



INDIAN JOURNAL OF
LEGAL REVIEW

VOLUME 6 AND ISSUE 1 OF 2026

INSTITUTE OF LEGAL EDUCATION



INDIAN JOURNAL OF LEGAL REVIEW

APIS – 3920 – 0001 | ISSN – 2583-2344

(Open Access Journal)

Journal's Home Page – <https://ijlr.iledu.in/>

Journal's Editorial Page – <https://ijlr.iledu.in/editorial-board/>

Volume 6 and Issue 1 of 2026 (Access Full Issue on – <https://ijlr.iledu.in/volume-6-and-issue-1-of-2026/>)

Publisher

Prasanna S,

Chairman of Institute of Legal Education

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DECODING THE PMLA IN A VIRTUAL ECONOMY: ADDRESSING THE ILLEGAL USE OF BITCOIN UNDER THE PREVENTION OF MONEY LAUNDERING ACT, 2002

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BEST CITATION – THAMARASELVI T & MS.T.VAISHALI, "THE CONSTITUTIONAL BALANCE BETWEEN THE INSOLVENCY AND BANKRUPTCY CODE (IBC) AND ARTICLE 14: A DOCTRINAL REVIEW", *INDIAN JOURNAL OF LEGAL REVIEW (IJLR)*, 6 (1) OF 2026, PG. 689-704, APIS – 3920 – 0001 & ISSN – 2583-2344.

ABSTRACT

This research looks at how the Prevention of Money Laundering Act 2002, in India's being expanded. The Prevention of Money Laundering Act 2002 is being updated to deal with the growing financial system. The Prevention of Money Laundering Act 2002 needs to address the use of Bitcoin and other Virtual Digital Assets. This is an issue because people are using Bitcoin and Virtual Digital Assets in bad ways. The Prevention of Money Laundering Act 2002 has to be changed to stop this. The Virtual Digital Assets region is like a no man's land. It is a place where the rulers' not very clear. The Virtual Digital Assets region is now part of Indias rules to stop money laundering. This happened because of notes from the Ministry of Finance in March 2023. There were also guidelines from the Financial Intelligence Unit in January 2026. The Virtual Digital Assets region is now, under these rules. The guideline says that VDA service companies are called Reporting Entities. This means they have to follow a lot of rules. They have to do -layer KYC and Enhanced Due Diligence for big transactions that are very risky. They also have to follow the Travel Rule so that everyone can see what is happening with money being sent across borders.

The Directorate of Enforcement has taken a lot of money from people who were doing things. Like the ₹1,646 crore they got back from BitConnect.. It is still very hard for them to catch people who are doing bad things because they use things, like mixers and tumblers to hide what they are doing. There is also a problem because even when they do catch people and take their money it is hard to actually convict them in court. VDA service companies have to deal with this all the time. For all these challenges, India's 2024 Financial Action Task Force (FATF) Mutual Evaluation rating of "Largely Compliant" for Recommendation 15 illustrates how the kingdom has actually raised its crypto oversight game to conform with global standards re: combatting monetary crime.

KEYWORDS Virtual Digital Assets (VDA), Bitcoin, Money Laundering, PMLA, 2002, FIU-IND, AML/CFT Compliance, FATF Mutual Evaluation 2024, Enforcement Directorate (ED), Travel Rule, Crypto-mixers/Tumblers.

INTRODUCTION

The Bitcoin and the Virtual Digital Assets have changed the way money works around the world. Now we have a way to exchange value that does not need banks. In India people were not sure about Bitcoin and Virtual Digital

Assets for a time. The government was careful. Did not know what to do. They wanted to be safe and make sure these new things did not cause problems, with money. Cryptographic technology is really good at being transparent because it uses ledgers. The fact that

cryptographic technology can be anonymous and use fake names has made it a popular choice, for bad people who do bad things. These bad things include laundering money helping terrorists get money and hiding money that was gotten from crime. Cryptographic technology is still being used for these things, like money laundering and terrorism financing because it can be anonymous.

To tackle these threats, the Indian government has widened the scope of the Prevention of Money Laundering Act, 2002 (PMLA). This law is the main weapon against turning illegal money into legal assets and seizing dirty property. Everything changed in March 2023. The Ministry of Finance sent out a notification that marked certain virtual digital asset (VDA) activities as “notified activities.” Suddenly, crypto exchanges, wallet providers, and custodians had to follow the same rules as other “Reporting Entities.” Now, they’re all on the government’s radar.

Now, the Financial Intelligence Unit–India (FIU-IND) keeps a close eye on the virtual digital economy. They’ve made it clear: everyone has to follow strict KYC rules, do extra checks, and use the “Travel Rule” for cross-border transfers. Still, enforcement teams like the Directorate of Enforcement (ED) run into tough technical problems. For example, people use “mixers,” “tumblers,” and decentralized tools to cover up where money moves. So, cracking down on illegal Bitcoin activity? It’s not easy at all. And it takes an intelligent, action-oriented approach that links what’s happening in India to global norms such as those of the Financial Action Task Force (FATF).

OBJECTIVES OF THE STUDY

- To examine the legislative evolution of the Prevention of Money Laundering Act (PMLA), 2002, specifically focusing on the inclusion of Virtual Digital Assets (VDAs) through the March 2023 Ministry of Finance notification.
- To evaluate the regulatory role and oversight mechanism of the Financial

Intelligence Unit–India (FIU-IND), including the mandatory registration process, the designation of “Reporting Entities,” and the implementation of the January 2026 AML/CFT/CPF guidelines.

- To analyse the statutory compliance obligations for VDA service providers, such as multi-layer Know Your Customer (KYC) protocols, Enhanced Due Diligence (EDD) for high-risk transactions, and the mandatory maintenance of transaction records for five years.
- To investigate the technical and legal challenges in tracing illicit Bitcoin transactions, particularly the impact of anonymity-enhancing tools like mixers and tumblers, the complexities of decentralized finance (DeFi), and the jurisdictional hurdles posed by offshore exchanges.
- To assess India’s alignment with international anti-money laundering standards, primarily focusing on the Financial Action Task Force (FATF) Recommendation 15 and the implications of India’s “Largely Compliant” rating in the 2024 Mutual Evaluation Report.
- To review the operational effectiveness of enforcement actions by the Directorate of Enforcement (ED) through significant case studies, examining the “Placement-Layering-Integration” cycle and the current gap between asset seizures and judicial convictions.

