

Anand Niketan Maninagar takes a Step Ahead in Technology Education Anand Niketan Maninagar inaugurates the Atal Tinkering Laboratory. Anand Niketan Maninagar, a name synonymous to excellence in education, proves yet again, that it never takes holistic development of its students lightly. the school has added another feather in their cap, taking a crucial step forward in technology education, by opening its Atal Tinkering Laboratory for students from Grade VI to XII.

Anand Niketan Maninagar Campus has developed a state-of-the-art Atal Tinkering Laboratory for training its students on modern-day technologies. With modern prototyping tools like Evive, Arduino, 3D Printer and hundreds of other tools, students will be able to explore the world of electronics, robotics, programming, 3D—printing, internet of things, etc. The event was presided by Dr. B.S. Munjal, a renowned space scientist of ISRO, Ahmedabad as the Chief Guest, who was extended a warm welcome by Ms Harpreet Shah, Director, Anand Niketan Maninagar Campus. The students of Grade IX to XII listened to Dr. Munjal, in rapt attention as he interacted with them and the students too interacted with him with utmost curiosity. Mr. Pankaj Verma, an alumni of IIT Kanpur and one of the co-founders of Stempedia was welcomed by Ms. Anmol Shah, Curriculum Instruction Coordinator. The event also had the gracious presence of Mr.Nilesh Raval, the mentor of change assigned to the school by Niti Aayog, who was welcomed by Ms. Ratna Majumdar, Vice Principal.

The Laboratory will be using an advanced Learning Management System which will help the school track progress of its students online across various skill sets.



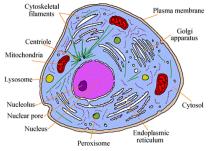
# **CREATIVE WRITING**

Grade IX students were given summer holiday homework in Biology subject. The topic was to write creative story on CELL & ITS ORGANELLES. Students wrote wonderful stories by their own in which they made the cell as a kingdom/country/planet whereas organelles as soldiers/aliens/clans etc. The following is a creative story by our student :

#### THE CELL KINGDOM

Once upon a time there was a place named cell kingdom. It was made up of six clans. They are

endoplasmic reticulum, Golgi apparatus, lysosomes, mitochondria, plastids and vacuoles. Cell kingdom was made up of six clans because they all were dependent on each other. For instance :



endoplasmic reticulum builds up the kingdom in prosperous manner just like it does in our body, building up tissues or repairs them. Golgi apparatus does the work of security. It does not allow anyone to leave without authority just like it keeps proteins and lipids synthesized within the cell.

Lysosomes help in removing bad things or persons from the kingdom just like it helps in containing digestive enzymes. They also help

other clans. Mitochondria takes raw materials from the cell kingdom and supply finished materials to kingdom just like it takes nutrients from cell and breakdown it in energy which in turn is used by the cell. Plastids the fifth clan helps the kingdom form buildings and gives colors to the kingdom just like they do in plants.

Vacuoles the sixth clan helps the kingdom in being strong enough for any damages. It in short gives rigidity just like they so in plant cell.

Courtesy : Kirat Patel

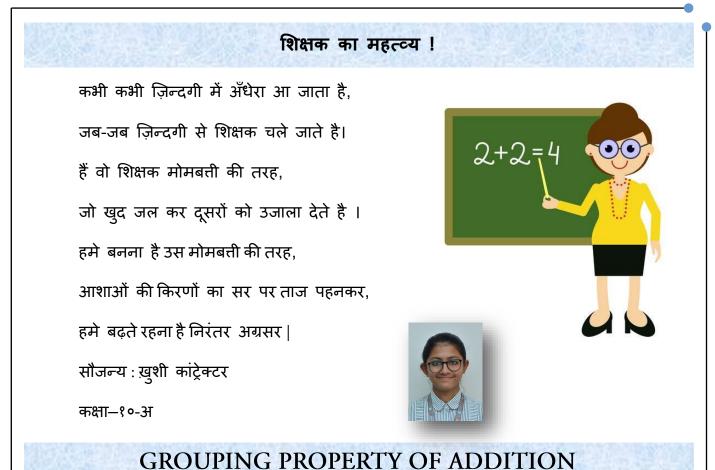
IX Aryabhatta



### NEWSLETTERS BY BUDDING EDITORS

Grade IX students was given summer holiday homework in Hindi subject. The topic was to make Newsletter. Students made creative newsletters on their own .

