



ANNUAL REPORT

DEPARTMENT OF MICROBIOLOGY

✉ markazmicrobiology@gmail.com

2020-2021



MARKAZ ARTS AND SCIENCE COLLEGE, ATHAVANAD

(Affiliated to the university of calicut)

✉ markazcollege@gmail.com

DEPARTMENT OF MICROBIOLOGY

EMAIL ID: markazmicrobiology@gmail.com

TOTAL NUMBER OF TEACHERS: 4

STARTING OF THE ACADEMIC YEAR: 01 JUNE 2020

STUDENTS STRENGTH

SI NO.	SEMESTER	NUMBER OF BOYS	NUMBER OF GIRLS	OTHERS	TOTAL
1	THIRD YEAR MICROBIOLOGY	1	23	-	24
2	SECOND MB	2	36	-	38
3	FIRST MB	4	33	-	37
4	TOTAL	7	92	-	99

EXTERNAL EXAMINATION RESULT

BATCH	NUMBER OF STUDENTS APPAERED	NUMBER OF STUDENTS PASSED	PERCENTAGE
THIRD SEM 2018-2020	24	24	100

NUMBER OF SEMINARS CONDUCTED: 4

NUMBER OF ALUMNI MEET: 4

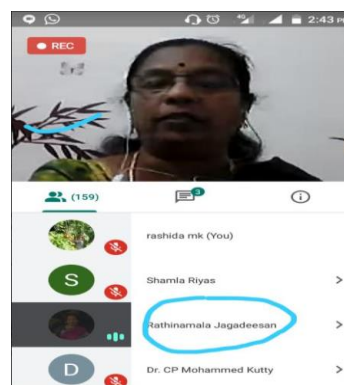
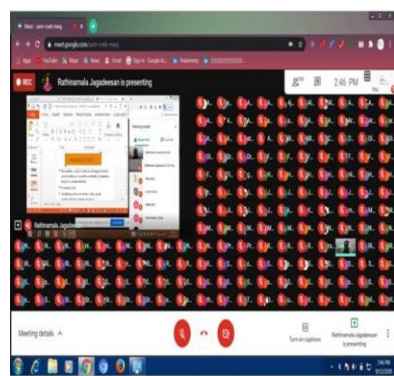
NUMBER OF PTA MEETING: 2 (Online) & 3 (Offline)

1. DREAM TO CENTRAL UNIVERSITIES

Department of Microbiology, Markaz Arts and Science College, Athavanad conducted an online (Google meet) orientation programme on Central University entrance examination guidance in collaboration with “Neinvins- Microbiology service club” and 2016-19 Alumni batch on 23/8/2020 Sunday at 2:30 PM. Ms Fairoosa .T and Mr. Vinayak (Post graduate students, Central University of Tamilnadu) were the dignitaries of the Day. The programme started with the inaugural session. Mrs Shamla.A.K, Assistant Professor of the department presided the inaugural ceremony. Mrs Jumaila.K.P, Head of the Department delivered the welcome speech. Dr.C.P Muhammed Kutty, Principal of the college inaugurated the session. First session was led by Ms Fairoosa.T was on Central University entrance examination guidance. She spoke of various measures to reach central universities. She also share her memories of Central University studies and also familiarize the students about different central universities in India and their possibilities to higher studies. The second session was by Mr. Vinayak on how to climb the steps of central universities .The session very informative to the students. He enlightened the students about different central universities. It was followed by a discussion session with students. Feedback of the programme was delivered by Shahina Mol.K, final year student. The online programme was wind up with the Vote of Thanks delivered by Mr.Muhammed Jaseel, Assistant Professor of the Department.

