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## Summary of correlations of sensor kits and sensor modules

Sensorkits: BdP 3f18c330 BdP 8d5ba45f

Report generated on: Tue 11 Sep 13:57:11 CEST 2018

### R-square and statistical summary

#### Measurement PM1 correlation key values

Correlation 1 - PM1 - kit BdP\_3f18c330 sensor type PMS7003 with kit BdP\_8d5ba45f sensor type PMS7003:

nr samples 100, min= 0.82, max= 7.24 avg= 2.53, std dev= 1.58 **R-squared:** 0.9192

Best fit polynomial coefficients: [-3.448e-01, 8.435e-01]

### Measurement PM2.5 correlation key values

Correlation 2 - PM2.5 - kit BdP\_3f18c330 sensor type SDS011 with kit BdP\_3f18c330 sensor type PMS7003:

nr samples 100, min= 1.68, max=16.25 avg= 5.14, std dev= 2.59 **R-squared: 1.0000** Best fit polynomial coefficients: [1.066e-15, 1.000e+00]

Correlation 3 - PM2.5 - kit BdP\_3f18c330 sensor type SDS011 with kit BdP\_8d5ba45f sensor type SDS011:

nr samples 100, min= 1.35, max=10.72 avg= 4.22, std dev= 2.33 R-squared: 0.8754

Best fit polynomial coefficients: [-1.127e-01, 8.436e-01]

Correlation 4 - PM2.5 - kit BdP\_3f18c330 sensor type SDS011 with kit BdP\_8d5ba45f sensor type PMS7003:

nr samples 100, min= 1.35, max=10.72 avg= 4.22, std dev= 2.33 **R-squared:** 0.8754

Best fit polynomial coefficients: [-1.127e-01, 8.436e-01]

Correlation 5 - PM2.5 - kit BdP\_3f18c330 sensor type PMS7003 with kit BdP\_8d5ba45f sensor type SDS011:

nr samples 100, min= 1.35, max=10.72 avg= 4.22, std dev= 2.33 **R-squared: 0.8754** 

Best fit polynomial coefficients: [-1.127e-01, 8.436e-01]

Correlation 6 - PM2.5 - kit BdP\_3f18c330 sensor type PMS7003 with kit BdP\_8d5ba45f sensor type PMS7003:

nr samples 100, min= 1.35, max=10.72 avg= 4.22, std dev= 2.33 **R-squared:** 0.8754

Best fit polynomial coefficients: [-1.127e-01, 8.436e-01]

Correlation 7 - PM2.5 - kit BdP\_8d5ba45f sensor type SDS011 with kit BdP\_8d5ba45f sensor type PMS7003:

nr samples 163, min= 1.02, max=12.67 avg= 4.20, std dev= 2.39 **R-squared:** 0.9921

Best fit polynomial coefficients: [3.315e-02, 9.921e-01]

Measurement PM10 correlation key values Correlation 8 - PM10 - kit BdP\_3f18c330 sensor type SDS011 with kit BdP\_3f18c330 sensor type PMS7003: nr samples 100, min= 1.73, max=21.07 avg= 5.73, std dev= 3.07 R-squared: 1.0000 Best fit polynomial coefficients: [-1.421e-15, 1.000e+00] Correlation 9 - PM10 - kit BdP\_3f18c330 sensor type SDS011 with kit BdP\_8d5ba45f sensor type SDS011: nr samples 100, min= 1.67, max=12.93 avg= 5.04, std dev= 2.70 R-squared: 0.8533 Best fit polynomial coefficients: [ 3.768e-01, 8.125e-01] Correlation 10 - PM10 - kit BdP 3f18c330 sensor type SDS011 with kit BdP 8d5ba45f sensor type PMS7003: nr samples 100, min= 1.67, max=12.93 avg= 5.04, std dev= 2.70 R-squared: 0.8533 Best fit polynomial coefficients: [ 3.768e-01, 8.125e-01] Correlation 11 - PM10 - kit BdP\_3f18c330 sensor type PMS7003 with kit BdP\_8d5ba45f sensor type SDS011: nr samples 100, min= 1.67, max=12.93 avg= 5.04, std dev= 2.70 R-squared: 0.8533 Best fit polynomial coefficients: [ 3.768e-01, 8.125e-01] Correlation 12 - PM10 - kit BdP\_3f18c330 sensor type PMS7003 with kit BdP\_8d5ba45f sensor type PMS7003: nr samples 100, min= 1.67, max=12.93 avg= 5.04, std dev= 2.70 R-squared: 0.8533 Best fit polynomial coefficients: [3.768e-01, 8.125e-01] Correlation 13 - PM10 - kit BdP\_8d5ba45f sensor type SDS011 with kit BdP\_8d5ba45f sensor type PMS7003: nr samples 163, min= 1.43, max=17.29