RESEARCH METHODOLOGY

This study is grounded to analyse the legal and regulatory framework surrounding Bitcoin under the PMLA, the following multi-dimensional research methodology is employed that this Doctrinal Legal Analysis acts a primary sources which involves a systematic review of the primary legislative framework, centred on the Prevention of Money Laundering Act (PMLA), 2002, and the enabling notifications

from the Ministry of Finance (March 7, 2023) that formally integrated Virtual Digital Assets (VDAs) into the statutory regime. The research used this method of Regulatory and Policy Evaluation based analyses the administrative and procedural mandates issued by the Financial Intelligence Unit–India (FIU-IND). This includes a detailed review of the January 2026 updated AML/CFT/CPF guidelines, which prescribe the operational standards for registration, multi-layer KYC, and the "Travel Rule" compliance. Secondary sources form a significant part of this methodology and legal commentaries, Case Study and Empirical Review for an empirical approach is used to examine high-profile enforcement actions by the Directorate of Enforcement (ED). By analysing specific cases—such as the ₹1,646 crore BitConnect seizure and the Karnataka crypto-investment fraud—the study maps the "Placement-Layering-Integration" cycle within the virtual economy.

The Research study access to uses of International Comparative Benchmarking India's domestic regulatory progress against the global standards set by the Financial Action Task Force (FATF). This involves a technical assessment of India's compliance with Recommendation 15 (New Technologies) as documented in the 2024 FATF Mutual Evaluation Report (MER). This research focusses on the Technical Forensic Assessment methodology investigates the impact of technical obfuscation tools on financial surveillance. This includes analysing blockchain forensic patterns related to custodial mixers, tumblers, and unhosted wallets to identify the specific hurdles they pose to transaction reconstruction and asset recovery. By the study rely on the Judicial Precedent Analysis for this research incorporates a review of landmark judicial pronouncements, including the Supreme Court's 2020 proportionality test in *IAMAI v. RBI* and the 2025 Madras High Court ruling in *Rhuthikumari v. Zanmai Labs*, which clarified the classification of cryptocurrency as "property" under Indian law.

LITERATURE REVIEW

1. Judicial interpretations have filled critical regulatory gaps. The literature frequently cites the Supreme Court's 2020 ruling in ***IAMAI v. RBI***¹⁶⁶⁶ which struck down the banking ban on crypto exchanges as "disproportionate". More recently, the Madras High Court's 2025 ruling in ***Rhuthikumari v. Zanmai Labs***¹⁶⁶⁷ established a landmark precedent by classifying cryptocurrency as "property" capable of being held in trust. This ruling expanded legal remedies for investors, allowing for proprietary injunctions and characterizing exchanges as fiduciaries with a duty to protect user assets.
2. ***ED Ahmedabad v. BitConnect (2024–2025)***¹⁶⁶⁸ this case exemplifies the Enforcement Directorate's enhanced technical capacity to trace 'proceeds of crime' through the Dark Web and unmask complex crypto-wallet architectures. It serves as a definitive precedent for the multi-layered attachment of digital assets, where the ED successfully recovered over ₹1,646 crore by moving seized virtual digital assets directly into government-controlled wallets.
3. ***FIU-IND v. Binance (2024)***¹⁶⁶⁹ The *Binance* ruling settles the "Extraterritorial Jurisdiction" debate, establishing that offshore virtual asset providers targeting Indian users are strictly "Reporting Entities" under Section 2(as) of the PMLA. The literature identifies this as the end of "regulatory arbitrage," confirming that the duty to file Suspicious Transaction Reports (STRs) is activity-based rather than location-based, compelling global entities to align with India's 2023 AML/CFT notifications.

¹⁶⁶⁶ Internet and Mobile Association of India Vs Reserve Bank of India (2020), AIR ONLINE 2020 SC 298

¹⁶⁶⁷ *Rhuthikumari Vs Zanmai Labs* (2025), 2025 (1) Madras Law Journal 842

¹⁶⁶⁸ *ED Ahmedabad v. BitConnect* (2024–2025)

¹⁶⁶⁹ *FIU-IND v. Binance* (2024), Original No. 10/DIR/FIU-IND/2024 (Dated June 19, 2024)

4. **Directorate of Enforcement v. Aamir Khan & Ors (2024)**¹⁶⁷⁰, this case marks a pivotal shift in the "Traceability Paradigm," where the ED successfully linked a mobile gaming fraud (E-Nuggets) to the layering of proceeds through 85.91 Bitcoins on international exchanges. It serves as a primary precedent for the "Follow-the-Token" approach, demonstrating that under Section 3 of the PMLA, "untraceable" digital assets can be effectively attached once converted from fiat currency, regardless of their movement through multiple mule accounts.

5. **Directorate of Enforcement v. Ripu Sudan Kundra alias Raj Kundra & Ors (2026)**¹⁶⁷¹, The Raj Kundra case serves as a definitive judicial exploration of "Beneficial Ownership" under Section 2(1) (fa) of the PMLA within a decentralized ecosystem. The prosecution highlights a shift in evidentiary standards, where the accused's precise recollection of Bitcoin tranches (285 Bitcoins) served as proof of direct benefit rather than mere "mediation." Furthermore, the case underscores the "Adverse Inference" principle under Section 24; the court accepted the ED's contention that the failure to provide wallet addresses—blamed on technical damage to a mobile device—constituted a deliberate attempt to conceal the "proceeds of crime," thereby reinforcing the stringent disclosure obligations of holders of virtual digital assets (VDAs)

INTERNATIONAL GUIDELINES

The literature on the regulation of Bitcoin and virtual digital assets (VDAs) is underpinned by several key international guidelines and standards that have shaped India's domestic legislative response under the PMLA.