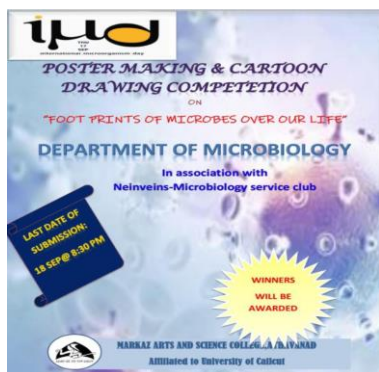
2. CURRENT RESEARCH & PERSPECTIVES FOR BIO REMEDIATION

On 12/09/2020 at 2.30pm Department of Microbiology in association with IQAC organized a national level webinar on **Current Research and Perspectives For Bioremediation** through Google Platform. More than 160 participants from various part of the world were attended the webinar. The programme started with the welcome note by Department HOD Jumaila KP and inauguration by Principal of Markaz arts and science college-Athavanad. Resource person was Dr.J Rathinamala (HOD-Microbiology;Nehru Arts and science College-Coimbatore. She spoke about various aspects of Bioremediation, ongoing research work and current trends in Bioremediation. The session was incredibly awesome and effective especially for the students and research scholars. Finally the programme end up with the vote of thanks by assistant professor Mohammed Jaseel A. The event was hosted by Shamla A K assistant professor Microbiology. Moreover provided E-certificates to all the participants those who filled feedback form.



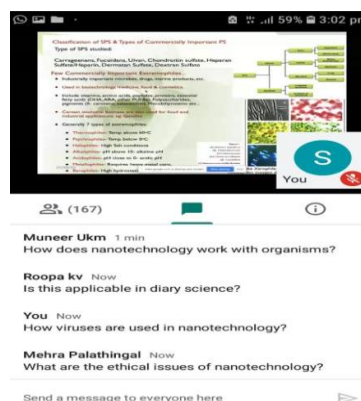
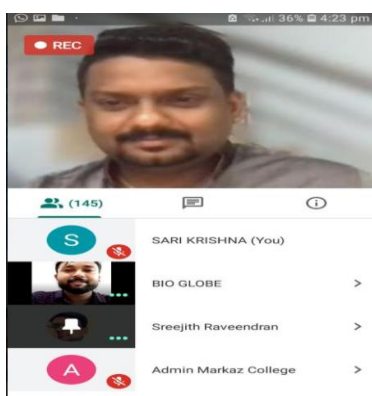
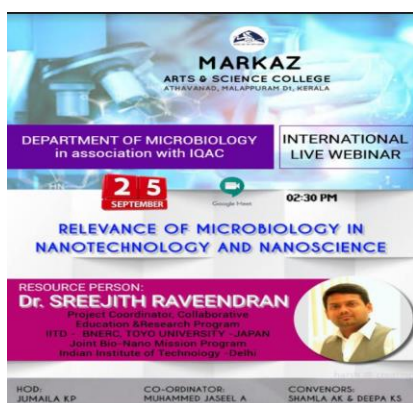
3. FOOT PRINT OF MICROBES OVER OUR LIFE

Department of Microbiology conducted a poster making and Cartoon drawing competition on International Microorganism Day(17/09/2020)on the topic "**Foot print of Microbes over our life**" to make an awareness of Microbial world and role of microbes. The programme competition judged by Arifa P (Assistant professor-Biochemistry) and Mohammed Jaseel A (Assistant professor-Microbiology) and Prizes were given to the winners.



