

- Peerless Direct Chain Betting Protocols -



Glossary of Terms

Bet Payout: refers to the amount of Wagerr paid out as a result of a Valid Bet(s)

Bet Stake: means the amount of Wagerr placed on a Bet

Bet Transaction: a Transaction on chain holding the details of a verifiable Bet

Betting Options: means the current available betting options to Bettors

Bettor: refers to an individual that uses Wagerr to make a Bet

Blockchain: here referring to the Wagerr Blockchain Network

Burning: the destruction of Wagerr Coins: the process of removing Coins from circulation

Development Fund: refers to 10% of Betting Fees that are allocated to the Wagerr development fund

Event Transaction: a Transaction on chain holding the details of a Betting Event

Betting Fees: 6% of a Bet Stake

Minting: the creation of new Wagerr coins to payout winning Bets

OMN Fees: refers to 40% of betting fees paid to OMN for facilitating the betting & payout process

OMN: or Oracle Masternode, retrieve real world sporting event data and post the Blockchain

Peerless Direct Chain Betting: or 'Peerless' betting is when a Bettor bets directly against the Blockchain

Result Transaction: a Transaction on chain holding the Results of a Betting Event

SuperBlock: a block that processes payments and fees for winning bets and occurs every 1440 blocks (or 24 hours)

Transaction Fee: refers to the amount paid to the network to post a transaction on chain

Betting & Payout Process

Betting & Payout Flow		Value Cycle
OMN Posts Event Transaction		OMN Pay Event Transaction Fee
	Wagerr QT interprets Event as Betting Options	
	— <u>Bettor Posts</u> <u>Bet Transaction</u>	Bettor Pays Bet Transaction Fee and Bet Stake is Burned
OMN Post Results Transaction		OMN Pays Results Transaction Fee
SuperBlock reads Transactions for Valid Bets		Miner submits SuperBlock, Triggering Minting and Payouts
	Bettors receives Bet Payout	Bet Payouts are calculated and paid out
Development Fund receives Fees Payout		Dev. Fees are calculated and paid out
OMN Fees are allocated		OMN Fees are calculated and allocated

Bet Cycle & Payout

OMN Posts Event Transaction

- A trusted OMN posts an Event Transaction to the Blockchain
- The details of this Transaction are then broadcast to the network

EVENT TRANSACTION OP RETURN FORMAT

TXType|PV|EventId|Timestamp|EventLeague|EventInfo|Home|Away|HomeOdds|AwayOdds|DrawOdds 1|1.0|#453|1528992000|WCUP|R1|RUS|KSA|1.33|11|4.5

HEX Encoded data

317C233435337C313532383939323030307C574355507C52317C5255537C4B53417C312E33337C31317C342E35

EVENT OP RETURN FORMAT DETAILS

TX Type -> the type of wager OP_RETURN transaction.

- EVENT TRANSACTION = 1
- BET TRANSACTION = 2
- RESULT TRANSACTION = 3

PV -> Op Return protocol version number

• Current version is: 1.0

Event Id -> The unique identifier for the event.

Timestamp -> The unix timestamp for the start of the event.

Event League -> The current league or tournament the event is being played under.

Event Info -> Extra event info like the current round of the tournament.

Home -> The team that is playing at home.

Away -> The team that is playing at home.

Home Odds -> The odds for the home team to win the match.

Away Odds -> The odds for the away team to win the match.

Draw Odds -> The odds for the match to be a draw.

