

<https://cointelegraph.com/news/paying-with-your-face>

## Paying With Your Face++



Credit cards, online wallets and cryptocurrencies are just some of the numerous ways of payment in the modern world. Yet, there has been a recent addition to this list. Meet a completely new technology: paying with your face. Yes, seriously.

No fingerprints or retinal scans. Just smile into the camera and have the payment done.

### Optimistic startup

The Face++ startup has a partnership with several commercial banks: [Ant Financial](#) and a subsidiary of [Alibaba](#) - [Alipay](#). [Many people](#) already use Alipay to make their online payments.

Here is how it works: when users upload their photos to the system, it integrates facial biometric data and tracks up to 83 different key points on the face from various angles at the same time.

Identity verification happens immediately with an extremely high accuracy. This technology is used in [Alipay's "smile-to-pay"](#) application.

Face++ payment confirmations can improve the financial security of any person. Together with an overall image of an individual's face, this app also captures some specific facial features. The software can identify faces with 99 percent accuracy.

Nowadays, over [120 mln](#) people in China use the Face++ app to confirm their payments.

The developers of the new app called [Face++](#) are located in Beijing, China. The first version of the app was launched nearly five years ago. Since then, a number of improvements have been added to it. One of the most important of them is moving to a completely new platform with computer vision algorithms at its core.



## **What else can this app do?**

In addition to ID verification, Face++ can do other things: analysis of age, race, face comparison, gender detection and identification of emotional expressions. All of that based on just one photo.

Looking even deeper, we find another useful ability of the facial recognition app. It can provide automatic access to private property, such as company's offices, for example. In fact, this is one of the most popular and widespread usages of Face++ right now. The app can also monitor

people's movements inside a room. That makes this technology quite helpful for banks or big stores.

## **Forensic analysis**

Local governments in China use the Face++ software to identify criminals in the video from [surveillance cameras](#). It works faster and more accurately than the methods which have been in use before - such as fingerprint analysis or searching through photos.

Banks can also be mentioned here, as this technology can be applied to provide security to authorize payments and track down robbers.

Finally, the application can identify drivers in case they are suspected criminals trying to escape, even if they use some kind of disguise.

### Facial Biometric in the cryptocurrency sphere

From the Bitcoin and the Blockchain points of view, this facial recognition technology can be helpful too. For example, possible applications include wallet login systems or creating unique addresses for ICO campaigns.

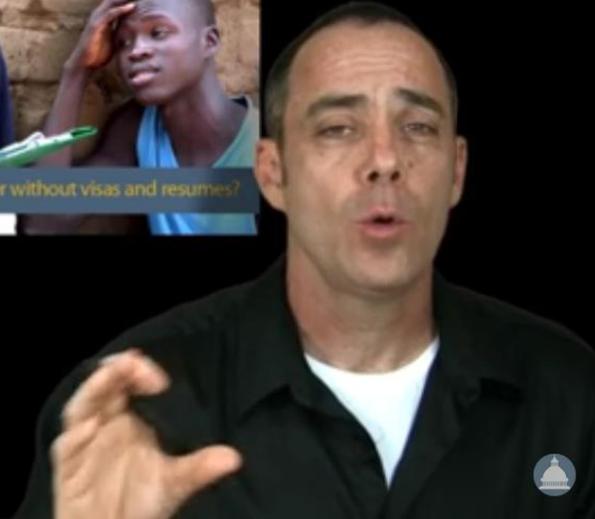
One of Bitcoin experts - [James D'Angelo](#), research associate at Harvard Kennedy School - discusses the topic of how old and new technologies can go together in a [video](#). D'Angelo briefly sets goals and presents first steps of realization of the new technology:

## Some nice and novel goals/features

(there's many more)

- Zero cost to the individual
- No private keys or passwords (naked man)
- Decentralized & open-source top to bottom
- 1000x better id than a passport
- Cannot be stolen
- User controlled (as robust as you want)
- Can be 100% anonymous
- Can verify identity without cell or internet service
- Can maintain identity with super spodic internet
- Survives even if Bitcoin doesn't
- User can control/privatize their data. Indeed never even put it online.

idchains



[ShoCard](#) - an online digital ID system built on top of the Blockchain also made an entrance into the field. The company claims:

“Focused on creating an innovative, mobile identity management solution using BlockCypher’s Blockchain infrastructure. Using BlockCypher’s API services and sandbox test Blockchain (BCY), ShoCard was able to experiment quickly, learn and test many new Blockchain identity ideas.”

[Internet of Things](#) or IoT also presents more useful opportunities. For example, it is possible to create a private Blockchain and let the users access it at any time without wasting time on entering a password.

The latest addition to this industry came up on June 19. [Accenture](#), together with Microsoft and Avanade have announced Blockchain and biometric technologies to support [ID2020](#) - a global public-private partnership. Their first Blockchain technology-based ID prototype runs on Microsoft Azure. It enables users to control who exactly has access to their personal information, plus the ability to release and share data. By 2020 the system is expected to service more than seven mln people from 75 countries.

## Potential users are not sure

The primary purpose behind Face++ was not actually security, but rather convenience - it makes payments much faster. This technology could bring some convenience to our life. In addition, it can be much safer than any traditional passwords as no one can “hack” one’s face.

To sum up, the “paying with your face” system works well in China and people from other countries would probably join the modern wave soon as it’s rather convenient.