CRYPTO RISK METRICS
DON'T TRUST. VERIFY.

# White paper drafted under the European Markets in Crypto-Assets Regulation (EU) 2023/1114 for FFG 44TP35HF9

# Preamble

## 00. Table of Contents

## 01. Date of notification

This white paper was notified on 2026-05-05.

## 02. Statement in accordance with Article 6(3) of Regulation (EU) 2023/1114

This crypto-asset white paper has not been approved by any competent authority in any Member State of the European Union. The person seeking admission to trading of the crypto-asset is solely responsible for the content of this crypto-asset white paper.

## 03. Compliance statement in accordance with Article 6(6) of Regulation (EU) 2023/1114

This crypto-asset white paper complies with Title II of Regulation (EU) 2023/1114 of the European Parliament and of the Council and, to the best of the knowledge of the management body, the information presented in the crypto-asset white paper is fair, clear and not misleading and the crypto-asset white paper makes no omission likely to affect its import.

## 04. Statement in accordance with Article 6(5), points (a), (b), (c), of Regulation (EU) 2023/1114

The crypto-asset referred to in this crypto-asset white paper may lose its value in part or in full, may not always be transferable and may not be liquid.

## 05. Statement in accordance with Article 6(5), point (d), of Regulation (EU) 2023/1114

As defined in Article 3(9) of Regulation (EU) 2023/1114 of the European Parliament and of the Council of 31 May 2023 on Markets in Crypto-Assets – amending Regulations (EU) No 1093/2010 and (EU) No 1095/2010 and Directives 2013/36/EU and (EU) 2019/1937 – a utility token is “a type of crypto-asset that is only intended to provide access to a good or a service supplied by its issuer”. This crypto-asset does not qualify as a utility token, as its intended use goes beyond providing access to a good or service supplied solely by the issuer.

## 06. Statement in accordance with Article 6(5), points (e) and (f), of Regulation (EU) 2023/1114

The crypto-asset referred to in this white paper is not covered by the investor compensation schemes under Directive 97/9/EC of the European Parliament and of the Council or the deposit guarantee schemes under Directive 2014/49/EU of the European Parliament and of the Council.

## Summary

## 07. Warning in accordance with Article 6(7), second subparagraph, of Regulation (EU) 2023/1114

Warning: This summary should be read as an introduction to the crypto-asset white paper. The prospective holder should base any decision to purchase this crypto–asset on the content of the crypto-asset white paper as a whole and not on the summary alone. The offer to the public of this crypto-asset does not constitute an offer or solicitation to purchase financial instruments and any such offer or solicitation can be made only by means of a prospectus or other offer documents pursuant to the applicable national law. This crypto-asset white paper does not constitute a prospectus as referred to in Regulation (EU) 2017/1129 of the European Parliament and of the Council or any other offer document pursuant to Union or national law.

## 08. Characteristics of the crypto-asset

The crypto-asset Arbitrum (ARB) referred to in this white paper is a crypto-asset other than EMTs and ARTs and is deployed on the Ethereum and Arbitrum networks according to the DTI FFG shown in section F.14, as of 2026-03-06. The initial supply of the crypto-asset is 10,000,000,000 tokens. The maximum supply of the crypto-asset is not capped and it is subject to a maximum of 2% yearly inflation. The first activity on Ethereum can be viewed on 2023-03-16 (transaction hash: 0x242b50ab4fe9896cb0439cfe6e2321d23feede7eeceb31aa2dbb46fc06ed2670, source: https://etherscan.io/tx/0x242b50ab4fe9896cb0439cfe6e2321d23feede7eeceb31aa2dbb46fc06ed2670, accessed 2026-03-06). The first activity on Arbitrum can be viewed on 2023-03-16 (transaction hash: 0x9cdbb4672b549c26d97cac29f9cd73c1951656e0622ba4b9ed0abff2ee58698d, source: https://arbiscan.io/tx/0x9cdbb4672b549c26d97cac29f9cd73c1951656e0622ba4b9ed0abff2ee58698d, accessed 2026-03-06).

Arbitrum is a Layer 2 technology suite designed to support the execution of smart contracts and Web3 applications in connection with Ethereum. The project is based on the Arbitrum Nitro stack, which is intended to maintain close compatibility with Ethereum, and includes protocols such as Arbitrum One, which operates as an optimistic rollup posting transaction data to Ethereum Layer 1, and Arbitrum Nova, which operates as an AnyTrust chain with off-chain data management. Transactions are processed off-chain and treated as valid unless challenged, in which case a fraud-proof process may be conducted on Ethereum. The system further relies on a deterministic state transition function, meaning that identical inputs are intended to produce identical outputs across honest nodes.

The ARB crypto-asset is used at protocol level primarily for governance within the Arbitrum ecosystem. Holders may use the crypto-asset to participate in the Arbitrum DAO by voting on Arbitrum Improvement Proposals, including proposals relating to software upgrades, system parameters, and the election of the Security Council. Voting influence is token-weighted and may be exercised directly or through delegation to third-party delegates. ARB held in the DAO treasury may also be used for treasury management decisions relating to development, maintenance, and other ecosystem initiatives.

The crypto-asset does not grant any legally enforceable or contractual rights or obligations to its holders or purchasers. Any functionalities accessible through the underlying technology are purely technical or operational in nature and do not confer rights comparable to ownership, profit participation, governance, or similar entitlements known from traditional financial instruments.

## 09. Information about the quality and quantity of goods or services to which the utility tokens give access and restrictions on the transferability

As defined in Article 3(9) of Regulation (EU) 2023/1114 of the European Parliament and of the Council of 31 May 2023 on Markets in Crypto-Assets – amending Regulations (EU) No 1093/2010 and (EU) No 1095/2010 and Directives 2013/36/EU and (EU) 2019/1937 – a utility token is “a type of crypto-asset that is only intended to provide access to a good or a service supplied by its issuer”. This crypto-asset does not qualify as a utility token, as its intended use goes beyond providing access to a good or a service supplied solely by the issuer.

## 10. Key information about the offer to the public or admission to trading

Crypto Risk Metrics GmbH is seeking admission to trading on the Payward Global Solutions LTD (“Kraken”) platform in the European Union in accordance with Article 5 of Regulation (EU) 2023/1114

of the European Parliament and of the Council of 31 May 2023 on Markets in Crypto-Assets, amending Regulations (EU) No 1093/2010 and (EU) No 1095/2010 and Directives 2013/36/EU and (EU) 2019/1937. The admission to trading is not accompanied by a public offer of the crypto-asset.

## Part A – Information about the offeror or the person seeking admission to trading

### A.1 Name

Crypto Risk Metrics GmbH is the person seeking admission to trading.

### A.2 Legal form

The legal form of Crypto Risk Metrics GmbH is 2HBR, which corresponds to "Gesellschaft mit beschränkter Haftung".

### A.3 Registered address

The registered address of Crypto Risk Metrics GmbH is Lange Reihe 73, 20099 Hamburg,

Germany,

federal state of Hamburg.

### A.4 Head office

The head office is identical to the registered address.

### A.5 Registration date

Crypto Risk Metrics GmbH was registered on 2018-12-03.

### A.6 Legal entity identifier

The Legal Entity Identifier (LEI) of Crypto Risk Metrics GmbH is 39120077M9TG0O1FE242.

### A.7 Another identifier required pursuant to applicable national law

The national identifier of Crypto Risk Metrics GmbH is HRB 154488.

### A.8 Contact telephone number

+4915144974120

### A.9 E-mail address

info@crypto-risk-metrics.com

### A.10 Response time (Days)

Crypto Risk Metrics GmbH will respond to investor enquiries within 30 calendar days.

### A.11 Parent company

Crypto Risk Metrics GmbH has no parent company.

### A.12 Members of the management body

| Identity | Function | Business Address |
|---|---|---|
| Tim Zölitz | Chairman | Lange Reihe 73, 20099 Hamburg, Germany |

### A.13 Business activity

Crypto Risk Metrics GmbH is a technical service provider that supports regulated entities in fulfilling their regulatory requirements. Among other services, Crypto Risk Metrics GmbH acts as a data provider for ESG data under Article 66(5). In light of the requirements set out in Articles 4(7), 5(4) and 66(3) of Regulation (EU) 2023/1114 of the European Parliament and of the Council of 31 May 2023 on Markets in Crypto-Assets, and amending Regulations (EU) No 1093/2010 and (EU) No 1095/2010 and Directives 2013/36/EU and (EU) 2019/1937, Crypto Risk Metrics GmbH aims to provide central services for crypto-asset white papers.

### A.14 Parent company business activity

Crypto Risk Metrics GmbH does not have a parent company. Accordingly, no business activity of a parent company is to be reported in this section.

### A.15 Newly established

Crypto Risk Metrics GmbH has been established since 2018-12-03 and is therefore not newly established (i.e. more than three years).

