

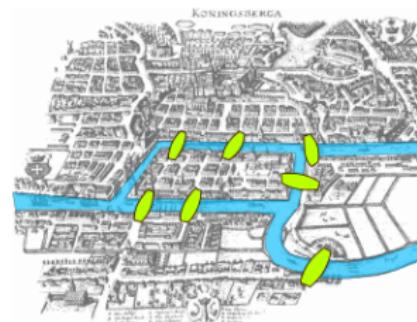
# The risks of LRTs (cont'd.)



mike & tarun  
sevenx ventures, restaking day, ethdenver  
tuesday, february 27, 2024

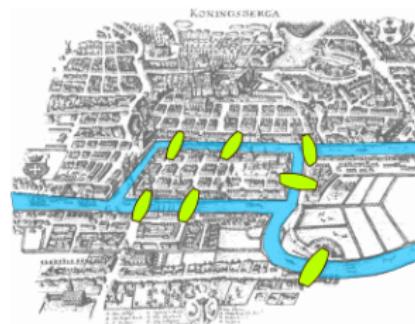
# Outline

- Big picture themes
  - *A bit more of everything*
  - *A tale of two categories*



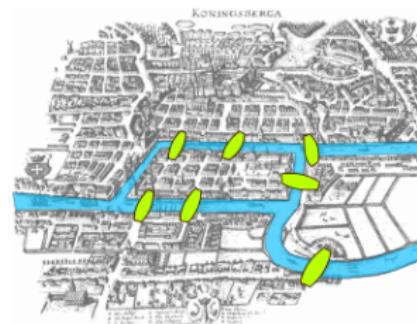
# Outline

- Big picture themes
  - *A bit more of everything*
  - *A tale of two categories*
- Focus attribute #1: Yield



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- Big picture themes
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  - *A tale of two categories*
- Focus attribute #1: Yield
- Focus attribute #2: Duration



