



## BitMinutes Ltd

*Global Financial Inclusion using  
Prepaid Minutes Denominated as Country Stablecoins  
Powering Free Global Value Transfer,  
Efficient Digital Payments and  
Guaranteed Micro-Lending*

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# BITMINUTES Ltd

## THE Global Financial Inclusion Solution

### Executive Summary

**BitMinutes Ltd (BMB)** is being established in Bermuda to create stablecoin eCurrencies in emerging markets worldwide. BMB will take forward the P2P Cash/BitMinutes platforms focused on mobile enabled remittances, payments, micro loans, telecom top-ups, discounted goods and services and advertising across these markets, creating the strongest multiple use platforms focused on serving un- and underbanked populations globally.

#### Background

BMB is acquiring all of the assets and IP of the P2P Cash/BitMinutes group of companies in asset purchases and share for share exchanges. This new offshore reorganization will provide the sophisticated and flexible regulatory structure for digital technologies as well as the tax advantages of the Bermuda jurisdiction to BMB, and become the nexus for support of BMB joint ventures worldwide taking forward the P2P/BitMinutes token-based payments technologies which are already integrated into 13 countries worldwide already with the capability of serving over 2 billion people.

#### Stablecoin Joint Venture Approach

BMB joint ventures will advance 'Country' stablecoin BitMinutes ("Country BMT"), focused on creating 'eQuetzals' in Guatemala, 'ePesos' in the Philippines, digital currencies which will be readily accepted and used by local populations in every country as the Country BMT will be pegged 1:1 to local currencies (or 1:10 where currency values are very low) so the Country BMT will be easily understood, accepted and used. Country BMT will be exchangeable into Country BMT in other countries through BMB's proprietary 'atomic swap' technology allowing eCurrency exchange in real time and with low FX cost. BMB will not be providing a volatile unable-to-be-valued "Bitcoin" in these markets, nor trying to create a global digital currency similar to the ill-conceived 'Libra' initiative. BMB will simply be providing a mobile enabled, easily understood and used eCurrency that makes use of 'cash' more efficient in real time, often at near zero cost (i.e. domestic money transfers among individuals will be free).

#### Remittance Platform / Revenue

BMB is negotiating the use of a national bank license in the United States which will allow BMB to make global remittances from all fifty US states. Remittances from the US aggregate over \$150 billion, the largest flow of any single corridor worldwide, creating a revenue opportunity of \$1.5 billion of which BMB will gain appreciable market share with its 'free money transfer' capability, an approach which takes only up to 1% from the FX spread when nearly all other remittance platforms take both fees and a portion of the FX spread.

The BMB mobile platforms will encourage the use of BMB for remittances, not only because of the 'free money transfer' value, but also because of the use of the Country BMT that will be received i.e. the ability of Country BMT to be used for additional completely free transfers by individuals in-country, for payments in-country, for qualification for micro loans, and for purchase of discounted goods and services – creating a BMT 'ecosystem' providing capability for 'targeted' remittances, data for advertising, and the freedom from the risks, costs and delays of using cash by the un- and underbanked.

### **Payments Platform / Revenue**

BMB fully expects its Country BMT to be rapidly adopted for payments in-country with retail partners. Revenue potential from payments is considerable. M-Pesa, the highly successful mobile enabled platform made so famous in Kenya, accounts for about 50% of the 'monetary transaction' market in Kenya which is estimated to be about 50% of GDP. A similar market, in Guatemala, for example, would have the monetary transaction market equal to nearly \$50 billion, of which a 50% market share indicates payments revenue potential in Guatemala of up to \$250 million at a 1% fee level, or \$50 million for each 10% of market share. This fee level is well below credit card fees, and low enough to encourage retailers to accept Country BMT for payments.

### **Micro Loan Platform / Revenue**

Participants in the BMB BitMinutes ecosystem will also be offered micro loans, with credit profiles created from individual participation in the BitMinutes ecosystem, gained from knowledge of levels of remittances and payments, as well as loan repayments. The micro loan market is also significant, and largely ignored by financial institutions as too costly to service. The potential is large, as only \$50 nano loan amounts provided to 10% of the 'eligible' population in, say, Guatemala, would generate about \$30 million in interest revenue. AI data analysis will allow for credit management of loan write-off risk and the growth of larger credits leading to lower interest rates measured against current market offerings.

### **Additional Revenue**

BMB expects that when a large enough user base is created in each country JV, discounted goods and services will be able to be successfully marketed to the BitMinutes users which will also create a market which advertisers will wish to access. BMB is negotiating a global retailer aggregation venture to permit Country BMTs to be used to purchase name brand goods and services.

### **Trusted Agent Networks**

BMB creates Trusted Agent Networks (TANs) by forming JVs with leading telecom carriers, banks, local investors and strong distribution partners including retail chains (pharmacies, gas stations, construction materials outlets, ATM outlets) globally. In addition, individual TAN Agents are recruited and trained to broaden country coverage and provide widespread cash in and cash out services. TAN provides these services for both smart and 'dumb' mobile phones, the latter operating solely through text messages and instructions. An optional SIM/MasterCard is being negotiated with our US bank partner.

### **Joint Venture Development(s)**

In Guatemala, BMB has developed projections with achievable market shares in remittances, payments and micro loans indicating revenue potential of \$50 to \$100 million within three years. Properly partnered, other country JVs can achieve similar results. BMB has targeted or is already in discussions for JVs in other LatAm countries including Mexico, El Salvador, Honduras, Columbia, Chile and Argentina. In Asia, BMB is in discussions in the Philippines, India and Azerbaijan. In Africa, BMB is in discussion with a major telecom group with operations in multiple countries. Another discussion is underway with the world's largest clearing and settlement network for telecom carriers.

The JV approach anticipates an initial 50/50 ownership with in-country investors providing capital, and when the JV organization and initial fundraising is complete (targeted at an initial \$5 million per JV except in the largest countries) additional funding will be raised to create reserves for micro lending and additional capital for operations. If BMB establishes JVs in the 13 countries where integration is already established for remittance payments, the available remittance market from the US alone will aggregate nearly \$80 billion, the payments market will be up to \$3 trillion, with 10% market share achievable (M-Pesa is at 50%), and the micro loan market at a 10% of the 'eligible' population level, will aggregate of over 140 million potential borrowers.

## Introduction

*“For entrepreneurs in developing countries, the idea of securing a loan to start a business is not just difficult, it’s next to impossible. This stark reality is faced by entrepreneurs in developing countries every day.”*

–Morgan Stanley, Micro Finance in Developing Worlds

### WHAT ARE BITMINUTES?

P2P Cash Technology invented BitMinutes, a unique solution to address the special needs of the underbanked by combining tokenization technology and prepaid phone minutes (or “airtime”). BitMinutes are a global standard compatible with every major prepaid mobile phone carrier. Carrier prepaid phone minutes are often transferred and traded between users within a single carrier. BitMinutes creates global interoperability between carriers allowing the transfer monetary value at minimal cost.

BitMinutes has created both Country BMTs and Global BMTs.

Country BMTs are “stablecoins”, pegged to the fiat currency in each respective country where BitMinutes launches, facilitating easy understanding of the value and use of Country BMTs by the population in each country. Country BMTs will have fiat reserves backing them so they will be easily exchangeable into the local fiat currency.

