भारतीय विश्वविद्यालय संघ

ए आई यू हाउस, 16, कॉमरेड इन्द्रजीत गुप्ता मार्ग
नई दिल्ली–110 002

Association of Indian Universities
AIU House, 16, Comrade Indrajit Gupta Marg
New Delhi 110 002

*Ref. AIU/ADM/CERT/0001/*261948
January 02, 2018

CERTIFICATE FOR INTERNSHIP

To Whomsoever It May Concern

This is to certify that **Shri Tushar Sadana** (College: Manipal University Jaipur, Jaipur, Rajasthan-303007; College ID: 169107181 Branch: B.Tech-CSE) has successfully completed his internship at Association of Indian Universities, New Delhi from 16.12.2017 to 02.01.2018 (03 Weeks).

During the internship, **Shri Tushar,** along with two other colleagues worked on the revamping of the AIU website and the revamped website has been accepted for implementation by the AIU.

We wish **Shri Tushar** good luck for all future endeavors and look forward to working with him again in future.

SAMPSON DAVID
JOINT SECRETARY (Admn.)

Manipal University Jaipur

Letter of Recommendation

With immense pleasure I am writing this letter of recommendation for one of my favourite student Tushar Sadana. He is currently pursuing B. Tech in Computer Science and Engineering from Manipal University Jaipur and has brought laurels to the university by representing our university at national and global level as well as winning awards in those competitions.

As Tushar's supervisor during his internship with EAI Society from November 2017 to December 2017. I assigned him different technical tasks. I was impressed that he performed all these tasks efficiently and within the given deadline. He also helped and guided other interns. He became a valued member of the team, and I am confident he has a successful career as a Full Stack Developer ahead.

As an intern he was assigned the task of making the website of the EAI society. He also developed an Android Application to Connect all the registrations and finance of all the college student clubs. With an intention to code for cause, he created an application for Anti-Human trafficking and Indoor Navigation for Blind People.

He was also assigned the task to create a module to detect and analyse handwriting using deep learning models, and program to detect spam messages using machine learning and natural language processing. He also worked on a project to identify Best Advertisement among few advertisements of the same product using machine learning.

With a realization that better knowledge would provide access to more advancement and nurture his talent, he wants to seek the internship at your prestigious institute for which I strongly recommend his name and urge for the same. He will definitely bring out the best and live to the expectations.

Regards and thanks

Ms. Monika Jain
Assistant Professor (SCIT)
Manipal University Jaipur
Email: monika.jain@jaipur.manipal.edu
Contact no. : - +91 9602715882

Manipal University Jaipur

Letter of Recommendation

With immense pleasure I am writing this letter of recommendation for one of my favourite student Tushar Sadana. He is currently pursuing B. Tech in Computer Science and Engineering from Manipal University Jaipur and has brought laurels to the university by representing our university at national and global level as well as winning awards in those competitions.

As far as I know him he is extremely dedicated and committed student as I have taught him Switching Theory and Logic Design in third semester in which his performance was appreciable. He has the special abilities to complete the desired task at the right time. He is a very good developer and have developed many android applications and website. He had developed MUJ Connect, Anti-Human Trafficking and Indoor Navigation for Blind People. He has completed boot camp in Machine Learning and created some projects with that, like Spam Messages Detector and Best Advertisement Identifier. He is fluent in Java, C and Python. He has developed many website and projects for the campus as well as offshore along with a good academic performance which showcases his multidimensional task executing skills.

With a realization that better knowledge would provide access to more advancement and nurture his talent, he wants to seek the internship at your prestigious institute for which I strongly recommend his name and urge for the same. He will definitely bring out the best and live to the expectations.

Regards and thanks

Rahul Saxena

Mr. Rahul Saxena
Assistant Professor (SCIT)
Manipal University Jaipur
Email: rahul.saxena@jaipur.manipal.edu
Contact no. : - +91 9649121932

MANIPAL UNIVERSITY JAIPUR

JAIPUR - 303 007, RAJASTHAN, INDIA

GRADE REPORT

Date : 22 January 2018

BACHELOR OF TECHNOLOGY

(First Semester)

Branch : Computer Science & Engineering

Academic Session : 2016-2017

Reg No : 169107181

Name : TUSHAR SADANA

Course Code	Course Title	Credits	Grade
CY1101	ENGINEERING CHEMISTRY	4	A+
HS1102	HISTORY OF INDIAN SCIENCE & TECHNOLOGY	2	B
EE1101	BASIC ELECTRICAL TECHNOLOGY	4	A+
CS1101	PROGRAMMING IN C	4	A+
ES1103	ENGINEERING THERMODYNAMICS	3	A+
EN1111	TECHNICAL COMMUNICATION	3	A+
MA1101	ENGINEERING MATHEMATICS-I	4	A+
	Total	24	

Credits Earned : 24

GPA : 9.84

Grade	A+	A	B	C	D	E	F/I/DT
Grade Point	10	9	8	7	6	5	0

(Niti Nipun Sharma)

Dean of the Faculty
(with seal)