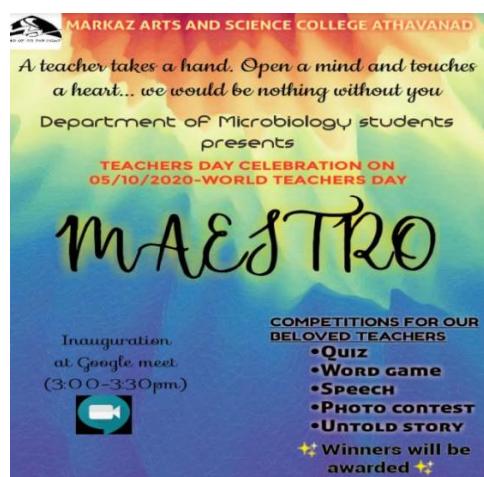
4. RELEVANCE OF MICROBIOLOGY IN NANOTECHNOLOGY AND NANOSCIENCE

On 25/09/2020 at 2.30pm Department of Microbiology in association with IQAC organized an International webinar on **Relevance of Microbiology in Nanotechnology and Nanoscience** through Google Platform. More than 160 participants from various part of the world were attended the webinar. The programme started with the welcome note by Department HOD Jumaila KP and inauguration by Principal of Markaz arts and science college-Athavanad. Resource person was Dr. Sreejith Raveendran, Project coordinator Collaborative education and Research program Toyo University JAPAN and joint Bio-Nanomission program,IIT -Delhi . He spoke about various application and field of Nanoscience and Technology also explained ongoing research work and current trends in Nanotechnology. The session was very effective and awesome especially for the students and research scholars. Finally the programme end up with the vote of thanks by assistant professor Mohammed Jaseel A. The event was hosted by Shamla A K assistant professor Microbiology. Moreover provided E-certificates to all the participants those who filled feedback form.



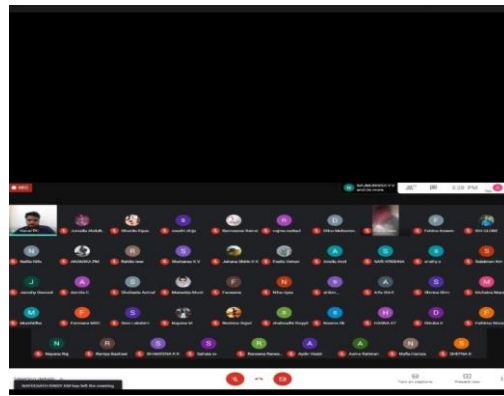
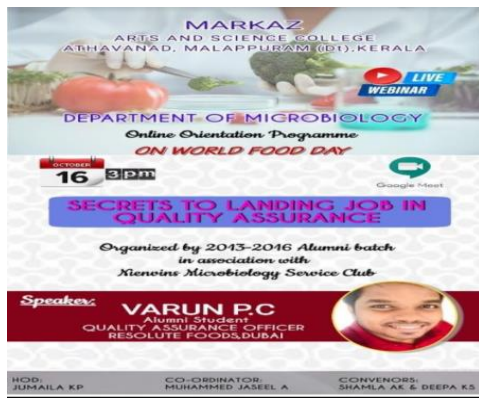
5. MAESTRO TEACHERS DAY PROGRAMME

Department of microbiology students conducted **Maestro Teachers Day program** on 5/10/2020 (World teachers day). The inauguration was held at Google meet from 3 p.m. to 3:30 p.m. the main purpose of this event was to create a good relationship between teachers and students. It was very well planned and most of the teachers participated in this program. Dr C P Mohammed Kutty, the principal of Markaz Arts and Science College inaugurated. The welcome speech was presented by Jumaila mam head of the microbiology department. The students welcomed the teachers and non-teaching staffs of the college with their love and support. All department HODs presented their felicitation. The inauguration ended up at 3:30 am with a warm vote of thanks by Shahina mol, third year student in markaz. Some games were also arranged for the teachers and they participated well. The winners were announced based on points teachers got and prizes will be distributed after reopening.



