

Data Platform for Hadoop

Pre-designed and pre-validated solution,
 ideal for distributed processing of large-scale data
 Common platform for all batch and real-time processing needs

As the information-based society is evolving, the progress in the field of IoT (Internet of Things) is bringing tremendous change in both the quality and quantity of information, and producing an enormous amount of data on daily basis. Creating new business value and transforming the existing processes from this ever-increasing data are the applications of the technology known as “Big Data”.

The IT systems, responsible for processing such data, are now expected to efficiently accumulate and analyze following types of data.

- Wide range of data (photos, videos, voice, chapter, logs, sensor data, SNS)
- Mass data (knowledge obtained from more information)
- Various types of data freshness (accumulated data and latest data)

NEC provides to its customer best in class solutions comprising essential applications and engines to handle such kinds of data.

This Data Platform for Hadoop, newest offering of NEC, is a common execution platform for these solutions.

All batch & real-time processing needs

A common platform for all batch & real-time processing of large scale data.
 It employs “Hortonworks Data Platform (HDP™)”, which is comprised of “Apache Hadoop” for distributed processing of large scale data and “Apache Spark” that enables efficient in-memory processing and real-time processing.

Batch Processing: Hadoop

Real-time Processing: Spark

Express5800 Servers: HDD, HDD, HDD. Analytics of data in HDD

DX Servers: Analytics of data in memory

Data Platform for Hadoop

Starter | Booster

Ideal for unstructured data processing

It allows accumulation of large scale data without changing its original structure.
 This greatly increases the possibilities of utilizing the data, because the data structure can be specified as per the intended use of application, when reading the data.

Structured Data (CRM, ERP, Billing, etc.)

Unstructured Data (Photos, Videos, Voice, etc.)

Accumulate in common platform

Quick deployment & Stable operations

A pre-designed and pre-validated integrated system, which combines necessary hardware and software.
 It shortens the deployment period and stabilizes the quality of platform.
 It is furnished with Express5800 Servers for large scale data accumulation, and DX Servers with wide memory bandwidth for in-memory distributed processing.

Application development and operations

Platform design and deployment

Individual SI: Scalability Designing, Platform Testing, Tuning, Sizing, HW/SW selection

Data Platform for Hadoop: Platform Deployment

Shorten the deployment period
 Quality of P-stability

Data Utilization Design

Individual SI | Data Platform for Hadoop

Deployment and Expansion

Data Platform for Hadoop can be deployed according to the intended purpose and scaled-out according to the increase in data volume.

Deployment

Data Platform for Hadoop is a common platform for all data accumulation, batch processing and real-time processing needs. Also, there is Starter model for those who want to start from data accumulation and batch processing, and Booster model for those who already have data accumulation platform and want to utilize it for real-time processing.

Model		Data Platform for Hadoop	Starter	Booster
Functionalities	Data Accumulation	✓	✓	
	Batch Processing	✓	✓	
	Real-time Processing	✓		✓

Expansion

Superior far-sighted design, with due consideration to expansion after deployment, allows easy scale-out by just adding nodes depending on the growing data and workload needs.



Product Specification

Model		Data Platform for Hadoop	Starter	Booster
HW	Server	DX Servers Express5800 Servers	Express5800 Servers	DX Servers
	Memory	1.3-13TB approx.	0.7TB approx.	1.3TB approx.
	Storage (Effective storage)	48-1280TB approx. *1 *3	48TB approx. *1	1.2TB approx. *2
SW	OS	Red Hat Enterprise Linux 6.7		
	Hadoop	Hortonworks Data Platform 2.3		

*1: Including space for temporarily stored data

*2: Temporary data storage for analytics

*3: Depends on the system combination

For further information please contact your local NEC representative or:

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