

Positive Bridges are established between the Staff and Students at the Department of Applied Sciences through the Grand Celebration of Forty Fifth National Day

Balloons at the entrance of the Department of Applied Sciences and the corridors played the ballet, the national flag with the 45th national day logo swayed with a gentle and generous breeze of unity, wellbeing and patriotism emanating spontaneously from every heart that stepped the department. A festive environment with a celebrative mood composed to a joyful tune of togetherness and universal brotherhood carrying the message of peace and prosperity was shimmering in every activity that had taken place from 8 am to 3 pm on 18-11-2015 at the department.



Science club student members with the encouragement and guidance of the HoD, Dr. Samiya Al-Jaaidi and the student activity coordinators of the department Mr. Faisal Hamood Al-Kharousi and Ms. Siham Salim Al Hadhrami and other staff members greeted their fellow students & staff entering the department and served every visitor with "Omani halwa and kahwa" at the entrance from 9 am to 1 pm with a formal opening ceremony held at the main entrance of the department starting around 9 am.



All the departmental staff gathered in room M-116 with the HoD, Dr. Samiya Al-Jaaidi along with other staff cutting the cake for the good fortune of every staff member and student of the department marking the academic freedom enjoyed on the auspicious 45th national day amidst a big roar of applause of other colleagues. There was a refreshment party arranged after the cake cutting ceremony where one and all enjoyed. All the staff members are provided with a gift pack containing the 45th national day logo.



Science Club Students Participating in Various Community Engagement Activities

The Department of Applied Sciences through Science Club is promoting the active participation of the students in the various community engagement activities.

School Visits: to encourage the new generations to be more innovative and creative in science field, science club students visited three different schools in the AY 2015-2016 namely: **Zubida Um Al Ameen High School (January 2016), Al Radhwan Primary School (February 2016) and Darsit Secondary School (March 2016).** The science club students demonstrated different scientific experiments and briefly explained the different specialization offered in Applied Sciences Department in the Higher College of Technology.

Participation of the Applied Sciences "Recycling Group (RG16)" in the Exhibition and Symposium of 'Efficient Utilization of Resources and its Economic Impacts', (EUREI'16) at Sohar College of Applied Sciences

On 25th of April, 2016, the Recycling Group (RG16) from the Higher College of Technology participated in the exhibition and symposium titled 'Efficient Utilization of Resources and its Economic Impacts', (EUREI'16) held at the College of Applied Sciences - Sohar under the auspices of Dr. Suad Mohamed Ali Sulaiman al Lawati, Deputy Chairman of State Council.

The seminar was organized to raise the awareness towards circular economy and its ability to pave the way for more innovation across multiple areas such as recycling raw materials and products used in different sectors. This will contribute in the preservation of the environment in addition of providing employment opportunities and play a significant role in growth of the economy. The Recycling Group (RG16) showcased their skills by presenting impressively designed recycled products, handicraft and leaflets that were recycled by team members using household and various waste materials that may cause harm to the environment if landfilled randomly continued.



Workshop: "How to turn your projects into research papers?"



Conducting research is a central part of scientific investigations. To emphasize on the role of science in explaining the unexplained and finds solutions to various problems of the world, the science club had organized an important workshop on Sunday (6th March, 2016) to spread awareness among students about research and scientific publications.



The core idea was that research itself cannot claim its name until and unless it is well written in the form of a good research paper, scrutinized and reviewed by peers and then published in scientific research journals of International repute. The title of this workshop was 'How to turn your projects into research papers?'

The oral presentation was successfully delivered by Dr. Pankaj Sah (Lecturer Applied Sciences) who emphasized on the details of research publications. The presenter advocated the importance of research publications in the field of science. He discussed various types of research communications, the basic points of writing a research paper from the abstract to the acknowledgements. The presentation also helped students to identify the good research journals that are listed by Thompson Reuters Web of Science (USA) and SCOPUS. The presenter also discussed in detail about the 'data analyses and data mining for a research paper' that constitutes the core of a quality research paper. Apart from data analyses, the importance of good scientific language was also discussed in detail.

