

THE STUDY OF AFTER BURNING GRATE & SUBMERSIBLE SCRAPER CONVEYOR -NNTPS

A PROJECT REPORT

Submitted by

DINESH KUMAR VM	922119114303
EMMAN ADAIKALA RAJ V	922119114304
MUKESH B	922119114305

in partial fulfillment for the award of the degree of

BACHELOR OF ENGINEERING

in

MECHANICAL ENGINEERING

**SSM INSTITUTE OF ENGINEERING AND TECHNOLOGY,
DINDIGUL – 624 002**

ANNA UNIVERSITY:: CHENNAI 600 025

May 2023



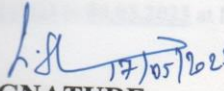

PRINCIPAL

Dr.D.SENTHIL KUMARAN, M.E., Ph.D., (NUS)
Principal
SSM Institute of Engineering and Technology
Kuttathupatti Village, Sindalagundu (Po),
Palani Road, Dindigul - 624 002.


ANNA UNIVERSITY : CHENNAI 600025

BONAFIDE CERTIFICATE

Certified that this project report "THE STUDY OF AFTER BURNING GRATE & SUBMERSIBLE SCRAPER CONVEYOR" is the bonafide work of "DINESH KUMAR VM (922119114303), EMMAN ADAIKALA RAJ V (922119114304), MUKESH B (922119114305)" Who carried out the project work under my supervision.


SIGNATURE

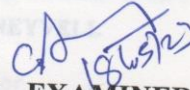
Dr.G.Sankaranarayanan, M.E., Ph.D.,
HEAD OF THE DEPARTMENT
Dept. of Mechanical Engineering,
SSM Institute of Engg. & Tech.
DINDIGUL-624002


SIGNATURE

Dr.V.Kandavel, M.E., Ph.D.,
SUPERVISOR,
Associate Professor,
Dept. of Mechanical Engineering
SSM IET, DINDIGUL-624002

Viva voce held on .18/05/22.....


INTERNAL EXAMINER


EXTERNAL EXAMINER

ii




PRINCIPAL

Dr.D.SENTHIL KUMARAN, M.E., Ph.D., (NUS)
Principal
SSM Institute of Engineering and Technology
Kuttathupatti Village, Sindalagundu (Pc),
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NLC INDIA LIMITED

("NAVRATNA - A GOVERNMENT OF INDIA ENTERPRISES")

CERTIFICATE

This is to certify that the project report titled "AFTER BURNING GRATE & REVERSIBLE SCRAPER CONVEYOR" is the Bonafide project report done by DINESH KUMAR VM, EMMAN ADAIKALA RAJ V, MUKESH B, in partial fulfillment of the requirements for the award of Bachelor of Degree in Mechanical Engineering from "SSM INSTITUTE OF ENGINEERING AND TECHNOLOGY" (Approved by AICTE, New Delhi, affiliated to Anna University, Dindigul) DINDIGUL - 624002, Tamil Nadu. During the period from 06.02.2023 to 04.03.2023 at NNTPS, NLC INDIA LIMITED, NEYVELI.

EXTERNAL GUIDE

RAJAVELU RACM/BOILER MAINTENANCE
ACM/BM/NNTPS
NEYVELI-607607

NLC INDIA LIMITED

NEYVELI

Permitted to submit the project report to college / university authority

CHIEF MANAGER,

LEARNING AND DEVELOPMENT CENTRE,
NLC INDIA LIMITED, NEYVELI.

DATE: 04-03-2023

PLACE: NEYVELI

Chief Manager
Learning & Development Centre
NLC India Limited, Neyveli-3.



PRINCIPAL

Dr.D.SENTHIL KUMARAN, M.E., Ph.D., (NUS)

Principal

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NLC India Limited

"NAVRATNA" - Govt. of India Enterprise

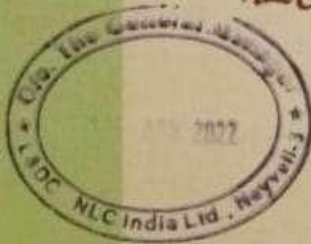
LEARNING & DEVELOPMENT CENTRE



CERTIFICATE FOR INTERNSHIP TRAINING

This is to certify that Mr./Ms. **DINESH KUMAR V.M. B.E/MECH**
SSM INSTITUTE OF ENGINEERING AND TECHNOLOGY, DINDIGUL. has undergone
Internship Training in **NLC India Limited, Neyveli** between
29.03.2022 and **11.04.2022**

NLCIL wishes him / her Success in all future endeavours.



