Bharath
INSTITUTE OF HIGHER EDUCATION AND RESEARCH
(Declared as Deemed - to - be - University under section 3 of UGC Act 1956)
BHARATH INSTITUTE OF SCIENCE AND TECHNOLOGY
No.173, Agharam Road, Selaiyur, Chennai , T.N - 600 073.

Requisition Letter

Date: 04.12.21

From
Dr. K.P.Kaliyamurthie,
Professor & Head,
Department of CSE,
Bharath Institute of Higher Education and Research,
Chennai

To
The Dean Engineering,
Bharath Institute of Higher Education and Research,
Chennai

Respected sir

Subject: Request of Permission to conduct a value added course on "**Introduction to Artificial Intelligence**" -Reg

With reference to above subject, I would like to bring to your kind notice that, our department interested to organize value added course on "**Introduction to Artificial Intelligence**" in our campus premises on **12/12/2021**.

46 students would be participating in this course. We request you kindly to give permission to organize this event.

Venue: **CSE Smart Room**

Timing : **9 am to 4.30 pm**

Submitted to Principal for approval to organize this value added course.

HOD/CSE

DEAN ENGINEERING

HEAD OF DEPARTMENT
Department of Computer Sci & Engg.,
Bharath Institute of Higher Education & Research
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Chennai-600 073. INDIA

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CIRCULAR

08.12.2021

The School of computing, Bharath Institute of Higher Education and Research is planned to conduct a certification value added course on **Introduction to Artificial Intelligence** for the benefit of II, III and IV year students. This course is scheduled from 12.12.2021 for 30hours which includes theory and practical. The timings are 1:30 PM to 4:30 PM & 9.00 AM to 4.30PM

All Registered Students must attend all the classes without fail. The following faculty members are assigned to handle the course. S.NO	**Name of the Faculty**	**Designation**
1	Dr.C.Nalini	Professor
2	R.Velvizhi	Assistant Professor

Head of Department

To

Copy to CSE

Copy to IT

HEAD OF DEPARTMENT
Department of Computer Science & Engineering
Bharath Institute of Higher Education & Research
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Chennai-600 073. INDIA

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CERTIFICATE COURSE ON INTRODUCTION TO ARTIFICAL INTELLIGENCE

Date of Introduction of the Course: 12.12.2021

COURSE SYLLABUS

1. INTRODUCTION

Introduction–Definition – Future of Artificial Intelligence – Characteristics of Intelligent Agents–

2. INTRODUCTION

Typical Intelligent Agents – Problem Solving Approach to Typical AI problems

3. PROBLEM SOLVING METHODS

Problem solving Methods , Search Strategies

4. PROBLEM SOLVING METHODS

Informed . Heuristics , Local Search Algorithms and Optimization Problems

5. PROBLEM SOLVING METHODS

Uninformed ,Searching with Partial Observations

6. PROBLEM SOLVING METHODS

Constraint Satisfaction Problems , Constraint Propagation, Backtracking Search, Game Playing

7. OPTIMAL DECISIONS

Optimal Decisions in Games,Alpha,Beta Pruning,Stochastic Games

8. KNOWLEDGE REPRESENTATION

First Order Predicate Logic , Prolog Programming, Unification , Forward Chaining,Reasoning with Default Information

9. KNOWLEDGE REPRESENTATION

Backward Chaining, Resolution, Knowledge Representation, Ontological Engineering,Categories and Objects

10. KNOWLEDGE REPRESENTATION

Events , Mental Events and Mental Objects ,Reasoning Systems for Categories

11. SOFTWARE AGENTS

Architecture for Intelligent Agents , Agent communication ,systems.

12. SOFTWARE AGENTS

Negotiation and Bargaining , Argumentation among Agents.

13. SOFTWARE AGENTS

Trust and Reputation in Multi,agent.

14. APPLICATIONS

AI applications , Language Models , Information Retrieval, Information Extraction ,Natural Language Processing.

15. APPLICATIONS

Machine Translation, Speech Recognition, Robot, Hardware, Perception, Planning, Moving

COURSE OBJECTIVES

In this course we plan to give students an Introduction to Artificial Intelligence, and an in-depth study into its enabling technologies and main building blocks. Students will gain basic knowledge in AI and Problem Solving.

Specifically, the course has the following objectives:

Students will learn

- **OBJECTIVES:**
  - To understand the various characteristics of Intelligent agents
  - To learn the different search strategies in AI
  - To learn to represent knowledge in solving AI problems
  - To understand the different ways of designing software agents
  - To know about the various applications of AI

COURSE COORDINATOR

HEAD OF THE DEPARTMENT

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CERTIFICATE COURSE ON INTRODUCTION TO ARTIFICIAL INTELLIGENCE

Date of Introduction of the Course: 12.12.2021

The timings are 1:30 PM to 4:30 PM from Friday (AN) and 9.00 AM to 4.30 PM Saturday (FN&AN).

