

Q.06	a	With a neat sketch, explain the working principle of indexing mechanism.	10	L2	CO3
	b	You are designing a bolt hole pattern for a flange. Describe how you would apply control of feature location by true position.	10	L3	CO3
Module-4					
Q.07	a	With an example, explain the design guidelines for insertion and fastening.	10	L2	CO3
	b	Refer the Fig.2 and elucidate the effect of part thickness on handling time.	10	L3	CO3
<p style="text-align: center;">Fig.2</p>					
OR					
Q.08	a	Write a note on the development of the systematic DFA methodology.	10	L2	CO3
	b	Estimate the manual insertion time t_i for both conical chamfer and curved chamfer shown in Fig.3 where the width of 45° chamfers is 0.1d.	10	L3	CO3
<p style="text-align: center;">Fig.3</p>					
Module-5					
Q.09	a	Explain the design for environment guidelines according to the life cycle stages of a product.	10	L2	CO4
	b	How do you employ weighted sum assessment method to know the life cycle impact of a product? Discuss.	10	L3	CO4
OR					
Q.10	a	Explain the techniques used to reduce environmental impact.	10	L2	CO4
	b	Imagine you are selecting materials for a new consumer product. Apply the principles of design for recyclability to select suitable materials and justify your choices.	10	L3	CO4