



Civilite from

DEPARTMENT OF CIVIL ENGINEERING

Volume 1 Issue II

NEWS LETTER

November 2019

VISION

To Become The Provider Of Eminence Quality Diploma Education In Civil Engineering And To Bring Out The Civil Engineers With Outstanding Technical Skills, Strong Ethical Values To Meet Current And Future Challenges And Leading Nation Towards Development.

MISSION OF THE DEPARTMENT

M1: To Offer Diploma Course In Civil Engineering That Produces Civil Engineers Of High Caliber And Technical Skills.

M2: To Promote Quality Education And Advanced Practical Skills In Areas And Sub Areas Of Civil Engineering To Meet The Needs Of Society And Industry.

M3: To Make Department As a Centre Of Excellence Of Emerging Technology In Areas Of Civil Engineering.

M4: To Create Engineers Who Effectively Adapts And Innovate Solutions For Built Environment.

M5: To Encourage Students To Pursue Higher Education And Various Careers Enhancing Course That adds Value To Students Competencies.

M6: To Have Interaction With Engineering And Allied Department Of State And Offer The Solution To Their Problems.

MISSION

To Provide Quality Technical Education At National And International Levels.



GOVERNMENT OF SIKKIM

EDITORIAL TEAM

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(Lecturer)
2. Prabhat Subba
3. Gopal Basnet

EVENTS

1. NATIONAL SPORTS DAY
2. TEACHER'S DAY
3. PARENTS TEACHER MEET
4. WORLD SUICIDE PREVENTION DAY
5. VILLAGE CAMP
6. CONSTITUTIONAL DAY

PEO'S

1. Learn and Integrate: Students will be able to identify, formulate and solve computing problems by applying their knowledge of mathematics, computer science, and scientific method.

2. Think and Create: Students will be able to model, design, implement and verify a computing system to meet specified requirements.

3. Communicate: Students will be capable of communicating effectively with team members, and working cooperatively, creatively, and responsibly as a member of a team.

4. Clarify Purpose and Perspective: Students will be aware of the benefits of developing their understanding and professional capabilities through lifelong learning.

NATIONAL SPORTS DAY

Prime Minister Shri Narendra Modi launched Fit India Movement through a live telecast today i.e 29th August 2019. The students of ATTC were made aware of this program through a live telecast show, organized by the NSS team of ATTC, NSS volunteers among students and NSS adopted village members in the college auditorium and were coordinated by Mrs.Srijana Rai. The occasion was graced by the Principal of ATTC, Mr. Sonam Palden Barfungpa and the guest of honour, Mr. Ganesh Chettri, Yoga Instructor from Patanjali Yoga Organization, along with ATTC faculty members and student NSS volunteers.



The Principal also announced the formation of Green Club of NSS, ATTC during this event. After the PM's inaugural function, a small yoga session was arranged for a group of students and teachers. The students as well as teachers also actively participated in physical exercises during the National Sports Day celebration.



TOTAL STATION

A **total station (TS)** or **total station theodolite (TST)** is an electronic/optical instrument used for [surveying](#) and [building construction](#). It is an electronic transit [theodolite](#) integrated with [electronic distance measurement](#) (EDM) to measure both vertical and horizontal angles and the slope distance from the instrument to a particular point, and an on-board computer to collect data and perform [triangulation](#) calculations. .

[Robotic](#) or motorized total stations allow the operator to control the instrument from a distance via remote control. This eliminates the need for an assistant staff member as the operator holds the [retroreflector](#) and controls the total station from the observed point. These motorized total stations can also be used in automated setups known as Automated Motorized Total Station (AMTS).



TEACHER'S DAY

Teacher's Day is a special day dedicated to all teachers celebrated every year to honor the teachers and appreciate their special contributions towards education. In India Teachers Day is celebrated every year on 5th September on the birth anniversary of Dr. Sarvepalli Radhakrishnan.

Dr. S. Radhakrishnan was very popular among his students and was highly honored and respected. Hence, Teachers Day is observed to celebrate the contributions of a teacher to the society and the nation. The day is observed with much joy by the students, who organize several events to entertain their teachers. Students give gifts to the teachers, sing songs for them, felicitate them and do lots of similar things to show their love and respect.

Hence, the students of ATTC also celebrated teachers day and organized a cultural function with many students taking part and showcasing their talents. A lot of performances were made by the students and also a lot of games were organized to be played by the teachers for their entertainment.



COLUMN

A **column** or **pillar** in [architecture](#) and [structural engineering](#) is a structural element that transmits, through [compression](#), the weight of the structure above to other structural elements below. In other words, a column is a [compression member](#). The term column applies especially to a large round support (the *shaft* of the column) with a [capital](#) and a *base* or [pedestal](#) ^[1] which is made of stone, or appearing to be so. A small wooden or metal support is typically called a post, and supports with a rectangular or other non-round section are usually called [piers](#). For the purpose of [wind](#) or [earthquake engineering](#), columns may be designed to resist lateral forces. Other [compression members](#) are often termed "columns" because of the similar stress conditions. Columns are frequently used to support [beams](#) or [arches](#) on which the upper parts of walls or ceilings rest. In architecture, "column" refers to such a structural element that also has certain proportional and decorative features. A column might also be a decorative element not needed for structural purposes; many columns are "engaged", that is to say form part of a wall.