### A.16 Financial condition for the past three years

Crypto Risk Metrics GmbH, founded in 2018 and based in Hamburg (HRB 154488), has undergone several strategic shifts in its business focus since incorporation. Due to these changes in business model and operational direction over time, the financial figures from earlier years are only comparable to a limited extent with the company's current commercial activities. The present business model – centred on regulatory technology and risk analytics in the context of the MiCA framework – has been developed progressively and can realistically be considered fully operational since approximately 2024.

The company's financial trajectory over the past three years reflects the transition from exploratory development towards market-ready product delivery. Profit or loss after tax for the last three financial years is as follows:

2024 (unaudited): loss of EUR 50,891.81

2023 (unaudited): loss of EUR 27,665.32

2022: profit of EUR 104,283.00

The profit in 2022 resulted primarily from legacy consulting activities, which were discontinued as part of the company's repositioning.

The losses in 2023 and 2024 resulted from strategic investments in the development of proprietary software infrastructure, regulatory frameworks, and compliance technology for the MiCA ecosystem. During those periods, no substantial commercial revenues were expected, as resources were directed towards preparing the platform for market entry in a regulated environment.

A fundamental repositioning of the company occurred in 2023 and especially in 2024, when the focus shifted towards providing risk management, regulatory reporting, and supervisory compliance solutions for financial institutions and crypto-asset service providers. This marked a material shift in business operations and monetisation strategy.

Based on preliminary unaudited management information for the financial year 2025, revenues are expected to have exceeded EUR 800,000, while preliminary net profit is expected to exceed EUR 100,000.

These figures are not audited and are not based on a finalised annual financial statement. Accordingly, they remain subject to finalisation and may differ from the figures ultimately reported in the annual financial statements.

With the regulatory environment now taking shape and the platform commercially validated, it is assumed that the effects of the strategic developments will continue to materialise in 2026. The company foresees further scalability of its technology and growing market demand for regulatory compliance tools in the European crypto-asset sector.

No public subsidies or governmental grants have been received to date; all operations have been financed through shareholder contributions and internally generated resources. Crypto Risk Metrics has never accepted any payments in tokens from projects it has worked with and – due to its internal Conflicts of Interest Policy – never will.

### A.17 Financial condition since registration

Not applicable. The company has been established for more than three years and its financial condition over the past three years is provided in Part A.16 above.

## Part B – Information about the issuer, if different from the offeror or person seeking admission to trading

### B.1 Issuer different from offeror or person seeking admission to trading

Yes, the issuer is different from the person seeking admission to trading.

### B.2 Name

The Arbitrum Foundation

### B.3 Legal form

The legal form of Arbitrum Foundation is K575, which corresponds to "Foundation company".

### B.4 Registered address

The registered address of The Arbitrum Foundation is 3119 9 Forum Lane, Camana Bay, P.O. Box 144, Grand Cayman KY1-9006, George Town,

Cayman Islands,

KY1

### B.5 Head office

The head office of The Arbitrum Foundation is 3119 9 Forum Lane, Camana Bay, P.O. Box 144, Grand Cayman KY1-9006,

Cayman Islands,

KY1

### B.6 Registration date

The Arbitrum Foundation was registered on 2022-11-03.

### B.7 Legal entity identifier

254900W5GLCIRJAH7V83

### B.8 Another identifier required pursuant to applicable national law

Not applicable.

### B.9 Parent company

Not applicable.

### B.10 Members of the management body

| Identity | Function | Business Address |
|---|---|---|
| Campbell Law | Director | 3119 9 Forum Lane, Camana Bay, P.O. Box 144, Grand Cayman KY1-9006, Cayman Islands |
| Edward Noyons | Director | 3119 9 Forum Lane, Camana Bay, P.O. Box 144, Grand Cayman KY1-9006, Cayman Islands |
| Ani Banerjee | Director | 3119 9 Forum Lane, Camana Bay, P.O. Box 144, Grand Cayman KY1-9006, Cayman Islands |

### B.11 Business activity

The Arbitrum Foundation is established to develop and incentivise the growth of the Arbitrum protocol, its associated decentralised networks, and the broader ecosystem. In furtherance of these objectives, the Foundation may undertake activities and initiatives that are incidental or conducive to supporting the development, governance, and operation of the Arbitrum protocol and related ecosystem infrastructure.

### B.12 Parent company business activity

Not applicable.

# Part C – Information about the operator of the trading platform in cases where it draws up the crypto-asset white paper and information about other persons drawing the crypto-asset white paper pursuant to Article 6(1), second subparagraph, of Regulation (EU) 2023/1114

## C.1 Name

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## C.2 Legal form

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## C.3 Registered address

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## C.4 Head office

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## C.5 Registration date

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## C.6 Legal entity identifier

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## C.7 Another identifier required pursuant to applicable national law

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## C.8 Parent company

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## C.9 Reason for crypto-Asset white paper Preparation

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## C.10 Members of the Management body

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## C.11 Operator business activity

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## C.12 Parent company business activity

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

### C.13 Other persons drawing up the crypto-asset white paper according to Article 6(1), second subparagraph, of Regulation (EU) 2023/1114

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

### C.14 Reason for drawing the white paper by persons referred to in Article 6(1), second subparagraph, of Regulation (EU) 2023/1114

Not applicable since Crypto Risk Metrics GmbH is not a trading platform.

## Part D – Information about the crypto-asset project

### D.1 Crypto-asset project name

Long Name: "Arbitrum", Short Name: "ARB" according to the Digital Token Identifier Foundation (www.dtif.org, DTI see F.13, FFG DTI see F.14 as of 2026-03-05).

### D.2 Crypto-assets name

Long Name: "Arbitrum" according to the Digital Token Identifier Foundation (www.dtif.org, DTI see F. 13, FFG DTI see F.14 as of 2026-03-05).

### D.3 Abbreviation

Short Name: "ARB" according to the Digital Token Identifier Foundation (www.dtif.org, DTI see F.13, FFG DTI see F.14 as of 2026-03-05).

### D.4 Crypto-asset project description

According to public information (source: https://docs.arbitrum.io/, accessed 2026-03-06), the Arbitrum project is a crypto-asset initiative concerned with the development and operation of a Layer 2 scaling infrastructure designed to support faster and lower-cost execution of smart contracts and decentralised applications while leveraging Ethereum as the underlying settlement layer. The project centres on the Arbitrum technical stack, including Arbitrum Nitro, and on public blockchain networks such as Arbitrum One and Arbitrum Nova. The protocol architecture includes mechanisms for off-chain transaction execution, compressed data posting to Ethereum, interactive fraud-proof procedures, and validation arrangements intended to support the correctness of state transitions and the security of the network. The system also includes developer-facing tools and infrastructure intended to enable third parties to deploy and operate applications within the Arbitrum ecosystem.

The ARB crypto-asset functions as an element within this broader technical framework. It is intended to interact with specific parts of the protocol's internal logic, in particular governance arrangements relating to the Arbitrum DAO and associated decision-making processes. ARB may be used by holders or their delegates to participate in voting on protocol-related proposals, including proposals concerning software upgrades, treasury allocations, and other ecosystem initiatives.

The project does not involve the granting of ownership, profit-participation rights, or legal claims against the Arbitrum protocol or its contributors. Instead, it centres on the creation of a technical environment in which the ARB crypto-asset may serve as a governance and utility input for certain protocol processes. The long-term evolution of the Arbitrum system, including the scope of available features, the governance roadmap, validator or liquidity-participant selection mechanisms, and the operational continuity of the infrastructure, may vary based on technical, economic, and regulatory considerations. All future developments remain subject to change.

### D.5 Details of all natural or legal persons involved in the implementation of the crypto-asset project

| Name of person | Type of person | Business address of person | Domicile of company |
|---|---|---|---|
| Ed Felten | Other person involved in implementation | 80 W Willow Mist Rd, Inlet Beach, FL 32461 | United States |
| Karthik Raju | Other person involved in implementation | 80 W Willow Mist Rd, Inlet Beach, FL 32461 | United States |
| Steven Goldfeder | Other person involved in implementation | 80 W Willow Mist Rd, Inlet Beach, FL 32461 | United States |
| Gary Wachtel | Other person involved in implementation | 80 W Willow Mist Rd, Inlet Beach, FL 32461 | United States |
| Harry Kalodner | Other person involved in implementation | 80 W Willow Mist Rd, Inlet Beach, FL 32461 | United States |
| Offchain Labs, Inc. | Other person involved in implementation | Corporation Trust Center 1209 Orange St, Wilmington, DE 19801 | United States |
| The Arbitrum Foundation | Other person involved in implementation | 3119 9 Forum Lane, PO Box 144, Grand Cayman KY1-9006, George Town, Cayman Islands | Cayman Islands |
| Campbell Law | Other person involved in implementation | 3119 9 Forum Lane, Camana Bay, P.O. Box 144, Grand Cayman KY1-9006, Cayman Islands | Cayman Islands |
| Edward Noyons | Other person involved in implementation | 3119 9 Forum Lane, Camana Bay, P.O. Box 144, Grand Cayman KY1-9006, Cayman Islands | Cayman Islands |
| Ani Banerjee | Other person involved in implementation | 3119 9 Forum Lane, Camana Bay, P.O. Box 144, Grand Cayman KY1-9006, Cayman Islands | Cayman Islands |

### D.6 Utility Token Classification

As defined in Article 3(9) of Regulation (EU) 2023/1114 of the European Parliament and of the Council of 31 May 2023 on Markets in Crypto-Assets – amending Regulations (EU) No 1093/2010 and (EU) No 1095/2010 and Directives 2013/36/EU and (EU) 2019/1937 – a utility token is "a type of crypto-asset that is only intended to provide access to a good or a service supplied by its issuer".

