S.R.R. & C.V.R. Government Degree College (A)

An Autonomous & ISO 9001: 2015 Certified Institution:: Ranked by NIRF in 101-150 band at NIRF-2020 & 151-200 band in NIRF 2019 NAAC accredited Institution with grade B+ with C.G.P.A 2.6 during March, 2017

Machavaram, Vijayawada, Krishna District, AP-520 004

DIGITAL CLASSES 13.12.2019

DEPARTMENT OF BOTANY

SRR & CVR Government Degree College

An Autonomous & ISO 9001: 2015 Certified Institution:: Ranked by NIRF in 101-150 band at NIRF-2020 & 151-200 band in NIRF 2019 NAAC accredited Institution with grade B+ with C.G.P.A 2.6 during March, 2017

Machavaram, Vijayawada, Krishna District, AP-520 004

DEPARTMENT OF BOTANY

Dates	**13.12.2019**
Conducted through (DRC/JKC/ELF/NCC/NSS/ Departments etc.	**Department**
Nature of activity (seminar/Workshop/Extn. Lecture etc.	**Digital class**
Title of the Activity	**Gene Cloning vectors**
Name of the Department/Committee	**Department**
Details of Resource Persons (Name , Designation etc.,)	**Mrs D. Jyothi Incharge Dept of Botany Ms V. Naga Lakshmi**
No of students participated	**60**
Name of the Lecturers who planned & conducted the activity	**Mrs D. Jyothi Incharge Dept of Botany Ms V. Naga Lakshmi**
Remarks	**This Digital class was very beneficial to the students of I, II and III B.Sc BZC T.M and E.M students.**

DIGITAL CLASSES.

Digital classes were taken for students of I, II & III BZC students.

Digital class Date : Dec 13/2019
Topic : Gene cloning vectors
Lecturer : V. Nagalakshmi.

Students attended.

1. P. Madhavi
2. P. Likitha
3. B. Kalyan Rao
4. M. Jayasree
5. T. Anusha
6. Madhusudhan
7. Kalyan Rao
8. Sai Ram
9. T. Vasantha
10. Sai Ram
11. P. Madhavi
12. J. Sai Krishna
13. B. Kalyan Rao.
14. Swaja.
15. Naga Raji
16. Jyothi.

Concept:

Vectors can be a plasmid from the bacterium, a cell from the higher organism or DNA from a virus. The target DNA is inserted into the specific sites of the vector and ligated by DNA ligase. The vector is then transformed into the host cell for replication.

The cloning vectors should possess an origin of replication so that it can self-replicate inside the host cell. It should have a restriction site for the insertion of the target DNA.

It should have a selectable marker with an antibiotic resistance gene that facilitates screening of the recombinant organism. It should be small in size so that it can easily integrate into the host cell. It should be capable of inserting a large segment of DNA. It should possess multiple cloning site . It should be capable of working under the prokaryotic and eukaryotic systems.

Types of Cloning Vectors are plasmids, Bacteriophages, Phagemids, Bacterial Artificial chromosomes, Yeast Artificial Chromosomes, Cosmids, Retroviral Vectors,Human Artificial Chromosomes

Cloning vectors are utilized to insert foreign DNA into another cell and create multiple copies of the same. The foreign DNA is duplicated and expressed utilizing the host cell machinery. It amplifies one copy of DNA into multiple copies.

The Advantages of Digital Education are that students can learn personally . Digital learning is Easier to access and can learn at their own pace. Digital classes are a kind of Blended, Competency-based and Collaborative learning. Digital classes can give students a positive new learning experience. Students learnt the concept of gene cloning vectors through Digital class .

SRR & CVR Government Degree College

DEPARTMENT OF BOTANY

STUDENT SIGNATURES AND FEEDBACK

S.No	Date	Class	Roll no/ Reg no	Signature	Remarks
1.	13-7-19	III B-2C	19311001	Abhilakshi	Good.
2.	13/7/19	III B.Z.C	19311004	B Lakshmana Rao	Useful.
3.	13/7/19	III B.Z.C	19311002	K. Mangadevi	Good.
4.	13/7/19	III B.Z.C	19311003	B. Nagamani	useful
5.	13/7/19	III B.Z.C	19311017	K. VENU	GOT AWARED.
6.	13/7/19	III-B.2C	16317U047	Sruthi	Good
7.	13/7/19	III B.Z.C	19311009	K. chandrika	satisfactory.
8.	13-7-19	III B.Z.C	19311002	[illegible]	Good.
9.	13/7/19	III B.Z.C	16317U043	[illegible]	Good
10.	13-7-19	III B.Z.C	19311009	K. Chandrika	Good
11.	13-7-19	III B.Z.C	16317U046	Mallika	Useful.
12.	13/7/19	III B.Z.C	19311019	Meenakumari	Good.
13.	13/7/19	III B.Z.C	16317U044	[illegible]	satisfactory.
14.	13/7/19	III B.Z.C	19311013	B. Saibabu	Good.
15.	13/7/19	III B.Z.C	16317U045	Nagaraju	Good
16.	13-7-19	III B.Z.C	19311003	[illegible]	useful.

SRR & CVR Government Degree College

DEPARTMENT OF BOTANY

STUDENT SIGNATURES AND FEEDBACK

S.No	Date	Class	Roll no/ Reg no	Signature	Remarks
	13-7-19	III B.Z.C	19311021	Gopi	Good.
	13-7-19	III B.Z.C	19311017	K. venu	Useful
	13/7/19	III B.Z.C	19311018	Anil Kumar	Satisfactory
	13/7/19	III B.Z.C	16317404Z	Ramesh	Good.
	13/7/19	III B.Z.C	19311015	P. Annapurna Devi	Good
	13/7/19	III B.Z.C	16317403Z	[illegible]	Good.
	13/7/19	III B.Z.C	16317404[illegible]	[illegible]	useful.
	13-7-19	III B.Z.C	19311019	[illegible]	useful.
	13/7/19	III B.Z.C	16317404[illegible]	Sudeep	Good.
	13/7/19	III B.Z.C	19311014	Balaji	Better
	13/7/19	III B.Z.C	16317403[illegible]	[illegible]	Good.
	13/7/19	III B.Z.C	19311013	B. Saibabu	Good.
	13/7/19	III B.Z.C	16317403[illegible]	[illegible]	Good.
	13/7/19	III B.Z.C	19311011	B. Sabyapriya	Good
	13/7/19	III B.Z.C	19311012	P. Venkatesh	Useful.
	13-7-19	III B.Z.C	19311[illegible]020	Vakeel	Good.