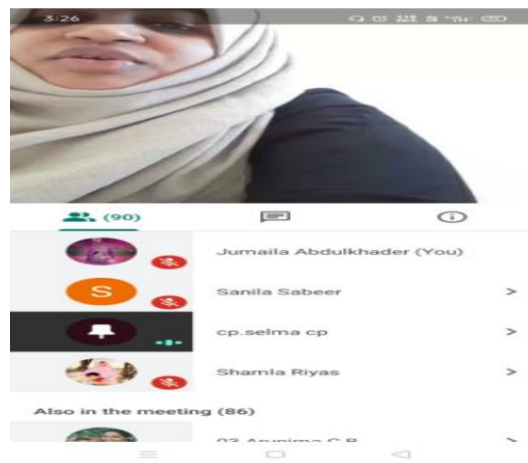
6. SECRETS TO LANDING JOB IN QUALITY ASSURANCE

Department of Microbiology, Markaz Arts and Science College, Athavanad conducted an online (Google meet) orientation programme on world food day in collaboration with "Neinvins- Microbiology service club" and 2013-16 Alumni batch on 16/10/2020 Friday at 3:00 PM. Mr. VARUN P.C (Alumni student 2013-16 batch) Quality assurance officer, Resolute foods, Dubai was the keynote speaker of the Day. The programme started with the inaugural session. Mrs Shamla.A.K, Assistant Professor of the department presided the inaugural ceremony. Mr. Muhammed Jaseel A Assistant professor, Department of Microbiology Delivered welcome speech. Mrs Jumaila.K.P, Head of the Department inaugurated the session. Then session was led by Mr. Varun PC on Secrets to landing job in quality assurance. He spoke of various measures to get Job in Quality assurance field.. He also share his memories during searching job and interviews. Also he given good idea about how to prepare Resume and how to prepare for interview. Feedback of the programme was delivered by Sari Krishna, second year student. The online programme was wind up with the Vote of Thanks delivered by Jameela K final year student.



7. MICROBIOLOGY TRENDS AND OPPORTUNITIES IN MIDDLE EAST

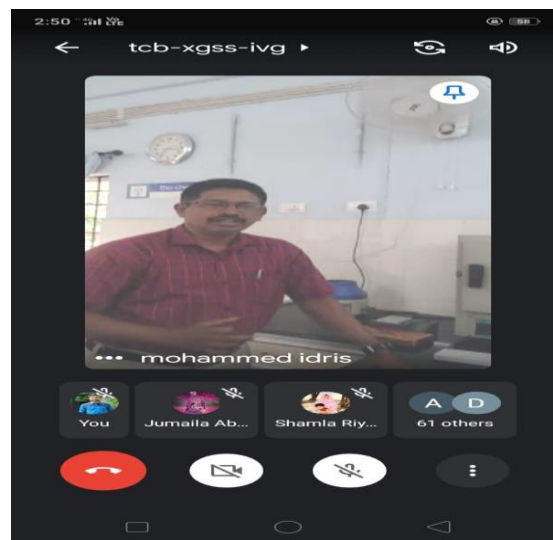
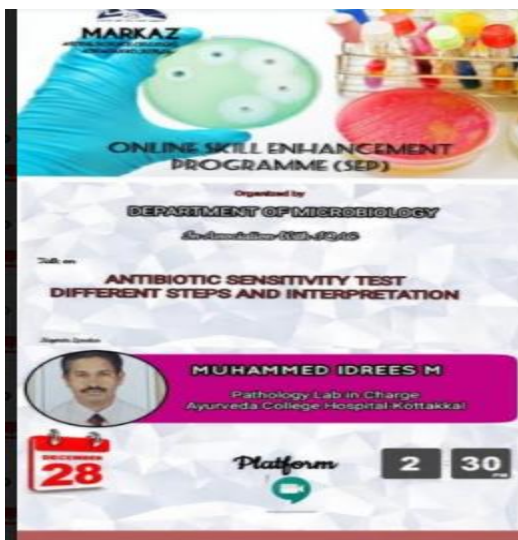
On 04/12/2020 at 3.00pm Department of Microbiology in association with IQAC organized an International webinar on **MICROBIOLOGY TRENDS AND OPPORTUNITIES IN MIDDLE EAST** through Google Platform. More than 80 participants from various part of the world were attended the webinar. The programme started with the welcome note by Department HOD Jumaila KP and inauguration by Principal of Markaz arts and science college-Athavanad. Resource person was **SELMA CP, Academic director, GHP Quality Consultants Abu Dhabi**. He spoke about various opportunities, available in Middle East and European countries. Also mentioned about the competition going to face while searching for a job and what are the emerging areas in microbiology. The session was very effective for the student's especially final year and pass out students. Finally, the programme ends up with the vote of thanks by assistant professor Mohammed Jaseel A. The event was hosted by Shamla A K assistant professor Microbiology and provided E-certificates to all the participants those who filled feedback at the end of the session.