This crypto-asset does not qualify as a utility token, as its intended use goes beyond providing access to a good or a service supplied solely by the issuer.

### D.7 Key Features of Goods/Services for Utility Token Projects

As defined in Article 3(9) of Regulation (EU) 2023/1114 of the European Parliament and of the Council of 31 May 2023 on Markets in Crypto-Assets – amending Regulations (EU) No 1093/2010 and (EU) No 1095/2010 and Directives 2013/36/EU and (EU) 2019/1937 – a utility token is "a type of crypto-asset that is only intended to provide access to a good or a service supplied by its issuer". This crypto-asset does not qualify as a utility token, as its intended use goes beyond providing access to a good or a service supplied solely by the issuer.

### D.8 Plans for the token

This section provides an overview of the historical developments related to the ARB crypto-asset and a description of planned or anticipated project milestones as publicly communicated. All forward-looking elements are subject to significant uncertainty. They do not constitute commitments, assurances, or guarantees, and may be modified, delayed, or discontinued at any time. The implementation of past milestones cannot be assumed to continue in the future, and future changes may have adverse effects for token holders.

There is no formally published roadmap for the ARB crypto-asset and the Arbitrum protocol. Based on public sources (sources: https://docs.arbitrum.io/, https://forum.arbitrum.foundation/; accessed 2026-04-29), several protocol upgrades, ecosystem initiatives, and crypto-asset-related developments have been communicated that affect the evolution of the Arbitrum protocol and the role of the ARB crypto-asset.

Past milestones:

- Arbitrum One Mainnet Launch (31 August 2021): The Arbitrum One rollup chain was opened to the public.

- Arbitrum DAO Formation and AIP-1 (15 March 2023): The Constitution of the Arbitrum DAO took effect and governance authority over the chains was transferred to token holders through the DAO framework.

- Creation of Arbitrum Foundation (16 March 2023): Arbitrum announced the creation of Arbitrum Foundation, the Arbitrum DAO, and the ARB token as its next phase of decentralising Arbitrum by moving control of the project from Offchain Labs to the Arbitrum DAO.

- ARB Airdrop (23 March 2023): The ARB governance token was generated and distributed to eligible early users and ecosystem DAOs.

- Arbitrum Expansion Program (January 2024): The Arbitrum Expansion Program was launched to support the creation of custom Orbit chains based on the Arbitrum stack.

- ArbOS 40 "Callisto" proposal and later activation (2025): In February 2025, a constitutional AIP proposed the ArbOS 40 "Callisto" upgrade for Arbitrum One and Arbitrum Nova, including support

for selected Ethereum Pectra-related execution-layer changes such as EIP-7702. The upgrade was subsequently activated on Arbitrum One and Arbitrum Nova in 2025.

- Bounded Liquidity Delay (BoLD) Implementation and Stage 2 Rollup Progress (February 2025): Following Arbitrum DAO approval, BoLD was implemented in February 2025 as Arbitrum's upgraded dispute protocol. The upgrade introduced time-bounded dispute resolution and permissionless validation, allowing validators to challenge incorrect state assertions and defend valid Arbitrum chain states without relying on a closed validator allowlist. This reduced the risk of delay attacks, improved withdrawal security, and marked a significant step in Arbitrum's progression toward Stage 2 rollup status.

- KelpDAO exploit response and Arbitrum Security Council emergency action (20 to 21 April, 2026): In connection with the KelpDAO exploit response, the Arbitrum Security Council executed an emergency action that enabled the freezing and transfer of approximately 30,766 ETH from an address linked to the exploiter to an intermediary frozen wallet. The funds remain frozen pending further action to be determined through Arbitrum governance. This event illustrates that designated governance or security bodies within the Arbitrum framework may, in exceptional circumstances, exercise technical intervention powers capable of affecting asset-level outcomes on the network.

Future milestones:

- ZK Research and Possible Hybrid Dispute Architecture (date not specified): The Arbitrum ecosystem has communicated ongoing research into zero-knowledge technology, including a potential hybrid model using ZK proofs for dispute resolution, which may influence future protocol design.

Note: All future milestones are subject to significant uncertainty, including but not limited to technical feasibility, regulatory developments, market adoption, and community governance decisions. The project may modify, delay, or discontinue any of these initiatives at any time. Past implementation or performance outcomes do not constitute an indication of future results, and any such changes may materially affect the characteristics, availability, or perceived value of the ARB crypto-asset for its holders.

## D.9 Resource allocation

Based on information from various third-party and industry sources, it is reported that the crypto-asset project associated with the ARB token is linked to venture capital funding raised by Offchain Labs, the initial developer of the Arbitrum protocol. According to publicly referenced information, in or around April 2021, Offchain Labs is reported to have completed a Series A funding round in the amount of approximately USD 20,000,000. In addition, in or around September 2021, Offchain Labs is reported to have completed a Series B funding round in the amount of approximately USD 100,000,000, contributing to a reported total of USD 120,000,000 raised during 2021. Public references further indicate that this Series B round implied a company valuation of approximately USD 1,200,000,000. According to publicly referenced materials, investors reported to have participated in these financing rounds include Lightspeed Venture Partners, which is described as having led the Series B round, as well as Polychain Capital, Ribbit Capital, Redpoint Ventures, Pantera Capital, Alameda Research, and Mark Cuban. Public materials also connect the broader

origins of the project to research developed at Princeton University in 2015, which was later licensed by the founders in connection with the establishment of Offchain Labs in 2018.

However, all such information is derived exclusively from public announcements, portfolio disclosures, press releases, and third-party publications. The issuer, foundation, or entities associated with the ARB crypto-asset have not independently confirmed the occurrence, precise amounts, valuation, legal structure, or contractual terms of these reported financing rounds. As a result, the referenced investment amounts, investor participation, and any implied cumulative funding figures cannot be independently verified and should be considered indicative only.

### D.10 Planned use of collected funds or crypto-assets

Not applicable, as this white paper serves the purpose of admission to trading and is not associated with any fundraising activity for the crypto-asset project.

## Part E – Information about the offer to the public of crypto-assets or their admission to trading

### E.1 Public offering or admission to trading

Crypto Risk Metrics GmbH is the person seeking admission to trading.

### E.2 Reasons for public offer or admission to trading

The purpose of seeking admission to trading is to enable the crypto-asset to be listed on a regulated platform in accordance with the applicable provisions of Regulation (EU) 2023/1114 and Commission Implementing Regulation (EU) 2024/2984. The white paper has been drawn up to comply with the transparency requirements applicable to trading venues.

### E.3 Fundraising target

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.4 Minimum subscription goals

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.5 Maximum subscription goals

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.6 Oversubscription acceptance

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.7 Oversubscription allocation

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.8 Issue price

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.9 Official currency or any other crypto-assets determining the issue price

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.10 Subscription fee

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.11 Offer price determination method

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.12 Total number of offered/traded crypto-assets

The initial supply of the crypto-asset is set at 10,000,000,000 units according to public information. The protocol documentation further states that the supply may be increased by up to 2% per year through an inflation mechanism subject to on-chain governance. Investors should note that changes in the effective supply, including increases in circulating units or reductions through burning, may affect the token's price and liquidity.

### E.13 Targeted holders

The admission of the crypto-asset to trading is open to all types of investors.

### E.14 Holder restrictions

Holder restrictions are subject to the rules applicable to the crypto-asset service provider, as well as any additional restrictions that provider may impose.

### E.15 Reimbursement notice

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.16 Refund mechanism

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.17 Refund timeline

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.18 Offer phases

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.19 Early purchase discount

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.20 Time-limited offer

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.21 Subscription period beginning

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.22 Subscription period end

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.23 Safeguarding arrangements for offered funds/crypto-assets

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.24 Payment methods for crypto-asset purchase

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.25 Value transfer methods for reimbursement

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.26 Right of withdrawal

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.27 Transfer of purchased crypto-assets

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.28 Transfer time schedule

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.29 Purchaser's technical requirements

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.30 Crypto-asset service provider (CASP) name

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.31 CASP identifier

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.32 Placement form

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.33 Trading platforms name

The admission to trading is sought on Payward Global Solutions LTD ("Kraken").

