

Qilin.Market

Protocol for Decentralized E-commerce

Trading goods on a global scale
using cryptocurrencies

Whitepaper V0.8

15th November 2017

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ABSTRACT

Over thirty years of advancement in global system of interconnected computers resulted in the number of breakthrough technologies disrupting established industries in surprisingly short terms.

Irruption of blockchain technology already has made a significant impact on banking systems. Cryptocurrencies are transparent and do not recognize the concept of geographical borders or restrictions from local and international institutions.

Reconceptualization of money and value along with unprecedented data privacy, security and trustless freedom of distributed ledger changes the very nature of trading as a process of exchanging goods for equivalent of value.

Global e-commerce implies conversion of different national currencies, varying payment conditions and multi-level control by governments those lead to increase in the final cost of goods for customer. We believe that emerging blockchain technology can bring excellence to daily shopping by eliminating trustless intermediaries and automating international supply chains.

Introducing the “Qilin.Market” — protocol for decentralized e-commerce to enable exchange of goods for cryptocurrencies in convenient, and what is more important, secure manner.

OVERVIEW

Advantages of selling goods on-line prior to brick-and-mortar trade are obvious: lower expenses for rent, personnel and utility bills, no specific premises, more flexibility and ability to track marketing performance.

To say the least, e-commerce is all about trust. No seller will agree to ship the product before a customer pays for it, and customer prefers to be confident about quality of product and decency of the seller before he transfers funds.

Any escrow intermediary should poses an immense trust for both parties as no one will confide their transactions to unknown or shady intermediary. As there can't be a big number of globally trusted institutes, major marketplaces are monopolists in their regions and every seller herein is obliged to work under their terms.

Blockchain technology provides an opportunity to create a secure escrow for any deal that is transparent for all the parties. By transferring money to smart contract buyer assures payment for seller and keeps money-back guarantee in case the product is not delivered. "Qilin.Market" unique approach also involves independent third parties operating delivery services and marketing partners.

This document describes the basic principles of trading protocol to unite all e-commerce market participants on a global distributed platform.

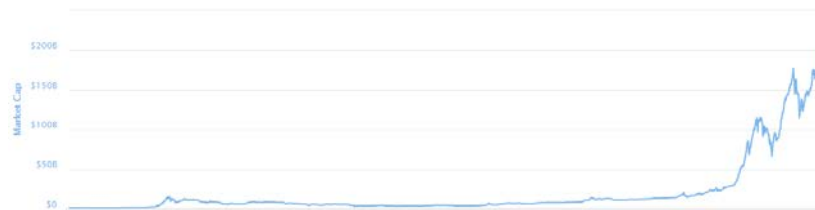
DEFINITIONS

Key definitions to be used within this document:

Qilin Protocol	set of smart-contracts implementing all aspects of interaction to accomplish goods purchase deal
Qilin Blockchain	immutable distributed ledger for all settlements between parties
Qilin Marketplace	interface intended for convenient interaction with Qilin Blockchain to manage product offers for sellers
Qilin API	interface for maintaining automated direct interactions with Qilin Blockchain
Qilin Token (Qt.)	digital asset, an utility token acts like a fuel to maintain settlements between parties within “Qilin.Maket”
Qilin Shop	open sourced on-line store for “Qilin.Market” ecosystem that can be cloned or forked to operate an independent shop
Qilin Demo Shop	on-line store operated by Qilin Foundation to represent all the products on the “Qilin.Market” with ability to receive discounts for Qt.

MARKET OPPORTUNITIES

Constant growth of cryptocurrencies valuation brought huge profits for early technology adopters and investors. Along with rapid increase in number of internet-connected devices in developing countries those do not have sustainable banking system it creates a great market for bargains in exchanging goods for coins.



Total Market Capitalization, Sep 2013 – Sep. 2017, Source: Coinmarketcap.com

A lot of projects have mission to make circulation of crypto assets convenient for masses, but it is still quite a complicated task to buy digital coin nowadays. What is more important, it's even harder to sell one.

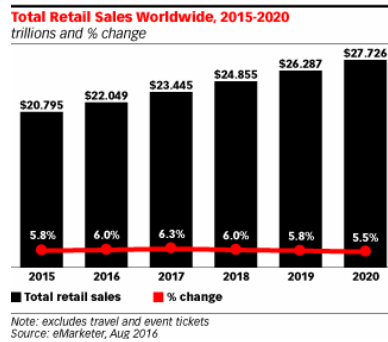
Generally there is no need to convert coins to fiat money in order to pay for goods. A lot of sellers are interested in boosting their sales by accepting a digital coin.

E-commerce



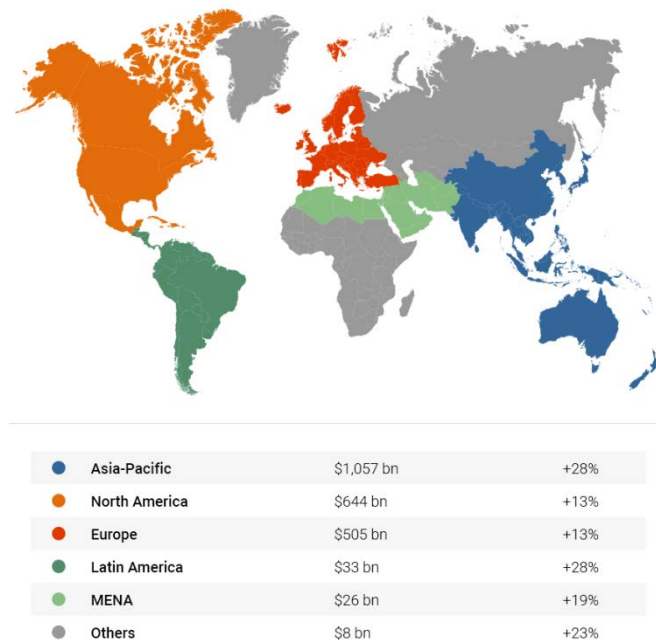
On-line retail e-commerce sales reached \$1.5 trillion in 2016. 2017 is expected to be almost \$2 and will continue its growth to \$4 trillion by 2020.

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Source: eMarketer

Total retail sales worldwide will reach \$23 trillion by the end of 2017, up 5.8% from 2016. eMarketer expects steady growth through 2021, when sales will total \$28 trillion.

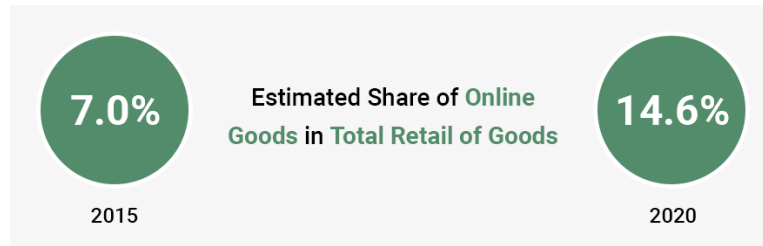


China and the US will amount to \$1.6 trillion in e-commerce sales in 2017, representing almost 70% of global e-commerce. While e-commerce in the US will grow by 15% in 2017, the Asia-Pacific region will have a 30% growth rate in 2017, becoming a clear leader in global e-commerce development. This e-commerce growth in Asia Pacific is particularly driven by very high mobile commerce sales.

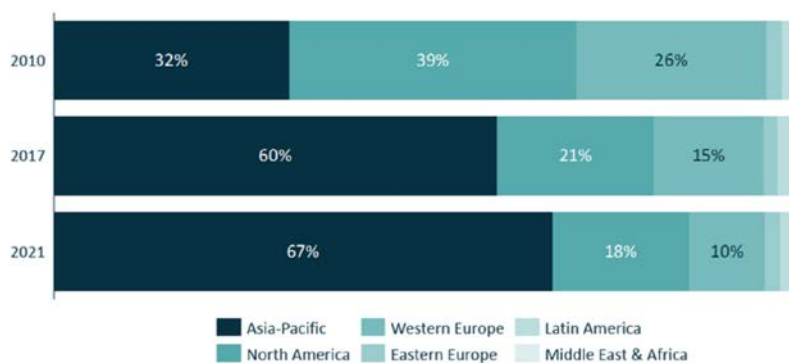
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Regional E-commerce Sales Share

Online shopping is one of the most popular online activities worldwide but certain usage varies by region — in 2016, an estimated 19% of all retail sales in China occurred via internet but in Japan the share was only 6.7%. Estimated global share of on-line sales in total retail will grow from 7% to 14-15% in 2020.



