DinoProtocol

A Tranche-Based Dual-Token Protocol for Overcollateralized Stablecoins and Leveraged ETH Exposure

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IMPORTANT NOTICE

This document is provided for informational and educational purposes only. DinoProtocol is an experimental project. The smart contracts described herein have **not been audited** by any third party. Interacting with unaudited smart contracts carries inherent risks, including but not limited to the total loss of deposited funds. Nothing in this document constitutes financial, investment, legal, or tax advice. Do not deposit funds you cannot afford to lose.

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1. Abstract

DinoProtocol is a tranche-based dual-token DeFi protocol deployed on Ethereum. It accepts ETH deposits at a mandatory 1.5× collateral ratio and splits them into two instruments: **DPRIME**, a senior-tranche stablecoin pegged to $1 USD, and **DNYLD**, a junior-tranche equity token that provides 3× leveraged ETH exposure.

The protocol enforces solvency through a multi-state system that dynamically adjusts redemption availability, fee levels, and daily caps based on the real-time collateral ratio. Price data is sourced from a multi-oracle aggregator combining Chainlink feeds and Uniswap V3 TWAP, protected by an automatic circuit breaker. All contracts are upgradeable via the UUPS proxy pattern and secured with role-based access control.

2. Introduction

Overcollateralized stablecoins have established themselves as a foundational DeFi primitive. However, most implementations create a one-sided relationship: borrowers take leverage against their collateral, while stablecoin holders simply hold a dollar-pegged asset. The surplus collateral—the equity buffer that absorbs volatility—is typically locked inside the protocol without a direct claim.

DinoProtocol introduces a **dual-token tranche model** that makes both sides of this relationship explicit and tradeable:

- The **senior tranche** (DPRIME) absorbs no volatility and targets a stable $1 redemption value, analogous to a senior claim in a structured credit vehicle.
- The **junior tranche** (DNYLD) absorbs all collateral volatility above the senior claim, providing amplified exposure to ETH price movements.

Both tokens are minted together from the same ETH deposit and can be independently traded or redeemed, subject to protocol health constraints. This design gives participants explicit, fungible exposure to their preferred risk profile within a single collateral pool.

3. Protocol Design

3.1 Dual-Token Architecture

DinoProtocol issues two ERC-20 tokens against a shared pool of ETH collateral held in a dedicated vault:

TOKEN	NAME	SYMBOL	ROLE	RISK PROFILE
DinoPrime	DinoPrime	DPRIME	Senior tranche — debt claim pegged to $1 USD	Low volatility, protected by overcollateralization
DinoYield	DinoYield	DNYLD	Junior tranche — equity claim on surplus collateral	3× leveraged ETH exposure (amplified upside and downside)

The mandatory collateral ratio at minting is **1.5×** (150%). For every $1.50 of ETH deposited, the protocol mints $1.00 of DPRIME (the debt portion) and allocates $0.50 of equity value toward DNYLD tokens.

3.2 DNYLD Leverage Mechanics

Because only one-third of the deposited value flows into equity, DNYLD holders receive amplified exposure to ETH price movements:

$$\text{Leverage} = \text{Collateral} \div \text{Equity} = \$1.50 \div \$0.50 = \mathbf{3\times}$$

This means that, at the point of minting:

- A **+10% ETH price increase** results in approximately a **+30% DNYLD NAV increase**.
- A **−10% ETH price decrease** results in approximately a **−30% DNYLD NAV decrease**.

> **EXAMPLE — LEVERAGE EFFECT**
>
> Assume $150 of ETH is deposited. The protocol mints 100 DPRIME ($100 debt) and allocates $50 of equity.
>
> **If ETH rises 10%:** Collateral is now worth $165. Equity = $165 − $100 = $65. Change in equity: +$15 / $50 = **+30%**.
>
> **If ETH falls 10%:** Collateral is now worth $135. Equity = $135 − $100 = $35. Change in equity: −$15 / $50 = **−30%**.

The effective leverage is not constant—it fluctuates with the collateral ratio. As ETH rises, the equity buffer grows and leverage decreases. As ETH falls, equity shrinks and leverage increases, creating a convex risk profile for DNYLD holders.