### E.34 Trading platforms Market identifier code (MIC)

The Market Identifier Code (MIC) of Payward Global Solutions LTD ("Kraken") is PGSL.

### E.35 Trading platforms access

The token is intended to be listed on the trading platform operated by Payward Global Solutions LTD ("Kraken"). Access to this platform depends on regional availability and user eligibility under Kraken's terms and conditions. Investors should consult Kraken's official documentation to determine whether they meet the requirements for account creation and token trading.

### E.36 Involved costs

The costs involved in accessing the trading platform depend on the specific fee structure and terms of the respective crypto-asset service provider. These may include trading fees, deposit or withdrawal charges, and network-related gas fees. Investors are advised to consult the applicable fee schedule of the chosen platform before engaging in trading activities.

### E.37 Offer expenses

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.38 Conflicts of interest

MiCA-compliant crypto-asset service providers shall have strong measures in place in order to manage conflicts of interest. Due to the broad audience this white paper addresses, potential investors should always check the conflicts-of-interest policy of their respective counterparty.

Crypto Risk Metrics GmbH has established, implemented, and documented comprehensive internal policies and procedures for the identification, prevention, management, and documentation of conflicts of interest in accordance with applicable regulatory requirements. These internal measures are actively applied within the organisation. For the purposes of this specific assessment and the crypto-asset covered by this white paper, a token-specific review has been conducted by Crypto Risk Metrics GmbH. Based on this individual review, no conflicts of interest relevant to this crypto-asset have been identified at the time of preparation of this white paper.

### E.39 Applicable law

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### E.40 Competent court

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

## Part F – Information about the crypto-assets

### F.1 Crypto-asset type

The crypto-asset described in the white paper is classified as a crypto-asset under the Markets in Crypto-Assets Regulation (MiCA) but is neither classified as an electronic money token (EMT) nor an asset-referenced token (ART). It is a digital representation of value that can be stored and transferred using distributed ledger technology (DLT) or similar technology, without embodying or conferring any rights to its holder. The crypto-asset does not aim to maintain a stable value by referencing an official currency, a basket of assets, or any other underlying rights. Instead, its valuation is entirely market-driven, based on supply and demand dynamics, and it is not subject to any stabilisation mechanism. It is neither pegged to any fiat currency nor backed by any external assets, which distinguishes it from EMTs and ARTs. Furthermore, the crypto-asset is not categorised as a financial instrument, deposit, insurance product, pension product, or any other regulated financial product under EU law. It does not grant financial rights, voting rights, or any contractual claims to its holders, and therefore remains outside the scope of regulatory frameworks applicable to traditional financial instruments.

### F.2 Crypto-asset functionality

According to public information available in the official Arbitrum documentation (https://docs.arbitrum.io/, accessed 2026-03-06), ARB is an ERC-20 crypto-asset associated with the Arbitrum ecosystem and is intended to function primarily as the governance token of the Arbitrum DAO. Public documentation states that the token is minted by a smart contract on Arbitrum One and is used in connection with the DAO governance framework applicable to Arbitrum One, Arbitrum Nova, and other DAO-governed components of the ecosystem.

The ARB crypto-asset functions as a technical component within the Arbitrum governance environment and its associated protocol framework. It is used to support governance-related operations at the protocol and DAO level. ARB is used to participate in on-chain governance processes of the Arbitrum DAO, including the submission, support, and voting of Arbitrum Improvement Proposals, as well as the delegation of voting power to other participants. Governance-related decisions may concern, among other things, changes to governance arrangements, protocol upgrades, system parameters, treasury allocations, and the approval of additional DAO-governed chains, subject to the applicable constitutional and technical framework.

In addition, ARB may be used in connection with other governance-linked protocol processes within the Arbitrum ecosystem. Public documentation states that ARB holders participate in the election of members of the Security Council, which is a governance-linked body established within the DAO framework for certain emergency and non-emergency functions. Public materials also describe that ARB is held in governance-controlled treasury smart contracts and may be used for DAO-directed ecosystem funding and compensation arrangements.

The project does not involve the granting of ownership, profit-participation rights, or legal claims against the project entity or its contributors. Instead, it centres on the creation of a technical environment in which the ARB crypto-asset may serve as a governance and utility input for certain protocol processes. The long-term evolution of the Arbitrum system, including the scope of available features, the governance roadmap, validator or liquidity-participant selection mechanisms, and the operational continuity of the infrastructure, may vary based on technical, economic, and regulatory considerations. All future developments remain subject to change.

### F.3 Planned application of functionalities

Future milestones:

- ZK Research and Possible Hybrid Dispute Architecture (date not specified): The Arbitrum ecosystem has communicated ongoing research into zero-knowledge technology, including a potential hybrid model using ZK proofs for dispute resolution, which may influence future protocol design.

Note: All future milestones are subject to significant uncertainty, including but not limited to technical feasibility, regulatory developments, market adoption, and community governance decisions. The project may modify, delay, or discontinue any of these initiatives at any time. Past implementation or performance outcomes do not constitute an indication of future results, and any such changes may materially affect the characteristics, availability, or perceived value of the ARB crypto-asset for its holders.

## A description of the characteristics of the crypto asset, including the data necessary for classification of the crypto-asset white paper in the register referred to in Article 109 of Regulation (EU) 2023/1114, as specified in accordance with paragraph 8 of that Article

### F.4 Type of crypto-asset white paper

The white paper type is "Other crypto-assets" (i.e. OTHR).

### F.5 The type of submission

The type of submission is MODI, which stands for "Modification".

### F.6 Crypto-asset characteristics

The crypto-asset referred to herein is a crypto-asset other than EMTs and ARTs, and is available on multiple networks. The crypto-asset is fungible up to 18 digits after the decimal point on Arbitrum and Ethereum. The crypto-asset constitutes a digital representation recorded on distributed-ledger technology and does not confer ownership, governance, profit participation, or any other legally enforceable rights. Any functionalities associated with the token are limited to potential technical features within the relevant platform environment. These functionalities do not represent contractual entitlements and may depend on future development decisions, technical design choices, and operational conditions. The crypto-asset does not embody intrinsic economic value; instead, its value, if any, is determined exclusively by market dynamics such as supply, demand, and liquidity in secondary markets.

### F.7 Commercial name or trading name

Long Name: "Arbitrum" according to the Digital Token Identifier Foundation (www.dtif.org, DTI see F. 13, FFG DTI see F.14 as of 2026-03-05).

### F.8 Website of the issuer

https://arbitrum.foundation/

### F.9 Starting date of offer to the public or admission to trading

2026-04-14

### F.10 Publication date

2026-04-14

### F.11 Any other services provided by the issuer

No such services are currently known to be provided by the issuer. However, it cannot be excluded that additional services exist or may be offered in the future outside the scope of Regulation (EU) 2023/1114.

### F.12 Language or languages of the crypto-asset white paper

EN

### F.13 Digital token identifier code used to uniquely identify the crypto-asset or each of the several crypto assets to which the white paper relates

63TGWHVCD, 93K9SQP62

### F.14 Functionally fungible group digital token identifier

44TP35HF9

### F.15 Voluntary data flag

This white paper has been submitted as mandatory under Regulation (EU) 2023/1114.

### F.16 Personal data flag

Yes, this white paper contains personal data as defined in Regulation (EU) 2016/679 (GDPR).

### F.17 LEI eligibility

The issuer should be eligible for a Legal Entity Identifier (LEI).

### F.18 Home Member State

Germany

### F.19 Host Member States

Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Liechtenstein, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden

## Part G – Information on the rights and obligations attached to the crypto-assets

### G.1 Purchaser rights and obligations

The crypto-asset does not grant any legally enforceable or contractual rights or obligations to its holders or purchasers. Any functionalities accessible through the underlying technology are of a purely technical or operational nature and do not constitute rights comparable to ownership, profit participation, governance, or similar entitlements known from traditional financial instruments. Accordingly, holders do not acquire any legally enforceable claim against the issuer of the crypto-asset or any third party.

### G.2 Exercise of rights and obligations

As the crypto-asset does not confer any legally enforceable rights or obligations, there are no applicable procedures or conditions for their exercise. Any interaction or functionality that may be available within the project's technical infrastructure – such as participation mechanisms or protocol-level features – serves operational purposes only and does not create, evidence, or constitute any contractual or statutory entitlement.

### G.3 Conditions for modifications of rights and obligations

As the crypto-asset does not confer any legally enforceable rights or obligations, there are no conditions or mechanisms for modifying such rights or obligations. Adjustments to the technical protocol, smart contract logic, or related systems may occur in the ordinary course of development or maintenance. Such changes do not alter the legal position of holders, as no contractual rights exist and no rights arise under applicable law or regulation. Holders should not interpret technical updates or governance-related changes as amendments to legally binding entitlements.

