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LIBRA: FIRST INTERNATIONAL CRYPTOCURRENCY

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Abstract: Facebook will soon launch the world's first digital payment currency: Libra. Libra's mission is to foster the development of a simple global currency and financial infrastructure that serves billions of people. This document presents the project, based on a new decentralized blockchain, a cryptomonnaie low volatility and a smart contract platform. The combination of these elements aims to create a new opportunity for innovative and responsible financial services. Libra will be sustained through a small charge per transaction on the blockchain. Many of these charges will be transferred to vendors who can then absorb the costs themselves or relay them to users. Collaboration and innovation with the financial sector (especially with of regulators and experts from various sectors) is the only way to ensure that this new system is based on a durable, secure and reliable framework. This can also lead to a real step towards a low-cost, more accessible and more connected global financial system. Washington and Brussels are calling for far-reaching regulation of Facebook. Responsible citizens have the courage to deal with the ideas of dissidents in social networks, and they have the ability to do so rationally and critically.

Keywords: Cryptocurrency, CaLibra, Libra Association, FINMA, Finance Stability Board (FSB), Libra blockchain, crypto networks, global currency.

Rezumat. Facebook va lansa în curând prima monedă de plată digitală din lume: Libra. Misiunea Librei este de a încuraja dezvoltarea unei monede globale simple și a unei infrastructuri financiare care să deservească miliarde de oameni. Acest document prezintă proiectul bazat pe un nou sistem blockchain descentralizat, o criptomonedă cu volatilitate redusă și platformă de contact inteligent. Combinarea acestor elemente își propune să creeze o nouă oportunitate pentru serviciile financiare inovatoare și responsabile. Balanța va fi susținută printr-o mică taxă pe tranzacție pe blockchain. Multe dintre aceste taxe vor fi transferate către vânzători, care pot absorbi singuri costurile sau le pot transmite utilizatorilor. Colaborarea și inovarea cu sectorul financiar (în special, cu autoritățile de reglementare și experții din diverse sectoare) este singura modalitate de a se asigura că acest nou sistem se bazează pe un cadru durabil, sigur și fiabil. Acest lucru poate conduce, de asemenea, la un pas real către un sistem financiar global mai ieftin, mai accesibil și mai conectat. Washington și Bruxelles solicită o reglementare amplă a Facebook. Cetățenii responsabili au curajul de a face față ideilor disidenților în rețelele sociale și au capacitatea de a face acest lucru în mod rațional și critic.

Cuvinte-cheie: criptomonedă, CaLibra, Asociația Libra, FINMA, Consiliul de stabilitate financiară (FSB), blockchain Libra, rețele criptografice, valută globală.

Introduction

America's technology companies love "missions." They like to put a social cloak around the legitimate pursuit of profits and suggest that they are working on a special task. And so Libra is also pursuing a noble goal: "Libras' mission is to make possible a simple global currency and a financial infrastructure that empowers billions of people." The opportunities are obvious: high fees for international money transfers or the lack of access to financial services by people in emerging and developing countries indicate that the financial services industry is ripe for disruption. The Libra project offers the unique opportunity to greatly simplify the payment and transfer of money worldwide, to make it cheaper and to make it accessible to a large circle of people. But the project will have to overcome considerable hurdles in the coming months and years [1].

Who could have imagined, even a year ago, that the digital currency project led by a Silicon Valley company would be at the heart of the annual meetings of the IMF and the World Bank, the two 70-year-old pillars of the global financial system? That's what's happening with Libra, this cryptocurrency project led by Facebook [2].

Early in 2019 Facebook - the biggest social media platform in the world - declared their new Remittance Service in the form of cryptocurrency. Through Libra, Facebook and WhatsApp users can easily shop, manage and exchange money with each other. In reality, Libra is a digital currency, the first international currency of the Internet era. Libras will be acquired in exchange for a real currency; they can be stored in an electronic wallet, accessible from any mobile phone, even the most basic ones, and then they can be converted back into the original currency. The Libra will therefore be a simple means of payment and money transfer [3, 4].

The Swiss financial market has come under the scrutiny of the international public. The reason is the Geneva-based Libra project launched by Facebook. Facebook says Libra is a "global currency and financial infrastructure". In other words, it is a digital asset built by Facebook and powered by a new Facebook-created version of blockchain, the encrypted technology used by bitcoin and other cryptocurrencies [5].