The US retail e-commerce market is one of the largest in the world, accounting for 20% of global sales. In the US, 9% of retail sales in 2016 were made on-line, equating to \$451 billion. Despite these large shares, e-commerce will grow only by another 15% in 2017.



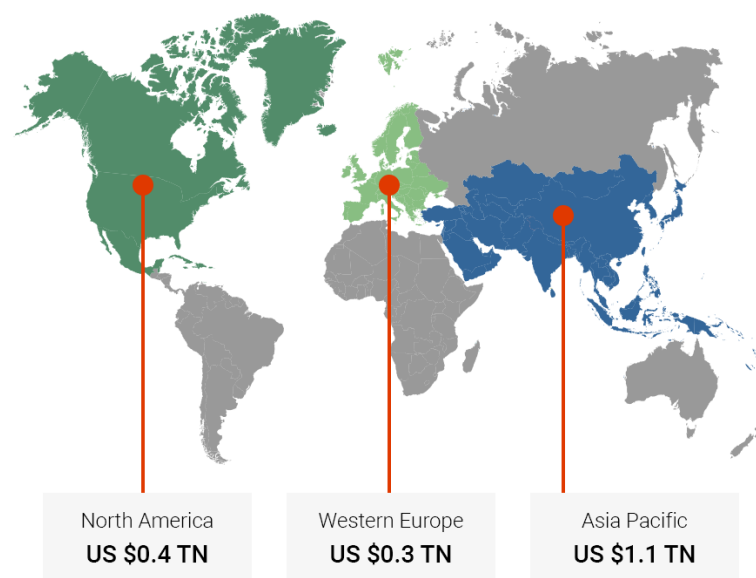
Source: International Post Corporation, <https://www.ipc.be>

According to eMarketer's estimates, in 2017 China and the US will generate the most retail sales of any country worldwide. China will surpass the US in 2018 to become the world's largest retail market by total sales, and its continued gains will help drive worldwide growth throughout the forecast period. E-commerce is the key driver behind China's retail growth.

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THE BIGGEST MARKET GROWTH RATES ARE IN ASIA-PACIFIC WHILE EUROPEAN E-COMMERCE GROWTH TO BE THE SLOWEST GLOBALLY

The UK is a clear e-commerce leader in Europe, with predicted sales of US\$110bn in 2017 and 15% growth. Germany and France are second and third for e-commerce sales in Western Europe. In Germany, e-commerce sales will grow 11% to reach US\$65bn in 2017, while sales in France will rise by 9% to US\$42bn. E-commerce in Central and Eastern Europe has a slower growth reaching only 5% by 2021. On-line sales will represent on average 9% of total retail sales in UK, Germany, France, Italy and Spain.



ASIA PACIFIC FORECAST FOR TWO-THIRDS OF GLOBAL E-COMMERCE BY 2021

In terms of regional e-commerce sales share distribution, the main development between 2017 and the forecast for 2021 is that Asia Pacific's regional share will increase to reach two-thirds of global e-commerce, while North America and Western Europe's share shall decrease accordingly. This is a continuation of the trend seen between 2010 and 2017.

Asia-Pacific E-Commerce Market is Predicted to be **Twice**
The Size of Western Europe and North America **Combined**



Despite being the major e-commerce growth area, the Asia-Pacific region is arguably the most varied globally in terms of payment options used.

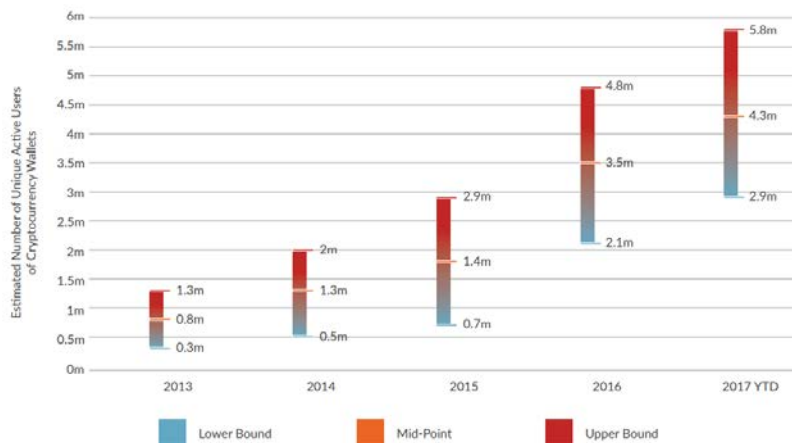
While China's e-commerce transactions, are heavily dependent on digital payment options, India will see 45% of its digital sales completed by Cash on Delivery (COD) in 2020 according to eMarketer. Many other developing Asian countries – such as Indonesia, Thailand and Malaysia – also rely heavily on COD payments.

The fragmentation and difficulty of the payment process is one of the leading obstacles to e-commerce growth, especially in parts of Asia, the Middle East and Africa. It is an even greater barrier to cross-border e-commerce, due to national differences in payment methods. That creates a major challenge for e-retailers and delivery providers today.

Digital Currencies

THE ESTIMATED NUMBER OF UNIQUE ACTIVE USERS OF CRYPTOCURRENCY WALLETS HAS GROWN 5 TIMES SINCE 2013

The current number of unique active users of cryptocurrency wallets is estimated to be between 2.9 million and 5.8 million.



Source: Global Cryptocurrency Benchmarking Study, Dr Garrick Hileman & Michel Rauchs, 2017

Number of active wallets ranges from 7.5% to 30.9% of the total number of wallets. We can expect these numbers to broaden as cryptocurrencies adoption continues to grow.

Usage Analytics

Despite being opened, it is almost impossible to get clear demographics data of cryptocurrency wallet users. Web wallets and thematic websites visitor data recommend that 61% of all cryptocurrency users are domiciled in North America and Europe, 20% of users come from Asia-Pacific. Latin America is the next largest region, followed by Africa and the Middle East which lag behind.

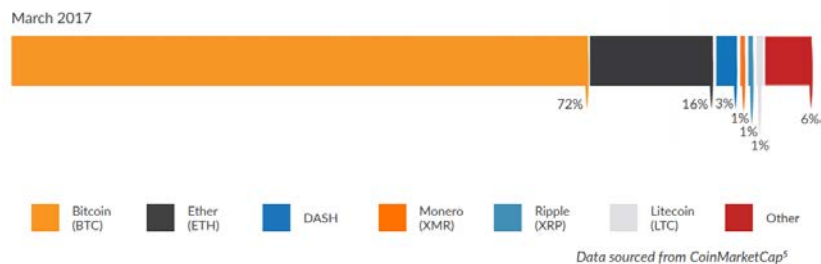
Majority of cryptocurrency wallets users seem to fall between ages 25 to 44, and are predominantly male.

Market Capitalization Share

TOTAL CAPITALIZATION OF CRYPTOCURRENCY MARKET IS 200 BILLION DOLLARS.

SOURCE: COINMARKETCAP, NOV. 2017

Largest cryptocurrencies in terms of market capitalization: Bitcoin, ETH, Dash, Monero, Ripple, Litecoin.



At the moment most cryptocurrencies are not connected to some real value in physical world and their liquidity depends on whether people believe in their growth or not.

There are three major ways to use cryptocurrencies for:

- investment,
- store of value,
- instrument for payments.

At the moment most users keep cryptocurrency for long-term investments and operations of speculative nature. Never the less, blockchain makes cross-border payments way too faster, cheaper and safer.

One would agree, that it's hard to predict the world of cryptocurrencies for the next two or three months, so that is way too hard to say what will happen in next three years.

It's almost clear that once core issues for distributed ledger technology would be solved (like relatively high transaction charges and long block mining time - those are critical for micropayments), we will see a tremendous growth and rising demand for digital coins as an instrument for payments.

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Digital Currencies in E-commerce

We believe that current state of cryptocurrencies as a payment instrument is seriously undervaluated.

