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Yuxin Tang (Rice University)
Zhe Jiang (University of Florida)
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LETTER FROM THE EDITORS IN CHIEF

We are pleased to present the fourth issue of Volume 19 of the Proceedings of the VLDB Endowment (PVLDB).

This fourth issue of Volume 19 includes 19 papers spanning the following primary subject areas: Data Mining and Analytics (1); Database Engines (5); Database Performance and Manageability (1); Distributed Database Systems (1); Graph and Network Data (6); Information Integration and Data Quality (2); and Specialized and Domain-Specific Data Management (3). Together, these papers represent a broad and diverse cross-section of the areas addressed by PVLDB.

In this issue, we continue to see significant innovations and advances in a number of core areas of database systems. A notable concentration of papers focuses on data access and data layout, including advances in indexing and search techniques, as well as innovations in compression, storage organization, and memory management. These contributions reflect sustained efforts to improve performance and efficiency under modern hardware and workload constraints. The issue also includes work on the fast verification of strong isolation guarantees, highlighting the community's continued commitment to transactional correctness and system reliability at scale.

Graph and Network Data emerges as another particularly active area, with multiple papers addressing scalable graph data management and analytics. These works tackle challenges such as complex pattern analysis and evolving graph structures, often employing scalable or approximate techniques to enable efficient processing over massive datasets. This emphasis underscores a broader trend toward balancing analytical expressiveness with practical scalability.

Finally, the papers in this issue demonstrate the expanding scope of database research to support emerging data modalities and specialized workloads. Contributions include high-dimensional vector data management, privacy-preserving and workload-aware indexing techniques, data-index co-compression for compressed scientific data, distributed and cloud-based systems, and information integration and data quality. These works illustrate how foundational database principles—particularly indexing, compression, optimization, and scalable processing—are being extended to address heterogeneous data types, security and privacy requirements, and modern cloud environments, while maintaining strong performance and correctness guarantees.

We hope you enjoy reading the fourth issue of PVLDB, Volume 19.

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