The Compendium



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TEKHACK - 2019 Hackathon Sees Large **Participation From Students**

TEKHACK – 2019 is a National level technology Alekya, and Vamsi krishna from IT-3. Students Management were few of the areas chosen to build innovative solutions which can be viable 3th, and 4th of October, followed by 24th, and 25th hackathon. The students organizers are M. awarded with cash prize of 6 lakhs rupees.

hackathon organized to solve the problems of from various departments participated actively in society and Industry with the help of emerging the event and completed their projects. Three technologies. Tekhack was conducted by Smart- teams were selected for state level hackathon. bridge in collaboration with IBM to develop solu- The first team that got selected is Team tions for the societal and industrial problem Mayabazar with team members V Sai Meghana, statements with Artificial Intelligence & Internet R Vikrant Sagar, K Sri Sai Dugra, and Malyala of Things. Healthcare, Agriculture, Manufactur- Alekya. The second team is Team Flash with ing, Retail, Energy, Education, Environment, team members Aditya Shiva Sai, Naveen Teja, Public Safety, Smart Homes, and Supply Chain Balaji, Rakesh, and Nachiketh. The third team is Team AI ON CLOUD with team members Seeram Sri Sai Chetan, Shaik. Lal Fareed Sha, and deployable. The program was conducted on Revanth Nunna, and Sattarapu Rahul. Along with the winner certificate, the add-on perk is that of October. It was a 1.5 day training, followed by the team is awarded with cash prize of 1 lakh rua 24 hour hackathon. The HoD of IT department, pees, if they win the state level award. The win-Dr. K Srinivasa Reddy, has organized this ning teams of the national level event will be



CSE Departmental Activities



2019 has been a year of achievements for the Computer Science and Engineering department of the Institute of Aeronautical Engineering. Under the able guidance of the heads of the department, Dr. K Rajendra Prasad and Dr. P L Srinivasa Murthy, the students and faculty of this department have shown their capabilities. The students, Sai Charan Pedduri (16951A05F3) and Sai Ruchith Reddy Ginnavaram (18951A05G4) won the best paper award and a cash prize of Rs. 5000/- at the CCSN International Conference 2019, for "Photo Realistic Image Synthesis Using Spade Algorithm" under the guidance of Dr. Madhu Bala Myneni and Padmaja B from the Department of Computer Science and Engineering.

ment, received the "Sarvottam Aacharya ager, Teradata, addressed the students and Puraskar" 2019 - Best Teacher Award by the IT shared information about Cloud Computing ap-Association of AP and Telangana on the 2nd of plications. The topics covered during the work-October, 2019. On the 24th of October, 2019, she shop included definitions, characteristics, also bagged the Unsung Hero Award for 2019- benefits, challenges, four deployment models, 20 for exemplary work in leadership and re- and three service models which were Cloud Arsearch by CII- IWN at the leadership conclave. The department also conducted a workshop on less IP addressing; AWS and azure concepts; the 4th of September, 2019. Guest lecturer, Mr. and Security, storage, and virtualization.

Dr. Madhu Bala Myneni, Professor, CSE depart- Sandeep Manoj Burri, Cloud Operations Manchitecture: NIST reference architecture, class-

MARGADARSHI

Placement and training (PAT) officer of Institute of Aeronautical Engineering, Miss. P. Shrutilaya, has been felicitated with the "Margadarshi" award on 2nd October 2019, on the occasion of Gandhi Jayanthi. Telangana Information Technology Association (TITA), and Information Technology of Andhra Pradesh (ITA), Indian Servers and Lions Club of Vijayawada organized Nav Bharata Nirman Award Presentation. Miss Shrutilaya received the award from Senior IPS Officers, Dr. Chakrapani, Dr. S Sageswara Rao, and Dr. Sridhar Babu.