Time Table & Lesson plan

CLASS	DATE	TOPIC
1,2	12-12-2021 (AN)	**1. INTRODUCTION** Introduction–Definition – Future of Artificial Intelligence – Characteristics of Intelligent Agents–
3,4	16-12-2021 (AN)	**2. INTRODUCTION** Typical Intelligent Agents – Problem Solving Approach to Typical AI problems
5,6	17-12-2021 (FN)	**3. PROBLEM SOLVING METHODS** Problem solving Methods , Search Strategies
7,8	17-12-2021 (AN)	**4. PROBLEM SOLVING METHODS** Informed . Heuristics , Local Search Algorithms and Optimization Problems
9,10	23-12-2021 (AN)	**5. PROBLEM SOLVING METHODS** Uninformed ,Searching with Partial Observations
11,12	24-12-2021 (FN)	**6. PROBLEM SOLVING METHODS** Constraint Satisfaction Problems , Constraint Propagation, Backtracking Search, Game Playing
13,14	24-12-2021 (AN)	**7. OPTIMAL DECISIONS** Optimal Decisions in Games,Alpha,Beta Pruning,Stochastic Games
15,16	30-12-2021 (FN)	**8. KNOWLEDGE REPRESENTATION** First Order Predicate Logic , Prolog Programming, Unification , Forward Chaining,Reasoning with Default Information
17,18	31-12-2021 (FN)	**9. KNOWLEDGE REPRESENTATION** Backward Chaining, Resolution, Knowledge Representation, Ontological Engineering,Categories and Objects
19,20	31-12-2021 (AN)	**10. KNOWLEDGE REPRESENTATION** Events , Mental Events and Mental Objects ,Reasoning Systems for Categories
21,22	06-01-2022 (FN)	**11. SOFTWARE AGENTS** Architecture for Intelligent Agents , Agent communication ,systems.
23,24	07-01-2022 (FN)	**12. SOFTWARE AGENTS** Negotiation and Bargaining , Argumentation among Agents.
25,26	07-01-2022 (AN)	**13. SOFTWARE AGENTS** Trust and Reputation in Multi,agent.

27,28	**20-01-2022 (AN)**	**14. APPLICATIONS** AI applications , Language Models , Information Retrieval, Information Extraction ,Natural Language Processing.
29,30	**21-01-2022 (FN)**	**15. APPLICATIONS** Machine Translation, Speech Recognition, Robot, Hardware, Perception, Planning, Moving

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CERTIFICATE COURSE ON INTRODUCTION TO ARTIFICIAL INTELLIGENCE
Date of Introduction of the Course: 12.12.2021

School of Computing
Registered Students Name List

S.NO	REG.NO	NAME OF THE STUDENT
1	U14CS201	VASI KARTHIK
2	U14CS202	VEMULA ANWAR
3	U14CS158	SAMPA PARH
4	U14CS164	SAURAV KUMAR
5	U14CS104	MOLUGURI PRADEEP CHANDRA
6	U14CS105	MOOTHI LAKSHMI PRASANNA
7	U14CS084	LAKKAMPALLY SHIVA KUMAR
8	U14CS067	KARTHICK.K
9	U14CS041	CHINTLA VENKATESH
10	U14CS042	CHUDAAMANI.V
11	U14CS044	DARA DEEPTHI
12	U14CS053	GODJSELA SRINATH
13	U14CS231	GYANA PRASANNA
14	U15CS003	ABHISHEK KUMAR SINGH
15	U15CS015	ARYAN SAHU
16	U15CS028	BONALA SRIDHAR RAO
17	U15CS029	BRYAN STEVE PUSHPARAJ I
18	U15CS112	MAILE ARUN KUMAR
19	U15CS113	MAMUNDURU BHARATH KUMAR
20	U15CS124	MOHANKUMAR J
21	U15CS010	DIVYA
22	U15CS149	P.KHAJA KHAN
23	U15CS154	PERAM ANTONY
24	U15CS155	PERAM VENKATA KRISHNA REDDY
25	U15CS156	PERURI V S V KRISHNA MOHAN