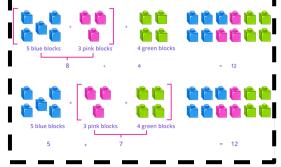




# POUP" magns to connect or join with something. According to the grouping property

To "GROUP" means to connect or join with something. According to the grouping property of addition, the sum of three or more numbers remains the same regardless of how the numbers are grouped.

Based on this concept, students were asked to perform an activity. In this activity students use to cut minimum 3 different types of strips, arrange them in at least two different ways. Find the sum of them and compare. They have found arranging or grouping them in different ways doesn't change their sum.

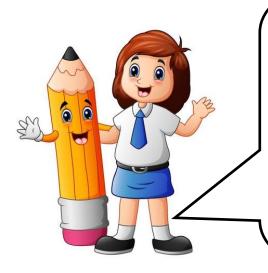




### **ACROSTIC POEMS**

- I- is for inquisitive, a curious intellect
  S- is for sincere, staying true
  H- is for honest, which my nature reflect
  A- is for artistic
- A- is for ambitious, you stand in queue
- N- is for noble, self sacrificing is me and you.

Courtesy : Ishaan Lalani Grade- IV Orion



S- is for sensational, ever exciting.
H-is for honorable, full of virtue.
I - is for importance your friendship that is an asset.
Z – is for zany , always hilarious.

A – is for affable , instantly likeable.

Coutesy : Shiza Miyhani Grade- IV Phoenix



A – A is for awesome, you do what you enjoy.
A – A is for Alive, your energy touches every soul.
R – R is for refined, your taste, manners and gait.
U – U is for unpretentious, never one to boast.
S – S is for sociable, you spread smiles around.
H – H is for hand working, always in whatever you do.

Courtesy :Aarush Shah Grade-IV Pegasus

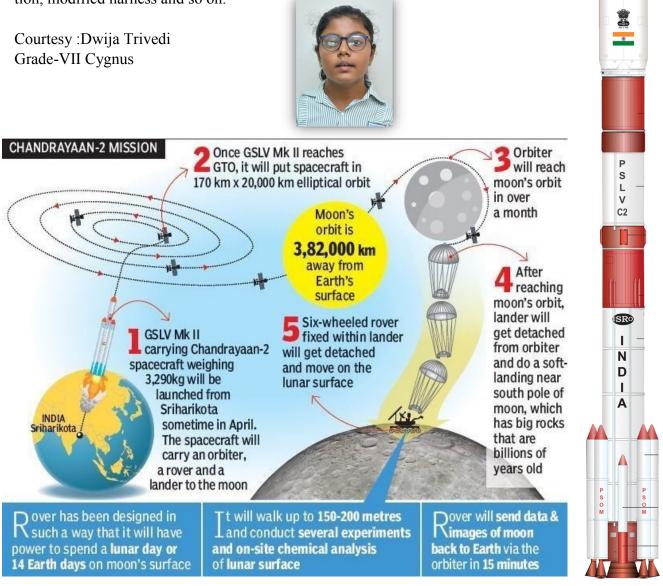
# CHANDRAYAAN

Chandrayaan-2, India's second lunar mission, has three modules namely Orbiter, Lander (Vikram) & Rover (Pragyan). The Orbiter and Lander modules will be interfaced mechanically and stacked together as an integrated module and accommodated inside the GSLV MK-III launch vehicle. The Rover is housed inside the Lander. After launch into earth bound orbit by GSLV MK-III, the integrated module will reach Moon orbit using Orbiter propulsion module. Subsequently, Lander will separate from the Orbiter and soft land at the predetermined site close to lunar South Pole. Further, the Rover will roll out for carrying out scientific experiments on the lunar surface. Instruments are also mounted on Lander and Orbiter for carrying out scientific experiments.

