RugFreeCoins Audit

Gambler Audit

Smart Contract Security Audit

November 10, 2021

Contents

Audit details

Audited project

Gambler Token

Contract Address

0x34d38f839374f4db37c807566097d21c3cfa856e

Client contact

Gambler Token Team

Blockchain

Binance smart chain

Project website

https://www.gamblertoken.net/

Disclaimer

This is a limited report on our findings based on our analysis, in accordance with good industry practice as at the date of this report, in relation to cybersecurity vulnerabilities and issues in the framework and algorithms based on smart contracts, the details of which are set out in this report. In order to get a full view of our analysis, it is crucial for you to read the full report. While we have done our best in conducting our analysis and producing this report, it is important to note that you should not rely on this report and cannot claim against us on the basis of what it says or doesn't say, or how we produced it, and it is important for you to conduct your own independent investigations before making any decisions. We go into more detail on this in the disclaimer below – please make sure to read it in full.

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Background

Rugfreecoins was commissioned by Gambler Token to perform an audit of the smart contract.

https://bscscan.com/token/0x34d38f839374f4db37c807566097d21c3cfa856e

The focus of this audit is to verify that the smart contract is secure, resilient and working according to the specifications.

The information in this report should be used to understand the risk exposure of the smart contract, project feasibility, long term sustainability and as a guide to improve the security posture of the smart contract by remediating the issues that were identified.

About the project

Gambler Token is a token built on the Binance Smart Chain and is a new community-driven crypto casino developed for fun and safe gaming in a decentralized environment. The Gambler Token Casino will be developed in a way that provides gamers a fraud free environment to indulge their Gambling Desires, engage with the community, and earn rewards through gaming or holding. Each transaction, purchase and sale incurs 12% fee.

Features

❖ The **Gambler Token rewards** will be distributed among every holder proportional to how many tokens each individual holds in values of **7% when buying and selling**.

❖ The additional component included under the sustainability section is a **liquidity fee of 3% from buying and selling**, which is a redistribution mechanism that ensures the trading pool always has sufficient liquidity.

❖ The **sustainability fee of 2% when buying and selling for marketing** is what allows Gambler Token to hold the aforementioned promise. Tokens will be swapped into BNB and will be sent to a marketing wallet per transaction. This way, Gambler Token will have enough funds to promote the coin and spend for future development without selling tokens as the traditional way.

Tokenomics

12% fee when buying and selling

❖ 7% of trade goes to holders' pockets in Gambler tokens.
❖ 3% of trade goes to the liquidity pool.
❖ 2% of trade goes to the marketing wallet.

Roadmap

Phase 1

- ❖ Private sale target (20 BNB)
- ❖ Casino website development
- ❖ Contract built to guarantee the longevity of the project
- ❖ Organic shilling
- ❖ AMA's and pitches to crypto community group chats
- ❖ Presale target (130 BNB)
- ❖ Audit

Phase 2

- ❖ Public sale
- ❖ PancakeSwap launch
- ❖ Website update with two new games
- ❖ Continued collaborations with influencers, Gambling & Crypto
- ❖ Aggressive marketing

Phase 3

- ❖ Monthly web updates/game additions
- ❖ Partnership with mainstream casinos and VIPs
- ❖ Donations to gambling charities
- ❖ Graffiti artists creating branded art across Las Vegas, London and other major cities

Target market and the concept

- ❖ Anyone who's interested in Crypto space with long term investment plans.
- ❖ Anyone who's ready to earn a passive income in Infinity Wealth Tokens by holding tokens.
- ❖ Anyone who's interested in trading tokens.
- ❖ Anyone who's interested in taking part with the future plans of the Infinity Wealth token.
- ❖ Anyone who's interested in making financial transactions with any other party using Infinity Wealth as the currency.

Core concept

Gambler Token reward system

7% of each transaction when buying and selling gets converted to tokens and is split amongst all holders. Holders will be eligible to receive tokens every five hours and rewards are proportional to how many tokens each individual holds.

Sustainable mechanism

The **sustainability fee of 2% when buying and selling for marketing** is what allows Gambler Token to promote the token and use funds to further development of the platform. Tokens will be swapped into BNB and will be sent to a marketing wallet per transaction. This way, Gambler Token will have access to the funds without selling tokens as the traditional way, which will enable them to consume funds without hurting the project.