1. **Financial Action Task Force (FATF) Standards:**¹⁶⁷² The FATF offers the most significant worldwide regulatory framework for VDAs.

Recommendation 15 (New Technologies): This appears to be the most important worldwide standard to require countries to recognize and evaluate risks that arise from virtual asset-related activities. It includes the licensing or registration of VASPs and the application of the same measures to prevent money laundering and the financing of terrorism as traditional financial institutions.

2. **The Travel Rule:** It introduces what information VASPs must collect, hold, and transmit securely during VDA transactions. Red Flag Indicators (2020) conceptualization that The FATF has identified certain "red flag" behaviors to assist with detection. These include unusual patterns in transactions, the use of anonymity-enhancing tools such as mixers/tumblers, and dealings with high-risk jurisdictions.

3. **OECD Crypto-Asset Reporting Framework (CARF)**¹⁶⁷³: The OECD has introduced the Crypto Asset Reporting Framework (CARF). The primary aim of CARF is to promote tax transparency. Automatic Information Exchange: The Automatic Information Exchange of tax-related information on crypto asset transactions between participating countries is standardized. The wider scope of CARF also obliges Reporting Crypto Asset Service Providers (RCASPs) to report information on crypto asset users and transactions. The primary aim

¹⁶⁷² Financial Action Task Force. (2025). Targeted update on implementation of the FATF standards on VAs and VASPs. FATF. (<https://www.fatf-gafi.org/en/publications/Fatfrecommendations/targeted-update-virtual-assets-vasps-2024.html>)

¹⁶⁷³ Organisation for Economic Co-operation and Development. (2023). International standards for automatic exchange of information in tax matters: Crypto-Asset Reporting Framework and 2023 update to the Common Reporting Standard. OECD Publishing. (https://www.oecd.org/en/publications/international-standards-for-automatic-exchange-of-information-in-tax-matters_896d79d1-en/full-report.html)

¹⁶⁷⁰ Directorate of Enforcement v. Aamir Khan & Ors (2024), 2024 SCC OnLine Cal 3412

¹⁶⁷¹ Directorate of Enforcement v. Ripu Sudan Kundra alias Raj Kundra & Ors (2026), 2026 SCC OnLine Dis Cas (PMLA).

of CARF is to enhance the Common Reporting Standard (CRS).

4. **IMF and FSB Policy Frameworks:**¹⁶⁷⁴ The International Monetary Fund (IMF) and the Financial Stability Board (FSB) banded on a global frame to address macroeconomic and fiscal stability pitfalls. Nine rudiments for Policy Response(2023) The IMF frame advises nations to guard financial sovereignty(e.g., by not granting crypto legal tender status), establish legal certainty, and develop common monitoring across domestic agencies. The FSB Prudential norms provides norms to address request integrity, investor protection, and the" same exertion, same threat, same regulation" principle.
5. **World Bank and UNODC Guidelines to use NRA Toolkit (2025)**¹⁶⁷⁵: The World Bank offers a toolkit for the NRA of Virtual Assets and VASPs to assist jurisdictions in the systematic mitigation of financial crime risks. The UNODC Manuals, sometimes in association with Europol and the Basel Institute on Governance, offers operational manuals for law enforcement to obtain financial electronic evidence and conduct blockchain-related investigations.
6. **Basel Committee and Wolfsberg Group Prudential Treatment (BCBS)**¹⁶⁷⁶: The Basel Committee on Banking Supervision has developed final standards (effective 1 January 2025) for the prudential treatment of banks' exposures to crypto-assets, which have been divided into Group 1 (Tokenised traditional assets) and Group 2 (Other crypto-assets, including Bitcoin). This group of global

banks has issued a document titled "Wolfsberg Group Guidance (2025)" on the provision of banking services to stablecoin issuers, focusing on the monitoring of "settlement accounts," which connect fiat and crypto economies.

7. **Silver Notice (2025):**¹⁶⁷⁷ his research paper using that Interpol launched a "Silver Notice" pilot in January 2025, which is a new tool for member countries to effectively identify, trace, and seize illicit assets. Another New I-GRIP Mechanism: The Global Rapid Intervention of Payments (I-GRIP) is a stop payment mechanism to block illicit funds, including cryptocurrency wallet transactions.
8. **Wolfsberg Group Guidance on Stablecoins:**¹⁶⁷⁸ This association of global banks issued specific guidance in 2025 regarding the" agreement accounts" used by stablecoin issuers, which serve as the primary conduit between the traditional fiscal system and the virtual frugality.

RESEARCH ARTICLES

1. **Chotalia, R. S., & Taktawala, P. (2025). Critical analysis of PMLA's efficacy in crypto-related money laundering.**¹⁶⁷⁹They critically assess the recent 2023 amendments to India's PMLA, stating that "the legislative failure to clearly articulate the definition of 'virtual assets' has resulted in a legal quagmire that has led to regulatory arbitrage and has weakened the hands of law enforcement agencies of the ED." The authors of this report also contrast

¹⁶⁷⁴ International Monetary Fund & Financial Stability Board. (2023). IMF-FSB synthesis paper: Policies for crypto-assets. IMF. (<https://www.fsb.org/2023/09/imf-fsb-synthesis-paper-policies-for-crypto-assets/>)

¹⁶⁷⁵ World Bank. (2025). AML/CFT national risk assessment on virtual assets and virtual asset service providers: Guidance manual. World Bank Group.(<https://openknowledge.worldbank.org/entities/publication/bb5a7475-ac52-4697-afdc-5f618a550623>)

¹⁶⁷⁶ Basel Committee on Banking Supervision. (2024). Prudential treatment of cryptoasset exposures. Bank for International Settlements. (<https://www.bis.org/bcbis/implementation.htm?m=89>)

¹⁶⁷⁷ FATF, Egmont Group, Interpol, & UNODC. (2025). International co-operation on money laundering, detection, investigation, and prosecution handbook. FATF.(<https://www.fatf-gafi.org/en/publications/MethodsandTrends/international-cooperation-against-money-laundering.html>)

¹⁶⁷⁸ Wolfsberg Group. (2025). Guidance on the provision of banking services to fiat-backed stablecoin issuers. Wolfsberg Group (<https://wolfsberg-group.org/news/guidance-on-the-provision-of-banking-services-to-fiat-backed-stablecoin-issuers/>)

¹⁶⁷⁹ Chotalia, R. S., & Taktawala, P. (2025). Critical analysis of PMLA's efficacy in crypto-related money laundering. Indian Journal of Legal Review, 5(5), 195–211.

