

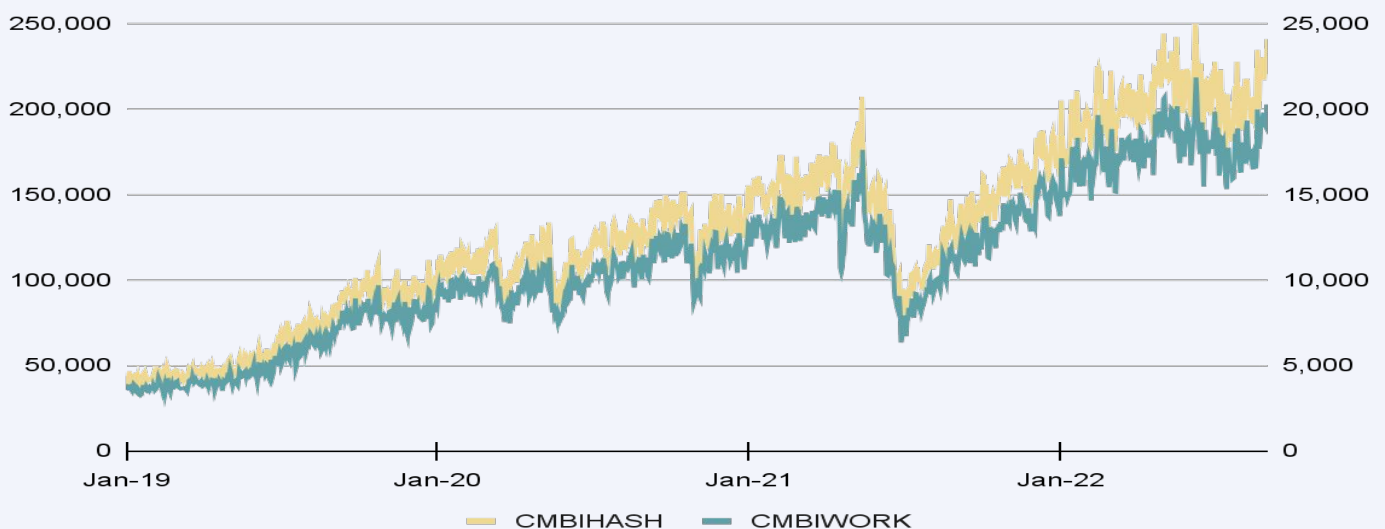
CMBI Mining Series

The CMBI Mining Series provide the cryptoasset community, investors and asset managers with publicly available and investable benchmarks that reliably and accurately track the activity of one of crypto's critical functions, mining.

The CMBI Bitcoin Hash Rate (CMBIHASH) represents the implied hash rate that miners are contributing to Bitcoin at any single point in time. The CMBI Bitcoin Hash Rate utilize a 48hr lookback window to accurately reflect the current performance of miners whilst maintaining resistance to outlier results and potentially manipulative activities.

The CMBI Bitcoin Observed Work (CMBIWORK) utilizes the real-time levels from the CMBI Bitcoin Hash Rate to represent an approximation for the number of hashes that have been conducted over the previous 24hr period.

Historical Performance*



*Performance of indexes prior to their respective launch date is back-tested performance utilizing historical data

Features

Coverage

The CMBI Mining Series currently provides coverage for Bitcoin only.

Objective

Mining indexes are designed to accurately represent mining activity and act as the basis for financial products including derivatives such as futures and swaps.

Transparent

Index design and calculation follow a rules-based process that is publicly available on the Coin Metrics website.

Investability

Assets launched in the CMBI Mining Series have been selected based on the size and activity of mining conducted on their network.

Price

CMBI Hash Rate is measured in Petahashes/second. CMBI Observed Work is measured in Zettahashes/day.

Availability

Mining indexes are calculated every 5 seconds. The close price for the CMBI Mining Series is the 5 second level from 12:00ET.

