CS302 Bonus Project

Project Demo

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brucechoe@ecc-f-05:~/Desktop/Biggest-LIttle-Hackathon-2019-CS-Bonus-Project-Submission$ ./hashing

For demonstration purposes, we'll generate random public and private keys for you.
Your keys:
Public Key: 191549
Private Key: 4960183
(1) Add a block to the Block Chain
(2) View the Block Chain
(3) Check if Block Chain has been manipulated
(4) Write the existing Block Chain to the file
(5) Exit
Enter in your option: 1

Enter in your private key: 4960183
Permission granted
Add an integer value to the Block Chain: 123
Adding value 123 to the Block Chain at location 1
Block mined: 00002c61d02a2fe9a2097ae1f9ba42443adabc697e8c9353b365ba62bf93842d

Your keys:
Public Key: 191549
Private Key: 4960183
(1) Add a block to the Block Chain
(2) View the Block Chain
(3) Check if Block Chain has been manipulated
(4) Write the existing Block Chain to the file
(5) Exit
Enter in your option: 1

Enter in your private key: 4960183
Permission granted
Add an integer value to the Block Chain: 456
Adding value 456 to the Block Chain at location 2
Block mined: 00008ae24969982adfabbb06be810cb9dda667cd4bd4cf93540ac591dbc954fc

Your keys:
Public Key: 191549
Private Key: 4960183
(1) Add a block to the Block Chain
(2) View the Block Chain
(3) Check if Block Chain has been manipulated
(4) Write the existing Block Chain to the file
(5) Exit
Enter in your option: 1

Enter in your private key: 191549
Error: Unable to sign block using public key. Please use your private key.
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Your keys:
Public Key: 191549
Private Key: 4960183
(1) Add a block to the Block Chain
(2) View the Block Chain
(3) Check if Block Chain has been manipulated
(4) Write the existing Block Chain to the file
(5) Exit
Enter in your option: 2


Printing out map according to lowest to greatest hash signature
Hash: 00002c61d02a2fe9a2097ae1f9ba42443adabc697e8c9353b365ba62bf93842d With Data: 123
Hash: 00008ae24969982adfabbb06be810cb9dda667cd4bd4cf93540ac591dbc954fc With Data: 456

Your keys:
Public Key: 191549
Private Key: 4960183
(1) Add a block to the Block Chain
(2) View the Block Chain
(3) Check if Block Chain has been manipulated
(4) Write the existing Block Chain to the file
(5) Exit
Enter in your option: 3

Block Chain is valid

Your keys:
Public Key: 191549
Private Key: 4960183
(1) Add a block to the Block Chain
(2) View the Block Chain
(3) Check if Block Chain has been manipulated
(4) Write the existing Block Chain to the file
(5) Exit
Enter in your option: 4

All of the blocks are now written into the file blocks.txt

Your keys:
Public Key: 191549
Private Key: 4960183
(1) Add a block to the Block Chain
(2) View the Block Chain
(3) Check if Block Chain has been manipulated
(4) Write the existing Block Chain to the file
(5) Exit
Enter in your option: 5

Bye!
brucechoe@ecc-f-05:~/Desktop/Biggest-LIttle-Hackathon-2019-CS-Bonus-Project-Submission$
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~/Desktop/Biggest-Little-Hackath

blocks.txt

```
1
2 Printing out map according to lowest to greatest hash signature
3 Hash: 00002c61d02a2fe9a2097ae1f9ba42443adabc697e8c9353b365ba62bf93842d With Data: 123
4 Hash: 00008ae24969982adfabbb06be810cb9dda667cd4bd4cf93540ac591dbc954fc With Data: 456
5
```