A researcher examines student satisfaction (1 to 5 scale with higher numbers being more satisfied) with the previous recreational facilities and the new facilities with a fancy pool. Here are their responses (below). Are students more satisfied with the new facilities using the p<.01 significance level? List the 6 hypothesis testing steps.

|  |  |
| --- | --- |
| Old Recreational Facilities | New Recreational Facilities |
| 2 | 4 |
| 1 | 2 |
| 5 | 5 |
| 3 | 5 |
| 3 | 4 |
| 2 | 3 |
| 5 | 4 |

|  |
| --- |
| Assumptions: |
| Step 1/2: |
| Step 3: |
| Step 4: |
| Step 5: |
| Step 6: |
| Confidence Interval: |
| Effect size: |

The city council is trying to determine if they should change disposal fees for waste services. They are comparing the number of trash bags before and after the last change to see if people reduced waste. A significant reduction in waste would relief their trash truck drivers and save money. Should they increase the fee at the p<.05 level?

Before After

|  |  |
| --- | --- |
| 5 | 8 |
| 6 | 4 |
| 3 | 1 |
| 4 | 1 |
| 7 | 5 |
| 4 | 5 |
| 5 | 4 |
| 7 | 3 |

|  |
| --- |
| Assumptions: |
| Step 1/2: |
| Step 3: |
| Step 4: |
| Step 5: |
| Step 6: |
| Confidence Interval: |
| Effect size: |