Computing, Communication, and Sensor Networks (CCSN) - 2019





On 19th, and 20th October of 2019, the Interna- Network, Hybrid Intelligent Systems, Hybrid of tional Conference on Computing, Communica- Soft Computing and Statistical Learning Tech-Networks(CCSN) was Sensor and organized by the Institute of Aeronautical Engineering. CCSN is a major annual international Hybridization with Novel Computing Paradigms, conference to bring together researchers, engineers, developers, and scientists from academia and Cloud Computing, Computational Biology and industry working in all interdisciplinary areas and Bioinformatics, Fault Detection, Isolation of computing and communication engineering fields to share their experience. The event was tronics, Big Data Storage Technology and Netco-organized by Applied Computer Technology, Kolkata. The general syntax of such confer- of the event, when all the papers were submitences include authors who are invited to submit ted, few of them were accepted and were pubtheir original and unpublished work based upon lished in proceeding book. Some good and their research and observations. The themes of expanded versions of papers will be forwarded CCSN 2019 were Soft Computing, Swarm Intel- for publications in the journal of Microsystems ligence, Combinatorial and Numerical Optimiza- Technologies of Springer Nature SCI indexed tion, Computer Networks, Security and Coding and impact factor=1.58, while other papers will Artificial Immune Systems, Wireless & Mobile be forwarded in other SCI/SCOPUS journals for Communication, Sensor Networks, Body Sensor publications.

niques, Nature-Inspired Computing Techniques, Nano devices, VLSI System, Circuit and Design, Image Sensing and Processing, Parallel, Grid, and Recovery, Bio-Technology & Medical Elecworks, and Digital Signal Processing. At the end





IARE Comes Together for Consortium 2019





Consoritum is a national level technical fest conducted by Institute of Aeronautical Engineering every year. Consortium 2019 has seen wider and larger audience than ever with various events that took place on 20th and 21st of September, 2019. The organizers of the event were highly appreciated for their efforts. Students also performed flash mob with the dance crew of IARE known as "Plugs", on the evening of 20th September. On 21st September, IARE hosted a comedy show "Main Samay Hoon" by Samay Raina. Students put up various food stalls which attracted many customers. All the technical events took place with atmost discipline and many students went home as winners. Huge participation by students and all the guidance provided by the faculty was highly appreciated.





Department of Computer Science and **Engineering**

tium, the Department of Computer Science and which was primarily a coding contest where the students a chance to showcase their talents and interests. The Department of CSE hosted tech- 2 rounds. The final winner of the contest was nical events like a workshop on Artificial Intelli- awarded Rs. 1500. The third technical event was non-technical events included Screnema and SnapIT among others.

The Artificial Intelligence workshop was a two- was awarded a cash prize of Rs. 2500. SnapIT day Bootcamp on Artificial Intelligence and IBM Watson: The Bootcamp included lectures and discussions on how Watson works alongside hands-on exercises that developers can use to there were two rounds. In the first round, the studoes, what it doesn't do; how it works so that de- pus followed by the second round, where the velopers can build solutions for industrial needs. students were given a particular place where The agenda for the Day 1 resembled as follows: they had to click a shot. The winners were Introduction to Artificial Intelligence, IBM's Cog- awarded a cash prize of Rs. 2000. Screnema nitive Point of View, Building a Chatbot with was the second non-technical event which was Visual Recognition. Lab Exercise Day 2 saw the values', with time limit of 5 minutes. The winner implementation of Watson Discovery Introduc- of the contest was awarded a cash prize. Great tion, Getting Started with Watson Discovery Lab efforts were put both by student coordinators standing (NLU) Introduction, Getting Started with tive events successful. The continued zeal to NLU Lab Exercise, Cognitive Examples Demos/Use Cases. Another spectacular techni-

As an integral part of college fest The Consor- cal event that took place was the "Pro-coder" Engineering performed meticulously to bring the students' programming and logical skills were put to the test. This coding contest constituted of gence, Procoder, and Paper Presentation. The the Paper Presentation, where students presented a written report with a hypothesis, giving justification on any particular topic in the field of software technology. The winner of this event was a photography contest that was conducted under two categories: Mobile Photography and DSLR Photography. In each of the categories gain a better understanding of what Watson dents were to click a shot over the college cam-IBM's Watson Assistant Service Lab, Speech to a short film contest that scrutinized the students' Text Lab Exercise, Text to Speech Lab Exercise, creativity in shooting a film on the theme 'moral Exercise, Watson Natural Language Under- and the faculty coordinators to make the respecparticipate and exhibit innovative ideas and notions was appreciated by all.





