

Adaptive Computing Use Cases

Ways to Make Your System Landscape
More Flexible

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As a result of this presentation, you will be able to:

- **Understand the idea of SAP's Adaptive Computing**
- **See that there are many different situations in which Adaptive Computing can be of help to save money and make operations easier, also in your company**
- **Know what can be expected from SAP's Adaptive Computing in future**

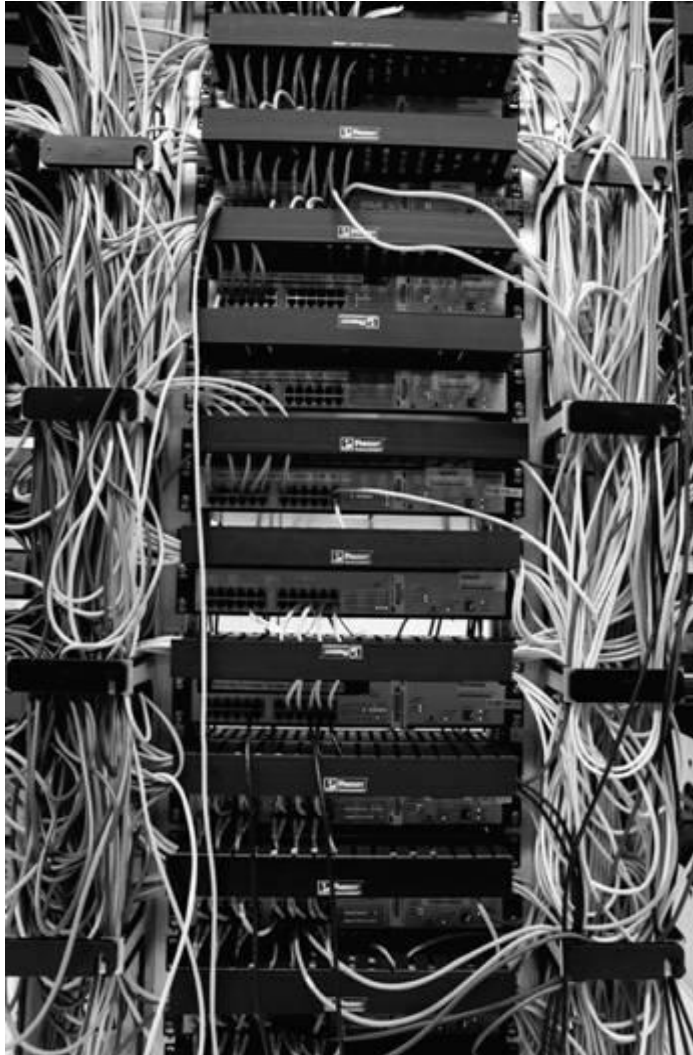
Agenda



- 1. Introduction: What does Adaptive Computing do?**
2. Saving Potentials with Adaptive Computing
3. Adaptive Computing Use Cases
4. Concepts to start with Adaptive Computing
5. Preview: Ramp-Up ACC 7.1

