(12) PATENT APPLICATION PUBLICATION
(19) INDIA
(22) Date of filing of Application :23/01/2024

(21) Application No.202441004664 A
(43) Publication Date : 09/02/2024

(54) Title of the invention : TASK SCHEDULING FOR MACHINE-LEARNING WORKLOADS IN CLOUD COMPUTING

(51) International classification	:G06N0020000000, G06F0009500000, G06Q0010040000, G06F0009480000, G06Q0010060000
(86) International Application No Filing Date	:NA :NA
(87) International Publication No	: NA
(61) Patent of Addition to Application Number Filing Date	:NA :NA
(62) Divisional to Application Number Filing Date	:NA :NA

(71)**Name of Applicant :**
1)Dr. M. Sreenivasa Rao
Address of Applicant :Professor & Director, GIET Institutions, Mechanical Engineering Department, Godavari Institute of Engineering & Technology (A), NH-16, Chaitanya Knowledge City, Rajahmundry-533296, Andhra Pradesh, India ---------- ----------
2)Dr. P.M.M.S. Sarma
3)Dr. G. Ramakrishna
4)Dr. K T Thilagham
5)Kurmana Prema Kumar
6)Dr. M.Mohan Prasad
7)Mr. M. Sudhakar
Name of Applicant : NA
Address of Applicant : NA
(72)**Name of Inventor :**
1)Dr. M. Sreenivasa Rao
Address of Applicant :Professor & Director, GIET Institutions, Mechanical Engineering Department, Godavari Institute of Engineering & Technology (A), NH-16, Chaitanya Knowledge City, Rajahmundry-533296, Andhra Pradesh, India ---------- ----------
2)Dr. P.M.M.S. Sarma
Address of Applicant :Professor & Principal, Mechanical Engineering Department, Godavari Institute of Engineering & Technology (A), NH-16, Chaitanya Knowledge City, Rajahmundry -533296, Andhra Pradesh, India ---------- ----------
3)Dr. G. Ramakrishna
Address of Applicant :Associate Professor, Mechanical Engineering Department, Godavari Institute of Engineering & Technology (A), NH -16, Chaitanya Knowledge City, Rajahmundry-533296, Andhra Pradesh, India ---------- ----------
4)Dr. K T Thilagham
Address of Applicant :Assistant Professor, Department of Metallurgical Engineering, Government College of Engineering, Salem-11, Tamil Nadu, India ---------- ----------
5)Kurmana Prema Kumar
Address of Applicant :Associate Professor, Department of Mechanical Engineering, Sri Venkateswara College of Engineering and Technology, Etcherla, Srikakulam, Andhra Pradesh-532410, India ---------- ----------
6)Dr. M.Mohan Prasad
Address of Applicant :Associate Professor, Department of Mechanical Engineering, M.Kumarasamy College of Engineering, Karur, Tamil Nadu-639113, India ---------- ----------
7)Mr. M. Sudhakar
Address of Applicant :Assistant Professor, Department of Mechanical Engineering, Sri Sai Ram Engineering College, West Tambaram, Chennai, Tamil Nadu – 600044 ---------- ----------

(57) Abstract :
The invention relates to a novel system and method for task scheduling of machine-learning workloads in cloud computing environments. This innovative solution leverages dynamic resource allocation, predictive analytics, and automation to optimize resource utilization and enhance operational efficiency. By continuously learning from historical data, the system refines resource allocation strategies, aligns with service-level agreements, and maximizes return on investment through cost optimization. It embraces cloud-native principles, supporting scalability and flexibility, and democratizes access to advanced AI capabilities, catering to diverse industries and use cases. The proposed system's adaptability, automation features, and predictive analytics make it a catalyst for efficiency and competitiveness in the digital age, driving the next wave of AI-driven innovation and progress in the modern business landscape. Accompanied Drawing [FIGS. 1-2]

No. of Pages : 24 No. of Claims : 10