Department of Electronics and **Communication Engineering**

On the 20th and 21st, Sept 2019, the Institute of Aeronautical Engineering (IARE) hosted the national level technical fest The Consortium 2019. In this event, the Electronics and Communication Engineering (ECE) department conducted three technical events: Robotics, Technical Hunt and Paper Presentation. The Robotics event witnessed a very interesting course of three distinct events, namely: Ontrack robotics, RC showdown, and Tunnel Turner. The Ontrack Robotics event was to test the linearity of the robot by means of being able to follow a black line. The winners of this round were from Team Ravindher.

The RC Showdown was a very thrilling event Sensor Technology, Evolution of 5G, Plastic that witnessed a war between two controlled Solar Cell Technology and VLSI Logic Circuit cars. The winners for the RC showdown were using Silicon Transistor. The winners of Paper from Team Tagore. The Tunnel turner was an Presentation were from Team Revathi, Team exhilarating event that saw the working of obsta- Vamsi, and Team Harshitha. The technical hunt cle-detector robots. The two winners of this winners were from Team Sandeep and Team round were Team Sanketh Sagar and Team Rohit Babu. The prize money and certificates Harsha. The five main themes of the Paper Pres- were given by the Heads of the Department, Dr. entation were: Applications of Nanotechnology, Ashok Babu and Mr. D Khalandar Basha.







Department of Mechanical Engineering

The mechanical department at The Consortium another event which was judged by Mr. BVSN hosted various competitions and a workshop RAO and Mr. Anudeep. The Winners were P. which saw participation of students of all Sachin, Sameer Joshi, Abhishek and Sambhavi branches from MLRIT, MLRIM, Malla Reddy col- Guptha who all took the first place and B. Jahlege, CMR and IARE. The goal of the depart- navi, K. Mounika and T. Mounika took the secment's contribution to the college annual fest ond place. The next event, Clay Prototype was was crisp and clear - to get students ready for judged by Mr Arvind reddy and Mr. Sadananthe industry. The events were planned and con- dam. The winners were M. Sai Sharath and J. ducted for a duration of two days. The Paper Omeshwari took first place, and Rupa and Tarun Presentation Judges were Dr. P. Raghava and took second place. Students presented their Dr. CH VKNSN Moorthy. Students presented ideas and solutions in the Poster Presentation. their research papers on various topics. The The fest also saw innovative prototypes and Winners were K. Saikrishna who took the first models at the Project Expo. All design enthusiplace, and S. Shivanaga Sathvik and ASC Sid- asts got a chance to develop their skills at the dhartha took the second place. Auto Marvel was 3D Printing Workshop.





Department of Electrical and **Electronics Engineering**

eral IQ and Current Affairs. The next event of the cash prizes worth Rs. 600 and Rs. 400.

EEE department of IARE has coordinated their fest was Fast Fun and Furious (F3), where events successfully at The Consortium 2019. Round 1 dealt with solving puzzles and mazes, Total of 14 student groups have made their way round 2 dealt with Light the Dim where particithrough to earn the cash prizes ranging from Rs. pants are required to light an LED using a circuit. 500 to Rs. 1500. Students have shown great en- Time is a constraint in this event hence the thusiasm in participating. The first event of the fastest fingers have won the game. Two of the fest was the Technical Quiz. It included three teams have won cash prizes worth Rs. 800 and rounds with Round One dealing with questions Rs. 400. The last event was the paper presenof Aptitude and Logical Thinking, Round Two tation. Five teams participated in this event and dealing with basic Science questions and Round have presented their research papers on varithree consisting rapid fire questions from Gen- ous topics. Two of Five participated have won

Department of Civil Engineering

On 20th of September the morning session performers to help them showcase their talents started with Paper Presentation of 5 to 10 min- of designing. The competition motivates stuutes. Each participant had to present their re- dents to think, create and exhibit innovative desearch paper in teams of 2 on the following signs on a global platform for projects that can topics: Intelligent transport system, Chemical re- be practically implemented. This event had 2 sisting concrete, Remote sensing application in rounds namely, Auto Cad - 2D and Revit, each water resources, Ground improvement tech- 30 minutes long, having individual performers niques, and Wastewater management. Project showcase their designs. The afternoon session Expo was conducted in the afternoon session started with the Bridge Mockup which is a prowhere a model was constructed in front of the totype that provides the functionality of a system judges with the primary rule that there should be and enables testing of a design for load bearing no model made with thermocol, and a team should have maximum of two students. A new day started on 21st with the Cadovation event, which was a progressive step to motivate and encourage young designers with their participation. This competition identified the best student 90 minutes with teams of 2. Many students won designers and rewarded them. The competition was designed to provide a platform for technical

capacity, which is one of the earliest forms of construction. It should bear loads of the elements resting upon it by conducting its weight to a structure. Materials were provided for this competition. This event was for 60 minutes and cash prizes for winning in these events.