ONLINE SKILL ENHANCEMENT PROGRAMME

8. ANTIBIOTIC SENSITIVITY TEST DIFFERENT STEPS AND INTERPRETATION

On 28/12/2020 at 2.30pm Department of Microbiology in association with IQAC organized an online skill Enhancement programme on **Antibiotic Sensitivity Test Different Steps and Interpretation** through Google Platform. More than 60 participants attended the skill Enhancement programme. The programme started with the welcome note by assistant professor Mohammed Jaseel A and inauguration by Department HOD Jumaila KP Markaz arts and science college-Athavanad. Resource person was Muhammed Idrees M, Pathology Lab in Charge, Ayurveda College Hospital-Kottakkal. He spoke about Antibiotic resistance as the genetic ability of bacteria to encode the resistance genes that counterfeit the inhibitory effect of potential antibiotics for survival. It can be developed either intrinsically by natural recombination and integration into the bacterial genome, or it can be acquired through horizontal gene mutation events such as conjugation, transformation, and transduction. Also done online demonstration for the preparation antibiotic disk and various dilution methods. The event was hosted by Shamla A K assistant professor Microbiology. The session finally, ends up with the vote of thanks by Shahina Mol final year Microbiology student

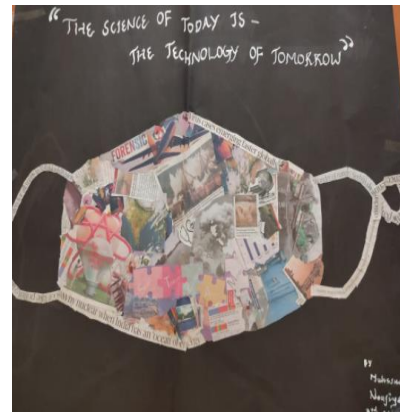
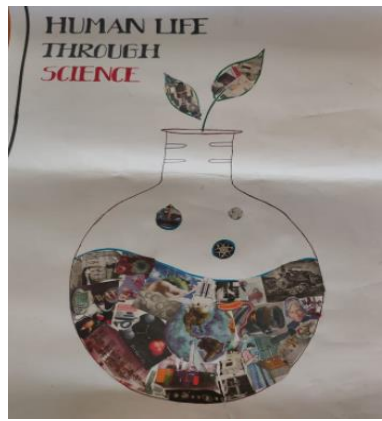
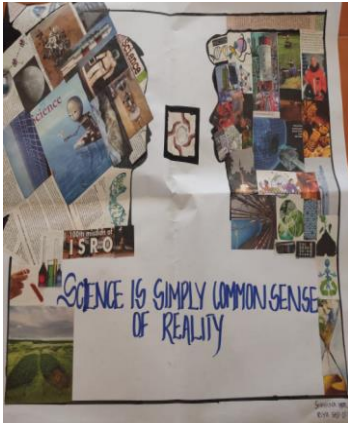


9. NATIONAL SCIENCE DAY CELEBRATION

On Feb-25, 26, 27- 2021 all science department of Markaz Arts and Science College-Athavanad Celebrated National science day. **Department of microbiology conducted 3 day programmes**

Day 1-25-02-2021

Conducted Collage Making Competition at Microbiology lab (Time: 1.30-3.30 pm) on the topic **“INFLUENCE OF LIFE SCIENCE IN HUMAN LIFE”**. Five groups (each group having 2 students) were participated. Shamla AK assistant professor department of microbiology, Arifa P assistant professor department of Biochemistry were judged the programme. First prize goes to Shahina mol & Riya Sasi (Department of Microbiology), second prize goes to Ayisha Farsana & Sana.T.P (Department of Biochemistry) & Third prize to Noufiya & Muhsina (Department of microbiology)



Day2 (26/02/2021)

In day 2 we conducted an exhibition “A TOUR TO MICROBIAL WORLD”. It was related to microbiology tools & techniques. The students and teachers from other department got an opportunity to observe the micro-organism and some of their characteristics. Students provide an awareness about the diseases, symptoms and its spread. The entire programme was conducted according to Covid protocol. The overall programme was very thriving for those who are not from a microbiology background.