4. Minting Mechanism

Users enter the protocol by depositing ETH (native) or WETH into DinoProtocol. The protocol calculates the USD value of the deposit using the oracle price, splits it according to the 1.5× collateral ratio, and mints both DPRIME and DNYLD to the depositor.

4.1 Minting Formulas

Given a deposit of `amount` in ETH/WETH and an oracle price `ethPrice` (USD per ETH, 18 decimals):

$$
\begin{aligned}
\text{ethUsdValue} &= \text{amount} \times \text{ethPrice} \\
\text{dprimeAmount} &= \text{ethUsdValue} \div 1.5 \\
\text{equityValue} &= \text{ethUsdValue} - \text{dprimeAmount} \\
\text{dnyldAmount} &= \text{equityValue} \div \text{NAV}
\end{aligned}
$$

Where **NAV** (Net Asset Value per DNYLD) is defined as:

$$
\text{NAV} = (\text{Total Collateral}_{\text{USD}} - \text{Total DPRIME Supply}) \div \text{Total DNYLD Supply}
$$

For the first mint (when no DNYLD exists), NAV defaults to **$1.00**.

Preconditions

- Minimum deposit: **0.01 ETH**. Deposits below this threshold are rejected.
- Minting is blocked when the system is in **CRITICAL** state.
- The system state is updated before and after every mint operation.

4.2 Worked Example

EXAMPLE — FIRST MINT

Assumptions: ETH price = $2,500. User deposits 1.5 ETH. No tokens exist yet (first mint).

```
ethUsdValue = 1.5 × $2,500 = $3,750.00
dprimeAmount = $3,750 ÷ 1.5 = 2,500 DPRIME
equityValue = $3,750 - $2,500 = $1,250.00
NAV = $1.00  (first mint default)
dnyldAmount = $1,250 ÷ $1.00 = 1,250 DNYLD
```

The user receives **2,500 DPRIME** and **1,250 DNYLD**. The vault now holds 1.5 ETH ($3,750).

EXAMPLE — SUBSEQUENT MINT (ETH HAS RISEN)

Assumptions: ETH is now $3,000. Vault holds 1.5 ETH. DPRIME supply = 2,500. DNYLD supply = 1,250.
A second user deposits 1.5 ETH.

Current NAV:

$$\text{Total Collateral}_{USD} = 1.5 \times \$3{,}000 = \$4{,}500$$

$$\text{NAV} = (\$4{,}500 - 2{,}500) \div 1{,}250 = \$2{,}000 \div 1{,}250 = \mathbf{\$1.60}$$

New mint:

```
ethUsdValue = 1.5 × $3,000 = $4,500
dprimeAmount = $4,500 ÷ 1.5 = 3,000 DPRIME
equityValue = $4,500 - $3,000 = $1,500
dnyldAmount = $1,500 ÷ $1.60 = 937.50 DNYLD
```

The second user receives **3,000 DPRIME** and **937.50 DNYLD** at the higher NAV.

5. Redemption Mechanism

Both DPRIME and DNYLD can be redeemed for ETH, but under different rules and constraints. The protocol burns the redeemed tokens, applies applicable fees, and withdraws the net ETH amount from the CollateralVault to the user.

5.1 DPRIME Redemption

DPRIME is redeemable at its face value of $1.00 per token, minus fees. The protocol applies a composite fee and converts the net USD value to ETH at the current oracle price.

```
fee = getDprimeRedemptionFee(amount)
netAmount = amount - fee
ethReturned = netAmount ÷ ethPrice
```

Constraints

- Minimum redemption: **1 DPRIME**.
- Subject to daily redemption caps (see Section 7).
- Frozen during **CRITICAL** state for up to 180 days.