Department of Information Technology

events successfully at The Consortium 2019. pated in the game, out of which 3 have won cash Many students formed teams and have made prizes worth Rs. 1500, Rs. 1000 and Rs. 500. their way through to earn the cash prizes ranging LAN Gaming, Asphalt 8, and Counter Strike from Rs. 500 to Rs. 1500. Students have shown were conducted. Forty teams took part in this great enthusiasm in participating. Chasse-au- event and five of them were awarded with cash code was a event conducted which consisted of prizes. Paper Presentation was conducted group of three to four players try to find a hidden where students presented their research papers code following a series of clues. This game was on various topics of science and technology. meant for fun and relaxation. It was a Treasure

IT department of IARE has coordinated their Hunt alike game. A total of 42 members partici-





Street Cause - IARE Another Day, Another Time



Street Cause is an NGO comprising of students who intent on doing their bit for the betterment of society. This October, street cause gifted RO water purifier and benches to Srikara Deaf and Dumb school, Hasmathpet, Bowenpally for which the Chairman of IARE, Mr. Rajashekar Reddy graced his presence as the Chief Guest. Shortage of benches and no proper drinking water at Srikara Deaf and Dumb school was resolved by IARE Street Cause, by gifting them with benches and 25 litre per hour water purifier. The Chairman of IARE, Sri M. Rajasekhar Reddy, and IARE Street Cause distributed 26 three-seater benches which can offer seating arrangement for 78

students. A total of 27 students of IARE Street Cause attended and this was marked as their third event for this academic session under Teja Kandala (Divisional President of IARE Street Cause). The school has a strength of 250 members of deaf and dumb students. "It was very dispiriting to see those students without proper facilities. It becomes a time for self learning after visiting them", says Teja. Srikara School students were filled with joy and happiness after spending time with Street Cause members. Mr. Rajashekar Reddy was felicitated with a big thanks giving gesture from all the street cause members. "There is a new experience and new lesson to be learnt in every project of Street Cause. It really brings out the humanity and the responsibility of people towards the society. We thank the almighty for giving the best team and a big helping hand to the needy people. There is always a magical moment felt after helping them. It is really an inspiration. The funds we collect is the pocket money of students and team members. We encourage people to join us and lend a



helping hand. The college management has also taken a huge responsibility towards IARE Street Cause and we will always be thankful to them and the people who donated funds. Our next plan is to visit an orphanage and teach them about the importance of education with the help of videos and PPTs. We are planning to execute this in December", said a member of IARE Street Cause Team. Their first project was a school renovation in Mehadipatnam which was funded with Rs.1,10,570 to construct washrooms, manhole systems, hand wash area, steps, sinks, and wash basins. The second project of Street Cause IARE which was funded with Rs. 30,000 was used to provide sports equipment to Chevella Girls' School in Ranga Reddy District.



sional Sujith president,

IARE Street Cause Team com- environment), Vinitha Reddy - IT, S Mayukha - IT, Nitin Baradprises of Teja Kandala - Divi- Vice president (Women Em- hwaj - IT, T Subha Chandrika -- powerment), M. Anusha (Ex- Aero, K Sai Charat Koushal -Treasurer, Harsha Varma - Vice president 2018-19, Hr and Aero, S.Samyuktha - ECE, president (digital, documenta- Alumini 2019-20), Sankeerth - NLVDNS Varsha - Aero, Ch tion head, media and publicity), Ex Vice President (2018-19), Karthik - Ece, Y Mrinal sai Kaushik Ballari - Vice president Mounish - Ex treasurer (2018- Raghavendra -(orphanages, old age homes, 19), K. Pranay Teja - Mech, Sri- Sucharitha - Ece, M.Madhunschools), Sumanth Sree - Vice harsha - ECE, Y Anudeep - IT, isha - Aero, Meghana - Aero, President (social initiatives and K Tanmayee - IT, A Harshitha - Sainath - Aero, Nikitha - IT.



