**./PythonHeterodyning.py**:

Run 1:

There are 100000 samples

using type <class 'float'>

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2021-08-28 20:57:43 - Starting log

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2021-08-28 20:57:43 - End Program

Elapsed time: 0:00:00.666083

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Run 2:

There are 100000 samples

using type <class 'float'>

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2021-08-28 21:01:12 - Starting log

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========================================

2021-08-28 21:01:12 - End Program

Elapsed time: 0:00:00.602740

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Run 3:

There are 100000 samples

using type <class 'float'>

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2021-08-28 21:03:26 - Starting log

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2021-08-28 21:03:27 - End Program

Elapsed time: 0:00:00.609573

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Run 4:

There are 100000 samples

using type <class 'float'>

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2021-08-28 21:04:00 - Starting log

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2021-08-28 21:04:01 - End Program

Elapsed time: 0:00:00.552083

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Run 5:

There are 100000 samples

using type <class 'float'>

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2021-08-28 21:04:18 - Starting log

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2021-08-28 21:04:19 - End Program

Elapsed time: 0:00:00.542791

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Run 6:

There are 100000 samples

using type <class 'float'>

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2021-08-28 21:04:54 - Starting log

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2021-08-28 21:04:55 - End Program

Elapsed time: 0:00:00.938347

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Run 7:

There are 100000 samples

using type <class 'float'>

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2021-08-28 21:19:22 - Starting log

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2021-08-28 21:19:23 - End Program

Elapsed time: 0:00:00.667237

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Run 8:

There are 100000 samples

using type <class 'float'>

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2021-08-28 21:20:03 - Starting log

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2021-08-28 21:20:03 - End Program

Elapsed time: 0:00:00.590083

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Run 9:

There are 100000 samples

using type <class 'float'>

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2021-08-28 21:22:12 - Starting log

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2021-08-28 21:22:12 - End Program

Elapsed time: 0:00:00.574800

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Run 10:

There are 100000 samples

using type <class 'float'>

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2021-08-28 21:23:42 - Starting log

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========================================

2021-08-28 21:23:42 - End Program

Elapsed time: 0:00:00.574332

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CHeterodyning float:

Run 1:

Precision sizeof 4

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 11.133826 ms

End Unthreaded Test

Run 2:

Precision sizeof 4

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 11.372823 ms

End Unthreaded Test

Run 3:

Running Unthreaded Test

Precision sizeof 4

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 10.774028 ms

End Unthreaded Test

Run 4:

Running Unthreaded Test

Precision sizeof 4

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 9.452996 ms

End Unthreaded Test

Run 5:

Running Unthreaded Test

Precision sizeof 4

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 8.888972 ms

End Unthreaded Test

Run 6:

Running Unthreaded Test

Precision sizeof 4

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 11.305898 ms

End Unthreaded Test

Run 7:

Running Unthreaded Test

Precision sizeof 4

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 7.366919 ms

End Unthreaded Test

Run 8:

Running Unthreaded Test

Precision sizeof 4

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 8.164908 ms

End Unthreaded Test

Run 9:

Precision sizeof 4

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 11.285867 ms

End Unthreaded Test

Run 10:

Running Unthreaded Test

Precision sizeof 4

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 11.326865 ms

End Unthreaded Test

CHeterodyning Double:

Run 1:

Running Unthreaded Test

Precision sizeof 8

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 16.950000 ms

End Unthreaded Test

Run 2:

Running Unthreaded Test

Precision sizeof 8

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 14.247000 ms

End Unthreaded Test

Run 3:

Running Unthreaded Test

Precision sizeof 8

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 16.059000 ms

End Unthreaded Test

Run 4:

Running Unthreaded Test

Precision sizeof 8

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 16.127000 ms

End Unthreaded Test

Run 5:

Running Unthreaded Test

Precision sizeof 8

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 15.688000 ms

End Unthreaded Test

Run 6:

Running Unthreaded Test

Precision sizeof 8

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 16.191000 ms

End Unthreaded Test

Run 7:

Running Unthreaded Test

Precision sizeof 8

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 12.814000 ms

End Unthreaded Test

Run 8:

Precision sizeof 8

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 15.106000 ms

End Unthreaded Test

Run 9:

Running Unthreaded Test

Precision sizeof 8

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 15.672000 ms

End Unthreaded Test

Run 10:

Running Unthreaded Test

Precision sizeof 8

Total amount of samples: 100000

Clock resolution: 1 ns

Time: 14.276000 ms

End Unthreaded Test

CHeterodyning Threaded:

Run 1:

Clock resolution: 1 ns

Threads created :-)

All threads have quit

Time taken for threads to run = 20.2808 ms

Run 2:

Clock resolution: 1 ns

Threads created :-)

All threads have quit

Time taken for threads to run = 30.3655 ms

Run 3:

Clock resolution: 1 ns

Threads created :-)

All threads have quit

Time taken for threads to run = 14.7618 ms

Run 4:

Clock resolution: 1 ns

Threads created :-)

All threads have quit

Time taken for threads to run = 20.6217 ms

Run 5:

Clock resolution: 1 ns

Threads created :-)

All threads have quit

Time taken for threads to run = 14.4888 ms

Run 6:

Clock resolution: 1 ns

Threads created :-)

All threads have quit

Time taken for threads to run = 18.0138 ms

Run 7:

Clock resolution: 1 ns

Threads created :-)

All threads have quit

Time taken for threads to run = 20.3567 ms

Run 8:

Clock resolution: 1 ns

Threads created :-)

All threads have quit

Time taken for threads to run = 20.3527 ms

Run 9:

Clock resolution: 1 ns

Threads created :-)

All threads have quit

Time taken for threads to run = 21.7737 ms

Run 10:

Clock resolution: 1 ns

Threads created :-)

All threads have quit

Time taken for threads to run = 20.5587 ms