Global BMTs are available for any purchasers but cannot be used in-country, i.e. they must be exchanged for Country BMTs to purchase pre-paid phone time, initiate remittances, make payments, re-pay micro loans, etc. Global BMTs will only be exchangeable into Country BMTs through a portal managed by BitMinutes (Bermuda) (BMB). BMB is taking steps to create a ‘base’ value for Global BMT, as well as manage the future issuance of Global BMT to create a stable or increasing price for Global BMT. Currently BMB is providing Global BMT at \$0.025 per Global BMT.

Global BMT tokens are based on Ethereum’s [ERC20 Token Standard](#). Global BMTs have the attributes of other ‘crypto currencies’ where the value is set by a trading market. Global BMTs are NOT stablecoins as are Country BMTs. However, Country BMTs may be converted into Global BMTs, giving Country BMT holders access to a ‘digital’ currency more cheaply and more quickly than is available for other ‘crypto’ currencies. BMB expects that, in time, Global BMTs will provide the same or better store of value and investment prospects as Bitcoin and other crypto currencies, readily traded on traditional and new digital currency exchanges. In addition, through conversion, Global BMTs have the same access to free global value transfer and prepaid airtime top-ups as Country BMT stablecoins. Both Country BMT and Global BMT are usable on approximately 4 billion prepaid mobile phones in 130 countries and bank accounts in ~80 contracted countries. Country and Global BMTs enable frictionless movement of money and minutes across global financial networks, mobile network carriers and emerging DLTs and blockchains.

BitMinutes will have global societal impact, potentially affecting over two billion underbanked adults worldwide. The overwhelming majority are financially disenfranchised women who lack job opportunities in their rural communities and are burdened by the demands of caring for their families. The wide-reaching accessibility of

BitMinutes and the socially oriented low-cost financial services BitMinutes enables, can improve the lives of men, and especially women, on a global scale.

### Financial Services Use Cases

The underlying BitMinutes protocol permits access to lending, payments and prepaid airtime capabilities across global third-party retail agent, mobile wallet and banking systems. Several third-party applications are in the process of using BitMinutes as follows:

- BitMinutes are currently integrated with a series of global disbursements networks including Mastercard. This permits Global BMTs to be converted to cash by third-party exchanges and directly deposited into bank accounts and mWallets, as well as cashed out via the Trusted Agent Network (TAN).
- BitMinutes can be leveraged as collateral for loans, increasing the spending power and amount of working capital available for borrowers.
- The payments and usage history become big data and will be utilized by a BitMinutes AI engine to calculate a proprietary “TAN Credit Score” algorithm for use in micro-lending.
- Lending BMT-based microloans creates a business opportunity for entrepreneurs globally; turning the corner retailer into the corner banker and delivering banking services to the smallest of villages worldwide.

### BitMinutes Technology

BitMinutes leverages digital ledger technology (DLT) to track and evaluate user data for extending credit, transferring value, making purchases and using airtime.

BMTs provide auditability and government monitoring. BitMinutes meets and/or exceeds international payment security and Anti-Money Laundering (AML) standards. BitMinutes can meet Know Your Customer (KYC) requirements through an ISO 20022 standardized format of retrieving and storing identity information of financial transaction participants. Every BitMinutes transaction settles in real time with an immutable record of the transaction using digital ledger technology.

Built originally to comply with traditional settlement networks, BMTs are “The Bridge” between the traditional settlement world and the new, emerging DLT and blockchain world.

### Summary

BMTs solve major hurdles in providing financial services to the underbanked. The BitMinutes model creates readily understood and accepted stablecoins in every country where BitMinutes launches, bringing valuable eCurrency benefits, including liquidity to a major global asset class of prepaid minutes, lowering the costs of international remittances, establishing credit histories for the global unbanked, and facilitating payments without cash or credit cards.

# Global Consumer Financial Problems



## PRIMARY TARGET MARKET - 2 Billion Underbanked Consumers

### Background

- There are over two billion underbanked consumers, a majority with mobile phones
- Total global consumer demand for credit is a \$42+ trillion market, and growing
- The global person-to-person cross border remittance market is almost \$700+ billion
- Prepaid mobile minutes constitute another \$650+ billion global market, spread among 300+ phone carriers

Current financial services simply are not affordable for low-income users, especially in the developing world. Other barriers include distance from a financial services provider, lack of proper documentation and lack of trust in financial services providers. In turn, banks typically decline to offer solutions to these individuals, citing risks related to lack of consumer collateral, credit history and low profitability. Compounding the problem, the most vulnerable individuals are the most financially excluded, especially women and the rural poor.

The current global banking system is failing these two billion potential customers. Without formal banking relationships or bill payment history, the underbanked have little, if any, access to credit. To build a financial footprint, an electronic monitoring and evaluation system must be in place which is lacking across much of the developing world.

BMTs, based on international bank standards, simply leverage prepaid minutes already used as a virtual currency, to create unique financial capabilities for third parties. Specifically, Global BMT tokens can be transferred between any two cellphones worldwide at zero cost (barring text message data rates). Similarly, Country BMTs can be transferred at zero cost within their own country markets and can be converted through Global BMTs into Country BMTs in other markets.

The following summarizes the financial issues unbanked consumers face and how third parties can use BMTs to solve and address these challenges.

### Problem - Lack of Credit

Since 2011, new technologies, innovative business models and ambitious government reforms have combined to cut the ranks of unbanked adults by about a fifth, or 500 million. Yet two billion adults, or 38% of all adults worldwide, remain excluded from the financial system today.

**Geographic View:** The vast majority of underbanked adults live in developing economies, where 46% of adults are unbanked, compared with just 6% of adults in high-income OECD economies. South Asia, East Asia and the Pacific are home to more than half the world's unbanked. In South Asia, about 625 million adults lack access to a banking account; in East Asia and the Pacific, about 490 million. Indeed, just three Asian countries—India, China, and



Indonesia—together account for almost 40% of unbanked adults globally. Sub-Saharan Africa, with about 350 million unbanked adults, accounts for 17% of the global total.

**Demographic View:** The unbanked are poor and disproportionately female. While global growth in account ownership has been impressive, notable gaps persist between some groups. There are striking differences by gender. Worldwide, 42% of women are unbanked, compared with 35% of men - a gender gap of seven percentage points, just as in 2011. In the developing world, the gap reaches nine percentage points - also relatively unchanged. But it varies widely across regions, ranging from 18 percentage points in South Asia to four percentage points in East Asia and the Pacific. Overall, women make up 55% of the world's unbanked population. Differences also emerge by household income. The poorest 40% of households account for about half the world's unbanked - about 1 billion adults. Since 2011, the average gap in account penetration between adults in the poorest 40% of households and those in the richest 60% in developing economies has narrowed by six percentage points - to 14 percentage points. But this change was driven almost entirely by growth in account ownership among the poor in East Asia and the Pacific; in all other regions, the gap remained about the same.

Source: [World Bank](#)

Without formal banking relationships or bill payment history, the unbanked have little, if any, access to credit. To build a financial footprint, an electronic monitoring and evaluation system must be in place; however, it is lacking across much of the developing world. Since prepaid minutes are routinely used as a "grey market" virtual currency, BitMinutes solves these issues and BMTs are positioned to serve a consumer market already primed for BitMinutes.

### **Solution - New Digital Credit**

Third parties can convert BMTs prepaid minutes value into "Instant Digital Credit" to pay bills, purchase goods and services online, and/or for direct deposit to bank or mobile accounts. For instance, when used to fund a prepaid Mastercard, BMTs could be used to purchase goods and services online and anywhere Mastercard is accepted.

