



800063 - Carbon Marketplace and Exchange
(F8: DApps and Integrations)

1. Stated problem

Carbon tokens without a dedicated, vibrant marketplace will remain niche, held back by self-serving legacy institutions and inertia.

2. Proposed solution

Trading and staking of carbon tokens backed by a trusted custodian allows liquidity to develop before full decentralization can be achieved.

3. Why the solution cannot solve the problem

Three months after we submitted this proposal, voluntary carbon registry market leader Verra blocked tokenization of its carbon credits, all but removing the business case for the leading EVM ecosystem carbon credit tokens such as Moss (MCO2) and Toucan (BCT and NCT).

<https://www.spglobal.com/commodityinsights/en/market-insights/latest-news/energy-transition/052522-as-verra-halts-tokenization-of-carbon-credits-toucan-vows-to-keep-web3-ethos-alive>

Since then, amid legal limbo and unsuccessful attempts to pivot or redefine business cases, nearly 100 million dollars in market value has been destroyed for blockchain carbon investors despite crypto assets market cap rising over 40% during the same period. Mandatory carbon markets around the world have seen volatility, but largely held their value.

(Based on data from <https://coinmarketcap.com/charts/> between 22/2/27 and 23/12/31 (Moss MCO2 (10.74-1.32) * 2850000, Toucan Base BCT (3.86-0.29) * 17740000, Toucan Nature NCT (7.77-0.96) * 1296733).

In November last year, the most popular and widely held token Moss was withdrawn from trading by Coinbase.

Over the same period, Estonia has cracked down on crypto fintechs offering financial services, increasing capital requirements and reporting obligations and increasing maximum fines for violations over 100-fold.

In our opinion, pushing ahead with the marketplace as proposed while technically feasible would not add to the overcrowded landscape for trading venues and marketplaces and contribute very little to innovate carbon tokenization and innovation for trading Real World Assets (RWA).

4. Changes proposed: How the grant can be put to better use and new Budget

Trading infrastructure exists in many shapes and forms, with varying degrees of open source code and decentralization. Choosing and setting up a marketplace is therefore relatively easy. To successfully bring tokenized carbon credits to Cardano, far more research into RWA mechanics, governance, legal framework and sources of liquidity is needed while carrying out thorough risk management analysis into tokenomics and redemption to prevent avoidable investor losses. Fixed Income asset tokenization has experienced high growth and provides a useful template:

<https://cointelegraph.com/news/why-tokenized-real-world-assets-are-soaring>

Previous Project Budget

Grant awarded \$64,100 in Fund-8. Market Place research, setup and work delivered since 06/2022

Development cost	6625
Legal advice	4300
Research	2400
Entity / business	
services	2200
Project management	2750
	18,275 \$

New Project Deliverables and Budget

(a) Publish comprehensive Carbon market report and whitepaper discussing necessary steps to tokenize voluntary and mandatory credits.

150 hours @75/h (market rate) =

\$11,250

(b) Repository of UTxO trading infrastructure: extensive summary report and discussion of previous market venue related grants, known publications and open source projects for example Catalyst OSDE, Github Codebase and DEXes

100 hours @75/h =

\$7,500

(c) Documentation and recommendations for all Jurisdictions suitable for tokenization and hybrid exchange suitable for carbon custodial services and “hybrid” marketplaces.

150 hours @75/h =

\$11,250

and Consultation with financial services, securitization and KYC legal experts =

\$7,500

\$55,745

(original budget \$64,100)

Delivery estimated to be within 3 months of Change Request Approval.