5.2 DNYLD Redemption

DNYLD is redeemable at its current NAV. The protocol calculates the USD value of the tokens, applies a flat fee, and converts to ETH.

```
redemptionValue = amount × NAV
fee = redemptionValue × 0.50%
netValue = redemptionValue - fee
ethReturned = netValue ÷ ethPrice
```

Constraints

- Minimum redemption: **1 DNYLD**.
- Only available in **NORMAL** and **CAUTION** states. Suspended in RECOVERY and CRITICAL.
- Limited by **headroom**—the number of DNYLD tokens redeemable without pushing the collateral ratio below 150%:

$$\text{currentEquity} = \text{Total Collateral}_{\text{USD}} - \text{Total DPRIME}$$

$$\text{minEquity} = \text{Total DPRIME} \times 0.5$$

$$\text{excessEquity} = \text{currentEquity} - \text{minEquity}$$

$$\text{headroom} = (\text{excessEquity} \times \text{Total DNYLD}) \div \text{currentEquity}$$

5.3 Worked Examples

> **EXAMPLE — DPRIME REDEMPTION (NORMAL STATE)**
>
> **Assumptions:** ETH = $2,500. CR = 155% (NORMAL state). No recent volume. User redeems 1,000 DPRIME.
>
> **Fee calculation:**
>
> Base fee = 50 BPS = 0.50%
>
> CR fee = 0 BPS (CR ≥ 150%)
>
> Volume fee = 0 BPS (no recent volume)
>
> Total fee = 50 BPS = 0.50%
>
> Fee amount = 1,000 × 0.50% = **5 DPRIME**
>
> **ETH returned:**
>
> Net = 1,000 - 5 = 995 DPRIME ($995)
>
> ETH = $995 ÷ $2,500 = **0.398 ETH**

EXAMPLE — DPRIME REDEMPTION (CAUTION STATE, CR = 140%)

Assumptions: ETH = $2,500. CR = 140% (CAUTION). User redeems 1,000 DPRIME. Assume minimal volume.

CR fee calculation:

CR is between 135% and 150%, so:

`CR fee = (1.50 - 1.40) × 200 ÷ (1.50 - 1.35) = 0.10 × 200 ÷ 0.15 =` **`133 BPS (1.33%)`**

`Total fee = 50 + 133 = 183 BPS = 1.83%`

`Fee amount = 1,000 × 1.83% =` **`18.3 DPRIME`**

ETH returned:

`Net = 1,000 - 18.3 = 981.7 DPRIME ($981.70)`

`ETH = $981.70 ÷ $2,500 =` **`0.3927 ETH`**

EXAMPLE — DNYLD REDEMPTION

Assumptions: ETH = $2,500. NAV = $1.60. System in NORMAL state. User redeems 500 DNYLD.

`Redemption value = 500 × $1.60 = $800`

`Fee = $800 × 0.50% = $4.00`

`Net value = $800 - $4 = $796`

`ETH = $796 ÷ $2,500 =` **`0.3184 ETH`**

6. Fee Structure

Redemption fees serve a dual purpose: they compensate the protocol for liquidity demands and they create natural incentives to hold tokens when the system is under stress. Fees increase progressively as the collateral ratio deteriorates, discouraging bank-run dynamics.

6.1 Base Fee

A flat fee of **50 basis points (0.50%)** is applied to every DPRIME redemption regardless of system state.

6.2 Collateral Ratio Fee

A piecewise-linear fee that scales from 0% to 50% as the collateral ratio drops from 150% to below 110%:

COLLATERAL RATIO	CR FEE RANGE	FORMULA (IN BPS)
CR ≥ 150%	0%	No fee
135% ≤ CR < 150%	0% → 2%	`(1.50 - CR) × 200 ÷ 0.15`
120% ≤ CR < 135%	2% → 10%	`200 + (1.35 - CR) × 800 ÷ 0.15`
110% ≤ CR < 120%	10% → 50%	`1000 + (1.20 - CR) × 4000 ÷ 0.10`
CR < 110%	50%	Maximum: 5,000 BPS

6.3 Volume Fee

An additional fee that scales with recent DPRIME redemption volume relative to total supply, designed to dampen rapid outflows:

```
volumeRatio = recentVolume ÷ totalDPRIMESupply
volumeFee = volumeRatio × 500 BPS
(capped at 500 BPS = 5%)
```

The volume window spans **100 blocks** (~20 minutes). Accumulated redemption volume resets after this window elapses.

6.4 DNYLD Fee

DNYLD redemptions carry a flat fee of **50 basis points (0.50%)**, applied to the USD redemption value.