The liquidity fee of 3%, which is a redistribution mechanism that ensures the trading pool always has sufficient liquidity.

Gambling wallet and Casino account

As a crypto-based casino, action will take place using the GMBT token. Users will need to set up an initial online casino account that can be used to access and play the variety of Casino games available on the platform. By creating a platform-based account and then finding it with GMBT, users are ready to play on the Gambler Token Casino anytime. Their tokens are stored in the Gambling Wallet.

The Gambler Token Gambling Wallet is essentially the House account. When a player wins, the player's winnings are displayed on their online account. When a player wants to withdraw, their funds are taken from the Gambling Wallet and sent to their own personal wallet.

Online casino and web app

The Gambler Token Casino website will be designed with the user in mind and accessible online via desktop, Android, and iOS mobile. In the theme of traditional online casinos, the Gambler Token Casino will offer games like coin flip, roulette wheel, and bomb mines. Gambler Token Casino will offer basic casino games with an 85-90% pay-out rate depending on the game.

NFT marketplace

Non-fungible tokens (NFTs) have taken the art world by storm and opened new avenues to digital and physical creators. Collectibles created to promote new platforms become the latest craze and collectible art form. By opening up an NFT marketplace in collaboration with the Gambler Token casino a healthy ecosystem will form in which holders can interact in a variety of ways.

Potential to grow with score points

1.	Project efficiency	8/10
2.	Project uniqueness	7/10
3	Information quality	9/10
4	Service quality	8/10
5	System quality	8/10
6	Impact on the community	8/10
7	Impact on the business	9/10
8	Preparing for the future	9/10
Total Points		**8.25/10**

Contract details

Token contract details for 10th November 2021

Contract name	Gambler Token
Contract address	0x34d38f839374f4db37c807566097d21c3cfa856e
Token supply	21,000,000
Token ticker	GMBT
Decimals	9
Token holders	194
Transaction count	755
Marketing wallet	0x4a77f1c4f23dc99401cb526a4f22def3a88bf193
Contract deployer address	0x2840b60e73BaEE5A371cb6C03Cae1AF4311bFb53
Contract's current owner address	0x2c49f44f9abd820de8bacc660cd1f3107a416941

Token distribution

Tokens are distributed as follows:

- ➢ Private sale   :43%
- ➢ Presale   :37%
- ➢ Public sale   :15%
- ➢ Gambling wallet   :10%
- ➢ Marketing   :5%
- ➢ Team   :10%

Contract code function details

No	Category	Item	Result
1	Coding conventions	BRC20 Token standards	pass
		compile errors	pass
		Compiler version security	pass
		visibility specifiers	pass
		Gas consumption	pass
		SafeMath features	pass
		Fallback usage	pass
		tx.origin usage	pass
		deprecated items	pass
		Redundant code	pass
		Overriding variables	pass
2	Function call audit	Authorization of function call	pass
		Low level function (call/delegate call) security	pass
		Returned value security	pass
		Selfdestruct function security	pass
3	Business security	Access control of owners	pass
		Business logics	pass
		Business implementations	pass
4	Integer overflow/underflow		pass
5	Reentrancy		pass
6	Exceptional reachable state		pass
7	Transaction ordering dependence		pass
8	Block properties dependence		pass
9	Pseudo random number generator (PRNG)		pass
10	DoS (Denial of Service)		pass
11	Token vesting implementation		pass
12	Fake deposit		pass
13	Event security		pass

Contract description table

Below table represents the summary of the contracts and methods in the token contract. We scanned the whole contract and listed down all the Interfaces, functions and implementations with its visibility and mutability.

Contract	Type	Bases		
L	Function Name	Visibility	Mutability	Modifiers
Context	**Implementation**			
L	_msgSender	Internal 🔒		
L	_msgData	Internal 🔒		
IBEP20	**Interface**			
L	totalSupply	External ⏍		NO⏍
L	balanceOf	External ⏍		NO⏍
L	transfer	External ⏍	⬢	NO⏍
L	allowance	External ⏍		NO⏍
L	approve	External ⏍	⬢	NO⏍
L	transferFrom	External ⏍	⬢	NO⏍
SafeMath	**Library**			
L	tryAdd	Internal 🔒		
L	trySub	Internal 🔒		
L	tryMul	Internal 🔒		
L	tryDiv	Internal 🔒		
L	tryMod	Internal 🔒		
L	add	Internal 🔒		
L	sub	Internal 🔒		

