

Chapter 1 : Intro. to Artificial Intelligence(AI) and Soft Computing 1-1 to 1-33

Syllabus :

Introduction and Definition of Artificial Intelligence. Intelligent Agents : Agents and Environments, Rationality, Nature of Environment, Structure of Agent, types of Agent Soft Computing: Introduction of soft computing, soft computing vs. hard computing, various types of soft computing techniques.

1.1	Introduction to Artificial Intelligence	1-1
1.2	Foundations and Mathematical Treatments.....	1-1
1.2.1	Acting Humanly : The Turing Test Approach	1-1
1.2.2	Thinking Humanly : The Cognitive Modelling Approach.....	1-2
1.2.3	Thinking Rationally : The “Laws of Thought” Approach.....	1-3
1.2.4	Acting Rationally : The Rational Agent Approach	1-3
1.3	Categorization of Intelligent Systems.....	1-4
1.4	Components of AI.....	1-4
1.4.1	Computational Intelligence vs. Artificial Intelligence	1-6
1.5	History of Artificial Intelligence.....	1-6
1.6	Applications of Artificial Intelligence.....	1-7
1.7	Sub Areas/ Domains of Artificial Intelligence	1-8
1.8	Current Trends in Artificial Intelligence	1-9
1.9	Intelligent Agents.....	1-10
1.9.1	What is an Agent?.....	1-10
1.9.2	Definitions of Agent	1-12
1.9.3	Intelligent Agent.....	1-13
1.9.3(A)	Structure of Intelligent Agents	1-13
1.10	Rational Agent.....	1-14
1.11	Nature of Environment and PEAS Properties of Agent.....	1-15
1.11.1	Environments Types / Nature of Environment / Task Environment Properties	1-15
1.11.2	PEAS Properties of Agent	1-19
1.12	Structure of Agents / Types of Agents.....	1-21
1.12.1	Simple Reflex Agents	1-21
1.12.2	Model-Based Reflex Agents	1-23
1.12.3	Goal-Based Agents	1-24
1.12.4	Utility-Based Agents	1-25

1.12.5	Learning Agents	1-25
1.13	Introduction to Soft Computing	1-26
1.14	Soft Computing vs. Hard Computing	1-27
1.15	Various Types of Soft Computing Techniques.....	1-28
1.15.1	Introduction to Neural Networks	1-28
1.15.2	Introduction to Fuzzy Logic.....	1-30
1.15.3	Introduction to Genetic Algorithms.....	1-31

Chapter 2 : Problem Solving 2-1 to 2-61

Syllabus :

Problem Solving Agent, Formulating Problems, Example Problems Uninformed Search Methods : Depth Limited Search, Depth First Iterative Deepening (DFID), Informed Search Method : A* Search Optimization Problems : Hill climbing Search, Simulated annealing, Genetic algorithm

2.1	Solving Problems by Searching.....	2-1
2.2	Formulating Problems	2-1
2.2.1	Components of Problems Formulation	2-2
2.2.2	Example Problems	2-2
2.3	Measuring Performance of Problem Solving Algorithm / Agent.....	2-5
2.4	Node Representation in Search Tree	2-5
2.5	Uninformed Search	2-5
2.6	Depth First Search (DFS).....	2-6
2.6.1	Concept.....	2-6
2.6.2	Implementation.....	2-7
2.6.3	Algorithm.....	2-7
2.6.4	Performance Evaluation	2-7
2.7	Breadth First Search (BFS)	2-8
2.7.1	Concept.....	2-8
2.7.2	Process	2-8
2.7.3	Implementation.....	2-8
2.7.4	Algorithm.....	2-8
2.7.5	Performance Evaluation	2-9
2.8	Uniform Cost Search (UCS)	2-9
2.8.1	Concept.....	2-9
2.8.2	Implementation.....	2-9
2.8.3	Algorithm.....	2-9
2.8.4	Performance Evaluation	2-10
2.9	Depth Limited Search (DLS).....	2-10