6.5 Composite DPRIME Fee

The total DPRIME redemption fee is the sum of all three components:

$$\text{totalFee}_{BPS} = \text{baseFee}\ (50) + \text{crFee}\ (0\text{–}5000) + \text{volumeFee}\ (0\text{–}500)$$

Range: **0.50%** (healthy, no volume) to **100%** (hard cap)

6.6 Fee Calculation Example

> EXAMPLE — STRESSED SYSTEM FEE
>
> **Assumptions:** CR = 125% (RECOVERY state). 3% of DPRIME supply redeemed in last 100 blocks. User redeems 10,000 DPRIME.
>
> **Base fee:** 50 BPS
>
> **CR fee** (CR = 1.25, between 1.20 and 1.35):
> 200 + (1.35 - 1.25) × 800 ÷ 0.15 = 200 + 533 = **733 BPS**
>
> **Volume fee** (volumeRatio = 0.03):
> 0.03 × 500 = **15 BPS**
>
> **Total:** 50 + 733 + 15 = **798 BPS (7.98%)**
>
> Fee = 10,000 × 7.98% = **798 DPRIME**
> User receives ETH worth 9,202 DPRIME ($9,202)

7. System States

The protocol operates in one of four states, determined by the current collateral ratio (CR). State transitions are evaluated automatically at the beginning and end of every mint and redeem operation.

$$CR = \text{Total Collateral}_{USD} \div \text{Total DPRIME Supply}$$

7.1 Normal (CR ≥ 150%)

The system is fully healthy. All operations are available:

- Minting: **Allowed**
- DPRIME redemption: **Allowed**, base fee only (0.50%), **no daily cap**
- DNYLD redemption: **Allowed** at NAV, limited by headroom

7.2 Caution (135% ≤ CR < 150%)

Warning state. All operations remain available but with elevated fees and caps:

- Minting: **Allowed**
- DPRIME redemption: **Allowed**, elevated CR fee (0%–2%), daily cap of **5% of DPRIME supply**
- DNYLD redemption: **Allowed** at NAV, limited by headroom

7.3 Recovery (120% ≤ CR < 135%)

The equity buffer is thinning. DNYLD redemptions are suspended to preserve the buffer:

- Minting: **Allowed** (new deposits improve CR)
- DPRIME redemption: **Allowed**, high CR fee (2%–10%), daily cap of **2% of DPRIME supply**
- DNYLD redemption: **Suspended**

7.4 Critical (CR < 120%)

Emergency state. A **180-day freeze** is activated on first entry. During the freeze:

- Minting: **Blocked**

- DPRIME redemption: **Frozen** for up to 180 days. After the freeze window expires, redemptions resume even if the system remains in CRITICAL.
- DNYLD redemption: **Suspended**
- Governance intervention is expected during this period.

7.5 State Transition Summary

STATE	CR THRESHOLD	MINTING	DPRIME REDEMPTION	DNYLD REDEMPTION	DAILY DPRIME CAP
NORMAL	≥ 150%	Allowed	Allowed	Allowed	Unlimited
CAUTION	≥ 135%	Allowed	Allowed	Allowed	5% of supply
RECOVERY	≥ 120%	Allowed	Allowed	Suspended	2% of supply
CRITICAL	< 120%	Blocked	Frozen ≤ 180 days	Suspended	0

When the system enters CRITICAL for the first time, a freeze window is set: `freezeEndTime = now + 180 days`. If the system later recovers above 120%, the freeze is reset. The freeze is a one-time activation per CRITICAL entry.

7.6 Scenario Walkthrough

SCENARIO — ETH PRICE DECLINE

Initial state: Vault holds 100 ETH. ETH = $3,000. DPRIME supply = 200,000. DNYLD supply = 100,000.

$$\text{Collateral}_{USD} = 100 \times \$3{,}000 = \$300{,}000$$

$$CR = \$300{,}000 \div 200{,}000 = \mathbf{150\%} \rightarrow \mathbf{NORMAL}$$

$$NAV = (\$300{,}000 - \$200{,}000) \div 100{,}000 = \mathbf{\$1.00}$$

ETH drops to $2,600:

$$\text{Collateral}_{USD} = 100 \times \$2{,}600 = \$260{,}000$$

$$CR = \$260{,}000 \div 200{,}000 = \mathbf{130\%} \rightarrow \mathbf{RECOVERY}$$

$$NAV = (\$260{,}000 - \$200{,}000) \div 100{,}000 = \mathbf{\$0.60}$$

DNYLD NAV dropped 40% from a 13.3% ETH decline. DNYLD redemptions are now suspended.

