Principal Investigator: Danny A. Riley Experiment ID: 178303

File Name: 283.FM

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*** STUDENT'S T - TEST ***					
V2.60 Dec 91 - by Stanley Kaplan, Ph.D.					
SLS-1 DFPT RFA	A VS RFA F	LANTARIS M	AST CELLS	S PER SQUARE CI	ENTIMETER
Calculated F-:	Calculated F-ratio = 13.5189 with 4 , 2 degrees of freedom.				
The variances are equal since 13.5189 is less than 19.2500					19.2500
		*** R	AW D	АТА ***	
		GROUP 1		GROUP 2	
1 ====> 2 ====> 3 ====> 4 ====> 5 ====>		296,9000 260,8000 286,7000		472.4000 347.4000 410.7000 522.7000 480.4000	
N's	===>	3		5	
Total	===>	844.4000		2233.6000	
Means	===>	281.4667		446.7200	
Sum of squares	s ===>	692.6867		18728.6680	
Variances	===>	346.3433		4682.1670	
Std deviations	; ====>	18,6103		68.4264	
Calculated val	ue of T =	3.971	73 with	6 degrees of	freedom.
The exact P-va	lue is:	0.0073	3 or	99.27%	

The samples DO differ significantly at the 5% level, ONE-TAILED. The samples DO differ significantly at the 1% level, ONE-TAILED.

The samples DO differ significantly at the 5% level, TWO-TAILED. The samples DO differ significantly at the 1% level, TWO-TAILED.

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Principal Investigator: Danny A. Riley Experiment ID: 178303

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File Name: 283.FM

*** STUDENT'S T - TEST ***				
V2.60 Dec 91 - by Stanley Kaplan, Ph.D.				
SLS-1 DFPT RFR VS RFR PLANTARIS MAST CELLS PER SQUARE CENTIMETER				
Calculated F-	ratio =	2.5281	with 4 , 4 degrees of f	reedom.
The variances	are equ	ual since	2.5281 is less than	6.3900
		*** R A	W DATA***	
		GROUP 1	GROUP 2	
1 ====>		325,9000		
2 ====>		396.8000	360.0000 449.5000	
3 ====>		327.8000	564.5000	
4 ====>		476.8000	365.8000	
5 ====>		382.1000	553,6000	
			555,0000	
N's	>	5	5	
Total	===>	1909.4000	2293.4000	
Means	===>	381.8800	458.6800	
Sum of squares	===>	15290.8680	38656.3880	
Variances	===>	3822.7170	9664.0970	
Std deviations ===> 61.8281 98.3061				
Calculated val	ue of 1	S = 1.4787	with 8 degrees of fi	reedom,

The exact P-value is: 0.1775 or 82.25%

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The samples do NOT differ significantly at the 5% level, ONE-TAILED. The samples do NOT differ significantly at the 1% level, ONE-TAILED.

The samples do NOT differ significantly at the 5% level, TWO-TAILED. The samples do NOT differ significantly at the 1% level, TWO-TAILED.

 $\mathbf{280}$

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Principal Investigator: Danny A. Riley Experiment ID: 178303

File Name: 283.FM

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*** STUDENT'S T - TEST ***				
V2.60 Dec 91 - by Stanley Kaplan, Ph.D.				
SLS-1 DFPT RFA VS RFA PLANTARIS MAST CELL CONCENTRATIONS				
Calculated F-ratio = 1.9569 with 2 , 4 degrees of freedom.				
The variances	are equal	since 1.9	569 is less than	6.9400
		*** R A W	D A T A ***	
		GROUP 1	GROUP 2	
1 ====> 2 ====> 3 ====> 4 ====> 5 ====>		37.7000 31.3000 43.0000	46.3000 40.3000 49.7000 50.7000 49.0000	
N's	===>	3	5	
Total	===>	112.0000	236.0000	
Means	===>	37.3333	47.2000	
Sum of squares	~~~>	68.6467	70.1600	
Variances	===>	34.3233	17.5400	
Std deviations	===>	5.8586	4.1881	
Calculated value of $T = 2.8089$ with 6 degrees of freedom.				
The exact P-value is: 0.0308 or 96.92%				

The samples DO differ significantly at the 5% level, ONE-TAILED. The samples do NOT differ significantly at the 1% level, ONE-TAILED.

The samples DO differ significantly at the 5% level, TWO-TAILED. The samples do NOT differ significantly at the 1% level, TWO-TAILED.