India's unclear definitions with the solid and nuanced classification of risks as seen in the EU's MiCA and Singapore's Payment Services Act. They point out that unclear definitions often require law enforcers to rely on circumstantial evidence to prove guilt, as was the case in the WazirX scandal. The report concludes by stressing that urgent global action is required to overcome the technical limitations of tracing cross-border, decentralized blockchain-based transactions.

2. **Malik, S., & Miglani, V. (2025).**

Cryptocurrency and money laundering: Risks and regulatory challenges.¹⁶⁸⁰ This research articles examine the dual-edged nature of cryptocurrency's decentralization and anonymity, arguing that while these features drive financial inclusion, they simultaneously facilitate sophisticated laundering schemes that bypass traditional banking checkpoints. The authors analyse India's evolving regulatory landscape, specifically the integration of the PMLA and RBI directives, to demonstrate how current "Reporting Entity" mandates are struggling to keep pace with "pseudo-anonymous" protocols and decentralized exchanges (DEXs).

The study concludes by advocating for a shift from fragmented national oversight to a harmonized international policy framework that incorporates real-time technical monitoring to bridge the gap between blockchain innovation and financial security.

3. **Neeraj, Dr., & Gupta, N. (2024).**

Reviewing the literature on Bitcoin in India: Opportunities, regulatory challenges, and the road ahead.¹⁶⁸¹ It provide a comprehensive synthesis of

Bitcoin's trajectory in India, arguing that while the asset offers significant opportunities for financial inclusion and inflation hedging, its growth is fundamentally hindered by persistent regulatory ambiguity and technological vulnerabilities. The authors conclude that the sustainable integration of Bitcoin into the Indian financial ecosystem necessitates a balanced "strategic roadmap" that combines robust risk management practices with a clear, standardized legal framework to mitigate market instability and fraud.

REPORTS

1. **FIU-IND AML & CFT guidelines 2026: Compliance guide for crypto businesses and regulators.**¹⁶⁸²

This assiduity analysis posits that "compliance has come structure," emphasizing that the 2026 guidelines make leadership (Directors and POs) tête-à-tête liable for AML failures, a significant shift in commercial responsibility.

2. **Financial Intelligence Unit – India (2026): ML & CFT guidelines for reporting entities providing services related to Virtual Digital Assets**¹⁶⁸³

This research articles discuss the two-edged sword of cryptocurrency's decentralization and anonymity, stating that while these factors have helped to drive financial inclusion, they have also helped to drive sophisticated money laundering schemes that circumvent traditional banking checkpoints. The authors analyze the changing regulatory environment in India with regards to the implementation of PMLA and RBI directives to show how the current "Reporting Entity"

¹⁶⁸⁰ Malik, S., & Miglani, V. (2025). Cryptocurrency and money laundering: Risks and regulatory challenges. *International Journal for Multidisciplinary Research*, 7(2).

¹⁶⁸¹ Neeraj, Dr., & Gupta, N. (2024). Reviewing the literature on Bitcoin in India: Opportunities, regulatory challenges, and the road ahead. *European Economic Letters*, 14(3), 2566–2573.

¹⁶⁸² ZIGRAM. (2026, January 16). FIU-IND AML & CFT guidelines 2026: Compliance guide for crypto businesses and regulators.

¹⁶⁸³ Financial Intelligence Unit – India. (2026). AML & CFT guidelines for reporting entities providing services related to Virtual Digital Assets (Updated as on 08.01.2026). Ministry of Finance, Government of India.

requirements are struggling to keep pace with "pseudo-anonymous" protocols and DEXes. The authors conclude with a discussion of the need to move towards a harmonized international regulatory framework to bridge the gap between blockchain innovation and security.

3. **Financial Action Task Force (2025): Targeted update on implementation of the FATF standards on virtual assets and virtual asset service providers.**¹⁶⁸⁴

The FATF (2025) report, which focuses on the "trip Rule" "perpetration as the most critical sources of vulnerabilities globally, reveals that although 99 authorities have managed to enact the necessary legislation, the enforcement of inconsistent cross-border remains nonsupervisory arbitrage which is not greased. The report, in the same vein, also focuses attention on the frightening trend of stablecoin-related lawless exertion, which reveals that public fabrics such as India's PMLA not only need to address the "Sunrise Issue" but also crypto-aided fraud professionalization through a higher level of transnational cooperation and the creation of asset recovery mechanisms.

RESEARCH QUESTIONS

1. "To what extent does the current regulatory and enforcement framework under the Prevention of Money Laundering Act (PMLA), 2002, effectively address the technical and jurisdictional challenges posed by the illicit use of Bitcoin in India's evolving virtual economy?"

2. How do the 2026 FIU-IND guidelines and the mandatory implementation of the "Travel Rule" reconcile the inherent anonymity and pseudonymity of Bitcoin with the statutory compliance mandates for VDA "Reporting Entities"?
3. What are the primary legal and forensic hurdles in tracing "proceeds of crime" when illicit actors utilize anonymity-enhancing tools such as mixers, tumblers, and unhosted wallets to break the blockchain's traceable link?
4. How does the landmark judicial recognition of cryptocurrency as "property" (e.g., *Rhutikumari v. Zanmai Labs, 2025*) influence the Enforcement Directorate's (ED) ability to attach and confiscate digital assets under Sections 5 and 8 of the PMLA?
5. What factors contribute to the significant statistical gap between the massive volume of crypto-asset seizures and the relatively low number of final judicial convictions in PMLA investigations?
6. To what degree does India's activity-based regulation of offshore exchanges and its "Largely Compliant" FATF rating reflect a successful adaptation to international standards for combating virtual asset-enabled financial crime?