PARENTS-TEACHERS MEET

ATTC conducted a Parents Teacher Meet on 8th of September 2019 (Sunday) for Odd semester 2019.

Test performance of students, software demonstration for online attendance checking, etc. and parent's feedback were discussed during the meetings followed by individual counseling of parents for respective departments.



QUOTES

“The road to success is always under construction”



SOIL STABILIZATION

Soil stabilization a general term for any physical, chemical, mechanical, biological or combined method of changing a natural [soil](#) to meet an engineering purpose.^[1] Improvements include increasing the weight bearing capabilities, tensile strength, and overall performance of [in-situ subsoils](#), sands, and [waste materials](#) in order to strengthen [road pavements](#).

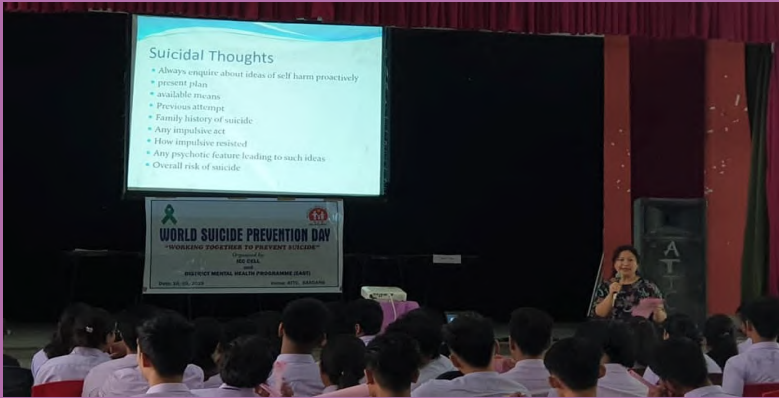
Some of the renewable technologies are: enzymes, [surfactants](#), [biopolymers](#), synthetic polymers, [co-polymer](#) based products, [magnesium chloride](#) and more. Some of these new stabilizing techniques create hydrophobic surfaces and mass that prevent road failure from water penetration or heavy frosts by inhibiting the ingress of water into the treated layer.

However, recent technology has increased the number of traditional additives used for soil stabilization purposes. Such non-traditional stabilizers include: Polymer based products (e.g. cross-linking water-based styrene acrylic polymers that significantly improves the load-bearing capacity and tensile strength of treated soils), Co-polymer Based Products, fiber reinforcement, calcium chloride, and Sodium Chloride.

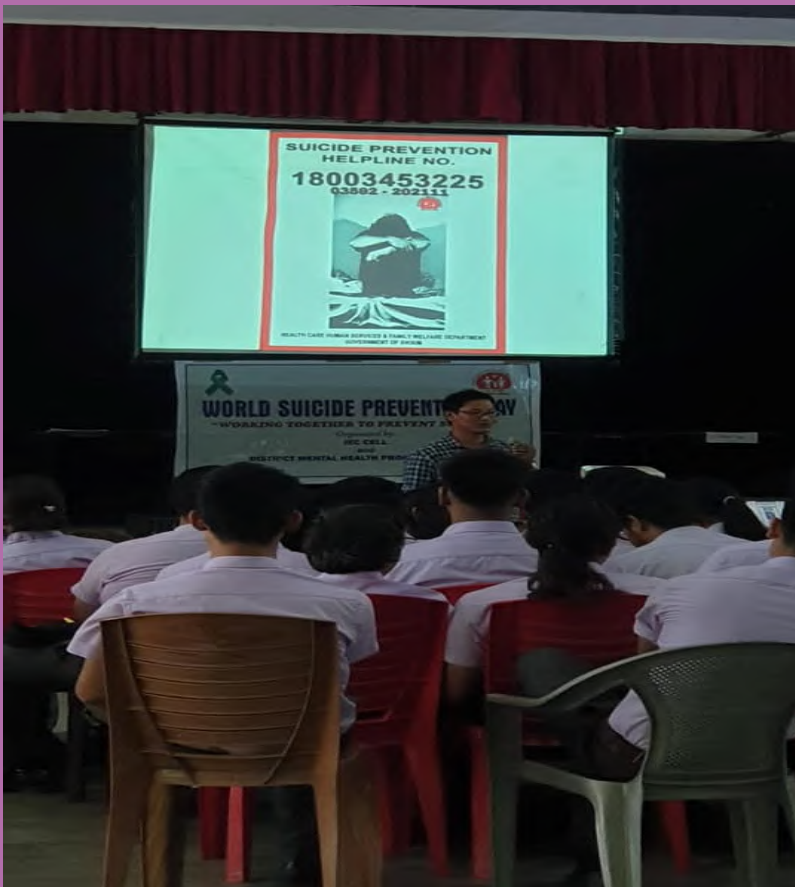
Soil can also be stabilized mechanically with stabilization [geosynthetics](#), for example, geogrids or [geocells](#), a 3D mechanical soil stabilization technique. Stabilization is achieved via confinement of particle movement to improve the strength of the entire layer. Confinement in geogrids is by means of interlock between the aggregate and grid (and tensioned membrane), and in geocells, by cell wall confinement (hoop) stress on the aggregate.

