Report Example

Insert Author Name here

01/09/2019

1 Introduction

This is a sample introduction. Lorem ipsum dolor sit amet, consectetuer adipiscing elit. Ut purus elit, vestibulum ut, placerat ac, adipiscing vitae, felis. Curabitur dictum gravida mauris. Nam arcu libero, nonummy eget, consectetuer id, vulputate a, magna. Donec vehicula augue eu neque. Pellentesque habitant morbi tristique senectus et netus et malesuada fames ac turpis egestas. Mauris ut leo. Cras viverra metus rhoncus sem. Nulla et lectus vestibulum urna fringilla ultrices. Phasellus eu tellus sit amet tortor gravida placerat. Integer sapien est, iaculis in, pretium quis, viverra ac, nunc. Praesent eget sem vel leo ultrices bibendum. Aenean faucibus. Morbi dolor nulla, malesuada eu, pulvinar at, mollis ac, nulla. Curabitur auctor semper nulla. Donec varius orci eget risus. Duis nibh mi, congue eu, accumsan eleifend, sagittis quis, diam. Duis eget orci sit amet orci dignissim rutrum.

Nam dui ligula, fringilla a, euismod sodales, sollicitudin vel, wisi. Morbi auctor lorem non justo. Nam lacus libero, pretium at, lobortis vitae, ultricies et, tellus. Donec aliquet, tortor sed accumsan bibendum, erat ligula aliquet magna, vitae ornare odio metus a mi. Morbi ac orci et nisl hendrerit mollis. Suspendisse ut massa. Cras nec ante. Pellentesque a nulla. Cum sociis natoque penatibus et magnis dis parturient montes, nascetur ridiculus mus. Aliquam tincidunt urna. Nulla ullamcorper vestibulum turpis. Pellentesque cursus luctus mauris.

2 Data

This is what some of the data looks like.It is a dataset on diabetes. The data originated from a LARS Paper.
There are 442 instances with 10 baseline variables. The response of interest is a quantitative measure of disease progression one year after baseline.
Each of these 10 feature variables have been mean centered and scaled by the standard deviation times n_samples (i.e. the sum of squares of each column totals 1).

$$\frac{x - \mu}{\sigma}$$

	age	sex	bmi	bp	s1	s2	s3	s4	s5	s6
count	442.00	442.00	442.00	442.00	442.00	442.00	442.00	442.00	442.00	442.00
mean	-0.00	0.00	-0.00	0.00	-0.00	0.00	-0.00	0.00	-0.00	-0.00
std	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05
min	-0.11	-0.04	-0.09	-0.11	-0.13	-0.12	-0.10	-0.08	-0.13	-0.14
25%	-0.04	-0.04	-0.03	-0.04	-0.03	-0.03	-0.04	-0.04	-0.03	-0.03
50%	0.01	-0.04	-0.01	-0.01	-0.00	-0.00	-0.01	-0.00	-0.00	-0.00
75%	0.04	0.05	0.03	0.04	0.03	0.03	0.03	0.03	0.03	0.03
max	0.11	0.05	0.17	0.13	0.15	0.20	0.18	0.19	0.13	0.14

Descriptive table of diabetes data.

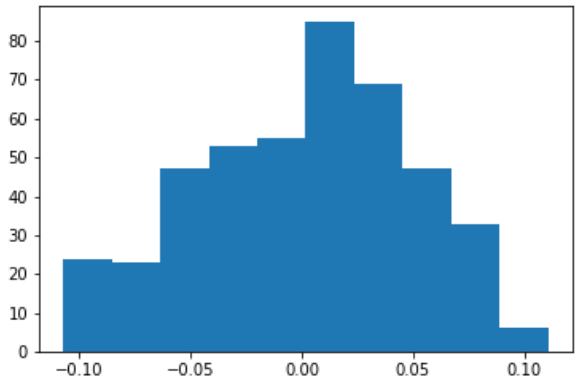

Figure 1: This image was saved directly to the current folder.

Nulla malesuada porttitor diam. Donec felis erat, congue non, volutpat at, tincidunt tristique, libero. Vivamus viverra fermentum felis. Donec nonummy pellentesque ante. Phasellus adipiscing semper elit. Proin fermentum massa ac quam. Sed diam turpis, molestie vitae, placerat a, molestie nec, leo. Maecenas lacinia. Nam ipsum ligula, eleifend at, accumsan nec, suscipit a, ipsum. Morbi blandit ligula feugiat magna. Nunc eleifend consequat lorem. Sed lacinia nulla vitae enim. Pellentesque tincidunt purus vel magna. Integer non enim. Praesent euismod nunc eu purus. Donec bibendum quam in tellus. Nullam cursus pulvinar lectus. Donec et mi. Nam vulputate metus eu enim. Vestibulum pellentesque felis eu massa.

Quisque ullamcorper placerat ipsum. Cras nibh. Morbi vel justo vitae lacus tincidunt ultrices. Lorem ipsum dolor sit amet, consectetuer adipiscing elit. In hac habitasse platea dictumst. Integer tempus convallis augue. Etiam facilisis. Nunc elementum fermentum wisi. Aenean placerat. Ut imperdiet, enim sed

gravida sollicitudin, felis odio placerat quam, ac pulvinar elit purus eget enim. Nunc vitae tortor. Proin tempus nibh sit amet nisl. Vivamus quis tortor vitae risus porta vehicula.