Day3 (27/02/2021)

Day 3 programme was for the public and it was conducted in Valanchery community hall. A seminar on the topic “INFLUENCE OF SCIENCE ON EVERY DAY LIFE” by Dr Mohammed Safer, Assistant professor, Department of Swasthawritha, Ayurveda college, Kottakkal was organised by Department of Microbiology & Biochemistry.



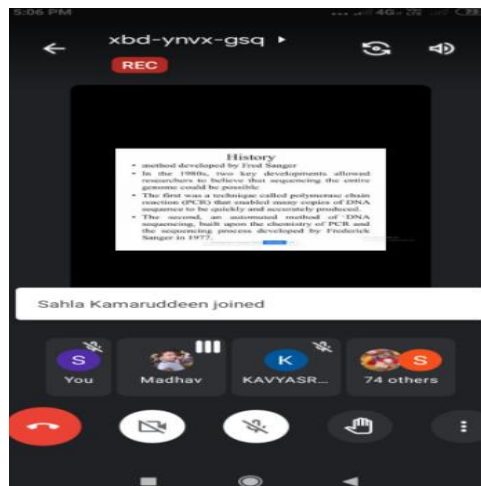
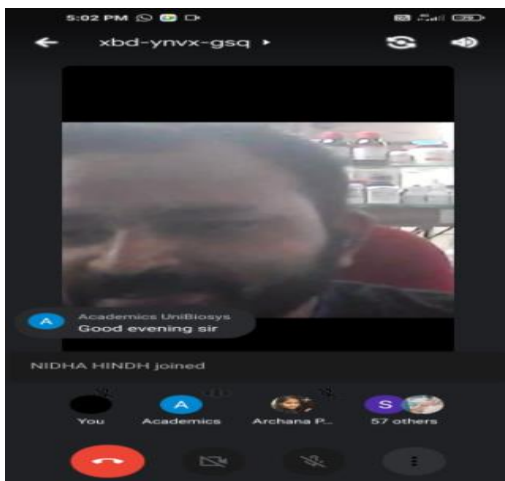
10. WATER ANALYSIS

Department of Microbiology conducted 2-day water analysis programme on . Samples from adopted village & campus were tested.



11. WEBINAR ON SEQUENCING

Department of Microbiology First year students attended one day online webinar on 06/03/2021 on the topic “**SANGER SEQUENCING AND NGC-BASIC PRINCIPLES & APPLICATION**” with theory and practical session conducted by UniBiosys Foundation for Education & Research. Around 75 students of the department were participated. In this webinar the resource person discussed about DNA, importance of DNA, DNA Sequencing, application of sequencing and sequencing work flow. Materials presented was very pertinent to current times.



12.A MoU signed between Department of Microbiology & Geno bio Research laboratory,Kottakal

Department of microbiology signed a MOU between Geno bio Research laboratory- Kottakkal on 16-03-2021.

13. Shamla.A.K participated as faculty and successfully coordinated classes in an online programme for students titled “Learn in Lockdown “ conducted by The All Kerala Private College Teachers Association in May 2020



SOIL FERTILITY TESTS

Ms. SHAMLA A K,
Assistant Professor,
Markaz College of Arts and Science,
Malappuram

on **07/05/20 (Thursday)**
Content Release : **10.00 am**
Discussion : **07.30-08.30 pm**

Learn in Lockdown project by **AKPCTA** Join t.me/MB4B04

Soil Fertility Maps District wise Maps

- Muhammed Jaseel A participated as faculty and successfully coordinated classes in an online programme for students titled “Learn in Lockdown “ conducted by The All Kerala Private College Teachers Association in May 2020



SHAMLA.A. K has actively participated and secured 90% in E-quiz on “**Microbiology & Food security**” organised by **School of Sciences,**

P.P. Savani University on the occasion of “World Food Safety Day” on 07th June 2020



ADD-ON COURSE 2020-2021

Department of microbiology offered an add on course of MUSHROOM CULTIVATION (MB-CC-003) of 30 hours duration from 01 December 2020 to 11 January 2021. 98 students enrolled in the course. All students passed the course.

