

IBM ICLUSTER SERVICES OFFERINGS

THE IMPLEMENTATION METHODOLOGY AND WHY WE USE IT

Experiences with a large number of customer installations have taught us that unlike other software products, IBM Cluster is a *project* as well as a product. Setting up a truly functional backup system can impact many departments, business processes, and applications. Therefore, with proper planning in place critical aspects of the project will be considered and time to a successful implementation will be reduced.

WHAT'S INVOLVED IN THE ICLUSTER/ICLUSTER SMB METHODOLOGY?

The methodology is delivered in four key phases: Pre Implementation, Implementation Phase I, Implementation Phase II, and Post Implementation.

The **Pre Implementation Phase** involves the following steps:

- Meet with the customer and project team (i.e. IBM personnel, application programmers, network administrators, end-users, etc.) in a *Project Definition Workshop* (PDW). This is an interactive session that allows IBM to collect information on a customer's environment so that an appropriate project plan can be designed. The project team also has an opportunity to ask questions about the solution, and how it impacts their environment or role.
- Perform an analysis to determine application transaction volumes to assist in the optimization of an implementation.
- Produce a number of deliverables for the customer that will identify the environment, results of the transactional analysis, as well as the configuration for the product and project plan.

Implementation Phase I uses the deliverables produced in the Pre-Implementation phase to:

- Install and configure iCluster, synchronize the primary and backup systems, and start mirroring for one target (usually a single application environment).
- Ensure that the replication streams are optimized.
- Conduct operational training and introduce the helpdesk to provide additional support.

Implementation Phase II is designed to help perform hardware or software switching.

- Review software and hardware switching requirements. Assist with the configuration for software switching. Provide recommendations for hardware switching (if required).
- Monitor the replication streams, perform a role-swap test to ensure a fully functional backup system as well as provide training on switching requirements.

The **Post Implementation Phase** ties up the project:

- A wrap-up meeting is conducted to signoff on the project.

WHAT CAN THE CUSTOMER EXPECT?

The customer will be involved at every stage of the project, starting with the Project Definition Workshop (PDW) which is usually a 1-day on-site engagement. During this workshop, the customer should have access to resources that are very familiar with the computer environment, the network, the applications being run, and the business needs of the company. In many cases this involves getting many different departments involved either in one large meeting, or by pulling them in as required. The objective of the PDW is to sign off on the scope statement for the project by both the customer and the IBM consultant.

The customer will also be asked to install a small toolkit on the production System I (about 30MB in size) called DMXtras either before or after the PDW. This toolkit will allow the customer or IBM consultants to turn on journaling for all files required for high availability. After a period of time, the results of the journaling will be stored in a file that can then be FTPed or e-mailed to IBM personnel. This file will be analyzed to provide information on transactional volumes and will result in other deliverables like the Design Architecture, and Implementation Plan.

The customer can expect regular status meetings and updates and can either perform configuration and monitoring themselves or with IBM's involvement. In many cases IBM can access (if allowed) the customer's computing system via dial-in through the ECS modem or via RAS or network devices to perform configuration and problem analysis.

In conclusion, the customer can expect a solid product and a field-tested methodology that ensures a successful high availability implementation.

iCLUSTER SOFTWARE AND SERVICES PROPOSAL

The components for a successful iSeries high availability solution are as follows:

IBM iCluster Licensing

IBM iCluster Software Maintenance SWMA

IBM iCluster Education Options

1 day Knowledge Transfer Only

Or

3 Day Fast Track Package at Customer Site (8pp)

Or

3 Day Public Class per person

IBM iCluster Professional Services

Implementation services [estimated 4 to 12 days – task breakdown below]

For iCluster SMB, IBM offers a five day fixed price package – one day knowledge transfer and a 4 day implementation.

* IBM shall only invoice the Customer for actual time and materials used during implementation, which shall not be greater than 12 days unless Customer has provided prior approval to IBM.

* In addition to the Professional Services fees above the customer will pay reasonable travel and living costs.

* We look forward to working with you on developing a successful implementation plan for your project. If you have any questions about this proposal, please contact me directly.

APPENDIX – ADDITIONAL PROPOSAL DETAILS

IBM iCLUSTER LICENSING

Please note that an iCluster license will be installed on both the primary and secondary System I server and will have full source and target capabilities.

SOFTWARE MAINTENANCE AND SUPPORT

IBM is pleased to offer software maintenance that includes 24/7 telephone support, iCluster version upgrades, full access to the secure IBM website for inter-release builds, documentation, and access to an online knowledgebase for product-related questions.

IBM iCLUSTER EDUCATION

iCluster FAST TRACK is an intensive 3-day training course essential for all iCluster users. After the successful completion of this course, students will have a good understanding of all key

iCluster features and components. The course can be conducted on the customer site with a maximum of eight students or on-site at IBM locations.

IBM PROFESSIONAL SERVICES – PROJECT TASK BREAKDOWN

ID	Task Name	Enterprise iCluster Days	SMB Minimum Requirements
01	Project Definition Workshop (PDW) Install DMXTRAS tools on both systems Run tools	0.5	Opt
02	Implementation Plan (plus modifications)	0.25	Opt
	Checkpoint		
03	Education	3.0	1.0**
	Checkpoint		
04	Journaling (plus modifications)	0.5	Opt
05	Transaction Analysis (using engineering toolkit)	0.5	Opt
06	Workload optimization (work files and large files)	0.5	Opt
07	Environment Review	0.5	Opt
08	Design Architecture and naming conventions	.25	Opt
	Checkpoint		
09	Software installation plus service packs	0.5++	0.5
10	Configuration and re-journaling	0.5	0.5
11	Initial Synchronization	0.5	0.5
12	Monitor groups for exceptions	1.0	1.0
13	Synchronization Check of groups	1.0	0.5
14	Automation of operator procedures	0.5	Opt
15	Problem determination & corrective action	1.5	1.0
	Checkpoint		
16	Review switching requirements	0.5	Opt
17	Configure switching	1.0	Opt
18	Recovery test	1.0	Opt
19	Problem determination & corrective action	0.5	Opt
	Checkpoint		
	Total days	12 days	4 days

Opt	Indicate task will not be part of consulting services for SBM but can be purchased for additional cost	**	1 Day knowledge transfer that covers – concepts, configuration, operations block
++	Two System I servers only		