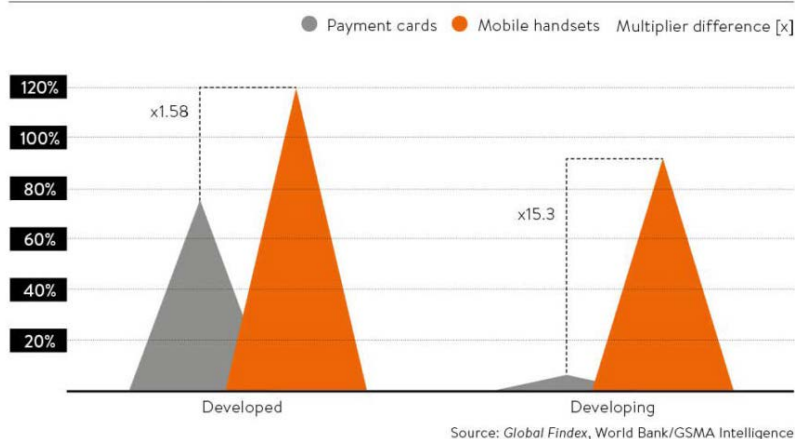
First, most digital assets owners are not institutional investors that would prefer to fix profit to make some purchases. They will eventually need to convert it to fiat currency and pay commissions. That's senseless if there is a direct way to pay for the same goods with cryptocurrency.

At the same time, a lot of merchants believe in the promise of cryptocurrencies evolution today and accept Bitcoin and Ethereum as a payment method to widen their customer base.

Secondly, more than 2.5 billion people around the world don't have a bank account (600 millions of them in Southeast Asia), but may have a mobile phone though.

DEVELOPING MARKET DATA

PENETRATION RATES, 2014



SOURCE: RACONTEUR

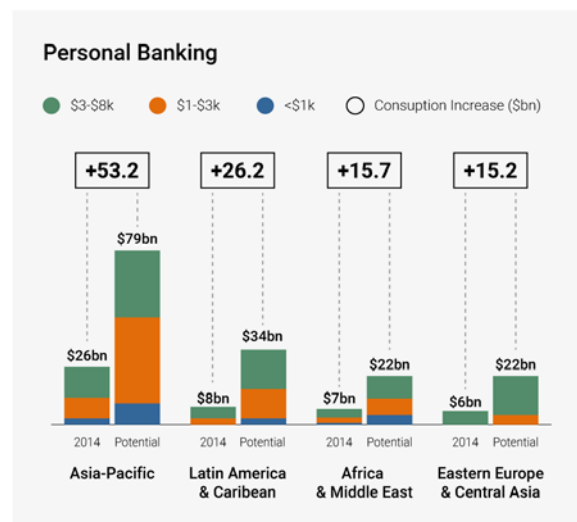
CRYPTOCURRENCIES HAVE HUGE POTENTIAL TO BRING FINANCIAL SERVICES TO REGIONS NEGLECTED BY TRADITIONAL BANKING

There are large developing markets with rapidly growing internet infrastructures, which yet remain unbanked.

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Low costs along with wide spread of smart phones and internet makes the growing number of young and digitally savvy millennials with distrust of traditional financial services model be an early adopters of payments using cryptocurrencies.

Most of the world's unbanked population lives in highly rural, undeveloped areas such as sub-Saharan Africa and Central Asia. In countries such as Turkmenistan (where only 1.8% have bank accounts) or Niger (3.5% have accounts), banking is largely unknown to the masses.



SOURCE: OPPORTUNITIES IN EMERGING MARKETS, RACONTEUR

Asia-Pacific and Latin America/Caribbean have smaller proportions of lack access to basic financial services: 40-60% of people aged 15 and over have an account at a financial institution, compared to 80-100% in developed countries.

Due to their higher overall populations and income levels these emerging economies expected to have great potential in use of convenient digital currency wallets for next 3-5 years.

Last, but never the least, another 3 billion will have access to the internet by 2020 – receiving direct access to digital instruments for international transactions, having demand for goods consumption, that is a huge number to join the global marketplace.

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PRODUCT



“QILIN.MARKET” IS THE DISTRIBUTED TRADING PLATFORM TO BUY AND SELL GOODS ON-LINE USING CRYPTOCURRENCIES WITH UNIQUE APPROACH ON DEAL ESCROW BASED ON SMART CONTRACTS

Problem

Being a seller you can't be sure that customer completed an on-line order for the product will pay for it. From the other site, buyer prefers to transfer funds only after receiving a product.

Unlike credit card transactions, cryptocurrency transactions are irreversible. Once the funds have been transferred, the party that sent the payment cannot retrieve them. There is no legal way to dispute the transaction ether as no regulation is involved in the field of cryptocurrency transactions.

Using a third-party escrow seems not a good solution – first, it is hard to find one that represents enough trust for both parties, and being a physical person or a company there is always a risk of involving its interests on finishing the deal.

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Solution

Utilizing smart contracts for exchanging goods with digital assets, “Qilin.Market” creates secure escrow for both parties, assuring money-back guarantee for buyer and secure funds transfer for seller.



Buyer transfers payment on smart contract that holds funds till the product is delivered. Distributed ledger ensures no one* can take funds before independent delivery service will confirm the purchase through external oracle. If the product is of the good quality and is accepted by Buyer, Seller receives money and Delivery service has its profit.

Transactions take place directly between the buyer and seller, and there are no middlemen to put additional holds on funds.

That disrupts traditional e-commerce model making a direct connection from end-to-end in the global supply chain.

DUE TO ITS P2P (PEER-TO-PEER) NATURE, GOODS CAN BE TRADED DIRECTLY, EASILY AND WHAT IS MORE IMPORTANT, FREELY.



For example, producer in Europe can sell his product directly to a buyer in Singapore without going through the traditional system requiring banks, governments and financial institutions with multiple currencies conversion rates and exchange fees.

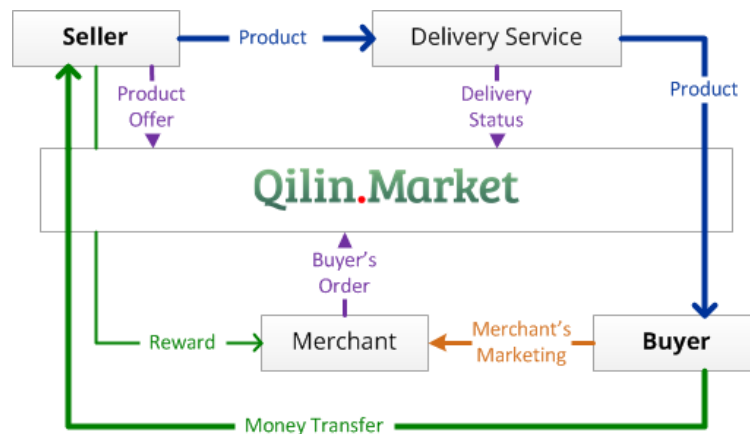
* — even «Qilin.Market» can't.

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Operational Model

In classic e-commerce model, there is a party that wants to sell a product (the “Seller”), customer that wants buy the product (the “Buyer”) and “Delivery Service” that ships the product from Seller to Buyer.

Delivery Service’s role is extremely important as it is the sole independent party that can assure that product is accepted by customer receiving his signature on the paper and reporting result through oracle to blockchain.



“Qilin.Market” enriches this model with concept of Merchant’s on-lone shops — an independent marketing partner with website that helps Seller find a Buyer. Seller can name any reward for the Merchant to sell the product.

There is a system of Deal Deposit to cover product return costs if Seller sent product of a bad quality and Delivery Deposit to assure Delivery Service will manage to ship the product. These deposits are returned when smart contract is finished.

“Qilin.Market” model implements Shop rewards, Deal and Delivery Deposits to be made in Qilin Tokens (Qt.) that is an independent digital asset to maintain settlements between market participants within distributed network (See “Token Description”).

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Smart Contracts Ensured Deal

SELLER PUTS HIS PRODUCT OFFER ON MARKET AND DETERMINES A REWARD FOR THE MERCHANT TO FIND A BUYER

Any seller is able to publish a product offer with an easy-to-use graphic interface on Qilin Marketplace. It becomes instantly available in all shops connected to “Qilin.Market”.

There are two types of pricing models available for Seller:

- Fixed price in cryptocurrency — product price is set in cryptocurrency that Seller prefers to work with.
Currently platform can offer only Ether (ETH). We assume there can be more currencies to choose from due to use of exchanges as well direct connection of new blockchain using smart contracts.
- Fixed price in fiat currency — product price would be converted to cryptocurrency selected by Seller on the moment of purchase considering actual exchange rate.

Seller also defines reward for Merchants to promote the product offer. Merchants are interested in marketing products with higher rewards. Seller also gives information about the amount of product in stock so all Merchants' shops can check the actual availability of the product through Qilin Blockchain.

