

A complete and scalable Business Intelligence infrastructure solution



Bull Fast Track

Bull Fast Track, a complete and scalable Business Intelligence solution is designed by Bull to meet the specific requirements of query processing. Totally integrated and benefiting from performance specifically optimized for a Business Intelligence use, Bull Fast Track is very easy to deploy. In addition, this solution integrates the Microsoft SQL Server® 2008 database engine combined with the services related to data integration, multidimensional analysis, data mining and reporting provided by Microsoft SQL Server® 2008.

A complete and integrated solution

Bull Fast Track is a Data Warehouse and Business Intelligence solution that integrates all decision-support components.

Bull Fast Track not only includes a database engine to build a powerful data warehouse or datamarts, but also dedicated environments for:

- Data integration;
- Analysis and reporting;
- Backups and recoveries.

The whole solution is monitored and managed from a centralized environment. In addition, an integrated backup server provides business continuity with no impact on performance.

A high performance and scalable architecture

Bull Fast Track is based on the SQL Server Fast Track Data Warehouse reference architecture defined by Microsoft®, with the following features:

- A sequential access to data that enables increased and linear performance versus random access;

- A tight coupling between hardware and software in order to deliver the best possible performance by making the most of each solution component.

In order to fit diverse needs, Bull Fast Track provides two scalable models: Bull Fast Track R460 & Bull Fast Track R480.

Reducing costs and complexity

Built around standard components, Bull Fast Track is ergonomic and simple to install.

With this solution, Business Intelligence projects can be rapidly deployed while cutting down investment and operational costs.

Bull, as an integrator of complex infrastructures, provides all the assistance you need during the project deployment:

- A turnkey integrated solution;
- High-level services to guarantee a perfect integration into the Business Intelligence System: level 2 & 3 support, POC center, competence transfer.

Complete, integrated and supported services

A pool of services

Bull Fast Track gathers in a unique way all the services required by business intelligence:

SQL Server 2008 Data base

Bull Fast Track hosts the Microsoft SQL Server 2008 data base engine in a dedicated Intel Bull NovaScale architecture. The RDBMS has a direct access to an available and secured data space in a dedicated storage sub-system.

Data Integration

Bull Fast Track includes Microsoft SQL Server 2008 Integration Services (SSIS) which enables the extraction & transformation of data from a variety of sources such as: XML data files, flat files and relational data sources, and loading in the data base.

Multidimensional analysis

Microsoft SQL Server Analysis Services (SSAS) is natively integrated in Bull Fast Track in a dedicated architecture to efficiently design and manage multidimensional structures, including detailed and aggregated data. Thanks to SSAS, complex data mining solutions can be designed to highlight data trends and patterns, thus facilitating the decision-making process.

Reporting

Bull Fast Track includes Microsoft SQL Server 2008 Reporting Services. SSRS provides a comprehensive set of ready-to-use tools and services to help creating, deploying and managing reports for the organization. In addition, SSRS delivers programming functionalities to extend and customize report creation.

Management and monitoring

The management of Bull Fast Track is centralized on an integrated console by Bull System Management (BSM) and Microsoft SQL Server Management Studio.

High Availability

Bull Fast Track includes a spare compute server. This server is automatically activated in case of failure of either the data base server or the multidimensional analysis service with no impact on performance.

Backup

Bull Fast Track includes a storage space dedicated to the backup and recovery of user data. These operations can be made through the backup mechanisms provided by Microsoft SQL Server 2008. This storage space is accessible by third party archiving solutions.



An efficient scalable process

Bull Fast Track is a flexible and scalable solution designed for simple as well as mission-critical projects. The solution consists of two scalable on site models: Bull Fast Track R460 & of Bull Fast Track R480.

Bull Fast Track R460	Bull Fast Track R480
<p style="text-align: center;">SERVERS</p> <p>Three Bull NovaScale R460 servers</p> <p>Processors 2 x 4 Core Intel Xeon E5440, 2.83 GHz, 2x6 MB Cache</p> <p>Memory 64GB 667MHz, 8X8GB, Quad Ranked DIMMS</p> <p>Internal Disks 2 x 73GB 2.5" SAS 10k 6 x 300GB 2.5" SAS 10k</p> <p>Operating System Windows Server 2008 EE 64 bits</p> <p>Two Bull NovaScale R460 servers</p> <p>Processors Dual Quad Core Intel Xeon E5440, 2.83 GHz, 2x6 MB Cache</p> <p>Memory 16 GB 667MHz, 2X8GB, Quad Ranked DIMMS</p> <p>Internal Disks 6 x "250GB 2.5"" SATAII 7.2k</p> <p>Operating System Windows Server 2008 EE 64 bits</p>	<p style="text-align: center;">SERVERS</p> <p>Three Bull NovaScale R480 servers</p> <p>Processors 4 x 6 Core Intel Xeon X7460, 2.67 GHz, 16 MB Cache</p> <p>Memory 256GB 667MHz, 32 X8GB memory sticks</p> <p>Internal Disks 2 x 73GB 2.5" SAS 10k 6 x 300GB 2.5" SAS 10k</p> <p>Operating System Windows Server 2008 EE 64 bits</p> <p>Two Bull NovaScale R480 servers</p> <p>Processors Dual Quad Core Intel Xeon E5440, 2.83 GHz, 2x6 MB Cache</p> <p>Memory 16 GB 667MHz, 2X8GB, Quad Ranked DIMMS</p> <p>Internal Disks 6 x "250GB 2.5"" SATAII 7.2k</p> <p>Operating System Windows Server 2008 EE 64 bits</p>
<p style="text-align: center;">STORAGE</p> <p>2 EMC CX4-240 2 DAE per EMC with up to 28 disks with: - option 1: 300GB 15K FC - option 2: 400GB 10K FC</p> <p>1 EMC CX4-120 1 DAE with up to 14 disks with 400GB 10K FC 1 DAE with up to 14 disks with 1TB 7.2K FC</p>	<p style="text-align: center;">STORAGE</p> <p>6 EMC CX4-240 2 DAE per EMC with up to 28 disks with: - option 1: 300GB 15K FC - option 2: 400GB 10K FC</p> <p>1 EMC CX4-120 1 DAE with up to 14 disks of 400GB 10K/rpm FC 1 DAE with up to 14 disks de 1TB 7.2K FC</p>
<p style="text-align: center;">SOFTWARE</p> <p>Microsoft SQL Server 2008 EE</p> <ul style="list-style-type: none"> • Database Engine • Integration Services • Analysis Services • Reporting Services • SQL Server Management Studio • SQL Server BI development Studio • SQL Server Report Builder 2.0 <p>Bull System Management</p> <ul style="list-style-type: none"> • BSM 1.x 	<p style="text-align: center;">SOFTWARE</p> <p>Microsoft SQL Server 2008 EE</p> <ul style="list-style-type: none"> • Database Engine • Integration Services • Analysis Services • Reporting Services • SQL Server Management Studio • SQL Server BI development Studio • SQL Server Report Builder 2.0 <p>Bull System Management</p> <ul style="list-style-type: none"> • BSM 1.x

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