HYPOTHESIS

Bringing Virtual Digital Assets (VDAs) under the PMLA, especially after the big court decision in *Rhutikumari v. Zanmai Labs (2025)* calling cryptocurrency "property," really pushes technical tracing of Bitcoin and helps investors get their money back. But honestly, even with all this, it is going to be hard to actually get convictions. The decentralized protocols have created a messy web of "Placement-Layering-Integration" tricks. The users continue to rely on mixing tools to cover their tracks. And, of course, it is going to require a lot of proof from the accused. The system is improving, but winning cases is an uphill task.

¹⁶⁸⁴ Financial Action Task Force. (2025). *Targeted update on implementation of the FATF standards on virtual assets and virtual asset service providers*. FATF, Paris, France.

THE EVOLUTION OF THE PMLA AND THE VIRTUAL ASSET PARADIGM

PMLA was initially enacted with the primary objective of prevention of money laundering and provision of confiscation of property involved in money laundering. This Act, along with the rules framed under it, has been designed to deal with the money laundering activities of traditional financial institutions, banking companies, and intermediaries. However, the very nature of cryptocurrency, based on underlying code rather than physical fiat, posed a problem to the very concepts of the PMLA. The very essence of money laundering is addressed in Section 3 of the Act, which states that “whoever directly or indirectly attempts to indulge, knowingly assists, or is actually involved in any activity connected with the proceeds of crime, including its concealment, possession, acquisition, or use, and projects it as untainted property, shall be guilty of the offence.”

The relevant juncture of the framework of Bitcoin is the definition of the “proceeds of crime” under Section 2(1)(u), which includes any property derived or obtained, directly or indirectly, by any person as a result of any criminal activity related to a scheduled offence. In the event of the use of Bitcoin to launder the proceeds of fraud, trafficking of drugs, and extortion, the same constitutes “tainted property” and is subject to attachment and confiscation by the Directorate of Enforcement (ED). In the past, the lack of a definitive legal

classification of digital assets has given rise to a “regulatory grey area,” making the task of the enforcing authorities daunting. This has been addressed by the government by adopting a comprehensive definition of VDAs, which includes any information, code, number, or token generated through cryptographic means that represents digital value.

THE EXPANDED NET OF REPORTING ENTITIES AND NOTIFIED ACTIVITIES

However, the major turning point in the Indian regulatory approach came on the 7th of March 2023, when the Ministry of Finance issued a notification under the PMLA to specifically bring certain activities related to VDA within the legislative ambit. This notification expanded the definition of “a person carrying on a designated business or profession” to include persons who carry out VDA-related transactions. In essence, the Indian government is using this notification to bring crypto exchanges, wallets, and custodians under the definition of “Reporting Entities” (REs), which are subject to the same high standards of compliance and reporting as banks.

Five activities have been specifically mentioned in the notification that, when conducted for or on behalf of another person of either a natural or legal character in the course of business, will constitute a “Reporting Entity.” These activities have been designed to cover all conceivable interfaces between the virtual and fiat worlds:

Notified VDA Activity	Scope and Regulatory Implication
VDA-Fiat Exchange	Exchanging Bitcoin or other VDAs for Indian Rupees or foreign currency.
VDA-VDA Exchange	Swapping one form of VDA for another (e.g., Bitcoin for Ethereum).
Transfer of VDAs	Providing services to move VDAs from one address or person to another.
Safekeeping/Administration	Holding VDAs or instruments (private keys) enabling control over VDAs.
Financial Services for Sales	Provision of services related to an issuer’s offer and sale of a VDA (e.g., ICOs).

This activity-based regulation ensures that the PMLA is applicable even in the absence of a physical presence of the service provider in India, as long as they serve Indian users. The Financial Intelligence Unit - India (FIU-IND) is the central agency for receiving, analysing, and disseminating information pertaining to suspicious transactions in the financial sector.

EXISTING LEGAL FRAMEWORKS IN INDIA

The following legislative acts and specific sections are key to the regulation of Bitcoin and virtual digital assets (VDAs) under the anti-money laundering and fiscal laws in India.

1. Prevention of Money-Laundering Act (PMLA), 2002

The PMLA is the primary legislation used to combat the illegal use of Bitcoin. The government expanded its scope to include the virtual economy by utilizing and amending the following:

- **Section 2(1)(sa)(vi):** This section defines a "person carrying on a designated business or profession." By notification S.O. 1072(E) in March 2023, the government utilized its power to include any "person carrying on such other activities as the Central Government may, by notification, so designate, from time to time" under the regulatory umbrella of the PMLA.
- **Section 2(1)(wa):** This sub-clause defines a "reporting entity" as a banking company, financial institution, intermediary or a person carrying on a designated business or profession.
- **Section 49(1):** Under this section, the Director of the Financial Intelligence Unit-India (FIU-IND) was formally designated as the regulator for VDA service providers.
- **Section 3 (Explanation):** An amendment clarifies that money laundering is a "continuing offence" and a person remains liable for prosecution for as long

as they are "enjoying the 'proceeds of crime'."

2. Income-tax Act, 1961

Several sections were introduced or amended by the Finance Act, 2022, to provide a formal definition and taxation regime for digital assets:

- **Section 2(47A):** Provides the formal definition of a "virtual digital asset," stating it is "any information or code or number or token (not being Indian currency or foreign currency), generated through cryptographic means or otherwise, by whatever name called, providing a digital representation of value exchanged with or without consideration..."
- **Section 115BBH:** This section, titled "Tax on income from virtual digital assets," mandates that "where the total income of an assessee includes any income from the transfer of any virtual digital asset... the income-tax payable shall be the aggregate of— (a) the amount of income-tax calculated on the income from transfer of such virtual digital asset at the rate of thirty per cent..."
- **Section 194S:** Establishes a 1% Tax Deducted at Source (TDS) for VDA transfers, requiring that "any person responsible for paying to a resident any sum by way of consideration for transfer of a virtual digital asset, shall, at the time of credit of such sum... or at the time of payment... deduct an amount equal to one per cent. of such sum as income-tax thereon."