Mr. D. Senthil Kumar

HEAD / L&D
LEARNING & DEVELOPMENT CENTRE

"Training adding Value to Life"

General Manager / L&D
Learning & Development Centre
NLC India Ltd., Neyveli-607803,



D. D. Senthil Kumar
PRINCIPAL

Dr. D. SENTHIL KUMARAN, M.E., Ph.D., (NUS)
Principal
SSM Institute of Engineering and Technology
Kuttathupatti Village, Sindalagundu (Pc),
Palani Road, Dindigul - 624 002.



LEO BUILDERS

PLANS-ESTIMATE-VALUATION-LAYOUT-SUPERVISION AND CONTRACT WORKS

"Valanagam", 17-16-10, K.K.Nagar (Near Ram Leela Hospital), Batlagundu-624 202.

M. Michael Joseph D.C.E.,
Engineer & Contractor,

Date:

IMPLANT TRAINING CERTIFICATE

This is to certify that Mr.S.ABUL BAJAR S/o M.Shajahan student of S.S.M.INSTITUTE OF ENGINEERING AND TECHNOLOGY, AKKARAIPATTI, DINDIGUL pursuing his 3rd year in B.E. (Civil Engineering) has completed his Training on LEO BUILDERS at Batlagundu. His period of training from 18 July 2022 to 12 August 2022.


ER. M. MICHAEL JOSEPH D.C.E., L.B.S
LEO BUILDERS
CONSULTING ENGINEER
LICENSED BUILDING SURVEYOR
K.K. NAGAR,
BATLAGUNDU - 624 202
CELL: 94864 85843




PRINCIPAL

Dr.D.SENTHIL KUMARAN, M.E., Ph.D., (MUS)
Principal
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Kuttathupatti Village, Sindalagundu (Po),
Palani Road, Dindigul - 624 002.

**PLANING ANALYSIS AND DESIGN OF A PRIMARY
HEALTH CENTER FOR RURAL AREA WITH R.C.C
ROOF**

CE8711 – CREATIVE AND INNOVATIVE PROJECT REPORT

Submitted by

ABULBAJAR S	922119103001
CHANDRAPRABHU A	922119103003
SAKTHI PRAGADEESWARI B	922119103701

In partial fulfillment for the requirement of award of a degree

of

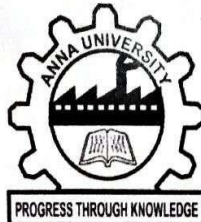
BACHELOR OF ENGINEERING

IN

CIVIL ENGINEERING

SSM INSTITUTE OF ENGINEERING AND TECHNOLOGY

DINDIGUL - 624002



ANNA UNIVERSITY: CHENNAI - 624025

JANUARY - 2023




PRINCIPAL

Dr. D. SENTHIL KUMARAN, M.E., Ph.D., (MUS)

Principal

SSM Institute of Engineering and Technology

Kuttathupatti Village, Sindalagundu (Pc),

Palani Road, Dindigul - 624 002.

BONAFIDE CERTIFICATE

Certified that this project report "PLANING ANALYSIS AND DESIGN OF A PRIMARY HEALTH CENTER FOR RURAL AREA WITH R.C.C ROOF" is the bonafide work of "ABULBAJAR.S, CHANDRAPRABHU.A & SAKTHI PRAGEDEESWARI.B" who carried out the project work under my supervision.


SIGNATURE

Dr.G.SELVABHARATHI,M.E., Ph,D

Associate professor &

Head of the Department,

Department of Civil Engineering,

SSM Institute of Engineering and

Technology, Dindigul- 624002


SIGNATURE

Mr.P.M.SHARANKARTHIK,M.E.,(Ph,D)

Assistant professor,

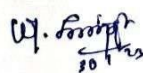
Supervisor,

Department of Civil Engineering,

SSM Institute of Engineering and

Technology, Dindigul- 624002

Submitted for the project viva-voce examination held on 30.01.2023


INTERNAL EXAMINER


EXTERNAL EXAMINER




PRINCIPAL

Dr.D.SENTHIL KUMARAN, M.E., Ph.D., (MUS)

Principal

SSM Institute of Engineering and Technology

Kuttathupatti Village, Sindelagundu (Po),

Palani Road, Dindigul - 624 002.