Sample raw Event Transaction JSON:

```
10.
            "sequence": 4294967295
11.
        },
        "vout": [{
12.
            "value": 0.01,
13.
            "n": 0,
14.
15.
            "scriptPubKey": {
                "asm": "OP_DUP OP_HASH160 173b3563dd9bc8203fa2c93bfbce83551c8cba6a",
16.
17.
                "hex": "76a914173b3563dd9bc8203fa2c93bfbce83551c8cba6a88ac",
18.
                "reqSigs": 1,
19.
                "type": "pubkeyhash",
                 "addresses": ["TVASr4bm6Rz19udhUWmSGtrrDExCjQdATp"]
20.
21.
            }
22.
        },
23.
        {
24.
            "value": 23.45,
25.
            "n": 1,
26.
            "scriptPubKey": {
27.
                 "asm": "OP_DUP OP_HASH160 b8cb2971f083c23a26b3a50102f998b1597a6257",
28.
                "hex": "76a914b8cb2971f083c23a26b3a50102f998b1597a625788ac",
29.
                 "reqSigs": 1,
30.
                "type": "pubkeyhash",
31.
                 "addresses": ["TBZiSM2JMSStYHScwP53D6tsD12mdBhmfM "]
32.
            }
33.
        },
34.
        {
            "value": 0,
35.
36.
            "n": 2,
            "scriptPubKey": {
37.
                "asm": "OP_RETURN 317C233435337C313532383939323030307C574355507C52317C5255537C4
38.
39.
                                   B53417C312E33337C31317C342E35",
40.
                "hex": "6a25317c313532383939323030307c574355507c52317c5255537c4b53417c312e333,
                 "type": "nulldata"
41.
42.
43.
        }],
44.
45.}
```

Wagerr QT interprets Event as Betting Options

• The Daemon & QT can interpret and present Betting Options to the user via the Betting tab in the QT or by running the command wagerr-cli listevents in the command line interface.

Development Teaser

Bettor Posts Bet Transaction

- A Bettor can place a Bet using command wagerr-cli placebet "<event-id>"
 "<team>" <amount> line or the betting interface, e.g. wagerr-cli placebet "alb2"
 "RUS" 10.5.
- The details of this Bet transaction are then broadcast to the network

BET TRANSACTION OP_RETURN FORMAT

TXType|PV|EventId|Bet 2|1.0|#453|RUS

Hex Encoded data

327C312E307C233435337C525553

EVENT OP RETURN FORMAT DETAILS

TX Type -> the type of wager OP_RETURN transaction.

- EVENT TRANSACTION = 1
- BET TRANSACTION = 2
- RESULT TRANSACTION = 3

PV -> Op Return protocol version number

Current version is: 1.0

Event Id -> The unique identifier for the event.

Bet -> The users team to win e.g RUS or KSA or D for a draw

Sample raw Bet Transaction JSON:

```
1. {
2.
3.
        "Vin": [{
            "prev_out": {
                "hash": "0767b76406dbaa95cc12d8196196a9e476c81dd328a07b30954d8de256aa1e9f",
5.
                "n": 0
6.
7.
            },
8.
            "scriptSig": "REMOVED"
9.
       }],
       "vout": [{
10.
            "value": "1.00000000",
11.
12.
            "scriptPubKey": "OP RETURN 327C312E307C233435337C525553"
13.
        },
1.
2.
            "value": 8.899,
3.
            "n": 1,
4.
            "scriptPubKey": {
                "asm": "OP_DUP OP_HASH160 b8cb2971f083c23a26b3a50102f998b1597a6257",
5.
                "hex": "76a914b8cb2971f083c23a26b3a50102f998b1597a625788ac",
6.
7.
                "reqSigs": 1,
8.
                "type": "pubkeyhash",
9.
                "addresses": ["TPbzGC7nGG7yDeRFNtJfopefoXWaAiTQNc"]
10.
            }
11.
        }]
12.
        ....
14. }
```

OMN Post Results Transaction

- A Trusted Oracle Masternode Address Posts a Result Transaction to the Blockchain
- The details of this Transaction are then broadcast to the network

RESULT TRANSACTION OP_RETURN FORMAT

TXType|PV|EventID|Result|Bet

3|1.0|#453|RUS

Hex Encoded data

337C312E307C233435337C525553

RESULT OP RETURN FORMAT DETAILS

TX Type -> the type of wager OP_RETURN transaction.

- EVENT TRANSACTION = 1
- BET TRANSACTION = 2
- RESULT TRANSACTION = 3

PV -> Op Return protocol version number

Current version is: 1.0

Event Id -> The unique identifier for the event.