Today's Pain Points

SAP



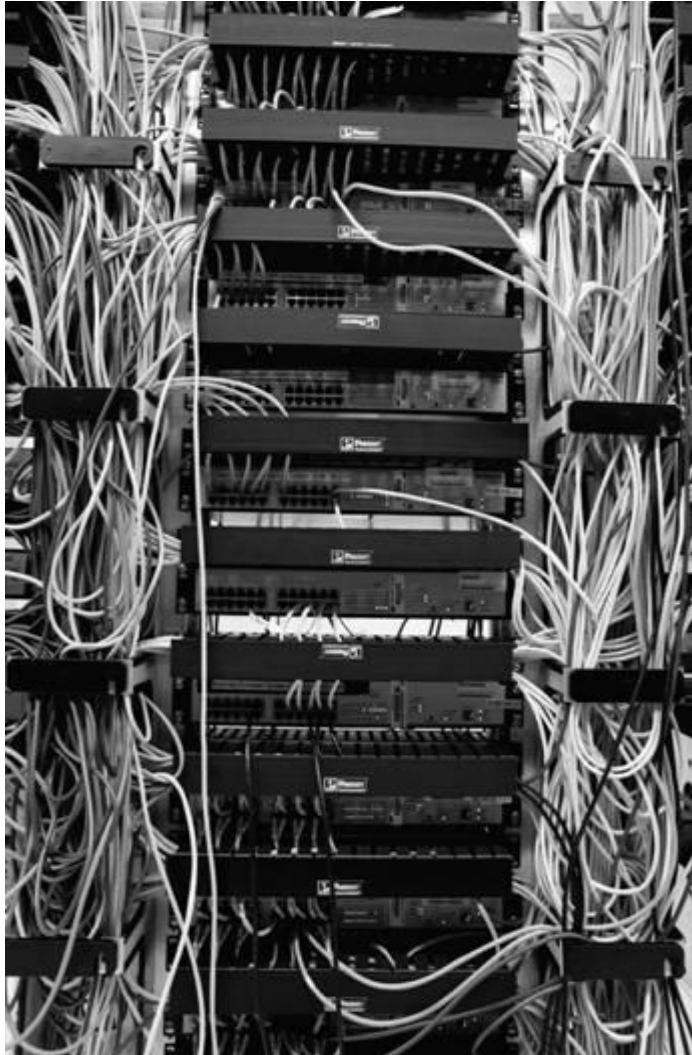
➔ **Insufficient server utilization**

➔ **Complex IT landscapes**

➔ **Low flexibility to assign and utilize hardware resources**

➔ **High effort to setup and integrate new components into existing infrastructure**