EXPERIMENTAL INVESTIGATION ON MECHANICAL PROPERTIES OF TRANSLUCENT CONCRETE

CE8811 – PROJECT WORK

Submitted by

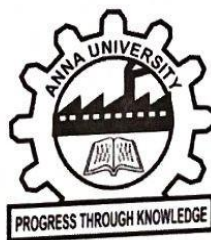
ABUL BAJAR S	922119103001
CHANDRAPRABHU A	922119103003
POORNACHANDRAN P	922119103008
SANJEEVI S	922119103010

In partial fulfillment for the requirement of award of a degree

of

**BACHELOR OF ENGINEERING
IN
CIVIL ENGINEERING**

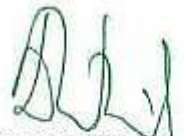
**SSM INSTITUTE OF ENGINEERING AND TECHNOLOGY
DINDIGUL - 624002**



ANNA UNIVERSITY: CHENNAI 600 025

MAY 2023




PRINCIPAL

Dr. D. SENTHIL KUMARAN, M.E., Ph.D., (MUS)
Principal
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Kuttathupatti Village, Sindalagundu (Po),
Palani Road, Dindigul - 624 002.

ANNA UNIVERSITY: CHENNAI 600 025

BONAFIDE CERTIFICATE

Certified that this project report "EXPERIMENTAL INVESTIGATION ON MECHANICAL PROPERTIES OF TRANSLUCENT CONCRETE" is the bonafide work of "ABUL BAJAR.S (922119103001), CHANDRAPRABHU.A (922119103003) & POORNACHANDRAN.P (922119103008), SANJEEVI.S (922119103010)" who that carried out the project work under my supervision.


SIGNATURE

Dr.G.SELVABHARATHI, M.E.,Ph.D.,

HEAD OF THE DEPARTMENT,

Associate Professor ,
Department of Civil Engineering,
SSM Institute of Engineering and
Technology,
Dindigul – 624002.


SIGNATURE

Mrs.C.MERLIN RANI, M.E.,

SUPERVISOR,

Assistant Professor,
Department of Civil Engineering,
SSM Institute of Engineering and
Technology,
Dindigul – 624002.

Submitted for the Project Viva-Voce examination held on 18/05/2023


INTERNAL EXAMINER


EXTERNAL EXAMINER




PRINCIPAL

Dr.D.SENTHIL KUMARAN, M.E., Ph.D., (MUS)
Principal
SSM Institute of Engineering and Technology
Kuttathupatti Village, Sindalagundu (Po),
Palani Road, Dindigul - 624 002.

INVOICE CREATION SOFTWARE - WEBUCKS

A PROJECT REPORT

Submitted by

AKASH.S	(922119104002)
DHANUSH KODI.R	(922119104009)
DRISHYA.R	(922119104011)
MADHUMITHA.M	(922119104020)

in partial fulfillment for the award of the degree

Of

BACHELOR OF ENGINEERING

in

COMPUTER SCIENCE AND ENGINEERING


SSM INSTITUTE OF ENGINEERING AND TECHNOLOGY

DINDIGUL

ANNA UNIVERSITY::CHENNAI 600025

MAY 2023




Dr. D. SENTHIL KUMARAN, M.E., Ph.D., (NUS)
Principal
SSM Institute of Engineering and Technology
Kuttathupatti Village, Sindalagundu (Po),
Palani Road, Dindigul - 624 002.

ANNA UNIVERSITY: CHENNAI 600025

BONAFIDE CERTIFICATE

Certified that this project report "INVOICE CREATION SOFTWARE - WeBucks" is the bonafide work of "AKASH.S (922119104002), DHANUSHKODI.R (922119104009), DRISHYA.R (922119104011), MADHUMITHA.M (922119104020) who carried out the project work under my supervision.


SIGNATURE


SIGNATURE

Dr.C.SUJATHA M.E., Ph.D.,

Ms.N.PADMA PRIYA M.E.,

HEAD OF THE DEPARTMENT

SUPERVISOR

PROFESSOR

ASSISTANT PROFESSOR

DEPARTMENT OF CSE

DEPARTMENT OF CSE

SSM INSTITUTE OF ENGINEERING

SSM INSTITUTE OF ENGINEERING

AND TECHNOLOGY

AND TECHNOLOGY

DINDIGUL - 624 002.


DINDIGUL - 624 002.