WWF - Well Wishers Foundation







Today's world has become a place where people have become so self centered and are leading lives of sumptuousness oblivious of sufferings of poor, pathetic climatic conditions and the ignorant mindset towards very important things in terms of sustainability. Five school students started the Well Wisher's Foundation -WWF, with the main aim to fight against pollution by recreating alternatives for pollutants

like plastic and take anti-pollutant safety meas- local cantonment leaders. Anti-pollution mask to make the world a better place to live in.

Very recently, they have completed three major an add-on to this mask which is made of cotton. projects, one being the distribution of cloth bags, paper trays as an alternative of plastic bags in 'Reliance Bazar' in the presence of Begumpet lapochampally, yet again, with the support of Sri ACP, BJP MLC Ram Chander Rao, Bonthu Marri Rajeshekar Reddy Garu. Sridevi, W/O Bonthu Ram Mohan, along with

ures while also helping the poor and orphaned. distribution at GHMC office in Medchal-Malkajgiri They believe that as a responsible citizen, the to the GHMC workers for their sanitation in the best fit to find yourself is to lose yourself in the presence of Sri Marri Rajashekar Reddy Garu, service of others. With atmost determination, the the Chairman of IARE was their second project. students formed this Organization and are trying This mask is ISO certificated for its three-layer filtration process and the comfortable design is For their third project, they distributed over 25 benches to the Government school of Gund-

Science and Technology

"A Pale Blue Dot"

engineering.

The dot here might not seem of any particular interest but the truth is, this is where we live. Yes science and engineering, we today wouldn't it is our Earth, our home. We are living on an in- have achieved this much. Science is a way to significant mote of dust. How fascinating is this? discover ourselves. Science is a way of life. Sciare 750 crore people on this tiny planet, we made our lives simpler through science and enmight be alone in this vast universe containing gineering. We made mathematics the language some billions of galaxies, stars and planets. We of science and engineering. The scientists and are a bunch of miniatures evolving daily opti- engineers all around this pale blue dot who had tion, we feel amazed, things that are today our human community wouldn't have come to weren't there yesterday and may not be present this level are always appreciated. They made tomorrow. We are evolving everyday in terms of our lives simpler. The dedication, passion and technology and new discoveries. But while love towards science should always continue at thinking about this, a question arises, how did it the same pace so that we move forward as a all begin? From striking two stones against each community. Although our existence is insignifiother for spark to operating nuclear reactors, cant in this vast universe, we have discovered how did it all happen? From counting the stars the mysteries of the universe and have come in the sky to placing satellites around them, how this long. This is our strength, this is the power means of modern communication, how intrigu- people we should continue to extend our work ing is this? And from thinking to making ma- in every area of research. Thought we are rechines think, how fascinating is this? Everything, stricted to a pale blue dot, our imagination can every development, every comfort we are hav- travel through this vast peaceful universe. ing today, has taken a lot of time to attain this - V. Abhijith Tej, Editor

A tribute to imagination, thought, science and level, but behind this, there's hard work of millions of scientists and engineers. Human mind is always inquisitive, without the love towards Are we such minute? Yes, we are. Although we ence expresses itself through engineering. We mistically. Whenever we look back at our evolu- dedicated themselves to science without whom, had we come this long? From hand signs to all of our imagination, and as a bunch of optimistic

"Milky Way's supermassive black hole exploded 3.5 million years ago"

A recent study has shown that too big to have been triggered lowing the trail, it was found tralian-US research team be- eye, shining about 10 times - Vennela Manmohan, Editor lieves that this explosion was fainter than the full moon. Fol-

a supermassive black hole, by anything other than nuclear that the Milky Way's active his-Sagittarius - about 4.2 million activity associated with the su- tory includes giant bubbles of times bigger than the sun, had permassive black hole at the gas ballooning from the disk of exploded due to nuclear activ- center of our galaxy. This the galaxy. Scientists now feel ity. The burst, known as a means that the Milky Way's that Sgr A could be the future of Seyfert flare, created two huge center transitioned from an ac- astrophysics like searching for 'ionization cones' of radiation, tive to a quiet phase recently in life signatories around various which flared to both poles of the Earth's history, possibly when planets. These new results galaxy and out into deep space. early human ancestors were open a completely new possi-The impact was felt at an aver- roaming the planet. If they bility for a reinterpretation of its age of 200,000 light-years looked up towards the Milky evolution and nature. Studies away from the Milky Way at the Way, they could have seen this are yet being conducted for the Magellanic Stream. The Aus-huge explosion to the naked new learning of this explosion.

