Example of SDL for CMS

We have 4 similar devices, 3 (A, B and C) of them with enough measurements and 1 (D) without measurement. An extract of the measurements in two hours are represented in the following tables

Device A

Current	Voltage	Power	Dimming	Timestamp
100	220	100	100	00:05
120	225	120	100	00:15
300	230	300	100	00:40
120	225	120	100	00:45
120	225	120	100	01:15
120	225	120	100	01:35
120	225	120	100	01:50

* Dimming is always limited to 100, in real measurements and calculated measurements through SDL

Device B

Current	Voltage	Power	Dimming	Timestamp
90	220	90	90	00:10
120	225	120	100	00:15
50	210	50	50	00:40
90	220	90	90	00:55
120	225	120	100	01:35
120	225	120	100	01:45
120	225	120	100	01:50

Device C

Current	Voltage	Power	Dimming	Timestamp
70	220	70	70	00:03
120	225	120	100	00:15
120	230	300	100	00:30
120	225	120	100	00:45
275	225	275	100	01:15
120	225	120	100	01:35
120	225	120	100	01:50

The user is asking about the data of the device D.
The T_sampling is 30 min
Extreme samples to delete is set to 1

What are the expected data of device D returned by the SDL Function / API?

The function should return four measurements in this two hours, with timestamps 00:30, 01:00, 01:30 and 02:00

Measurement for 00:30?

Real Data

Device	Current	Voltage	Power	Dimming	Timestamp
A	100	220	100	100	00:05
A	120	225	120	100	00:15
B	90	220	90	90	00:10
B	120	225	120	100	00:15
C	70	220	70	70	00:03
C	120	225	120	100	00:15
C	120	230	300	100	00:30

Delete 1 higher and 1 lower extreme sample of each magnitude

Device	Current	Voltage	Power	Dimming	Timestamp
A	100	220	100	100	00:05
A	120	225	120	100	00:15
B	90	220	90	90	00:10
B	120	225	120	100	00:15
C	70	220	70	70	00:03
C	120	225	120	100	00:15
C	120	230	300	100	00:30

Data to be used and calculated measurement of D at 00:30

Device	Current	Voltage	Power	Dimming	Timestamp
A	100		100		00:05
A		225	120	100	00:15
B	90	220	90	90	00:10
B	120	225	120	100	00:15
C		220			00:03
C	120	225	120	100	00:15
C	120			100	00:30
D	110	223	110	98	00:30

The calculated measurement for 01:00, 01:30 and 02:00 use the same method but the measurements fitting in each time interval (from 00:31 to 01:00, 01:01 to 01:30 and 01:31 to 02:00)