

1. Record Nr.	UNINA9911069667903321
Autore	Khanna Vinod Kumar
Titolo	AI-Processor Electronics : Basic Technology of Artificial Intelligence
Pubbl/distr/stampa	Bristol : , : Institute of Physics Publishing, , 2025 ©2024
ISBN	9780750362610 0750362618
Edizione	[1st ed.]
Descrizione fisica	1 online resource (323 pages)
Collana	IOP Ebooks Series
Disciplina	006.3
Soggetti	Artificial intelligence Machine learning
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	PRELIMS.pdf -- Acknowledgments -- Author biography -- Vinod Kumar Khanna -- Academic qualifications -- Research/teaching experience and accomplishments -- Semiconductor facility creation and maintenance -- Scientific positions held -- Membership of professional societies -- Foreign travel -- Scholarships and awards -- Research publications and books -- About the book -- Abbreviations, acronyms, initialisms and symbols -- Outline placeholder -- Mathematical symbols -- Greek letters -- Special symbols -- CH001.pdf -- Chapter Artificial intelligence, machine learning, deep learning and generative artificial intelligence -- 1.1 Introduction -- 1.2 AI versus ML vs DL vs Gen AI -- 1.3 Ethics of AI -- 1.4 Types of machine learning -- 1.4.1 Supervised learning -- 1.4.2 Unsupervised learning -- 1.4.3 Semi-supervised learning -- 1.4.4 Reinforcement learning -- 1.5 Artificial neural networks -- 1.5.1 Feed-forward neural network
Sommario/riassunto	This book provides a comprehensive overview of electronics for AI processing units, from classical to quantum computing. It introduces AI, machine learning, and deep learning, and reviews digital computer electronics. It explains the CPU and von Neumann bottleneck, and describes parallel computing architectures, AI-optimized hardware, and

processors.