The presenter also motivated the students by exhibiting quality research papers published in Thompson Reuters Web of Sciences (USA) listed journals by HCT Applied Sciences students at Diploma and B. Tech levels, in recent years. Dr. Pankaj Sah urged the students to develop theoretical knowledge and scientific skills in research. He also asked students to use various academic and technical resources to address the current local or global problems, try to find scientific solutions through their research projects and ultimately publish their research papers in scientific journals of International repute.

Open Day Football Championship: The APS bagged Second Highest



Sports are classified as extra-curricular activities. The spirit of sportsmanship that is imbibed at the formative stage of a student's personality will give lifelong yields, which can be reaped either by the individual or the society (i.e. the scaffolding in which the individuals have to ultimately perform). Sense of fellowship and brotherhood with ones competitors, playing the game of life for its own sake and enjoying every turn and twist, practicing and promoting fairness, ethics and respect will be the few characteristics of a sportsperson. With the encouragement given for the development of the sporting spirit in its students, the department of applied sciences bagged a second prize by its student team in the football matches conducted among all other teams of various departments of HCT that are

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Participation in **Oman Environment Day**, under the theme 'Our Environment Our Country so Preserve it' organized by Ministry of Environment and Climate Affairs (MECA) in the Avenues Mall, Muscat (7-10 February 2016). Participation in the **World Civil Defence Open Day** organized by the Public Authority of Civil Defence and Ambulances (PACDA) in the Higher College of Technology- Multipurpose Hall (14th March 2016).

The Research Council under the Microscope

To emphasize the importance of scientific research, the science club had organized an activity on Sunday 22nd of November, 2015 under the name "The Research Council under microscope". The guest of honor, Dr. Obaid Al Saidi, the director of programs of The Research Council (TRC) gave an oral presentation explaining the different research programs offered by the council. In the second session of the program, Ms. Sarah Al Bariki gave a detailed presentation about the Faculty Mentored Undergraduate Research Award Program (FURAP) scholarships which are granted by the TRC for the undergraduate students studying in local higher education institutes, colleges and universities in Oman. The Research Council is currently accepting research proposals for this program which will provide funding up to 2,400 R.O. per research. The submission can be done through the TRC website and the last date for submission is 7th of April. The dean, assistant deans, head of applied science department, heads of sections and units were present for the event.

Magic of Science...

final thoughts...
 Be part of science Club you will be part of the magic

The event at the department of applied sciences is entitled as **"Magic of Science"** with a message: **"There is no magic stick- Just there is a science"**. The event had silently portrayed a **"landmark achievement of the department"** in showcasing the settled convictions, deep-seated virtues and open minds of students and their teachers in all the domains that can collectively fall under the umbrella of applied sciences.

"Actions always speak of ones intensions". Inculcation of right intensions in the minds of youth by creating a sound belief system through the medium of science is always a challenge in teaching science. The rational use of cause and effect to arrive at the logical conclusions to every aspect in the lives of the future citizens of Oman is the central philosophy of science education that is being promoted at the Department of Applied Sciences. The actions of the students and their teachers in the classrooms and laboratories in the process of constructing their own meaning of science and getting it validated through the universal scientific norms is displayed through various exhibits at the open day at the department of applied sciences on 20-03-2016 from 9 am to 3 pm. These exhibits stands as a testimony in using the well celebrated **"constructivism"** as the method of learning and research.

The Science Club of Higher College of technology celebrated its open day with various ideas in the field of Biology to create awareness in the science of **Biology**. The items presented includes Project of Biology poster presentations with many scientific ideas, Micro propagation concept Through Plant Tissue culture – where how to propagate the clones with desired qualities as green revolution concept, DNA based applications in Forensic sciences and various other DNA based technology applications, Microscopic observations of microalgae, clinical oriented exhibitions like Hemoglobin, Blood sugar level and the branches of biological sciences etc. . The entire live exhibition's presented from biology section during HCT science Open day Gathered very good response from the students of various Departments.

