Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Due:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Activity 11-3**

1. \_\_\_\_\_
2. Null (H0) = \_\_\_\_\_, Research (H1) = \_\_\_\_\_
3. Freshmen *M* = \_\_\_\_\_\_\_\_\_\_\_\_\_\_, *SD* = \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Sophomores *M* = \_\_\_\_\_\_\_\_\_\_\_\_\_\_, *SD* = \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Juniors *M* = \_\_\_\_\_\_\_\_\_\_\_\_\_\_, *SD* = \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Seniors *M* = \_\_\_\_\_\_\_\_\_\_\_\_\_\_, *SD* = \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| Source | *SS* | *df* | *MS* | *F* | *p (sig)* |  |
| Between treatments | \_\_\_\_\_ | \_\_\_\_\_ | \_\_\_\_\_ | \_\_\_\_\_ | \_\_\_\_\_ | \_\_\_\_\_ |
| Within treatments (Error) | \_\_\_\_\_ | \_\_\_\_\_ | \_\_\_\_\_ |  |  |  |
| Total | \_\_\_\_\_ | \_\_\_\_\_ |  |  |  |  |

1. \_\_\_\_\_

|  |  |
| --- | --- |
| Freshmen and sophomores | Yes/No |
| Freshmen and juniors | Yes/No |
| Freshmen and seniors | Yes/No |
| Sophomores and juniors | Yes/No |
| Sophomores and seniors | Yes/No |
| Juniors and seniors | Yes/No |

1. \_\_\_\_\_
2. \_\_\_\_\_
3. \_\_\_\_\_

|  |  |  |  |
| --- | --- | --- | --- |
|  | Mean difference | Pooled variance | *d* |
| Sophomores vs. Seniors |  |  |  |
| Juniors vs. Seniors |  |  |  |

1. \_\_\_\_\_
2. Table 1. Means and Standard Deviations for Each Class

|  |  |
| --- | --- |
| Group | Mean(SD) |
| Freshmen | \_\_\_\_\_ (\_\_\_\_\_) |
| Sophomores | \_\_\_\_\_ (\_\_\_\_\_) |
| Juniors | \_\_\_\_\_ (\_\_\_\_\_) |
| Seniors | \_\_\_\_\_ (\_\_\_\_\_) |

1. Table 2. Tukey HSD Post Hoc Results with Effect Sizes

|  |  |  |  |
| --- | --- | --- | --- |
| Comparison | Mean difference | *p* | *d* |
| Freshmen vs Sophomores | \_\_\_\_\_\_ | \_\_\_\_\_\_ | \_\_\_\_\_\_ |
| Freshmen vs Juniors | \_\_\_\_\_\_ | \_\_\_\_\_\_ | \_\_\_\_\_\_ |
| Freshmen vs Seniors | \_\_\_\_\_\_ | \_\_\_\_\_\_ | \_\_\_\_\_\_ |
| Sophomores vs Juniors | \_\_\_\_\_\_ | \_\_\_\_\_\_ | \_\_\_\_\_\_ |
| Sophomores vs. Seniors | \_\_\_\_\_\_ | \_\_\_\_\_\_ | \_\_\_\_\_\_ |
| Juniors vs Seniors | \_\_\_\_\_\_ | \_\_\_\_\_\_ | \_\_\_\_\_\_ |

1. \_\_\_\_\_
2. \_\_\_\_\_
3. \_\_\_\_\_
4. \_\_\_\_\_
5. Null (H0) = \_\_\_\_\_, Research (H1) = \_\_\_\_\_
6. F = \_\_\_\_\_; *ηp*2 = \_\_\_\_\_\_
7. \_\_\_\_\_
8. \_\_\_\_\_
9. \_\_\_\_\_
10. \_\_\_\_\_
11. \_\_\_\_\_
12. \_\_\_\_\_
13. Null (H0) = \_\_\_\_\_,

Research (H1) = \_\_\_\_\_

1. *F* = \_\_\_\_\_\_\_\_\_\_;

Freshman Mean = \_\_\_\_\_\_\_\_\_;

SD = \_\_\_\_\_\_\_\_\_

1. \_\_\_\_\_
2. \_\_\_\_\_
3. \_\_\_\_\_

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Source | *SS* | *df* | *MS* | *F* |  |
| Between treatments | \_\_\_\_\_ | \_\_\_\_\_ | \_\_\_\_\_ | \_\_\_\_\_ | \_\_\_\_\_ |
| Within treatments (Error) | \_\_\_\_\_ | \_\_\_\_\_ | \_\_\_\_\_ |  |  |
| Total | \_\_\_\_\_ | \_\_\_\_\_ |  |  |  |

1. \_\_\_\_\_
2. \_\_\_\_\_
3. \_\_\_\_\_
4. \_\_\_\_\_
5. \_\_\_\_\_