26	U15CS184	S. SAI SHRUTHI
27	U15CS185	SADHOLLA PRANAY REDDY
28	U15CS186	SAI RAMANA S M
29	U15CS192	SESHA SRUJAN.B
30	U15CS193	SHAIK AFRIDI
31	U15CS194	SHAIK SABIR
32	U15CS195	SHAIK YASMEEN
33	U15CS218	VETCHA VENKATA KRISHNA TEJA
34	U15CS219	VISNESH.B
35	U15CS240	YUGESH.S
36	U16CS014	SOMA BHARATH KUMAR
37	U16CS015	B J JAISON
38	U16CS033	POOJALAKSHMI N
39	U16CS055	MEGANATHAN G
40	U16CS097	KISHAN KUMAR
41	U16CS099	GANGUMALLA GANGA SUNIL
42	U16CS100	GALLA BHUCHANDRA
43	U16CS158	NIMBAGALLU KURUBA GURUMURTHY
44	U16CS159	JANA ARAVIND KUMAR
45	U16CS189	CHAUHAN MAYANK SUNILKUMAR
46	U16CS204	GADDALA UDAY KIRAN

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CERTIFICATE COURSE ON INTRODUCTION TO ARTIFICIAL INTELLIGENCE

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CERTIFICATE OF PARTICIPATION

This certificate is presented to

CHUDAAMANI.V (U14CS042)

For actively participating in the value added course " Introduction to Artificial Intelligence "
Conducted by School of Computing, BIHER from 12.12.2021 to 21.01.2021.

COURSE COORDINATORS

HEAD OF THE DEPARTMENT

DIRECTOR

Chennai-600 073. INDIA

COURSE FEEDBACK FORM

Academic Year		2021-2022					
Term		I					
Course Number							
Course Title		Introduction to Artificial Intelligence					
Number of Credits							
Type of Course	Regular		Elective		Add-on	✓	

I.	**Information on the Respondent: (Tick (√) Appropriately)**									
1.	**Percentage of classes attended**									
	0-20		20-40		40-60		60-80		80-100	✓
2.	**Number of hours per week spent on the course (Other than lecture hours)**									
	0-2		2-4		4-6	✓	6-8		8-10	

3.	**Preparation for the course by the student:**		
	(i)	Have done part of this course earlier	No
	(ii)	Has adequate prior exposure to the prerequisites	yes
	(iii)	Had to pickup relevant additional topics through concurrent study	yes
	(iv)	Have no exposure to the background material	yes.
4.	**The expectations for taking the course by the student are:**		
	(a)	Enhance by skill base in the area of specializations	yes.
	(b)	Get exposed to a relevant subject	yes.
	(c)	Curiosity	yes.
	(d)	Better Employment Opportunity	yes.
	(e)	Complete Course requirements	yes.
	(f)	To Improve CGPA	yes.

About the Instructor: Information on the Respondent: (Tick (√) Appropriately)

		A	B	C	D	E
1.	Pace of the Teaching/lecture	✓				
2.	Comment of the Subject		✓			
3.	Clarity of expression	✓				
4.	Level of preparation		✓			
5.	Level of interaction		✓			
6.	Accessibility outside the class	✓				
7.	Others (please specify	–	–	–	–	–

A: Excellent		**B: Very Good**		**C: Good**		**D: Satisfactory**		**E: Poor**	

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COURSE FEEDBACK FORM

Academic Year		2021-2022					
Term		II					
Course Number							
Course Title		Introduction to AI					
Number of Credits							
Type of Course	Regular		Elective		Add-on	✓	

I.	**Information on the Respondent: (Tick (√) Appropriately)**									
1.	**Percentage of classes attended**									
	0-20		20-40		40-60		60-80		80-100	✓
2.	**Number of hours per week spent on the course (Other than lecture hours)**									
	0-2		2-4		4-6	✓	6-8		8-10	

3.	**Preparation for the course by the student:**		
	(i)	Have done part of this course earlier	NO
	(ii)	Has adequate prior exposure to the prerequisites	yes
	(iii)	Had to pickup relevant additional topics through concurrent study	yes
	(iv)	Have no exposure to the background material	yes
4.	**The expectations for taking the course by the student are:**		
	(a)	Enhance by skill base in the area of specializations	yes
	(b)	Get exposed to a relevant subject	yes
	(c)	Curiosity	yes
	(d)	Better Employment Opportunity	yes
	(e)	Complete Course requirements	yes.
	(f)	To Improve CGPA	

About the Instructor: Information on the Respondent: (Tick (√) Appropriately)

		A	B	C	D	E
1.	Pace of the Teaching/lecture		✓			
2.	Comment of the Subject	✓				
3.	Clarity of expression	✓				
4.	Level of preparation		✓			
5.	Level of interaction		✓			
6.	Accessibility outside the class		✓			
7.	Others (please specify	–	–	–	–	–

A: Excellent		**B: Very Good**		**C: Good**		**D: Satisfactory**		**E: Poor**	

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