2.9.1	Concept.....	2-10	2.16.4	Behaviour of A* Algorithm	2-26
2.9.2	Process	2-10	2.16.5	Admissibility of A*	2-27
2.9.3	Implementation.....	2-10	2.16.6	Monotonicity	2-28
2.9.4	Algorithm	2-10	2.16.7	Properties of A*	2-28
2.9.5	Pseudo Code.....	2-11	2.16.8	Example : 8 Puzzle Problem using A* Algorithm	2-29
2.9.6	Performance Evaluation	2-11	2.16.9	Caparison among Best First Search, A* search and Greedy Best First Search	2-31
2.10	Depth First Iterative Deepening (DFID).....	2-11	2.17	Local Search Algorithms and Optimization Problems	2-32
2.10.1	Concept.....	2-11	2.17.1	Hill Climbing	2-32
2.10.2	Process	2-13	2.17.1(A)	Simple Hill Climbing	2-33
2.10.3	Implementation.....	2-13	2.17.1(B)	Steepest Ascent Hill Climbing	2-34
2.10.4	Algorithm	2-13	2.17.1(C)	Limitations of Hill Climbing	2-34
2.10.5	Pseudo Code.....	2-13	2.17.1(D)	Solutions on Problems in Hill Climbing	2-36
2.10.6	Performance Evaluation	2-14	2.17.2	Simulated Annealing	2-36
2.11	Bidirectional Search	2-14	2.17.2(A)	Comparing Simulated Annealing with Hill Climbing ...	2-37
2.11.1	Concept.....	2-14	2.17.3	Local Beam Search	2-38
2.11.2	Process	2-14	2.17.4	Genetic Algorithms	2-40
2.11.3	Implementation.....	2-14	2.17.4(A)	Terminologies of GA.....	2-41
2.11.4	Performance Evaluation	2-15	2.17.4(B)	Genetic Operators	2-41
2.11.5	Pros of Bidirectional Search	2-15	2.17.4(C)	The Basic Genetic Algorithm	2-42
2.11.6	Cons of Bidirectional Search	2-15	2.17.4(D)	Example of Genetic Algorithm	2-42
2.12	Comparing Different Techniques	2-15	2.18	Adversarial Search	2-43
2.12.1	Difference between Unidirectional and Bidirectional Search.....	2-16	2.18.1	Environment Types	2-43
2.12.2	Difference between BFS and DFS.....	2-16	2.18.2	AI Game – Features.....	2-43
2.13	Informed Search Techniques.....	2-17	2.18.2(A)	Zero Sum Game.....	2-44
2.14	Heuristic Function.....	2-18	2.18.2(B)	Non-Zero Sum Game	2-44
2.14.1	Example of 8-puzzle Problem	2-19	2.18.2(C)	Positive Sum Game	2-44
2.14.2	Example of Block World Problem	2-19	2.18.2(D)	Negative Sum Game	2-44
2.14.3	Properties of Good Heuristic Function	2-21	2.19	Relevant Aspects of AI Game	2-45
2.15	Best First Search.....	2-22	2.20	Game Playing.....	2-45
2.15.1	Concept.....	2-22	2.20.1	Type of Game Strategies.....	2-46
2.15.2	Implementation.....	2-22	2.20.2	Type of Games.....	2-46
2.15.3	Algorithm : Best First Search.....	2-22	2.20.2(A)	Chess.....	2-47
2.15.4	Performance Measures for Best first search.....	2-23	2.20.2(B)	Checkers	2-48
2.15.5	Greedy Best First Search	2-23	2.20.3	What is Game Tree?	2-49
2.15.6	Properties of Greedy Best-First Search	2-24	2.21	MiniMax Algorithm	2-50
2.16	A* Search	2-24	2.21.1	Minimax Algorithm.....	2-50
2.16.1	Concept.....	2-24	2.21.2	Properties of Minimax Algorithm.....	2-54
2.16.2	Implementation.....	2-25	2.22	Alpha Beta Pruning	2-54
2.16.3	Algorithm (A*).....	2-25			



2.22.1	Example of α - β Pruning	2-56
2.22.3	Properties of α - β	2-60

Chapter 3 : Knowledge, Reasoning and Planning 3-1 to 3-60

Syllabus :

Knowledge based agents, First order logic: syntax and Semantic, Knowledge Engineering in FOL Inference in FOL : Unification, Forward Chaining, Backward Chaining and Resolution, Planning Agent, Types of Planning: Partial Order, Hierarchical Order, Conditional Order

3.1	A Knowledge Based Agent	3-1
3.1.1	Architecture of a KB Agent	3-2
3.2	The WUMPUS World Environment.....	3-3
3.2.1	Description of the WUMPUS World.....	3-4
3.2.2	PEAS Properties of WUMPUS World.....	3-5
3.2.3	Exploring a WUMPUS World.....	3-6
3.3	Logic	3-8
3.3.1	Role of Reasoning in AI.....	3-9
3.4	Representation of Knowledge using Rules	3-9
3.4.1	Ontology.....	3-12
3.5	Propositional Logic (PL)	3-12
3.5.1	Syntax	3-12
3.5.2	Semantics	3-13
3.5.3	What is Propositional Logic ?	3-14
3.5.4	PL Sentence - Example.....	3-14
3.5.5	Inference Rules	3-15
3.5.6	Horn Clause	3-16
3.5.7	Propositional Theorem Proving	3-17
3.5.8	Advantages of Propositional Logic.....	3-17
3.5.9	Disadvantages of Propositional Logic.....	3-17
3.6	First Order Predicate Logic.....	3-18
3.6.1	Syntactic Elements, Semantic and Syntax	3-18
3.7	Comparison between Propositional Logic and First Order Logic	3-19
3.8	Inference in FOL.....	3-20
3.8.1	Forward Chaining	3-20
3.8.2	Backward Chaining.....	3-21
3.8.3	Differentiate between Forward Chaining and Backward Chaining.....	3-22

