

Seat No.: _____

Enrolment No. _____

GUJARAT TECHNOLOGICAL UNIVERSITY**BE - SEMESTER-VII (NEW) EXAMINATION – WINTER 2018****Subject Code: 2173508****Date: 19/11/2018****Subject Name: Safety Health & Environment****Time: 10:30 AM TO 01:00 PM****Total Marks: 70****Instructions:**

1. Attempt all questions.
2. Make suitable assumptions wherever necessary.
3. Figures to the right indicate full marks

			MARKS
Q.1*	(a)	Define: Hazard, risk and safe	03
	(b)	What is ergonomics?	04
	(c)	Explain importance of health and safety in detail?	07
Q.2	(a)	Why the welfare of people at work is important?	03
	(b)	Define Accident, Dangerous occurrences and auto ignition	04
	(c)	Explain occupational health in detail?	07
OR			
Q.3	(c)	Explain occupational hazard in detail?	07
	(a)	What are the appropriate measures to control the hazard associated with work related ill health for RSI?	03
	(b)	How to control risks of DSE?	04
Q.3	(c)	Explain legionaries disease in detail?	07
	OR		
	(a)	Explain types of PPE?	03
Q.4	(b)	In detail explain Ear protection PPE ?	04
	(c)	Explain respiratory equipment in detail?	07
	(a)	What are the factors which effect PPE?	03
Q.4	(b)	In detail explain hand and arm protection PPE ?	04
	(c)	Explain fire detection and alarm system in detail?	07
OR			
Q.4	(a)	What are the dangers associated with fire?	03
	(b)	Explain fire triangle in detail?	04
	(c)	Define: Detonation, Fire point, Flash fire, Ignition, Fuel, Control center and Material factor	07
Q.5	(a)	Enlist theories of accident occurrences and explain any one theory?	03
	(b)	Explain job safety analysis in detail?	04
	(c)	Explain fault tree analysis in detail?	07
OR			
Q.5	(a)	In detail explain failure mode and effects analysis ?	03
	(b)	Explain HAZOP in detail?	04
	(c)	Explain event tree analysis in detail?	07