### G.4 Future public offers

Information on the future offers to the public of crypto-assets was not available at the time of writing this white paper (2026-03-06).

### G.5 Issuer retained crypto-assets

According to publicly available information on the official Arbitrum Foundation website (https://docs.arbitrum.foundation/airdrop-eligibility-distribution, accessed on 2026-03-06), the Arbitrum Foundation was allocated 750 million ARB, representing 7.5% of the initial total ARB supply of 10 billion tokens. According to the same source, the Arbitrum Foundation's allocation is subject to a lock-up that began on 2023-04-17 and linearly unlocks over the course of four years. This vesting arrangement is enforced by the Arbitrum Foundation Vesting Budget Smart Contract Wallet.

Note: While the allocation to the Arbitrum Foundation is publicly disclosed, on-chain wallet addresses associated with this allocation cannot be independently linked to specific natural persons. Token movements or internal treasury management actions may occur without prior notice and could affect the concentration of holdings and the future governance influence associated with these assets. The current token distribution can be traced on-chain: https://arbiscan.io/token/0x912ce59144191c1204e64559fe8253a0e49e6548#balances

### G.6 Utility token classification

No – the crypto-asset project does not concern utility tokens as defined in Article 3(9) of Regulation (EU) 2023/1114.

### G.7 Key features of goods/services of utility tokens

Not applicable, as the crypto-asset described herein is not a utility token.

### G.8 Utility tokens redemption

Not applicable, as the crypto-asset described herein is not a utility token.

### G.9 Non-trading request

The admission to trading is sought.

### G.10 Crypto-assets purchase or sale modalities

Not applicable, as this white paper is written to seek admission to trading, not for the initial offer to the public.

### G.11 Crypto-assets transfer restrictions

The crypto-assets themselves are not subject to any technical or contractual transfer restrictions and are generally freely transferable. However, crypto-asset service providers may impose restrictions on buyers or sellers in accordance with applicable laws, internal policies or contractual terms agreed with their clients.

### G.12 Supply adjustment protocols

No – there are no fixed protocols that can increase or decrease the supply of the crypto-asset in response to changes in demand as of 2026-03-06.

However, it is possible to decrease the circulating supply by transferring crypto-assets to so-called "burn addresses". These are addresses from which the tokens are no longer intended to be transferred or accessed, effectively removing them from circulation.

### G.13 Supply adjustment mechanisms

For the crypto-asset in scope, the initial supply was set at 10,000,000,000 units according to public information (source: https://docs.arbitrum.foundation/airdrop-eligibility-distribution, accessed 2026-03-06). In addition, the protocol documentation states that the supply may be increased through an inflation mechanism of up to 2% per year, meaning that the total number of units may exceed the initial supply over time. Investors should note that changes in the supply of the crypto-asset can have a negative impact.

### G.14 Token value protection schemes

No – the crypto-asset does not have any mechanisms or schemes in place that aim to stabilise or protect its market value. Its value is determined solely by market supply and demand, and may be subject to significant volatility.

### G.15 Token value protection schemes description

Not applicable, as the crypto-asset in scope does not have any value protection scheme in place.

### G.16 Compensation schemes

No – the crypto-asset does not have any compensation scheme.

### G.17 Compensation schemes description

Not applicable, as the crypto-asset in scope does not have any compensation scheme in place.

### G.18 Applicable law

This white paper is submitted by Crypto Risk Metrics GmbH, which is established in Germany. Accordingly, this white paper shall be governed by the laws of the Federal Republic of Germany.

### G.19 Competent court

Any disputes arising in relation to this white paper or the admission to trading may be brought before the competent courts in Hamburg, Germany.

## Part H – information on the underlying technology

### H.1 Distributed ledger technology (DTL)

The crypto-asset in scope is implemented on the Ethereum and Arbitrum networks following the standards described below.

### H.2 Protocols and technical standards

The crypto-asset that is the subject of this white paper is available on multiple DLT networks. These include: Ethereum and Arbitrum. In general, when evaluating crypto-assets, all implementations across different networks must always be taken into account, as spillover effects can be adverse for investors.

The following applies to Ethereum:

The crypto-asset operates on a well-defined set of protocols and technical standards that are intended to ensure its security, decentralisation, and functionality. Below are some of the key ones:

1. Network Protocols

The crypto-asset follows a decentralised, peer-to-peer (P2P) protocol where nodes communicate over the crypto-asset's DevP2P protocol using RLPx for data encoding.

- Transactions and smart contract execution are secured through Proof-of-Stake (PoS) consensus.

- Validators propose and attest blocks in Ethereum's Beacon Chain, finalised through Casper FFG.

- The Ethereum Virtual Machine (EVM) executes smart contracts using Turing-complete bytecode.

2. Transaction and Address Standards

Crypto-asset address format: 20-byte addresses derived from Keccak-256 hashing of public keys.

Transaction Types:

- Legacy Transactions (pre-EIP-1559)

- Type 0 (Pre-EIP-1559 transactions)

- Type 1 (EIP-2930: Access list transactions)

- Type 2 (EIP-1559: Dynamic fee transactions with base fee burning)

The Pectra upgrade introduces EIP-7702, a transformative improvement to account abstraction. This allows externally owned accounts (EOAs) to temporarily act as smart contract wallets during a transaction. It provides significant flexibility, enabling functionality such as sponsored gas payments and batched operations without changing the underlying account model permanently.

3. Blockchain Data Structure & Block Standards

- the crypto-asset's blockchain consists of accounts, smart contracts, and storage states, maintained through Merkle Patricia Trees for efficient verification.

Each block contains:

- Block Header: Parent hash, state root, transactions root, receipts root, timestamp, gas limit, gas used, proposer signature.

- Transactions: Smart contract executions and token transfers.

- Block Size: No fixed limit; constrained by the gas limit per block (variable over time). In line with Ethereum's scalability roadmap, Pectra includes EIP-7691, which increases the maximum number of "blobs" (data chunks introduced with EIP-4844) per block. This change significantly boosts the data availability layer used by rollups, supporting cheaper and more efficient Layer 2 scalability.

4. Upgrade & Improvement Standards

Ethereum follows the Ethereum Improvement Proposal (EIP) process for upgrades.

The following applies to Arbitrum:

Arbitrum commonly refers to the Arbitrum Rollup, a Layer 2 (L2) blockchain built using the Arbitrum technology suite. The Arbitrum Rollup is an optimistic rollup on top of the Ethereum blockchain. This means that the L2 transactions do not have their own consensus mechanism and are only validated by the execution clients. The so-called sequencer regularly bundles stacks of L2 transactions and publishes them on the L1 network, i.e. Ethereum. Ethereum's consensus mechanism (Proof-of-Stake) thus indirectly secures all L2 transactions as soon as they are written to L1.

### H.3 Technology used

The crypto-asset that is the subject of this white paper is available on multiple DLT networks. These include: Ethereum and Arbitrum. In general, when evaluating crypto-assets, all implementations across different networks must always be taken into account, as spillover effects can be adverse for investors.

The following applies to Ethereum:

1. Decentralised Ledger: The Ethereum blockchain acts as a decentralised ledger for all token transactions, with the intention of preserving an unalterable record of token transfers and ownership to ensure both transparency and security.

2. Private Key Management: To safeguard their token holdings, users must securely store their wallet's private keys and recovery phrases.

3. Cryptographic Integrity: Ethereum employs elliptic curve cryptography to validate and execute transactions securely, intended to ensure the integrity of all transfers. The Keccak-256 (SHA-3 variant) Hashing Algorithm is used for hashing and address generation. The crypto-asset uses ECDSA with secp256k1 curve for key generation and digital signatures. Next to that, BLS (Boneh-Lynn-Shacham) signatures are used for validator aggregation in PoS.

The following applies to Arbitrum:

1. Arbitrum-compatible wallets: The tokens are supported by all wallets compatible with the Ethereum Virtual Machine (EVM), such as MetaMask.

2. Decentralised ledger: Arbitrum operates as a Layer-2 blockchain on Ethereum and maintains its own decentralised ledger for recording token transactions. Final transaction data is periodically posted to Ethereum Layer 1, ensuring long-term availability and resistance to tampering.

3. ERC-20 token standard: The Arbitrum network supports tokens implemented under the ERC-20 standard, the same as on Ethereum.

4. Arbitrum supports what is called "MultiVM", which is the combination of EVM support with a WASM-based virtual machine. The latter is more efficient (lower gas costs) but specific to Arbitrum.

5. Scalability and transaction efficiency: As a rollup-based Layer-2, Arbitrum is intended to process higher volumes of transactions with lower fees compared to Ethereum Layer 1 by executing transactions off-chain and posting data on-chain using an optimistic rollup architecture.

### H.4 Consensus mechanism

The crypto-asset that is the subject of this white paper is available on multiple DLT networks. These include: Ethereum and Arbitrum. In general, when evaluating crypto-assets, all implementations across different networks must always be taken into account, as spillover effects can be adverse for investors.