L	mul	Internal 🔒		
L	div	Internal 🔒		
L	mod	Internal 🔒		
L	sub	Internal 🔒		
L	div	Internal 🔒		
L	mod	Internal 🔒		
SafeMathInt	**Library**			
L	mul	Internal 🔒		
L	div	Internal 🔒		
L	sub	Internal 🔒		
L	add	Internal 🔒		
L	abs	Internal 🔒		
L	toUint256Safe	Internal 🔒		
SafeMathUint	**Library**			
L	toInt256Safe	Internal 🔒		
Ownable	**Implementation**	**Context**		
L		Public 🛡	⬤	NO🛡
L	owner	Public 🛡		NO🛡
L	renounceOwnership	Public 🛡	⬤	onlyOwner
L	transferOwnership	Public 🛡	⬤	onlyOwner
IUniswapV2Factory	**Interface**			
L	feeTo	External 🛡		NO🛡

L	feeToSetter	External ▯		NO▯
L	getPair	External ▯		NO▯
L	allPairs	External ▯		NO▯
L	allPairsLength	External ▯		NO▯
L	createPair	External ▯	●	NO▯
L	setFeeTo	External ▯	●	NO▯
L	setFeeToSetter	External ▯	●	NO▯
IUniswapV2Pair	**Interface**			
L	name	External ▯		NO▯
L	symbol	External ▯		NO▯
L	decimals	External ▯		NO▯
L	totalSupply	External ▯		NO▯
L	balanceOf	External ▯		NO▯
L	allowance	External ▯		NO▯
L	approve	External ▯	●	NO▯
L	transfer	External ▯	●	NO▯
L	transferFrom	External ▯	●	NO▯
L	DOMAIN_SEPAR ATOR	External ▯		NO▯
L	PERMIT_TYPEHA SH	External ▯		NO▯
L	nonces	External ▯		NO▯
L	permit	External ▯	●	NO▯
L	MINIMUM_LIQUID ITY	External ▯		NO▯
L	factory	External ▯		NO▯
L	token0	External ▯		NO▯

14

L	token1	External ⫿		NO⫿
L	getReserves	External ⫿		NO⫿
L	price0CumulativeLast	External ⫿		NO⫿
L	price1CumulativeLast	External ⫿		NO⫿
L	kLast	External ⫿		NO⫿
L	mint	External ⫿	⬤	NO⫿
L	burn	External ⫿	⬤	NO⫿
L	swap	External ⫿	⬤	NO⫿
L	skim	External ⫿	⬤	NO⫿
L	sync	External ⫿	⬤	NO⫿
L	initialize	External ⫿	⬤	NO⫿
IUniswapV2Router01	**Interface**			
L	factory	External ⫿		NO⫿
L	WETH	External ⫿		NO⫿
L	addLiquidity	External ⫿	⬤	NO⫿
L	addLiquidityETH	External ⫿	💲	NO⫿
L	removeLiquidity	External ⫿	⬤	NO⫿
L	removeLiquidityETH	External ⫿	⬤	NO⫿
L	removeLiquidityWithPermit	External ⫿	⬤	NO⫿
L	removeLiquidityETHWithPermit	External ⫿	⬤	NO⫿
L	swapExactTokensForTokens	External ⫿	⬤	NO⫿
L	swapTokensForExactTokens	External ⫿	⬤	NO⫿

L	swapExactETHFor Tokens	External ▯	🔲	NO▯
L	swapTokensForEx actETH	External ▯	⬤	NO▯
L	swapExactTokens ForETH	External ▯	⬤	NO▯
L	swapETHForExact Tokens	External ▯	🔲	NO▯
L	quote	External ▯		NO▯
L	getAmountOut	External ▯		NO▯
L	getAmountIn	External ▯		NO▯
L	getAmountsOut	External ▯		NO▯
L	getAmountsIn	External ▯		NO▯
IUniswapV2Router02	**Interface**	**IUniswapV2Router01**		
L	removeLiquidityET HSupportingFeeO nTransferTokens	External ▯	⬤	NO▯
L	removeLiquidityET HWithPermitSupp ortingFeeOnTransf erTokens	External ▯	⬤	NO▯
L	swapExactTokens ForTokensSupport ingFeeOnTransfer Tokens	External ▯	⬤	NO▯
L	swapExactETHFor TokensSupporting FeeOnTransferTo kens	External ▯	🔲	NO▯
L	swapExactTokens ForETHSupporting FeeOnTransferTo kens	External ▯	⬤	NO▯

