

# API documentation

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This document contains the api and websocket documentation for [prototype.sbulltech.com](https://prototype.sbulltech.com)

## Errors

Any api errors are returned with the following format. These errors can come with 2XX or 4XX or 5XX error code.

```
{
  "success": false,
  "err_msg": "some error message"
}
```

## Underlyings Api

Method: Get

Endpoint: /api/underlyings

Response: Array of Underlying Instruments

### Example

Request

```
curl 'https://prototype.sbulltech.com/api/underlyings'
```

Response

```
{
  "success": true,
  "payload": [
    {
      "symbol": "TATAMOTORS",
      "underlying": "TATAMOTORS",
      "token": 3464002,
      "instrument_type": "EQ",
      "expiry": "",
      "strike": 0
    }
  ]
}
```

## Derivatives Api

Method: Get

Endpoint: /api/derivatives/{underlying\_token}

Response: Array of derivative instruments for a the given underlying

### Example

Request

```
curl 'https://prototype.sbulltech.com/api/derivatives/3464002'
```

Response

```
{
  "success": true,
  "payload": [
    {
      "symbol": "TATAMOTORS20JANFUT",
      "underlying": "TATAMOTORS",
      "token": 3821999,
      "instrument_type": "FUT",
      "expiry": "2020-12-31",
      "strike": 0
    }
  ]
}
```

## Quote Api

Method: Get

Endpoint: /api/quote/{token}

Response: Quote with token and price for the given token

### Example

Request

```
curl 'https://prototype.sbulltech.com/api/quotes/3821999'
```

Response

```
{
  "data_type": "quote",
  "payload": {
    "token": 3821999,
    "price": 169.13076152455824
  }
}
```

## Websocket

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All Client messages must be Websocket Text Messages with JSON encoding in the format specified below.

All Server messages are Websocket Text Messages with JSON encoding.

URL for websocket server <wss://prototype.sbulltech.com/api/ws>

### Client Messages

#### Client Subscribe Message

Send JSON encoded Websocket Text Message with the list of tokens to subscribe

##### Example

```
{
  "msg_command": "subscribe",
  "data_type": "quote",
  "tokens": [5872172]
}
```

#### Client Unsubscribe Message

Send JSON encoded Websocket Text Message with the list of tokens to unsubscribe

##### Example

```
{
  "msg_command": "unsubscribe",
  "data_type": "quote",
  "tokens": [5872172]
}
```

### Server Messages

#### Server Quote Message

Quote message has the data\_type as quote and payload contains the token and price

```
{
  "data_type": "quote",
  "payload": {
    "token": 140834,
    "price": 49.2382232954899
  }
}
```

## Server Ping Message

PING message is sent by server every 15 seconds

```
{
  "data_type": "ping",
  "payload": "{}"
}
```

## Server Error Message

Error message is sent by server if any error occurs

```
{
  "data_type": "error",
  "payload": "some error message"
}
```