All the modules are getting ready for Chandrayaan-2 launch during the window of July 09, to July 16, 2019, with an expected Moon landing on September 06, 2019.

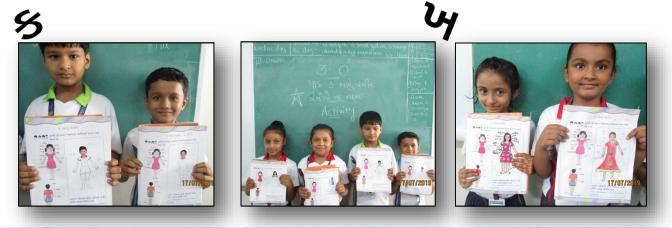
For the first time, Indian Space Research Organisation (ISRO) has two women project directors — Ritu Karidhal and Muthayya Vanitha — for its inter-planetary mission Chandrayaan 2..

Among major challenges are the integration of the fifth liquid engine to manage the additional load of the lander which now has to orbit the Moon, lander legs, rover integration, modified harness and so on.



# **GUJARATI ACTIVITY**

Students of grade III had prepared pictures of human body along with their photo and written names of body parts in Gujarati. They pasted the pictures in their Gujarati Textbooks. By doing this kind of activity, students are able to speak and identify names of body parts in Gujarati language.



HINDI ACTIVITY

Students of Grade IV arranged the pictures of the freedom fighters and named them in Hindi textbook. They learned the skill of identification of our real heroes and also acquired Hindi language skills.







# HEADGEARS

The students of Gr. 3 showcased their creative and learnt about various headgears of incredible India through hands on experience by making amazing headgears of different states of India. They not only wore the beautiful headgears but also shared the invaluable information about that particular state.





# HANDS ON ART & BOARD GAMES

To learn and play popular board games in the Board Games Club is the most favourite activity of the students. Students learn an array of games including, Monopoly, Chess, Checkers, Connect Four, Uno, various card games, Xenga and many other interesting and great games. This is not only their favourite play time but also the time when they learn they learn the lesson of sharing and enjoying. In Hands On Art Club also they not only learn the basic skills of art & painting but also the sense of responsibility and team work.



BITS AND BYTES

Anand Niketan Maninagar focuses on the all round development of the students. As in today's world life has become impossible without technology, the Bits and bytes club at ANM facilitates the students to become tech-savvy as they learn about the computer, software, hardware and various application that can be used in day to day life. The students learnt about Cyber security, cyber crimes, Malwares, Antivirus Protection and creating a blog.



### THE TIGER PROJECT

The charismatic national animal of India has been under the radar for decades now. Project Tiger initiated by the Government of India was one of the pioneering initiatives launched in 1973. The gradual yet successful progress from 9 Tiger Reserves (TR) to 50 today, shows the importance of the species. Yet we are still battling over threats like demand for tiger parts and its derivatives sold at exorbitant rates nationally and internationally. The movement of tigers outside protected areas as per their innate behaviour brings them closer to human contact adding to threats like human-tiger conflict, which are reported from all across the country.Shooting, snares, and explosive-traps were earlier some of the popular poaching methods in Indian forests but today using 'live' electrical wire traps are the best silent solution that easily kill animals in an instant. Electrocution, a method in which a wired trap or fence of a high tension electric line passing near forests is used to kill animals, is a heinous trend today. This is either adopted by tiger poachers or by farmers to protect their fields from herbivores. Especially in villages close to tiger reserves, the heavy losses incurred due to crop raiding instigate farmers to lay live wires with a minimum of 440V and trap deer, wild boars etc. but, this often ends up accidentally trapping another mega fauna like Tigers, leopards, elephants etc.We kindly request for your philanthropic support to help us protect tigers.



# **SOLDERING ACTIVITY**

Students of grade VI-VII in ATAL lab learnt basics of electronics i.e. soldering. They learnt what is soldering rod, technique of using soldering rod, LED- its anode and cathode terminals, soldering metal. This is the basic technique that will be useful for them in further electronic activities.Entire activity was performed under the guidance of their Science mentors.



