Layer-2 networks

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A layer-2 network processes transactions off the main chain and periodically posts a compressed record to it. Rollups on Ethereum, such as Arbitrum, Optimism and Base, and the Lightning Network on Bitcoin, are the main types. The purpose is speed and cost. The legal consequence is that the asset the client sees in her wallet is often a representation of a token locked in a bridge contract on the main chain. If the layer-2 operator fails or the bridge is exploited, the main-chain token may be gone while the layer-2 balance still displays.

For custody and segregation analysis the question is always where the underlying asset sits and who controls the contract that holds it. A Singapore DPT licensee that credits customers with tokens on a layer-2 must satisfy itself that the operator's sequencer and upgrade keys do not place customer assets within another person's control for the purposes of the custody segregation requirements in the Payment Services Regulations.[1]

Notes

1. Payment Services Regulations 2019 (Singapore), reg. 16A ff. as inserted by the Payment Services (Amendment) Regulations 2024 on the safeguarding of customers' digital payment tokens, in force 4 October 2024. See Part K, Chapter II.

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