

Digital Asset Management Working Group



Token Supplement

Date: April 15, 2024
Version: 0.5

Approvals

<hr/>	Director, Standards	<hr/>
Meiyappan Masilamani	Title	Date
<hr/>	Digital Asset Management Working Group Co-Lead	<hr/>
Stacey Ferris	Title	Date
<hr/>	Digital Asset Management Working Group Co-Lead	<hr/>
Allison Maffitt	Title	Date

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1 Introduction

1.1 Use

This document is used as a supplement to the Blockchain Maturity Model (BMM). The Blockchain Maturity Model (BMM) is used to evaluate the generic blockchain aspects of the token. This document is used to assess the token specific characterization of the token. Satisfaction of the BMM goals determines the level and compliance with this document determines if the special designation of “Token Rating” can be awarded to a token.

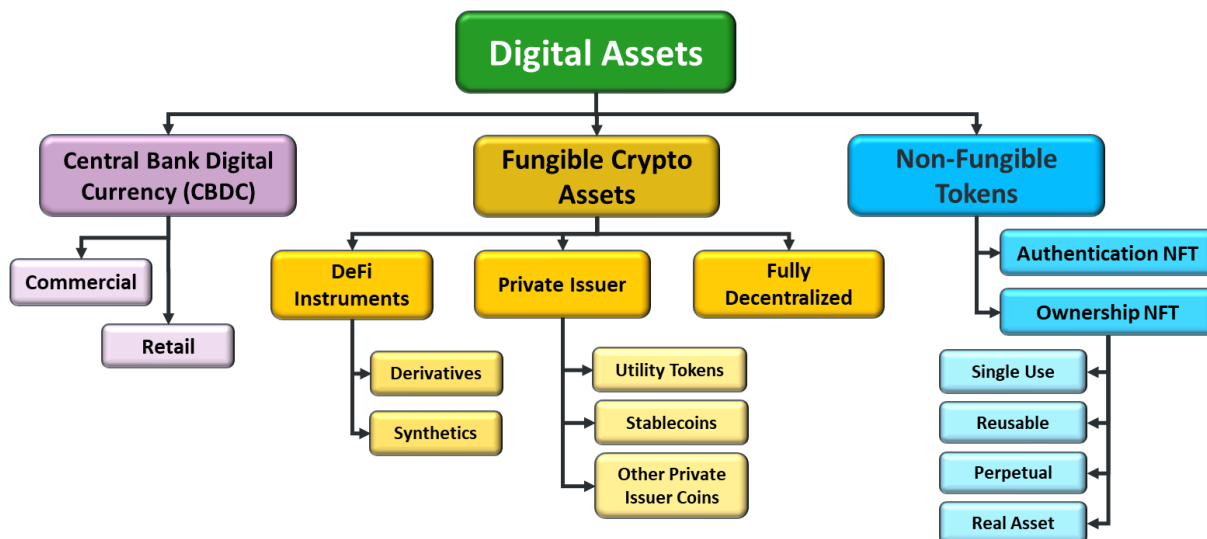
For an assessment to be qualified as a BMM Token Assessment, the Token Point of Contact shall declare the token type that will be used as a basis for the assessment. The assessment must be conducted by an assessment team with at least one team member who is a qualified Token Subject Matter Expert.

1.2 Scope

This supplement applies to digital tokens that are on both private and public blockchains.

2 Private Issuer Token Types

This document describes the requirements for a variety of privately issued token types. They are described in the following token taxonomy:



3 Requirements

There are several factors that need to be assessed to determine the level of trust someone can have for a token. They are (in no order):

- Smart Contract Validity

- Wallet Integration
- Tokenomics
- Regulatory Compliance

These following sub-paragraphs describe the specific requirements expected of the Token Issuer to ensure the token is trustworthy.

3.1 Smart Contract Validity

Smart contract validity is measured by the ability of the smart contract to function within the framework of the base chain on which it operates. This validity is shown by the base code for the project and the openness of the code to the public for validation. While exceptions can be made for confidentiality matters; generally, the code for the project needs to be openly posted (redacted if needed) somewhere for community review. If not, an affidavit needs to be provided as to why the code cannot be posted to the public.

Further, the project must also state who has done their code audit and why this company was chosen. This portion of the review will eventually be supplemented by the Smart Contract Audit supplement for the BMM, which will allow projects who have used certified auditors the ability to omit this section, just list the certified auditors name and their report in an appendix to the application.