Submitted for the University examination on 17/05/2023


INTERNAL EXAMINER


EXTERNAL EXAMINER




Dr.D.SENTHIL KUMARAN, M.E., Ph.D., (RUST)
Principal
SSM Institute of Engineering and Technology
Kuttathupatti Village, Sindalagundu (Po),
Palani Road, Dindigul - 624 002.

Date: 07/02/2023

AKASH S

80/124D, NAGAMMAL KOVIL STREET,
GANDHINAGAR EAST, ODDANCHATRAM,
DINDIGUL-624619.

Dear Mr. /Mrs. AKASH S

With reference to your application and subsequent interview with us, we are very pleased to appoint you as an **"Intern"** in our organization on the following terms and conditions.

Date of Joining: 10/02/2023

Internship period: 10/02/2023 to 10/08/2023

Reporting Person: You will be reporting to **LOGANATHAN R**

Stipend: Your monthly stipend will be **Rs. 5000/-** during the internship period.

After the internship is completed, you will be carefully evaluated. Based on your performance, your CTC will be determined. If the performance is determined not satisfactory then the Reporting Manager and HR will provide an option to extend the internship (case by case basis), or the internship will come to an end and you will be offered relevant certificates for the time you worked with us.

Location:

You are expected to be present in our Pollachi office (6, 32, Kamaraj Rd, Arumugam Nagar, Mahalingapuram, Tamil Nadu 642002), but during the internship, you shall be posted / transferred anywhere within India or Outside India as per the need of the Company's requirement.

Duration:

The internship program is for a period of **6 months**. Based on your performance, ability to adapt to our working environment, you will be considered for a job opportunity with the Organization at the end of the internship program.

Please note that, during the internship period, if we find you not meeting our expectations and/or violating our company policies, we will end your internship with immediate effect.

Dr.D.SENTHIL KUMARAN, M.B., Ph.D., (MUS),

Principal

SSM Institute of Engineering and Technology
6, 32, Kamaraj Rd, Arumugam Nagar, Mahalingapuram, Pollachi, Tamil Nadu 642002
Kuttathupatti Village, Sindalagundu (Po),
E-mail: info@piraiinfo.com | hr@piraiinfo.com

Palani Road, Dindigul - 624 002.



Website: www.piraiinfo.com

Absence for a continuous period of three days without prior approval (including overstay on leave / training) would result in you losing your lien on the service and the same shall automatically come to an end without any notice or intimation.

Leave:

During the period of your internship, you will devote full time to the work of the Organization. Further, you will not be entitled for any special leaves other than public holidays and weekends. Prior Permission must be obtained from the HR / Reporting Manager for attending Project Presentations and any other College related work.

Key Guidelines:

1. You will not publish any article or statement, deliver any lecture, or broadcast or make any communication to the press, including magazine publication relating to the Company's products or to any matter with which the Company may be concerned, unless you have previously applied to obtain the written permission from the Company. This includes the project presentations and reports that might be submitted to the College.
2. You will be required to maintain utmost secrecy in respect of Project documents, commercial offer, design documents, Project cost & Estimation, Technology, Software packages license, Company policies, Company Patents and Trademark and Organization's employee, hardware, and software assets profile.
3. You will be required to comply with all rules and regulations as the Company frame from time to time.
4. Any of our technical / other important information which might come into your possession during the continuance of your service with us shall not be disclosed, divulged, or made public by you even thereafter.
5. If at any time in our opinion, which is final in this matter you are found non- performer or guilty of fraud, dishonest, disobedience, disorderly behaviour, negligence, indiscipline, absence from duty without permission or any other conduct considered by us deterrent to our interest or of violation of one or more terms of this letter, your services may be terminated without notice and on account of reason of any of the acts or omission the company shall be entitled to recover the damages from you.
6. You will not accept any present, commission or any sort of gratification in cash or kind from any person, party or firm or Company having a relationship with the company and if you are offered any, you should immediately report the same to the Management.

6, 32, Kamaraj Rd, Arumugam Nagar, Mahalingapuram, Pollachi, Tamil Nadu 642002

E-mail: info@piraiinfo.com | <http://piraiinfo.com>



Website: www.piraiinfo.com
Dr.D.SENTHIL KUMARAN, M.B., Ph.D., (MUS),
Principal
SSM Institute of Engineering and Technology
Kuttathupatti Village, Sindalagundu (Po),
Palani Road, Dindigul - 624 002.

