

tasks The book is intended for budding researchers, technocrats, engineering students, and machine learning/deep learning enthusiasts who are willing to start their computer vision journey with content-based image recognition. The readers will get a clear picture of the essentials for transforming the image data into valuable means for insight generation. Readers will learn coding techniques necessary to propose novel mechanisms and disruptive approaches. The WEKA guide provided is beneficial for those uncomfortable coding for machine learning algorithms. The WEKA tool assists the learner in implementing machine learning algorithms with the click of a button. Thus, this book will be a stepping-stone for your machine learning journey. Please visit the author's website for any further guidance at <https://www.rikdas.com/>

The book presents a collection of peer-reviewed articles from the International Conference on Advances and Applications of Artificial Intelligence and Machine Learning - ICAAAIML 2020. The book covers research in artificial intelligence, machine learning, and deep learning applications in healthcare, agriculture, business, and security. This volume contains research papers from academicians, researchers as well as students. There are also papers on core concepts of computer networks, intelligent system design and deployment, real-time systems, wireless sensor networks, sensors and sensor nodes, software engineering, and image processing. This book will be a valuable resource for students, academics, and practitioners in the industry working on AI applications.

Cognitive Informatics, Computer Modelling, and Cognitive Science: Volume Two, Application to Neural Engineering, Robotics, and STEM presents the practical, real-world applications of Cognitive Science to help readers understand how it can help them in their research, engineering and academic pursuits. The book is presented in two volumes, covering Introduction and Theoretical Background, Philosophical and Psychological Theory, and Cognitive Informatics and Computing. Volume Two includes Statistics for Cognitive Science, Cognitive Applications and STEM Case Studies. Other sections cover Cognitive Informatics, Computer Modeling and Cognitive Science: Application to Neural Engineering, Robotics, and STEM. The book's authors discuss the current status of research in the field of Cognitive Science, including cognitive language processing that paves the ways for developing numerous tools for helping physically challenged persons, and more.

Machine Learning WRITTEN BY Y. David Solomon Raju, K. Shyamala, Ch. Sumalatha

Applications of Deep Learning and Big IoT on Personalized Healthcare Services

E-Learning Methodologies

Content-Based Image Classification

Concepts, Challenges, and Case Studies

Future Impact and Well-Being for Society 5.0

Handbook of Research on Lifestyle Sustainability and Management Solutions Using AI, Big Data Analytics, and Visualization

Hardware Accelerator Systems for Artificial Intelligence and Machine Learning, Volume 122 delves into artificial intelligence and the growth it has seen with the advent of Deep Neural Networks (DNNs) and Machine Learning. Updates in this release include chapters on Hardware accelerator systems for artificial intelligence and machine learning, Introduction to Hardware Accelerator Systems for Artificial Intelligence and Machine Learning, Deep Learning with GPU, Edge Computing Optimization of Deep Learning Models for Specialized Tensor Processing Architectures, Architecture of NPU for DNN, Hardware Architecture for Convolutional Neural Network for Image Processing, FPGA based Neural Network Accelerators, and much more. Updates on new information on the architecture of GPU, NPU and DNN Discusses In-memory computing, Machine intelligence and Quantum computing Includes sections on Hardware Accelerator Systems to improve processing efficiency and performance

The sudden outbreak of the COVID-19 pandemic has curbed human lifestyle by imposing restrictions on regular daily movements that had been taken for granted. Due to the pandemic, the welfare segment has received more attention, and every possible effort is being made to prioritize the services at the top. This can be made possible while using the latest tools, technologies, and resources that impact the human culture and welfare of well-being. Novel methods and devices that make the welfare services more efficient, adaptive, transparent, and cost-effective need to be explored. The Handbook of Research on Lifestyle Sustainability and Management Solutions Using AI, Big Data Analytics, and Visualization offers extensive research on lifestyle management and services that contribute towards indication, detection, conduction, protection, and technological enhancement including machine learning, deep learning, artificial intelligence, big data analytics, and visualization. It also provides mechanisms that can improve lifestyle monitoring and help in increasing the immunity of the human body. Covering topics such as big data, robot therapy, and wearable technology, it is ideal for students, researchers, technologists, IT specialists, computer engineers, systems engineers, data scientists, doctors, hospital administrators, engineers, academicians, and technology providers.