Today's Challenges



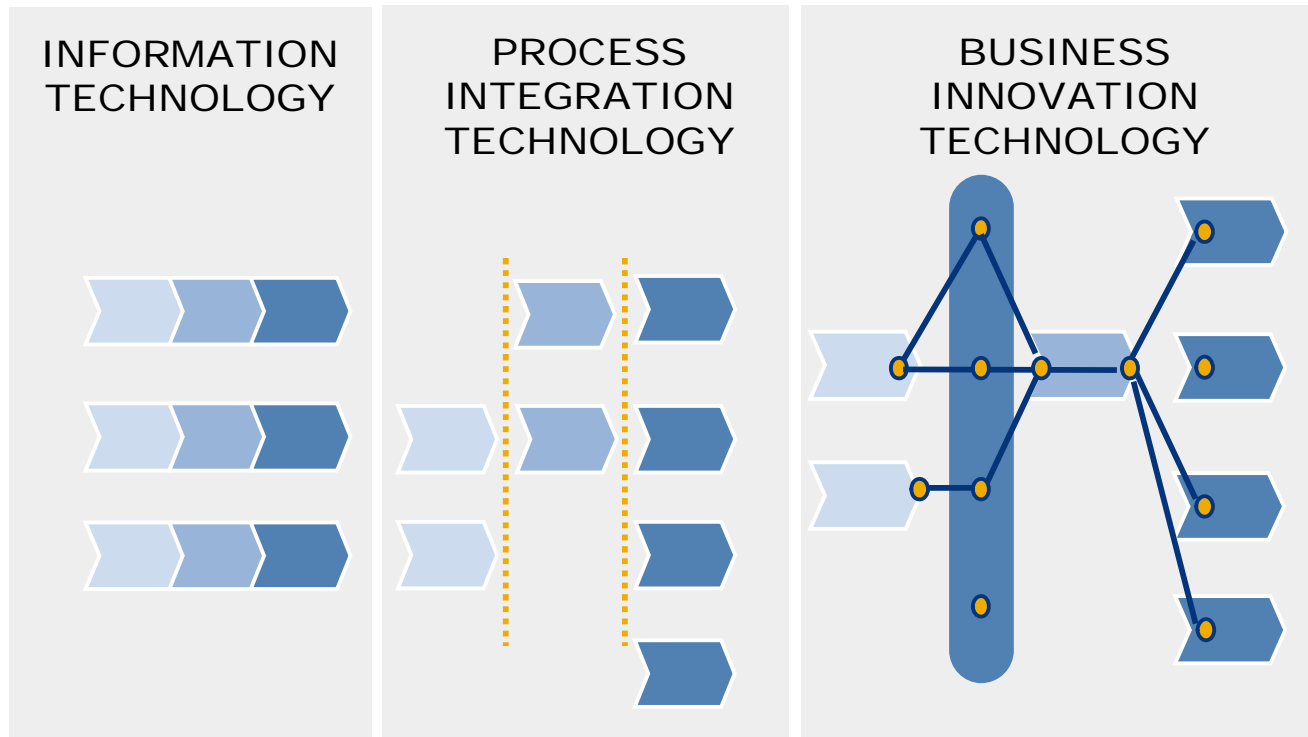
← CEO needs to reduce cost of growth

← CIO needs to Reduce Cost of Operations

← IT-Organisation needs to simplify operations

← Growing complexity has to be countered with enhanced flexibility

Changing Focus of IT



- While Enterprise SOA is increasing flexibility on the application side Adaptive Computing increases flexibility on the IT infrastructure
- To react on today's business processes, the IT infrastructure needs to react on changing requirements
- An adaptive business solution requires an adaptive computing infrastructure

COMPUTING

- Compute nodes are physical boxes or any virtualized computing instance
- Add and remove computing resources with low admin efforts

NETWORK

- Connects computing nodes to each other
- Builds up connection between building blocks 'Computing' and 'Storage'
- Transport layer for virtualization

CONTROL

- Adaptive Computing Controller in SAP NetWeaver
- Single point of control to operate, observe and manage
- Capability of SAP NetWeaver