Dean Faculty of Engineering
MANIPAL UNIVERSITY JAIPUR

Lalit

Controller of Examinations
(with seal)

Controller of Examinations
Manipal University Jaipur

MANIPAL UNIVERSITY JAIPUR

JAIPUR - 303 007, RAJASTHAN, INDIA

Sl. No. 33275

GRADE REPORT

Date : 22 January 2018

BACHELOR OF TECHNOLOGY

(Second Semester)

Branch : Computer Science & Engineering

Academic Session : 2016-2017

Reg No : 169107181

Name : TUSHAR SADANA

Course Code	Course Title	Credits	Grade
PY1101	ENGINEERING PHYSICS	5	A+
MA1201	ENGINEERING MATHEMATICS-II	4	A
ES1101	ENVIRONMENTAL STUDIES	3	A+
EC1101	BASIC ELECTRONICS	4	A+
ES1102	MECHANICS OF SOLIDS	4	A+
ME1101	ENGINEERING GRAPHICS	3	A
ME1130	BASIC WORKSHOP PRACTICE	2	B
	Total	25	

Credits Earned : 25

GPA : 9.56

Grade	A+	A	B	C	D	E	F/I/DT
Grade Point	10	9	8	7	6	5	0

(Niti Nipun Sharma)

Dean of the Faculty
(with seal)

Dean Faculty of Engineering
MANIPAL UNIVERSITY JAIPUR

Controller of Examinations
(with seal)

Controller of Examinations
Manipal University Jaipur

SEMESTER 3

Session JUL-NOV 2017
Credits 23
GPA 9.40

Course Code	Course	Credits	Grade	Session
MA1307	Engineering Mathematics-III	3	B	JUL-NOV 2017
CS1331	Data Structures Lab	1	A	JUL-NOV 2017
CS1332	Object Oriented Programming using Java Lab	1	A	JUL-NOV 2017
CS1301	Computer Organization & Architecture	4	A	JUL-NOV 2017
CS1302	Switching Theory & Logic Design	4	A+	JUL-NOV 2017
CS1303	Data Structures	4	A+	JUL-NOV 2017
CS1304	Object Oriented Programming using Java	4	A+	JUL-NOV 2017
HS1301	Value Ethics and Governance	2	A	JUL-NOV 2017

* Incomplete Courses

SEMESTER 4

Session JAN-MAY 2018
Credits 23
GPA 8.66

Course Code	Course	Credits	Grade	Session
HS1401	Economics	3	A	JAN-MAY 2018
MA1406	Engineering Mathematics-IV	3	B	JAN-MAY 2018
CS1401	Operating Systems	4	A+	JAN-MAY 2018
CS1402	Relational Database Management Systems	4	A	JAN-MAY 2018
CS1403	Microprocessor & Microcontrollers	3	A	JAN-MAY 2018
CS1431	Operating Systems Lab	1	B	JAN-MAY 2018
CS1432	Relational Database Management Systems Lab	1	A	JAN-MAY 2018
CS1433	Microprocessor & Microcontroller Lab	1	C	JAN-MAY 2018
OPEN-I	Open Elective-I	3	C	JAN-MAY 2018

* Incomplete Courses

Registrations

No Active Session for Registration

Total Credits Earned	CGPA
Computer Science and Engineering Semester 5	N/A
Computer Science and Engineering Semester 4	8.66
Computer Science and Engineering Semester 3	9.40
Computer Science and Engineering Semester 2	9.56
Computer Science and Engineering Semester 1	9.84

LIST OF COURSES TAKEN

SEMESTER 1

Course	Credits
ENGINEERING CHEMISTRY	4/4
BASIC ELECTRICAL TECHNOLOGY	4/4
Programming in C	4/4
Engineering Thermodynamics	3/3
Technical Communication	3/3
ENGINEERING MATHEMATICS-I	4/4
History of Indian Science & Technology	2/2

SEMESTER 2

Course	Credits
Engineering Physics	5/5
Engineering Mathematics-II	4/4
Environmental Studies	3/3
Basic Electronics	4/4
Mechanics of Solids	4/4
Engineering Graphics	3/3
Basic Workshop Practice	2/2

SEMESTER 3

Course	Credits
Engineering Mathematics-III	3/3
Data Structures Lab	1/1
Object Oriented Programming using Java Lab	1/1
Computer Organization & Architecture	4/4
Switching Theory & Logic Design	4/4
Data Structures	4/4
Object Oriented Programming using Java	4/4
Value Ethics and Governance	2/2

SEMESTER 4

Course	Credits
Economics	3/3
Engineering Mathematics-IV	3/3
Operating Systems	4/4
Relational Database Management Systems	4/4
Microprocessor & Microcontrollers	3/3
Operating Systems Lab	1/1
Relational Database Management Systems Lab	1/1
Microprocessor & Microcontroller Lab	1/1
Financial Markets (Open Elective-I)	3/3