281

Principal Investigator: Danny A. Riley Experiment ID: 178303

File Name: 283.FM

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*** STUDENT'S T - TEST ***
             V2.60 Dec 91 - by Stanley Kaplan, Ph.D.
SLS-1 DFPT RFR VS RFR PLANTARIS MAST CELL CONCENTRATIONS
Calculated F-ratio =
                          37.0701 with 4 , 4 degrees of freedom.
                                     37.0701 is greater than
The variances are UNequal since
                                                                    6.3900
                                         D A T A ***
                            *** R A W
                          GROUP 1
                                                 GROUP 2
                          44.0000
                                                 40.0000
   1 ====>
   2 ====>
                          50,0000
                                                 46.3000
   3 ====>
                          41.3000
                                                 70.0000
                          45.3000
                                                 41.7000
   4
    ====>
   5
                          47.0000
                                                 84.7000
     ====>
                                                      5
  N's
                              5
               ===>
Total
                         227.6000
                                                 282.7000
               ===>
Means
                          45.5200
                                                  56.5400
               ===>
Sum of squares ===>
                          42.4280
                                                1572.8120
Variances
                          10,6070
                                                 393.2030
               ===>
Std deviations ===>
                           3.2568
                                                  19.8293
Calculated value of T =
                              1.2262 with
                                             4 degrees of freedom.
```

The exact P-value is: 0.2874 or 71.26%

The samples do NOT differ significantly at the 5% level, ONE-TAILED. The samples do NOT differ significantly at the 1% level, ONE-TAILED.

The samples do NOT differ significantly at the 5% level, TWO-TAILED. The samples do NOT differ significantly at the 1% level, TWO-TAILED.

Principal Investigator: Danny A. Riley Experiment ID: 178303

File Name: 283.FM

*** STUDENT'S T - TEST *** V2.60 Dec 91 - by Stanley Kaplan, Ph.D. SLS-1 DFPT RFA VS RFA PLANTARIS ABNORMAL FIBERS PER SQUARE CENTIM Calculated F-ratio = 4.3910 with 4 , 2 degrees of freedom. The variances are equal since 4.3910 is less than 19.2500 *** R A W DATA *** GROUP 1 GROUP 2 ----1 ====> 94.5000 94.9000 2 ====> 133.3000 71.6000 3 ====> 100.0000 82.6000 4 ====> 178.4000 5 ====> 78.4000 N's 3 ===> 5 Total 327.8000 ===> 505.9000 Means ===> 109.2667 101.1800 Sum of squares ===> 881.5267 7741.4880 Variances ===> 440.7633 1935.3720 Std deviations ===> 20.9944 43.9929 Calculated value of T = -0.2921 with 6 degrees of freedom. The exact P-value is: 0.7801 \mathbf{or} 21.99%

The samples do NOT differ significantly at the 5% level, ONE-TAILED. The samples do NOT differ significantly at the 1% level, ONE-TAILED.

The samples do NOT differ significantly at the 5% level, TWO-TAILED. The samples do NOT differ significantly at the 1% level, TWO-TAILED.

 $283 \pm$

Principal Investigator: Danny A. Riley Experiment ID: 178303

File Name: 283.FM

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*** STUDENT'S T - TEST ***
             V2.60 Dec 91 - by Stanley Kaplan, Ph.D.
SLS-1 DFPT RFR VS RFR PLANTARIS ABNORMAL FIBERS PER SQUARE CENTIM
Calculated F-ratio =
                          8.1250 with 4 , 4 degrees of freedom.
The variances are UNequal since
                                      8.1250 is greater than
                                                                  6.3900
                           *** R A W
                                         D A T A ***
                         GROUP 1
                                                GROUP 2
   1 ====>
                         64.4000
                                                63.1000
   2 ====>
                        113.5000
                                                35.9000
   3 ==
                        335.7000
        ==>
                                                96.8000
                         60.0000
   4 ====>
                                               111.4000
   5 ====>
                         89.4000
                                               139.2000
 N'S
               ===>
                             5
                                                     5
Total
                        663.0000
               ===>
                                                446.4000
Means
               ===>
                        132.6000
                                                 89.2800
Sum of squares ⇒==>
                      53402.6600
                                               6572.6680
Variances
               ===>
                      13350.6650
                                               1643.1670
Std deviations ===>
                        115.5451
                                                 40.5360
Calculated value of T = -
                            0.7911 with
                                            5 degrees of freedom.
```

```
The exact P-value is: 0.4648 or 53.52%
```

The samples do NOT differ significantly at the 5% level, ONE-TAILED. The samples do NOT differ significantly at the 1% level, ONE-TAILED.