- Based on Standards
- Interface to third party software

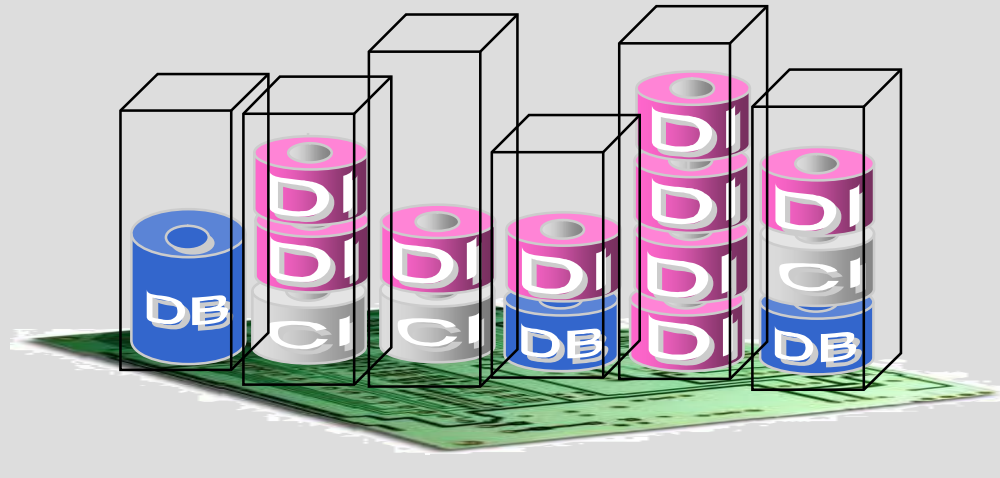
STORAGE

- Application data stored on centralized storage system(s) within a network
- Any topology (IP, FC...) supported
- No local disk space required to run SAP applications

Increased Flexibility with Hardware Pooling



COMPUTING

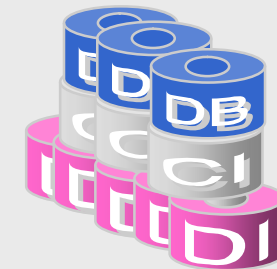


NETWORK

CONTROL










STORAGE



ACC Feature Summary



-  **Server Pooling:**
One flexible server pool for all SAP systems means resource sharing
-  **System relocation:**
Move SAP systems to autoselected or manually selected server
-  **System parking lot:**
Stop idle SAP systems and “wake up” if needed
-  **Easy and fast hardware replacement:**
Test and auto-configure new hardware
-  **Mass Operation:**
shutdown and startup of all SAP systems in a datacenter with one command.
-  **Simplicity:**
Operator enabled” instead of “expert required”
-  **Task Planner:**
Schedule planned SAP system start/stop, move systems

What does Adaptive Computing do?