# Big picture themes

*A bit more of everything*

A bit more of everything

Non-fungible,  
yielding assets

Sovereign  
bonds

L1 staking  
positions

AVS  
positions

Fungible baskets  
of non-fungible,  
yielding assets

Bond funds

Sovereign  
bonds

LSTs

L1 staking  
positions

LRTs

AVS  
positions

# Big picture themes

*A bit more of everything*

A bit more of everything

Non-fungible,  
yielding assets

Sovereign  
bonds

L1 staking  
positions

AVS  
positions

2. more yield  
+ more risk

Fungible baskets  
of non-fungible,  
yielding assets

Bond funds

Sovereign  
bonds

LSTs

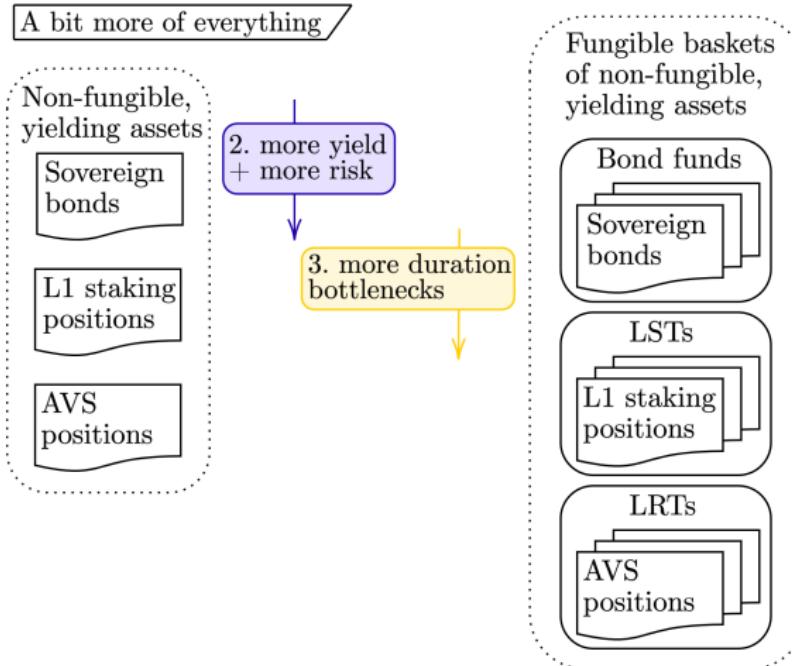
L1 staking  
positions

LRTs

AVS  
positions

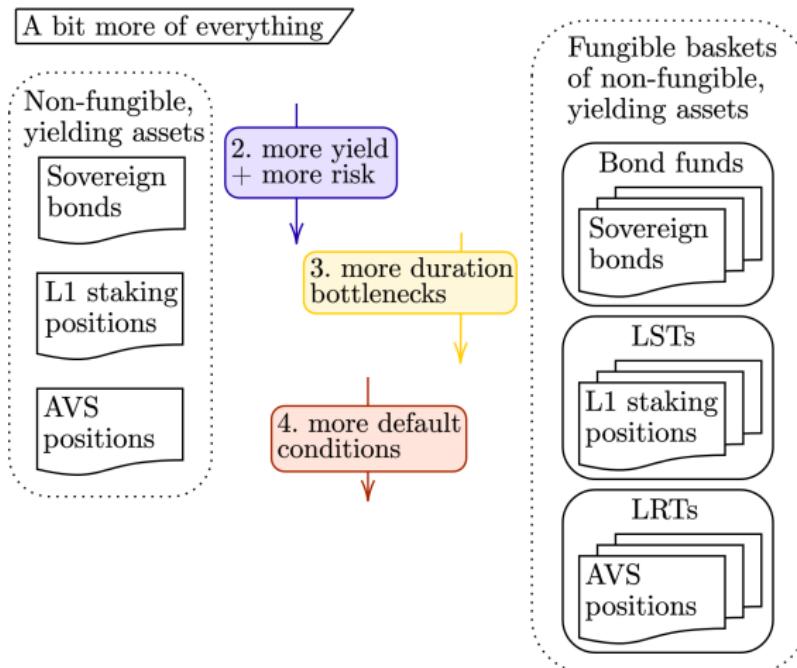
# Big picture themes

*A bit more of everything*



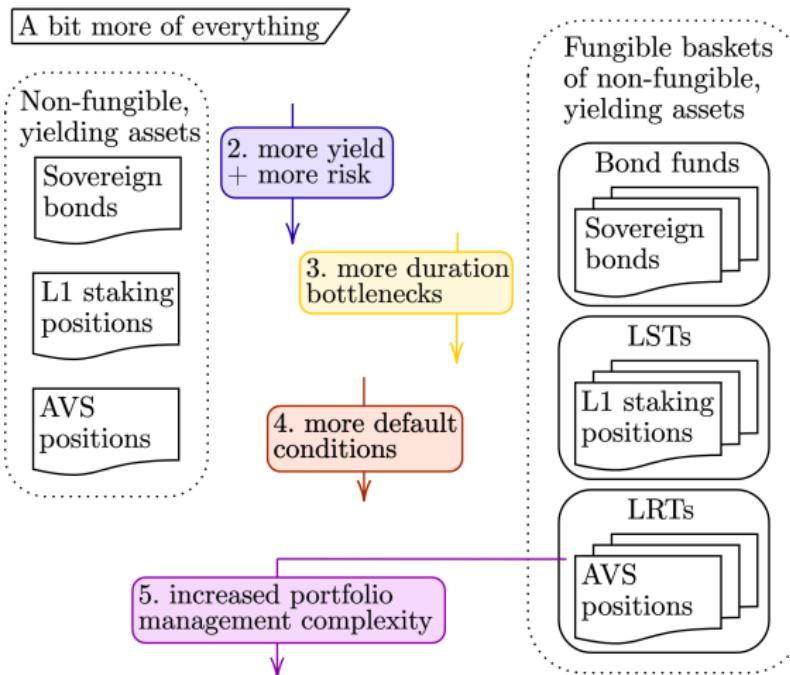
# Big picture themes

*A bit more of everything*



# Big picture themes

*A bit more of everything*



# Big picture themes

## *A tale of two categories*

### A tale of two categories

Non-fungible,  
yielding assets

Sovereign  
bonds

L1 staking  
positions

AVS  
positions

Fungible baskets  
of non-fungible,  
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Bond funds

