PingCAP is an innovative database company that created the popular open-source NewSQL database with MySQL compatibility called TiDB, one of the most actively contributed database products on GitHub. PingCAP supports several hundred companies that are using TiDB in production, in industries ranging from e-commerce and fintech, to core banking and gaming. It also fosters an active open-source community around TiDB to increase the pace of technology evolution and maturity. With TiDB, PingCAP delivers one of the only cloud-native hybrid database solutions in the industry that provides both online transactions and analytics in the same system, helping enterprises reduce operational overhead while getting more value out of their data in real-time, without compromising on data consistency and availability.

**Product Profile**

TiDB with PingCAP support is a powerful yet flexible cloud-native NewSQL database solution that handles hybrid transactional and analytical workloads in the same system. It natively integrates with the entire container ecosystem via Kubernetes or Docker, and managed solutions like OpenShift.

**Overview**

Enterprises need a database that scales horizontally in the cloud, lowers operational costs, and delivers value on fresh data in real-time. That solution is TiDB.

**Executive Summary**

TiDB with PingCAP support is a powerful and flexible cloud-native NewSQL database solution where compute and storage capacities can be scaled independently.

**Statement from Partner**

“As more enterprises move to a hybrid or multi-cloud infrastructure setup, they want a single, cloud-native database as their one source of truth. PingCAP is committed to working with Red Hat to deliver TiDB as that solution for our customers,” said Kevin Xu, General Manager of Global Strategy & Operations.

“Red Hat container solutions, like OpenShift, are being widely adopted in multi-cloud scenarios. TiDB, a cloud-native distributed database, will help Red Hat users best leverage their infrastructure resources with a powerful, easy-to-use open-source database.”

**Statement from Red Hat Connect**

“Developers and architects looking to build new applications in, and for the cloud, or migrate existing applications to a cloud-based infrastructure, partner with Red Hat to develop and deliver more supportable solutions sooner.” said Mike Werner, Sr. Director, Global Technology Partners, Red Hat. “Red Hat certification assures a supportable platform for all types of customer deployment models. Red Hat is thrilled to work with software partners like PingCAP resulting in the world’s largest open, and commercially supportable application ecosystem.”
Product Benefits

- **Horizontal Scalability** - TiDB expands both SQL processing and storage by simply adding new nodes. This makes infrastructure capacity planning both easier and more cost-effective than traditional relational databases which only scale vertically.

- **MySQL Compatible Syntax** - TiDB acts like it is a MySQL server to your applications. You can continue to use all of the existing MySQL client libraries, and in many cases, you will not need to change a single line of code in your application.

- **Minimize ETL with HTAP** - TiDB is designed to support both OLTP and OLAP workloads. This means that while you may have traditionally transacted on MySQL and then Extracted, Transformed and Loaded (ETL) data into a column store for analytical processing, this step is no longer required.

- **Cloud Native Architecture** - TiDB is designed to work in the cloud -- public, private, or hybrid -- making deployment, provisioning, operations, and maintenance simple.

- **Distributed Transactions with Strong Consistency** - Transactions in TiDB are strongly consistent. This makes TiDB more comparable to traditional relational databases in semantics than some of the newer NoSQL systems using eventual consistency.

Use Cases

- **MySQL Scalability**: is your MySQL single instance reaching capacity? Don’t shard manually, just use TiDB which handles sharding and scaling automatically.

- **HTAP with sharded MySQL**: is your MySQL tables already sharded and you want more real-time access to analytics? Sync your MySQL tables to a TiDB cluster and run OLAP directly on the same cluster without managing another ETL process.

- **Cloud-Native distributed database**: Use TiDB to have one single relational database distributed across multiple cloud environments as your one source of truth on with OpenShift or Kubernetes.

TiDB is a Red Hat certified container and is available for customer download from the Red Hat certified container registry.