3.1.1 Third Party Security Audit

The Token Issuer¹ shall ensure that security audits are performed biannually or as soon as possible following discovery of a data breach or exploitation. The audit must be performed in accordance with a defined audit standard by a qualified individual or company. Audit reports shall include the identity of the auditor/company along with the standards used to perform the audit.

3.1.2 Code Verification

The Token Issuer shall ensure that the code is reviewed and tested to ensure that the code satisfies the smart contract requirements and software language coding standards. This is performed biannually or immediately following major changes in the code. The verification is performed by a qualified individual or company. Verification reports include the identity of the auditor/company along with the standards used to perform the audit.

¹ See glossary.



3.2 Wallet Integration

Token issuer shall disclose what coding protocol was used for the creation of the token as it relates to wallet compatibility, including which wallets if any are currently capable of accepting the token.

Note: This can be done by naming the specific wallet or by naming a class of wallets.
Example: Specific Wallet: Solflare, class of Wallets SPL/Token2022 Compatible Wallet
Example: Specific Wallet: Metamask, class of Wallet ERC20 Compatible Wallets.

3.3 Tokenomics

Tokenomics pertains to the economic and financial framework governing a cryptocurrency or blockchain endeavor, with a particular focus on the design, distribution, and utilization of the project's tokens within its ecosystem. It involves orchestrating the supply of these tokens in a manner that facilitates managed value while mitigating the risk of misuse or unmanaged value change.

The following sub-paragraphs describe the requirements associated with Tokenomics.

3.3.1 Governance

The Token Issuer documents the token's purpose, its current or intended use, and its active utilization status. This entails a clear delineation of how the token will be utilized presently or in the future. Additionally, the Token Issuer publishes a white paper or and roadmap, outlining the project's historical, current, and prospective operations. These documents are made accessible to the public for community review. If such information is not readily available, the Token Issuer must supply an affidavit explaining the reason for its unavailability.

3.3.1.1 *Technical Governance Plan/Mechanism*

The Token Issuer shall establish and maintain a governance plan that includes on-chain, off-chain, cross-chain, or hybrid operational management. The plan also describes any security measures independent of the base chain protocol.

Notes:

- (1) Governance can be centralized or decentralized, for on-chain models, or any of a multiple set of models for off-chain models.
- (2) Governance can be centralized or decentralized, for on-chain models, or any of a multiple set of models for off-chain models.
- (3) Determine if there are security protocols beyond the chain protocol and whether this affects governance.



Examples include Deciding to participate in a proposed fork on a host blockchain and whether to use the base chain security protocol or to enhance security parameters.

3.3.1.2 *Business Governance*

The Token Issuer shall document the organizational structure and real-world infrastructure that supports the token. The Token Issuer documents the legal relationship between all superior and subordinate organizations with the ability, through management or stock, votes, or other means to direct, control, or influence the token, including but not limited to funding procedures, leadership decisions, and/or competing projects which may hamper/augment the token.

Examples: Real world infrastructure include agents who execute physical world operations.

3.3.2 *Community Engagement*

The Token Issuer shall establish a forum or mechanism to collect, review, analyze, and act upon information provided by token stakeholders, documenting the methodology used to engage and respond to its community.

Note: Token stakeholders include the issuers, developers, holders and regulators of a token.

Examples: Methods may be direct contact or an asynchronous method including:

- Direct Contact- Phone System
- Asynchronous method- Email, social media.
- Hybrid Methodology- Discord, Twitter

Each token must offer evidence of community engagement. The review is agnostic as to the present size of the community, however, there is a need for socials to be revealed to the group. Further, each token shall present an argument for growing its community, unless the community has reached critical mass.

3.3.3 *Liquidity*

3.3.3.1 *Reserves*

The token issuer shall ensure that a reserve is established that meets the following criteria:



- The quantity of the reserve is publicly disclosed in terms of percentage and actual value of the reserve.
- The number and type of assets that comprise the reserve are publicly disclosed.
- Third-party audits of the reserve are periodically conducted, and the results are publicly disclosed.
- Policies are publicly available that describe the frequency, triggers, amounts, and other attributes of the reserve distribution activities.
- Mechanisms are in place such as multi-sig wallets, alerts, and other automated processes that ensure that reserves are managed in accordance with a rules-based strategy.
- Changes to the policies must be communicated to all token holders in advance of the change sufficient for token holders to make informed transactions.