The samples do NOT differ significantly at the 5% level, TWO-TAILED. The samples do NOT differ significantly at the 1% level, TWO-TAILED.

284

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File Name: 283.FM

Principal Investigator: Danny A. Riley Experiment ID: 178303

*** STUDENT'S T - TEST *** V2.60 Dec 91 - by Stanley Kaplan, Ph.D. SLS-1 DFPT RFA VS RFA PLANTARIS ABNORMAL FIBER COUNTS Calculated F-ratio = 3.4032 with 4 , 2 degrees of freedom. The variances are equal since 3.4032 is less than 19.2500 *** R A W D A T A *** GROUP 1 GROUP 2 12,0000 9.3000 1 ====> 2 ====> 16.0000 8.3000 15.0000 3 ====> 10.0000 4 ====> 17.3000 5 ===> 8.0000 N's www> 3 5 43.0000 52.9000 Total ===> 14.3333 10.5800 Means ===> Sum of squares ===> 8.6667 58.9880 Variances 4.3333 14.7470 ===> Std deviations ===> 2.0817 3.8402 Calculated value of T = 6 degrees of freedom. 1.5305 with

The exact P-value is: 0.1768 or 82.32%

The samples do NOT differ significantly at the 5% level, ONE-TAILED. The samples do NOT differ significantly at the 1% level, ONE-TAILED.

The samples do NOT differ significantly at the 5% level, TWO-TAILED. The samples do NOT differ significantly at the 1% level, TWO-TAILED.

285

Principal Investigator: Danny A. Riley Experiment ID: 178303

File Name: 283.FM

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*** STUDENT'S T - TEST ***					
V2.60 Dec 91 - by Stanley Kaplan, Ph.D.					
SLS-1 DFPT RFR	SLS-1 DFPT RFR VS RFR PLANTARIS ABNORMAL FIBER COUNTS				
Calculated F-r	atio =	4.9144 with	h 4 , 4 degrees of :	freedom.	
The variances	are equ	al since 4.	9144 is less than	6.3900	
		*** R A W	D A T A ***		
		GROUP 1	GROUP 2		
1		8.7000	7.0000		
1 ====> 2 ====>		14.3000	3,7000		
3 ====>		42.3000	12.0000		
4 ====>					
4 ====> 5.7000 12.7000 5 ==> 11.0000 21.3000					
N's ===> 5 5					
Total		82,0000	56,7000		
TOLAT	/	02.0000	58.7000		
Means	===>	16.4000	11.3400		
Sum of squares	>	878.1600	178.6920		
Variances	===>	219.5400	44.6730		
Std deviations ===> 14.8169 6.6838					
Calculated value of $T = 0.6961$ with 8 degrees of freedom.					

The exact P-value is: 0.5061 or 49.39%

The samples do NOT differ significantly at the 5% level, ONE-TAILED. The samples do NOT differ significantly at the 1% level, ONE-TAILED.

The samples do NOT differ significantly at the 5% level, TWO-TAILED. The samples do NOT differ significantly at the 1% level, TWO-TAILED.

 $\mathbf{286}$

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STUDENT'S T-TEST

V2.60 Dec 91 - by Stanley Kaplan, Ph.D.

DFPT RFA VS RFA PL	<u>muscle area</u>	
		Body wgt
Calculated F-ratio=	4.6996 with 2 , 4 degrees of freedom.	

The variances are equal since 4.6996 is less than 6.9400

RAW DATA*

1====> 2===> 3====> 4====> 5====>		GROUP 1 8.6000 6.3000 7.6000	<u>GROUP 2</u> 6.7000 6.7000 5.4000 6.2000 6.3000
N's	===>	3	5
Total	===>	22.5000	31.3000
Mean	===>	7.5000	6.2600
Sum of squares	===>	2.6600	1.1320
Variances	===>	1.3300	0.2830
Std deviations	===>	1.1533	0.5320
Calculated value of	T=	2.1358 wit	th 6 degrees of freedom.

The exact P-value is: 0.0766 or 92.34%

The samples DO differ significantly at the 5% level, ONE-TAILED.

The samples do NOT differ significantly at the 1% level, ONE-TAILED.

The samples do NOT differ significantly at the 5% level, TWO-TAILED. The samples do NOT differ significantly at the 1% level, TWO-TAILED.