[M-Pesa](#) created a payments standard within Kenya accounting for over 50% of the entire country's GDP. BitMinutes, leveraging ISO banking standards, has created a similar global model providing a digital means to get credit, pay bills and make purchases online through third-party applications.

### **Problem - Lack of Financial Service Providers**

Globally, there are millions of small retailers selling everyday items to billions of consumers. We believe these retailers are the perfect candidates to provide widespread banking services to their captive customers. M-Pesa's success in Kenya was based on the efforts of its 30,000+ retailers and an originally unregulated payment system.

BitMinutes, in conjunction with its marketing partners, offers a similar opportunity for entrepreneurs (individuals and micro-merchants) and businesses (telecoms, banks, retailers) to enable widespread service distribution. This becomes a next generation financial services ecosystem that can be powered by BMT technology.

### **Solution - A New Entrepreneurial Opportunity - The Trusted Agent Network (TAN)**

Through third- party solutions, retailers and any entrepreneur can buy, sell and make loans based on BitMinutes. BMT technology enables the corner retailer to become the corner banker, increasing their revenues with new

financial services while providing a valuable service to their local community. Via the third-party Trusted Agent Network (TAN) retailer application, the retailer mobile wallet and mobile applications are part of the platform offering to strategic partners, such as entrepreneurs and businesses. The TAN can service smart phones. Importantly, the TAN can also service dumb phones, giving the poorest users the access to the BMT ecosystem.

### **Problem - Expensive Money Transfer**

Cash transfers are expensive (with fees ranging from 5% to 20%), increasingly scrutinized by governments, and very difficult to deliver to the typically underbanked recipient, especially in rural areas. With a strong mobile phone presence in most countries, cash can now be sent directly to the recipient's cellphone into a mobile wallet (or mWallet), and mWallets are now becoming more common in developing countries and even in de facto form for value exchange, i.e. Alipay and WeChat in China

### **Solution - FREE Money Transfer**

Though BMTs are simply prepaid minutes, third parties may use BMTs to offer consumers the ability to effectively send cash between cellphones instantly at no cost to the consumer. Again, the BMT/TAN ecosystem allows ALL mobile users, with smart and dumb phones, to send money for free, through the BMT App or through a text message with a TAN Agent.

### **Problem - Mobile Money Adoption**

Imagine a bank that would allow its depositors to use cash that was only valid at their bank and no other bank. While there is currently a global "Gold Rush" to provide financial services to billions of unbanked mobile phone users that is exactly what these new mobile wallet (mWallet) platforms are doing. They do not communicate with each other. This is done by design to lock the user into the respective system provided by the bank/telecom partnership (the "walled garden" approach). Consequently, conversion of value and management of services between these systems is problematic at best and impossible in most cases. Similarly, incompatible wireless networks combined with high transaction processing fees strongly discourage mWallet adoption in general.

In order for widespread adoption of mWallets, it must be as easy to lend or transfer value between entities (merchants, consumers, etc.) using a cellphone as it is today with cash. Through third-party applications, BitMinutes provides this solution.

### **Solution - Mobile Value Powered By BMTs**

The BitMinutes model solves the easy adoption issue by providing a widespread, consistent retailer platform for financial services distribution. Thus, third-party applications can make loans, transfer minutes and make simple withdrawals/deposits as easy for consumers as using an ATM in the developed world.

## BitMinutes - *The Global Financial Inclusion Solution*

### BitMinutes Create the Prepaid Minute Economy

BitMinutes enable airtime to be shared between subscribers on different telecommunications networks. Using third-party apps, subscribers can buy and sell their airtime through their mobile app. Once subscribers buy or receive BitMinutes, they can redeem their BitMinutes for use as airtime on demand. BMTs' proprietary Smart Token architecture permits interoperability between carriers the same way it can facilitate transfers between networks like SWIFT, Mastercard, Ripple and Ethereum.

Today, BitMinutes has the capability to provide phone minute top-ups to four billion prepaid mobile phones worldwide. Through partnerships with leading airtime vendor aggregators, BitMinutes integrates directly into their network ecosystem, providing a seamless airtime top-up experience. The recipient of the airtime top-up does not need to have a compatible mobile wallet. The airtime is sent directly to their subscriber number and immediately credited to their prepaid account.

### Mobile Operator Problem: Losing the Underbanked Battle to Banks

Although BMTs ultimately benefit the consumer, BMTs also benefit Mobile Network Operators (MNOs) and their entire distribution chain, including the network of retailers who sell prepaid minutes.

Many carriers provide prepaid minutes transfer infrastructure and/or mobile wallet services, but consumer uptake has been lacking. Carriers have a consumer's prepaid minutes purchase history, but lack the experience, capabilities and ability to issue forms of digital credit. Furthermore, banks have erected regulatory hurdles that prevent carriers from leveraging their extensive distribution networks.

### Mobile Operator Solution: Leverage National Retailer Footprint

BitMinutes can be converted to virtually any major prepaid MNO minutes that already have large networks of agents who sell those MNO prepaid minutes. BitMinutes convertibility means that every MNO reseller will be able to receive compensation over their existing electronic clearing networks for lending, selling and redeeming BMTs. This clearing compatibility means the major MNO resellers will be eligible for, and with the proper financial incentives, interested in becoming a TAN Agent. For those countries and MNOs without a digital distribution network, the BitMinutes and TAN mobile applications can provide that infrastructure.

BitMinutes is already integrated with a global aggregator of over 300 MNOs that service over four billion mobile phones today.

# BitMinutes Use Case Analysis

## Total Addressable Market Analysis

BMTs provide liquidity and therefore increase fluidity, velocity of money and use of value in several large global markets. The estimated size of each of the four markets that BitMinutes enables third-parties to address are outlined below:



### Global Consumer Lending Market - \$40+ Trillion

There is an insatiable demand for credit globally and especially in the developing world. For example, Kiva has generated over \$1 billion in loans to millions of people in over 80 countries. The Wall Street Journal noted China recently reached a milestone in matching the U.S. and EU in consumer debt to income ratios of 234%. This portends growing demand for credit as other developing countries catch up to the middle-class growth in China.



### Global Value Transfer: \$680+ Billion

The World Bank estimates that \$715 billion will be transferred person-to-person globally across national borders this year, \$550 billion to developing nations



### Prepaid Minutes Market: \$650+ Billion

The telecom industry association, GSMA, estimates that consumers spend over \$650 billion yearly on prepaid minutes. The average user consumes approximately \$10 of prepaid time monthly or \$120 annually.



### Digital/Cryptocurrency Demand: \$200+ Billion

Currently, there is approximately \$200 billion of market value in digital/cryptocurrencies, according to Coinmarketcap.com. Bitcoin accounts for the largest percentage at about \$150 billion.

