



Paul S. Atkins  
Chairman  
U.S. Securities and Exchange Commission  
100 F Street, NE  
Washington, DC 20549

Hester M. Peirce  
Commissioner and Chair of Crypto Task Force  
U.S. Securities and Exchange Commission  
100 F Street, NE  
Washington, DC 20549

August 11, 2025

Re: Request for Guidance on Decentralized Oracle Networks

Dear Chairman Atkins, Commissioner Peirce, and the Crypto Task Force:

Douro Labs LLC (“Douro”) welcomes the opportunity to continue its conversation with the Crypto Task Force concerning the ability of market participants to rely on pricing data from decentralized oracle networks. Douro was an initial contributor to the Pyth Network (“Pyth”), the world’s leading decentralized oracle network for first-party financial data.

Douro respectfully requests that Staff from the Divisions of Investment Management and Trading and Markets issue guidance clarifying that the securities laws do not preclude the use of pricing data from decentralized oracle networks to calculate the value of assets, so long as the networks meet certain quality, transparency, and resiliency standards. Inter-divisional guidance would clear the way for sophisticated market participants like broker-dealers, investment advisers, and investment companies to use such data to perform critical regulatory calculations concerning valuation (such as those involving value at risk, net capital, and liquidity risk management).

As explained below, pricing data from high-quality decentralized oracle networks is comprehensive, trustworthy, and affordable. Greater use of decentralized oracle networks’ pricing data therefore would facilitate increased competition in the market for financial data. Such competition would lower prices for investors and drive innovation as legacy providers cut their prices or seek to improve their product offerings to compete with data from decentralized oracle networks. Yet regulatory uncertainty that was fostered under prior SEC leadership is currently preventing realization of the benefits that decentralized oracle networks can offer investors and the capital markets.

Douro respectfully requests that the Staff issue clarifying guidance concerning the use of data from decentralized oracle networks for valuation purposes, similar to the Staff’s guidance on digital-

asset custody and distributed ledger technology.<sup>1</sup> Such guidance would benefit a wide range of market participants, align with the recommendations of Chairman Atkins and the President’s Working Group on Digital Asset Markets,<sup>2</sup> and advance the President’s objective “to promote United States leadership in digital assets and financial technology.”<sup>3</sup>

## **The Advantages of Decentralized Oracle Networks**

Blockchain oracles are computer programs that connect blockchains to information from the outside world. Some oracles are centralized, meaning that they rely on a single entity to collect and validate information. But others are decentralized, meaning that they use blockchain protocols and a dispersed validator set to aggregate and synthesize information from many sources.

Pyth is an example of a decentralized oracle. Using blockchain technology, Pyth continuously publishes low-latency, real-time pricing information for over 1600 equities, digital assets, commodities, and foreign-currency pairs. The network sources the underlying data from over 120 major market participants (including exchanges, market makers, and trading firms), autonomously applies an algorithm to combine that data into a single price feed, and publishes that estimate for both on-chain and off-chain applications.

By harnessing the power of blockchain protocols, decentralized oracle networks like Pyth enjoy key structural advantages over centralized sources of information. Because a decentralized oracle network does not have a single point of failure (like the single entity that collects and validates information for a centralized oracle), the information it publishes can be more trusted and less vulnerable to manipulation than information from centralized sources. And open-source decentralized systems like Pyth allow anyone to see how the protocol works and who contributes to it, further increasing trust in the data produced.

## **Decentralized Oracles Can Enhance Pricing in the Securities Markets**

Broker-dealers, investment advisers, and other sophisticated market participants need accurate securities pricing data to calculate the value of assets and comply with regulatory mandates. For example, broker-dealers need quality pricing data to determine whether they have sufficient liquid

---

<sup>1</sup> Division of Trading and Markets, SEC, *Frequently Asked Questions Relating to Crypto Asset Activities and Distributed Ledger Technology* (May 15, 2025), <https://www.sec.gov/rules-regulations/staff-guidance/trading-markets-frequently-asked-questions/frequently-asked-questions-relating-crypto-asset-activities-distributed-ledger-technology> (“Crypto FAQs”).