avg= 5.05, std dev= 2.82 R-squared: 0.9927

Best fit polynomial coefficients: [3.708e-02, 9.927e-01]

## Sensor pms7003@BdP\_3f18c330 with sensor pms7003@BdP\_8d5ba45f

## correlation report for pm1 () measurements

Correlation details of project BdP sensor kit ID 3f18c330 with project BdP sensor kit ID 8d5ba45f Date of correlation report: Tue 11 Sep 13:57:09 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

### General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): pms7003 Graphs based on data MYSQL from luchtmetingen on server lunar as user teus: Database table BdP\_3f18c330 sensor (column) pm1: 100 db records, deleted 0 NaN records. Database table BdP\_8d5ba45f sensor (column) pm1: 163 db records, deleted 0 NaN records. Collected 100 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_8d5ba45f, sensor (column) pm1:

number 100, min= 0.82, max= 7.24 avg= 2.53, std dev= 1.58

R-squared (R<sup>2</sup>) with BdP\_8d5ba45f/pm1: 0.9192

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_3f18c330/pm1 (pms7003)-> best fit coefficients:

-3.448e-01, 8.435e-01

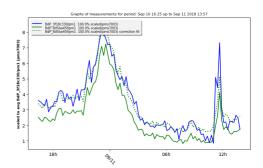
Statistical summary linear regression for BdP\_3f18c330/pm1 with ['BdP\_8d5ba45f/pm1']:

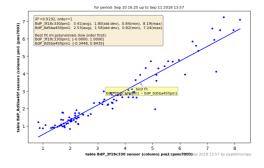
#### **OLS Regression Results**

Dep. Variable:	BdP_3f18c330/pm1	R-squared:	0.919
Model:	OLS	Adj. R-squared:	0.918
Method:	Least Squares	F-statistic:	1115.
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	2.43e-55
Time:	13:57:10	Log-Likelihood:	-74.967
No. Observations:	100	AIC:	153.9
Df Residuals:	98	BIC:	159.1
Df Model:	1		
Covariance Type:	nonrobust		

coef std err t P>|t| [0.025 0.975]
BdP 8d5ba45f/pm1 0.6511 0.097 6.684 0.000 0.458 0.844

Dui \_000504-01191112 0.0011 0.001 0.004 0.000 0.400 0.04





# Sensor sds011@BdP\_3f18c330 with sensor pms7003@BdP\_3f18c330

## correlation report for pm25 () measurements

Correlation details of project BdP sensor kit ID 3f18c330 with project BdP sensor kit ID 3f18c330 Date of correlation report: Tue 11 Sep 13:57:11 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

### General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): sds011, pms7003 Graphs based on data MYSQL from luchtmetingen on server lunar as user teus: Database table BdP\_3f18c330 sensor (column) pm25: 100 db records, deleted 0 NaN records. Database table BdP\_3f18c330 sensor (column) pm25: 100 db records, deleted 0 NaN records. Collected 100 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_3f18c330, sensor (column) pm25:

number 100, min= 1.68, max=16.25

avg= 5.14, std dev= 2.59

R-squared (R<sup>2</sup>) with BdP\_3f18c330/pm25: 1.0000

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_3f18c330/pm25 (pms7003)-> best fit coefficients:

1.066e-15, 1.000e+00

Covariance Type: nonrobust

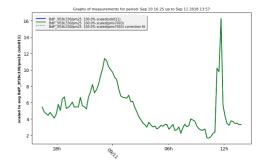
Statistical summary linear regression for BdP\_3f18c330/pm25 with ['BdP\_3f18c330/pm25']:

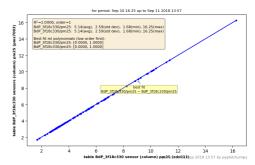
#### **OLS Regression Results**

Dep. Variable:	BdP_3f18c330/pm25	R-squared:	1.000
Model:	OLS	Adj. R-squared:	1.000
Method:	Least Squares	F-statistic:	1.250e+32
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	0.00
Time:	13:57:11	Log-Likelihood:	3229.0
No. Observations:	: 100	AIC:	-6454.
Df Residuals:	98	BIC:	-6449.
Df Model:	1		

coef std err t P>|t| [0.025 0.975]

BdP 3f18c330/pm25 -3.178e-15 5.15e-16 -6.176 0.000 -4.2e-15 -2.16e-15





## Sensor sds011@BdP\_3f18c330 with sensor sds011@BdP\_8d5ba45f

## correlation report for pm25 () measurements

Correlation details of project BdP sensor kit ID 3f18c330 with project BdP sensor kit ID 8d5ba45f Date of correlation report: Tue 11 Sep 13:57:13 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

### General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): sds011
Graphs based on data MYSQL from luchtmetingen on server lunar as user teus:
Database table BdP\_3f18c330 sensor (column) pm25: 100 db records, deleted 0 NaN records.
Database table BdP\_8d5ba45f sensor (column) pm25: 163 db records, deleted 0 NaN records.
Collected 100 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_8d5ba45f, sensor (column) pm25:

number 100, min= 1.35, max=10.72

avg= 4.22, std dev= 2.33

R-squared (R<sup>2</sup>) with BdP\_8d5ba45f/pm25: 0.8754

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP 3f18c330/pm25 (sds011)-> best fit coefficients:

-1.127e-01, 8.436e-01

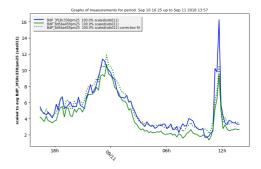
Covariance Type: nonrobust

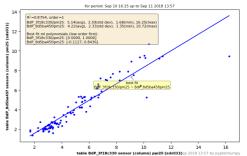
Statistical summary linear regression for BdP\_3f18c330/pm25 with ['BdP\_8d5ba45f/pm25']:

#### **OLS Regression Results**

Dep. Variable:	BdP_3f18c330/pm25	R-squared:	0.875
Model:	OLS	Adj. R-squared:	0.874
Method:	Least Squares	F-statistic:	688.8
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	4.03e-46
Time:	13:57:13	Log-Likelihood:	-132.87
No. Observations:	100	AIC:	269.7
Df Residuals:	98	BIC:	275.0
Df Model:	1		

coef std err t P>|t| [0.025 0.975]
BdP 8d5ba45f/pm25 0.7569 0.191 3.968 0.000 0.378 1.135





# Sensor sds011@BdP\_3f18c330 with sensor pms7003@BdP\_8d5ba45f

## correlation report for pm25 () measurements

Correlation details of project BdP sensor kit ID 3f18c330 with project BdP sensor kit ID 8d5ba45f Date of correlation report: Tue 11 Sep 13:57:15 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

### General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): sds011, pms7003 Graphs based on data MYSQL from luchtmetingen on server lunar as user teus: Database table BdP\_3f18c330 sensor (column) pm25: 100 db records, deleted 0 NaN records. Database table BdP\_8d5ba45f sensor (column) pm25: 163 db records, deleted 0 NaN records. Collected 100 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_8d5ba45f, sensor (column) pm25:

number 100, min= 1.35, max=10.72

avg= 4.22, std dev= 2.33

R-squared (R<sup>2</sup>) with BdP\_8d5ba45f/pm25: 0.8754

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_3f18c330/pm25 (pms7003)-> best fit coefficients:

-1.127e-01, 8.436e-01

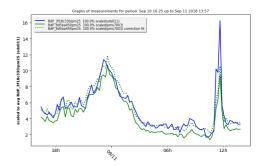
Covariance Type: nonrobust

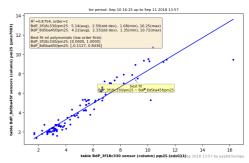
Statistical summary linear regression for BdP\_3f18c330/pm25 with ['BdP\_8d5ba45f/pm25']:

#### **OLS Regression Results**

Dep. Variable:	BdP_3f18c330/pm25	R-squared:	0.875
Model:	OLS	Adj. R-squared:	0.874
Method:	Least Squares	F-statistic:	688.8
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	4.03e-46
Time:	13:57:15	Log-Likelihood:	-132.87
No. Observations:	100	AIC:	269.7
Df Residuals:	98	BIC:	275.0
Df Model:	1		

coef std err t P>|t| [0.025 0.975]
BdP 8d5ba45f/pm25 0.7569 0.191 3.968 0.000 0.378 1.135





## Sensor pms7003@BdP\_3f18c330 with sensor sds011@BdP\_8d5ba45f

## correlation report for pm25 () measurements

Correlation details of project BdP sensor kit ID 3f18c330 with project BdP sensor kit ID 8d5ba45f Date of correlation report: Tue 11 Sep 13:57:16 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

### General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): sds011, pms7003 Graphs based on data MYSQL from luchtmetingen on server lunar as user teus: Database table BdP\_3f18c330 sensor (column) pm25: 100 db records, deleted 0 NaN records. Database table BdP\_8d5ba45f sensor (column) pm25: 163 db records, deleted 0 NaN records. Collected 100 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_8d5ba45f, sensor (column) pm25:

number 100, min= 1.35, max=10.72

avg= 4.22, std dev= 2.33

R-squared (R<sup>2</sup>) with BdP\_8d5ba45f/pm25: 0.8754

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_3f18c330/pm25 (sds011)-> best fit coefficients:

-1.127e-01, 8.436e-01

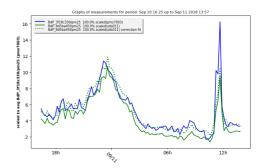
Statistical summary linear regression for BdP\_3f18c330/pm25 with ['BdP\_8d5ba45f/pm25']:

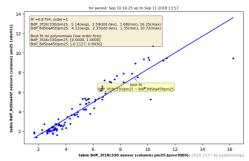
#### **OLS Regression Results**

Dep. Variable:	BdP_3f18c330/pm25	R-squared:	0.875
Model:	OLS	Adj. R-squared:	0.874
Method:	Least Squares	F-statistic:	688.8
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	4.03e-46
Time:	13:57:17	Log-Likelihood:	-132.87
No. Observations:	: 100	AIC:	269.7
Df Residuals:	98	BIC:	275.0
Df Model:	1		

Covariance Type: nonrobust

coef std err t P>|t| [0.025 0.975]
BdP 8d5ba45f/pm25 0.7569 0.191 3.968 0.000 0.378 1.135





## Sensor pms7003@BdP\_3f18c330 with sensor pms7003@BdP\_8d5ba45f

## correlation report for pm25 () measurements

Correlation details of project BdP sensor kit ID 3f18c330 with project BdP sensor kit ID 8d5ba45f Date of correlation report: Tue 11 Sep 13:57:18 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

### General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): pms7003 Graphs based on data MYSQL from luchtmetingen on server lunar as user teus: Database table BdP\_3f18c330 sensor (column) pm25: 100 db records, deleted 0 NaN records. Database table BdP\_8d5ba45f sensor (column) pm25: 163 db records, deleted 0 NaN records. Collected 100 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_8d5ba45f, sensor (column) pm25:

number 100, min= 1.35, max=10.72

avg= 4.22, std dev= 2.33

R-squared (R<sup>2</sup>) with BdP\_8d5ba45f/pm25: 0.8754

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_3f18c330/pm25 (pms7003)-> best fit coefficients:

-1.127e-01, 8.436e-01

Covariance Type: nonrobust

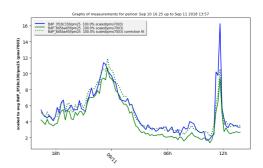
Statistical summary linear regression for BdP\_3f18c330/pm25 with ['BdP\_8d5ba45f/pm25']:

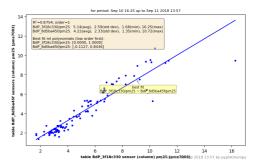
#### **OLS Regression Results**

Dep. Variable:	BdP_3f18c330/pm25	R-squared:	0.875
Model:	OLS	Adj. R-squared:	0.874
Method:	Least Squares	F-statistic:	688.8
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	4.03e-46
Time:	13:57:18	Log-Likelihood:	-132.87
No. Observations:	100	AIC:	269.7
Df Residuals:	98	BIC:	275.0
Df Model:	1		

coef std err t P>ltl [0.025.0.97

BdP\_8d5ba45f/pm25 0.7569 0.191 3.968 0.000 0.378 1.135





## Sensor sds011@BdP\_8d5ba45f with sensor pms7003@BdP\_8d5ba45f

## correlation report for pm25 () measurements

Correlation details of project BdP sensor kit ID 8d5ba45f with project BdP sensor kit ID 8d5ba45f Date of correlation report: Tue 11 Sep 13:57:20 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

### General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): sds011, pms7003 Graphs based on data MYSQL from luchtmetingen on server lunar as user teus: Database table BdP\_8d5ba45f sensor (column) pm25: 163 db records, deleted 0 NaN records. Database table BdP\_8d5ba45f sensor (column) pm25: 163 db records, deleted 0 NaN records. Collected 163 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_8d5ba45f, sensor (column) pm25:

number 163, min= 1.02, max=12.67 avg= 4.20, std dev= 2.39

R-squared (R<sup>2</sup>) with BdP\_8d5ba45f/pm25: 0.9921

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_8d5ba45f/pm25 (pms7003)-> best fit coefficients:

3.315e-02, 9.921e-01

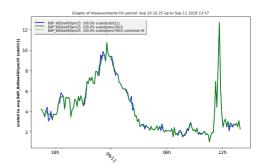
Statistical summary linear regression for BdP\_8d5ba45f/pm25 with ['BdP\_8d5ba45f/pm25']:

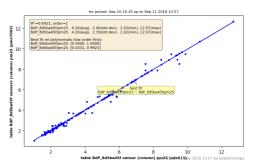
#### **OLS Regression Results**

Dep. Variable:	BdP_8d5ba45f/pm25	R-squared:	0.992
Model:	OLS	Adj. R-squared:	0.992
Method:	Least Squares	F-statistic:	2.025e+04
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	3.22e-171
Time:	13:57:20	Log-Likelihood:	20.576
No. Observations:	163	AIC:	-37.15
Df Residuals:	161	BIC:	-30.96
Df Model:	1		
Covariance Type:	nonrobust		

coef std err t P>|t| [0.025 0.975]
BdP 8d5ba45f/pm25 -3.712e-15 0.034 -1.09e-13 1.000 -0.067 0.067

BdP\_8d5ba45f/pm25 -3.712e-15 0.034 -1.09e-13 1.000 -0.067 0.067





# Sensor sds011@BdP\_3f18c330 with sensor pms7003@BdP\_3f18c330

## correlation report for pm10 () measurements

Correlation details of project BdP sensor kit ID 3f18c330 with project BdP sensor kit ID 3f18c330 Date of correlation report: Tue 11 Sep 13:57:21 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

### General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): sds011, pms7003 Graphs based on data MYSQL from luchtmetingen on server lunar as user teus: Database table BdP\_3f18c330 sensor (column) pm10: 100 db records, deleted 0 NaN records. Database table BdP\_3f18c330 sensor (column) pm10: 100 db records, deleted 0 NaN records. Collected 100 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_3f18c330, sensor (column) pm10:

number 100, min= 1.73, max=21.07 avg= 5.73, std dev= 3.07

R-squared (R<sup>2</sup>) with BdP\_3f18c330/pm10: 1.0000

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_3f18c330/pm10 (pms7003)-> best fit coefficients:

-1.421e-15, 1.000e+00

Statistical summary linear regression for BdP\_3f18c330/pm10 with ['BdP\_3f18c330/pm10']:

#### **OLS Regression Results**

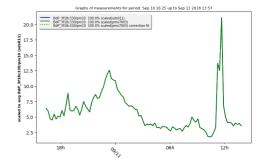
Dep. Variable:	BdP_3f18c330/pm10	R-squared:	1.000
Model:	OLS	Adj. R-squared:	1.000
Method:	Least Squares	F-statistic:	5.882e+32
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	0.00
Time:	13:57:22	Log-Likelihood:	3289.6
No. Observations:	: 100	AIC:	-6575.
Df Residuals:	98	BIC:	-6570.
Df Model:	1		
Covariance Type:	nonrobust		

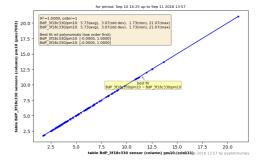
coef std err t P>|t| [0.025 0.975]
BdP 3f18c330/pm10 1.18e-15 2.68e-16 4.400 0.000 6.48e-16 1.71e-15

 Omnibus:
 0.293
 Durbin-Watson:
 0.062

 Prob(Omnibus):
 0.864
 Jarque-Bera (JB):
 0.182

 Skew:
 -0.104
 Prob(JB):
 0.913





## Sensor sds011@BdP\_3f18c330 with sensor sds011@BdP\_8d5ba45f

## correlation report for pm10 () measurements

Correlation details of project BdP sensor kit ID 3f18c330 with project BdP sensor kit ID 8d5ba45f Date of correlation report: Tue 11 Sep 13:57:23 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

### General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): sds011
Graphs based on data MYSQL from luchtmetingen on server lunar as user teus:
Database table BdP\_3f18c330 sensor (column) pm10: 100 db records, deleted 0 NaN records.
Database table BdP\_8d5ba45f sensor (column) pm10: 163 db records, deleted 0 NaN records.
Collected 100 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_8d5ba45f, sensor (column) pm10:

number 100, min= 1.67, max=12.93 avg= 5.04, std dev= 2.70

R-squared (R<sup>2</sup>) with BdP\_8d5ba45f/pm10: 0.8533

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_3f18c330/pm10 (sds011)-> best fit coefficients:

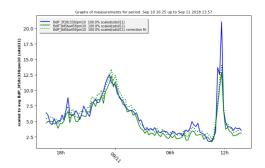
3.768e-01, 8.125e-01

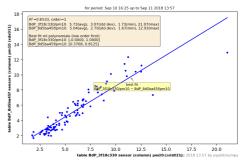
Statistical summary linear regression for BdP\_3f18c330/pm10 with ['BdP\_8d5ba45f/pm10']:

#### **OLS Regression Results**

Dep. Variable:	BdP_3f18c330/pm10	R-squared:	0.853
Model:	OLS	Adj. R-squared:	0.852
Method:	Least Squares	F-statistic:	570.2
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	1.23e-42
Time:	13:57:24	Log-Likelihood:	-157.93
No. Observations:	100	AIC:	319.9
Df Residuals:	98	BIC:	325.1
Df Model:	1		
Covariance Type:	nonrobust		

coef std err t P>|t| [0.025 0.975]
BdP 8d5ba45f/pm10 0.4453 0.251 1.772 0.079 -0.053 0.944





# Sensor sds011@BdP\_3f18c330 with sensor pms7003@BdP\_8d5ba45f

## correlation report for pm10 () measurements

Correlation details of project BdP sensor kit ID 3f18c330 with project BdP sensor kit ID 8d5ba45f Date of correlation report: Tue 11 Sep 13:57:25 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

## General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): sds011, pms7003 Graphs based on data MYSQL from luchtmetingen on server lunar as user teus: Database table BdP\_3f18c330 sensor (column) pm10: 100 db records, deleted 0 NaN records. Database table BdP\_8d5ba45f sensor (column) pm10: 163 db records, deleted 0 NaN records. Collected 100 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_8d5ba45f, sensor (column) pm10:

number 100, min= 1.67, max=12.93 avg= 5.04, std dev= 2.70

R-squared (R<sup>2</sup>) with BdP\_8d5ba45f/pm10: 0.8533

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_3f18c330/pm10 (pms7003)-> best fit coefficients:

3.768e-01, 8.125e-01

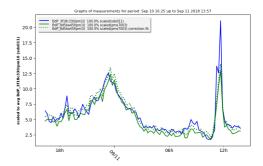
Covariance Type: nonrobust

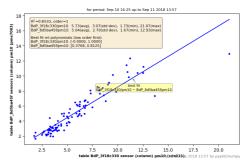
Statistical summary linear regression for BdP\_3f18c330/pm10 with ['BdP\_8d5ba45f/pm10']:

#### **OLS Regression Results**

Dep. Variable:	BdP_3f18c330/pm10	R-squared:	0.853
Model:	OLS	Adj. R-squared:	0.852
Method:	Least Squares	F-statistic:	570.2
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	1.23e-42
Time:	13:57:25	Log-Likelihood:	-157.93
No. Observations:	100	AIC:	319.9
Df Residuals:	98	BIC:	325.1
Df Model:	1		

coef std err t P>|t| [0.025 0.975]
BdP 8d5ba45f/pm10 0.4453 0.251 1.772 0.079 -0.053 0.944





## Sensor pms7003@BdP\_3f18c330 with sensor sds011@BdP 8d5ba45f

## correlation report for pm10 () measurements

Correlation details of project BdP sensor kit ID 3f18c330 with project BdP sensor kit ID 8d5ba45f Date of correlation report: Tue 11 Sep 13:57:27 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

## General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): sds011, pms7003 Graphs based on data MYSQL from luchtmetingen on server lunar as user teus: Database table BdP\_3f18c330 sensor (column) pm10: 100 db records, deleted 0 NaN records. Database table BdP\_8d5ba45f sensor (column) pm10: 163 db records, deleted 0 NaN records. Collected 100 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_8d5ba45f, sensor (column) pm10:

number 100, min= 1.67, max=12.93 avg= 5.04, std dev= 2.70

R-squared (R<sup>2</sup>) with BdP\_8d5ba45f/pm10: 0.8533

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_3f18c330/pm10 (sds011)-> best fit coefficients:

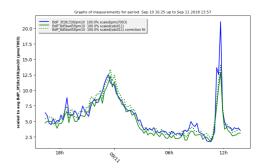
3.768e-01, 8.125e-01

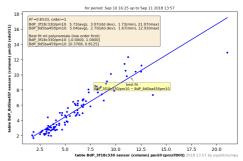
Statistical summary linear regression for BdP\_3f18c330/pm10 with ['BdP\_8d5ba45f/pm10']:

#### **OLS Regression Results**

Dep. Variable:	BdP_3f18c330/pm10	R-squared:	0.853
Model:	OLS	Adj. R-squared:	0.852
Method:	Least Squares	F-statistic:	570.2
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	1.23e-42
Time:	13:57:27	Log-Likelihood:	-157.93
No. Observations:	100	AIC:	319.9
Df Residuals:	98	BIC:	325.1
Df Model:	1		
Covariance Type:	nonrobust		

coef std err t P>|t| [0.025 0.975]
BdP 8d5ba45f/pm10 0.4453 0.251 1.772 0.079 -0.053 0.944





## Sensor pms7003@BdP\_3f18c330 with sensor pms7003@BdP\_8d5ba45f

## correlation report for pm10 () measurements

Correlation details of project BdP sensor kit ID 3f18c330 with project BdP sensor kit ID 8d5ba45f Date of correlation report: Tue 11 Sep 13:57:28 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

### General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): pms7003 Graphs based on data MYSQL from luchtmetingen on server lunar as user teus: Database table BdP\_3f18c330 sensor (column) pm10: 100 db records, deleted 0 NaN records. Database table BdP\_8d5ba45f sensor (column) pm10: 163 db records, deleted 0 NaN records. Collected 100 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_8d5ba45f, sensor (column) pm10:

number 100, min= 1.67, max=12.93 avg= 5.04, std dev= 2.70

R-squared (R<sup>2</sup>) with BdP\_8d5ba45f/pm10: 0.8533

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_3f18c330/pm10 (pms7003)-> best fit coefficients:

3.768e-01, 8.125e-01

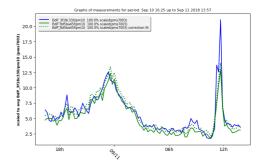
Covariance Type: nonrobust

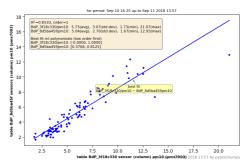
Statistical summary linear regression for BdP\_3f18c330/pm10 with ['BdP\_8d5ba45f/pm10']:

#### **OLS Regression Results**

Dep. Variable:	BdP_3f18c330/pm10	R-squared:	0.853
Model:	OLS	Adj. R-squared:	0.852
Method:	Least Squares	F-statistic:	570.2
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	1.23e-42
Time:	13:57:29	Log-Likelihood:	-157.93
No. Observations:	100	AIC:	319.9
Df Residuals:	98	BIC:	325.1
Df Model:	1		

coef std err t P>|t| [0.025 0.975]
BdP 8d5ba45f/pm10 0.4453 0.251 1.772 0.079 -0.053 0.944





## Sensor sds011@BdP\_8d5ba45f with sensor pms7003@BdP\_8d5ba45f

## correlation report for pm10 () measurements

Correlation details of project BdP sensor kit ID 8d5ba45f with project BdP sensor kit ID 8d5ba45f Date of correlation report: Tue 11 Sep 13:57:30 CEST 2018 From date 2018-09-10 16:25:18 upto 2018-09-11 13:57 Origin of measurement time serie data from InFluxDB host: lunar Report generated by MyRegression.py (GPL V4) (user teus)

### General statistical information for the measurements graphs

Regression best fit calculation details for sensor type(s): sds011, pms7003 Graphs based on data MYSQL from luchtmetingen on server lunar as user teus: Database table BdP\_8d5ba45f sensor (column) pm10: 163 db records, deleted 0 NaN records. Database table BdP\_8d5ba45f sensor (column) pm10: 163 db records, deleted 0 NaN records. Collected 163 values in sample time frame (15m/0s) for the graph.

Samples period: Sep 10 16:25 up to Sep 11 2018 13:57, interval timing 15m:0s.

Data from table/sheet BdP\_8d5ba45f, sensor (column) pm10:

number 163, min= 1.43, max=17.29 avg= 5.05, std dev= 2.82

R-squared (R<sup>2</sup>) with BdP\_8d5ba45f/pm10: 0.9927

Best fit linear single polynomial regression curve  $(A_0*X^0 + A_1*X^1)$ :

BdP\_8d5ba45f/pm10 (pms7003)-> best fit coefficients:

3.708e-02, 9.927e-01

Statistical summary linear regression for BdP\_8d5ba45f/pm10 with ['BdP\_8d5ba45f/pm10']:

#### **OLS Regression Results**

Dep. Variable:	BdP_8d5ba45f/pm10	R-squared:	0.993
Model:	OLS	Adj. R-squared:	0.993
Method:	Least Squares	F-statistic:	2.176e+04
Date:	Tue, 11 Sep 2018	Prob (F-statistic):	1.02e-173
Time:	13:57:31	Log-Likelihood:	-0.51016
No. Observations:	: 163	AIC:	5.020
Df Residuals:	161	BIC:	11.21
Df Model:	1		
Covariance Type:	nonrobust		

coef std err t P>|t| [0.025 0.975]
BdP 8d5ba45f/pm10 -2.595e-15 0.039 -6.62e-14 1.000 -0.077 0.077

Omnibus: 31.775 Durbin-Watson: 3.198

 Prob(Omnibus): 0.000
 Jarque-Bera (JB): 302.744

 Skew:
 0.000
 Prob(JB):
 1.82e-66

 Kurtosis:
 9.677
 Cond. No.
 12.1