Sovereign  
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LSTs

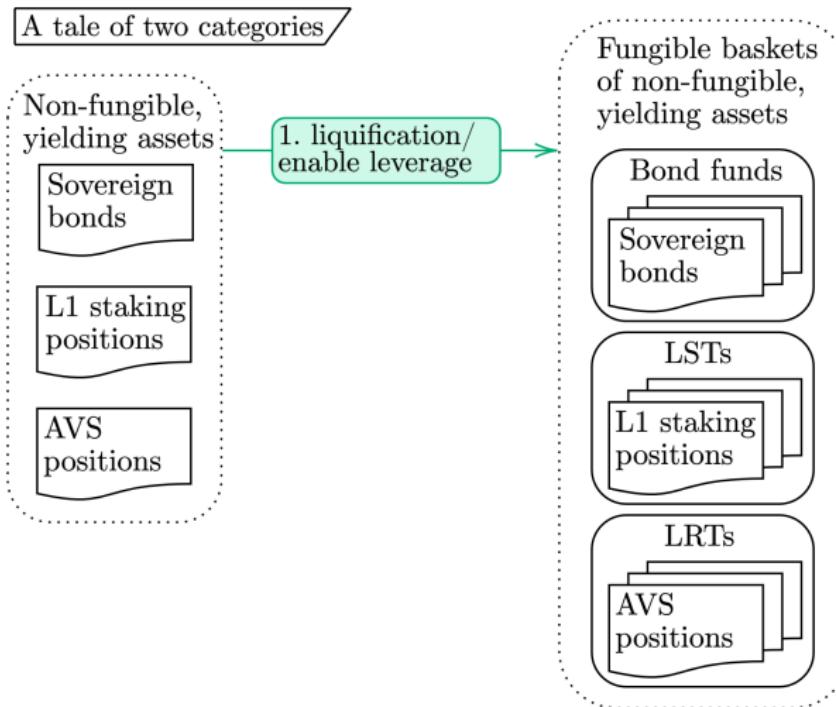
L1 staking  
positions

LRTs

AVS  
positions

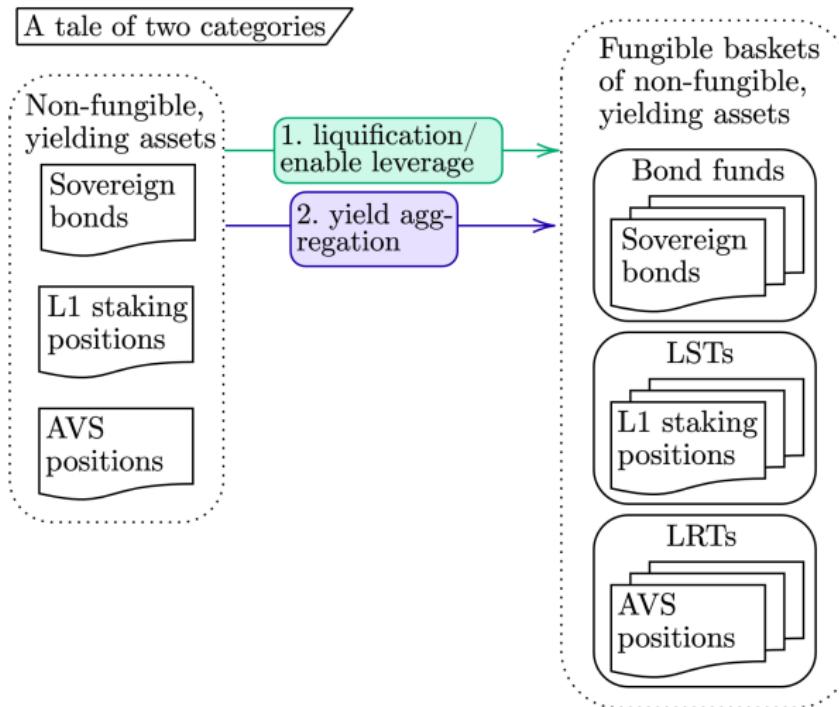
# Big picture themes

## A tale of two categories



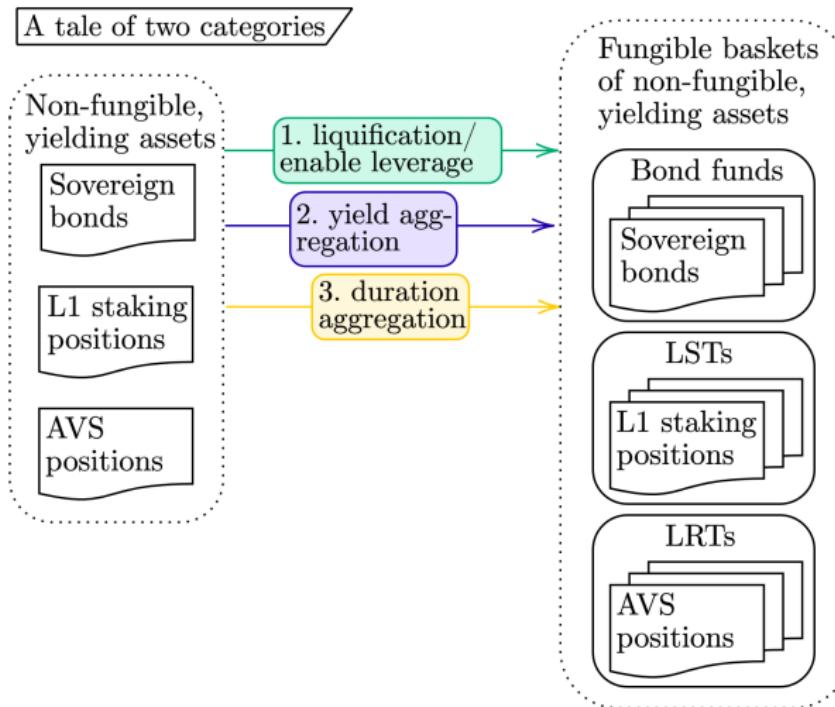
# Big picture themes

## A tale of two categories



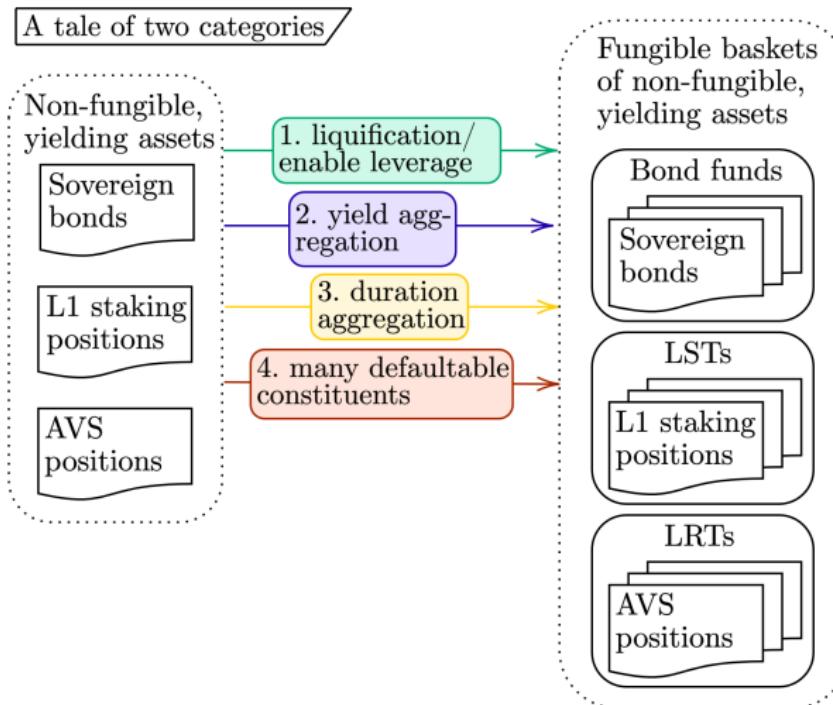
# Big picture themes

## A tale of two categories



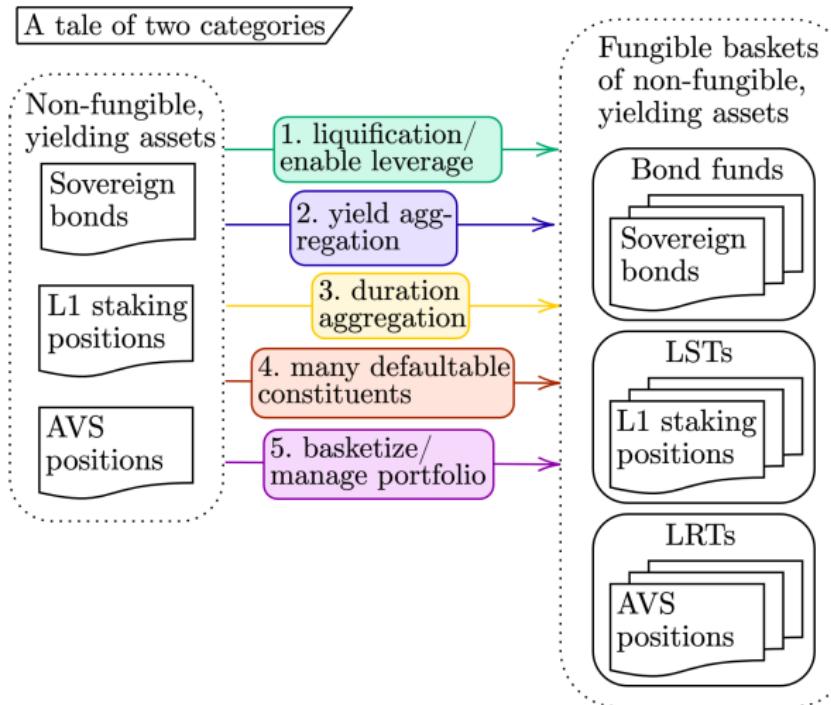
# Big picture themes

## A tale of two categories



# Big picture themes

## A tale of two categories



# Focus attribute #1: Yield

*... what we are all here for*

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Yield</i>			

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Yield</i>			

Table 2: Fungible baskets of non-fungible yielding assets

# Focus attribute #1: Yield

*... what we are all here for*

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Yield</i>	Source: Sovereign treasury Denomination: Sovereign currency		

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<i>Yield</i>	<u>Source:</u> Sovereign treasury Denomination: Sovereign currency	<u>Source:</u> L1 protocol Denomination: L1 token	