GamblerToken	Implementation	Context, IBEP20, Ownable		
L		Public 𝕁	⬤	Ownable
L	name	Public 𝕁		NO𝕁
L	symbol	Public 𝕁		NO𝕁
L	decimals	Public 𝕁		NO𝕁
L	totalSupply	Public 𝕁		NO𝕁
L	balanceOf	Public 𝕁		NO𝕁
L	transfer	Public 𝕁	⬤	NO𝕁
L	allowance	Public 𝕁		NO𝕁
L	approve	Public 𝕁	⬤	NO𝕁
L	transferFrom	Public 𝕁	⬤	NO𝕁
L	increaseAllowance	Public 𝕁	⬤	NO𝕁
L	decreaseAllowance	Public 𝕁	⬤	NO𝕁
L	isExcludedFromReward	Public 𝕁		NO𝕁
L	totalFees	Public 𝕁		NO𝕁
L	deliver	Public 𝕁	⬤	NO𝕁
L	reflectionFromToken	Public 𝕁		NO𝕁
L	tokenFromReflection	Public 𝕁		NO𝕁
L	excludeFromReward	Public 𝕁	⬤	onlyOwner
L	includeInReward	External 𝕁	⬤	onlyOwner
L	setMarketingWallet	External 𝕁	⬤	onlyOwner
L	setExcludedFromFee	External 𝕁	⬤	onlyOwner

L	setTaxFeePercent	External ▯	⬤	onlyOwner
L	tradingEnable	External ▯	⬤	onlyOwner
L	setLiquidityFeePercent	External ▯	⬤	onlyOwner
L	setPercentageOfMarketing	External ▯	⬤	onlyOwner
L	setMaxTxPercent	External ▯	⬤	onlyOwner
L	setSwapAndLiquifyEnabled	Public ▯	⬤	onlyOwner
L		External ▯	▦	NO▯
L	setUniswapRouter	External ▯	⬤	onlyOwner
L	setUniswapPair	External ▯	⬤	onlyOwner
L	setExcludedFromAutoLiquidity	External ▯	⬤	onlyOwner
L	_reflectFee	Private 🔐	⬤	
L	_getTValues	Private 🔐		
L	_getRValues	Private 🔐		
L	_getRate	Private 🔐		
L	_getCurrentSupply	Private 🔐		
L	takeTransactionFee	Private 🔐	⬤	
L	calculateFee	Private 🔐		
L	isExcludedFromFee	Public ▯		NO▯
L	_approve	Private 🔐	⬤	
L	_transfer	Private 🔐	⬤	
L	swapAndLiquify	Private 🔐	⬤	lockTheSwap

L	swapTokensForBnb	Private 🔑	⬣	
L	addLiquidity	Private 🔑	⬣	
L	_tokenTransfer	Private 🔑	⬣	
L	_transferStandard	Private 🔑	⬣	
L	_transferBothExcluded	Private 🔑	⬣	
L	_transferToExcluded	Private 🔑	⬣	
L	_transferFromExcluded	Private 🔑	⬣	

Legend

Symbol	Meaning
🔴	**Function can modify state**
💵	**Function is payable**

Inheritance Hierarchy
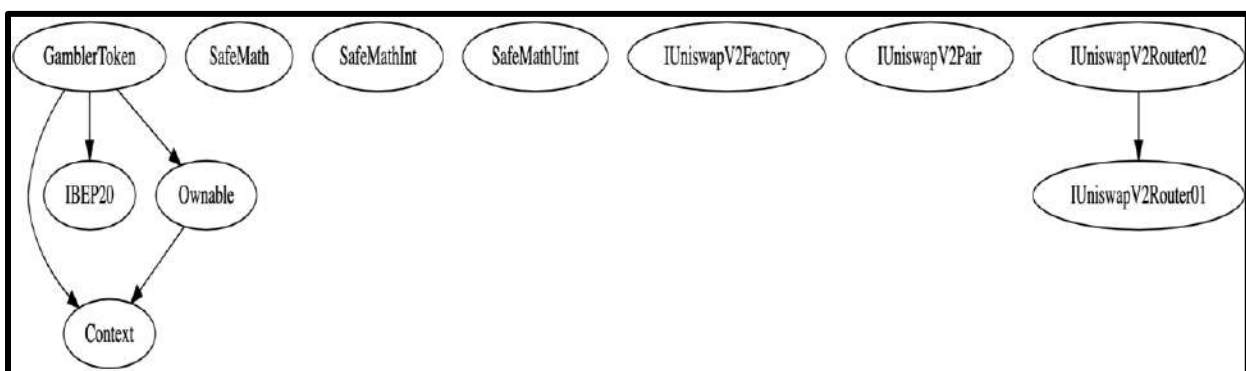
Security issue checking status

