

Documentation

Input file for testing

```
1 SGD.100.All systems on
~/Documents/Google_Drive/Workplace-JP/Workspace/PHP/php_code_challenge-main/
tests
hing, Something, Something, 12345678987, Sing Bank, , Something, Abcdef, 1226, Something, Something, Something, Something
g, Something, Something, 12345678986, HSBC, 0, Something, Abcdef, 1498, Something, Something, Something, Something
4 1036, Something, 223, Something, Something, Something, 12345678985, Shinsei Ginko, 50256.94, Something, Abcdef, 1947, Something, Something, Something
5 1037, Something, 224, Something, Something, Something, 12345678984, SumiTomo, 16154.67, Something, Abcdef, 1517, Something, Something, Something, So
6 1038, Something, 225, Something, Something, Something, , Sing Bank, 87331.22, Something, Abcdef, 1155, Something, Something, Something, Something
7 1039, Something, 226, Something, Something, Something, 12345678982, HSBC, 37319.13, Something, Abcdef, 1431, Something, Something, Something, Someth
8 1040, Something, 303, Something, Something, Something, 12345678981, Shinsei Ginko, 49516.00, Something, Abcdef, 1999, Something, Something, Something, Somethi
9 1041, Something, 304, Something, Something, Something, 12345678980, SumiTomo, 25791.94, Something, Abcdef, 1536, Something, Something, Something, So
10 1042, Something, 305, Something, Something, Something, 12345678979, Sing Bank, 84506.64, Something, , , Something, Something, Something, Something
11 1043, Something, 306, Something, Something, Something, 12345678978, HSBC, 96192.24, Something, Abcdef, 1028, Something, Something, Something, Someth
12 1044, Something, 307, Something, Something, Something, 12345678977, Shinsei Ginko, 70061.19, Something, Abcdef, 1790, Something, Something, Something, Som
13 1045, Something, 123, Something, Something, Something, 12345678976, SumiTomo, 31635.45, Something, Abcdef, 1188, Something, Something, Something, So
14 1046, Something, 124, Something, Something, Something, 12345678975, Sing Bank, 76352.83, Something, Abcdef, 1583, Something, Something, Something, S
15 1047, Something, 125, Something, Something, Something, 12345678974, HSBC, 75712.64, Something, Abcdef, 1463, Something, Something, Something, Someth
16 1048, Something, 721, Something, Something, Something, 12345678973, Shinsei Ginko, 52752.71, Something, Abcdef, 1995, Something, Something, Something, Somethi
17 1049, Something, 722, Something, Something, Something, 12345678972, SumiTomo, 66482.42, Something, Abcdef, 1633, Something, Something, Something, So
18 1050, Something, 723, Something, Something, Something, 12345678971, BOT, 67652.90, Something, Abcdef, 1115, Something, Something, Something, Somethi
```

data_sample.csv

Result of test

```
Test 'FinalResultTest::testReturnsTheCorrectHash' started
Test 'FinalResultTest::testReturnsTheCorrectHash' ended
```

Time: 00:00.006, Memory: 4.00 MB

OK (1 test, 1 assertion)

l@Ls-MacBook-Pro php_code_challenge-main %

Run ./vendor/bin/phpunit tests

Modification

Create new classes

New classes like Reader, Singleton, Parser, SampleParserimpl are created. Each class was created for one responsibility. This could achieve resubility and maintenance.

Create a parser interface

Given that *this is from a larger application that handles multiple files, multiple banks, mutiple countries, and multiple currencies.*, I assumed the FinalResult generated from different files are be the same. I created an Parser interface so that all protential client must implemenet the interface methods in advance. This creation

also allowed decoupling in design.

Create a singleton for the CSV reader

I created a singleton to ensure that the reader class had just a single instance and provided a global access point to that instance. It could reduce memory usage when initializing the Reader object.

No change

- SamplePaserimpl: there was no change in the implementation of its methods because the original implementation already passed the test case.