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<i>Yield</i>	Source: Sovereign treasury Denomination: Sovereign currency	Source: L1 protocol Denomination: L1 token	Source: AVS protocol Denomination: AVS specified

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<i>Yield</i>	Source: Sovereign treasury Denomination: Sovereign currency	Source: L1 protocol Denomination: L1 token	Source: AVS protocol Denomination: AVS specified

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Yield</i>	Source: Sovereign treasury Denomination: Sov. currency Aggregation over: Many interest rates and durations		

Table 2: Fungible baskets of non-fungible yielding assets

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Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Yield</i>	<u>Source:</u> Sovereign treasury <u>Denomination:</u> Sovereign currency	<u>Source:</u> L1 protocol <u>Denomination:</u> L1 token	<u>Source:</u> AVS protocol <u>Denomination:</u> AVS specified

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Yield</i>	<u>Source:</u> Sovereign treasury <u>Denomination:</u> Sov. currency <u>Aggregation over:</u> Many interest rates and durations	<u>Source:</u> L1 protocol <u>Denomination:</u> L1 token <u>Aggregation over:</u> Many node operators	

Table 2: Fungible baskets of non-fungible yielding assets

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... what we are all here for

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
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Attribute	Bond funds	LSTs	LRTs
<i>Yield</i>	<u>Source:</u> Sovereign treasury <u>Denomination:</u> Sov. currency <u>Aggregation over:</u> Many interest rates and durations	<u>Source:</u> L1 protocol <u>Denomination:</u> L1 token <u>Aggregation over:</u> Many node operators	<u>Source:</u> AVS protocol <u>Denomination:</u> AVS specified <u>Aggregation over:</u> Many AVSs and node operators

Table 2: Fungible baskets of non-fungible yielding assets

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Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
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Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Yield</i>	<u>Source:</u> Sovereign treasury <u>Denomination:</u> Sov. currency <u>Aggregation over:</u> Many interest rates and durations	<u>Source:</u> L1 protocol <u>Denomination:</u> L1 token <u>Aggregation over:</u> Many node operators	<u>Source:</u> AVS protocol <u>Denomination:</u> AVS specified <u>Aggregation over:</u> Many AVSs and node operators

Table 2: Fungible baskets of non-fungible yielding assets

- AVS dependent, may have different unit-of-account than L1.