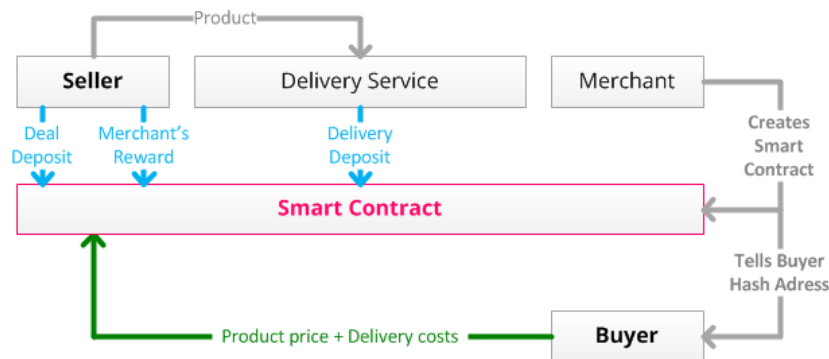
Seller may set a Delivery Deposit in percent from the price of the product that should be transferred to smart contract by Delivery Service to assure safe products delivery. Generally, Seller may have a paper-signed agreement to have some real world legal guarantees on product delivery, so there may be no real need for Delivery Deposit.

Seller can also put a discount for product price to be paid by Qt., that way sellers can acquire Qt. for exchange of their goods without going to public exchange.

MERCHANT HELPS SELLER PROMOTE THE PRODUCT TO ATTRACT A BUYER

Buyer finds a product offer in Merchant's on-line shop connected to Qilin Blockchain. Merchant does the marketing and customer service to convince the Buyer to make an order.

Merchant deploys a new instance of smart contract in blockchain and gives a hash address for Buyer to transfer funds. Buyer sends cryptocurrency to smart contract to pay product price and delivery services.



SELLER PREPARES PRODUCT FOR SHIPMENT

In order to confirm the order Seller transfers Qt. to the same address for Deal deposit and Merchant reward.

- Deal deposit is needed to assure that Seller ships a quality product to Buyer and grants return costs coverage in case of customer refusal to accept it.
- Merchant receives a reward in Qt. for customer he had attracted when product is delivered to Buyer and customer accepted the product.

If Seller does not confirm the order within 3 days Buyer receives back his funds, smart contract will be closed. Merchant also does not receive any reward.

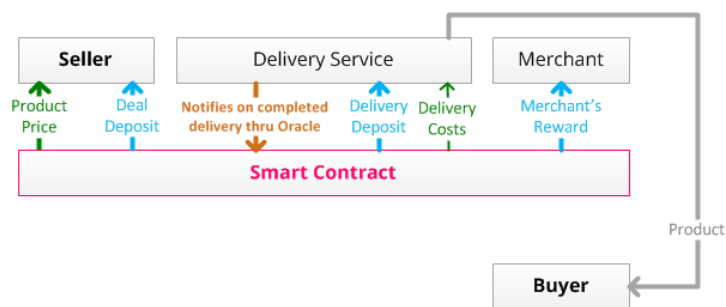
All the parties may leave feedback or review for other deal participants after smart contract is finished.

DELIVERY SERVICE SHIPS THE PRODUCT TO BUYER AND CONFIRMS THE DEAL

Delivery service transfers Qt. in order to cover Delivery Deposit and pick the product for shipment. Delivery service reports about current status and smart contract checks it through the oracle. After the product is successfully shipped, depending on status, smart contract releases funds to deal participants:

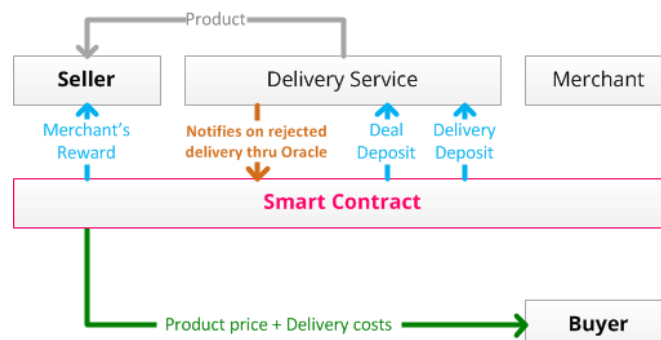
1. DELIVERY COMPLETED SUCCESSFULLY, PRODUCT IS ACCEPTED

Seller receives payment for the product in cryptocurrency and Deal Deposit in Qt. back to his wallet, Delivery Service receives delivery price in cryptocurrency and Delivery Deposit in Qt. to his wallet. If there was a reward for the Merchant from Seller, Merchant receives Qt. as a reward.



2. DELIVERY COMPLETED, PRODUCT IS NOT ACCEPTED

If product is rejected, Buyer receives his payment back, Deal Deposit is transferred to Delivery Service to cover product return costs to Seller.

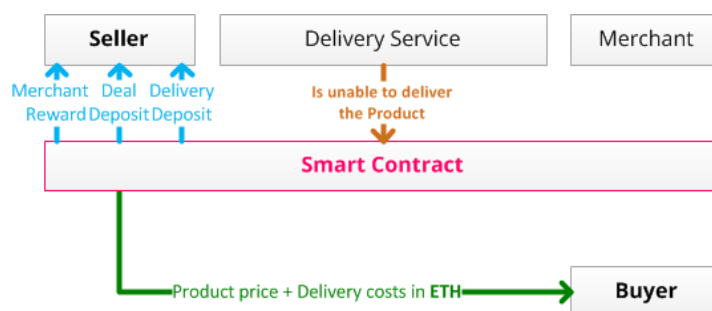


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Delivery service receives Delivery Deposit only after return of the product to Seller. Merchant reward (if set) returns to Seller.

3. DELIVERY NOT COMPLETED

In case Delivery is not completed or product was damaged during delivery, Seller and Buyer receive their assets back, Delivery Deposit is transferred to Seller.



Merchant reward (if set) also returns to Seller.

Controversial Provisions

There may be a situation in which it may be not clear if product is damaged during delivery or it was in that state on the moment Seller gave it to Delivery Service.

Being recommended to have a signed agreement between Seller and Delivery Service it should be an obligation of Delivery Service to check if the product is in undamaged state when taken to shipment and so there should be some assurance included for Seller to guarantee safety of delivery.

Qt. used for Delivery Escrow are mainly used to fuel the transaction on the smart contract and may not represent the actual percentage in value of the product as no Delivery Service would agree to work on conditions alike.

Dispute Handling

We assume there can be product quality claims soon after Buyer received the product. Being the rare number those can

be easily held by real world procedures like a product guarantee service as they are perfectly regulated by fiat world.

Reputation Management

After smart contract finished all the parties receives an opportunity to leave feedback about each other's results. We presume that single number would be enough for the purpose of reputation handling within a system. That forms an overall rating for each party and may influence decision of other party to interact with.

Deal Processing Example

Let's suppose Seller wants to sell smart watch worth 1 Ether on the market. He is ready to pay equivalent of 0.2 Ether for a Merchant that will help him find a customer. Seller set a value for Delivery Deal as 5% of the price.



Smart Sport Watch T1

Price after discount:

• 1 ETH

Seller should have some Qt. on his Qilin Wallet to confirm an order. Taking in consideration a proposed market value of Qt. equal to 0.01 Ether, there should be 20 Qt. on his account.

Merchant had done promotion for his website and attracted a Buyer that has browsed web right for that kind of product.

Buyer has chosen Delivery Service to do the shipment for 0.05 Ether and received a hash address with smart contract on it to pay the order. Buyer transfers 1.05 Ether to that smart contract.

To confirm the product order Seller transfers 20 Qt. Deal Deposit on the same smart. Taking product from Seller, Delivery Service transfers 50 Qt. as Delivery Deposit to the same smart contract.

Let's assume smart watch was successfully shipped and Buyer has taken them signing Delivery Service's form in fiat world that brings confirmation for smart contract through oracle.

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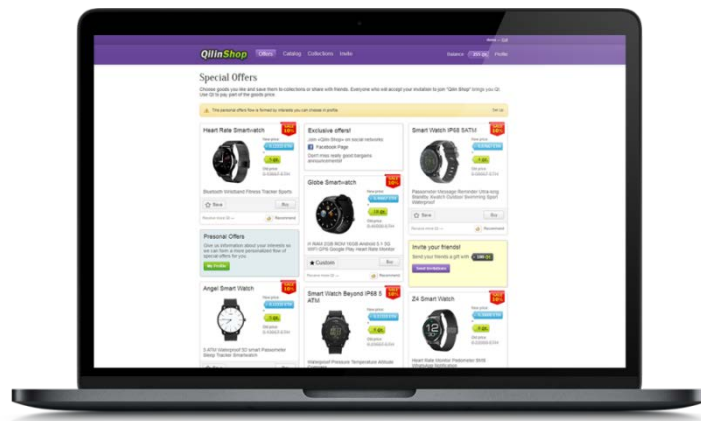
Smart contract releases 1 Ether and 20 Qt. to Seller, 0.05 Ether and 50 Qt. to Delivery Service, Buyer received his product.