### **GROUP ACTIVITY**

The group activity Presentation on the 'General Studies' subject was conducted in Grade XI commerce in July. The various topics which were presented by the students were: Vayu Cyclon, List of Ministers with their recent assigned ministries and with their educational background, Different Governors of RBI with their career profile. Students developed the presentation skill, exploring skill and gained confidence through this activity under the guidance of their Mentor.



# NEWTON LAB ACTIVITY

The students performed the activity ELECTROLYSIS OF WATER, learnt about the electrolytic decomposition of water and the emission of Hydrogen and Oxygen gas. The students performed the activity of pH INDICATOR and learnt about the behavior of various indicators in different media and their respective chromatic response to the media. Both the activities were successfully completed and performed under the guidance of their Science Educator.



### DARWIN LAB ACTIVITY

Students of Grade XII Science (Biology) performed the activity on PREPARATION OF TEMPORARY SLIDE OF MITOSIS FROM ONION ROOT TIP. They observed different stages of mitosis using slides that they prepared under microscope. The activity was successfully performed under the guidance of their Biology teacher.









# SEPARATION ACTIVITY

The students performed the activity of WATER DISPLACEMENT BY A SOLID, learnt about the rigidity of the solid materials and about the practical application of Archimedes principle.

The students performed the activity of SEPERATION METHODS and learnt about osmosis and filtration techniques in the activity. Both the activities were successfully completed and performed under the guidance of the Science Educator.



MAP QUIZ

Map quiz was conducted for classes VIII to X . 21 teams participated. It was organised by INCA sponsored by ISRO. It was worksheet based quiz and was a good experience for students.



### VISIT TO ISRO

Students of VI & IX were taken to ISRO managed by VSSE. Exhibitors were from ISRO. Students have learnt many new things about space, satellite, rocket, the working system of rocket and satellite. The satellite missions of past ,present and future. The achievements of ISRO. They saw many videos related to functions of satellites and rockets.







### STUDENT EMPOWERMENT PROGRAM

#### **EFFECT+ GLOBAL CITIZENSHIP EDUCATION WORKSHOP**

A Global Citizenship Education Workshop, where students were guided how to be change maker and to be part of Sustainable Earth. The workshop was conducted by Ms. Sarita Badhwar, AFS trainer. The workshop was an interactive and interesting workshop teaching the students about Sustainable Development Goals, Global competence, Globalization, butterfly effect. It helped students to see a wider perspective of everything and look things in a way they never would have fathomed.





**IRIS— NATIONAL SCIENCE FAIR** 

Initiative for Research and Innovation in Science (IRIS) conducted a workshop for Grade VIII to Grade XII, and made the students aware about how a research is conducted. The scientific mind of the students was ignited by the details of the IRIS national Science Fair, which provides a platform for young innovators to get recognized at national and international science events.





Menstrual Hygiene and Cyber Security

The school conducted an awareness workshop on "Menstrual Hygiene " for the girls of Grade VI to XII and "Cyber Security" for all the students of Grade VI to XII. The myths related with menses were cleared and even the taboo topics like the hygienic disposal of napkins were explained. In addition to this, an awareness regarding self defense techniques, was created among the girls. varied ways of committing cyber crimes, like phishing, morphing, cloning were discussed and the students were informed to immediately report to their parents and Cyber Crime department, in case they experience any form of cyber bullying.





#### CYBER SECURITY WORKSHOP



In today's digitally connected world of global network, the youngsters are techno savvy and high end users of applications on laptops and smart phones. Social networking on internet has made them vulnerable to cyber crime and other threats. With cyber threats constantly increasing and evolving, it is important to educate and update students about the risks involved in sharing personal details, photographs and other important data online on social media.

Dhruv Pandit, an alumnus of Anand Niketan Maninagar, who is a Cyber security expert and works with Gujarat Cyber crime cell, conducted a session to spread awareness among students of Grade VIII-XII about cyber strolling and cyber extortion. This informative session also included the case study of real life incidents related to hoax messages, cyber bullying and hacking. He made the youngsters learn about security measures they should consider seriously to avoid any unpleasant experiences both online and offline. The session provided vital information about cyber security to make the students insightful about the sensitive issues so that they can use the social media wisely and stay safe.