# BANKING THE UNBANKED

Financial inclusion is a key driver in tackling poverty and boosting economic growth. Yet a staggering two billion adults across the world still do not regularly use a bank account or have access to a financial institution via a mobile device. Here is the latest data on financial inclusion, which shows a large disparity between different countries worldwide

## WHERE THE UNBANKED LIVE

PERCENTAGE OF PEOPLE AGED 15 AND OVER WITH AN ACCOUNT AT A FINANCIAL INSTITUTION

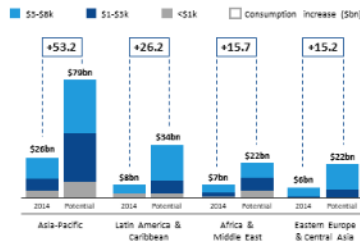


## \$380BN OPPORTUNITY FOR BANKS IN EMERGING MARKETS

Estimated financial services consumption increase through full banking penetration and increased utilization by adult population

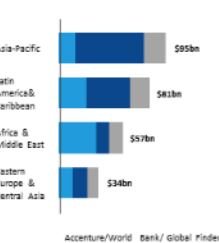
### PERSONAL BANKING

Income band of adults (per annum)



### MICRO AND SMALL BUSINESS BANKING

Formal small business lending, Formal micro & informal small business lending, Potential for revenue



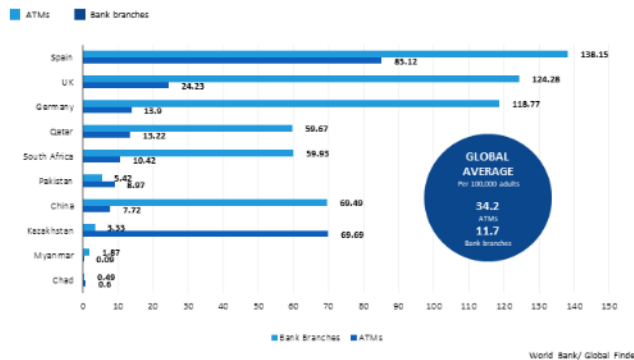
## BANKED PERCENTAGE OF POPULATION

TOP AND BOTTOM TEN FROM MORE THAN 160 COUNTRIES WITH AVAILABLE DATA

TOP 10		
01 Norway	100%	
02 Finland	100%	
03 Denmark	100%	
04 Sweden	99.7%	
05 New Zealand	99.5%	
06 Netherlands	99.3%	
07 Canada	99.1%	
08 UK	98.9%	
09 Australia	98.8%	
10 Germany	98.7%	
BOTTOM 10		
01 Turkmenistan	1.8%	
02 Niger	3.5%	
03 Madagascar	5.7%	
04 Guinea	6.2%	
05 Republic of Yemen	6.5%	
06 Burundi	6.9%	
07 Chad	7.7%	
08 Somalia	7.9%	
09 Pakistan	8.7%	
10 Afghanistan	9.9%	

## COMMERCIAL BANK BRANCHES AND ATMs PER 100,000 ADULTS

MOST PERCENT DATA AVAILABLE FOR SELECTED COUNTRIES



Global Index, World Bank

## Use of Proceeds - Country JV Approach

The BitMinutes JV prototype is a \$5M investment. Larger countries require more capital, so a given Country BMT spreadsheet analysis may vary. BitMinutes will offer low-cost loans through third-party lenders to fund consumer loans to the underbanked; consequently, lending capital is the single largest use of funds. Using that target amount, the budget breaks down into the following.



### Lending Capital - 30%

This initial lending capital, plus additional capital from in-country partners and raised by BMT country JVs, will enable loans as small as \$5. The average loan amount may be higher, but we want to be prepared by allocating initial capital to support lending. \$1.5M provides 300,000 \$5 micro-loans.



### Marketing - 20%

Marketing will be primarily spent on developing consumer awareness of the products offered by our third-party developers and distribution partners. This will entail a combination of social marketing including digital media where appropriate, plus retail banners and flyers to support the Trusted Agent Network brand and co-branded retail partners.



### Operations - 20%

Operations include salaries of the BitMinutes team and the costs of setting up operations in foreign countries. BMT development is complete and securely hosted in the Amazon Cloud, reducing implementation costs. In-country partners and BMT country JVs reduces the need for setting up foreign offices.



### Treasury & Growth Capital - 30%

The Company will retain capital in Treasury to accommodate Country BMT redemptions and to increase lending capital through selected Security Token Offerings (STOs) to raise funds for the larger markets where BitMinutes launches. Reserves for in-country stable coins will be acquired and maintained in country JVs.

## Smart Token Technology

### Smart Token Technology Powers BitMinutes

BitMinutes are based on proprietary Smart Token technology designed to operate over both traditional (i.e. SWIFT, Mastercard) and DLT and blockchain networks (i.e. Ethereum, Ripple). The BMTs issued to senders are customized with the sender's unique identifier (UID) to prevent fraud and money laundering. Unique BMTs are issued and sent to the recipient's country's clearing data base, converted to Country BMTs at the locked in FX rate at issuance, and deposited into the recipient's mobile wallet evidenced by a text message, email and/or via smartphone app.

Global and Country BMTs provide auditability and government monitoring. BitMinutes, when used in lending, payments, transferred into cash or leveraged for prepaid airtime, meet and/or exceed international payment security and AML standards. Smart Tokens accomplish KYC requirements through an ISO 20022 standardized format of retrieving and storing identity information of financial transaction participants.

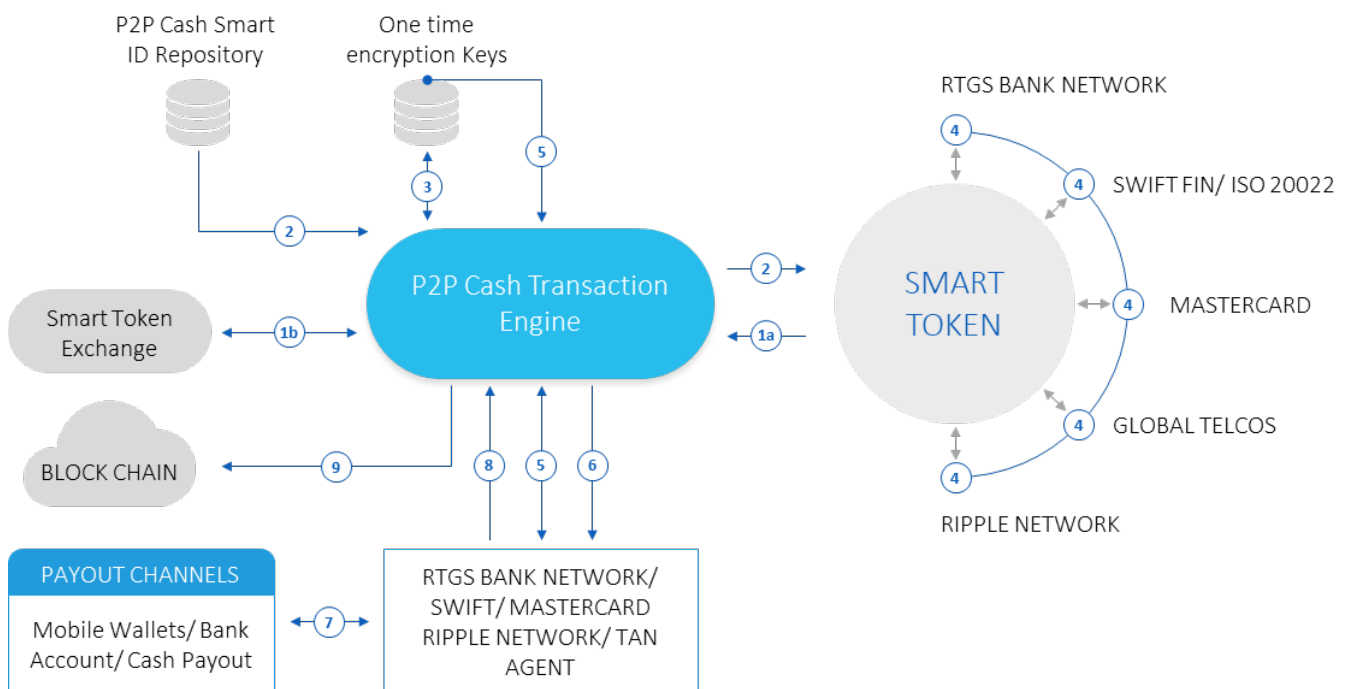
Based on ISO standards, BMTs have additional data fields to add biometric information and smart contract business logic. This allows BMT usage to be restricted based upon any number of variables, for example: country of redemption, the recipient's carrier, a designated use of the BMT (for food or construction materials) and/or the mWallet configuration.

