Enabling permissionless interoperability on AltLayer Rollup with Hyperlane

Introduction

Today, bridges connect various blockchain networks together and are essential for interoperability. However, having multichain bridge support from day 1 of your new chains is not easy. Most bridges deployments are permissioned and chain operators need to consider other factors, such as * Integration cost * Integration timeline * The security model of the bridges (often not customizable) * Security requirements by bridge operators * Other technical/non-technical requirements by the bridge operators This challenges new rollups to interoperate, as convincing bridge operators to support new rollups is usually non-trivial. In a rollup-centric world, It is critical that rollup operators can easily deploy bridges on their own without the need to go through lengthy and tedious processing to get bridge operators to support it. They should also have the option to pick the right security model for their own uses. In addition, token bridging is only one specific use case of cross-rollup communication. To provide better interoperability, one can tap onto generic inter-rollup messaging for their own applications.

Hyperlane - A universal and permissionless interoperability layer

Anyone can Deploy Hyperlane to any blockchain environment, whether it is a layer 1, rollup, or app-chain, allowing that chain to communicate seamlessly with any other chain on which Hyperlane has been deployed Hyperlane is designed with modularity in mind. Notably, its Interchain security modules gives developers control over their security model, allowing them to configure, compose, and customize security according to the needs of their application. Using Hyperlane, developers can build Interchain Applications - dapps that span multiple blockchains.

AltLayer integrates Hyperlane

AltLayer is happy to integrate Hyperlane into our rollup as a service stack. For a start, we have to prepare a technical step-by-step guide on how to set up the Hyperlane bridge on any rollups created by our Rollup launchpad. Our next goal will be supporting automated Hyperlane bridge deployment on any rollup created via our rollup launchpad External Integrations - Previous Data Availability (DA) using Celestia Next Deplying Hyperlane Warp Routes for ERC20 Token Bridging Last modified7mo ago On this page Introduction Hyperlane - A universal and permissionless interoperability layer AltLayer integrates Hyperlane