#### **SELFIE CULTURE**



The students of Grade IX H conducted an assembly on 'Selfie Culture'. The skit performed by the students reflected the differences between the mindsets of people of 1990s and the current Gennext. The audience was made to introspect the various hazards that can be caused by the obsession of clicking selfies. The fact that we are losing humanity to digital showoffs to glorify our external looks or showcasing the immediate knowledge of major accidents was realised by all the students. The word of the day "Narcissim" or self love was also introduced by the students.



#### **RECTIFICATION OF COMMON ERRORS—HINDI WORKSHOP**

With an aim to clear the basic grammatical structures and spellings of Hindi language a workshop on " Common Errors in Hindi" was conducted for Grade IX and X . The students were informed about the common errors that they commit while writing Hindi language. This awareness would minimise spelling errors and improve the written work presentation , which would help students to score better.





#### **TEACHER EMPOWERMENT PROGRAM**

#### ICL TEACHERS TRAINING WORKSHOP :

The school organized Inter Culture Learning workshop The workshop was conducted by Ms. Sarita Badhwar, AFS ICL trainer. The workshop enlightened teachers about cultures and their dimensions. The workshop helped teachers to direct the mind of young generation to widen the perspective to accept and respect other cultures.



MATH BUDDY WORKSHOP

Educators at Anand Niketan attended the core of an intensive training session and lesson planning exercise In order to internalize Math concepts and Learning. Math Buddy trained teachers have all the tools at their disposal to make their Math classes both conceptually strong and more engaging.



#### AWAKENED CITIZEN PROGRAM

Ramkrishna Mission New Delhi with collaboration with CBSE held a program for educators of CBSE School to provide value education and Mental health awareness among the students at Kendriya Vidhyalay ONGC Chandkheda. Two educators from our school Ms Tasneem Birader and Ms Hina Rishi attended the workshop and gained the training for year 1 of Awakened Citizen Program, that is successfully implemented in the classroom.



### MODEL UNITED NATIONS

The changes in the climatic conditions are a major concern and to mitigate the adverse effects of these changes a Children's Climate Conference was held at Indus University, which was attended by Anand Niketanites of Grade IX to XII. As a part of MUN, the students deliberated on various issues relating to biodiversity and climate change. The young minds also thought about solutions to the problems and expressed innovative ideas. Valmik Bhatt of Grade X ,who received the Best Parliamentarian Award, was felicitated by Honourable Amit Sir, Trustee Anand Niketan Maninagar and Respected Harpreet Mam, Director, Anand Niketan Maninagar. All the attendees of the Conference received participation certificates.



### HAAS PARIHAAS SAMMELAN

Oodles of laughter resonated through Anand Niketan Maninagar Campus, as Grade IX and X students made a sincere and serious effort to bring infinite smiles on the faces of the audience during the 'Haas - Parihaas Sammelan'. The laughter riot was graced by Honourable Amit Sir, Trustee, Anand Niketan Maninagar and Respected Harpreet Mam, Director, Anand Niketan Maninagar.

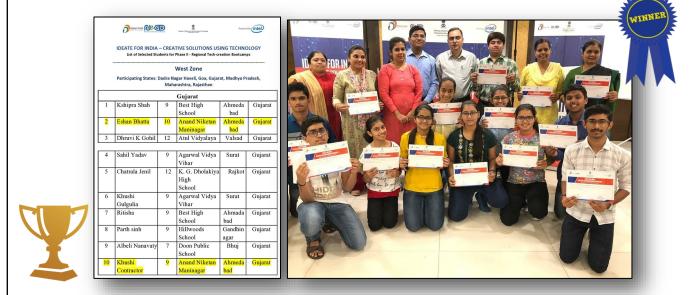
A cut throat competition was observed among the houses: Agni , Jal, Vaayu and Prithvi . There were three rounds in the competition : Round 1 - Hasya kavita , Round 2- Hasya Vyangya and Round 3 - Hasya Vigyapan. The wittiness of student comedians advertising their new market launches:

Champa-Chameli oil, the Black Beauty cream, the Khatmala Ghee and the Gangaajal deodorant, was quite hilarious and ensued moments of infinite laughs, giggles and smiles. It is indeed difficult to judge the smiles, but as it was an interhouse competition, there had to be positions and winners. The event was judged by Honourable Harpreet mam, Director, Anand Niketan Maninagar and Vaayu house was declared as the 'Hasya Samrat'.



