

Mandatory information on principal adverse impacts on the climate and other environment-related adverse impacts of the consensus mechanism

N	Field	Content
General information		
S.1	Name	Bullish DE GmbH
S.2	Relevant legal entity identifier	2549008CBASK5Q680X12
S.3	Name of the crypto-asset	Bitcoin
S.4	Consensus Mechanism	Proof of Work
S.5	Incentive Mechanisms and Applicable Fees	A Proof-of-Work (PoW) consensus mechanism incentivizes miners to secure the network by publishing updates to the ledger in the form of blocks, containing newly submitted and verified transactions. Miners compete to solve cryptographic puzzles, and the first to succeed earns newly minted crypto-assets (block reward) and user-paid transaction fees. Misconduct, such as attempting to add invalid blocks or rewrite the history of the ledger, results in wasted computational resources and opportunity costs, creating an economic penalty that discourages dishonest behavior.
S.6	Beginning of the period to which the disclosure relates	2024-11-27
S.7	End of the period to which the disclosure relates	2024-12-10
Mandatory key indicator on energy consumption		
S.8	Energy consumption (per year) in kWh	160436365223.84415
Sources and methodologies		
S.9	Energy consumption sources and methodologies	Data and methodology provided by CCRI - Crypto Carbon Ratings Institute (https://carbon-ratings.com). A detailed methodology description is available at https://carbon-ratings.com/dl/whitepaper-mica-methods-2024 .
Supplementary key indicators on energy and GHG emissions		
S.10	Renewable energy consumption (share of energy from renewable generation resources) in %	31.073723778
S.11	Energy intensity (energy used per validated transaction) in kWh	31.63859
S.12	Scope 1 DLT GHG emissions – Controlled (per year) in t CO ₂ eq	0
S.13	Scope 2 DLT GHG emissions – Purchased (per year) in t CO ₂ eq	68150399.58259
S.14	GHG intensity (emissions per validated transaction) in kg CO ₂ eq	13.43949
Sources and methodologies		
S.15	Key energy sources and methodologies	Data and methodology provided by CCRI - Crypto Carbon Ratings Institute (https://carbon-ratings.com). A detailed methodology description is available at https://carbon-ratings.com/dl/whitepaper-mica-methods-2024 .
S.16	Key GHG sources and methodologies	Data and methodology provided by CCRI - Crypto Carbon Ratings Institute (https://carbon-ratings.com). A detailed methodology description is available at https://carbon-ratings.com/dl/whitepaper-mica-methods-2024 .