

## R Markdown Output

# Overview

This document has code embedded throughout. In the next section we will create a visualization using the already loaded dataset `eth_data`:

```
datatable(eth_data)
```

# Price Chart - Ethereum

## Price Change Over Time - ETH

Most recent data collected on: 2020-12-13 06:00:01 (UTC)

$R = 0.88$ ,  $p < 2.2e-16$



## Python Code Example

```
import pandas as pd
# Create the Python object from R
df = r.cryptodata
# Show the new Python dataframe
df
```

```
##           pair symbol  ask_1_price      date_time_utc
## 0      ETHUSD   ETH      569.064 2020-12-13 06:00:01
## 1      BTCUSD   BTC     18851.330 2020-12-13 06:00:00
## 2      ETHUSD   ETH      567.918 2020-12-13 05:00:01
## 3      BTCUSD   BTC     18852.250 2020-12-13 05:00:00
## 4      BTCUSD   BTC     18789.930 2020-12-13 04:00:01
## ...      ...      ...           ...           ...
## 5121  BTCUSD   BTC     11972.900 2020-08-10 06:03:50
## 5122  BTCUSD   BTC     11985.890 2020-08-10 05:03:48
## 5123  BTCUSD   BTC     11997.470 2020-08-10 04:32:55
## 5124  BTCUSD   BTC      10686.880                NaT
## 5125  ETHUSD   ETH       357.844                NaT
```

## One more Python example

The code below creates a new column `price_percentile` that specifies if the price for the row was in the upper or lower 50th percentile of prices (BTC should be upper and ETH lower):

```
import numpy as np
# Create a new column based on the ask_1_price value:
df['price_percentile'] = np.where(df['ask_1_price'] >
                                  np.percentile(df['ask_1_p
                                  'upper 50th percentile of price
                                  'lower 50th percentile of price

# Show modified dataframe:
df[['symbol', 'ask_1_price', 'price_percentile']]
```

##	symbol	ask_1_price	price_percentile
## 0	ETH	569.064	lower 50th percentile of price
## 1	BTC	18851.330	upper 50th percentile of price
## 2	ETH	567.918	lower 50th percentile of price
## 3	BTC	18852.250	upper 50th percentile of price
## 4	BTC	18789.930	upper 50th percentile of price

## Back to Gallery

```
include_url("https://r-markdown-gallery.org")
```