The course instructors are Mrs Jumaila K.P., and Mr Mohammed Jaseel .A, the importance of mushroom cultivation was taught to the students as an additional benefit to their on-going course. After completing this course students are able to cultivate mushrooms and spawn production, identify an edible and poisonous mushroom. Understand the nutritive, economic and medical importance.

WOMEN DEVELOPMENT CELL 2020-2021

Women Empowerment Cell (WEC) has been constituted to empower and safeguard the rights of female members; faculty, staff and students of college. The first meeting of the women empowerment cell of the academic year 2019-2020 was held on 12/06/2020 through Google Meet. The main agenda of the meeting was the selection of executive members and to prepare the action plan. As per the suggestions from the students, **RIYA SASI** from 3rd year Microbiology was selected as the secretary of the cell. Ten executive members were also selected.

Programmes conducted by the women cell in the academic year 2020-21 include mask distribution to the adopted village, Webinar on “medicinal plants in common health care”, "KSWDC schemes and 'REACH' programme", Awareness class on ‘life is beautiful’ on International Day of the Girl Child, Women safety – self defense workshop for women, Inauguration of vocational training centre and training on sewing machine and curtain designing for locals in the adopted village and interested girl students, Training on umbrella

making for locals in the adopted village and interested girl students and women's day celebrations

Report of Microbiology Department Alumni

1. Microbiology Alumni Batch 2015-2018

Online Alumni Meet

Platform: Zoom App

2015-2018 Microbiology alumni batch conducted a virtual gathering on 26 /August /2020 at 3.0pm. More than 10 members were participated and some beautiful experience and memories in Markaz college. We spend almost one hour and discussed about to conduct an informative session for Microbiology students.



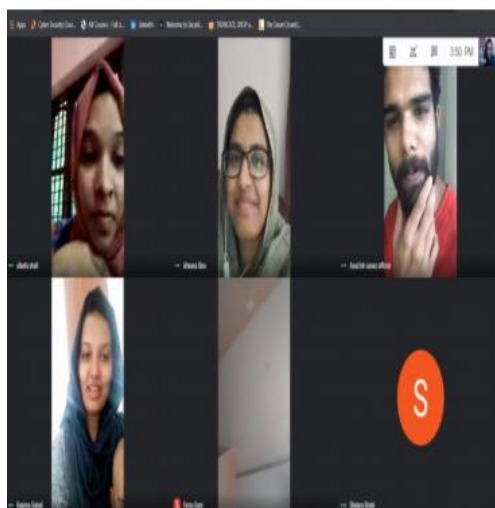
2. 2013 - 2016 Microbiology Batch

Alumni batch 2013-2016 conducted an online gathering on 30th August Sunday at 4 pm. Almost 12 members gathered and share our college memories and happiness. As alumni we seriously discussed about to conduct a useful programme to microbiology students. After one hour we conclude the gathering by selecting 3 members for coordinating the programme. Proposed plan on the topic is "Food Quality Control & Assurance checking methods and its importance



3. Alumni meet BATCH-2014-2017

Life is all about making connections. Getting together with friends is something that most of us look forward to. Throughout the years we had grown with all sorts of personalities, make every seconds fulfilled with fun, interesting and memorable. Twelve members were head together in this beautiful gathering. We were at the peak of happiness in that three hours and have discussed about implementing something which would be beneficial to the society too. Our discussions end up with sharing many thoughts regarding how to organise a favourable program to the upcoming generation. Mostly, we focus on how to make everyone cherish in the field of microbiology as well as spotting the importance of vaccine in each individual's shelf life and also to irradiate malnutrition by implementing SCP's. It is our great pleasure to have this meet which increases the bonding between us and brings the habit of sharing new ideas. Time may have changed our lives and divided our paths, but it couldn't erase the memories from our hearts.



4. Alumni meet BATCH 2016-2019

The Microbiology students of Markaz alumni batch 2016-2019 organized an online meetup on 4th august 2020. Most of the students attended the programme and we had a fabulous time. We discussed on different topics and ended up with an idea of conducting an orientation

programme for our department students on central universities entrance examinations

