

PowerGres HA Database System

PowerGres HA is SRA's high-availability database solution based on most advanced open-source database PostgreSQL. PowerGres HA enables the enterprise to build database servers across multiple systems that are highly available and highly scalable. In PowerGres HA environment, the PostgreSQL database runs on two or more systems in a cluster environment, while concurrently accessing a single shared database. This extends high availability and scalability benefits for all your applications.

Technical Specifications

- ANSI_SQL99-Standard compliant
- Fully ACID compliant, serializable transactions
- Interfaces for Tel, Perl, C, C++, PHP, ODBC, JDBC, Embedded SQL in C, Python, and Ruby
- GUI administrator tools
- Views, sequences, inheritance, outer joins, subselects, referential integrity
- UNION, INTERSECT and EXCEPT queries
- Rules, Triggers
- User-defined functions, stored procedures
- Procedural languages PL/pgSQL, PL/Perl, PL/Python, PL/TCL, and others
- Extensible data-type system
- Functional and partial serializable indexes
- Unicode and locale support
- Loadable extensions offering full-text search, GIS, XML and other functionality
- Support for SSL and Kerberos authentication
- Cross-database compatibility functions

PowerGres Product Suite

PowerGres Products include:

- PowerGres on Windows
- PowerGres on Linux
- PowerGres Plus (with high-performing and reliable database engine)

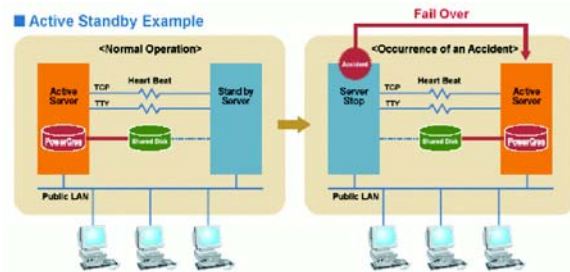
PowerGres HA Solution

PowerGres HA solution includes:

- PowerGres with PostgreSQL database
- Clustering Software: NEC ExpressCluster & Database Agent (for Windows) or SteelEye LifeKeeper (for Linux)
- PowerGres Recovery Kit
- PowerGres yearly support
- Clustering software yearly support

Active-Standby Configuration

The figure below displays the basic system configuration of PowerGres HA. When a failure occurs in the system, clustering software switches PowerGres service running on the active server to the standby server (fail-over).



Benefits

- Most cost-effective high availability database solution
- Reduces downtime for mission critical applications
- Significant performance benefits on 8-way, 16-way, dual-core, and multi-core CPU servers
- Effectively scale-out database environment to any desired capacity
- High reliability and stability
- Ease of use and administration

Environment

PowerGres HA on Windows:

- OS: Microsoft Windows 2000 or 2003 Server
- CPU: 2 Intel Pentium or compatible CPU (300MHz or better)
- Memory: 128MB (256MB is recommended)
- Hard Disk: 100MB

PowerGres HA on Linux:

- OS: Red Hat Enterprise Linux AS/ES 2.1/3.0
- CPU: 2 Intel Pentium or compatible CPU(300MHz or better)
- Memory: 128MB (256MB is recommended)
- Hard Disk: 100MB

PowerGres Plus HA on Linux:

- OS: Red Hat Enterprise Linux AS/ES 2.1/3.0
- CPU: 2 Intel Pentium or compatible CPU(300MHz or better)
- Memory: 128MB (256MB is recommended)
- Hard Disk: 200MB