3.9	Knowledge Engineering in First Order Logic.....	3-24
3.9.1	Knowledge Engineering Process	3-24
3.10	Unification and Lifting	3-24
3.10.1	Unification	3-24
3.10.2	Lifting	3-25
3.11	Resolution	3-27
3.11.1	The Resolution Procedure	3-27
3.11.2	Conversion from FOL Clausal Normal Form (CNF) ...	3-27
3.11.3	Facts Representation	3-28
3.11.4	Example	3-29
3.12	Planning	3-36
3.12.1	Introduction to Planning.....	3-36
3.12.2	Simple Planning Agent	3-37
3.13	Planning Problem	3-37
3.13.1	Problem Solving and Planning.....	3-38
3.14	Goal of Planning.....	3-38
3.14.1	Major Approaches	3-39
3.15	Planning Graphs.....	3-40
3.16	Planning as State-Space Search.....	3-41
3.16.1	Example of State Space Search.....	3-43
3.17	Classification of Planning with State Space Search	3-45
3.18	Progression Planners	3-45
3.19	Regression Planners	3-46
3.19.1	Heuristics for State-Space Search.....	3-47
3.20	Total Order Planning (TOP).....	3-47
3.21	Partial Order Planning	3-48
3.21.1	POP as a Search Problem	3-48
3.21.2	Consistent Plan is a Solution for POP Problem	3-50
3.22	Hierarchical Planning.....	3-50
3.22.1	POP One Level Planner	3-50
3.22.2	Hierarchy of Actions	3-51
3.22.3	Planner.....	3-51
3.23	Planning Languages.....	3-53
3.23.1	Example of Block World Puzzle.....	3-54
3.23.2	Example of the Spare Tire Problem.....	3-56
3.24	Planning and Acting in the Real World	3-56
3.25	Multi-Agent Planning	3-57
3.26	Conditional Planning.....	3-58

**Chapter 4 : Fuzzy Logic 4-1 to 4-89****Syllabus :**

Introduction to Fuzzy Set: Fuzzy set theory, Fuzzy set versus crisp set, Crisp relation & fuzzy relations, membership functions, Fuzzy Logic: Fuzzy Logic basics, Fuzzy Rules and Fuzzy Reasoning, Fuzzy inference systems: Fuzzification of input variables, defuzzification and fuzzy controllers.

4.1	Introduction to Fuzzy Set.....	4-1
4.2	Fuzzy Set vs. Crisp Set	4-1
4.3	Fuzzy Set Theory	4-3
4.3.1	Fuzzy Set : Definition.....	4-3
4.3.2	Types of Universe of Discourse.....	4-3
4.3.3	Different Notations for Representing Fuzzy Sets.....	4-5
4.3.4	Linguistic Variables and Linguistic Values	4-6
4.3.5	Important Terminologies related to Fuzzy Sets.....	4-7
4.3.6	Properties of Fuzzy Sets	4-10
4.3.7	Operations on Fuzzy Sets	4-11
4.4	Crisp Relation and Fuzzy Relations	4-13
4.4.1	Crisp Relation	4-13
4.4.1(A)	Cardinality of Classical Relation	4-14
4.4.1(B)	Operations on Classical Relations	4-14
4.4.1(C)	Properties of Crisp (Classical) Relations	4-15
4.4.1(D)	Composition of Crisp Relations	4-15
4.4.2	Fuzzy Relations.....	4-16
4.4.2(A)	Operations on Fuzzy Relation.....	4-17
4.4.2(B)	Properties of Fuzzy Relations.....	4-20
4.4.2(C)	Fuzzy Composition.....	4-20
4.5	Membership Functions	4-21
4.6	Fuzzy Logic	4-24
4.6.1	Fuzzy Logic Basics.....	4-24
4.6.2	Fuzzy Rules and Fuzzy Reasoning.....	4-25
4.7	Fuzzy Inference Systems	4-28
4.7.1	Construction and Working Principle of FIS.....	4-28
4.7.2	Fuzzification of Input Variables.....	4-33
4.7.3	Defuzzification	4-36

