



STARK STATE COLLEGE

GENERAL SYLLABUS

Course Information

Course Name: Manufacturing Processes
Course Number: MET225

Required Materials

Textbook(s): Materials and Processes in Manufacturing 13th Ed. DeGarmo, Black & Kohser; John Wiley & Sons, Inc.
ISBN 9781119492931 Adobe PDF, ISBN 9781119492825 ePub, ISBN 9781119492962 pbk

Required Readings: None

Additional Materials: None

Course Outline/Calendar

The date of coverage and order of coverage may be modified based on the faculty member and events beyond the control of faculty members that interfere with class times and teaching.

16-Week Course Calendar

Week	Chapter/Topic/Lab	
1	Chapter 11.1: Metal Casting Processes (sand casting)	
2	Chapter 11.2: Metal Casting Processes (expendable Mold)	
3	Chapter 11.3: Metal Casting Processes (Permenant Mold)	
4	Chapter 12: Glassworking	
5	Chapter 13.1: Shaping Processes for Plastics (Thermoplastic)	
6	Chapter 15: Powder Metallurgy	
7-8	Chapter 18.1: Bulk Deformation Processes in Metal Working	
9	Chapter 19.1: Sheet Metalworking & Aluminum	
10	Chapter 22: Cutting Tool Technology	
11	Chapter 24: Grinding and Abrasive Processes	
12	Chapter 26: Heat Treatment	
13	Chapter 27: Surface Processing Operations	
14	Tour	
15	Tour	
16	Test 3	

5-Week Course Calendar

Week	Chapter/Topic/Lab	
1	Chapter 1 – Intro to Materials and Manufacturing, Chapter 13-Fundamentals of Casting, Exam 1	
2	Chapter 14-Exp. Mold Casting Processes, Ch. 15-Multiple Use Mold Casting, Exam 2	
3	Chapter 18 – Bulk Forming Process, Ch. 19-Sheet Forming Processes, Exam 3	
4	Chapter 23 – Turning and Boring Processes, Ch. 25-Drilling and Related Hole Making Processes, Exam 4	
5	Chapter 24-Milling, Ch 20 – Fab. Of Plastics-Ceramics, and Composites, Ch.35-Fundamentals of Joining, Final Exam	