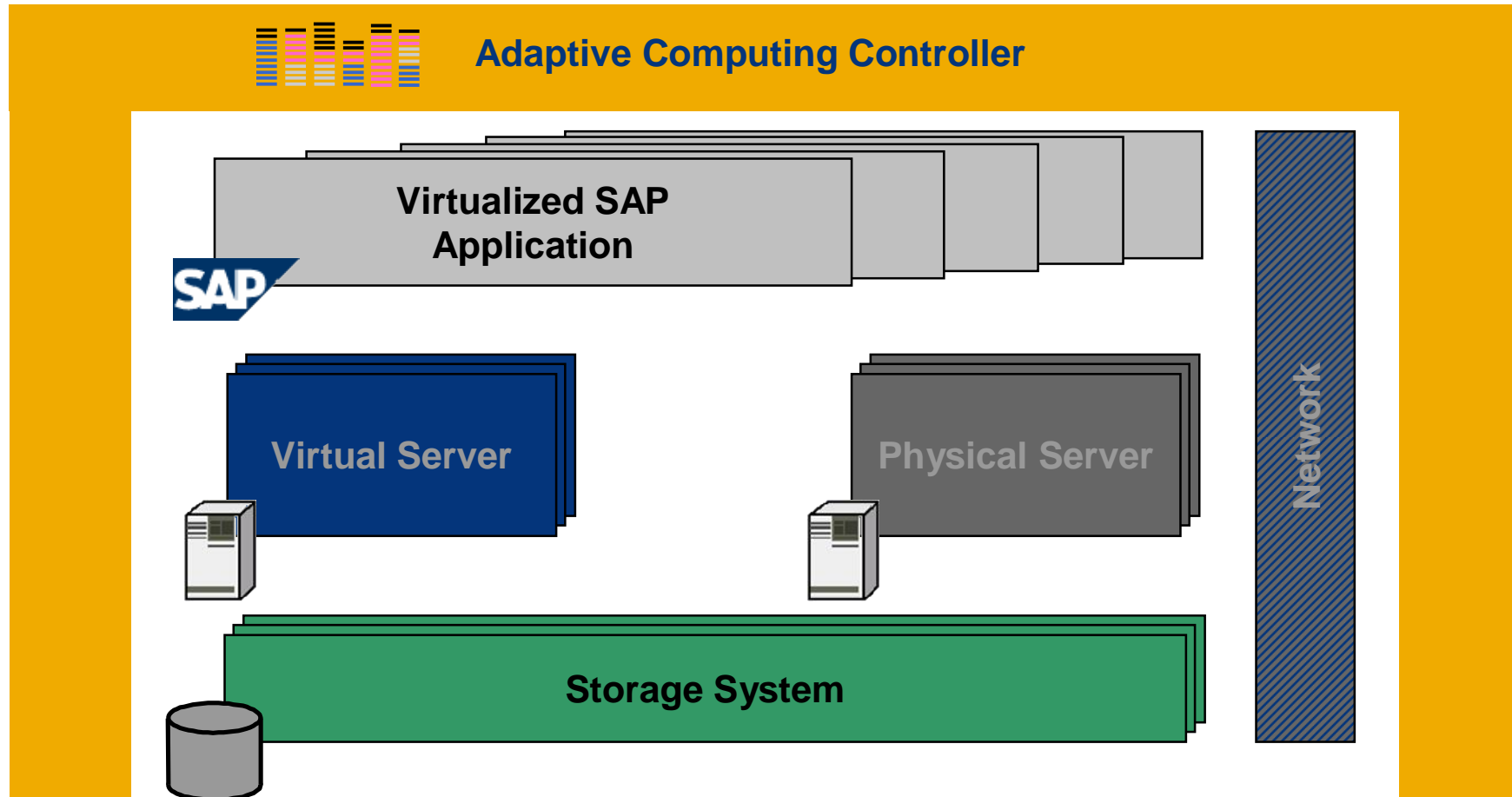


Adaptive Computing (AC) offers an approach for the **dynamic assignment of hardware resources**. In an Adaptive Computing Infrastructure, you can, for example, very quickly **move systems** for which a server is no longer providing the required performance to a more powerful server. Dialog instances can be flexibly started on free servers to absorb spikes in workload. Another situation in the computer center could be development and training systems that are stopped at night to support the **background operation** of productive systems with their free servers.

The objective of Adaptive Computing is to operate

“any service – any time – on any server”.

Adaptive Computing in a Virtualized IT World



Adaptive Computing

- Operate virtual and physical IT- resources in an Adaptive Computing landscape
- Hide complex landscapes with the help of the Adaptive Computing Controller

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SAP Adaptive Computing

Key Saving Areas

Saving Potential



Lower Hardware Costs

Harmonization of IT landscape by using computing power and storage as shared resources for dynamic business needs



20% landscape cost reductions have been seen through better resource utilization, smaller spare-part inventories and increased power negotiation



Reduced Cost of Operations

Simpler, less complex operations. Easy setup and integration of new components into common infrastructure



5-10% of cost reductions in operations identified to be possible



Ease of Operations

Satisfied Customers / Users by high service levels ensure high availability and reliability



Increased productivity through quicker response times and zero planned downtimes (due integrated high availability and flexibility)