❖ **High severity issues**

No high severity issues found.

❖ **Medium severity issues**

No medium severity issues found.

❖ **Low severity issues**

No low severity issues found.

Owner privileges

❖ The owner can renounce and transfer ownership.

```
ftrace | funcSig
function renounceOwnership() public virtual onlyOwner {
    emit OwnershipTransferred(_owner, address(0));
    _owner = address(0);
}

ftrace | funcSig
function transferOwnership(address newOwner↑) public virtual onlyOwner {
    require(
        newOwner↑ != address(0),
        "Ownable: new owner is the zero address"
    );
    emit OwnershipTransferred(_owner, newOwner↑);
    _owner = newOwner↑;
}
```

❖ The owner can change the marketing wallet.

```
ftrace | funcSig
function setMarketingWallet(address marketingWallet↑) external onlyOwner {
    _marketingWallet = marketingWallet↑;
}
```

❖ The owner can exclude wallets from the fee.

```
ftrace | funcSig
function setExcludedFromFee(address account↑, bool e↑) external onlyOwner {
    _isExcludedFromFee[account↑] = e↑;
}
```

❖ The owner can change the max transaction amount.

```
ftrace | funcSig
function setMaxTxPercent(uint256 maxTxPercent↑) external onlyOwner {
    _maxTxAmount = _tTotal.mul(maxTxPercent↑).div(100);
}
```

❖ The owner can exclude and include wallet from rewards.

```
ftrace | funcSig
function excludeFromReward(address account↑) public onlyOwner {
    require(!_isExcluded[account↑], "Account is already excluded");

    if (_rOwned[account↑] > 0) {
        _tOwned[account↑] = tokenFromReflection(_rOwned[account↑]);
    }
    _isExcluded[account↑] = true;
    _excluded.push(account↑);
}


ftrace | funcSig
function includeInReward(address account↑) external onlyOwner {
    require(_isExcluded[account↑], "Account is already excluded");

    for (uint256 i = 0; i < _excluded.length; i++) {
        if (_excluded[i] == account↑) {
            _excluded[i] = _excluded[_excluded.length - 1];
            _tOwned[account↑] = 0;
            _isExcluded[account↑] = false;
            _excluded.pop();
            break;
        }
    }
}
```

❖ The owner can enable and disable swap and liquidity add.

```
ftrace | funcSig
function setSwapAndLiquifyEnabled(bool e↑) public onlyOwner {
    _swapAndLiquifyEnabled = e↑;
    emit SwapAndLiquifyEnabledUpdated(e↑);
}
```

❖ The owner can change all fees.

```
ftrace | funcSig
function setTaxFeePercent(uint256 taxFee↑) external onlyOwner {
    _taxFee = taxFee↑;
}


ftrace | funcSig
function setLiquidityFeePercent(uint256 liquidityFee↑) external onlyOwner {
    _liquidityFee = liquidityFee↑;
}


ftrace | funcSig
function setPercentageOfMarketing(uint256 develpomentNbuybackFee↑)
    external
    onlyOwner
{
    _marketingPrecentage = develpomentNbuybackFee↑;
}
```

❖ The owner can change router address and pair.

```
ftrace | funcSig
function setUniswapRouter(address r↑) external onlyOwner {
    IUniswapV2Router02 uniswapV2Router = IUniswapV2Router02(r↑);
    _uniswapV2Router = uniswapV2Router;
}


ftrace | funcSig
function setUniswapPair(address p↑) external onlyOwner {
    _uniswapV2Pair = p↑;
}
```

Audit conclusion

While conducting the audit of the Gambler Token smart contract, it was observed that there is nothing alarming with the code.