WORLD SUICIDE PREVENTION DAY

World Suicide Prevention Day was observed at ATTC on 10th of September 2019:



Presentations were given by Dr. Deki Wangmu Phempu, District Nodal Officer, Singtam District Hospital, Dept. of Health Care, Human Service & Family Welfare, Singtam, East Sikkim, Mr. Passang Sherpa, DEHO, Ms. Pinkey Bhutia, Counsellor, Ms. Sonam P Tongden, Psychologist and Mrs. Doma Bhutia, ASHA, to the students of ATTC on suicidal thoughts and coming together to prevent suicide etc.

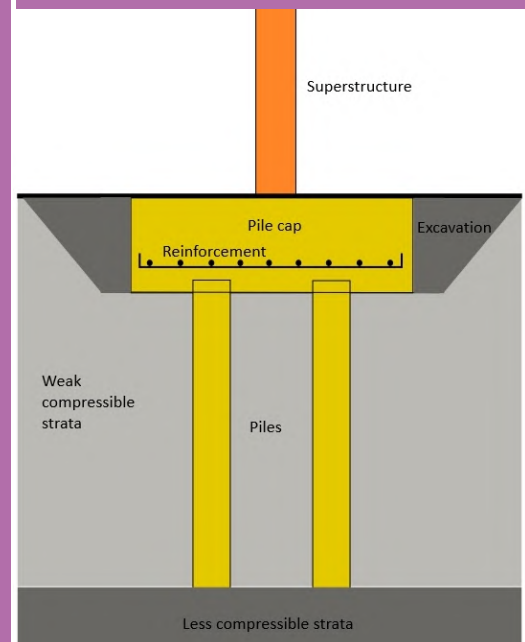


PILE FOUNDATION

Pile foundation, a kind of deep foundation, is actually a slender column or long cylinder made of materials such as concrete or steel which are used to support the structure and transfer the load at desired depth either by end bearing or skin friction.



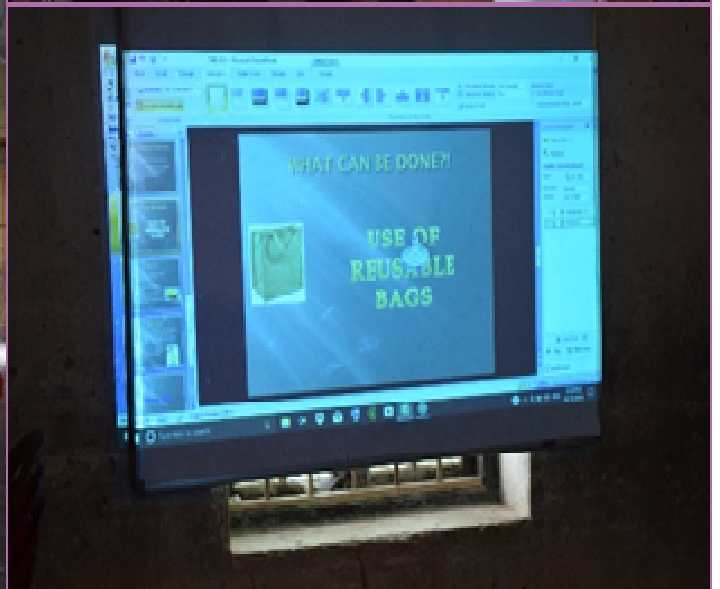
Pile foundations are deep foundations. They are formed by long, slender, columnar elements typically made from steel or reinforced concrete, or sometimes timber. A foundation is described as 'piled' when its depth is more than three times its breadth.



VILLAGE CAMP

The village camp for DCVE final year was scheduled from 23rd to 25th of October and the venue for the event was Phadamchen Secondary school. The main objective of the village camp was to visit a remote area and contribute a little help to the institutes over there. Some of the students painted the walls and decorated the walls with quotes while few others painted the blackboard. They also conducted a presentation on "Peer Pressure" and "Water Conservation" and also demonstrated some of the personal hygiene steps that needs to be followed for a healthy lifestyle. They also carried out quizzes, extempore competition and provided gifts to the students. Students of ATTC also distributed some fruits like apples and bananas to he students of Phadamchen school during their lunch break. Adding on, they also repaired the computer systems and the servers of their computer lab. Lastly, they conducted a 5S activity and cleaned their school ground and also the school campus.





CONSTITUTION DAY

ATTC celebrates Constitution Day on 26th November 2019 by reading the preamble in English as well as Hindi during the morning assembly.