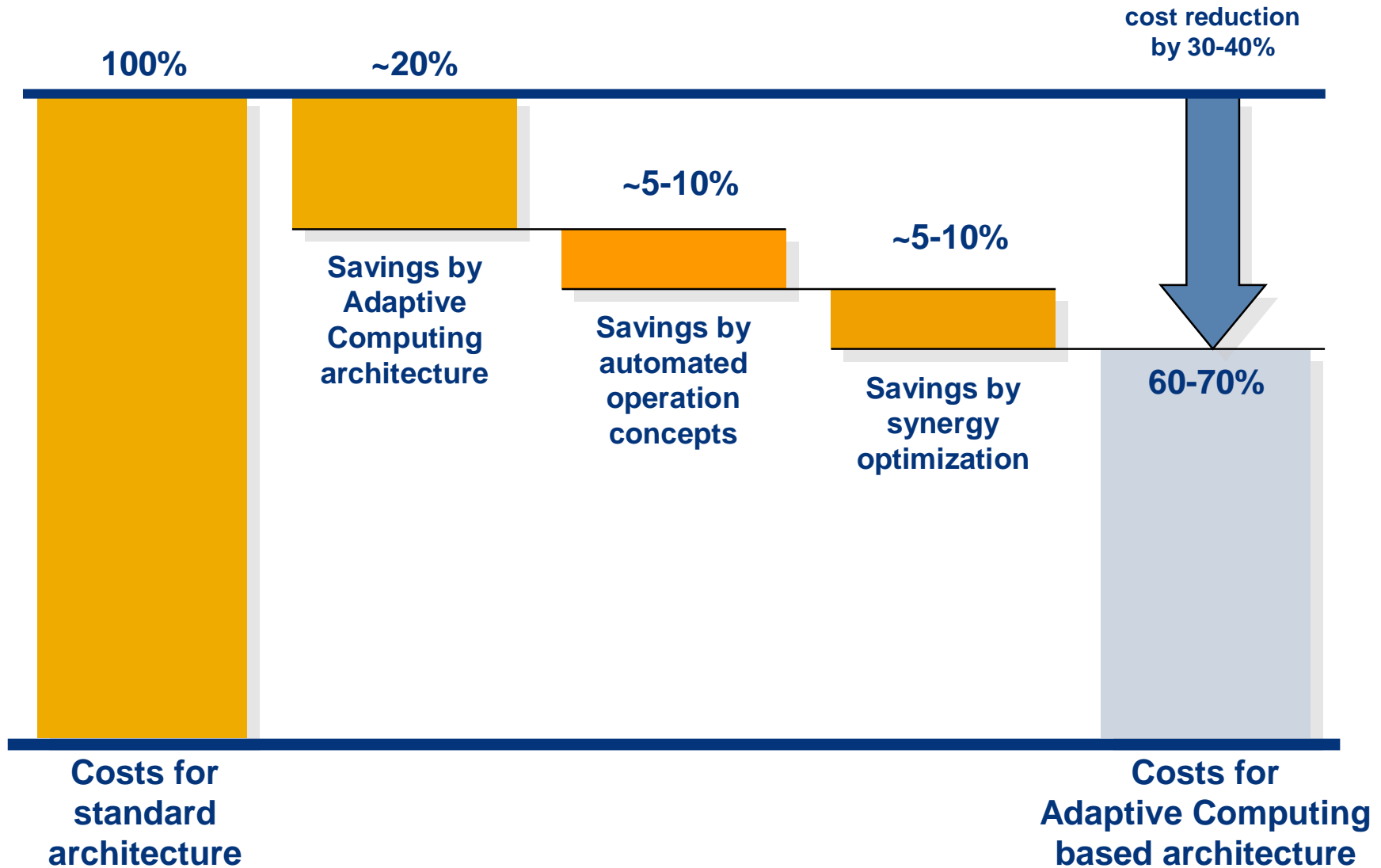


Colgate reports immense reduced costs for SAP devoted hardware

**Customer
Successes**

T-Systems reports TCO savings by around 25%

Adaptive Computing – TCO Examination



ACC Survey: Examples



Type of Task	Frequency (monthly/weekly/daily)	Duration of Task (hh:mm:ss)	Estimated Duration without AC	Frequency (monthly/weekly/daily)	Duration of Task (hh:mm:ss)	Estimated Duration without AC
Customer 1				Customer 2		
Start/Stop of Dialog Instances	3.6 x faster	00:00.50	00:03.00	Monthly	00:05.00	00:05:00 (skript)
Start/Stop of SAP Systems	n/a			Monthly	00:10.00	00:10:00 (skript)
Relocation of SAP Systems	n/a			12 x faster	00:10.00	02:00.00
Relocation of Dialog Instances	6 x faster	00:01.40	00:10.00	12 x faster	00:10.00	02:00.00
Relocation of Databases	n/a			12 x faster	00:20.00	04:00.00
Hardware Maintenance (Server replacement, end of lease etc.)	n/a			12 x faster	00:20.00	04:00.00
Software Maintenance (OS, patching etc.)	monthly	ref. to relocation	ref. to relocation	6 x faster	00:20.00	02:00.00
Alternating System operation day/night shift	n/a	Spaces for additional savings with Adaptive Computing?		-		
Task planning for peak system use (month end, year end, campaigns etc.)	n/a			-		
Start/Stop of Test Systems	n/a			Daily	00:10.00	00:10.00
Use of Test Data Migration Server (TDMS)	n/a			-		

The Most Valuable Ecosystem to Customers



SAP NetWeaver™

SAP Hosting

SAP Managed Services: SAP Hosting and the Application Management & Hosting Division of SAP Systems

2005. They now offer global delivery application management services to more than 300 customers from over 20 countries. They now rely on up-to-date SAP-expertise

Key Challenge

Designing future-proof IT infrastructure with a special focus on cost, flexibility, and performance

Implementation Highlights

- first systems transferred to SAP Hosting
- Implementation now supports more than 300 customers

Key Benefits

- Realization of potential savings
- Greater economy through optimized resource usage
- More flexibility and speed in addressing requirements
- Faster processes for service delivery, performance tuning and higher service quality

© SAP AG 2008, Adaptive Computing Overview | Maria Knaack

"SAP adaptive computing is clearing the way for successful operations by..."

SAP NetWeaver™

T-Systems

T-Systems, a division of Deutsche Telekom, is one of the leading information and communications technology (ICT) service providers in Europe. The company provides Deutsche Telekom's largest business customers with integrated, end-to-end ICT solutions. Focus is on systems integration, computing, desktop and network services, and international carrier solutions. Today, the SAP NetWeaver platform helps the company in the best possible manner.

