## **C.U.SHAH UNIVERSITY** Winter Examination - 2018

	Subject 1	Name :	Plant Biotechnology		
	Subject	Code :	4LS03BOT1/4SC03PBT1	Branch : B.Sc. (Microbiol	ogy)
	Semester	r:3	Date : 29/11/2018	Time : 02:30 To 05:30	Marks: 70
	(2) I (3) I	Use of l instruct Draw ne	Programmable calculator & any ions written on main answer bo eat diagrams and figures (if nece suitable data if needed.	ok are strictly to be obeyed.	rohibited.
Q-1		Atten	npt the following questions:		(14)
	a)	Defin	e : Plant Biotechnology.		(1)
	<b>b</b> )	PTC s	stands for?		(1)
	c)	What	is callus?		(1)
	d)		is Transgenic Plant?		(1)
	<b>e</b> )		s useful in crop improvement.	True/False	(1)
	<b>f</b> )		e : Protoplast.		(1)
	<b>g</b> )		any two names of methods used	• • •	
	<b>h</b> )		n is an plant Hormone. True/Fal	se	(1)
	i)		e : growth regulator.	aio plant	(1)
	j) k)		any two applications of transger use of Ti Plasmid.	ne plant.	(1) (1)
	к) l)		is Microinjection?		(1) $(1)$
	m)		example of plant hormones.		(1) $(1)$
	n)		oporation is method used for tra	ansgenic plant development. Tr	
Atte			estions from Q-2 to Q-8		(1)
Q-2		Atten	npt all questions		(14)
-	a)		in brief about PTC.		(7)
	b)	Write	short note on Micropropagation	1.	(7)
Q-3		Atten	npt all questions		(14)
Υ <sup>-</sup> 3	a)		are Nutrient media? Explain co	omposition in detail.	(14)
	b)		short note on Gene Conservation	1	(7)
Q-4		Atten	npt all questions		(14)
	a)		is protoplast culture? Explain in	n detail.	(7)
	b)	What	is somaclonal variation? Write	about its applications.	(7)



Q-5		Attempt all questions	(14)
-	a)	Write on Applications of PTC.	(14)
Q-6		Attempt all questions	(14)
8	a)	Write a short note on laboratory organization of PTC Laboratory.	(14)
Q-7		Attempt all questions	
-	a)	Write details of Agro bacterium Mediated Gene transfer vector.	(6)
ł	b)	Explain importance of sterilization in PTC Laboratory.	(7)
Q-8		Attempt all questions	(14)
-	a)	Write a short note on Meristem Culture.	(7)
ł	b)	What is Electroporation? Explain in detail.	(7)

