

# **Submission to the Gold Standard Consultation Paper- Conditions for consenting to tokenisation of Gold Standard-issued credits**

**Prepared by TYMLEZ**

We appreciate the opportunity to make a submission to the Gold Standard Consultation on “Conditions for consenting to tokenisation of Gold Standard-issued credits”. We broadly support the intent of the Consultation paper to provide consent to organisations for the creation of digital tokens related to Gold Standard credits.

TYMLEZ is a sustainability focused enterprise-grade solutions provider that deploys leading software applications which leverage blockchain technology. The Company is focused on supporting clean energy and sustainability initiatives, along with other opportunities to develop products that rely on secure, trackable and traceable data transfer.

Kind Regards

## GENERAL QUESTIONS

- Do you agree that Gold Standard should explore and enable organisations to create digital tokens representing Gold Standard credits, using blockchain technology? Why?

We support the Gold Standard move towards creating digital tokens using blockchain technology. The tokenization of carbon credits improves liquidity and removes barriers to entry for those unable to gain licenses to trade on closed markets. Blockchain technology helps to issue, distribute and price the tokenized carbon credits in a secure and transparent manner. Blockchain technology can be used to ensure the quality of carbon credits. Assessing and ensuring the quality of carbon credits is challenging in practice and requires considering many different criteria. The quality of a generated carbon credit can be affected by several factors, such as the robust impact of GHG reduction actions, avoiding double counting, facilitating transition toward net-zero, and avoiding non-permanence. Blockchain provides a trustable environment that ensures the quality of carbon credits. The inherent transparency of blockchain is helpful for end-to-end digital verification of carbon credits to ensure their integrity and quality. The market settlement process in carbon markets includes different steps, such as issuance, clearing, settlement, and custody, and blockchain can assist with all of these steps. Through a blockchain-based platform, tokenized credits can be generated, which can help with increasing the liquidity of carbon markets by allowing the trading of fungible tokens, which makes the unit size of purchase flexible. The blockchain-based marketplace enables instant clearing, settlement, and verification of many transactions. Moreover, blockchain provides an immutable secure recordkeeping system for carbon credits, transaction history, and ownership.

- Do you consider there to be potential advantages or disadvantages for your organisation if this were enabled?

The potential advantage for our company would be the inclusion of Gold Standard as a unit of account for our environmental projects, this would increase liquidity of these credits for participants who wish to work with Gold Standard.

- Would you like to share any additional comments not covered by questions included in this consultation?
- Do you consider there to be uses of blockchain technology that should be distinguished and treated differently from others?

Yes, the simple tokenisation of an asset should not be a barrier to Gold Standard's methodology if simple rules and systems are put in place to allow for the validation of these credits in a transparent way. If anything, the inclusion, within the tokenisation of the credit, of publicly verifiable data would provide GS with a level of validation above and beyond those of more opaque models. As an assurance layer it can provide benefits that are only possible through centralised trusted systems right now.

## 1. MODEL

- Do you consider the custodial account model to be workable in the short-term while other solutions are explored?

We support the Gold Standard custodial account model for short-term implementation. The custodial model has some advantages, which make it easy to implement. The main advantage is that the Gold Standard has more control over the tokenization process. However, it is not the best option for the future of credit tokenization as it makes the process complex. Moreover, it hinders unlocking blockchain technology's true values, such as decentralization.

- Do you consider it appropriate for Gold Standard to explore 'native tokenisation' in the future?

Native tokenisation provides an excellent opportunity to progress on the demand side of the market and integrate it with a more efficient and transparent marketplace that can further increase trust and enable scalability. Creation of on-chain representations of Gold Standard credits using blockchain technology which can help with increasing the liquidity of carbon markets by allowing the trading of fungible tokens, which makes the unit size of purchase flexible.

- Would you like to share any additional comments on this topic?  
No answer.

## 2. HOLDING, RETIREMENT AND REPORTING

- Do you consider these proposals to be workable and proportionate?

Yes, the suggested methodology seems workable and proportionate

- What do you consider to be an appropriate timeframe in which retirements must be made on the Gold Standard Registry, following their retirement on a third-party platform?

Immediately, and in advance of the retirement happening on the third-party system and with a blockchain state proof provided as "proof of burn".

- We are aware that some organisations may wish to create and market tokens that represent fractional portions of one carbon credit. Do you have experience or ideas for how requirements may need to vary in such cases, for instance related to retirement in the Gold Standard Impact Registry?

The importance of maintaining clear MRV's encoded within the tokens makes splitting

this difficult, tokenisation should be done at the level of granularity of the underlying asset itself.

- Would you like to share any additional comments on this topic?

### 3. POOLING

- Do you think that Gold Standard should consider restrictions on the ability of organisations to pool its issued credits with credits from other standards. Why?