#### PROUD MOMENT FOR ANM

Ideate for India selects Students of Anand Niketan Maninagar .The scientific ideas of Eshaan Bhatta (Grade X) and Khushi Contractor (Grade X) have been selected among the top ten ideas from the state of Gujarat in Ideate for India – 'Creative Solutions Using Technology', a national challenge by National eGovernance Division, Ministry of Electronics and Information Technology, Government of India and Intel India. It is worth mentioning that out of more than 3000 participants who had submitted the videos, Eshaan Bhatta and Khushi Contractor have been selected to attend the government sponsored West zone boot camp and training camp along with selected students from Maharashtra, Rajasthan, Madhya Pradesh, Goa and Dadra and Nagar Haveli.



#### FEEDBACK FROM STUDENTS

Myself Khushi Vijaykumar Contractor studying in grade 10th .Recently, I attended Ideate for India regional-tech boot camp. It was a very thrilling and fantastic experience attending it. I learned many things there like Design thinking, Arduino connections, Types of different sensors and their working and connections ,lot:Internet of Things,Thingiverse feature,Sketchup maker app,Tinkercad,Fusion,Thingspeak app and many more things.So,I wanted to thank Anand Niketan Maninagar teachers and everyone linked with it to give me this wonderful opportunity. I hope that in future I would continue to get such opportunities from our school. Once again I am thankful to Anand Niketan Maninagar for giving me such a nice platform to represent my ideas. Yours truly,

Khushi Vijaykumar Contractor.



I'm Eshan Bhatta of 10th Hubbles. I was selected for **IDEATE FOR INDIA National** Challenge for the idea feeding spoon for Parkinson's patients. IDEATE FOR INDIA was an amazing experience which I will cherish throughout my life. I was deeply influenced by the people who were there and the mentors who were extremely friendly. I made many new friends and I realized that I'm not alone. There were many people who wanted to become something in their life. I met people who were interested in the field in which I am interested in, and this is one of the most rarest of occasions which makes me feel that me and my friend are not alone, there are people like us all over the world and realized that together in the future we will be part of a bigger community which will try to explore the depth of the subject.



Eshan Bhatta —Grade X

Our mentors there thought us a key concept of self learning, which is a lesson for life. They hardly made us realize that we were learning this key that will help us in the future of the rest of our lives. While doing this I even realized that I already knew some things which I thought I didn't know. They introduced us to the concept of IoT (Internet of things) which was a totally new concept to me, but I could learn it on my own as they had helped us master the concept of self learning. I can say that they thought us 3d printing,3d designing, G code splicer software, arduino programming ,nodemcu,IoT ,design , design thinking, but according to me they thought us the process of self learning and now I observed that all of us together we formed a community know as "IDEATE FOR INDIA AHMEDABAD 2019" . We have a whatsapp group through which we clear our guarries and share our idea. I can say that I discovered a new platform, a new community through "IDEATE FOR INDIA National Challenge" where I can share my ideas and thoughts and get help if I don't understand something. We also received rare and costly Intel Galileo gen 2 boards through which I can make many things. Thank you.

#### Khushi Contractor—Grade X



### **INTERNATIONAL DIMESIONS**

As is every year, this year, Anand Niketan Maninagar is proud to host Rebecca, International student from USA, under the International Student Exchange Programme . Ms Harpreet Shah, honourable Director, Anand Niketan Maninagar , gave a warm welcome to Rebecca in the true Indian tradition. Rebecca interacted with the Anand Niketanites . She introduced herself, as well as , shared her experience in India.We look forward to an enriching intercultural experience which brings together Indian values and American traditions.