3.3.3.2 *On-Ramp-Off Ramp*

The Token Issuer documents the process used to acquire and transfer their tokens.

3.3.4 *Utility*

The Token Issuer shall publicly declare the purpose of the token as well as the strategy and objectives to achieve the purpose of the token. This includes the establishment of the management controls that facilitate the performance of the utility or function delivered by the token.

3.3.5 *Demand, Supply, and Scalability*

The Token Issuer shall ensure that there is a defined relationship between the demand and supply of the tokens.

3.3.5.1 *Demand*

The Token Issuer shall establish and maintain a demand model that identifies the variables that impact demand and predicts changes to demand based on the fluctuations in the demand variables.

Notes:

1. Staking and Rewards Model- It can be useful for the token issuer to list any/all staking or rewards models for the token to incentivize investors to take a more careful look at their project.

3.3.5.2 *Supply*

The policy for the supply of tokens is publicly disclosed. This includes the frequency, quantity, triggers, authorities, and all means that impact the supply of tokens. This encompasses the burning, disposal, retirement or liquidation of tokens. Any activity that impacts the total available supply of tokens is documented, publicly disclosed, and independently verified.



3.3.5.3 Scalability Planning

The Token Issuer shall establish and maintain a plan to scale the token project. This plan can rely heavily on the base chain capabilities if that is the functionality of the smart contract. This includes both technical and human resources required to grow the project.

The Token Issuer shall declare how many users can be using the token at any given time within a network. This is derivative of the TPS and is based on the primary chain’s maximum capability.

Examples include:
<ul style="list-style-type: none"> ● Brokerage agents ● Number of live nodes

3.3.6 Distribution Model

The Token Issuer documents how the token is distributed by categories that includes a capitalization table for subsidiaries, if applicable.²

Token Issuer shall indicate the plan and current use of funds generated by distribution of the tokens, including funds generated by any fees, taxes, or residuals from burn functions.

<p>NOTE: For yield bearing tokens, the token issuer shall define the methodology used to determine the yield for the token and document the tests used to determine the methodology (including asset pools, distributed investment funds, hedge funds, or staking models).</p> <p>Examples of categories include founders, investors, partners, airdrops, staking, etc.</p>
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3.3.7 Issuance Model

The Token Issuer shall document the token issuance model.

<p>Example: Initial Coin Offering (ICO), Initial Dex Offering (IDO), Tiered Dex Offering (TDO). See glossary for a definition of these models.</p>

3.3.8 Stability

A mechanism is in place that supports the stability of the token value within defined upper and lower limits.

² See Glossary

Examples include burn mechanisms, smart burn systems, lock-ups, inversion protocols (reserve to match sale), fee systems, tax systems, and other unique mechanisms.

3.4 Transactional Model

The Token Issuer documents the primary chain and any other chains along with their consensus mechanism and attributes that may impact the speed, throughput, or cost of executing transactions. This is used as an input to estimating the transaction speeds and costs.

3.4.1 Transactions Speed (Smart Contract Chain Impact)

The Token Issuer publicly discloses the transaction speed along with the estimating rationale that includes the parameters and assumptions used to determine the TPS.

NOTE: Smart Contract interaction with the primary chain may have factors which delay the processing of information and reduce the general TPS for the chain. Factors such as this shall be disclosed.

3.4.2 Fees

The Token Issuer publicly discloses any amount of the fee removed from the transaction to pay fees (in addition to the gas fees), burning tokens, to pay taxes, or for any other purpose.

3.4.3 Interoperability Model (None, Cross Chain, Multi-Chain, Sub-Chain)

The Token Issuer shall document and maintain a process for exchanging the token for other valued assets regardless of chain.

3.5 Regulatory Compliance

The Token Issuer publicly asserts the jurisdiction(s) that have regulatory authority over the Token Project. Additionally, it asserts compliance with, or endeavors to meet, the regulatory standards of any jurisdiction in which it operates, whether independently or as part of a multinational entity, including subsidiaries owned or partially owned by the token issuer.

The Token Issuer secures a qualified opinion from an expert entity familiar with the relevant jurisdictions regarding legal and regulatory compliance on matters including AML/KYC requirements, cross-border transactions, intellectual property, tax reporting, and token classification (security, utility, and/or currency).