# Focus attribute #1: Yield

... what we are all here for

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Yield</i>	<u>Source:</u> Sovereign treasury <u>Denomination:</u> Sovereign currency	<u>Source:</u> L1 protocol <u>Denomination:</u> L1 token	<u>Source:</u> AVS protocol <u>Denomination:</u> AVS specified

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Yield</i>	<u>Source:</u> Sovereign treasury <u>Denomination:</u> Sov. currency <u>Aggregation over:</u> Many interest rates and durations	<u>Source:</u> L1 protocol <u>Denomination:</u> L1 token <u>Aggregation over:</u> Many node operators	<u>Source:</u> AVS protocol <u>Denomination:</u> AVS specified <u>Aggregation over:</u> Many AVSs and node operators

Table 2: Fungible baskets of non-fungible yielding assets

- AVS dependent, may have different unit-of-account than L1.
- Aggregate over multiple AVSs and multiple node operators.

# Focus attribute #1: Yield

... what we are all here for

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Yield</i>	<u>Source:</u> Sovereign treasury <u>Denomination:</u> Sovereign currency	<u>Source:</u> L1 protocol <u>Denomination:</u> L1 token	<u>Source:</u> AVS protocol <u>Denomination:</u> AVS specified

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Attribute	Bond funds	LSTs	LRTs
<i>Yield</i>	<u>Source:</u> Sovereign treasury <u>Denomination:</u> Sov. currency <u>Aggregation over:</u> Many interest rates and durations	<u>Source:</u> L1 protocol <u>Denomination:</u> L1 token <u>Aggregation over:</u> Many node operators	<u>Source:</u> AVS protocol <u>Denomination:</u> AVS specified <u>Aggregation over:</u> Many AVSs and node operators

Table 2: Fungible baskets of non-fungible yielding assets

- AVS dependent, may have different unit-of-account than L1.
- Aggregate over multiple AVSs and multiple node operators.
- Design decision: More deployed  $\implies$  more yield, at the cost of withdrawal rate.

# Focus attribute #2: Duration

... what we are all scared of

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Duration</i>			

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Duration</i>			

Table 2: Fungible baskets of non-fungible yielding assets

# Focus attribute #2: Duration

... what we are all scared of

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Duration</i>	Fixed maturity		

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Duration</i>			

Table 2: Fungible baskets of non-fungible yielding assets

# Focus attribute #2: Duration

*... what we are all scared of*

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Duration</i>	Fixed maturity	Withdrawals rate limited by the L1 protocol	

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Duration</i>			

Table 2: Fungible baskets of non-fungible yielding assets

# Focus attribute #2: Duration

*... what we are all scared of*

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Duration</i>	Fixed maturity	Withdrawals rate limited by the L1 protocol	Withdrawals rate limited by the AVS, the restaking protocol, <i>and</i> the L1 protocol

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Duration</i>			

Table 2: Fungible baskets of non-fungible yielding assets

# Focus attribute #2: Duration

... what we are all scared of

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Duration</i>	Fixed maturity	Withdrawals rate limited by the L1 protocol	Withdrawals rate limited by the AVS, the restaking protocol, <i>and</i> the L1 protocol

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Duration</i>	Many different maturities		

Table 2: Fungible baskets of non-fungible yielding assets

# Focus attribute #2: Duration

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Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Duration</i>	Fixed maturity	Withdrawals rate limited by the L1 protocol	Withdrawals rate limited by the AVS, the restaking protocol, <i>and</i> the L1 protocol

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Duration</i>	Many different maturities	Withdrawals rate limited by the LST protocol <i>and</i> the L1 protocol	

Table 2: Fungible baskets of non-fungible yielding assets

# Focus attribute #2: Duration

*... what we are all scared of*

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Duration</i>	Fixed maturity	Withdrawals rate limited by the L1 protocol	Withdrawals rate limited by the AVS, the restaking protocol, <i>and</i> the L1 protocol

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Duration</i>	Many different maturities	Withdrawals rate limited by the LST protocol <i>and</i> the L1 protocol	Withdrawals rate limited by the LRT protocol, the restaking protocol, each underlying AVS, <i>and</i> the L1 protocol

Table 2: Fungible baskets of non-fungible yielding assets

# Focus attribute #2: Duration

... what we are all scared of

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Duration</i>	Fixed maturity	Withdrawals rate limited by the L1 protocol	Withdrawals rate limited by the AVS, the restaking protocol, <i>and</i> the L1 protocol

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Duration</i>	Many different maturities	Withdrawals rate limited by the LST protocol <i>and</i> the L1 protocol	Withdrawals rate limited by the LRT protocol, the restaking protocol, each underlying AVS, <i>and</i> the L1 protocol

Table 2: Fungible baskets of non-fungible yielding assets

- LRT withdrawals have 4 potential rate-limiting phases.