Built originally to comply with traditional settlement networks, BMTs are "The Bridge" between the traditional settlement world and the new, emerging DLT and blockchain world, starting with Ripple and now Ethereum.

Smart Token Chain developed Smart Token technology as the core to its payments engine, switching capabilities and identity management. Therefore, Smart Tokens are the underlying technology driving the remittance platform for BMTs and providing interoperability between global settlement networks. Through the use of Smart Tokens, value can be exchanged across public ledgers while keeping the transaction information private between sender and receiver. In addition to interoperability between Ripple and Ethereum, Smart Tokens have integrated with existing traditional global settlement networks like SWIFT and Mastercard's HomeSend.

Smart Token technology combines smart contracts, tokenization and DLT and blockchain to unify financial services, establishing a common global standard for extending credit and exchanging value, based on global banking standard ISO 20022. By leveraging Smart Token technology, BMTs create mobile banking interoperability for telco carriers much like Ripple's XRP Tokens create interoperability between banks. For more technical details and flowcharts, please refer to Appendix C.

## Operations



Currently, the Smart Token technology behind BMTs facilitates cross-border money transfers across the global P2P Cash money transfer network and has been leveraged in Mexico for settling U.S. to Mexico foreign exchange transactions over the Ripple network. Under this model, transactions settle in real time with an option for an immutable copy of the transaction to be embedded on several DLT and blockchain networks. Additionally, P2P Cash has operated over the past few years through a joint venture with the largest retail bank by number of accounts in Africa, Equity Bank. The global P2P Cash ecosystem is available to promote and distribute BitMinutes.

## Client Service Operations



### Client Service Center

The BMT Client Service Center is available 9am - 9pm EST. As we strive to meet the needs of our clients, we understand it is vital to communicate in their native language wherever they are around the world. Client Account Representatives are fluent in English and Spanish and additional language capability will be brought on as relevant JVs are negotiated.



### Client Service Chat

Clients who need immediate assistance are encouraged to chat with live agents in English on our site. Live agents are available to assist with questions and provide assistance with activities related to creating their wallet, account access, the purchase of BMTs or general account information.



### Client Service Support

Clients needing assistance outside our Client Service Center regular business hours of 9am - 9pm EST that do not require immediate assistance are encouraged to send email messages to [support@bitminutes.com](mailto:support@bitminutes.com). Inquiries are handled within 24 business hours.



### Client Escalations

All client escalated issues are routed to the Director of Customer Support for immediate attention and resolution.





## Company Leadership

### Management Team



#### *Thomas Meredith - Chairman and Chief Executive Officer*

Mr. Meredith has significant internet, financial services and telecommunications experience. He started his computer career with Digital Equipment Corporation when the first 32-bit architecture was introduced. He was a part of the original team at Franklin Computers, the first Apple clone manufacturer, and managed over 800 retailers in 11 western U.S. states. Additionally, he was the Federal Systems Director for Lisp Machine, a leading artificial intelligence company.

Mr. Meredith founded VoxLink and led the company for seven years to become a leading innovator for voicemail and email integration. He founded one of the first online gaming companies, Internet Gaming, which was responsible for processing the first significant volume of credit cards internationally on the Internet. Additionally, Mr. Meredith has years of experience consulting the financial services industry, primarily in automation of mortgage and credit/debit card processing.

Mr. Meredith is a graduate of the Harvard Business School, specializing in Entrepreneurial Studies, and Stanford University where he received an Engineering degree in three years on an Academic Scholarship. He has a working knowledge of French and Spanish.

#### *Alex Perwich - Chief Operations Officer*

Mr. Perwich is a seasoned leader, change agent and entrepreneur with a unique and exemplary record of leadership, excellence, innovation and success in the entrepreneurial, corporate, nonprofit, and military sectors. West Point and Harvard Business school educated, Mr. Perwich most recently was President of Enactus USA and is especially adept at mentoring, coaching and teaching individuals and groups; building, repairing, aligning and accelerating organizations; creating and implementing vision and strategy; and, leading diverse teams. Mr. Perwich quickly finds “true north” in challenging, uncertain and/or resource constrained environments and quickly establishes organizational integrity, alignment and success across the enterprise.

#### *Peter Krause - Chief Technology Officer*

Mr. Krause has over 25 years of programming experience, from several startups to big tech firms such as Intel, AT&T, and IBM. His programming areas of expertise include client-server back-end development in industries such as fintech, international telephone systems, communications, healthcare, and e-commerce. Mr. Krause's management experience spans several CTO positions, as well as coordinating engineering projects requiring programming teams from several companies. He holds a BS in Electrical Engineering from Rensselaer Polytechnic Institute.

### ***Kern Lewis - Head of Marketing***

Mr. Lewis is a veteran marketing professional with 25 years of experience in financial services. Prior to joining BitMinutes/P2P, he spent eight years directing marketing programs for World Savings and CMG Mortgage. At World Savings, he led efforts that doubled customer retention rates during the refinancing boom. At CMG he directed the introduction of the Home Ownership Accelerator loan product. To support the product launch, he led recruitment efforts that attracted and trained over 10,000 loan agents in a two-year period.

Mr. Lewis began his career with American Express in their merchant services division, tasked with deepening merchant acceptance by attracting new merchants and developing programs to retain and expand existing merchant relationships. He left AmEx to manage credit card marketing for Great Western Bank before dedicating two years to serve as a business educator and small business advisor in Ukraine and Albania with the United States Peace Corps. Mr. Lewis earned an MBA from Harvard Graduate School of Business and a BA in Economics from Stanford University.

### ***Donald Chapman - Head of Global Business Development***

Mr. Chapman is a financial services technology and payments professional with almost 20 years of professional experience deploying technology and building businesses. Prior to joining BitMinutes/P2P he helped establish and launch a real-time domestic US and global payments network for Fidelity National Information Services (NYSE: FIS), the largest global FinTech provider. He also spent eight years in corporate consulting, working with clients like Prudential Financial, Discovery Communications, Wyeth Pharmaceuticals and Ocean Spray Cranberries.

Mr. Chapman graduated from Providence College where he was a NCAA Division 1 lacrosse player and member of the Dean's List. He earned his MBA with an Investments concentration from Babson College's F.W. Olin School of Business.

### ***Amadeo Radillo - Director, Latin America***

Mr. Radillo is an experienced trilingual (English, Spanish and Portuguese) and multi-cultural senior financial and payments executive with over 25 years in the FinTech and financial services industry. Prior to BitMinutes, Mr. Radillo was the Chief Executive Officer of the Financial Services Group at the World Council of Credit Unions (WOCCU Services Group) in Madison, WI/Washington, DC. While acting as the CEO of WOCCU Services Group, Amadeo developed and maintained the corporate objective to expand World Council mobile financial services footprint for credit unions worldwide through online and digital innovation and product development with a focus on payments switches, issuing cards and mobile solutions. Mr. Radillo developed new and improved customer relationships in Ecuador, Mexico, Peru, Bolivia, Colombia, Costa Rica, Guatemala, Paraguay, Panama and Dominican Republic.

