

VJEŽBA 4 KORELACIJA I REGRESIJA

Zmjerena je visina u centimetrima i vitalni kapacitet pluća (VC) u litrama 33 studentice prve godine. Dobiveni su sljedeći rezultati:

Rbr.	Visina	VC	Rbr.	Visina	VC	Rbr.	Visina	VC
1.	180.6	4.74	12.	155.0	2.20	23.	174.2	4.27
2.	168.0	3.63	13.	171.0	3.38	24.	167.0	3.45
3.	163.0	3.40	14.	171.5	3.82	25.	162.0	2.88
4.	171.0	3.75	15.	167.6	3.26	26.	172.0	4.13
5.	177.0	4.23	16.	160.2	2.63	27.	161.0	2.90
6.	169.4	3.20	17.	166.6	3.06	28.	155.0	2.65
7.	161.0	2.90	18.	167.0	3.52	29.	162.0	3.12
8.	170.0	3.88	19.	163.0	2.82	30.	174.0	4.02
9.	158.0	2.40	20.	172.0	3.41	31.	161.0	2.80
10.	161.0	2.60	21.	158.0	2.81	32.	166.0	3.46
11.	163.0	2.72	22.	165.0	3.07	33.	166.0	3.26

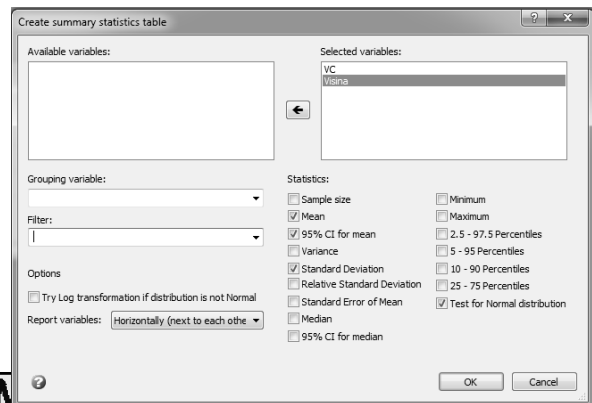
Ocijenite postoji li povezanost visine i vitalnog kapaciteta pluća

Opisna statistika i testiranje normalnosti - MedCalc

Statistics->
Create tables->
Summary statistics table....

Selected variables: VC, visina
Report variables: Horizontally
Statistics: Mean
95% CI for mean
Standard Deviation
Test for Normal distribution

Opisna statistika i testiranje normalnosti - MedCalc



Opisna statistika i testiranje normalnosti - MedCalc

	Vitalni kapacitet	Visina
Mean	3.284	166.033
95% CI	3.074 to 3.494	163.846 to 168.221
SD	0.5919	6.1688
Normal Distr.	0.4989	0.7955

D'Agostino-Pearson test

Shapiro-Wilk P:
Vitalni kapacitet-> 0,6924
Visina-> 0,8601

Crtanje korelacionog dijagrama (raspršni/"scatter" grafikon)

Statistics->
Correlation->
Scatter diagram....

Variable Y: VC
Variable X: Visina

Izračun koeficijenta korelacije

Statistics->

Correlation->

Correlation coefficient....

Variable Y: VC

Variable X: Visina

LINEARNA REGRESIJA

Statistics->

Regression->

Regression....

Variable Y: VC

Variable X: Visina

Regression equation:

Include constant in equation

$$Y = a + b X$$