Research Paper (postgraduate) from the year 2012 in the subject Engineering - Artificial Intelligence, grade: none, Jawaharlal Nehru University, language: English, abstract: Human started making machinery that can do the job for them. The technology developed so much that it started involving many other branches of engineering such as electronics, robotics etc. This eventually led to much more complex and smart machinery involving Artificial Intelligence. Reinforcement Learning is a type of Machine Learning, and thereby also a branch of Artificial Intelligence. It allows machines and software agents to automatically determine the ideal behavior within a specific context, in order to maximize its performance. Reinforcement Learning (RL) comes from the animal learning theory. RL does not need prior knowledge, it can autonomously get optimal policy with the knowledge obtained by trial- and-error and continuously interact with dynamic environment. As a matter of fact, Reinforcement Learning is defined by a specific type of problem, and all its solutions are classed as Reinforcement Learning algorithms. In the problem, an agent is supposed decide the best action to select based on its current state. When this step is repeated, the problem is known as a Markov Decision Process. A Markov Decision Process is a discrete time stochastic control process. At each time step, the process is in some state s_t , and the decision maker may choose any action that is available in state s_t . Markov Decision Process provides a mathematical framework for modeling decision-making in situations where outcomes are partly random and partly under the control of a decision maker.

A guide to understanding the inner workings and outer limits of technology and why we should never assume that computers always get it right. In Artificial Unintelligence, Meredith Broussard argues that our collective enthusiasm for applying computer technology to every aspect of life has resulted in a tremendous amount of poorly designed systems. We are so eager to do everything digitally—hiring, driving, paying bills, even choosing romantic partners—that we have stopped demanding that our technology actually work. Broussard, a software developer and journalist, reminds us that there are fundamental limits to what we can (and should) do with technology. With this book, she offers a guide to understanding the inner workings and outer limits of technology—and issues a warning that we should never assume that computers always get things right. Making a case against technochauvinism—the belief that technology is always the solution—Broussard argues that it's just not true that social problems would inevitably retreat before a digitally enabled Utopia. To prove her point, she undertakes a series of adventures in computer programming. She goes for an alarming ride in a driverless car, concluding " the cyborg future is not coming any time soon " ; uses artificial intelligence to investigate why students can't pass standardized tests; deploys machine learning to predict which passengers survived the Titanic disaster; and attempts to repair the U.S. campaign finance system by building AI software. If we understand the limits of what we can do with technology, Broussard tells us, we can make better choices about what we should do with it to make the world better for everyone.

Machine Learning employs techniques and theories drawn from many fields within the broad areas of mathematics, statistics, information science, and computer science, in particular from the sub-domains of machine learning, classification, cluster analysis, data mining, database, and visualization. Machine learning is perhaps the hottest thing in Silicon Valley right now, especially deep learning. We have Google's class on Tensor Flow, which teaches you everything you need to know to work in Silicon Valley's top companies. The reason why it is so hot is because it can take over many repetitive, mindless tasks. It'll make doctor better doctors, and lawyers better lawyers and it makes cars drive themselves. For example, when you're booking a taxi, you're shown how much the trip would cost. Or when you're on the trip, you're shown the path the taxi would take to reach your destination. While booking a ride on Uber, you're always told the amount of time the trip would take and how much it would cost. All of that, is Machine Learning! The overall goal of this book "Machine Learning" is to provide a broad understanding of various faces of Machine Learning environment in an integrated manner. It covers the syllabi of all technical universities in India and abroad. The first edition of this book is also been awarded by AICTE and placed in AICTE's latest Model Curriculum in Engineering & Technology as well as Emerging Technology.

Machine Learning and Deep Learning in Real-Time Applications

Handling and Managing Data

Artificial Intelligence, Machine Learning, and Data Science Technologies

Predictive Modeling in Biomedical Data Mining and Analysis

Introduction to Machine Learning

Deep Learning

The book introduces programming concepts through Python language. The simple syntax of Python makes it an ideal choice for learning programming. Because of the availability of extensive standard libraries and third-party support, it is rapidly evolving as the preferred programming language among the application developers. It will bolster your foundational skills in Artificial Intelligence. Make the most of our Expert Mentor-ship facility and gain a practical understanding of Artificial Intelligence and Machine Learning. Make the most of our real-world projects from diverse industries. The content in this book goes a long way towards helping you unlock lucrative career opportunities in the coveted fields of Artificial Intelligence and Machine Learning. The steps in creating computers that are as fluent in human language as people has long been a goal for scientists and the general public. Human language communication both represents and challenges an intelligence, because while languages appear to follow some unseen rules of spelling and grammar. Systems that understand or use language, which we call ?Natural Language Processing? (NLP) systems, have been created by specifying algorithms for computers based on the observable regularities of language noted by experts.Use this book to learn the principles and methods of NLP to understand what it is, where it is useful, how to use it, and how it might be used people. The book includes the core topics of modern NLP, including an overview of the syntax and semantics of English, benchmark tasks for computational language modeling, and higher level tasks and applications that analyze or generate language, using both rule-based search and machine learning approaches. It takes the perspective of a computer scientist. The primary themes are abstraction, data, algorithms, applications and impacts. It also includes some history and trends that are important for understanding why things have been done in a certain way

Artificial Unintelligence

Practical Approach for Machine Learning and Deep Learning Algorithms

Applications of Cloud Computing, IoT, Blockchain, Machine Learning, Artificial Intelligence Techniques

Volume 2: Application to Neural Engineering, Robotics, and STEM

How Computers Misunderstand the World