

# Assessment: Course Four Column



## Courses (CTE) - Industrial Millwright Tech

### IT 220:Alignment Principles

| <i>Course Outcomes</i>  | <i>Assessment Measures</i>   | <i>Results</i>  | <i>Actions</i>   |
|---|--|---|--|
| <p><b>Use Dial indicators and lasers in establishing proper alignments</b> - Use Dial indicators and lasers in establishing proper alignments.<br/> <b>Course Outcome Status:</b> Active<br/> <b>Next Assessment:</b> 2023-2024</p>               | <p><b>Assignment - Lab</b> - Written test and Performance Evaluation on Level 4 module 3 Conventional Alignment and Level 5 module 2 Laser Alignment from NCCER Millwright curriculum.<br/> <b>Criterion:</b> 70% or higher on written tests and 100 % on performance evaluation, for NCCER Certification.</p> | <p><b>Reporting Period:</b> 2018-2019<br/> <b>Criterion Met:</b> Yes<br/>           9 of 11 students passed written test with 70% or higher on the first try for Conventional Alignment, 6 of 11 on Laser Module All students passed performance evaluation on first try on Conventional Alignment module, 10 of 11 on Laser module.</p> <p>Results Analysis:<br/>           This year I tried getting all written tests done and having the entire last week as just lab assignments to do. Students seemed to like this and results were ok would like to see the laser written test scores a little higher. (09/03/2019)</p> | <p><b>Action:</b> Continue with this method but spend a little more time lecturing in class for laser written test improved scores hopefully. (09/03/2019)</p> |
| <p><b>Maintenance manuals to find and establish proper alignment clearances</b> - Use maintenance manuals to find and establish proper alignment clearances.<br/> <b>Course Outcome Status:</b> Active<br/> <b>Next Assessment:</b> 2023-2024</p> | <p><b>Exam</b> - Written test and Performance Evaluation on Level 3 Module 7 Couplings.<br/> <b>Criterion:</b> 70% or higher on written tests and 100 % on performance evaluation, for NCCER Certification.</p>  | <p><b>Reporting Period:</b> 2018-2019<br/> <b>Criterion Met:</b> Yes<br/>           8 of 11 students passed written test on the first try. 10 of 11 students passed Performance Evaluation on first try.</p> <p>Results Analysis:<br/>           Really drilled in the importance of setting equipment to the proper tolerance and then did activity in the shop to show vibration when equipment is not set to proper clearance. (09/03/2019)</p>  | <p><b>Action:</b> Students seemed to enjoy and learn with practical application in shop. Plan to continue doing this in the future. (09/03/2019)</p>           |
| <p><b>Diagnose and correct misalignments in shafts</b> - Diagnose and correct misalignments in shafts.</p>  | <p><b>Assignment - Written</b> - Written test and Performance Evaluation on Level 4 module 3 Conventional</p>  | <p><b>Reporting Period:</b> 2018-2019<br/> <b>Criterion Met:</b> Yes<br/>           9 of 11 students passed written test with 70% or higher on</p>  | <p><b>Action:</b> Continue schedule of class same way as this year and continue to add more equipment</p>  |

| <i>Course Outcomes</i>  | <i>Assessment Measures</i>  | <i>Results</i>  | <i>Actions</i>   |
|---|---|---|--|
| <p><b>Course Outcome Status:</b> Active<br/> <b>Next Assessment:</b> 2023-2024</p>  | <p>Alignment and Level 5 module 2 Laser Alignment from NCCER Millwright curriculum.<br/> <b>Criterion:</b> 70% or higher on written tests and 100 % on performance evaluation, for NCCER Certification.</p>     | <p>the first try for Conventional Alignment, 6 of 11 on Laser Module All students passed performance evaluation on first try on Conventional Alignment module, 10 of 11 on Laser module.<br/> Results Analysis:<br/> The increased lab time at end of class helped accomplish this outcome better than in the past. (09/03/2019)</p>                        | <p>options to align. The pumps we have are good but need some more larger equipment (gearboxes, compressors, blowers). (09/03/2019)</p>  |
| <p><b>Safely operate the tools used in shaft alignment - Safely operate the tools used in shaft alignment.</b><br/> <b>Course Outcome Status:</b> Active<br/> <b>Next Assessment:</b> 2023-2024</p>                             | <p><b>Assignment - Project -</b> Students are required to fill out FLRA forms in the lab when working on projects.<br/> <b>Criterion:</b> Each student fills out FLRA daily.</p>                                | <p><b>Reporting Period:</b> 2018-2019<br/> <b>Criterion Met:</b> Yes<br/> Each student completed this task but some did not take the time to get the full benefit out of this activity.<br/> Results Analysis:<br/> Each student completed this task but some did not take the time to get the full benefit out of this activity. (09/03/2019)</p>          | <p><b>Action:</b> I need to make sure all students are using the FLRA to the most of its capabilities. I need to make sure no all safety rules are followed with no exceptions. (09/03/2019)</p>   |
| <p><b>Techniques to effectively reduce facility operating costs - Use these techniques to effectively reduce facility operating costs.</b><br/> <b>Course Outcome Status:</b> Active<br/> <b>Next Assessment:</b> 2023-2024</p> | <p><b>Exam -</b> Written test and Performance Evaluation on Level 3 Module 7 Couplings.<br/> <b>Criterion:</b> 70% or higher on written tests and 100 % on performance evaluation, for NCCER Certification.</p> | <p><b>Reporting Period:</b> 2018-2019<br/> <b>Criterion Met:</b> Yes<br/> 8 of 11 students passed written test on the first try. 10 of 11 students passed Performance Evaluation on first try.<br/> Results Analysis: This outcome is to show students what shaft alignment does for the industry they are working for once they graduate. (09/03/2019)</p> | <p><b>Action:</b> Continue to show students the benefit of shaft alignment for industry to lower equipment maintenance costs. This in turn allow the student/ employee to share in more profit sharing because of saving the companies realize by doing these techniques. (09/03/2019)</p> |