Furthermore, the Token Issuer shall conduct and periodically update a comprehensive compliance review. This review encompasses the following areas: securities law applicability, cross-border considerations and jurisdictional variances, legal validity of smart contracts, licensing and permitting, accounting and tax records/reporting,

valuation methods for digital assets, as well as AML/KYC and anti-human trafficking requirements.

Appendix A: Glossary

Airdrop	A distribution of crypto assets to a group of individuals, often as part of a marketing or promotional campaign.
AML	A set of laws, regulations, and practices designed to prevent the use of cryptocurrency for illegal purposes such as money laundering and terrorism financing.
Burn	The process of permanently removing a cryptocurrency from circulation or a process of removing the tokens from general circulation within a smart burn process.
Capitalization Table	A chart of the ownership of the tokens initially released and/or stock of the company issuing the tokens.
CentFI	The abbreviation for centralized finance.
Cross-Chain	The ability of different blockchain networks to communicate and interact with each other.
Cryptocurrency	A digital or virtual currency that uses cryptography for security and operates independently of a Central Bank.
Decentralized Exchange (DEX)	A crypto asset exchange that operates on a decentralized network and uses smart contracts to execute trades.
DeFi	The field of decentralized finance.
Fungible Token	Digital tokens that are interchangeable with each other, meaning that each token has the same value and can be exchanged one-for-one without any difference.
Governance Token	A type of cryptocurrency that allows holders to vote on decisions related to the management and direction of a blockchain network.
ICO (Initial Coin Offering)	Initial Coin Offering is a fundraising method for new blockchain projects where investors can buy newly issued tokens in exchange for other crypto asset or fiat money.
IDO (Initial Dex Offering)	An Initial DEX Offering is a decentralized fundraising method where a new token is launched on a decentralized exchange, allowing anyone to participate without the need for approval or intermediaries.

Inversion Protocol	A form of algorithmic liquidity management that increases the friction of a token if the price drops below thresholds or decreases the friction of the price rises goes above thresholds.
KYC	KYC (Know Your Customer) is a process of verifying the identity of customers to prevent money laundering and fraud.
Lock-up	A feature in cryptocurrency that allows the sender of a transaction to specify a time in the future before which the transaction cannot be spent.
Memecoin	A cryptocurrency that is created as a meme or joke and often has little practical use or value.
Multi-Chain	A blockchain architecture that allows multiple blockchains to be connected and interact with each other.
NFT (Non-Fungible Token)	Stands for non-fungible token, a unique digital asset that represents ownership of a particular item or piece of content, such as artwork or collectibles, on a blockchain.
Off-Ramp/On-Ramp	A methodology to convert fiat currency to cryptocurrency through an exchange, dex, swap or open purchase.
Security Token	A security token is a digital token that represents ownership in an underlying asset or company and is subject to securities regulations.
Smart Contract	A smart contract is a self-executing program with the terms of a contractual agreement written directly into code, allowing for automatic execution and verification of transactions on a blockchain network.
Stablecoin	A stablecoin is a type of cryptocurrency designed to maintain a stable value against a specific asset or group of assets, such as a fiat currency, a basket of goods, or a commodity.
Staking	Staking refers to the act of holding or locking up cryptocurrency in a wallet or smart contract to support the operations of a blockchain network and earn rewards in return.
Sub-Chain	A chain is created as a result of forking or cloning an existing blockchain but has its own independent network and token.

Tiered Dex Offering (TDO)

An initial coin offering methodology where a small portion of the coins are offered to the market (via a dex) and the next tier of the offering' volume and value is based on the speed at which the initial offering sells out, a third, fourth, or even fifth tier may be offered (up to 10 tiers) with each tiers value and volume being dictated by the previous tier's speed at selling out.

Token Controller

The person or entity who has control over the token's finances and day to day decision making processes (may at sometimes be the same as the token issuer)

Token Issuer

The person or entity who creates and places the token on the blockchain and has initial control of the wallet to which the tokens are minted (may at sometimes be the same as the token controller).

Tokenization

Tokenization is the process of converting real-world assets, such as property or art, into digital tokens on a blockchain network.

Appendix B: Authors & Contributors

Primary Author(s)

- [Dr. Chris Smithmyer](#)

Contributors

- [Allison Maffitt](#)
- [Gerard Dache](#)
- [Lori Souza](#)
- [Markus Veith](#)
- [Sean Kurzweil](#)
- [Stacey Ferris](#)