Smart Contract Status Variations

Stage	Actions	Order Status
Buyer orders a product	Buyer transfers product price + delivery costs in cryptocurrency (<i>Optional</i>) Buyer pays discount on product price with Qt.	Created
Seller confirms the purchase	Seller prepares the product to be shipped and transfers Merchant reward and Deal Deposit in Qt.	Confirmed
Delivery Service books the delivery	Delivery Service transfers Delivery Deposit in Qt.	Awaiting Shipment
Delivery Service takes the product for shipment	Delivery Service oracle tells the smart contract estimated Date of delivery (for contract to check delivery status)	Shipped
Delivery Service confirms product delivery to Buyer	Release of funds: Seller and Delivery Service receive payment in cryptocurrency, Merchant receives reward in Qt., deposits in Qt. returned	Received, Accepted
Buyer refuses to accept product	Release of funds: Buyer gets his cryptocurrency back, Seller gets Merchant reward back, Delivery Service receives Deal Deposit in Qt. as compensation to send product back to Seller	Received, Rejected
Delivery Service returns rejected product back to Seller	Seller receives product back, Delivery Deposit released to Delivery Service	Rejected, Returned
Delivery Service fails to deliver the Product	Release of funds: Buyer gets his cryptocurrency back, Seller gets Merchant reward, Deal Deposit and Delivery Deposit in Qt.	Not Received

QILIN SHOP

Being a distributed immutable database aggregating offers on a global scale Qilin Blockchain can be accessed by everyone on equal terms. That way one can get the whole list of offers from all product Sellers on “Qilin.Market” and open his own on-line store to earn Qt. as reward for initiating sales.



Opening a Shop

That can be a full-featured on-line store to representing entire “Qilin.Market” offers catalog, thematic web store for certain category or selection of products, single-brand or a one-page product landing. What is more important, that can be done within a day.

ANY INTERESTED PARTY CAN CLONE QILIN SHOP ENGINE OPEN SOURCE CODE FROM GIT REPO AND START EARNING QILIN TOKENS

There is no need to change code or design, everything works fine out from-the-box. Just do some marketing or invite audience you already have on your website or social networks and get rewards for any product they order in marketplace.

Qilin.Market

Built on blockchain technology, Qilin Shop ensures transparent operations and order tracking excellence. So merchant can be sure that every customer he brings in stays recorded.

Merchants do the selections of products they would like to sell on their own. Distributed database allows almost everyone to put their product on sale.

One can even build own affiliate or CPA network on the top of Qilin Shop engine and share value of gained Qt. between pool of partners investing their efforts, knowledge and money in promotion of goods presented on the market.

The higher Merchant commission is the more interest will Merchant have to market your product and show it on the “top shelf” on its virtual showcase.

Qilin Demo Shop

Qilin Demo Shop operates as a working Merchant’s on-line shop example based on the same Qilin Shop engine to represent all offers available on “Qilin.Market”.

QILIN DEMO SHOP IS IMPLEMENTED TO INCENTIVIZE AND PROVE PROJECT MODEL

Core difference between Qilin Demo Shop and any other Merchant’s shop built on the base of the same sources is that Qilin Demo Shop is not receiving any Qt. as a reward. Instead of that, it allows customers to get discount for product prices listed in “Qilin.Market” with Qt., those Sellers set as a Merchant rewards.

QILIN DEMO SHOP NOT TAKING QT. AS INTEREST, IT **BURNS QILIN TOKENS INSTEAD.**

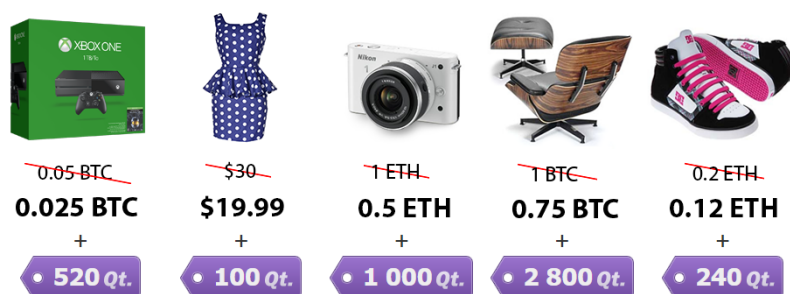
That, in one way would allow Sellers to get instant access to global community of Qt. owners (see Roadmap, “Incentivization” Phase) and make no competition to independently operated Merchant’s shops as customer need to have a Qt. to buy from Qilin Shop.

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Moreover, it will makes spiritual connection with real product price and Qt. cost that helps to maintain Qt. course stability.

Discounts with Qt. for Real Products

Qilin Token's (Qt.) ability to pay part of the product price works like discount model enabled by Merchant's reward.



As Qilin Demo Shop not taking any Qt. as a reward, it just burns Buyer's Qt. to offer a price in cryptocurrency without the current value of Merchant reward named by Seller. That results in receiving less cryptocurrency to Seller wallet but leaving Merchant reward on the Seller account when sold in Qilin Demo Shop with such a discount.

Let's see how it works on a sample. Let's suppose Seller wants to sell smart watch worth 1 Ether on the market. He is ready to pay equivalent of 0.2 Ether for a Merchant that will help him find a customer. Taking in consideration a proposed market value of Qt. equal to 0.01 Ether.

Buyers finds an offer on Qilin Demo Shop and already have 20 Qt. on his account. That way he can use 20 Qt. to receive a discount of 0.2 Ether on product price, so pay only 0.8 Ether to get a product. So, seller receives 0.8 Ether and received back his 20 Qt. send as a Merchant reward that are equal to 0.2 Ether (1 Ether for the whole product price in sum).

Qilin Shop Development

We believe the sole purpose of Qilin Demo Shop is to demonstrate how system works and prove the concept of decentralized global marketplace in real e-commerce field. Being developed by project team, we assume it will be an independent shop on the Stage C of project development.

Qilin.Market

ADVANTAGES

Distribution and smart contract approach offer significant advantages over traditional, centralized marketplace:

- ✓ **No middle man**
Payments are made directly between the buyer and seller through smart contract which replaces the “trustless” middleman
- ✓ **Less costs**
Lower fees and cheaper prices since the cost of a third party has been cutout
- ✓ **No fraud**
Guarantees fraud unprofitable for all sides of the deal, also eliminates fraudback charges (when buyer makes a credit card purchase and reverses the charge)
- ✓ **No exit scams**
No one owns the money while product is not shipped and no one can profit from scamming the opponent. Funds are released automatically depending on the real result of the deal.
- ✓ **Open market**
Absolute transparency for all market participants gives sellers freedom to specify their own terms and conditions to offer good bargains for customers
- ✓ **Convenient transactions**
Fully automated contracting excluding any paperwork along with increased speed for international transactions.

For Product Sellers

BOOST SALES WITH **5.8+ MILLIONS** CRYPTOCURRENCY WALLET OWNERS!

- ✓ No chargebacks;
- ✓ No service commissions, near to zero transaction fees (fractions of dollars);
- ✓ Payments are made directly between the buyer and seller, no middleman involved;
- ✓ Every deal secured by reliable and transparent smart contracts on Ethereum blockchain;
- ✓ Lower prices for customers since the cost of a third party services has been cutout;
- ✓ Fully automated agreements using smart contracts excluding any paperwork;
- ✓ Easy-to-start, no set up fees
- ✓ Getting direct access to worldwide buyers through the motivated Shops that market products (CPA model)

For Customers

PAY WITH YOUR FAVORITE CRYPTOCURRENCY FOR REAL GOODS YOU NEED

- ✓ No need to convert cryptocurrency to fiat for buying goods in the real world;
- ✓ 100% money back guarantee by smart contract;
- ✓ Lowest prices possible directly from product seller
- ✓ Trustless smart contracts guarantee transparency of the deal;
- ✓ No hidden fees.

