

**SCHOOL OF INFRASTRUCTURE**  
**DEPARTMENT OF CIVIL ENGINEERING**

Ref: 605 / Dean (Sol) / 1023

Date: 27.10.2023

**REPORT OF ONE - DAY WORKSHOP**

Date & Time	Speaker	Title	Venue
10.10.2023 & 09.00 a.m. - 04.00 p.m.	Mr. A. Selvam	DGPS, Drone and LIDAR: The future of Surveying Technologies	Seminar Hall, Dept. of Civil Engineering, BSACIST

**I. INTRODUCTION**

The Student Chapter of the American Society of Civil Engineers (ASCE), Department of Civil Engineering, School of Infrastructure organized an one-day workshop on “**DGPS, Drone and LIDAR: The Future of Surveying Technologies**” on 10.10.2023 from 09.00 a.m. – 04.00 p.m. at Seminar Hall, Department of Civil Engineering for the benefit of II Year B.Tech Civil Engineering students.

ASCE Student Chapter BS Abdur Rahman University

Crescent Institute of Science & Technology

Student Chapter of American Society of Civil Engineers (ASCE) Department of Civil Engineering School of Infrastructure

in association with LAND COORDINATE TECHNOLOGY organizing

**ONE-DAY WORKSHOP ON "DGPS, DRONE AND LIDAR: THE FUTURE OF SURVEYING TECHNIQUES"**

**DRONE**

**Resource person:**  
**Mr. A. SELVAM**  
Managing Director,  
Land Coordinate Technology,  
Chennai

10<sup>th</sup> October, 2023  
09.00am – 04.00pm

Seminar Hall, Department of Civil Engineering (1 floor, ES block)

**Student Co-ordinators**  
Mr. Udaya Prakash, President, IV yr. Civil Engg.  
Mr. Mohammad Yousin Mazid, Secretary, III yr. Civil Engg.  
Ms. Hamasree, G, Treasurer, III yr. Civil Engg.

**Faculty Co-ordinators**  
Dr. V. S. Priya, Asst. Prof.  
Ms. K. Kanmani, Asst. Prof. (Sr.Gr)

**Convener**  
Dr. M. S. Hajj Sheik Mohammed  
Professor & Dean (Sol)

**Invitation of One-day Workshop**

## II. ABOUT THE SPEAKER

**Mr. A. Selvam**, holds B.E. degree in Civil Engineering and M.E. in Construction Engineering and Project Management. He is currently working as Managing Director at M/s. Land Coordinates Technology, Chennai.



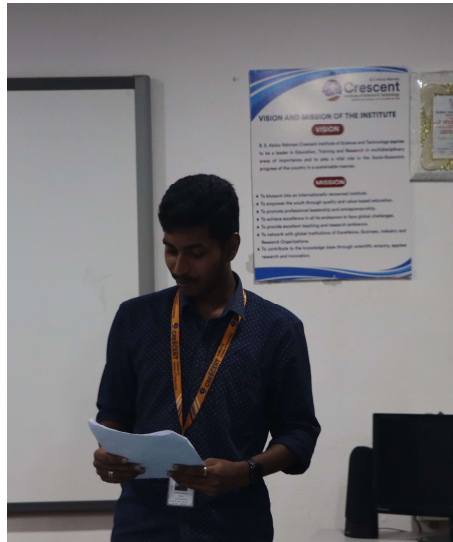
**Mr. A. Selvam**  
**Managing Director**  
**M/s. Land Coordinates Technology, Chennai**

## III. ABOUT THE WORKSHOP

As technology evolves, so does the land surveying profession. Technology is playing major part in all aspects of construction including surveying and the future of land surveying is rapidly evolving with new technologies, such as Drones, DGPS and LIDAR.

**Mr. Dheepak Kumar S**, the Student member of ASCE from II Year B.Tech., Civil Engineering extended a warm welcome to the dignitaries and the students. In his welcome address, he briefed about the significance of the ASCE and its role in helping civil engineering professionals in terms of technology advancements, etc.

**Dr. V. S. Priya**, Associate Professor, addressed the students and emphasized the importance of DGPS, Drones and LIDAR in surveying. Mr. Dheepak Kumar S, II Year B.Tech. Civil Engineering introduced the chief guest to the participants where he elaborated some of the significant projects executed by the resource person.



**Welcome address & Guest Introduction by  
Mr. Dheepak Kumar S.,  
Student of II year B.Tech. Civil Engineering**



**Felicitation by  
Dr. Priya VS, Associate Professor, BSACIST**



**Inauguration  
Left to right: 1. Ms. K. Kanmani, Asst. Prof. (Sr. Gr.)  
BSACIST,  
2. Mr. A. Selvam, Managing Director, Land  
Coordinates Technology, Chennai  
3. Dr. Priya VS, Associate Professor, BSACIST**

#### **IV SALIENT POINTS DISSEMINATED IN THE WORKSHOP**

**Mr. A. Selvam, Managing Director at Land Coordinates Technology, Chennai** began the discussion elaborating his contributions to the industry, specifically in the field of surveying. The speaker introduced the scope of surveying in India, highlighting the technologies that will have a significant impact in the upcoming years.