ETH drops to $2,300:

$$\text{Collateral}_{USD} = 100 \times \$2{,}300 = \$230{,}000$$

$$CR = \$230{,}000 \div 200{,}000 = \mathbf{115\%} \rightarrow \mathbf{CRITICAL}$$

$$NAV = (\$230{,}000 - \$200{,}000) \div 100{,}000 = \mathbf{\$0.30}$$

180-day freeze activated. All redemptions are frozen. Governance intervention expected.

ETH recovers to $3,100:

$$\text{Collateral}_{USD} = 100 \times \$3{,}100 = \$310{,}000$$

$$CR = \$310{,}000 \div 200{,}000 = \mathbf{155\%} \rightarrow \mathbf{NORMAL}$$

Freeze is reset. All operations resume. NAV = $1.10.

8. Oracle System

Accurate and manipulation-resistant price data is essential for a collateral-backed protocol. DinoProtocol uses a multi-source oracle that aggregates prices from independent on-chain feeds.

8.1 Price Sources

SOURCE	TYPE	STALENESS THRESHOLD	DESCRIPTION
Chainlink	Push-based price feed	4 hours (default)	Industry-standard decentralized oracle network. Price rejected if `updatedAt` is older than the staleness threshold or `answer ≤ 0`.
Uniswap V3 TWAP	On-chain TWAP	N/A (uses observation window)	Time-weighted average price over a 30-minute window (configurable, minimum 60 seconds). Derived from tick cumulatives via `pool.observe()`.

8.2 Aggregation Algorithm

The oracle collects prices from all active sources and produces a single aggregate price:

1. Query each active oracle (Chainlink `latestRoundData`, Uniswap V3 `observe`).
2. Discard stale or invalid prices (staleness check, non-positive values).
3. Normalize all prices to 18 decimals.
4. If only one valid price remains, use it directly.
5. If two or more valid prices exist, compute the **median**:
   - Sort prices in ascending order.
   - Odd count: take the middle value.
   - Even count: average of the two middle values.
6. Compare the median against the last known price. If deviation exceeds the threshold, trigger the circuit breaker.

8.3 Circuit Breaker

The circuit breaker protects the protocol from acting on anomalous price data:

PARAMETER	DEFAULT VALUE	DESCRIPTION
Max price change	1,000 BPS (10%)	Maximum allowed deviation between new and last valid price. Configurable by admin.
Cooldown period	1 hour	Duration after which the circuit breaker auto-resets.

```
deviation = |newPrice - lastPrice| × 10,000 ÷ lastPrice

if deviation > maxPriceChangeBPS → circuit breaker activates, return lastPrice
```

When the circuit breaker is active:

- The `getEthUscPrice()` view function reverts, preventing any mint or redeem from executing.
- After the cooldown period elapses, the breaker auto-resets on the next price query.
- The admin can manually reset the breaker at any time.

As a final fallback, if the oracle aggregation produces no valid price but a cached `lastPrice` exists and is less than 4 hours old, the cached price is returned.

9. Key Formulas Summary

FORMULA	EXPRESSION
Collateral Ratio	$CR = \text{Total Collateral}_{USD} \div \text{Total DPRIME Supply}$
NAV per DNYLD	$NAV = (\text{Total Collateral}_{USD} - \text{Total DPRIME}) \div \text{Total DNYLD Supply}$
DPRIME minted	$ETH_{USD} \div 1.5$
DNYLD minted	$(ETH_{USD} - \text{DPRIME minted}) \div NAV$
DNYLD leverage	$\text{Collateral} \div \text{Equity} = 1.5 \div 0.5 = 3\times$
Headroom	$(\text{currentEquity} - \text{minEquity}) \times \text{totalDNYLD} \div \text{currentEquity}$
DPRIME fee (total)	baseFee (50 BPS) + crFee (0–5000 BPS) + volumeFee (0–500 BPS)
DNYLD fee	$\text{redemptionValue} \times 50$ BPS
Circuit breaker	$\lvert\text{newPrice} - \text{lastPrice}\rvert \div \text{lastPrice} > 10\%$