Qilin.Market

For Delivery Services

LOTS OF ORDERS FROM CLIENTS IN ANY
REGION OF THE WORLD

- ✓ Smart solution for automated delivery;
- ✓ Constant flow of orders;
- ✓ Almost instant international transactions;
- ✓ Safe from reputation attacks;
- ✓ No funds hold;
- ✓ No commissions.

For Marketing Partners

ESTABLISH YOUR SHOP IN MINUTES AND
START EARNING ON PRODUCT SALES

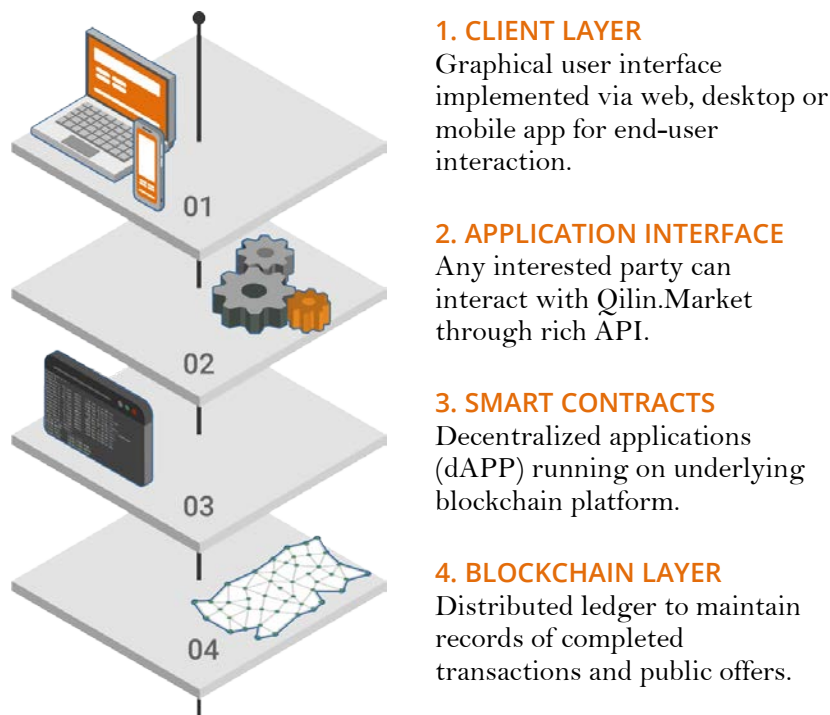
- ✓ Full-featured shop engine integrated in global offers database on your disposal as an open source project;
- ✓ Effective conversion of any audience loyal to cryptocurrency and breakthrough technologies;
- ✓ Reasonable prices means less effort to lead an order;
- ✓ Increased profits since the cost of a third party has been cutout;
- ✓ No organic traffic hacking (no more cookie wars).

TECHNOLOGY

Invention of distributed ledger technology enrolled lots of great opportunities and a bunch of hype. Here in “Qilin.Market” we do not want to put excess data in blockchain just to support the hype. Thought there are two certain things that can’t be done without it – the secure escrow based on smart contracts and trustless operations ledger for token and cryptocurrencies transactions.

Implementation Layers

Here’s how we utilize these technologies within 4 layers:



“Qilin.Market” is a complex software development initiative intended to build a protocol for worldwide decentralized marketplace layer-by-layer and should be treated as such.

Qilin.Market

Development Stages

Stage A (Alpha) — Minimal Viable Product

At the moment “Qilin.Market” operates as a working prototype of marketplace with ability to receive discounts with Qilin Tokens (Qt.). Most elements implemented on centralized platform, code is not open sourced at this stage.

Stage B (Beta) — Smart Contracts Deal Escrow

At the first stage of development “Qilin.Market” will run as dApp (decentralized application) on Ethereum blockchain. Distributed ledger is used to record all transactions between users within smart contracts execution.

There is a reason to put every transaction on a public ledger to ensure that settlements between parties are handled safely and transparently.

We believe that Ether is the most convenient digital currency nowadays for on-line payments execution due to:

- Being almost as popular as BTC
- Much less volatile than BTC
- Easy to exchange for any other currency
- Have liquidity being a fuel for most ICO
- Lower transaction fees

Keeping in mind that Ethereum may be under significant load pressure, we are in constant research for the new solutions to operate a distributed ledger with faster block creation time and lower transaction costs.

Nevertheless, due to constant improvements Ethereum is still the most convenient environment to build and run a dApp.

Main target on that stage is to set up and maintain the system, establish healthy and reliable environment for creating deals. Data storage would be still operated in a centralized manner. Only a single shop would be running at this stage. That will help us tune up the process and proceed to further stages.

Qilin.Market

Stage C (Gamma) — Decentralized Offers Ledger

In order to provide open access to all product offers they would be published on public blockchain. Any third party can clone Qilin Shop code or build their own on-line store working with open Qilin Blockchain to sale goods on a global scale.

Ability for any Seller to add offers directly to Qilin Blockchain makes it a real challenge for the system.

We recognize that personal information does not have to be shared in public blockchain, so there would be secure place on Merchant's side to keep it protected with their private keys.

That stage allows us to receive prove-of-concept, tune up the whole process and proceed to final stage of decentralization.

Stage D (DAO) — Fully Distributed & Autonomous

Fully autonomous decentralized marketplace runs by its users who record every action on a public ledger. Merchants become core part of "Qilin.Market" infrastructure responsible for mining blocks and receiving Qt. as a reward for sales.

IFPS (InterPlanetary File System) analogue or direct Peer-2-Peer solution may be used in order to keep distributed files representing product details (rich description and pictures).

At this stage Qilin Foundation is no more have control over the operations in "Qilin.Market". Further development of project open code is upon the community will or sole profit of market participants.

SPECIAL NOTICE

WE WANT TO MAKE IT CLEAR FROM THE VERY BEGINNING THAT BIENG AN OPEN SOURCE DEVELOPMENT INICIATIVE THERE WE HOLD A RISK THAT OUR TEAM WILL NOT FIND SUPPORT TO GO THROUGHT ALL THE STAGES OF PROJECT DEVELOPMENT. THERE WOULD BE A DOCUMENT ISSUED DEMONSTRATING RELATION OF CONTRIBUTION SIZE TO DEVELOPMENT STAGES.

Qilin.Market

QILIN TOKEN

Token Description

All arrangements within «Qilin.Market» between parties are made with Qilin Tokens that acts like cryptocurrency and can be held or transferred with any ERC20 compatible wallet.

Qilin Token (Qt. or QILIN) — digitally signed right to claim “Qilin.Market” services used to maintain settlements and as a guarantee deposit for completing deals.

CORE CHARACTERISTICS

- 100% utility functions – acts as fuel for setting up operations on smart contracts within the blockchain;
- Not a share, not an equity, not a security, not a loan;
- Is not an investment, does not guarantee any profit;
- Involved in constant circulation flow between parties forming a need of Qt. exchange on external services.

Qilin Token exchange is required by the very concept of the project to grant operations between market participants. This is not intended to or designed for operations of speculative nature.

LEGAL NOTICE

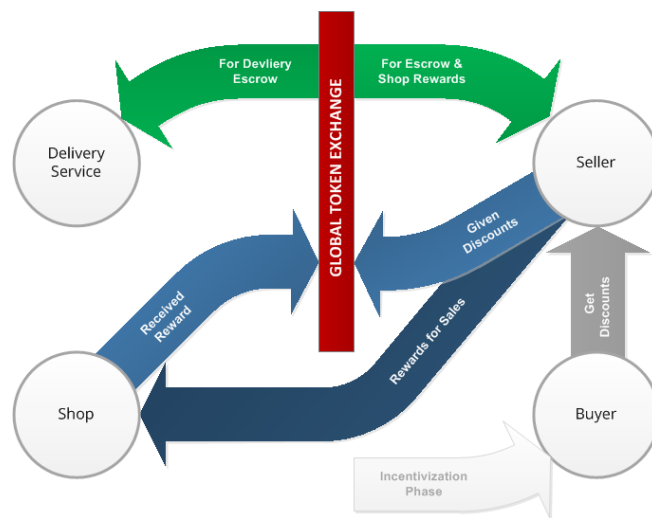
QILIN TOKEN (QT.) IS A SOFTWARE ACCESS LICENSE DISTRIBUTED ON CONDITIONS OF OPEN ON-LINE PUBLISHED OFFER. IT CAN BE SOLD, DONATED AND EVEN INHERITED. “QILIN.MARKET” MODEL IS DESIGNED TO BE FULLY COMPLIANT IN EVERY JURISDICTION IT OPERATES IN, THAT INCLUDES STRICT KNOW YOUR CUSTOMER AND ANTI-MONEY LAUNDERING (AML) PROCESSES. PLEASE BE INFORMED THAT KYC AND AML PROCEDURES IS OBLIGATORY FOR ALL MARKET PARTICIPANTS.

