> $313B
total DEX volume

95/5
CEX/DEX volume

43%
Arbitrum volume share
(dominant chain)

Perpetual protocols (perps) provide:

- Easy access to leverage

- Low slippage trade execution

- Ability to hedge with low friction

Perps Construction and Dimensions

Construction: Orderbook vs. AMM

1. Traditional order books
2. Stable-based AMMs
3. Risk/stable-based AMMs
4. Hybrid models (orderbook + AMM)

Risk Dimensions

1. Trading fees
2. Funding rates
3. Margin and leverage
4. Limits

Risks in Perps Protocols

Tail-based

Protect the protocol from socialization of all costs.

Shoulder-based

Ensure that agents (and their subsequent risk exposure on the protocol) are accurately compensated by some forward-looking positive expected return.

Gauntlet's approach

How can Gauntlet minimize risk while keeping the protocol attractive?

The frequency of shoulder events is more common than tail, but without optimizing the shoulder, protocols will struggle to grow.

	Makers	**Takers**
Institutional	• Delta hedging — want a risk-free rate and hedge premium • Goal to find the cost of hedging and ensure you're compensating for that	• "Smart money" • Will be fee sensitive — make sure the market is efficient and easy to integrate • Will arb between venues via price or funding
Retail	• Struggle to hedge • Align expected return on unhedged exposure with the volatility & price risk	• Fickle audience with competition to attract • Care about wide range of assets, easy access to leverage, and smooth UX

Risk Dimension: Trading Fees

Makers ⚖️

Takers ⬇️

Institutional

- Higher trading fees = more revenue when volume is high, not necessarily OI

- Wants revenue from fees to cover decreased volume

- Want to be able to hedge & know their capital is put to work

- Higher trading fees = higher cost to trade

- Will likely be very responsive to changes in fees, and will leave as soon as there's a cheaper venue

- Base fee + knowledge that their impact curve is similar to large CEXs

- Will seek fee rebates

Retail

- Provides a larger buffer from the downsides of unhedged positions

- Want a volatility premium

- Less responsive to changes in taker fees as long as the platform remains accessible

Risk Dimension: Funding Rates

Makers

Institutional

Funding rates are high
- Likely less risk exposure for the maker because of balanced markets

- More revenue from OI

Funding rates are low
- Allows for more OI and volatility in the market, leading to more exposure

- Less revenue from OI

Retail

- High funding rates ideally keep the market even and reduce their unhedged exposure

Takers

Institutional

- Likes high funding rates on the minor side of the market, but dislikes on the major

- Likely has little impact if they aren't holding OI and are quickly closing positions

- Presents rate arbitrage opportunities

- Institutional speculators like low major side funding

- Institutional rate arbitrages love extreme skews with high funding

Retail

- Care more about clearly understanding the impact of funding on their trades

- As long as they're able to hit high leverage, they'll be fine

Risk Dimension: Margin and Leverage

Makers

Institutional

- Higher leverage makes it harder to hedge, but increases potential fees

- If makers can use leverage as well, it can give them more freedom

Retail

- High leverage increases the potential losses of unhedged positions

Takers

Institutional

- Higher margin requirements increases the cost of trading and reduces potential range of usage

- Want to make sure they can get paid out. Don't want an exchange that is too risky

Retail

- Higher margin requirements limit the leverage on the platform, which reduces UX

Risk Dimension: Limits

Makers ⬇

Takers ⬇

Institutional

Caps the amount of potential fees

Caps the max potential trade size

Adds some comfort that they'll be able to be paid out

Retail

Caps the amount of potential APY

Caps the max potential trade size, but are less sensitive with smaller size

9

Risk Dimension: Limits

	Makers ⬇	**Takers** ⬇	**Protocol** ⬆
Institutional	Caps the amount of potential fees	Caps the max potential trade size Adds some comfort that they'll be able to be paid out	• Limits protect the protocol from being stuck with bad debt • Bad debt results from large positions that can't be liquidated
Retail	Caps the amount of potential APY	Caps the max potential trade size, but are less sensitive with smaller size	• For highly volatile and speculative assets, this is a higher risk • Limits are the last line of defense for protecting the protocol

Risk in perps requires balance.

	Blue Chips	Volatile Assets	Others (commodities, NFTs, forex)
Trading Fees	Lower trading fees to account for deeper liquidity	Higher trading fees to account for lower liquidity	Informed by market dynamics and aligned with liquidity
Funding Rates	Lower max and velocity to better aligning with the assets volatility and liquidity	Higher max and higher velocity to align velocity with volatility

Higher if unable to hedge | Aligned with trader behavior, volatility, liquidity, and cost of carry |
| **Margin & Leverage** | Lower margin/higher leverage given lower price volatility & ease of hedging given deep liquidity | Higher margin/lower leverage to account for fatter tails & beta correlation | Align with liquidity in order books |
| **Limits** | In place to protect against market manipulation

Harder to manipulate blue chips | Limits should align with the cost to manipulate that would leave the protocol with socialization | More of an emphasis on order book liquidity & oracle integrity |

Gauntlet

TG: @cbrown67 | X: @CarsonMBrown | carson@gauntlet.xyz

@gauntlet_xyz | gauntlet.xyz

Thank you