World Today

"US, UK Sign Deal to Access Data from Tech-Companies like Facebook and Google"

The U.S. and the U.K. have signed a first-of-its- new agreement will reduce this process to kind agreement that will allow agencies in the countries to access data from tech companies more quickly in criminal investigations. Police and intelligence agencies are to be given expedited access to electronic communications sent by terrorists, serious crime gangs and white-collar criminals, under a new agreement between the U.K. and the U.S. The pact will allow U.K. authorities to go directly to tech companies like Facebook, Google or Twitter for evidence in cases related to terrorism, child sexual abuse, other serious crimes. U.S. officials will also be able to receive access to British communication service providers. It takes police and security and access electronic data between the U.S. ment. and U.K. governments. Officials believe that the - Mokshitha, Editor

"weeks or even "days". Data from the company shows that Facebook received just over 7,000 such requests from British authorities in the second half of last year. U.S. technology companies including Facebook, Google, and Twitter to hand over the content of emails, texts and direct messages to British law enforcement bodies, and require the same of U.K. companies holding information sought by U.S. investigators.

The statement by Facebook said, "We strongly oppose government attempts to build backdoors because they would undermine the privacy and security of people everywhere", while Twitter declined to comment on the new agreement, and services from six months to two years to request Google was not immediately available for com-

"Protesters fight against Hongkong's surveillance"

Hong Kong. Protesters in Hong Kong fear they are being watched and tracked when on the streets and just showing up may expose them to retaliation from the government. Since the pro-democracy movement started in June, there have been over a thousand arrests recorded. They might be charged based upon camera footage, geolocation data from mobiles, etc. The with tinfoil hoping the law enforcement officials mainland China. won't be able to scan the IDs remotely using radio frequency identification chips embedded

The experimental operations to increase surveil- in Hong Kong identification cards along with lance in Hong Kong have led to fear in the pro-their subway and credit cards. People of testers against China's growing control over Hongkong have the right to not reveal any knowledge that might incriminate them. People have started using only the passwords and passcodes instead of face recognition and finger print. More hardcore protesters have started ripping off the cameras or spray painting them to blind them completely. Police, on the other hand, have come up with their tactics to tag protesters, like using water cannons with blue dye. scary part is that no one knows what data Hong The protesters seem to continue and won't stop Kong law enforcement is sharing with Chinese until the government meets their demands, inlaw enforcement. People have started using cluding an inquiry into police brutality and direct protective gear, and are sharing files using Air- elections. The Hong Kong government took drop, creating online groups on Telegram, a pri-some action like withdrawing a controversial exvacy-friendly, encrypted messaging app, etc. as tradition bill that sparked the protests. But in the tactics. Many protesters carry around laser end, the odds are stacked against them. It's espointers to distract police and also blind cam- sentially a group of young Hong Kongers with eras. They are wrapping their Hong Kong IDs laser pointers and umbrellas against the will of

- Akshay Gangadhar, Editor

"Let's wage a war on plastic!"

Single use plastic is used by almost all consumer facing industries including food processing and food delivery, retailers for packaging and selling finished goods, pharmaceuticals and agriculture. The plastic discarded at landfills slowly degenerates into small fragments and leeches cancer causing chemicals into groundwater. Plastic which is very light in weight, floats on water bodies and clogs airways of marine animals. Due to this various chemicals enter the human food chain endangering marine life. Plastic has engulfed the world and become an existential threat to most of the living norms. While the problem is global, the war against plastic should be fought locally. PM Modi has addressed this at the G7 summit, highlighting India's large scale efforts to rampantly eliminate single-use plastic. He also urged people to observe the 150th birth anniversary of Mahatma