QILIN TOKEN DOES NOT REPRESENT ANY KIND OF SECURITY, LOAN, COMMODITIES, SWAPS, OWNERSHIP OR INTEREST.

Qilin.Market

Token Economy

“Qilin Market” model creates a constant circulation of Qt. between all market participants: Sellers need Qt. to confirm new orders and reward Merchants, Delivery services need Qt. to deposit an escrow, Merchants receive Qt. as a reward from Sellers, Buyers may receive discounts in exchange of tokens. This meant to be a tremendous organic flow that should be held within an external stock exchange service.

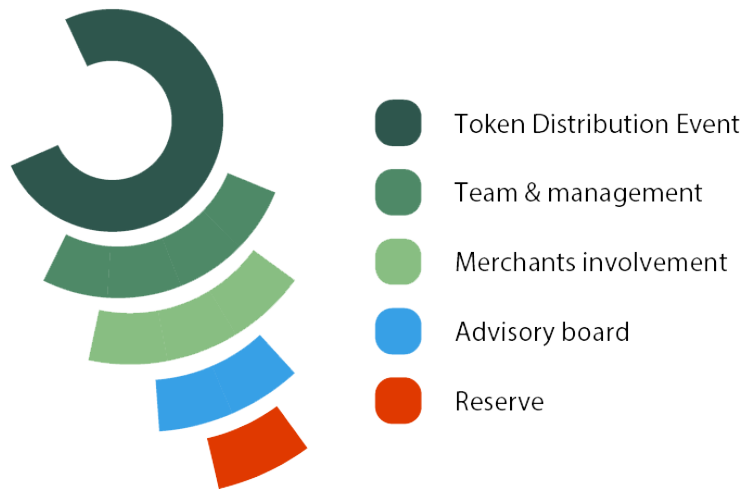


Sellers	Customers	Delivery	Merchants
Buying Tokens to: <ul style="list-style-type: none"> Reward Merchants for product sales Reward Buyer to rate product Cover deal deposits 	Receiving Tokens: <ul style="list-style-type: none"> During initial phase For reward from Merchants Getting Tokens to: <ul style="list-style-type: none"> Get discounts 	Buying Tokens to: <ul style="list-style-type: none"> Delivery deposits Selling Tokens to: <ul style="list-style-type: none"> Cover costs of returns from received Deal Deposits 	Selling Tokens received from Merchants as a reward to maintain operation costs

Being an open ecosystem, “Qilin.Market” platform operators do not have reason to limit or manipulate tokens circulation. Issued initial amount of Qilin Tokens have a sole target to incentivize marketplace being traded on open exchanges.

Qilin.Market

Token Distribution



- **70%** - to be distributed* during:
 - Token Generation Preorder
 - Token Generation Event
 - Incentivization Activities
- **10%** - Team and management rewards;
- **10%** - Merchants involvement budget;
- **5%** - Advisory board;
- **5%** - Reserved to maintain stability.

Undistributed Tokens

All undistributed Qilin Tokens during Token Generation Event will be released on public stock exchanges with price rising for each next batch of 1 Million Qt. determined by formula:

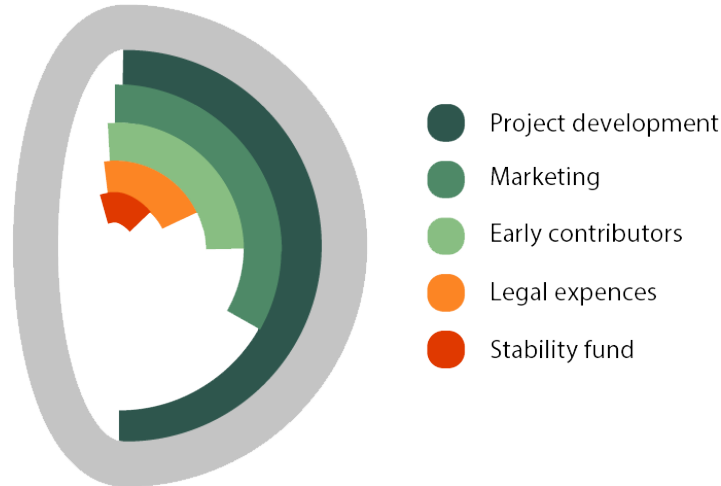
$$f(x,n) = \frac{(\sin(\frac{x \times \pi}{2 \times n} + \frac{\pi}{8}))^{\ln(n)}}{n \times \sin(\frac{x \times \pi}{n} + \frac{\pi}{2})}$$

That makes every next Qt. price to be a bit higher than previous one. That is done in order to maintain stable Qt. market value without volatility on public exchange markets.

Qilin.Market

Funds Allocation

Preliminary* scenario of funds allocation accounted for one-hundred-percent fulfillment of Token Distribution Event.



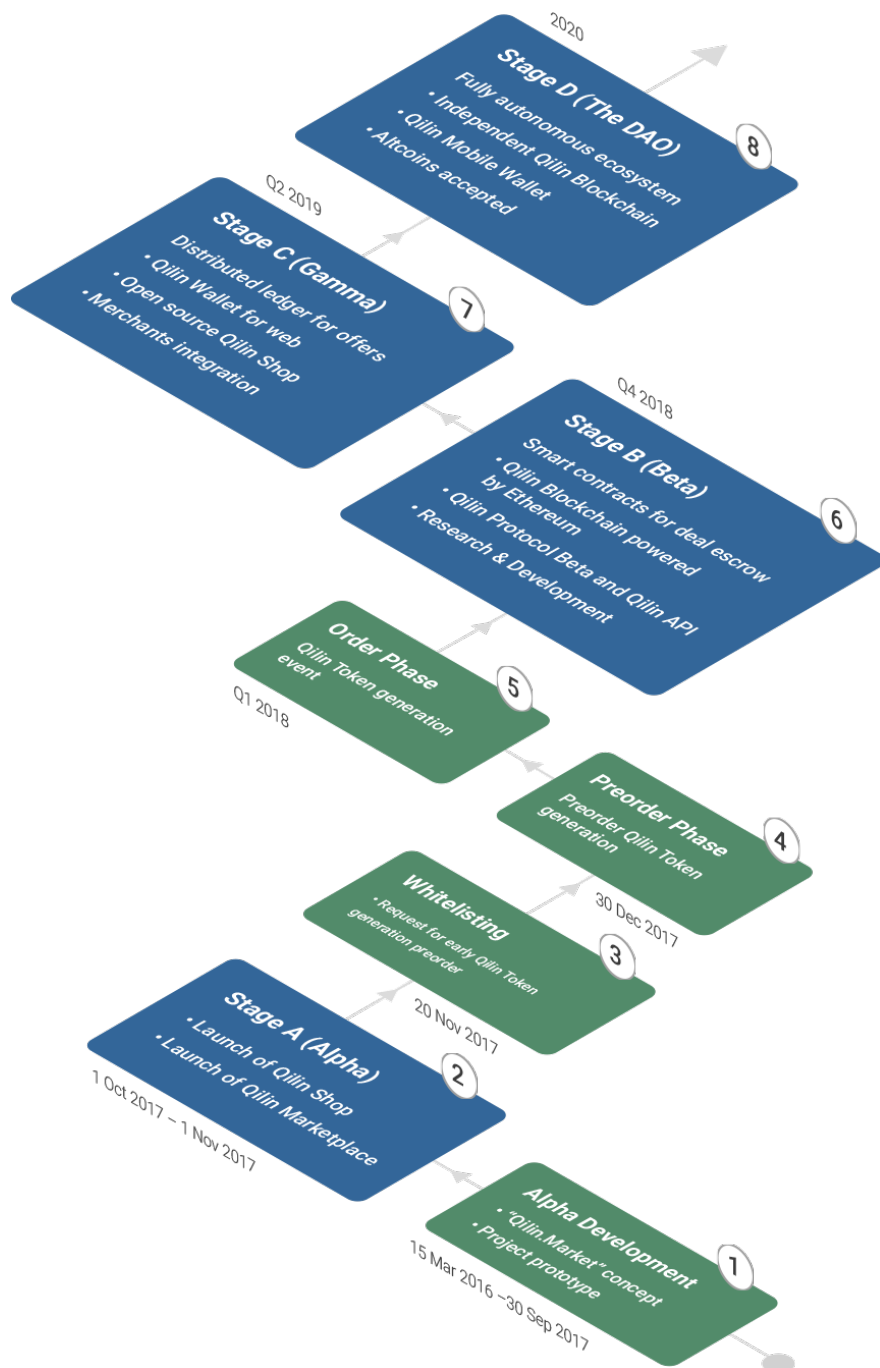
- **50%** - Development plan execution, including:
 - R&D, platform development, tests;
 - HR, operational expenses, office, equipment;
 - Presence on global summits and conferences.
- **20%** - Marketing activities and initial promotion;
- **15%** - Early contributors (return of seed investments);
- **10%** - Legal expenses;
- **5%** - Stability fund.