The Libra's world headquarters will be in Geneva; why did Facebook, which is at the origin of this digital currency, choose Geneva? First, Switzerland was chosen because it is one of the few countries in the world to have defined a clear regulatory framework for cryptocurrencies. That was the first criterion because we knew that the rules of the game would not change at any time. Why Geneva? Because here are all the United Nations governmental organizations with which Facebook will have to deal for the launch of the Libra. Geneva has won all the favours by adding these two criteria together. The *Libra payment system* is to include not only a stable coin, which will be backed by several currencies, but also stable coins backed by a single currency.

The Swiss Financial Market Supervisory Authority (FINMA) has received an application from the Geneva-based "Libra Association1" for authorisation as a payment

¹ The "Libra Association" - is described by Facebook - as an independent, not-for-profit organisation based in Switzerland. It serves two main functions: (1) to validate transactions on the Libra blockchain and (2) to manage the reserve Libra is tied to and allocate funds to social causes. The "Libra Association" should ensure that the network and software are secure; the parties involved work reliably and an appropriate response can be made to violation or attacks from outside. Data protection must be guaranteed, as must transparency and accountability to the community and, in extreme cases, cooperation with law enforcement authorities. The "Libra Association" does not want to destroy the existing financial system or violate regulatory frameworks. It is committed to working with consumers, regulators, policymakers and experts to ensure that everything is done in an orderly fashion and that there is room for innovation. The "Libra Association"

system. This now marks the start of the authorisation process under Swiss supervisory law. The outcome and duration of the process is open.

The non-profit association is to take care of the further development of the simple, global crypto currency and the directly related transaction system, as initially outlined in a so-called white paper. The Association currently has 28 representatives from payment, technology, telecommunications, block-chain, venture capital and not-for-profit companies, and the number of equal members is expected to rise to 100 in the coming months. Facebook itself is represented by the newly found subsidiary Calibra.

FINMA2's role

FINMA (abbreviation of german *Eidgenössische Finanzmarktaufsicht*), has always stressed that the planned international scope of the project makes an internationally coordinated approach indispensable. Accordingly, FINMA has been in close and regular contact with the Swiss National Bank and more than 20 supervisory authorities and national banks worldwide since the start of its supervisory involvement in the Libra project.

In addition, FINMA is also actively involved in various international working groups and committees and is involved in the development of international policies on stable coins, e.g. within the *Financial Stability Board* (FSB).

FINMA is Switzerland's independent financial-markets regulator. Its mandate is to supervise banks, insurance companies, financial institutions, collective investment schemes, and their asset managers and fund management companies. It also regulates insurance intermediaries. It is charged with protecting creditors, investors and policyholders. FINMA is responsible for ensuring that Switzerland's financial markets function effectively [6].

FINMA (the Swiss Federal Financial Market Supervisory Authority) is the first point of contact for the Libra to exist, as the headquarters are in Switzerland. She did not submit a banking license application. It intelligently considered that the "Libra Association" would only operate like any other payment system company, such as MasterCard or Visa. But, given the reserve Libra are going to build up (100 to 200 billion Swiss francs maximum), FINMA wants to monitor these funds, which will be deposit in several major world-class banks [7].

Libra's mission

Zuckerberg said in his Facebook post: Libra's mission is to create a simple global financial infrastructure that empowers billions of people around the world. It's powered by

should ensure that the network and software are secure; the parties involved work reliably and an appropriate response can be made to violation or attacks from outside. Data protection must be guaranteed, as must transparency and accountability to the community and, in extreme cases, cooperation with law enforcement authorities. The "Libra Association" does not want to destroy the existing financial system or violate regulatory frameworks. It is committed to working with consumers, regulators, policymakers and experts to ensure that everything is done in an orderly fashion and that there is room for innovation. Should the project be successful, the economic, political and social consequences would probably be considerable. Regulators, central banks and tax authorities would be called upon as would banks, financial institutions and all other companies that have so far made themselves more or less comfortable in the traditional financial system.

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blockchain technology and the plan is to launch it in 2020. The time has come to create a new type of digital currency based on blockchain technology [8,9]. Libra's mission is the development of a simple global currency and financial infrastructure, in the service of billions of people. Libra is composed of three elements which together form a more inclusive financial system:

- 1. This system is based on a secure, scalable and reliable blockchain;
- 2. It is supported by a pool of assets designed to provide intrinsic value;
- 3. It is governed by the independent association Libra, which is responsible for guiding the evolution of the ecosystem.