Before joining WOCCU Services Group, Mr. Radillo served as Corporate Finance Manager and Latin America Product General Manager for Vesta Corporation. While at Vesta, Mr. Radillo developed and implemented payment platforms, technical infrastructure, pricing and financial models for the mobile business; provided international finance, best practice operation business guidance on a case-by-case basis; and enriched the banking and commercial relations with in the Latin America financial industry.

### ***Juan Soto - Director, Trusted Agent Network (TAN) & Merchant Relations***

Mr. Soto is a senior payment industry veteran; his entire career spent in the point-of-sale, transaction processing and merchant acquiring marketplace. Most recently, Juan founded Tesoro Payment Solutions, a merchant services and consulting practice that targets the Hispanic and underbanked markets in the U.S.

Juan has held senior sales management and business development positions in different industry verticals including stints at Fleetcor (fleet card issuer & processor), Planet Payment (dynamic currency conversion processor), Noblett & Associates (payment technology consultancy), Chase Merchant Services & NaBANCO (credit card merchant acquiring), and IVI Checkmate/Ingenico (POS equipment manufacturer).

Juan holds a B.A. in Business Administration from Florida International University in Miami, Florida where he majored in Finance and Marketing. He also holds technical and pre-engineering associate degrees and is fluent in Spanish.

### ***Maxine Alagar - Director, Customer Service and Merchant Support***

Maxine brings to BitMinutes 25 years of customer service in the telephony industry. Most recently, Maxine was Director of Operations at Global Connection, responsible for the national Call Center, including 86 Customer Service Representatives, network operations and human resources, responsible for hiring, training, and termination of call center personnel. Previously, Maxine spent 25 years at BellSouth with her last job title as Operations Director of Billing and Collections. Maxine works closely with the BitMinutes marketing team to deliver material and training to retail agents and internal service representatives.

## **Advisory Board**



### ***Leonard Schrank***

Leonard Schrank was CEO of SWIFT from 1992 to 2007, the Brussels-based, industry-owned global financial messaging system which supplies secure standardized financial messaging services and interface software to some 8,000 financial institutions in 200 countries. SWIFT is overseen by a senior committee drawn from the G-10 central banks given its critical role in international payments. Following the attacks of September 11, 2001, Mr. Schrank oversaw the relationship between the U.S. Department of the Treasury and other countries on counter-terrorism issues. Mr. Schrank, an MIT graduate, currently serves on a number of international boards, including-HSBC.

### ***Brian Smith***

Mr. Smith has a 42-year involvement in the financial services industry. His roles have included SVP General Counsel and Corporate Secretary of Mastercard International where he was a member of the Office of the President; as Chief Counsel and Member of the Policy Group of the Office of the Comptroller of the Currency and as a senior partner in several multinational law firms – most recently Latham & Watkins, LLP - where he headed those firms' financial regulatory practices. He is a member of the boards of directors of several companies and of a charitable foundation.

### ***Thomas Flohr***

Mr. Flohr has background as a lawyer and investment banker and acts as Senior Advisor, International Strategy and Legal Affairs for BitMinutes/P2P. He holds AB and AM degrees in Economics from Stanford University, an MBA from Harvard Business School, and a JD from Columbia Law School. His Wall Street background includes positions at Simpson Thacher & Bartlett, Morgan Stanley & Co., UBS and Prudential Securities. Mr. Flohr founded Emerging Markets Group and has advised on privatization and private sector development in transition economies worldwide. He is the Managing Member of Peapack Investments LLC.

## In-Country BitMinutes Support

### *B.M. Khanna - India*

Mr. B.M. Khanna has vast experience in the telecom field serving the Indian Government's Department of Telecom (DOT) for over 40 years, holding several key positions.

Mr. Khanna's most recent position was as Chairman & Managing Director of Mahanagar Telephone Nigam Ltd. (MTNL), a public telecom company, serving two of the largest cities in India, Delhi and Mumbai. During his tenure as CEO of MTNL for over seven years, MTNL was recognized as amongst the five most efficiently managed Public-Sector Undertakings in India.

Previously, Mr. Khanna was the CEO of Indian Telephone Industries (ITI) at Allahabad and Deputy Director General responsible for the formulation and implementation of the long-term planning for Indian Telecommunications at Telecom Headquarters. He was the senior expert with the ITU at Addis Ababa for the implementation of PANAFTTEL SYSTEM for the Africa Region. Prior to that, he was Director Long Distance at Telecom Headquarters. He also was Director, Microwave Projects at Mumbai responsible for installing new systems in the Western Region of India from scratch.

Mr. Khanna has consulted several multinational corporations including: AT&T, NCR, Lucent Technologies, Arraycom, Hughes Network Systems, HCL Infosystems, American Tower Corporation and CH2M Hill. As a senior member of the telecom fraternity in India, Mr. Khanna has been associated with the Confederation of Indian Industries (CII) and Fellow of the Institution of Electronics and Telecom Engineers at the key policy planning level. As a member of the CII's National Telecom Council, he has been intimately involved in several key telecom policy initiatives taken by the CII, as well as the regulatory issues affecting the Telecom Industry in India.

## Appendices

**Appendix A: WHY BITMINUTES ARE “BETTER THAN BITCOIN FOR BILLIONS”**

The following details the advantages BitMinutes have over Bitcoin, for example, including Third Party Apps.

Product Attribute	BitMinutes	Bitcoin
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Inherent Value - Call Globally	Yes	No
3 <sup>rd</sup> Party mWallet Transfers	Yes	No
Identity Verification Required	Yes	No
Multi-Country Agent Network	Yes	No
Payment to ALL Major Telecom Carriers	Yes	No
Anti-Money Laundering Built in	Yes	No
Secure Bank Transfers	Yes	No
Free International Money Transfer	Yes	No   ~1% Fees

### BitMinutes Opportunity

As a result of the Internet, several multi-billion dollar companies were created by leveraging the power of direct, secure communication between individuals, thus disintermediating established industries. Skype and PayPal both aggregated large customer bases by offering free services in international calling and payment processing, respectively.

Leveraging these same large, scalable Internet-centric attributes, BitMinutes enables third-party developers to offer business models with significant advantages over Bitcoin: ***Lending Capabilities, Inherent Value, Price Stability*** and ***AML*** attributes.

## Bitcoin Disadvantages

As a “free” form of P2P money transfer, Bitcoin is gaining traction in disintermediating the money transfer industry by allowing monetary value to be exchanged for “free” between individuals. However, as a currency for the global underbanked, Bitcoin has several major flaws including: lack of transparent user identity making it the currency of choice for global illicit activities; lack of local liquidity significantly reduces Bitcoin’s ability to act as a money transfer

vehicle; and extensive energy requirements for processing. For instance, in the money transfer market (i.e. \$28 billion from U.S. to Mexico), there is only one Bitcoin exchange for the entire country, Bitso.

## BitMinutes Advantages

Using Smart Token technology, BitMinutes solves all of the well-known Bitcoin issues:



### Local Currency Support in Underbanked Countries

Bitcoin lacks convertibility to physical cash especially in underbanked countries. Country specific BitMinutes provides convertibility today into 16 country currencies via its prepaid minutes conversion and direct bank deposit capabilities.



### TAN Agent Network Provides True Cash Liquidity

Converting physical cash into and out of a virtual currency requires a network of trusted Agents. The third-party Trusted Agent Network (TAN) solves this problem, while concurrently providing a business opportunity to the very same target market that benefit from a virtual currency like BitMinutes.