SEMESTER 5

Name	Credits
Design & Analysis of Algorithms	Ongoing
Software Engineering	Ongoing
Data Communications	Ongoing
Automata & Compiler Design	Ongoing
PYTHON PROGRAMMING	Ongoing
FUNDAMENTALS OF IMAGE PROCESSING	Ongoing
Design & Analysis of Algorithms Lab	Ongoing
Software Engineering Lab	Ongoing
Automata & Compiler Design Lab	Ongoing

The educational process at Manipal University Jaipur uses a Credit-Based System wherein the course content is expressed in number of Credits. M.U.J. has been using the Credit-Based System since the year 2011. The present system, applicable to me incorporated several modifications and is known as "Revised Credit System". The course content of individual subjects-theory
as well as practical-is expressed in terms of certain number of credits. The number of credits assigned to a subject depends on
the number of contact hours per week. Normally, in case of theory subjects, the number of credits is equal to the number of contact hours per week, while in case of labs, one credit is assigned for every three contact hours per week.

Date: 24.08.2018

TO WHOMSOEVER IT MAY CONCERN

Tushar Sadana is a student of Manipal University, Jaipur, Jaipur-Ajmer Express Highway, Dehmi Kalan, Near GVK Toll Plaza, Jaipur, Rajasthan 303007 currently studying in 5th Semester (consisting of 2 semester in one academic year) of his Bachelor's of Technology in Computer Science with college registration number 169107181.

He scored 9.84 GPA in 1st Semester, 9.56 GPA in 2nd, 9.4 GPA in 3rd and 8.66 in his 4th Semester (GPA out of 10).
He is expected to complete his graduation in the year 2020.

Dr. Satish Chandra Kulhari
Professor & Head
Department of Computer Science & Engineering
School of Computing and IT (SCIT)
Manipal University Jaipur
Rajasthan (INDIA)
Ph: 0141-3999100(Ext. No.719)

IAESTE - Language Certificate
This sheet must be completed and sent with the O Form if required.

Tick Language to be tested

English ☑ French ☐ German ☐ Spanish ☐ Other ☐ Please specify _____

Surname: SADANA	First name: TUSHAR
Nationality: INDIAN	Study Course: ENGINEERING
How long have you studied this Language? 12 years	Last Class: 12th Grade
Examinations Achieved and Grade: *Please provide additional Certificates if available* 12th CBSE Board – 95/100	Dates of Examinations: March 2016

To be completed by the Examiner

Knowledge of Required Language
(Please tick one box for each of the four language sections)

1. Comprehension
Understands conversation and reads without difficulty ☑
Understands almost everything spoken slowly and clearly ☐
Understands with difficulty ☐
Cannot follow conversation and written word ☐

2. Speaking
Speaks fluently, correctly and is easily understood ☑
Is understood but is not completely correct and fluent ☐
Speaks haltingly with many mistakes ☐
Cannot speak this language ☐

3. Writing
Writes accurately with ease ☑
Writes slowly with occasional errors ☐
Writes with difficulty and makes many errors ☐
Has no written ability in this Language ☐

4. Reading
Reads quickly with understanding ☑
Reads slowly, understanding only some of the text ☐
Has difficulty understanding and must look up many words ☐
Cannot understand simple texts ☐

Overall Conclusion
☑ Excellent ☐ Good ☐ Fair ☐ Poor

Additional Comments:

Examiner: Dr. Gaurav Mathur	Position: Faculty
Place and Date: MUJ, 9th Oct. 2018	Signature:

NUS
National University
of Singapore

Strategic Technology Management Institute
School of Computing

This is to certify that

Tushar Sadana

has successfully completed the Programme

Big Data Analytics using Artificial Neural Networks

(as part of Corporate Grurukul's Global Academic Internship Programme)

4 June – 12 June 2018

Professor Alex Siow
STMI Director
National University of Singapore

Hewlett Packard
Enterprise

HPE Education Services

Awarded to

TUSHAR SADANA

For successfully completing training in:

Big Data and Hadoop System Administration
As part of Corporate Gurukul's Global Academic Internship Programme

P. Ravindra Kumar
22 June 2018

On behalf of HPE Education Services

Singapore Education Manager

IEEE

Technically Co-Sponsored by
IEEE

Supported by
TCPP

computer
society

IEEE (USA) Conference Record Number: 41378

INTERNATIONAL CONFERENCE ON INTELLIGENT
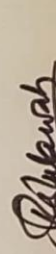COMMUNICATION AND COMPUTATIONAL TECHNIQUES

MANIPAL UNIVERSITY
JAIPUR

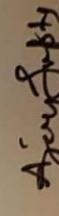INSPIRED BY LIFE

ICCT17

CERTIFICATE
OF APPRECIATION

22-23 DECEMBER, 2017

This is to certify that Dr. / Mr. /Ms. _Tushar Sadana_

Manipal University Jaipur from

has been awarded with best poster

for his/her poster entitled _Spam message detection using machine learning_ .

presented in ICCT'17 organized by School of Computing & Information Technology, Manipal University Jaipur, India.

Prof. Sandeep Joshi
ORGANISING SECRETARY

Prof. Rajveer Singh Shekhawat
GENERAL CO-CHAIR

Prof. Ajay Gupta
GENERAL CHAIR

Microsoft