vim-markdown-preview.html

Design Problem - Bitcoin Reporting

Nucleus provide tools for financial advisers to report on the performance of their clients' Bitcoin investments.

The development team have received a new requirement to provide advisers with a feature which will allow them to see the performance of a client's portfolio within a specified date range.

- The feature will run on a per-client basis.
- The feature will display the monetary value of the specified client's portfolio for each day within the specified date range, using the daily Bitcoin price.

Nucleus has signed an agreement to use a third party service to get Bitcoin prices. This is provided through an API which accepts a date range and returns the Bitcoin unit price for each day in the range.

When a client buys or sells Bitcoin, an entry is placed in the `transaction` table. Another team manages the writing of this table.

The following subset of the `transaction` table shows the first 4 transactions made by client with `CLIENT_ID=1` from the inception of their account.

ID	ADVISER_ID	CLIENT_ID	UNIT_CHANGE	DATE_TIME
1	9	1	11.325235	01/01/2018 01:01:01
2	9	1	3.22	01/01/2018 12:32:01
3	9	1	-1.22142	01/03/2018 08:03:05
4	9	1	2.325325	01/04/2018 11:38:11
5	9	1	2.325325	29/11/2019 03:38:11
∞	∞	∞	n	d