Performance

INDEX	Level	Level Change			Annualized Level Change		
		1M	3M	YTD	1Y	3Y	5Y
CMBI Bitcoin Hash Rate	224822.13	17%	7%	40%	91%	41%	97%
CMBI Bitcoin Observed Work	19965.23	22%	6%	45%	90%	41%	98%

*Performance of indexes prior to their respective launch date is back-tested performance utilizing historical data

Calendar Year Performance

INDEX	2021	2020	2019	2018	2017
CMBI Bitcoin Hash Rate	3%	58%	141%	180%	488%
CMBI Bitcoin Observed Work	4%	51%	150%	173%	500%

Mining Related Network Data*

INDEX	1M	3M	YTD	2021	2020	2019	2018
Blocks Produced per Day	150	144	146	144	145	149	149
Mean Block Size (Bytes)	1151729	1177323	1178725	1223749	1188946	1074397	888150
Mean Difficulty (millions)	28369400	29002729	28265455	20325259	16590055	8995566	4970595

*Performance of indexes prior to their respective launch date is back-tested performance utilizing historical data

Mining Revenues*

INDEX	1M	3M	YTD	2021	2020	2019	2018
Mean Fee (BTC)	0.09	0.11	0.09	0.42	0.52	0.37	0.45
Mean Fee (USD)	\$2,005	\$2,502	\$2,966	\$20,037	\$6,345	\$2,867	\$4,880
Mean Subsidy(BTC)	6.25	6.25	6.25	6.25	8.50	12.50	12.50
Mean Subsidy(USD)	\$139,115	\$141,440	\$206,323	\$296,492	\$87,736	\$92,065	\$93,989
Mean Reward (BTC)	6.34	6.36	6.34	6.67	9.02	12.87	12.95
Mean Reward (USD)	\$141,120	\$143,942	\$209,289	\$316,529	\$94,081	\$94,932	\$98,868

*Mining related network data is calculated using Coin Metrics Network Data Pro end of day values(00:00UTC)

Specifications

	CMBI Bitcoin Hash Rate	CMBI Bitcoin Observed Work
Launch Date	Sep 23, 2020	Sep 23, 2020
Base Date	Aug 08, 2015	Jan 3, 2017
Base Value	100	100
Calculation Currencies	USD	USD

Contact Us

To learn more, visit:

<https://coinmetrics.io/cm-indexes/>

CMBI Services

cmbi@coinmetrics.io

CMBI Services

customindex@coinmetrics.io

Disclaimer

CMBI is a division of Coin Metrics, Inc, a cryptoasset data provider. Information displayed throughout this document has been curated for informational purposes only. No responsibility or liability can be accepted by any member of Coin Metrics or any third party licensee of CMBI for any loss or damage in part or in whole that relates to any error involved in procuring, compiling, calculating, analyzing, interpreting or delivering the information or data contained herein.

No member or associated partner of Coin Metrics provides investment advice and as such no information displayed in this document should be considered as an endorsement for an underlying asset, as investment advice or as constituting financial advice. Coin Metrics administered indexes cannot be invested in directly. Exposure to an asset represented in a CMBI Product may be available through an investable structured financial product that is offered by a third party licensee. Inclusion in an index should not be perceived or considered as a recommendation to buy, sell or hold an asset and a decision to invest in any such asset should not be made based off of any information contained herein. Coin Metrics does not sponsor, endorse or manage any investment product that seeks to provide an investment return based on the performance of any of the Coin Metrics Bletchley Indexes.

Information curated and displayed within this document should not be acted upon without the advice and guidance from licenced legal, tax and investment professionals.

None of the information contained herein is to be reproduced, used or distributed without prior written consent from Coin Metrics.

Past performance of any index is no guarantee or predictor of future results. Index returns displayed may not represent the results attainable from actually trading the underlying assets of the index. Performance of indexes prior to their respective launch date is back-tested performance and is hypothetical performance rather than actual performance. Back-tested performance utilizes the same methodology that was in effect when the index was officially launched.