3. Bharatiya Sakshya Adhiniyam (BSA), 2023

This Act replaced the Indian Evidence Act, 1872, and is critical for the admissibility of blockchain data in PMLA trials:

- **Section 63:** Imposes strict "certification requirements for electronic evidence" that must be signed by "a person in charge of the computer or communication device or the

management of the relevant activities (whichever is appropriate) and an expert" to verify the integrity and origin of digital records.

4. Companies Act, 2013

- **Schedule III:** An amendment effective from April 1, 2021, requires all companies to disclose in their financial statements the "profit or loss on transactions involving cryptocurrency or VC in a financial year," the "amount of VC or cryptocurrency held as at the reporting date," and any "deposits or advances from any person for the purpose of trading or investing in cryptocurrency or VC."

5. Digital Personal Data Protection (DPDP) Act, 2023

The Act establishes extensive requirements for VDA service providers who operate as "Data Fiduciaries" despite not specifically targeting Bitcoin. When handling sensitive user information which includes geo-coordinates and biometric data custodians of such data must follow six principles which include "consent and transparency, purpose limitation, data minimisation, accuracy, storage limitation, security safeguards and accountability."

COMPLIANCE OBLIGATIONS FOR VIRTUAL DIGITAL ASSET SERVICE PROVIDERS

Under Chapter IV of PMLA, Reporting Entities must follow several rules to promote transparency and track illegal money flows. The law is now enforcing these obligations for actors in the crypto industry, and there are serious penalties for not complying.

CUSTOMER DUE DILIGENCE AND THE IDENTITY FRAMEWORK

The crux of the PMLA compliance framework is "Know Your Customer" (KYC) and "Customer Due Diligence" (CDD). REs must identify their clients accurately and their beneficial owners at the time of initiation of the business relationship. The guidelines issued by

FIU-IND under the 2026 guidelines have further strengthened this requirement by implementing a multi-layered "Know Your Customer" requirement. The requirements include verification of the customer's Permanent Account Number (PAN) through authentic databases, verification of emails and mobile numbers through One-Time Passwords (OTP), and "penny-drop" verification of bank accounts by transacting an amount of INR 1.

For corporate clients, partnerships, or trusts, REs must identify the beneficial owner of the client, who is an individual who owns more than 10% of the partnership or trust. REs must also verify the customer's physical presence by obtaining a live photograph along with geo-coordinates during the onboarding process, which is aimed at reducing "mule" accounts used by money launderers.

ENHANCED DUE DILIGENCE AND TRANSACTION MONITORING

When we are working with clients who're a big risk or with transactions that are suspicious Registered Entities must do a really thorough check called Enhanced Due Diligence. This means they have to look closely at the client's money situation, who owns the company and where they got their money from. Enhanced Due Diligence is required for clients who are known as Politically Exposed Persons or for -profit organizations or for companies that are connected to countries that are, on the FATFs "grey" or "black" lists. If an RE is unable to satisfy the EDD requirements, the transaction must be stopped.

Transaction monitoring systems must be deployed to detect patterns that deviate from a client's declared profile. These systems generate automated alerts for suspicious activities, such as rapid fiat-crypto-fiat cycles, unusually high-velocity transactions, or the use of anonymity-enhancing products. Upon the emergence of suspicion, the RE is legally obligated to file a Suspicious Transaction Report (STR) with FIU-IND, containing complete KYC

details, wallet addresses, transaction hashes, and the grounds for suspicion.

RECORD MAINTENANCE AND DATA LONGEVITY

The PMLA requires organizations to maintain complete transaction records which law enforcement agencies can use for their investigation work. All REs must maintain records of transactions—whether attempted or executed—for a period of five years from the date of the transaction. The business must keep all client identity records and beneficial owner information for five years after the business relationship ends or the account closure date.

Record Category	Preservation Period	Specific Requirements
Transaction History	5 Years from Date of Transaction	Must include nature, amount, currency, date, and parties.
Client Identity/KYC	5 Years from Closure of Account	Includes PAN, Aadhaar, account files, and business correspondence.
Specified Transactions	5 Years from Date of Transaction	Cash transactions > 10L INR; cross-border transfers > 5L INR.

The records need to be kept in a way that protects them from unauthorized changes while allowing law enforcement access to them when needed. REs must submit their clients' KYC documents to the Central KYC Records Registry through electronic means within 10 days of establishing an account-based relationship.

THE ROLE OF FIU-IND: REGISTRATION AND OVERSIGHT MECHANISM

The Financial Intelligence Unit – India (FIU-IND) acts as the base of operation where the PMLA is executed for the activities of the virtual economy. All the VDA SP businesses operating in India have to successfully complete their registration process through the

FIU-IND, as it acts as the essential requirement for their operation. However, the registration process is not just a mere bureaucratic exercise, as the entire system of the organization has to be subjected to a test of technical and legal scrutiny.

The registration process demands extensive document submission which includes the complete corporate structure and three years of financial documents comprising annual returns and profit and loss statements. The FIU requires VDA SPs to obtain the "PACT" (Partner Accreditation for Compliance and Trust) certificate which they must acquire from their FIU-registered business partners when they plan to establish business-to-business or brokerage operations. After document submission, the applicant must demonstrate their AML systems through an in-person meeting which includes showing their tools for transaction monitoring and blockchain analysis and Travel Rule compliance.

The FIU-IND holds the power to restrict access to its system for entities which fail to meet its compliance requirements. The PMLA enforcement action against several major offshore exchanges on December 2023 included Binance and KuCoin which received show-cause notices while their URLs and mobile applications received operating restrictions because they conducted business without meeting PMLA requirements. The enforcement action demonstrates how the law requires compliance with Indian AML standards for businesses that want to operate within the Indian market.

TECHNICAL OBFUSCATION AND THE "TRAVEL RULE" CHALLENGE

The pseudonymous nature of Bitcoin transactions creates significant difficulties for standard financial tracking systems to monitor Bitcoin activity. The public blockchain system logs all transactions yet the involved users remain anonymous because they use cryptographic addresses for their transactions. The FIU-IND mandates organizations to execute

the "Travel Rule" which requires them to conduct wire transfers according to FATF Recommendation 16 standards.

