

Cryptomiles: A Peer to Peer Electronic System for the Creation and Transfer of Travel Loyalty Bonuses

Cryptomiles Foundation

www.cryptomiles.club

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Cryptomiles is a use-case focused blockchain designed for the creation and transfer of Travel Loyalty Bonuses. Thank you to the Bitcoin and Ravencoin founder and developers. The Cryptomiles project was launched based on the hard work and continuous effort of over 500 Bitcoin and Ravencoin developers who made over 16,000 commits by the date of the Cryptomiles code fork. We are eternally grateful to you for your diligence in making a secure network and for your support of free and open source software development. The Cryptomiles project is built on the foundation you provided.

Abstract. Cryptomiles (CML) is a blockchain and platform optimized for transferring Travel Loyalty Bonuses (TLB) from one holder to another. Based on the extensive development and testing of the UTXO model of the Bitcoin protocol, Cryptomiles is built on a fork of the Ravencoin code. Key changes include a block time of 8 seconds, a change in the number of coins issued and the addition of TLB creation and transfer capabilities. Cryptomiles is a free and open source. All Cryptomiles are fairly issued and mined publicly and transparently using Proof of Work (POW) using the x16r algorithm which was created by Ravencoin. The new concept of TravelNodes is implemented to involve real travel businesses and help to build Cryptomiles network.

1. Introduction

The main goal of the Cryptomiles coin is to create a Travel Loyalty Bonuses (TLB) focused blockchain and build strong peer to peer network of travel suppliers and their customers. Travel suppliers are called TravelNodes and represent real-world travel companies, such as airlines, hotels, car rentals, taxi, tour operators, travel agents etc. Travel customers are all tourists in the world who pay for these services. We clearly understand that it's too early to speak about full-scale use of cryptocurrencies for making payments for touristic services, but we believe that now is the right moment to use crypto for creating and transfer derivatives such as Travel Loyalty Bonuses.

Today world travel market size estimation is 1,35 trillion dollars per year. The typical rate of loyalty cashbacks (commissions and bonuses) in the travel industry is 10%. Our realistic goal is to upgrade most progressive 0,1% part of these travel cashbacks and transfer is to crypto space. We pretend to transform and digitalize 135 million dollars Travel Loyalty Bonuses market share.

2. Travel Loyalty Bonuses Protocol Level System

The solution is to create a Ravencoin-like system ([2], [3]) with usage of coins for TLB and assets for TravelNodes registration and TLB requests.

In our system main actors are TravelNodes (Travel Supplier Business such as airlines, hotels, car rentals, taxi, tour operators, travel agents etc) and travel customers (tourists, private persons).

TravelNodes

TravelNodes (TN) are travel suppliers, which provide services for their customers in a usual way and guarantee that every customer will achieve TLB bonus after his order will be finished. Bonus must be paid in CryptoMiles coin (CML) and the initial value for bonus is 10% of its USD price. For example, if you buy an air ticket for 745 USD, you should get 74,5 CML bonus. To achieve this goal we present the new conception of regular Sunday Airdrops for registered TravelNodes with 45% of total emission CryptoMiles coin (189 000 CML for all TravelNodes per week). The equal part of coins (189 000 CML per week) is reserved for miners who support the network. At the first stage to register your TravelNode you should write an email with your CML wallet address to CryptoMiles Foundation's info@cryptomiles.club from your official email corresponding your domain of main travel site, e.g. info@iberia.com. We check info to ensure that everything is right and include your new TravelNode in the registry by issuing new corresponding sub-asset in the blockchain. It will be belonging to one pre-allocated root assets depend on the category of your company: AIRLINE, HOTEL, TOUROPERATOR, AGENT, etc, in our example it will be AIRLINE/IBERIA.COM. We will send this asset to your CML address so every customer can get all needed important information about each TravelNode in blockchain: presence in the system of this real verified supplier (bonuses guaranteed), his website address and his CML address for bonus request. Each registered TravelNode has a significant reward - part of the total week 189 000 CML TN budget and therefore highly motivated to be a member of the network.

Travel Customers

Each travel customer can get a 10% CML bonus from USD price of his real completed order from any TravelNode registered supplier. He should make the main asset for himself for every future request for bonuses, e.g. MR.SATOSHI and then create the unique asset, corresponding to his explicit order he wants to get the bonus with the order number, start service date and its fully paid USD cost, e.g. MR.SATOSHI#123456.190102.745. After creation, a customer sends this unique order asset to TN CML address stored in the blockchain. This order asset transfer is a customer request for getting a bonus from the supplier by his order. TravelNode should reply during 1-3 working days by sending 10% CML bonus to a customer address (and burn order asset by sending it to special address) or by sending order asset back if he declines bonus payment by a different reason.

References

- [1] S. Nakamoto, "Bitcoin: A Peer-to-Peer Electronic Cash System
<https://bitcoin.org/bitcoin.pdf>
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- [4] T. Black, J. Weight "X16R" Algorithm White Paper
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