### BitMinutes: Inherent Value - Call Globally

BMTs have inherent value for two reasons:

- 1) BMTs can be used to call any phone globally, and
- 2) BMTs can be sent to any phone globally as credit to pay for minutes for use in that country. This applies to any cell phone in over 200 countries.



### BitMinutes Anti-Money Laundering

BitMinutes have a major advantage over Bitcoin in conducting legitimate business. All BitMinutes transactions are either centrally and/or blockchain approved and recorded on any designated payment network (Ripple in production), thereby providing an audit trail. Plus, any BitMinutes user must have a bank account and/or mobile wallet that meets international AML standards. The anonymous nature of Bitcoin does not permit this level of auditability and does not meet international AML standards, thus making it an unlikely candidate as a widely used international

## Appendix B: BitMinutes Smart Loan Lending Process

Wallet holders who maintain BitMinutes balances in their wallet can use a portion of these balances as funding for Smart Loans. TAN Agents are the marketing and operational distribution network to issue mobile wallets, issue cash and accept cash repayments. TAN Agents receive a portion of the interest once the Smart Loan has matured. In this model, the TAN Agent owns BMTs as well, demonstrating they have "skin in the game" which helps lower default rates.

As more personal information is acquired, (payment history, remittances sent/received and social media analysis), the Smart Loan amount a consumer qualifies for will be determined by an artificial intelligence algorithm.

Because the credit of these borrowers may be quite low and the risk of default high, microloans command above market interest rates, making them attractive for investors.

### The TAN Score

BitMinutes will use its proprietary TAN score along with other details in the borrower's transaction history to assess the credit risk of the borrower. The TAN score is on a 0–100 scale. A low score indicates high risk, a high score lower credit risk. There are several factors that go into a TAN score. The factors that go into the TAN score will be weighted differently, including:

- Repayment history
- Current loans owed
- Age of account
- Income
- Inbound and outbound remittances
- Mobile airtime top up and usage
- Smartphone location services

### The Loan Decision Process

Using an internal network for the BitMinutes loan decision-making process will enable fast processing of microloans with no human intervention. The lending engine will assess the credit risk before a loan is issued and during the repayment process, which creates quality feedback data for the lending engine. The continuous underwriting process will take in real-time data, such as the smartphone airtime usage, location services and incoming remittances.

The lending engine will also check for fraud during decision-making processing by correlating several data points during an application process.

The lending engine will evaluate several factors to determine the credit worthiness of the borrower and the factors are evaluated while considering similar microloan applications. The neural network is key to loan pricing, an important factor while determining credit risk.

The BitMinutes lending engine is being developed as a back-propagating, multi-layer network. Previous and current loans are used as the training data sets. The input variables will include individual components of the TAN score;



collateral offered, guarantors, social factors that might affect repayment and any other data collected from the borrower.

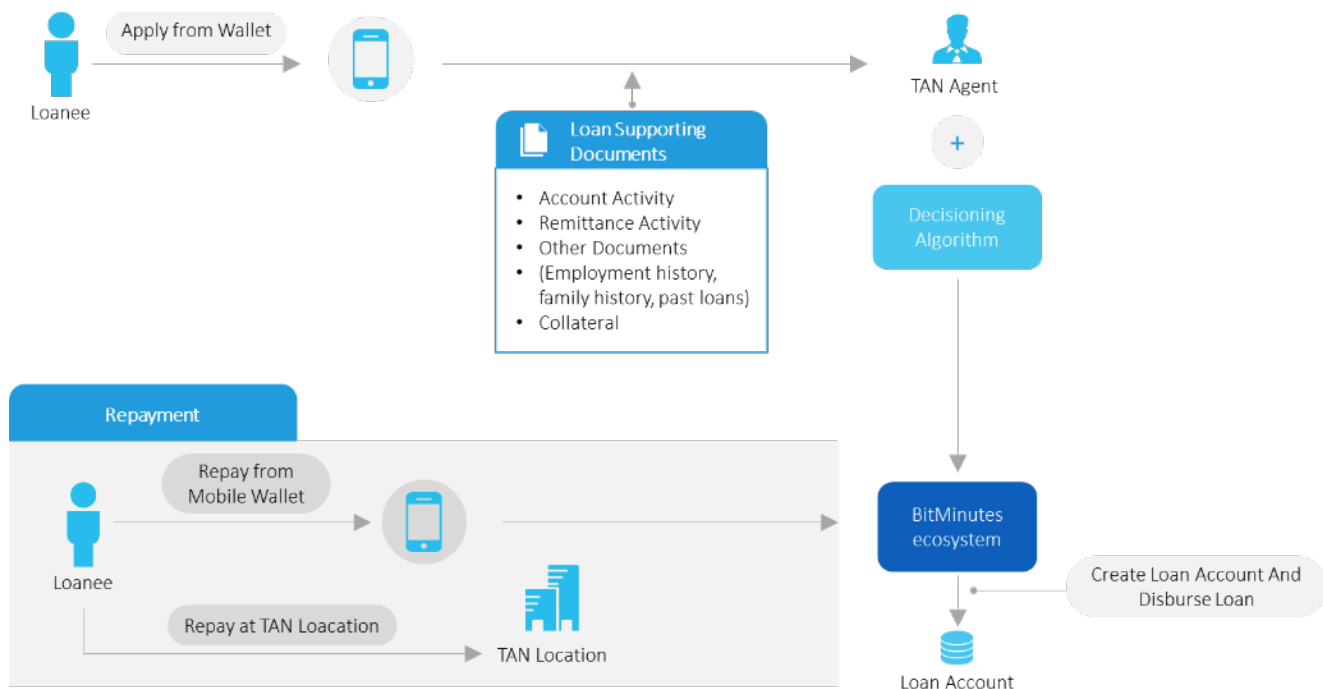


Figure 2: Micro lending workflow

### BitMinutes Smart Loan Rates

The repayment of interest for all loans will be auto-calculated based on the overall performance of the BitMinutes Smart Loan platform. Depending on where the loan is underwritten, adjustments are made for: inflation, risk profile and local factors, such as competition from other lenders.

All TAN Agents and customers in the BitMinutes ecosystem can borrow cash from BitMinutes JVs and SPVs, using BitMinutes as collateral, paying initially at 1.0% per week; a non-compounded annual rate of 52%. This target interest rate may vary from country to country, with the consumer rates largely determined by the TAN Network and regulatory guidelines. As credit profiles develop and loan amounts increase, the borrowing rates will be decreased. These rates are generally at or below other micro loan rates worldwide.

### Eligibility for a Smart Loan

Only BitMinutes wallet holders are eligible for Smart Loans. This encourages BitMinutes wallet adoption. The loan amount qualified for will depend on several factors, including: repayment history, balances held in BitMinutes, remittance volume and frequency. These factors will be combined into a proprietary scoring model and issued as a TAN Score, ranging from 0 to 100 ranking each potential user's credit limit within that range.

## TAN Credit Scoring

Lenders use subjective scoring, the use of defined parameters, such as experience in the business, net margin of the business, and profitability and disposable income to analyze businesses and credit risk. These parameters are defined using industry standards, institutional experience and stated lending policies. A number of qualitative indicators are also used as selection criteria.

BitMinutes will use statistical credit scoring forecasts, risk-based on quantified characteristics, recorded in a database. The relationship between risk and client characteristics is expressed as sets of rules in a mathematical formula that forecasts risk as a probability (Schreiner, June 2002). Statistical scoring not only tells if the client is risky or not, it also provides an exact measure of the predicted risk.