A variety of experiments from **Chemistry** section could be seen which were a visual treat to the science open day. Students enthusiastically participated ignoring the extreme climate. Mr Anwar, Mr Khalfan and Ms Aisha Al Balushi were prominent among the students of Advanced Diploma and B Tech who performed experiments like the catalytic oxidation of acetone on Cu metal which was titled "Acetone Flash light". Another highlight was recycling styrofoam, a kind of petroleum based plastic using acetone, which is an ecofriendly method as it is pollution free. All safety recommendations were followed for the experiments during the open day. There were also experiments using basic principles of chemistry from acids bases and indicators.

It is often told that **Physics** is the mother of all sciences because of its innate rigor, rationale and excitement. Dr. Shafiq, faculty member of Physics supervised the exhibit entitled "Domestic use of Solar Energy - A form of Renewable Energy" presented by the students Mr.Ahmed Al-Maqbali, Mr. Abdullah Al-Mafaji, Mr. Faisal Al-Yahyae and Mr. Amer Al-Habsi. Mr. Abdul Hadi, faculty member of Physics, supervised the exhibit entitled "Wind Energy" presented by the students Ms. Fatima Al-Muqbali, Ms.Iman Al-Dhuhli and Ms. Kawthar Al-Salhi. Mr. Hakeemulla, faculty member of Physics supervised the exhibit entitled "Integration of Instrumentation with renewable sources of energy" presented by the students Ms. Bahia Al-Mewali, Ms. Zainab ALAisae and Ms. Rahma Al-Husaini. Equally ignited by the enthusiasm, the three technicians of the Physics unit Mr. Jimmy Santos, Mr. Mario Alibin and Mr. Marlon Calpotura came up with a model for "Harvesting energy from rotating objects". This project was made out of a used paper roller from an old defective printer, DC motor (with brush), light emitting diode (LED), light dependent resistor (LDR), gears, some resistors and transistors showing the real technical ability and expertise available at the department of applied sciences.

The **Environmental Science** section through its students, participated in the HCT Open Day last 20 March 2016 from 9 am to 3 pm. Various activities such as previous project researches, plastic bottle caps recycling campaign and recycling information drive done by the students were exhibited in their designated booths. The Environmental Society of Oman (ESO) was also invited to promote its civic engagement, projects and membership solicitation. These activities form part of the Section's thrust, and being at the forefront in the College for actively promoting awareness, advocacy and action to protect, preserve and conserve the environment and its ecosystems.

Al Radhwan Primary School joined the HCT open day by presenting their science projects.



VLCC joined the Science Club and spread the spirit of their vision of "Transforming Lives", spreading happiness and imbibed every individual with wellness for life. The VLCC Group advocated the students and staff regarding the scientific weight loss solutions and its therapeutic approach to beauty treatments.



Al Ghubrah Power and Desalination Company (GPDco) joined the Science Club by presenting all the safety measures.



Al Numan Zoo joined the HCT open day and enthralled the campus by the different type



The Science Club of Higher College of technology also celebrating the **International Year of Pulses (IYP) 2016** as declared by united nation. The science club aimed to create awareness towards the nutritional benefits of pulses within our students. The main highlight of the theme was a portrait of His Excellency Majesty Sultan Qaboos was made used various pulses which reflected the intellectual art of our students.



Horror Dark room. Science students arranged an activity of a haunted room where the visitors were guided in a very dark room by giving them flashlights to try to find the way out. The sounds in the haunted room were too scary for visitors/guests to keep them on their toes. A whole display area was a talking piece of interest for visitors gathered around.



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Coming soon >>>

In The Next Issue

Science Club will be a part of Eco-College Chapters organized by ESO and sponsored by British Petroleum Company.

Science Club celebrating the World