Gandhi to make India plastic-free and adjourned Municipal corporations and NGOs to come up with ways for safe plastic disposal. His appeal to the working professionals to innovate ways to recycle plastic, is expected to be fruitful. A huge response followed his Independence Day's address wherein he urged people to shun plastic and use eco-friendly bags. The government has to fund research for materials which can substitute plastic. Meanwhile imposing heavy fines will act as a deterrent to the proliferation of single use plastic. Since the year 1950, about 9 billion tonnes of plastic has been produced globally which is equivalent to more than four Mount Everest of waste and almost 44 percent of it being produced after the year 2000. A whopping 79 percent of all plastic produced since 1950 is still in the environment. So it's high time we stop using single use plastic and find better ways to make our environment harm free.

- Rohit D, editor

"The Great Green Wall Of Africa: Homo Sapiens' Solution Of Desertification"

has become a serious problem for more than heart of Africa. Several organizations have five decades and every country is getting its agreed to fund this operation such as World share of punishment. For Africa, the cradle of Bank and GEF (Global Environment Facility). civilization, it has been worse. With the Sahara Senegal has made the most progress by plantdesert occupying most of its continent and with ing 50,000 acres of trees. It is already working the Equator, it is a land of scanty rainfall. Therefore, climatic changes tend to be rather nasty groundwater and preventing dust from the Saand troublesome for them. More and more land hara. People are hoping that it may lead to an of Africa suffers desertification. It has led to a increase of Lake Chad which has depleted by major food crisis in the Sahel. So, to stop the Sa- over 95% from 1960. People are benefitting as hara from spreading, several African nations they can rear cattle and cultivate crops at the have come together with a proposition i.e., to same time. But this can only be possible if all the being used are Acacia Nilotica (which are ficient working shows us that there's still time. drought resistant). It is supposed to be 15km - Vaishnavi, sub-editor

Increasing climate change and global warming wide and 8000km long spreading across the as the trees are leading to rejuvenation of build a great green wall full of trees. Burkina countries involved in this participate actively Faso, Djibouti, Eritrea, Ethiopia, Mali, Maurita- without cutting funds. There is also the problem nia, Niger, Nigeria, Senegal, Sudan, and Chad of trees dying due to a lack of their natural habihave come together as PAGGW (Pan-African tat. But these problems can be easily covered Agency of the Great Green Wall). Their main aim with a proper agenda. From this example, the Inis to stop desertification. It is regarded as possi- dian government is planning to build a green ble, as old murals and paintings depict that Sa- wall along the Aravali mountain ranges to stop hara had fertile lands. Their motto is "Africa's desertification as well as to stop the smoke from flagship initiative to combat land degradation, Pakistan. This is the best solution the world has desertification, and drought." The plants that are taken against global warming till now and it's ef-

"Fridays For Future"

"No one is too small to make a difference" -**Greta Thunberg**

What started out as just another average school girl with a placard in August 2018, led to the largest global environmental strike in history. Greta Thunberg, a Swedish 9th grader in 2018, decided to not attend school until the 2018 Sweden general elections (9th September) after the heatwaves and wildfires in Sweden. She skipped school every day during school hours to protest in front of the Swedish Parliament holding a sign that read "Skolstrejk för klimatet" ("School strike for the climate"), to urge their leaders for immediate action and laws for the rapid climatic changes. On 7th Sept 2018, Greta announced that she would continue striking every Friday until the Swedish Parliament would put the Paris Agreement into execution. The Paris Agreement "urges nations to work towards a shared cause to undertake efforts to combat climate change and to adapt to its effects." The Paris Agreement's key objective is to subject nations and the people of the nations to self-actualization to the threat of climate change by keeping a global temperature rise this century below 2 degrees Celsius. It also aims to strengthen the ability of countries to deal with

the impacts of climate change. What started as a school strike for the climate snowballed into a Youth Strike for Climate, and lastly into FridaysForFuture, which was coined by Greta. Greta inspired hundreds of thousands of school children to fight for their future. Her powerful speech at the UN Climate Summit, New York on 23rd September 2019 was delivered to all the world leaders who are taking no action to implement laws to combat climate change. The Global Climate Strike Week took place from September 20th to September 27th. Youth from all over the globe took place in protesting. The protests took place in India and Hyderabad as well. It is pretty clear from researches and surveys that people of the West are prone to consumerism. Instead sustainable consumerism must be maintained in response to the biggest challenge humanity has ever faced. Sustainable consumerism includes the use of alternatives of plastics, alternative methods for disposal of waste instead of incineration/ dumping waste into landfills, and implementing sustainable consumerism. Greta urges millennials and adults alike to retrospect while purchasing if it is sustainable to the environment or not.