Key Challenge

Adopt an adaptive computing IT infrastructure to serve more customers, reduce costs, and increase flexibility

Implementation Highlights

- Installation of the Adaptive Computing Controller in data centers in Germany. The tool is at the beginning of a global rollout

Key Benefits

- Allows customers to access IT services on a usage-related basis
- Enables company to scale its IT infrastructure growth

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"The Adaptive Computing Controller tool from SAP is bringing a new dimension of flexibility and quality to our operations. We will use it to..."

SAP NetWeaver™

Colgate

Colgate Palmolive is the worldwide leader in Oral Care, Personal Care, Household Surface Care, Fabric Care and Pet Nutrition. Colgate has global presence with operations in over 223 countries around the world and revenue of \$10+ billion. Major global brands include Colgate, Palmolive, Mennen, Kobayashi, Ajax, Soudline, Feb, Hill's Science Diet and Hill's Prescription Diet Pet Foods.

Key Challenge

Overall Goal was to lower TCO.

Implementation Highlights

- "FULL Adaptive Computing Enablement" of all SAP Solutions
- Enable Application Server Provisioning and Transition using central Storage

Key Benefits

- In addition to providing dramatic savings, the Adaptive Computing Controller has simplified Colgate's system landscape and reduced the amount of time and resources previously dedicated to managing the complexity of our old IT landscape.
- Enables company to improve flexibility being able to quickly react on changing business demands

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"With the Adaptive Computing Controller tool from SAP, Colgate has reduced the total cost of running its SAP-devoted hardware by 70 percent."

Jim Capraro,
Colgate-Palmolive



Agenda



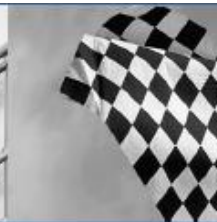
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Use Case „Hardware Maintenance“/Mass Start-Stop



Customer Situation

To start and stop all/a high number of SAP systems e.g. for **hardware maintenance** the admin has to logon to each system and perform the command steps. This is time consuming and shows a lack of efficiency.



The New Approach

Mass Operation

Adaptive Computing offers **mass start/stop** actions from one **central Controller GUI**.