The following applies to Ethereum:

Ethereum's Proof-of-Stake (PoS) consensus mechanism, introduced with The Merge in 2022, replaces mining with validator staking. Validators must stake at least 32 ETH, and a validator is randomly selected to propose each new block. Once proposed, the other validators verify the block's integrity. The network operates on a slot and epoch system, where a new block is proposed every 12 seconds, and finalisation occurs after two epochs (~12.8 minutes) using Casper-FFG. The Beacon Chain coordinates validators, while the fork-choice rule (LMD-GHOST) ensures the chain follows the heaviest accumulated validator votes. Validators earn rewards for proposing and verifying blocks, but face slashing for malicious behaviour or inactivity. PoS aims to improve energy efficiency, security, and scalability, with upgrades such as Proto-Danksharding (EIP-4844) already implemented to enhance Layer 2 scalability and transaction efficiency.

The following applies to Arbitrum:

Arbitrum is a Layer-2 (L2) solution on Ethereum that is developed using the Arbitrum technology suite. L2 transactions do not have their own consensus mechanism and are only validated by the execution clients. The so-called sequencer regularly bundles stacks of L2 transactions and publishes them on the L1 network, i.e. Ethereum. Ethereum's consensus mechanism (Proof-of-Stake) thus indirectly secures all L2 transactions as soon as they are written to L1.

## H.5 Incentive mechanisms and applicable fees

The crypto-asset that is the subject of this white paper is available on multiple DLT networks. These include: Ethereum and Arbitrum. In general, when evaluating crypto-assets, all implementations across different networks must always be taken into account, as spillover effects can be adverse for investors.

The following applies to Ethereum:

The crypto-asset's PoS system secures transactions through validator incentives and economic penalties. Validators stake at least 32 ETH and earn rewards for proposing blocks, attesting to valid ones, and participating in sync committees. Rewards are paid in newly issued ETH and transaction fees. Under EIP-1559, transaction fees consist of a base fee, which is burned to reduce supply, and an optional priority fee (tip) paid to validators. Validators face slashing if they act maliciously and incur penalties for inactivity. This system aims to increase security by aligning incentives while making the crypto-asset's fee structure more predictable and deflationary during high network activity.

The following applies to Arbitrum:

Arbitrum is a Layer-2 (L2) solution on Ethereum that is developed using the Arbitrum technology suite. Transactions on Arbitrum are bundled by a so-called sequencer and the result is regularly submitted as a Layer-1 (L1) transaction. This way many L2 transactions get combined into a single L1 transaction. This lowers the average transaction cost per transaction, because many L2 transactions are aggregated into a single L1 transaction. This creates incentives to use Arbitrum rather than the L1, i.e. Ethereum, itself. To get crypto-assets in and out of Arbitrum, a special smart contract on Ethereum is used. Since there is no consensus mechanism on L2, an additional mechanism ensures that only existing funds can be withdrawn from L2. When a user wants to withdraw funds, that user needs to submit a withdrawal request on L1. If this request remains undisputed for a period of time the funds can be withdrawn. During this time period Arbitrum validators can dispute the claim, which will start a dispute resolution process. This process is designed with economic incentives for correct behaviour of all participants.

## H.6 Use of distributed ledger technology

Yes – DLT is operated by the issuer, the offeror, the person seeking admission to trading, or any third party acting on their behalf.

## H.7 DLT functionality description

The distributed ledger technology underlying the crypto-asset operates within Arbitrum's progressive decentralisation framework. Governance authority over Arbitrum One and Arbitrum Nova is intended to rest with the Arbitrum DAO and its governance bodies. At the same time, certain operational or security-related components of the framework, including sequencing infrastructure and emergency-response functions, are maintained or exercised by designated operators or governance/security bodies within the Arbitrum ecosystem.

Publicly available information indicates that these bodies may act in accordance with established governance or security procedures and may interact with ecosystem participants, including the

Arbitrum Foundation. In April 2026, the Arbitrum Security Council executed an emergency action in connection with the KelpDAO exploit response that resulted in the freezing and transfer of approximately 30,766 ETH to an intermediary frozen wallet. This indicates that, in exceptional circumstances, designated governance or security bodies within the Arbitrum framework may exercise technical intervention powers capable of affecting asset-level outcomes on the network.

### H.8 Audit

Given the breadth of the term "technology", it cannot be confirmed that all elements or aspects of the technology employed have undergone a comprehensive and systematic technical examination. Accordingly, no comprehensive audit of the technology used can be confirmed. This white paper focuses primarily on risk-related aspects and therefore does not imply, nor should it be interpreted as implying, that a full assessment or audit of all technological elements has been conducted.

### H.9 Audit outcome

Not applicable, as no comprehensive audit of the technology used has been conducted or can be confirmed.

## Part I – Information on risks

### I.1 Offer-related risks

1. Regulatory and Compliance

Regulatory frameworks applicable to crypto-asset services in the European Union and in third countries are evolving. Supervisory authorities may introduce, interpret, or enforce rules that affect (i) the eligibility of this crypto-asset for admission to trading, (ii) the conditions under which a crypto-asset service provider may offer trading, custody, or transfer services for it, or (iii) the persons or jurisdictions to which such services may be provided. As a result, the crypto-asset service provider admitting this crypto-asset to trading may be required to suspend, restrict, or terminate trading or withdrawals for regulatory reasons, even if the crypto-asset itself continues to function on its underlying network.

2. Trading venue and connection risk

Trading in the crypto-asset depends on the uninterrupted operation of the trading venues on which it is listed and, where applicable, on its technical connections to external liquidity sources or venues. Interruptions such as system downtime, maintenance, faulty integrations, API changes, or failures at an external venue can temporarily prevent order placement, execution, deposits, or withdrawals, even when the underlying blockchain is functioning. In addition, trading platforms in emerging markets may operate under differing governance, compliance, and oversight standards, which can increase the risk of operational failures or disorderly market conditions.

3. Market formation and liquidity conditions

The price and tradability of the crypto-asset depend on actual trading activity on the venues to which the service provider is connected, whether centralised exchanges (CEXs) or decentralised exchanges (DEXs). Trading volumes may at times be low, order books thin, or liquidity concentrated

on a single venue. In such conditions, buy or sell orders may not be executed in full or may be executed only at a less favourable price, resulting in slippage.

Volatility: The market price of the crypto-asset may fluctuate significantly over short periods, including for reasons that are not linked to changes in the underlying project or protocol. Periods of limited liquidity, shifts in overall market sentiment, or trading on only a small number of CEXs or DEXs can amplify these movements and lead to higher slippage when orders are executed. As a result, investors may be unable to sell the crypto-asset at or close to a previously observed price, even where no negative project-specific event has occurred.

4. Counterparty and service provider dependence

The admission of the crypto-asset to trading may rely on several external parties, such as connected centralised or decentralised trading venues, liquidity providers, brokers, custodians, or technical integrators. If any of these counterparties fail to perform, suspend their services, or apply internal restrictions, the trading, deposit, or withdrawal of the crypto-asset on the listing crypto-asset service provider can be interrupted or halted.

Quality of counterparties: Trading venues and service providers in certain jurisdictions may operate under regulatory or supervisory standards that are lower or differently enforced than those applicable in the European Union. In such environments, deficiencies in governance, risk management, or compliance may remain undetected, which increases the probability of abrupt service interruptions, investigations, or forced wind-downs.

Delisting and service suspension: The crypto-asset's availability may depend on the internal listing decisions of these counterparties. A delisting or suspension on a key connected venue can materially reduce liquidity or make trading temporarily impossible on the admitting service provider, even if the underlying crypto-asset continues to function.

Insolvency of counterparties: If a counterparty involved in holding, routing, or settling the crypto-asset becomes insolvent, enters restructuring, or is otherwise subject to resolution measures, assets held or processed by that counterparty may be frozen, become temporarily unavailable, or be recoverable only in part or not at all, which can result in losses for clients whose positions were maintained through that counterparty. This risk applies in particular where client assets are held on an omnibus basis or where segregation is not fully recognised in the counterparty's jurisdiction.

5. Operational and information risks

Due to the irrevocability of blockchain transactions, incorrect transaction approvals or the use of wrong networks or addresses will typically make the transferred funds irrecoverable. Because trading may also rely on technical connections to other venues or service providers, downtime or faulty code in these connections can temporarily block trading, deposits, or withdrawals even when the underlying blockchain is functioning. In addition, different groups of market participants may have unequal access to technical, governance, or project-related information, which can lead to information asymmetry and place less informed investors at a disadvantage when making trading decisions.

6. Market access and liquidity concentration risk

If the crypto-asset is only available on a limited number of trading platforms or through a single market-making entity, this may result in reduced liquidity, greater price volatility, or periods of inaccessibility for retail holders.