**Presentation of Mr. A. Selvam,  
Managing Director, Land Coordinates Technology,  
Chennai**



**Participation of Students**

Mr. A. Selvam explained about the purpose of measuring and mapping the Earth's surface, planning and design, construction, and asset management. The speaker also discussed about significance of new technologies such as drones, DGPS and LIDAR, and compared its advantages with respect to the traditional surveying method involving theodolites and levels.

The speaker briefed about the working principle of Differential Global Positioning System (DGPS) and also discussed about LiDAR (Light Detection and Ranging) which is a remote sensing technology that employs pulsed laser light to measure distances. The application of LiDAR in creating highly accurate 3D maps of the ground surface and its conjunction with aerial photography to produce detailed and accurate topographic maps was explained to the students. Finally, he also enlightened about the importance of Drones which is a popular choice adopted by the surveyors to collect aerial photography.

After a brief introduction session, the students were given a field demonstration in the Basketball court, BSACIST, with respect to the operation of drones.





**Demonstration of Drone Surveying**

**Awarding participation certificate to students**

The session was very much informative and the students clarified their doubts through a very active interaction with the speaker. At the end of the field demonstration, the participation certificates were distributed to the students by the resource person.

The following students and faculty members were present during the event.

**A. Faculty members**

1. Dr. Priya V.S., Associate Professor
2. Ms. K. Kanmani, Assistant Professor (Sr. Gr.)

**B. II Year B.Tech Civil Engineering Students**

SI. No	RRN	NAME
1	220011601001	AADAM GANI J
2	220011601002	ABISHEK P
3	220011601003	AFSAL AHAMED
4	220011601004	AHAMED NAEEM A
5	220011601005	AMEER SHAKEER S
6	220011601006	AMJATH T T
7	220011601007	ANANDHA KUMAR R
8	220011601008	ANBUSELVAN R
9	220011601009	AREEB ROHAN K
10	220011601010	ASHWITHA M
11	220011601011	DHEEPAK KUMAAR S
12	220011601012	FAISAL AHAMEED F S

13	220011601013	HALITH ISHA C
14	220011601015	MOHAMED JAFRON S
15	220011601016	MOHAMED MUBEEN
16	220011601017	MOHAMED RIYAZUDHEEN R
17	220011601018	MOHAMMED RAIHAAN R
18	220011601019	PRADEEP D
19	220011601020	PRADHEESH M
20	220011601021	RASETH IMAM NOOR
21	220011601023	ROSHAN AKTHAR M I
22	220011601024	SAI EASWAR S S
23	220011601025	SHARON AKRAM A
24	220011601026	SYED TALHA S H
25	220011602001	DEV L
26	220011602002	ISHAK AHAMED A
27	220011602003	MD ABUBAKAR S
28	220011602004	MOHAMAD NIZHAR.J
29	220011602005	MOHAMED ABU RIYAS S
30	220011602006	MOHAMED ANAS S
31	220011602007	MOHAMED FAAIZ S
32	220011602008	MOHAMED FAISAL
33	220011602009	MOHAMED FAIZAL
34	220011602010	MOHAMED KALIFA K
35	220011602011	MOHAMED SAMEER KM
36	220011602012	MOHAMED UVAIS M
37	220011602013	SHAFI AHMED S
38	220011602014	DANIEL MARIA SANTHOSH
39	220011602015	SYED RASHID MOULANA
40	220011603001	SHAHEED AFRIDI

Vote of thanks was proposed by the ASCE Faculty Coordinators and the organizer of this workshop, Dr. Priya V.S, Associate Professor and Ms. K. Kanmani, Assistant Professor (Sr. Gr.) thanked the Dean (Sol) for giving an opportunity for the students to interact with the experts from the industry. A memento was awarded to the resource person as a token of appreciation.



**Awarding memento to the speaker, Mr. A. Selvam**



**Certificate of Participation awarded to student**

#### IV. COURSE RELEVANCE

The students of II-year B.Tech., Civil Engineering (under Regulation 2021, R-2021)) are offered a course on CED1202 Surveying in their II semester. The main objective of this course is to explore the concepts of new and emerging surveying technologies through which the students will develop a thorough understanding of surveying. This one-day workshop on **“DGPS, Drone and LIDAR: The Future of Surveying Technologies”** is a value addition for this course because it familiarized the students with the latest technologies adopted in the surveying such as Drones, LIDAR etc . The knowledge gained by the students would also help them to execute their survey camp (CED2206 Survey and Soil Investigation Camp) even more efficiently in the upcoming IV semester.

**Ms.K. Kanmani**  
Assistant Professor (Senior Grade),  
ASCE Faculty Coordinator

**Dr. V. S. Priya**  
Associate Professor  
ASCE Faculty Coordinator

**Dr. M.S. Haji Sheik Mohammed**  
Dean (School of Infrastructure)