain”.

In Australia, the story is similar, Outsource Fitch is also engaging educational institutions about Blockchain education and training.

“Australia needs to aim for leadership in this new technology. The opportunity is here and the interest for the subject will also come from the universities” says Renato.

The Blockchain products of the future are not even launched yet or are at very early stages. Several companies have run ICOs (raised funds through initial token distribution) in order to fund their Blockchain projects. Tokens, also known as Cryptocurrencies, are the reward an individual (or organisation) receives for contributing to that specific product network. This means the owners of the tokens do not hold shareholdings in the actual Blockchain company in an ICO.

Their motivation for the token is that one day the company will be very large, thus increasing the demand and price for that respective token. Currently, most of the attraction around cryptocurrency is day trading price fluctuations caused by the uncertainty that surrounds Bitcoin.

There is definitely uncertainty that permeates every aspect of Bitcoin, Cryptocurrencies and the backbone technology, Blockchain. However, the obvious opportunities for jobs and high interest from established organisations such as banks is a positive sign of what's to come.

The development of Blockchain and its use in protecting privacy on social media is also gaining enormous traction. This is especially relevant in the wake of the fiasco with Facebook and Cambridge Analytica.

The Cambridge Analytica scandal involved the collection of personally identifiable information of up to 87 million Facebook users and almost certainly a much greater number. The data was allegedly used to attempt to influence voter opinion on behalf of politicians who hired them. Facebook has since apologised amid public outcry and fallen stock prices.

With Blockchain technology, Facebook users will be allowed to store their own data in the Blockchain—making it secure from companies such as Facebook who have a monopoly on users personal information.

Users will have the ability to release pieces of data they want, to whom they want, when they want. And not just to Facebook but to all types of organisations who collect and store data. Blockchain will allow this to happen, maintaining the current functions of social media while at the same time holding the users privacy data securely.

The demand for new skills in the Blockchain industry is set to skyrocket as Blockchain technology gains more acceptance in facilitating everyday transactions and securing personal information.