10. Smart Contract Architecture

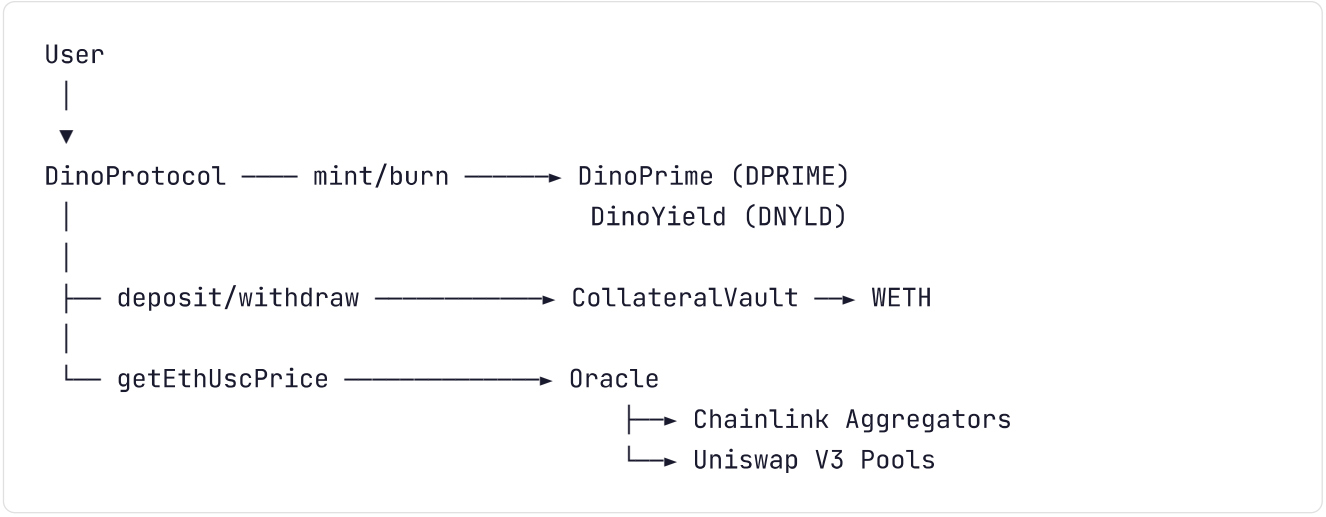
10.1 Contract Overview

CONTRACT	DESCRIPTION
DinoProtocol	Core protocol logic. Single entry point for users. Handles minting, redemption, state transitions, and fee calculation. Coordinates all other contracts.
DinoPrime	ERC-20 DPRIME stablecoin. Supports ERC-2612 Permit. Mint and burn controlled exclusively by DinoProtocol.
DinoYield	ERC-20 DNYLD equity token. Supports ERC-2612 Permit. Mint and burn controlled exclusively by DinoProtocol.
CollateralVault	Holds all ETH/WETH collateral. Accepts deposits and processes withdrawals only through DinoProtocol. Auto-wraps ETH to WETH.
Oracle	Multi-source price aggregator. Combines Chainlink and Uniswap V3 TWAP feeds. Implements circuit breaker and median aggregation.

Supporting libraries:

- **WadMath** — Fixed-point arithmetic at 18-decimal precision (WAD) and basis-point operations. Uses OpenZeppelin `Math.mulDiv()` for overflow protection.
- **UniswapV3** — TWAP price calculation from Uniswap V3 pool observations. Handles tick-to-price conversion and pool validation.

10.2 Contract Interactions



Key design principles:

- **Single entry point:** Users interact only with DinoProtocol. Direct access to tokens, vault, or oracle is restricted by role-based access control.
- **Separation of concerns:** Collateral custody (vault), price data (oracle), and token logic (DPRIME/DNYLD) are isolated in dedicated contracts.
- **Least privilege:** Each contract grants the minimum required role to its dependents.

