

(12) PATENT APPLICATION PUBLICATION

(21) Application No.202511128965 A

(19) INDIA

(22) Date of filing of Application :19/12/2025

(43) Publication Date : 23/01/2026

(54) Title of the invention : A SYSTEM FOR REAL-TIME CONTEXT-AWARE AI ORCHESTRATION FOR PILGRIMAGE SAFETY AND ASSISTANCE

(51) International classification	:H04W 4/90, G06Q 50/26, G06Q 10/06, H04W 4/029, G08B 25/01	(71)Name of Applicant : <b>1)Swami Rama Himalayan University</b> Address of Applicant :Swami Rama Himalayan University, Swami Ram Nagar, Jolly Grant, Dehradun-248016 Dehradun Uttarakhand India (72)Name of Inventor : <b>1)Kamal Preet Singh</b> <b>2)Saloni Goel</b> <b>3)Harsh Narayan Rajbhar</b> <b>4)Shobhit Panwar</b> <b>5)Shivam Sharma</b> <b>6)Gautam Rawat</b>
(31) Priority Document No	:NA	
(32) Priority Date	:NA	
(33) Name of priority country	:NA	
(86) International Application No	:	
Filing Date	:01/01/1900	
(87) International Publication No	: NA	
(61) Patent of Addition to Application Number	:NA	
Filing Date	:NA	
(62) Divisional to Application Number	:NA	
Filing Date	:NA	

(57) Abstract :

The present invention pertains to a real-time context-aware system that enhances pilgrimage safety by integrating multiple sensor interfaces for acquiring environmental and user-specific data, a data collection and ingestion module for normalization, and a context interpretation module for fusing heterogeneous inputs into a coherent situational picture. A guidance and recommendation module generates personalized instructions while an emergency awareness and assistance subsystem detects risks via threshold and time-series analysis, triggering emergency alert payloads. An edge support module maintains critical functionality during connectivity loss, and an external integration interface ensures secure communication with third-party service providers. A centralized processing engine, coupled with a machine learning module, orchestrates data fusion and predictive analytics within an edge-cloud framework to deliver adaptive, real-time safety and assistance solutions.

No. of Pages : 27 No. of Claims : 10