In true Greta Thunberg- style, "I want you to act like the house is on fire. Because it is."

- Bhavana Priya, Editor

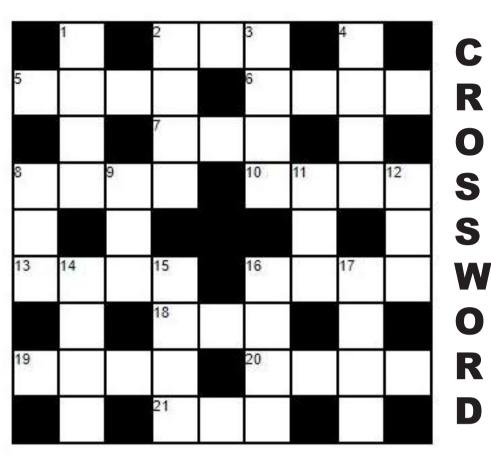
"Jetting Away.."

What do you do when someone doesn't follow jet was called back on purpose by the Saudi basic mannerisms? You don't let him fly in your Crown Prince as he was quite alienated by the jet! Imran Khan, the Prime Minister of Pakistan, diplomacy of the Pakistani Prime Minister during was in Jeddah before heading to New York for the session. attending the 74th UN General Assembly when Mohammed Bin Salman, the Crown Prince of vate jet to disembowel the Pakistani delega-Saudi Arabia, offered him his private jet, saying he couldn't allow his guest to travel in a commercial plane. But while the Pakistani Prime Minister was returning from the session in New York, on September 28, it was reported that the Saudi plane developed a technical glitch following which the Prime Minister and his delegation returned to New York and then took a commercial flight back to Pakistan. It is believed that the

"...He visibly snubbed Imran by ordering his prition..." claims the Friday Times Weekly Magazine. A Pakistani government spokesperson said that they were false claims and called it a "cooked up story", saying that the leaders of Pakistan and Saudi Arabia have good relations. "The report is aimed at political vendetta. We dismiss this report," the spokesman added.

- Moulshree Srivastava, Deputy Editor-in-chief

ARCADE SECTION



Down

- 2: Public Transport 1: Strongly encourage
- 5: Singing threesome 2: Soup dish
- 6: Transport 3: Demonstrate
- 7: Sci-fi Doctor 4: Weightlifting exercise
- 8: Scream 8: Sweet potato
- 10: Determination 9: Part of the mouth
- 13: Sulk16: Hop along happily11: Pen filler12: Hack off
- 18: Target towards a goal 14: Shrek, for example
- 19: Upper limbs 15: Vane direction 20: Secondhand 16: Self-satisfied 17: New thought

Send your answers to iarethecompendium@gmail.com

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Across

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SODOKU

8	4				7		1
				8		5	
		6					4
	7		1	3	4		
	2	3			1	9	8
			5				8
7	9						
				2			9
		8		4		3	

Previous Answers

2	7	1	4	5	6	8	9	3
8	5	6	1	3	9	7	2	4
3	4	9	8	2	7	1	5	6
6	3	8	2	9	4	5	1	7
9	2	5	3	7	1	4	6	8
4	1	7	6	8	5	2	3	9
1	8	3	9	4	2	6	7	5
5	9	2	7	6	8	3	4	1
7	6	4	5	1	3	9	8	2



HERE ARE SOME FACTS

Do you know?

All gold ever mined would fit into a cube of 25m. On a side.

Polar bears are nearly undetectable by infrared cameras

36 human hearts could fit inside a giraffe's heart.

The human eye has around 576 megapixels.

Kangaroos cannot walk backwards

Cheese is the most stolen food in the world.

A lightning bolt is 6 times hotter than sun's surface

Hippopotamus milk is pink

If you google the words "zerg rush", google will eat the Search page.