<sup>2</sup> Chairman Paul S. Atkins, SEC, *American Leadership in the Digital Finance Revolution* (July 31, 2025), <https://www.sec.gov/newsroom/speeches-statements/atkins-digital-finance-revolution-073125> (“*American Leadership*”); President’s Working Group on Digital Asset Markets, *Strengthening American Leadership in Digital Financial Technology* (July 30, 2025), <https://www.whitehouse.gov/wp-content/uploads/2025/07/Digital-Assets-Report-EO14178.pdf> (“PWG Report”).

<sup>3</sup> Executive Order No. 14178, *Strengthening American Leadership in Digital Financial Technology*, 90 Fed. Reg. 8,647, 8,647 (Jan. 23, 2025).

capital under the Net Capital Rule.<sup>4</sup> Investment advisers rely on pricing data to calculate and report their funds’ net asset values under Form PF.<sup>5</sup> And investment companies use pricing data to establish liquidity risk-management programs under Rule 22e-4 and to implement risk-management measures under Rule 18f-4 when they engage in derivatives transactions.<sup>6</sup>

Currently, market participants purchase securities pricing data from securities information processors (“SIPs”), exchanges, and second-party data distributors. But that data is far from perfect. It is expensive, and it can be less comprehensive. Propriety exchange data, for example, is regional—not global—and by definition does not include off-exchange trading, such as over-the-counter trading and trading on alternative trading systems.

For many sophisticated market participants, data from decentralized oracle networks can offer an important and affordable alternative or supplement to existing sources of market information. Pyth provides one such example, and its design shows how decentralized oracle networks can be used to produce financial data that is uniquely comprehensive, trustworthy, and affordable.

*First*, Pyth’s data is comprehensive. Pyth attracts all kinds of market participants (such as exchanges, market makers, and trading firms) to serve as “publishers.” Pyth’s feeds reflect the global price for an asset because Pyth aggregates data from publishers all over the world. Pyth’s diverse set of publishers includes Cboe, IEX, Jump Trading, Jane Street, Optiver, Two Sigma Securities, and Binance, among many others.<sup>7</sup> Its feeds thus incorporate data from the many other places that market participants can trade beyond exchanges.

*Second*, Pyth’s data is trustworthy. That is because Pyth’s requirements for publishers, compensation structure, and aggregation methodology are designed to maximize the accuracy and transparency of the network.

- Pyth’s requirements for publishers promote accuracy and transparency. Pyth permits only validated market participants with first-party trading data to serve as publishers, thereby ensuring that its data comes from only those who are involved in price discovery. Pyth penalizes publishers whose data does not meet quality standards.<sup>8</sup> And it requires all publishers to identify themselves, putting their reputations on the line and mitigating the risk of collusion and market manipulation.
- Pyth’s compensation structure encourages publishers to provide high-quality data. Publishers are compensated through a combination of the network’s own “native” tokens and

---

<sup>4</sup> 17 C.F.R. § 240.15c3-1.

<sup>5</sup> *Id.* § 279.9.

<sup>6</sup> *Id.* §§ 270.22e-4, 270.18f-4. Importantly, these are merely a few, non-exhaustive examples of provisions for which data from decentralized oracle networks could be useful.

<sup>7</sup> A full list is available at <https://kpi.pyth.network/ecosystem>.

<sup>8</sup> See *Publisher Quality Ranking*, Pyth Network (July 25, 2025), <https://docs.pyth.network/home/oracle-integrity-staking/publisher-quality-ranking>.

usage fees paid by data users. Publishers are encouraged to continuously stake Pyth's tokens to publish their data and can earn additional native tokens by engaging in conduct that promotes the health of the network, such as by providing data for relatively less liquid assets.<sup>9</sup> But publishers are also penalized if they provide low-quality data.<sup>10</sup> This compensation structure thus gives publishers skin in the game and incentivizes them to act in the interest of data users and the network.

- Pyth's aggregation methodology is also designed to promote accuracy and transparency. Publishers submit a price and a confidence interval.<sup>11</sup> Each of those data points—the price, the upper bound, and the lower bound—is then treated as a separate “vote” in a price calculation that takes the median of all votes provided by all publishers.<sup>12</sup> That promotes accuracy by ensuring the views of more confident publishers (with narrower confidence intervals) are weighted more heavily than the views of less confident publishers. Moreover, Pyth makes public its aggregation methodology and structures its price feed as a price with a confidence interval, thereby increasing transparency and helping users to understand the nature of the information they are receiving.<sup>13</sup>

*Third*, Pyth's data is affordable. Pyth does not rely primarily on existing (and expensive) sources of data, such as exchanges. Instead, the network aggregates its data from a wide variety of market participants, many of whom have not previously monetized their data. The upshot is that Pyth faces lower costs for its data and can pass those savings onto users.

