



Student Learning Outcomes Plan

Critical Thinking - Fall 2016

Page 1: Welcome

Q1

First, please tell us a little about yourself:

Your name:

Barry Young

The name of your program

CNC Machinist

Q2

No, we are not externally accredited.

Is your program externally accredited?

Page 2: Plan to improve student outcomes - part 1 (R/U)

Q3

Please list here the associated course number of your chosen SLO as they appear in the MCO or SLO Matrix. This first one should be emphasized early in a student's program and center on students' ability to Remember/Understand (R/U) concepts/attitudes/skills. Students demonstrate critical thinking at this level by: Recognizing the need for both quantitative and qualitative information while formulating questions; identifying available technologies/analytical methods; discerning that accurate and complete information is the basis for effective decision making.

Course #

CNCM 119

SLO

Safely turn simple round parts in the engine lathe and CNC turning center used manually

Q4

How will you determine the extent to which student achievement has increased on this first SLO? (For example, "___% percent of my students need to score a minimum ___% on the lab practical)

100% of my students need to score 70% or greater on the spool project

Q5

What will you do differently this year to bring about the improvement you intend?

Integrate short task based video lessons to the curriculum

Q6

How will these results affect your teaching/program?

All students can use the video lessons for review. Students who are late or absent can view the videos in place of the lecture they missed.

Page 3: Plan to improve student outcomes - part 2 (A/A)

Q7

Please list here the associated course number of your chosen SLO as they appear in the MCO or SLO Matrix. This second one should be emphasized mid-way through a student's program and center on students' ability to Analyze/Apply (A/A) concepts/attitudes/skills. Students demonstrate critical thinking at this level by: Demonstrating skill gathering information from and within a certain field; analyzing, interpreting and synthesizing information, strategies, resources, evidence, and/or assumptions.

Course #

CNCM 119

SLO

Create and follow a manufacturing plan to ensure parts can be correctly processed from start to finish of a job

Q8

How will you determine the extent to which student achievement has increased on this second SLO? (For example, "___% percent of my students need to score a minimum ___% on the lab practical)

The manufacturing plan submitted by the student is graded according to a scale for originality, specificity to the task at hand, complexity and completeness. Again 100% of students need to score 70% or higher.

Q9

What will you do differently this year to bring about the improvement you intend?

We will produce a document that augments the lecture on Manufacturing Plan creation.

Q10

How will these results affect your teaching/program?

The written instructions will help bolster cognition.

Page 4: Plan to improve student outcomes - part 3 (C/E)

Q11

Please list here the associated course number of your chosen SLO as they appear in the MCO or SLO Matrix. This third one should be emphasized late in a student's program and center on students' ability to Create/Evaluate (C/E) concepts/attitudes/skills. Students demonstrate critical thinking at this level by: Evaluating and testing solutions on the basis of origin, viewpoint, currency, relevance, completeness, validity and appropriateness; using creativity to generate diverse possible solutions and articulating reasoned solutions to others.

Course #

CNCM 119

SLO #

Choose correct tools and tool holders for each operation

Q12

How will you determine the extent to which student achievement has increased on this third SLO? (For example, "___% percent of my students need to score a minimum ___% on the lab practical)

This learning is assessed via a ten question multiple choice examination

Q13

What will you do differently this year to bring about the improvement you intend?

Deliver the examination and written information via Canvas

Q14

How will these results affect your teaching/program?

It will make test administration faster allowing more time for interaction with the student