2.1 By the Way

If you would like to merge multiple dataframes together, you can just pass them in as a list of tables to be added. The output will be something like:

	s1	s3	s5
count	442.00	442.00	442.00
mean	-0.00	-0.00	-0.00
std	0.05	0.05	0.05
min	-0.13	-0.10	-0.13
25%	-0.03	-0.04	-0.03
50%	-0.00	-0.01	-0.00
75%	0.03	0.03	0.03
max	0.15	0.18	0.13

Merged dataframes example.

2.2 Linear Regression

We can perform a simple linear regression with one of the variables against the response factor. Here we use sklearn's LinearRegression model.
The variable we are using is the age.

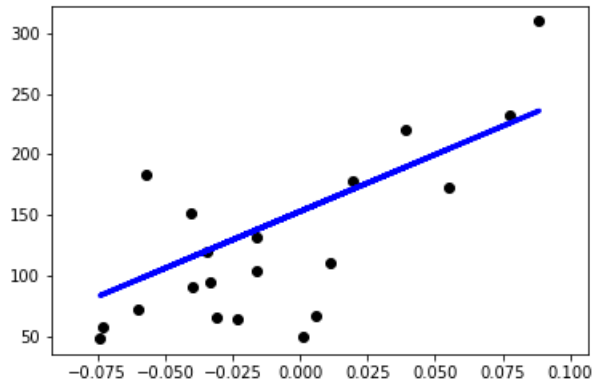

Figure 2: This is a plot of the linear reg output. This plot was saved to a random directory and copied to the 'figures' folder of this report.

	Results	Values
0	Coefficient(s)	938
1	Mean Squared Error	2548
2	Variance Score	0

Results of the Logisitic Regression

Fusce mauris. Vestibulum luctus nibh at lectus. Sed bibendum, nulla a faucibus semper, leo velit ultricies tellus, ac venenatis arcu wisi vel nisl. Vestibulum diam. Aliquam pellentesque, augue quis sagittis posuere, turpis lacus congue quam, in hendrerit risus eros eget felis. Maecenas eget erat in sapien mattis porttitor. Vestibulum porttitor. Nulla facilisi. Sed a turpis eu lacus commodo facilisis. Morbi fringilla, wisi in dignissim interdum, justo lectus sagittis dui, et vehicula libero dui cursus dui. Mauris tempor ligula sed lacus. Duis cursus enim ut augue. Cras ac magna. Cras nulla. Nulla egestas. Curabitur a leo. Quisque egestas wisi eget nunc. Nam feugiat lacus vel est. Curabitur consectetuer.

3 Conclusion

That's all, folks!
Lorem ipsum dolor sit amet, consectetuer adipiscing elit. Ut purus elit, vestibulum ut, placerat ac, adipiscing vitae, felis. Curabitur dictum gravida mauris. Nam arcu libero, nonummy eget, consectetuer id, vulputate a, magna. Donec vehicula augue eu neque. Pellentesque habitant morbi tristique senectus et netus et malesuada fames ac turpis egestas. Mauris ut leo. Cras viverra metus rhoncus sem. Nulla et lectus vestibulum urna fringilla ultrices. Phasellus eu tellus sit amet tortor gravida placerat. Integer sapien est, iaculis in, pretium quis, viverra ac, nunc. Praesent eget sem vel leo ultrices bibendum. Aenean faucibus. Morbi dolor nulla, malesuada eu, pulvinar at, mollis ac, nulla. Curabitur auctor semper nulla. Donec varius orci eget risus. Duis nibh mi, congue eu, accumsan eleifend, sagittis quis, diam. Duis eget orci sit amet orci dignissim rutrum.

4 Appendix - Mapping Tables

4.1 Age Filter.csv

Lower	Upper	Category
1	11	1-11
12	17	12-17
18	34	18-34
35	49	35-49
50	10000	50+

4.2 Race Filter.csv

Original	Category
AA	['Asian', 'asian', 'Indian', 'Korean', 'Chinese', 'Asian american', 'Vietnamese', 'asian indian', 'american indian', 'east indian', 'indian', 'middle eastern american', 'american indican', 'asian']
MR	['Multiracial:Other Combination', 'MultiRacial', 'Biracial', 'Multiracial:Black-African American White', 'Other Multi-Race', 'Multi-Race', 'Multiracial:Asian/Black-African American', 'Multiracial:Asian/White', 'Multi Raci', 'More Than One Race', 'Asian and White', 'biracial', 'multiracial:Other Combination', 'Multiracial', 'Mixed', 'Biracial-White/Native American', 'MultiRacia', 'White/Black', 'multiracial', 'biracial', 'multiracial:asian/black-african american', 'multiracial', 'multiracial:asian/white', 'multiracial:other combination', 'mixed', 'multi raci', 'multiracial:black-african american white', 'multi-race']
NHPI	['PACIFIC ISLANDER', 'NativeHawaiianPacificIslander', 'Hawaiian / Pacific Islander', 'Native Hawaiian/Other Pacific Islander', 'Native Hawaiian or Other Pacific Islander', 'Hawaiian or other Pacific Islander', 'Hawaiian/P', 'Hawaiian/Pacific Islander', 'Native Hawaiian/Pacific Is', 'Pacific Islander', 'hawaiian / Pacific Islander', 'Native Hawaiian or Other Pacific Is', 'pacific islander', 'nativehawaiianpacificislander', 'native hawaiian/other pacific islander', 'hawaiian/p', 'hawaiian / pacific islander', 'native hawaiian/pacific is']

Not Continued on Next Page