These three characteristics mean that greater adoption of data from a decentralized oracle network like Pyth (or a decentralized oracle network that has baseline attributes similar to Pyth's) would support “the protection of investors” and “promote efficiency, competition, and capital formation.” 15 U.S.C. § 77b(b) (Securities Act), § 78c(f) (Exchange Act), § 80a-2(c) (Investment Company Act), § 80b-2(c) (Investment Advisers Act).

- Competition: Financial data from decentralized oracle networks can be more affordable but at least as accurate and reliable as financial data from legacy providers for certain purposes. Greater adoption of oracle-network data therefore would significantly increase competition in the market for financial data. That would result in lower costs for investors and increased innovation in the market for financial data as other legacy providers cut their prices or try to improve their products to compete with data from decentralized oracle networks.

---

<sup>9</sup> See *Pyth Distribution*, Pyth Network (July 25, 2025), <https://docs.pyth.network/home/pyth-token/pyth-distribution>; *Oracle Integrity Staking*, Pyth Network (July 25, 2025), <https://docs.pyth.network/home/oracle-integrity-staking>.

<sup>10</sup> *Oracle Integrity Staking*, *supra* note 9.

<sup>11</sup> See *Price Aggregation*, Pyth Network (July 25, 2025), <https://docs.pyth.network/price-feeds/how-pyth-works/price-aggregation>.

<sup>12</sup> *Id.*

<sup>13</sup> *Id.*

- Efficiency: Increased competition in the market for financial data would promote efficiency in the securities markets by allowing investors and investment professionals to evaluate and execute trades more effectively and efficiently. Data from high-quality decentralized oracle networks could also increase the efficiency of prices for covered securities by making more information available to the market, including (for example) trading data for debt securities and from over-the-counter trading and alternative trading systems.
- Investor Protection: As Congress recognized when it enacted Section 11A of the Exchange Act, “[i]t is in the public interest and appropriate for the protection of investors ... to assure ... the availability to brokers, dealers, and investors of information with respect to quotations for and transactions in securities.”<sup>14</sup> Making available new sources of high-quality data, such as data from decentralized oracle networks, would do just that.
- Capital Formation. Increased efficiency and competition in the market for financial data ultimately decreases transaction costs and makes it cheaper for companies to raise capital, thereby improving capital formation.

The use of first-party financial data from decentralized oracle networks also would promote the President and Chairman Atkins’ objective to promote American leadership in financial innovation and blockchain technology.<sup>15</sup> As the report of the President’s Working Group on Digital Asset Markets explained, oracles are one of the “infrastructure providers and tools” that are “integral to the functioning of blockchain networks.”<sup>16</sup> The report therefore urged the SEC to consider regulatory changes that “facilitate the use of oracles.”<sup>17</sup> That is for good reason. High-quality decentralized oracles are necessary to achieve an important goal of the President’s Working Group and SEC Commissioners: increasing the efficiency and openness of financial markets by bringing securities transactions onto the blockchain.<sup>18</sup> Simply put, securities markets cannot operate effectively on blockchains without access to off-chain data, and high-quality decentralized oracle networks offer the best way to bring that information on-chain.

---

<sup>14</sup> 15 U.S.C. § 78k-1(a)(1)(C).

<sup>15</sup> See generally Executive Order No. 14178, *supra* note 3; *American Leadership*, *supra* note 2.

<sup>16</sup> PWG Report, *supra* note 2, at 28.

<sup>17</sup> *Id.* at 52.

<sup>18</sup> See, e.g., *id.*; *American Leadership*, *supra* note 2; Commissioner Hester M. Peirce, SEC, *Getting Smart – Tokenization and the Creation of Networks for Smart Assets: Opening Remarks for Tokenization Roundtable* (May 12, 2025), <https://www.sec.gov/newsroom/speeches-statements/peirce-remarks-crypto-roundtable-tokenization-051225>; Commissioner Mark T. Uyeda, SEC, *Tokenization of Real-World Assets* (May 12, 2025), <https://www.sec.gov/newsroom/speeches-statements/uyeda-remarks-crypto-roundtable-tokenization-051225>.