Bet -> The users team to win e.g RUS or KSA or D for a draw

Sample raw Result Transaction JSON:

```
1.
   {
2.
        "vin": [{
3.
            "txid": "69dd4f1c690e96c0854196dc37ba8c19fffd8b13b0ca3751a47af1438ad2f7d6",
4.
            "vout": 0,
            "scriptSig": {
6.
7.
                "asm": "REMOVED",
                "hex": "REMOVED"
8.
9.
10.
            "sequence": 4294967295
11.
        "vout": [{
12.
13.
            "value": 0.001,
14.
            "n": 0,
15.
            "scriptPubKey": {
                "asm": "OP_DUP OP_HASH160 173b3563dd9bc8203fa2c93bfbce83551c8cba6a",
16.
                "hex": "76a914173b3563dd9bc8203fa2c93bfbce83551c8cba6a88ac",
17.
                "reqSigs": 1,
18.
19.
                "type": "pubkeyhash",
20.
                "addresses": ["TVASr4bm6Rz19udhUWmSGtrrDExCjQdATp"]
21.
            }
22.
       },
23.
24.
            "value": 9.998,
25.
            "n": 1,
26.
            "scriptPubKey": {
                "asm": "OP_DUP OP_HASH160 b8cb2971f083c23a26b3a50102f998b1597a6257",
27.
                "hex": "76a914b8cb2971f083c23a26b3a50102f998b1597a625788ac",
28.
29.
                "reqSigs": 1,
                "type": "pubkeyhash",
30.
31.
                "addresses": ["TV8n3axPXiYZteRVcCT6TnKM5cffg6FWcy"]
32.
            }
33.
        },
34.
35.
            "value": 0,
            "n": 2,
36.
            "scriptPubKey": {
37.
38.
                "asm": "OP RETURN 337c312e307c233435337c525553",
39.
                "hex": "6a25317c313532383939323030307c574355507c52317c5255537c4b53417c312e333,
                "type": "nulldata"
40.
41.
```

```
42. }],
43. . . .
44. }
```

SuperBlock reads Transactions for Valid Bets

- A SuperBlock occurs every 1440 blocks (or 24 hours)
- The SuperBlock reads all past Transaction until/since the previous SuperBlock for Events, Bets and Results
- The SuperBlock compares all Bets to the corresponding Results to determine which bets qualify for Payouts and calculates the Bet Payouts (click here for calculation details)
- The SuperBlock calculates the Betting Fees based off the Bet Payouts (click <u>here</u> for calculation details)

Bettors receives Bet Payout

Freshly Minted Coins are sent to the address the Bettor used to create a Valid Bet

Development Fund receives Fees Payout

• Click here for calculation details

OMN Fees are allocated

Click <u>here</u> for calculation details

Value Cycle Explained

OMN Pay Event Transaction Fee

The cost of posting an Event is covered by the Event Poster

Bettor Pays Bet Transaction Fee and Bet Stake is Burned

- The cost of posting a Bet is covered by the Bettor
- 100% of the Coins Bet are Burned, thus reducing the number of Coins in circulation

OMN Pays Results Transaction Fee

The cost of posting a Result is covered by the Result Poster

Miner/Staker submits SuperBlock, Triggering Minting and Payouts

- The SuperBlock acts as described above
- Total Coins Minted = Bet Payouts + Dev Fees + OMN Fees

Bet Payouts are calculated and paid out

- (Bet Stake)*(Odds)= Gross Bet Payout
- (Bet Stake)*(0.06)= Betting Fees
- (Gross Bet Payout) (Betting Fees)= Bet Payout

Dev Fees are calculated and paid out

- The Development fund receives 10% of the total Fees deducted from the Bet Payouts
- The current development fund address is Wm5om9hBJTyKqv5FkMSfZ2FDMeGp12fkTe
- These Coins are sent to a specific wallet in the control of the Wagerr team
- (Bet Stake)*(Odds)= Gross Bet Payout
- (Bet Stake)*(0.06)= Betting Fees
- (Betting Fees)*(0.10)= Development Fees

OMN Fees are calculated and allocated

- The OMNs receive 40% of the total Fees deducted from the Bet Payouts
- These Coins are spread evenly among the block rewards of the next 1440 blocks (up to the next SuperBlock)
- This ensures that all OMNs receive their fair share of the reward
- (Bet Stake)*(Odds)= Gross Bet Payout
- (Bet Stake)*(0.06)= Betting Fees
- (Betting Fees)*(0.4)= OMN Fees