10.3 Access Control

All contracts use OpenZeppelin `AccessControlUpgradeable` with the following role assignments:

CONTRACT	ROLE	HOLDER	CAPABILITIES
DinoProtocol	`DEFAULT_ADMIN_ROLE`	Admin	Upgrade, set oracle, manage roles
	`PAUSER_ROLE`	Admin	Pause / unpause all operations
CollateralVault	`DEFAULT_ADMIN_ROLE`	Admin	Configure vault, upgrade
	`OPERATOR_ROLE`	DinoProtocol	Deposit, withdraw
Oracle	`DEFAULT_ADMIN_ROLE`	Admin	Add/remove oracles, reset circuit breaker
	`OPERATOR_ROLE`	DinoProtocol	Update aggregate price
DinoPrime	`MINTER_ROLE`	DinoProtocol	Mint, burn
DinoYield	`MINTER_ROLE`	DinoProtocol	Mint, burn

10.4 Upgradeability

All five contracts follow the **UUPS (Universal Upgradeable Proxy Standard)** pattern via OpenZeppelin:

- Each contract is deployed behind an `ERC1967Proxy`.
- Implementation constructors call `_disableInitializers()` to prevent direct initialization.
- State is initialized through a one-time `initialize()` call on the proxy.
- Upgrades require explicit authorization via `_authorizeUpgrade()`, gated by `UPGRADER_ROLE` or `DEFAULT_ADMIN_ROLE`.

Additional safety mechanisms present across all contracts:

- **ReentrancyGuard** on DinoProtocol and CollateralVault.
- **Pausable** on all five contracts.

12. Risk Factors

Participants should be aware of the following risks before interacting with DinoProtocol:

Smart Contract Risk

The protocol smart contracts have **not been audited**. Despite the use of established libraries (OpenZeppelin) and standard patterns (UUPS, ReentrancyGuard), undiscovered vulnerabilities may exist that could result in loss of funds.

Oracle Risk

The protocol depends on external price feeds (Chainlink, Uniswap V3). Oracle failure, manipulation, or delayed updates could cause the system to operate with incorrect price data. The circuit breaker mitigates but does not eliminate this risk.

Collateral Volatility

ETH is the sole collateral asset. A sharp decline in ETH price can push the system into RECOVERY or CRITICAL states, suspending redemptions and activating the freeze mechanism. DNYLD holders bear amplified downside risk (3× leverage at mint).

Liquidity Risk

DNYLD redemptions are subject to headroom limits, and both tokens are subject to daily redemption caps when the system is under stress. In CRITICAL state, all redemptions may be frozen for up to 180 days.

Upgrade Risk

All contracts are upgradeable. The admin holding `DEFAULT_ADMIN_ROLE` or `UPGRADER_ROLE` can deploy new implementation logic. Users must trust that upgrades will not introduce malicious or faulty behaviour.

Centralization Risk

Administrative functions (oracle configuration, circuit breaker reset, contract upgrades, pausing) are controlled by a single admin address. Compromise or misuse of this address could affect all protocol operations.

Peg Stability

DPRIME targets a $1 peg through overcollateralization and redemption mechanics, but it is not algorithmically stabilized or backed by fiat reserves. The peg depends on sufficient collateral,

accurate oracle data, and rational market behaviour.

13. Disclaimer

This whitepaper is provided strictly for informational and educational purposes. It does not constitute an offer, solicitation, or recommendation to purchase, sell, or hold any token, security, or financial instrument.

DinoProtocol is an **experimental project**. The smart contracts described in this document have **not been audited** by any third-party security firm. There is no guarantee of the correctness, completeness, or security of the code.

Participants interact with the protocol entirely at their own risk. The authors and contributors assume no liability for any loss of funds, data, or other damages arising from the use of DinoProtocol.

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Users are encouraged to review the source code, conduct their own due diligence, and consult independent legal and financial advisors before interacting with the protocol.

This document was generated from the protocol source code and is subject to change.