The Travel Rule mandates VDA service providers to collect and keep and protect all data about both the sender and receiver during VDA transactions. The data transfer needs to happen before or at the transfer moment to maintain the forensic record throughout all fund transitions between platforms.

The 2026 guidelines explicitly prohibit VDA SPs from supporting products which allow users to maintain their identity through cryptocurrency tokens and products which contain "mixers" and "tumblers". These services collect funds from various users and distribute them back to users who want to share their funds, which creates a complicated process that hinders anti-money laundering investigations. The prohibition reflects a strategic decision to eliminate high-risk, opaque instruments from the regulated Indian ecosystem.

INVESTIGATIVE MODUS OPERANDI AND ENFORCEMENT REALITIES

The Enforcement Directorate (ED) has uncovered multiple advanced money laundering operations which use Bitcoin as their main element. The research demonstrates that criminals employ new technology but their actual goals remain unchanged since they commit fraud and extortion together with tax evasion.

Case study: The Bitconnect Investment Fraud¹⁶⁸⁵

The ED Ahmedabad Zonal Office conducted an investigation into the BitConnect scheme which resulted in the confiscation of cryptocurrency worth INR 1 646 crore. The fraudulent investment platform which operated as a fake investment opportunity, promised highly profitable returns to its investors. The

investigation involved tech-savvy experts who decoded a "complex web" of transactions across numerous crypto wallets, some of which were carried out through the "dark web" to evade detection. The authorities seized cash amounting to INR 13.50 lakh together with an SUV and various digital devices which demonstrated how the ED used digital asset evidence to identify their real-world owners.

Case Study: The Karnataka Crypto Investment Fraud¹⁶⁸⁶

The ED's Karnataka unit conducted searches at 21 premises across three states in connection with a large-scale cryptocurrency investment fraud. The accused created fake crypto investment platforms that duplicated authentic websites while using images of recognized experts to establish credibility. The proceeds of crime were laundered through a multi-pronged approach on this basis of Layering via P2P method. The organization converted its funds into Bitcoin and then distributed them through peer-to-peer (P2P) platforms to overseas wallets. Another method based on the Hawala Channels: The organization transformed crypto assets into cash and bank accounts using accommodation entries with the laundered funds were used to acquire assets.

The virtual economy demonstrates its "Placement-Layering-Integration" lifecycle through these particular cases. The layering stage of Bitcoin usage involves conducting multiple small transactions which create a confusing paper trail before the final integration of "clean" money into traditional assets.

THE IMPACT OF INTERNATIONAL STANDARDS: FATF AND RECOMMENDATION 15

India's integration of VDAs into the PMLA is not an isolated policy choice but a critical component of its alignment with the Financial

¹⁶⁸⁵ U.S. Department of Justice. (2022, February 25). BitConnect founder indicted in global \$2.4 billion cryptocurrency scheme (<https://www.justice.gov/archives/opa/pr/bitconnect-founder-indicted-global-24-billion-cryptocurrency-scheme>)

¹⁶⁸⁶ Directorate of Enforcement v. M/s 4th Bloc Consultants & Others (2025) Gowhar, I. (2025, December 22). ED raids 21 premises in multiple states in Karnataka's crypto fraud case. The Hindu. (<https://www.thehindu.com/news/national/karnataka/ed-raids-21-premises-in-multiple-states-in-karnatakas-crypto-fraud-case/article70425346.ece>)

Action Task Force (FATF) standards. The FATF is the global watchdog for money laundering and terrorist financing, and its 40 Recommendations set the benchmark for national AML regimes. Recommendation 15, specifically updated in 2019, requires countries to ensure that virtual asset service providers are regulated, licensed, and supervised.

FATF Mutual Ratings	2024 India Evaluation	Performance Rating
Recommendation 15 (New Technologies)		Largely Compliant (LC).
Overall Compliance	Technical	Compliant or Largely Compliant with 37/40 Recommendations.
Immediate Outcome 3 (Supervision)		Moderate level of effectiveness.
Immediate Outcome 7 (ML Investigation)		Moderate level of effectiveness.
Follow-up Category		Regular Follow-up (Best Category).

In its 2024 Mutual Evaluation Report (MER) of India, the FATF rated India as "Largely Compliant" (LC) with Recommendation 15. This rating reflects the significant progress made by India in establishing a legislative framework for VDA SPs. The report acknowledged that India's AML/CFT system is achieving "good results" in areas like risk understanding and asset recovery, although it noted that supervision in the VDA sector is currently at an early stage.

India is one of only four G20 countries placed in the "Regular Follow-up" category, alongside the UK, France, and Italy. This high standing provides India with global credibility and ensures continued access to international financial markets, a priority for the government given the potential economic repercussions of being "grey-listed".

STRUCTURAL CHALLENGES: FROM SEIZURE TO CONVICTION

Although the Enforcement Directorate (ED) has shown a high level of capability in attaching and seizing properties, the prosecutorial process is hindered by considerable structural barriers. The ED, till March 31, 2022, had attached assets worth more than INR 1.04 lakh crore in 5,422 investigation cases, but the number of convictions stood at a meager 25. The gap between these two figures can be attributed to the following three factors: Judicial Saturation, where Special Courts meant to deal with PMLA cases are bogged down by a large number of pending cases; Complex Evidence, where it becomes difficult to prove "proceeds of crime" in crypto assets due to the availability of forensic data in various international jurisdictions; and Constitutional Delays, which arose due to legal challenges to provisions of the Act that were only resolved in 2022.

Essentially, at the heart of these trials is the stringent directive of Section 24 of the PMLA, 2002, wherein in any proceedings regarding the proceeds of crime, the Authority/Court shall—unless the contrary is proved—presume that such proceeds of crime are involved in money-laundering. In effect, the "onus of proof" is reversed, wherein the accused individual has to prove that the proceeds in question are, in fact, lawful property. While this presumption of the Act empowers the ED to circumvent traditional hurdles, it also places a tremendous burden on individuals who have inadvertently become part of the crypto market through indirect investment or P2P trading.