Today, scoring is widely used by credit card companies that use credit histories and other borrower characteristics to automatically approve credit lines without personal contact with applicants. Subjective Scoring forecasts risk based on the quantified knowledge and the qualitative knowledge of the characteristics of the client and the loan contract.

However, there exists other readily available data including remittance volumes either sent or received and the frequency thereof, plus the wallet holder's transaction activity. BitMinutes associate company, P2P Cash, partners with best-in-class vendors like IDology for identity verification and fraud prevention. BitMinutes uses similar international authentication and social media analysis companies to base the TAN credit score system on these parameters, where available. In addition, whenever the statistical and subjective data is available, that data will be used in the credit scoring process.

## Smart Loan Underwriting Process

The wallet holder applies for a loan within the BitMinutes mobile app. BitMinutes will use artificial intelligence techniques to analyze the loan request and give it a TAN ranking. The Smart Loan package is immediately underwritten by the Smart Loan Underwriting engine with the particular loan details included in an encrypted Smart Token. These details include: the loan principal, repayment period, the repayment history, the derived TAN score of the prospective borrower and the calculated interest rate.

Habitual borrowers who pay their debts on time will establish a better personal TAN Score. Consumers with a higher TAN Score will generate Smart Loans with a higher Smart Loan TAN ranking of the individual loan itself.

## Loan Repayment - Smart Loan Technology

Once a Smart Loan is disbursed with mutually agreed upon terms between the lender and borrower, a repayment schedule is created as a Smart Contract regarding that specific BitMinutes loan. The repayments are made with the BitMinutes wallet. Even if the loan is sold in the secondary market, the repayment schedule is unaffected because that particular BitMinutes Smart Loan is governed by the underlying Smart Contract on Ethereum.

Lenders are guaranteed repayment of 50% of the principal amount by BitMinutes held in escrow by the TAN Agent. TAN Agent credit lines are determined by their individual TAN Score. Both the consumer and retailer need to repay their loans in BitMinutes. This generates consumer awareness and use of BitMinutes, keeping the local market liquid in that particular currency.

## **Appendix C: BitMinutes FinTech Ecosystem**

BitMinutes parent company, P2P Cash, developed several technologies and business models as part of a “FinTech Ecosystem” bringing disruptive, low-cost financial services to the developing world. Multiple strategic partnerships provide global infrastructure for BitMinutes, significantly enhancing its potential for global success.

### **Trusted Agent Network (TAN)**

To assist in BMTs distribution, P2P created TAN and associated mobile applications for both consumers and agents. TAN creates a business opportunity for the two billion underbanked individuals to become what the World Bank describes as a “Branchless Banking” network of trusted agents. The TAN network provides substantial job creation opportunities and easy access to financial services, replicable on a global basis.

### **P2P Cash Technology Inc.**

P2P Cash Technology is the operator of a money transfer platform using BMTs as the underlying value transfer technology. P2P’s consumer marketing efforts focus on the top global U.S. money transfer markets. P2P Cash promotes its **Send Cash Home Free!** Program via a digital marketing campaign. P2P only accepts funding directly from the consumer with a bank account in the U.S., eliminating significant costs of brick and mortar operations. P2P generates revenue from the currency exchange rate only and does not typically charge a transaction fee. Net revenue by way of FX margin averages about 1% of the amount transferred after distribution/partner costs. Via integration with Mastercard’s global distribution network, BMT can be directly deposited into 1.2+ billion mWallets and bank accounts.

### **Free Mobile Wallet**

P2P incorporates industry leading identity system apps to capture an identity and perform KYC background checks in non-US markets. P2P’s platform is mobile wallet agnostic and is currently compatible with many major telecom mWallets, including, but not limited to: M-Pesa (Kenya), Orange Telecom (France/Africa), Bharti Airtel (India/Africa) and Globe and Smart (Philippines, SE Asia).

### **Mastercard Integration**

BitMinutes is currently integrated with Mastercard’s global distribution network (HomeSend). This permits BitMinutes to be automatically converted by Mastercard into cash and directly deposited into over 1.2+ Billion bank accounts and mWallets via HomeSend.

### **Banking**

BitMinutes leverages both its traditional bank relationships along with its use of digital currencies and DLT and blockchain technology in order to transfer value cheaply and efficiently on a global basis. BMB is concluding access to a national banking license to allow BMB to make remittances from all 50 states.

### **Prepaid Minutes as Digital Currency**

Prepaid top ups of mobile phones generate over \$650 billion annually from over 4.6 billion subscribers, according to a report from GSMA. The remote and/or prepaid top up industry (sending prepaid minutes internationally and/or selling minutes between individuals) is estimated to be approximately 5% or a \$28 billion sub-industry.

In essence, every MNO is “issuing” its own virtual currency as prepaid minutes. These minutes are simply a future obligation to provide mobile phone connectivity services at a future date on behalf of the purchaser. This is exactly the same model that every country uses to “issue” its currency, but without the obligation to provide a specific service. That country’s currency has value as a medium of exchange between individuals because it is issued and approved by the government.

MNO-issued prepaid minutes perform the exact same function as above because of the same guarantee of value. In certain cases, prepaid minutes may be more valuable than an unstable country’s fiat currency because there is inherent value. Therefore, by definition, prepaid minutes are a form of currency, and because they are primarily issued, transferred and used electronically, they are truly the first “Virtual Currencies” to be issued, substantially predating Bitcoin.

Globally, there are over 500 MNOs and another 1,000+ “Virtual” MNOs (MVNO), who’s prepaid virtual currencies lack interoperability. However, consumer churn is rampant in the prepaid market as most consumers have already paid for their phone. They will switch SIM cards very quickly if a MNO sells minutes at a discount to the market. This puts severe pricing pressure on all the MNOs and makes it difficult to differentiate their service offerings. It should be noted that this model differs significantly from the U.S. MNO business model where consumers are locked into 2-year contracts that subsidize the purchase of the phone at the beginning of the contract.

### Airtime Remittance Model Discussion

Airtime remittance has emerged as a viable business because money transfer costs make it impractical to send very small amounts of money abroad. Money transfer fees are not suited for very small values in prepaid models, especially with 75% of the world's mobile subscribers prepaid. These airtime transfers can be as small as 10 cents in value, a transfer that was not possible in traditional channels. The average transfer is \$2 to \$10 ([TransferTo study](#)), a large sum in emerging countries. Airtime transfers serve as a natural complement to cash remittances, acting as a transfer of value. Staying within the same MNO network costs the MNO practically nothing and is less easily eroded with fees because there's no need to convert the airtime to cash. In some countries, the only infrastructure is the phone company and the post office.

For many consumers, it makes sense to transfer airtime because of the ubiquity of mobile handsets and the developing world's growing dependence on wireless communications. Transferring prepaid airtime in most markets is vastly cheaper than traditional remittances that involve transfer and FX fees. In airtime transfer, there is a small cost to the sender, which translates to a huge value for the recipient. Another feature of the airtime transfer business is that airtime can be sent to multiple recipients, whereas a traditional remittance is generally larger and sent to only one recipient. In most global markets, however, airtime is not cashed out of the phone, in part because of the liquidity management challenges borne by the agents of the mobile money transfer provider.



If you would like to help us change millions of lives for the better, please contact CEO, Tom Meredith at [Tom@BitMinutes.com](mailto:Tom@BitMinutes.com) with any questions or inquiries.



*Prepaid Minutes Denominated as Country Stablecoins  
Powering Free Global Value Transfer,  
Efficient Digital Payments, and  
Guaranteed Micro-Lending*