* — certain proportions for funds allocation could be changed depending on results of Token Distribution Event.

Distribution Terms

Certain Qt. distribution conditions would be announced prior to Token Generation Event start. Please subscribe to official newsletter on project website or join us on Facebook, Twitter, Medium or Telegram to stay informed. We will also make announcements on updates of Whitepaper.

ROADMAP



Qilin.Market

RISK FACTORS

We understand that things never go the way they planned, especially when it comes to predictions for three to five years.

Each contributor or project user should be informed that:

1. “Qilin.Market” may not reach the roadmap targets and may not have sufficient funds to execute its development plan.
2. “Qilin.Market” may not succeed in creating the necessary momentum and acceptance for the Qt. which may result in low liquidity and depletion of market share.
3. Digital currencies are extremely volatile and Qt. may suffer from said volatility. Qt. may be significantly influenced by digital currency market trends and its value may be severely depreciated due to non-related events in the digital currency markets.
4. Decentralized marketplaces may be coming under global or local regulation that may limit the use of Qt. for trading.
5. Competition may introduce the same or better model for global goods trading and cause “Qilin.Market” to lose users, market share and eventually fail to deliver on its business goals.
6. The ownership of Qt. may fall under new and unpredicted taxation laws, the use of Qt. may come under the scrutiny of governmental institutions.
7. “Qilin.Market” is a complex software platform and its launch may be significantly delayed due to unforeseen development barriers. As with any software, bugs will be found.

We have prepared three basic scenarios in case “Qilin.Market” approach would not meet market needs. If some happens, we will try to implement one of offered decisions in order to keep project going and maintain the value of issued tokens.

SCENARIO A.

- ★ No real demand for purchases in crypto
or
- ★ No Sellers interested in getting crypto

Paid by fiat money, each purchase in fact converts product price to Qt. (bought automatically on any exchange) to be used on smart contract for deal escrow that makes in convenient for organizing reliable international deals – every seller can easily convert Qt. to his currency on local exchange when funds would be released. This model can be applied both to B2C and B2B sectors.

SCENARIO B.

- ★ No global delivery service interested in new orders

Being a major catalog for all goods sold in cryptocurrencies is also a great way to support crypto-commerce growth, regardless the using of feature for smart contracts escrow there would be still an interest for Sellers to spend Qt. on promoting their products. Acts like classic CPA model on blockchain that guarantee transparency of transactions for all sides, Qt. circulation is still a necessity.

SCENARIO C.

- ★ Major marketplaces (like AliExpress or eBay) involved the same approach

Regardless sluggishness of big corporations, most of them learned lessons and are involved in testing blockchain technologies for practical implementation on their markets. We understand that what can be a huge attainment for a fresh start-up is just a one little step for a giant. In this case “Qilin.Market” will take best of its autonomous ideology to bring C2C markets a reliable solution for peer-2-peer trade. In such a case Qt. are involved in promotion of offers as well as being a non-volatile fuel for transactions.

Qilin.Market

DISCLAIMER

THE POSITIONS AND PLANS OUTLINED IN THIS DOCUMENT MAY BE ALTERED AS THE PROJECT PROGRESSES. NUMBER OF CURRENT DOCUMENT VERSION SET ON THE EVERY PAGE. THE ONLY ACTUAL VERSION OF DOCUMENT IS AVAILABLE ON OFFICIAL PROJECT WEBSITE: [HTTP://QILIN.MARKET](http://qilin.market)

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AGREEMENTS STATEMENT

BEING A SELLER POSTING PRODUCT OFFERS ON SALE, OR A BUYER TRANSFERRING FUNDS, OR A DELIVERY SERVICE TAKING ORDERS, OR A MARKETING PLATFORM YOU'RE RESPONSIBLE FOR YOUR OWN ACTIONS ON THE "QILIN.MARKET", YOU ARE INFORMED AND RECOGNIZE ALL THE RISKS OF WORKING WITH DIGITAL ASSETS AS ESTIMATION OF VALUE FOR EXCHANGES IN NETWORK.

AGREEMENT CONCLUDED WITHIN "QILIN.MARKET" CAN'T ABSOLUTELY REPLACE LEGALLY SIGNED CONTRACTS BETWEEN REGISTERED JURISDICTIONS OF THE PARTIES AS OPERATIONS IN CRYPTOCURRENCIES ARE NOT SUBJECT TO ANY LAW OR REGULATIONS.

WE STRONGLY RECOMMEND ALL THE PARTIES TO SIGN PAPER DOCUMENTS CONFIRMING TERMS ON WHICH THEY CONCLUDED DEALS WITHIN "QILIN.MARKET".



DISTRIBUTED AUTHORITY FACTOR

OPERATING WITHOUT ANY CENTRAL ORGANIZATION CONTROLLING THE PLATFORM MEANS EVERY PARTICIPANT IS RESPONSIBLE FOR HIS OWN ACTIVITY ON THE NETWORK.

ALL PLATFORM USERS SHALL ACCEPT THE FACT OF POSSIBLE IMPERFECTION OF THE DISTRIBUTED LEDGER TECHNOLOGIES.

PROJECT TEAM WORKS HARD TO DELIVER A PLATFORM TO TRADE ON A GLOBAL SCALE, THAT THOUGH CAN'T PROTECT USERS FROM A NUMBER OF RISKS THAT MAY ARISE DURING LAUNCH OR EXPLOITATION OF THE PLATFORM.

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TAXES NOTICE

WHILE CRYPTOCURRENCIES AREN'T REGULATED, AND TRANSACTIONS ARE — TO A CERTAIN EXTENT — ANONYMOUS, ANY KIND OF DIGITAL ASSET STILL HAS AN EQUIVALENT IN REAL CURRENCY. BECAUSE OF THAT, IT IS SUBJECT TO TAX ALMOST IN ANY JURISDICTION THOUGH TAX LAWS MAY VARY, DEPENDING ON YOUR LOCATION AND BUSINESS TYPE. YOU NEED TO KEEP A RECORD OF CRYPTOCURRENCIES TRANSACTION AND REPORT YOUR REVENUE TO THE GOVERNMENT. YOU MAY ALSO WANT TO CONSULT WITH A TAX EXPERT (IDEALLY SOMEONE WHO HAS EXPERIENCE WITH CRYPTOCURRENCIES) IN ORDER TO ENSURE YOUR TAXES ARE FILED PROPERLY.

TAXPAYERS MUST DETERMINE THE FAIR MARKET VALUE OF THE VIRTUAL CURRENCY AND THEN REPORT THEIR INCOME. TAXPAYERS MAY HAVE TO DEAL WITH PENALTIES IF THEY FAIL TO COMPLY WITH LOCAL TAX LAWS.



CONCLUSION

“QILIN.MARKET” IS ABOUT TO GENUINELY DISRUPT THE WAY E-COMMERCE IS GOWERNED AND OPERATED

We believe that the main purpose of cryptocurrencies on a long distance is to make payments, mainly for selling goods and services. We also believe that today's lack of legal framework for regulating cryptocurrencies will be solved in the near future and “Qilin.Market” will become the primary engine driving crypto-commerce market.

Being focusing on the emerging marketplaces of Asia and the Middle East, we plan to help 500 millions of unbanked to make their first purchase on-line with reliable digital assets.

We hope that anyone can become a seller on Qilin Marketplace, so it can become a major aggregator for B2C and C2C formats. As there are no limits on volumes, we assume that some deals can be done in B2B sector as well.

We recognize our global mission in increasing interest and demand for everyday usage of cryptocurrencies at large. Help us by joining the e-commerce revolution today – contribute one of the most promising projects of crypto-century!

Qilin.Market