## I.2 Issuer-related risks

1. Insolvency of the issuer

As with any commercial entity, the issuer may face insolvency risks. These may result from insufficient funding, low market interest, mismanagement, or external shocks (e.g. pandemics, armed conflicts). In such a case, ongoing development, support, and governance of the project may cease, potentially affecting the viability and tradability of the crypto-asset.

2. Legal and regulatory risks

The issuer operates in a dynamic and evolving regulatory environment. Failure to comply with applicable laws or regulations in relevant jurisdictions may result in enforcement actions, penalties, or restrictions on the project's operations. These may negatively impact the crypto-asset's availability, market acceptance, or legal status.

3. Operational risks

The issuer may fail to implement adequate internal controls, risk management, or governance processes. This can result in operational disruptions, financial losses, delays in updating the white paper, or reputational damage.

4. Governance and decision-making

The issuer's management body is responsible for key strategic, operational, and disclosure decisions. Ineffective governance, delays in decision-making, or lack of resources may compromise the stability of the project and its compliance with MiCA requirements. High concentration of decision-making authority or changes in ownership/control can amplify these risks.

5. Reputational risks

The issuer's reputation may be harmed by internal failures, external accusations, or association with illicit activity. Negative publicity can reduce trust in the issuer and impact the perceived legitimacy or value of the crypto-asset.

6. Counterparty dependence

The issuer may depend on third-party providers for certain core functions, such as technology development, marketing, legal advice, or infrastructure. If these partners discontinue their services,

change ownership, or underperform, the issuer's ability to operate the project or maintain investor communication may be impaired. This could disrupt project continuity or undermine market confidence, ultimately affecting the crypto-asset's value.

### I.3 Crypto-assets-related risks

1. Valuation risk

The crypto-asset does not represent a claim, nor is it backed by physical assets or legal entitlements. Its market value is driven solely by supply and demand dynamics and may fluctuate significantly. In the absence of fundamental value anchors, such assets can lose their entire market value within a very short time. Historical market behaviour has shown that some types of crypto-assets have become worthless. Investors should be aware that this crypto-asset may lose all of its value.

2. Market volatility risk

Crypto-asset prices can fluctuate sharply due to changes in market sentiment, macroeconomic conditions, regulatory developments, or technology trends. Such volatility may result in rapid and significant losses. Holders should be prepared for the possibility of losing the full amount invested.

3. Liquidity and price-determination risk

Low trading volumes, fragmented trading across venues, or the absence of active market makers can restrict the ability to buy or sell the crypto-asset. In such situations, it is not guaranteed that an observable market price will exist at all times. Spreads may widen materially, and orders may only be executable under unfavourable conditions, which can make liquidation costly or temporarily impossible.

4. Crypto-asset security risk

Loss or theft of private keys, unauthorised access to wallets, or failures of custodial or exchange service providers can result in the irreversible loss of assets. Because blockchain transactions are final, recovery of funds after a compromise is generally impossible.

5. Fraud and scam risk

The pseudonymous and irreversible nature of blockchain transactions can attract fraudulent schemes. Typical forms include fake or unauthorised crypto-assets imitating established ones, phishing attempts, deceptive airdrops, or social-engineering attacks. Investors should exercise caution and verify the authenticity of counterparties and information sources.

6. Legal and regulatory reclassification risk

Legislative or regulatory changes in the European Union or in the Member State where the crypto-asset is admitted to trading may alter its legal classification, permitted uses, or tradability. In third countries, the crypto-asset may be treated as a financial instrument or security, which can restrict its offering, trading, or custody.

7. Absence of investor protection

The crypto-asset is not covered by investor-compensation or deposit-guarantee schemes. In the event of loss, fraud, or insolvency of a service provider, holders may have no access to recourse mechanisms typically available in regulated financial markets.

8. Counterparty risk

Reliance on third-party exchanges, custodians, or intermediaries exposes holders to operational failures, insolvency, or fraud of these parties. Investors should conduct due diligence on service providers, as their failure may lead to the partial or total loss of held assets.

9. Reputational risk

Negative publicity related to security incidents, misuse of blockchain technology, or associations with illicit activity can damage public confidence and reduce the crypto-asset's market value.

10. Community and sentiment risk

Because the crypto-asset's perceived relevance and expected future use depend largely on community engagement and the prevailing sentiment, a loss of public interest, negative coverage or reduced activity of key contributors can materially reduce market demand.

11. Macroeconomic and interest-rate risk

Fluctuations in interest rates, exchange rates, general market conditions, or overall market volatility can influence investor sentiment towards digital assets and affect the crypto-asset's market value.

12. Taxation risk

Tax treatment varies across jurisdictions. Holders are individually responsible for complying with all applicable tax laws, including the reporting and payment of taxes arising from the acquisition, holding, or disposal of the crypto-asset.

13. Anti-money-laundering and counter-terrorist financing risk

Wallet addresses or transactions connected to the crypto-asset may be linked to sanctioned or illicit activity. Regulatory responses to such findings may include transfer restrictions, reporting obligations, or the freezing of assets on certain venues.

14. Market-abuse risk

Due to limited oversight and transparency, crypto-assets may be vulnerable to market-abuse practices such as spoofing, pump-and-dump schemes, or insider trading. Such activities can distort prices and expose holders to sudden losses.

15. Legal ownership and jurisdictional risk

Depending on the applicable law, holders of the crypto-asset may not have enforceable ownership rights or effective legal remedies in cases of disputes, fraud, or service failure. In certain jurisdictions, access to exchanges or interfaces may be restricted by regulatory measures, even if on-chain transfer remains technically possible.

16. Concentration risk

A large proportion of the total supply may be held by a small number of holders. This can enable market manipulation, governance dominance, or sudden large-scale liquidations that adversely affect market stability, price levels, and investor confidence.

## I.4 Project implementation-related risks

As this white paper relates to admission to trading of the crypto-asset, the risk description below reflects general implementation risks typically associated with crypto-asset projects and relevant for the crypto-asset service provider. The party admitting the crypto-asset to trading is not involved in the project's implementation and does not assume responsibility for its governance, funding, or execution.

Delays, failures, or changes in the implementation of the project as outlined in its public roadmap or technical documentation may negatively impact the perceived credibility or usability of the crypto-asset. This includes risks related to project governance, resource allocation, technical delivery, and team continuity.

Key-person risk: The project may rely on a limited number of individuals for development, maintenance, or strategic direction. The departure, incapacity, or misalignment of these individuals may delay or derail the implementation.

Timeline and milestone risk: Project milestones may not be met as announced. Delays in feature releases, protocol upgrades, or external integrations can undermine market confidence and affect the adoption, use, or value of the crypto-asset.

Delivery risk: Even if implemented on time, certain functionalities or integrations may not perform as intended or may be scaled back during execution, limiting the crypto-asset's practical utility.

## I.5 Technology-related risks

As this white paper relates to admission to trading of the crypto-asset, the following risks concern the underlying distributed ledger technology (DLT), its supporting infrastructure, and related technical dependencies. Failures or vulnerabilities in these systems may affect the availability, integrity, or transferability of the crypto-asset.

1. Blockchain dependency risk

The functionality of the crypto-asset depends on the continuous and stable operation of the blockchain(s) on which it is issued. Network congestion, outages, or protocol errors may temporarily or permanently disrupt on-chain transactions. Extended downtime or degradation in network performance can affect trading, settlement, or the usability of the crypto-asset.

2. Smart contract vulnerability risk

The smart contract that defines the crypto-asset's parameters or governs its transfers may contain coding errors or security vulnerabilities. Exploitation of such weaknesses can result in unintended token minting, permanent loss of funds, or disruption of token functionality. Even after external audits, undetected vulnerabilities may persist due to the immutable nature of deployed code.

3. Wallet and key-management risk

The custody of crypto-assets relies on secure private key management. Loss, theft, or compromise of private keys results in irreversible loss of access. Custodians, trading venues, or wallet providers may be targeted by cyberattacks. Compatibility issues between wallet software and changes to the blockchain protocol (e.g. network upgrades) can further limit user access or the ability to transfer the crypto-asset.

Outdated or vulnerable wallet software:

Users relying on outdated, unaudited, or unsupported wallet software may face compatibility issues, security vulnerabilities, or failures when interacting with the blockchain. Failure to update wallet software in line with protocol developments can result in transaction errors, loss of access, or exposure to known exploits.

4. Network security risks

Attack risks: Blockchains may be subject to denial-of-service (DoS) attacks, 51% attacks, or other exploits targeting the consensus mechanism. These can delay transactions, compromise finality, or disrupt the accurate recording of transfers.

Centralisation concerns: Despite claims of decentralisation, a relatively small number of validators or a high concentration of stake may increase the risk of collusion, censorship, or coordinated network downtime, which can affect the resilience and operational reliability of the crypto-asset.