# Focus attribute #2: Duration

... what we are all scared of

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
<i>Duration</i>	Fixed maturity	Withdrawals rate limited by the L1 protocol	Withdrawals rate limited by the AVS, the restaking protocol, <i>and</i> the L1 protocol

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
<i>Duration</i>	Many different maturities	Withdrawals rate limited by the LST protocol <i>and</i> the L1 protocol	Withdrawals rate limited by the LRT protocol, the restaking protocol, each underlying AVS, <i>and</i> the L1 protocol

Table 2: Fungible baskets of non-fungible yielding assets

- LRT withdrawals have 4 potential rate-limiting phases.
- Short (market sell) vs Long (full withdrawal).

## Focus attribute #2: Duration

... what we are all scared of

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
Duration	Fixed maturity	Withdrawals rate limited by the L1 protocol	Withdrawals rate limited by the AVS, the restaking protocol, <i>and</i> the L1 protocol

Table 1: Non-fungible yielding assets

Attribute	Bond funds	LSTs	LRTs
Duration	Many different maturities	Withdrawals rate limited by the LST protocol <i>and</i> the L1 protocol	Withdrawals rate limited by the LRT protocol, the restaking protocol, each underlying AVS, <i>and</i> the L1 protocol

Table 2: Fungible baskets of non-fungible yielding assets

- LRT withdrawals have 4 potential rate-limiting phases.
- Short (market sell) vs Long (full withdrawal).
- Full withdrawal vs. LST withdrawal (e.g., native restaking vs LST restaking).

## Focus attribute #2: Duration

... what we are all scared of

Attribute	Sovereign bonds	L1 staking positions	AVS restaking positions
Duration	Fixed maturity	Withdrawals rate limited by the L1 protocol	Withdrawals rate limited by the AVS, the restaking protocol, <i>and</i> the L1 protocol

Table 1: Non-fungible yielding assets

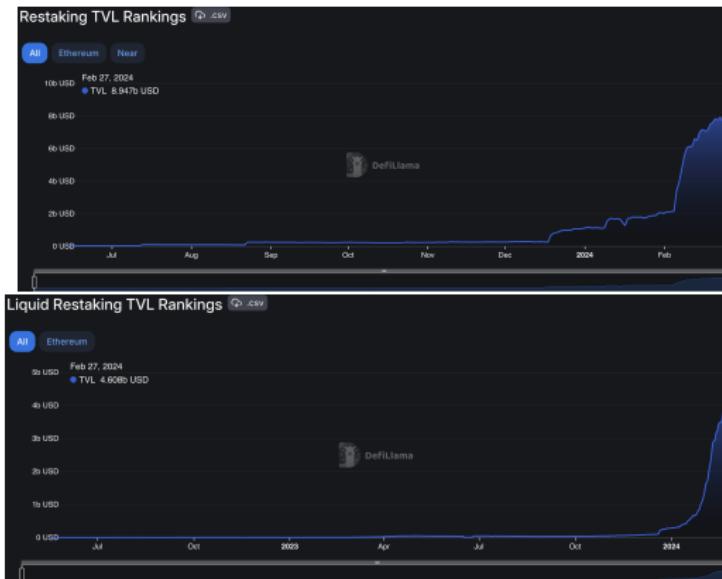
Attribute	Bond funds	LSTs	LRTs
Duration	Many different maturities	Withdrawals rate limited by the LST protocol <i>and</i> the L1 protocol	Withdrawals rate limited by the LRT protocol, the restaking protocol, each underlying AVS, <i>and</i> the L1 protocol

Table 2: Fungible baskets of non-fungible yielding assets

- LRT withdrawals have 4 potential rate-limiting phases.
- Short (market sell) vs Long (full withdrawal).
- Full withdrawal vs. LST withdrawal (e.g., native restaking vs LST restaking).
- Nightmare: mass slashing  $\implies$  liquidity crunch.

# TVL in restaking and LRTs

... what could go wrong?



- huh.

<https://defillama.com/protocols/Restaking>

<https://defillama.com/protocols/Liquid%20Restaking>

thanks! :-)