GAPS AND STRATEGIC DEFICIENCIES IN THE VIRTUAL ASSET REGIME

Despite significant progress, the current PMLA and VDA nonsupervisory frame in India contains several critical "lacks" that hamper its overall effectiveness and produce legal disintegrate. Firstly, The Conflict with Data sequestration (DPDP Act, 2023) There's a growing pressure between the PMLA's expansive

surveillance authorizations and the Digital Personal Data Protection (DPDP) Act, 2023. The 2026 FIU- IND guidelines bear collecting largely sensitive stoner data, including exact GPS geo-equals and IP addresses during onboarding. This "geo- tagging" potentially violates DPDP principles of data minimisation and purpose limitation, as no special arrangements have been made to insure investor sequestration under these vittles. Secondary gap which Evidentiary instrument Conundrum Admissibility of blockchain substantiation remains dammed by Section 63 of the Bharatiya Sakshya Adhiniyam (BSA), 2023 (replacing the substantiation Act). It requires a instrument inked by a "person in charge" of the computer system. Because blockchains are decentralized and have no central authority "in charge," forensic dogging reports frequently risk being disqualified as "unreliable report" in court.

Thirdly, its DeFi and DAO Regulatory Blind Spot While exertion- grounded, the PMLA detector – conditioning conducted" for or on behalf of another person" is delicate to apply to non-custodial Decentralized Finance (DeFi) protocols and DAOs. These non-supervisory void pitfalls pushing lawless exertion down from regulated exchanges and towards decentralized platforms where no clear reporting reality exists. Fourthly it addresses the lack of consumer redressal and protection here's just not enough protection for consumers here. The system puts all its energy into state-level intelligence gathering, but when regular people lose money—say in big exchange hacks or collapses like WazirX in 2024—the courts and current PMLA laws barely help. People are left hanging. Furthermore, it not ensures that Offshore Migration of Trade: On top of that, India's tough tax rules—30% tax and 1% TDS—and the whole cloud of uncertainty around regulations have pushed almost three-quarters of crypto trading volume overseas. Now, about 73% of Indian crypto trades happen on foreign platforms. These exchanges sit outside India's reach, so the authorities can't really track what's

going on or enforce anti-money laundering rules

Although the deficit challenge was Technical Capacity and Forensic Shortage: There exists a critical shortage of technical expertise and advanced blockchain forensic capabilities at the state level. It has been reported that fewer than 10% of personnel in this area have received sufficient training to deal with advanced techniques like "chain-hopping" or tracking privacy coins like Monero. Additionally, Absence of a Statutory Limitation Period unlike most other jurisdictions around the world, the PMLA does not specify a limitation period for the initiation of investigation. This leads to the revival of trades that are a decade old and creates a climate of "perpetual jeopardy" for past financial transactions, which is not in consonance with the constitutional principles of fairness.

RECOMMENDATIONS FOR EFFECTIVE IMPLEMENTATION AND INVESTIGATIVE SYNERGY

This research recommends that PMLA changes be effectively implemented without impacting the functioning of investigation agencies. For this purpose, a balanced approach of inter-agency digitization, evolution, and international cooperation is required.

1. Digitized Inter-Agency Coordination: Synergies between FIU IND and ED must be automated. Implementation of existing MoUs on real-time data sharing and promotion of VDA SP registration with Indian Cybercrime Coordination Centre (I4C) can facilitate early detection of fraud patterns prior to fund movement
2. Adoption of Holistic Blockchain Intelligence: The law enforcement agencies must shift from "on-chain" tracing to "blockchain intelligence," which involves mapping transaction hashes with other off-chain data such as IP addresses and device fingerprints collected during onboarding. The mandatory

implementation of cybersecurity audits by CERT-In empanelled auditors would ensure that reporting data is tamper-proof.

3. Standardizing Blockchain Evidentiary Procedures: The low rate of convictions can be addressed by streamlining the legal procedure of presenting digital evidence. The introduction of standardized templates of certificates under Section 63 of the Bharatiya Sakshya Adhiniyam, 2023, and the inclusion of expert affidavits would help the judiciary understand complex routes such as "chain-hopping".
4. Leveraging Global Tracing Initiatives: The agencies can also take advantage of Interpol's "Silver Notice" pilot, which is particularly geared toward identifying assets without the need for a previous conviction, thus bypassing the lengthy mutual legal assistance (MLA) process.
5. Risk-Based "Safe Harbor" Framework: In order to enable agencies to effectively target high-value targets, a "safe harbor" can be implemented based on technical diligence. The pressure of compliance can vary, with a higher level of scrutiny being applied to those exercising "control or sufficient influence" over assets.
6. Targeted Forensic Training: The establishment of specialized units with training on professional tools such as Chain analysis Reactor is critical to the surveillance of dark web activities, including the tracking of Monero. Capacity building for law enforcement agencies and the judiciary is critical to ensure that the "placement-layering-integration" lifecycle is fully understood during the prosecution process.

CONCLUSION: STRATEGIC OUTLOOK FOR THE VIRTUAL ECONOMY

The integration of Virtual Digital means into the PMLA marks a definitive end to the period of limited crypto exertion in India. By fastening on exertion-grounded regulation and designating service providers as reporting realities, the government has created a frame that's both technology-neutral and enforceable. The 2026 FIU-IND guidelines represent the commanding edge of this strategy, prioritizing translucency through the trip Rule and the elimination of obscurity-enhancing tools. still, the unborn success of this governance will depend on the government's capability to balance rigorous enforcement with the protection of innocent request actors.

As the virtual frugality continues to evolve, Indian authorities must remain watchful against arising pitfalls like "chain-hopping," unhosted holdalls," and decentralized finance (DeFi) platforms that challenge traditional oversight. Continued transnational collaboration and the improvement of domestic forensic capabilities will be essential to ensure that Bitcoin remains a tool for profitable growth rather than a conduit for felonious exertion. In the decoding of the PMLA for a virtual world, India has established a standard for nonsupervisory adaptability, icing that the digital frontier remains subject to the rule of law.

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