Carbon credits should, as far as possible, be interchangeable to satisfy obligations between market participants to transfer carbon credits. We believe that pooling carbon credits that meet certain eligibility criteria and using a generic token is a good practice to improve market liquidity and to facilitate carbon credit trading. However, it should not be done without considering the quality of the issued carbon credits. Low-quality offsets on the market are unexceptional and result from various practices ranging from negligent to duplicitous. The buyers of carbon credits need to know about the quality of the credits they buy, and all credits are not the same.

- If the answer to the above question is yes, do you have views on how any restrictions could operate?

Credits differ in price based on project charisma and potential for marketing, project type, location, and co-benefits beyond climate impact that match with buyers' preferences. If the pooling of credits is allowed, there should be a mechanism to transfer the relevant data with each token and reflect the quality of tokens in their pricing.

- Would you like to share any additional comments on this topic?

### 4. DUE DILIGENCE

- Is it sufficient for organisations intending to create original on-chain representations of Gold Standard credits to undergo our existing KYC checks, or should further due diligence requirements be introduced? If so, for whom?

The existing checks are sufficient and cover the requirement for due diligence.

- Do you think that Gold Standard should introduce requirements related to the due diligence checks that organisations creating digital tokens representing Gold Standard credits apply for their own users?

No.

- Are there examples from other sectors that you believe could be learned from?

- Would you like to share any additional comments on this topic?

## 5. SUSTAINABILITY

- Do you agree that Gold Standard should apply restrictions related to the emissions footprint of blockchain technologies?

Yes. We support the Gold Standard position on the sustainability of blockchain for offset tokenisation. Several low emission blockchain platforms can be used for carbon credit tokenisation.

- Do you consider these proposals to be workable and, if not, why?

No. Instead of restriction on the mechanism, there should be a limit on the emission per transaction as part of the selection criteria for supported blockchains.

- Do you consider these proposals to be sufficient and, if not, why?

Yes, but there should be clear rules on the offsetting of blockchain emissions. The employed platform for the tokenization should be low emission without relying on carbon offsetting.

- Are you aware of, or would you recommend, a benchmark that Gold Standard could use to determine whether blockchain technologies have a sufficiently low emissions footprint for consent to be granted?

We recommend using the method developed by UCL Centre for Blockchain Technologies team<sup>1</sup>. They have developed a mathematical consumption model that predicts expected energy consumption per transaction, as a function of network load.

## 6. DATA SECURITY

- Do you agree that Gold Standard should either introduce conditions or require information related to the IT security measures that an organisation is taking to protect data against breaches?

One size will not fit all here. We believe the existing security based on the Gold Standard platform would suffice.

- If so, do you have views or recommendations on what Gold Standard should require?

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<sup>1</sup> Platt, Moritz, et al. "The Energy Footprint of Blockchain Consensus Mechanisms Beyond Proof-of-Work." 2021 IEEE 21st International Conference on Software Quality, Reliability and Security Companion (QRS-C). IEEE, 2021.

Requiring retirement on Gold Standard before retirement on the 3<sup>rd</sup> Party System would cover the integrity requirements for the management of data flow between systems.

- What are the primary risks that you believe Gold Standard should consider when writing its requirements on this topic?

Not every company working with this is at an enterprise level, to assume this would be to cut out the very people and companies that are making a difference right now.

- Are there benchmarks, good practice codes or similar reference points for IT security requirements that you would recommend Gold Standard following or taking into account?

## 7. PERMITTED UNITS

- Do you agree with the proposal not to initially permit the tokenisation of these categories of credit, until tailored safeguards are developed?

We agree that Planned Emission Reductions (PERs) should not be allowed for tokenisation without developing suitable approaches and safeguards. However, we believe VERs authorised for use under Article 6 of the Paris Agreement, and other genuinely created credits should be allowed for tokenisation to accelerate reductions in greenhouse gas emissions.

- Do you believe there are other types of carbon credits that Gold Standard should consider creating tailored safeguards for? If so, why?

We believe Gold Standard can consider some national carbon credits units. For example, Australian Carbon Credit Units (ACCUs) are issued by the Clean Energy Regulator to eligible projects that result in verified emission reductions (through carbon sequestration or emissions avoidance activities). ACCUs are generated by over 30 methodologies, with a mix of technology and nature-based methods, including land management, reforestation, and savannah fire management practices. The tokenisation of national credits, such as ACCUs under the Gold Standard safeguard, will provide the opportunity to create globally tradable tokens.

- Would you like to share any additional comments on this topic?

## 8. REPUTATIONAL HARM

- Do you consider Gold Standard's existing conditions related to reputational harm to be suitable for the act of creating digital tokens representing Gold Standard credits?

Yes. The existing provisions within the General Terms and Conditions and Registry Terms of Use of Gold Standard are suitable to protect Gold Standard's reputation and

goodwill.

- If not, what amendments or additions do you believe are needed?
- Would you like to share any additional comments on this topic?