## The Staff Should Provide Guidance on the Use of Pricing Data from Decentralized Oracle Networks

To promote the adoption of data from decentralized oracle networks, the Staff should issue guidance clarifying that sophisticated market participants like broker-dealers, investment advisers, and investment companies can use such networks' pricing data for valuation purposes.

The securities laws and regulations do not currently prohibit the use of data from decentralized oracle networks. Applicable securities-law regulations and forms addressing valuation—such as Form PF, the Net Capital Rule, Rule 22e-4, and Rule 18f-4—are principles-based rather than prescriptive, and the use of data from high-quality decentralized oracle networks satisfies the standards they establish. But sophisticated market participants have been reticent to use blockchain technologies in innovative ways due to the campaign of “regulation through enforcement” under the Commission’s previous leadership, which deprived parties of fair notice about the conduct that the agency would target as illegal.<sup>19</sup>

Douro therefore respectfully requests that the Staff issue guidance explaining that market participants may use pricing data from decentralized oracle networks to perform mandatory regulatory calculations concerning valuation. Such guidance would advance Chairman Atkins’ goal of “swiftly develop[ing] proposals to implement the [President’s Working Group] recommendations,” including the specific recommendation to “facilitate the use of oracles.”<sup>20</sup> Given the rules and forms implicated, Douro respectfully requests that Staff provide guidance in the form of interdivisional FAQs similar to the guidance it has issued concerning digital-asset custody and distributed ledger technology.<sup>21</sup>

The FAQs would:

- Define a decentralized oracle network;
- Outline threshold attributes of a high-quality decentralized oracle network, as recommended below; and
- Explain that the Staff would not object to the use of data from a high-quality decentralized oracle network for valuation purposes under the Net Capital Rule (concerning net capital requirements for broker-dealers), Form PF (concerning net asset value reporting for investment advisers), Rule 22e-4 (concerning liquidity risk-management programs for investment companies), and Rule 18f-4 (concerning risk-management measures for investment companies engaging in derivatives transactions).<sup>22</sup>

---

<sup>19</sup> Chairman Paul S. Atkins, SEC, *Prepared Remarks Before SEC Speaks* (May 19, 2025), <https://www.sec.gov/newsroom/speeches-statements/atkins-prepared-remarks-sec-speaks-051925>.

<sup>20</sup> *American Leadership*, *supra* note 2; PWG Report, *supra* note 2, at 52.

<sup>21</sup> *Crypto FAQs*, *supra* note 1.

<sup>22</sup> If helpful, Douro would welcome the opportunity to assist the Staff by providing a working draft of potential FAQs.

Based on its expertise with designing decentralized oracle networks, Douro recommends that the Staff define decentralized oracle networks based on the following characteristics, which will help ensure the accuracy and robustness of data produced by the networks:

- Quality: Decentralized oracle networks are only as good as their inputs. The Staff's guidance should apply only to decentralized oracle networks that take steps to offer high-quality data, such as limiting inputs to first-party data from market participants who are directly involved in price discovery and designing consensus protocols to incentivize publishers to provide high-quality data.
- Transparency: Sophisticated market participants cannot reasonably rely on data from decentralized oracle networks if they do not understand the information they are seeing. The Staff's guidance should apply only to decentralized oracle networks that disclose their publisher sets, aggregation methodologies, and price-calculation mechanisms.
- Resiliency: Decentralized oracle networks that are susceptible to market manipulation cannot achieve their true potential. Thus, the Staff's guidance should apply only to decentralized oracle networks that take steps to prevent data manipulation, such as by having a large and diverse publisher set, incorporating weighting algorithms into their consensus protocols, and creating incentives that deter publishers from providing false or low-quality data.

\* \* \*

Douro appreciates its continuing opportunity to engage with the Commission and Staff concerning topics important to the blockchain industry and the securities markets. Douro believes that Staff guidance is the most efficient and comprehensive way to provide market participants with the clarity needed to achieve the innovation and U.S. leadership in digital financial markets envisioned by the President and Chairman Atkins. Douro is also open to discuss alternative forms of relief (such as no-action relief or exemptive relief) if the Staff determines that they would be more appropriate.

Douro would welcome the opportunity to discuss decentralized oracle networks with members of the Staff assigned to the Crypto Task Force, the Division of Trading and Markets, and the Division of Investment Management. We are available at your convenience to continue this important conversation.

Respectfully,



Brandon H. Ferrick  
General Counsel  
Douro Labs LLC