4.8	Fuzzy Controllers	4-40
4.8.1	Steps in Designing FLC.....	4-42
4.8.2	Advantages of FLSs.....	4-43
4.8.3	Disadvantages of FLSs	4-43
4.9	Solved Problems	4-43
4.10	Design of Controllers (Solved Problems).....	4-66

Chapter 5 : Artificial Neural Network 5-1 to 5-60**Syllabus :**

Introduction : Fundamental concept : Basic Models of Artificial Neural Networks : Important Terminologies of ANNs : McCulloch-Pitts Neuron, Neural Network Architecture: Perceptron, Single layer Feed Forward ANN, Multilayer Feed Forward ANN, Activation functions, Supervised Learning : Delta learning rule, Back Propagation algorithm., Un-Supervised Learning algorithm : Self Organizing Maps

5.1	Fundamental Concept - Artificial Neural Networks.....	5-1
5.1.1	Artificial Neural Networks	5-1
5.1.2	Biological Neural Networks.....	5-2
5.1.3	Brain vs. Computer.....	5-4
5.1.4	Features of ANN.....	5-5
5.1.5	Disadvantages of ANN	5-5
5.1.6	Applications of ANN	5-5
5.2	Basic Models of Artificial Neural Networks	5-7
5.2.1	Connections	5-7
5.2.2	Learning	5-7
5.2.2(A)	Supervised Learning.....	5-7
5.2.2(B)	Unsupervised Learning.....	5-8
5.2.2(C)	Reinforced Learning	5-9
5.2.3	Activation Functions	5-10
5.3	Important Terminologies of ANN	5-13
5.3.1	Weights	5-13
5.3.2	Bias	5-14
5.3.3	Threshold	5-15
5.3.4	Learning Constant.....	5-15
5.3.5	Momentum Factor	5-15
5.3.6	Vigilance Parameter	5-16
5.4	McCulloch-Pitts Neuron Model	5-16
5.5	Neural Network Architecture.....	5-21



5.5.1	Single Layer Feed Forward Networks	5-21
5.5.2	Multilayer Feed Forward Networks	5-22
5.5.3	Single Layer Feedback Network	5-23
5.5.4	Multilayer Feedback Networks	5-24
5.6	Supervised Learning	5-24
5.6.1	Perceptron Learning Rule	5-24
5.6.1(A)	Rosenblatt's Perceptron	5-24
5.6.1(B)	The Perceptron Model	5-25
5.6.1(C)	Algorithm for Training a Single Perceptron Network	5-26
5.6.1(D)	Model for Multilayer Perceptron	5-27
5.6.1(E)	The EX-OR Problem and Need for Multi-layer Perceptron	5-27
5.6.1(F)	Linearly and Non-Linearly Separable Patterns	5-28
5.6.2	Delta Learning Rule	5-31
5.6.2(A)	Delta Learning Model	5-32
5.6.2(B)	Proofs	5-33
5.6.2(C)	Algorithm-Delta Learning	5-35
5.6.3	Back Propagation Algorithm	5-36
5.6.3(A)	Architecture of Back Propagation Network	5-37
5.6.3(B)	Algorithm (Error Back Propagation Training)	5-39
5.7	Un-Supervised Learning Algorithm : Self Organizing Maps	5-40
5.8	Solved Problems	5-42

Chapter 6 : Expert System**6-1 to 6-20****Syllabus :**

Hybrid Approach - Fuzzy Neural Systems Expert system :
Introduction, Characteristics, Architecture, Stages in the
development of expert system,

6.1	Hybrid Approach	6-1
6.1.1	Introduction to Hybrid Systems	6-1
6.1.2	Types of Hybrid Systems	6-1
6.1.3	Fuzzy Neural System	6-3
6.1.4	Adaptive Neuro - Fuzzy Inference System (ANFIS)	6-4
6.2	Expert System	6-6
6.2.1	Introduction	6-6
6.2.2	Characteristics of Expert Systems	6-7
6.2.3	Real Time Expert Systems	6-8
6.3	Building Blocks of Expert Systems	6-8
6.4	Development Phases of Expert Systems	6-11
6.5	Representing and Using Domain Knowledge	6-11
6.6	Expert System-Shell	6-15
6.7	Explanations	6-17
6.8	Knowledge Acquisition	6-17
6.8.1	Knowledge Elicitation	6-18
6.9	Expert System vs. Traditional System	6-19
6.10	The Applications of Expert Systems	6-19

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