7. This Internship letter is being issued to you based on the information and particulars furnished by you in your application (including biodata), at the time of your interview and subsequent discussions. If it transpires that you have made a false statement (or have not disclosed a material fact) resulting in your being offered this internship, the Management may take such action as it deems fit in its sole discretion, including termination of your Internship Program.
8. You will be responsible for safekeeping and return in good condition and order of all Company properties, which may be in your use, custody, or charge.
9. All confidential, proprietary or other trade secret information and all other discoveries, inventions, processes, methods and improvements, conceived, developed, or otherwise made by you, alone or with others, and in any way relating to the Company's present or planned business or products, whether or not patentable or subject to copyright protection and whether or not reduced to tangible form or reduced to practice during the period of your employment with the Company ("Developments") shall be the sole property of the Company.
10. At the end of the internship program if provided with employment opportunity with Pirai, you have full rights to accept or reject the same:
 - a) In case of employment acceptance, you will be following the company's Employee onboarding process and convert the Internship to Employment.
 - b) In case of employment rejection, you will immediately reimburse the Training Costs incurred by the Company for the Training which is **Rs.1,00,000/- (one lakh only)**
11. You will not accept any job offer from Pirai Infotech clients directly for a year from your internship completion date. Legal actions will be taken against you if you have accepted any
12. You agree to disclose all activities assigned to you on time as requested, fully and in writing to the Company promptly after completion of the same, and at any time upon request. You acknowledge and agree that you will make full and prompt disclosure to the Company of all inventions, improvements, discoveries, methods, developments, software, mask works, and works of authorship, whether patentable or copyrightable or not, which relate to the Company's business and have heretofore been created, made, conceived or reduced to practice by you or under your direction or jointly with others, and not assigned to prior employers, or which have utility in or relate to the Company's business and are created, made, conceived or reduced to practice by you or under your direction or jointly with others during his employment with the Company, whether or not during normal working hours or on the premises of the Company.
13. Please Sign and return to the undersigned the duplicate copy of this letter signifying your acceptance.

Dr.D.SENTHIL KUMARAN, M.B., Ph.D., (MUS),

Principal

SSM Institute of Engineering and Technology
Kundampatti Village, Sindalagundi (Po),
Palani Road, Dindigul - 624 002.



Website: www.piraiinfo.com

We welcome you to the **Pirai family** and look forward to a fruitful journey ahead.

With best wishes,

For **Pirai Infotech Private Limited.**

Name: **IBRAHIMBADUSHA B**

Designation: **HR AND ADMIN**

I accept the above terms and conditions

Name of the candidate: AKASH S

Signature

Date:

Place:

6, 32, Kamaraj Rd, Arumugam Nagar, Mahalingapuram, Pollachi, Tamil Nadu 642002

E-mail: info@piraiinfo.com | hr@piraiinfo.com



Website: www.piraiinfo.com

Dr.D.SENTHIL KUMARAN, M.E., Ph.D., (MUS),
Principal
SSM Institute of Engineering and Technology
Kuttiathupatti Village, Sindalagundu (Po),
Palani Road, Dindigul - 624 002.

Associated Transformers Private Limited

(An ISO 9001:2008 Certified Company)

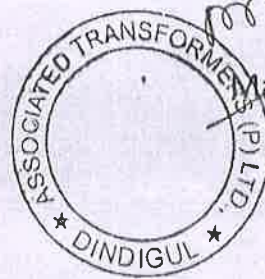


DATE: 31.07.2023

TO WHOME SOEVER IT MAY CONCERN

This is to certify that **S.Lokendra Sowmlyan S/o K.Saravanan**, CTO Colony, Trichy Road, Dindigul – 624 005. He is studying in SSM Institute of Engineering and Technology, Dindigul – Palani Highway, Dindigul – 624002, Third year EEE (Reg. No. 922121105027). He had undergone internship training in company from 18.07.2023 to 31.07.2023. We wish him all success in future.

For Associated Transformers (P) Ltd.,



Manager (Technical).



Dr.D.SENTHIL KUMARAN, M.B., Ph.D., (MUS)

Principal

SSM Institute of Engineering and Technology

Kuttathupatti Village, Sindalagundu (Po),

Palani Road, Dindigul - 624 002.

Regd. Office : S-11&12, R.M.Colony, 2nd Cross, Dindigul 624 001 India. Tel : 4561 2461369

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E-mail : info@associatedtransformers.com URL : www.associatedtransformers.com

GSTIN : 33AABCA5258N1ZJ