(5)

X	15	17	25	27	17	12	11	22
Y	17	13	5	7	7	21	19	6

A The dependent variable is the number of crimes & the independent is number of police. The random variable is amount of cities

X	Y	XY	x^2	y^2
15	17	255	225	289
17	13	221	289	169
25	5	125	625	25
27	7	189	729	49
17	7	119	289	49
12	21	252	144	441
11	19	209	121	361
22	6	132	484	36

Σx	Σy	Σxy	Σx^2	Σy^2
146	95	1502	2906	1419

$$8(1502) - (146)(95)$$

$$\sqrt{[8(2906) - (146)^2][8(1419) - (95)^2]}$$

$$12016 = 13870$$

$$[23248 - 21316][11352 - 9025]$$

$$\frac{-1854}{\sqrt{[1932][2327]}} \quad \frac{-1854}{4495764} \quad 2120.32 = \boxed{C = .874}$$

$$\frac{180}{193.64} = .929$$