"Libras' mission is to make possible a simple global currency and a financial infrastructure that empowers billions of people."

Facebook claims it will keep financial data from transactions on Libra separate from user ad profiles. The blockchain is "pseudonymous", the company said and, like many crypto networks, will allow users to hold one or more addresses not linked to their real-life identities.

The currency will be serviced by a collective of companies called the "Libra Association". It functions as what is known as a "stablecoin", pegged to existing assets like the dollar or euro, in the aim of making it less subject to the volatility that many cryptocurrencies experience. Within the "Libra Association" will be a governing body called the *Libra Association Council*, comprised of a representative of each member of the association, which will vote on policy and operating decisions.

Facebook claims that although it created the "Libra Association" and the "Libra Blockchain", once the currency is launched in 2020 the company will withdraw from a leadership role and all members of the association will have equal votes in governance of Libra.

Legal questions

Indeed, the arrival of Libra is not without legal questions. And the first, and not the least important one, can be asked: how will banking and financial law apply to this project? For the time being, Libra is not regulated at all and distortions of competition could result. Furthermore, how can we supervise the operation of exchange platforms that are not controlled at all for the moment? And finally, how to manage the influence on the policy of States whose sovereign debt is held by the Libra association as a cover for the Libras issued?

The second issue concerns the protection of personal data [10]. The former may concern available assets and the latter may concern users' banking data. For the time being, the terms and conditions of use of CaLibra, the application linked to payment by Libra, provide that "CaLibra will not share account information or financial data with Facebook Inc. or any other third party without the customer's consent (...) account information or financial data of CaLibra customers will not be used to improve the targeting of advertising on Facebook's product line".

Collaboration and innovation with the financial sector (especially with of regulators and experts from various sectors) is the only way to ensure that this new system is based on a durable, secure and reliable framework. This can also lead to a a real step towards a low-cost, more accessible and more connected global financial system.

For too many people today, parts of the financial system still look like the telecommunications' networks before the introduction of the Internet. 1.7 billion adults worldwide have limited or no access to financial services, despite the fact that they need them and that most of them have a mobile phone [11]. Their hard-earned income is also often eaten up by high fees, ranging from the cost of bank transfers to overdraft and ATM fees.

These lie primarily in politics, which is more than critical on both sides of the Atlantic. Obviously, any risks such as money laundering are rated higher than the chance to make payment transactions cheaper, faster and simpler. It has become a Facebook size that makes politicians shudder before such a far-reaching experiment. The technology company is one of the most valuable corporations in the world in terms of market capitalization. It can invest billions in the project and, thanks to its 2.3 billion customers, very quickly push the new currency and applications into the market [12].

The Californian Internet group has found the "Libra Association" in Geneva. The non-profit association is to take care of the further development of the simple, global crypto currency and the directly related transaction system, as initially outlined in a so-called white paper. The Association currently has 28 representatives from payment, technology, telecommunications, blockchain, venture capital and not-for-profit companies, and the number of equal members is expected to rise to 100 in the coming months. Facebook itself is represented by the newly found subsidiary Calibra [13].

The Libra transactions are registered in a so-called blockchain³. This refers to database systems that are accessible worldwide and are generally considered to be cost-effective and secure. Up to now, these have not been able to establish themselves; they are unable to handle the transaction volumes arising in the respective technical specifications in the necessary time and because the associated currencies were often extremely unstable in terms of value. The Libra blockchain should change that.

The Libra blockchain is based on an own programming language called Move and is supposed to be further developed publicly. Among other things, this offers the possibility of operating with so-called Smart Contracts [14].

Advantage

While in developed countries exists the advantage of having a reliable and efficient banking system, this is not the case for 1.7 billion people worldwide, 60% of whom is women who are directly penalized by a lack of easy banking contacts or a total lack of relations with a solid and reliable banking institution. It is to these people that the Libra directly addresses itself. To buy or sell an asset, transfer money to a trader or receive money from pockets living in a foreign country, they only need to have this electronic wallet, denominated in free text, on their mobile phone. China, through its *WeChat* platform,

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³ There are numerous varieties of block chains. Initially, Libra's plan is that only selected institutions and partners will operate and monitor the block chain. It's called a "permissioned chain." Over the years, the association aims to ensure that at some point in the future everyone will be able to contribute to the maintenance of the network. This means "permissionless". The Libra block chain is based on an own programming language called Move and is supposed to be further developed publicly. Among other things, this offers the possibility of operating with so-called Smart Contracts.

already has such a platform at the national level, used by hundreds of millions of people. On a global level, a payment platform was developed by Facebook engineers. This has given rise to the new digital currency Libra and to transfer technology with a blockchain open to all – as open source since June 18, 2019.