5. Bridge and interoperability risk

Where tokens can be bridged or wrapped across multiple blockchains, vulnerabilities in bridge protocols, validator sets, or locking mechanisms may result in loss, duplication, or misrepresentation of assets. Exploits or technical failures in these systems can instantly impact circulating supply, ownership claims, or token fungibility across chains.

6. Forking and protocol-upgrade risk

Network upgrades or disagreements among node operators or validators can result in blockchain "forks", where the blockchain splits into two or more incompatible versions that continue separately from a shared past. This may lead to duplicate token representations or incompatibilities between exchanges and wallets. Until consensus stabilises, trading or transfers may be disrupted or misaligned. Such situations may be difficult for retail holders to navigate, particularly when trading platforms or wallets display inconsistent token information.

7. Economic-layer and abstraction risk

Mechanisms such as gas relayers, wrapped tokens, or synthetic representations may alter the transaction economics of the underlying token. Changes in transaction costs, token demand, or utility may reduce its usage and weaken both its economic function and perceived value within its ecosystem.

8. Spam and network-efficiency risk

High volumes of low-value ("dust") or automated transactions may congest the network, slow validation times, inflate ledger size, and raise transaction costs. This can impair performance, reduce throughput, and expose address patterns to analysis, thereby reducing network efficiency and privacy.

9. Front-end and access-interface risk

If users rely on centralised web interfaces or hosted wallets to interact with the blockchain, service outages, malicious compromises, or domain expiries affecting these interfaces may block access to the crypto-asset, even while the blockchain itself remains fully functional. Dependence on single web portals introduces a critical point of failure outside the DLT layer.

10. Decentralisation claim risk

While the technical infrastructure may appear distributed, the actual governance or economic control of the project may lie with a small set of actors. This disconnect between marketing claims and structural reality can lead to regulatory scrutiny, reputational damage, or legal uncertainty – especially if the project is presented as 'community-governed' without substantiation.

## I.6 Mitigation measures

None.

# Part J – Information on the sustainability indicators in relation to adverse impact on the climate and other environment-related adverse impacts

## J.1 Adverse impacts on climate and other environment-related adverse impacts

### S.1 Name

Crypto Risk Metrics GmbH

### S.2 Relevant legal entity identifier

39120077M9TG0O1FE242

### S.3 Name of the crypto-asset

Arbitrum

### S.4 Consensus Mechanism

The crypto-asset that is the subject of this white paper is available on multiple DLT networks. These include: Ethereum and Arbitrum. In general, when evaluating crypto-assets, all implementations across different networks must always be taken into account, as spillover effects can be adverse for investors.

The following applies to Ethereum:

Ethereum's Proof-of-Stake (PoS) consensus mechanism, introduced with The Merge in 2022, replaces mining with validator staking. Validators must stake at least 32 ETH, and a validator is randomly selected to propose each new block. Once proposed, the other validators verify the block's integrity. The network operates on a slot and epoch system, where a new block is proposed every 12 seconds, and finalisation occurs after two epochs (~12.8 minutes) using Casper-FFG. The Beacon Chain coordinates validators, while the fork-choice rule (LMD-GHOST) ensures the chain follows the heaviest accumulated validator votes. Validators earn rewards for proposing and verifying blocks, but face slashing for malicious behaviour or inactivity. PoS aims to improve energy efficiency, security, and scalability, with upgrades such as Proto-Danksharding (EIP-4844) already implemented to enhance Layer 2 scalability and transaction efficiency.

The following applies to Arbitrum:

Arbitrum is a Layer-2 (L2) solution on Ethereum that is developed using the Arbitrum technology suite. L2 transactions do not have their own consensus mechanism and are only validated by the execution clients. The so-called sequencer regularly bundles stacks of L2 transactions and publishes them on the L1 network, i.e. Ethereum. Ethereum's consensus mechanism (Proof-of-Stake) thus indirectly secures all L2 transactions as soon as they are written to L1.

### S.5 Incentive Mechanisms and Applicable Fees

The crypto-asset that is the subject of this white paper is available on multiple DLT networks. These include: Ethereum and Arbitrum. In general, when evaluating crypto-assets, all implementations

across different networks must always be taken into account, as spillover effects can be adverse for investors.

The following applies to Ethereum:

The crypto-asset's PoS system secures transactions through validator incentives and economic penalties. Validators stake at least 32 ETH and earn rewards for proposing blocks, attesting to valid ones, and participating in sync committees. Rewards are paid in newly issued ETH and transaction fees. Under EIP-1559, transaction fees consist of a base fee, which is burned to reduce supply, and an optional priority fee (tip) paid to validators. Validators face slashing if they act maliciously and incur penalties for inactivity. This system aims to increase security by aligning incentives while making the crypto-asset's fee structure more predictable and deflationary during high network activity.

The following applies to Arbitrum:

Arbitrum is a Layer-2 (L2) solution on Ethereum that is developed using the Arbitrum technology suite. Transactions on Arbitrum are bundled by a so-called sequencer and the result is regularly submitted as a Layer-1 (L1) transaction. This way many L2 transactions get combined into a single L1 transaction. This lowers the average transaction cost per transaction, because many L2 transactions are aggregated into a single L1 transaction. This creates incentives to use Arbitrum rather than the L1, i.e. Ethereum, itself. To get crypto-assets in and out of Arbitrum, a special smart contract on Ethereum is used. Since there is no consensus mechanism on L2, an additional mechanism ensures that only existing funds can be withdrawn from L2. When a user wants to withdraw funds, that user needs to submit a withdrawal request on L1. If this request remains undisputed for a period of time the funds can be withdrawn. During this time period Arbitrum validators can dispute the claim, which will start a dispute resolution process. This process is designed with economic incentives for correct behaviour of all participants.

### S.6 Beginning of the period to which the disclosure relates

2025-03-05

### S.7 End of the period to which the disclosure relates

2026-03-05

### S.8 Energy consumption

1110.18494 kWh/a

### S.9 Energy consumption sources and methodologies

The energy consumption associated with this crypto-asset is aggregated of multiple contributing components, primarily the underlying blockchain network and the execution of token-specific operations. To determine the energy consumption of a token, the energy consumption of the underlying blockchain network Arbitrum and Ethereum is calculated first. A proportionate share of that energy use is then attributed to the token based on its activity level within the network (e.g. transaction volume, contract execution).

The Functionally Fungible Group Digital Token Identifier (FFG DTI) is used to determine all technically equivalent implementations of the crypto-asset in scope.

Estimates regarding hardware types, node distribution, and the number of network participants are based on informed assumptions, supported by best-effort verification against available empirical data. Unless robust evidence suggests otherwise, participants are assumed to act in an economically rational manner. In line with the precautionary principle, conservative estimates are applied where uncertainty exists – that is, estimates tend towards the higher end of potential environmental impact.

### S.10 Renewable energy consumption

37.9124101186 %

### S.11 Energy intensity

0.00007 kWh

### S.12 Scope 1 DLT GHG emissions – Controlled

0.00000 tCO2e/a

### S.13 Scope 2 DLT GHG emissions – Purchased

0.36948 tCO2e/a

### S.14 GHG intensity

0.00002 kgCO2e

### S.15 Key energy sources and methodologies

To determine the proportion of renewable energy usage, the locations of the nodes are to be determined using public information sites, open-source crawlers and crawlers developed in-house. If no information is available on the geographic distribution of the nodes, reference networks are used which are comparable in terms of their incentivisation structure and consensus mechanism. This geo-information is merged with public information from Our World in Data, see citation. The intensity is calculated as the marginal energy cost wrt. one more transaction. Ember (2025); Energy Institute - Statistical Review of World Energy (2024) - with major processing by Our World in Data. "Share of electricity generated by renewables - Ember and Energy Institute" [dataset]. Ember, "Yearly Electricity Data Europe"; Ember, "Yearly Electricity Data"; Energy Institute, "Statistical Review of World Energy" [original data]. Retrieved from https://ourworldindata.org/grapher/share-electricity-renewables.

### S.16 Key GHG sources and methodologies

To determine the GHG emissions, the locations of the nodes are to be determined using public information sites, open-source crawlers and crawlers developed in-house. If no information is available on the geographic distribution of the nodes, reference networks are used which are comparable in terms of their incentivisation structure and consensus mechanism. This geo-information is merged with public information from Our World in Data, see citation. The intensity is calculated as the marginal emission wrt. one more transaction.

Ember (2025); Energy Institute - Statistical Review of World Energy (2024) - with major processing by Our World in Data. “Carbon intensity of electricity generation - Ember and Energy Institute” [dataset]. Ember, “Yearly Electricity Data Europe”; Ember, “Yearly Electricity Data”; Energy Institute, “Statistical Review of World Energy” [original data]. Retrieved from https://ourworldindata.org/grapher/carbon-intensity-electricity licensed under CC BY 4.0.

CRYPTO RISK METRICS
DON'T TRUST. VERIFY.