

kilb2-SampleCode

GitHub repository for reading Kitronyx snapshot files and log files

Code Purpose

Collection of sample code and source code in various programming languages for aggregating data from Snapshot and Log folders' converted CSV files using Kitornyx products

FolderTree

```
DataStatistics
|
|  README.md
|  README.pdf
|
|--res
|   MatLABSampleResult.png
|
|--SampleCode
|   |
|   |  calc_node_rsd.m
|   |  calc_node_SumMaxMinAvg.m
|   |  calc_node_XRAD.m
|   |  main.m
|   |  Read_snapshot_1_dimension_data.m
|   |
|   |--SampleSnapshotData
|   |   20240227T170929_AdcData-1d.csv
|   |   20240227T170929_AdcData-2d.csv
|   |   20240227T170929_ForceData-1d.csv
|   |   20240227T170929_ForceData-2d.csv
|   |   20240227T170929_snapshot-frame.jpg
|   |   20240227T170929_snapshot-real_time_analyzer.jpg
|   |
|   |--src
|   |   calc_node_rsd.m
|   |   calc_node_SumMaxMinAvg.m
|   |   calc_node_XRAD.m
```

MATLAB

Version: R2023b Update 7 (23.2.0.2515942) 64bit January 30, 2024

Code Description

calc_node_SumMaxMinAvg.m

- MATLAB file containing a function to calculate sum, average, maximum, and minimum values for all nodes.
- Returns [node_sum, node_max,node_min,node_avg] when given a 1D matrix data as a parameter.
- node_sum: Sum of all nodes
- node_avg: Average of all nodes
- node_max: Max value of all nodes
- node_min: Min value of all nodes

calc_node_rsd.m

- MATLAB file containing a function to calculate Standard deviation and Relative Standard deviation values for all nodes.
- Returns [node_std, node_rsd] when given a 1D matrix data as a parameter.
- node_std: Standard deviation of all nodes
- node_rsd: %RSD of all nodes

calc_node_XRAD.m

- MATLAB file containing a function to calculate %XRAD values for all nodes.
- Returns [node_XRAD] when given a 1D matrix data as a parameter.
- node_XRAD: %XRAD of all nodes

main.m		이름	값	클래스
명령 창		col	48	double
sum of all nodes: 483883		data	1x2304 do...	double
max value of all nodes: 211		node_avg	210.0187	double
min value of all nodes: 209		node_max	211	double
average of all nodes: 210.0187		node_min	209	double
Standard deviation of all nodes: 0.2502		node_rsd	0.1191	double
%RSD of all nodes: 0.1191		node_std	0.2502	double
%XRAD of all nodes: 0.4673		node_sum	483883	double
f1 >>		node_XRAD	0.4673	double
		row	48	double