Libra's risks

As soon as the launch of Libra was announced on 18 June 2019, governments and even central banks pointed to the risk of this cryptocurrency, which could be used, without usual control, for money laundering or terrorism financing. For weeks now, they have been discussing with the competent authorities on both sides of the Atlantic to explain and demonstrate that the IT platform is - and will be - equipped with firewalls that will prevent criminal organizations from using our payment system to circumvent international regulations [15].

So far the world has accommodated this; but everything shows that this situation is becoming more and more untenable and dangerous for the global economy. The main risk comes from emerging countries: the incessant fluctuations in the dollar have a direct impact on their financial stability and in particular on their debt... in dollars. The weight of the latter increases disproportionately and makes imports from these same countries more expensive. The current tensions are all the more acute as US monetary policy tends to strengthen the value of the dollar and as a devastating trade war rages with China.

For central banks, the dominant dogma has always been: everyone puts their house in order and everything is fine. The omnipotence of the dollar and the systemic risk it represents are now making them sweaty. It is urgent that they cooperate better and seek an alternative to the "all-dollar" as the ink of the monetary system.

The Libra should establish itself as the first purely digital "world currency" ever and, together with the technology on which it is based, make the lives of billions of people easier. That sounds extremely sophisticated and almost like a fairy tale - but what is it about?

Criticism

From France to Donald Trump and the Bank for International Settlements criticism of Facebook's initiative is strong; all see it as an attack by the GAFAs on the sovereign prerogatives of a state. The fears raised by the various governments and their financial regulatory bodies are totally legitimate. "The G7 believes that no global cryptography project should start until legal and regulatory risks are properly addressed," Libra is a real danger to the Swiss Franc.

The Internet change not the world of money

Due to the Internet and modern communication possibilities, one practically only needs a cheap smartphone to obtain information, to exchange news almost free of charge or to sweeten one's everyday life by using all kinds of cheap, high-quality services. Technology companies have done a great job by making it easier and cheaper for consumers to access traditional goods and services or by introducing new ones.

Basically, it is about creating a new infrastructure and ecosystem in the financial sector - the "Internet of Money" [16]. Ideally, this should ensure that consumers and investors will in future be able to move money from one device or account to another; cheaply, easily and quickly as is possible today with an *e-mail* or *SMS* message - only safer.

In the future, anyone who uses an application from Calibra should no longer have to wait for days until a transmission to the other end of the world has been carried out, but should instead be able to do so practically at the moment.

Open source

The whole thing is an open source development project. This means that it is far from over. A large part of the future value is to be created within the network - always depending on the benefit and responsibility of the participants. As a first step, the association provides a preliminary version of the code for the Libra blockchain as open source under an Apache 2.0 license.

Facebook's Libra Blockchain will be built on open source code that allows the developer and research community to monitor it for design and security flaws, and the company will implement a "bug bounty" program to incentivise security experts to point out vulnerabilities in the platform [17].

Prevent money laundering and fraud

There are a number of privacy concerns regarding a financial app run by Facebook. The company said it will implement technologies to prevent money laundering and fraud.

Libra will be sustained through a small charge per transaction on the blockchain, Facebook said. Many of these charges will be transferred to vendors who can then absorb the costs themselves or relay them to users [18].

Domicile of notification

An important question concerns all the - increasingly frequent - disputes that Swiss litigants have with these platforms. The Council of States also accepted a motion that requires them to have a "domicile of notification" to strengthen the application of the law on the Internet. The National Council has already accepted it, and the Federal Council should act quickly. This will also apply to financial litigation. Where will the Swiss go to complain if their money is misappropriated on Facebook or if a breakdown deletes their account?

We need a new monetary system

The dollar has become the enemy of financial stability. Not that there is any fear of its decline or weakness; on the contrary, the greenback is too dominant. It has even become an absolute safe haven - its status is close to that of gold. Never since the great crisis of 1929 has the dollar been so powerful. While the volume of international trade has doubled, nearly 50% of trade is denominated in dollars. This is five times more than the share of US imports. Two thirds of all central banks' foreign exchange reserves are now in dollars and two thirds of insurance contracts have their rate for reference.

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