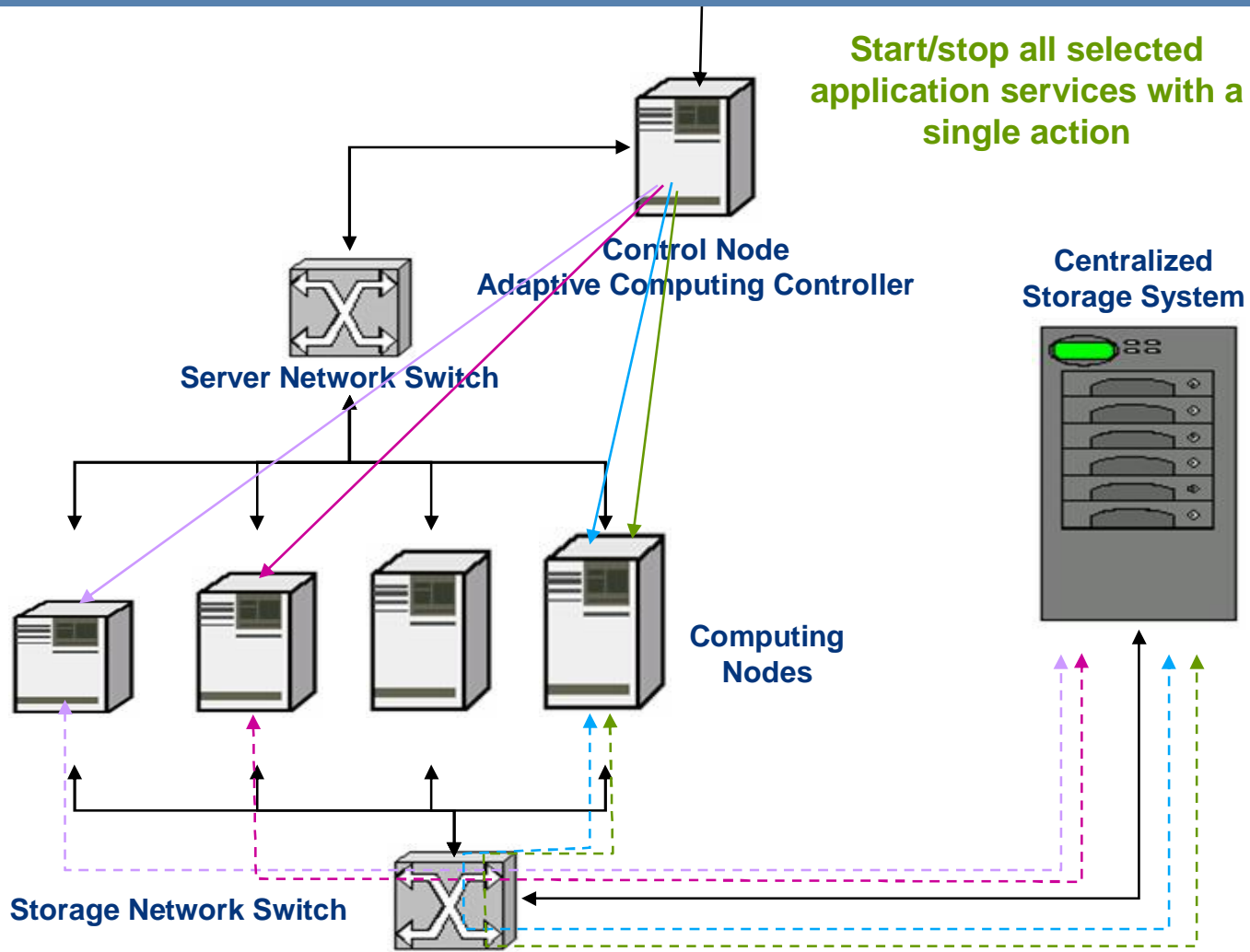
➔ ***Gain efficiency: work fast and comfortably from one central place***

Mass Start/Stop with ACC



Administrator

Start/stop all selected application services with a single action



Mass Operation with ACC



Adaptive Computing Controller | Welcome Astrid Tschense-Oesterle | Help | About | Contact | Log off | SAP

Detailed Navigation

- Logical Landscape
- Physical Landscape
- Controller Log
- Task Planner
- Technical Settings

Adaptive Pools

Status	Pool Name
<input checked="" type="checkbox"/>	Administration P...
<input checked="" type="checkbox"/>	Production Pool
<input checked="" type="checkbox"/>	Windows Pool

Shortcuts

- PAM
- SMP adaptive
- Google

Logical Landscape

Show: All | Get: | Go | View: Detailed | Refresh

Overview	Description	Status	Server
Production Pool			
Enterprise Portal			
SAP Netweaver			
CRM			
N04			
SAP R/3			
Windows Pool			
SAP Netweaver			

Zeile 3 von 12

Mass Operation

Action: Stop Services | Resources Check: Enabled

Application Service	Service Type	Description	Current Status	Running at Server	
N04 (DB)	db_maxdb	N04 (DB)	OK	ac703n0	<input checked="" type="checkbox"/>
N04 (CI)	webas_ci	N04 (CI)	OK	ac702n0	<input checked="" type="checkbox"/>
N04 (APP 01)	webas_app	N04 (APP01)	OK	ac799n0	<input type="checkbox"/>

Select all application services you want to include in the action

Use Case „Expansion of Server Landscape“



Customer Situation

Changing the hardware resources for a system is a **manual effort** that can be time consuming and error prone. Hardware has to be tested before it is included in the productive environment.



The New Approach

(Partly) Automated Server Integration

With Adaptive, easy server integration allows customers to purchase only the hardware as needed (even on demand). Customers benefit through reduced operation and costs.

The new hardware can be scrutinized with a test system before the productive system is assigned.

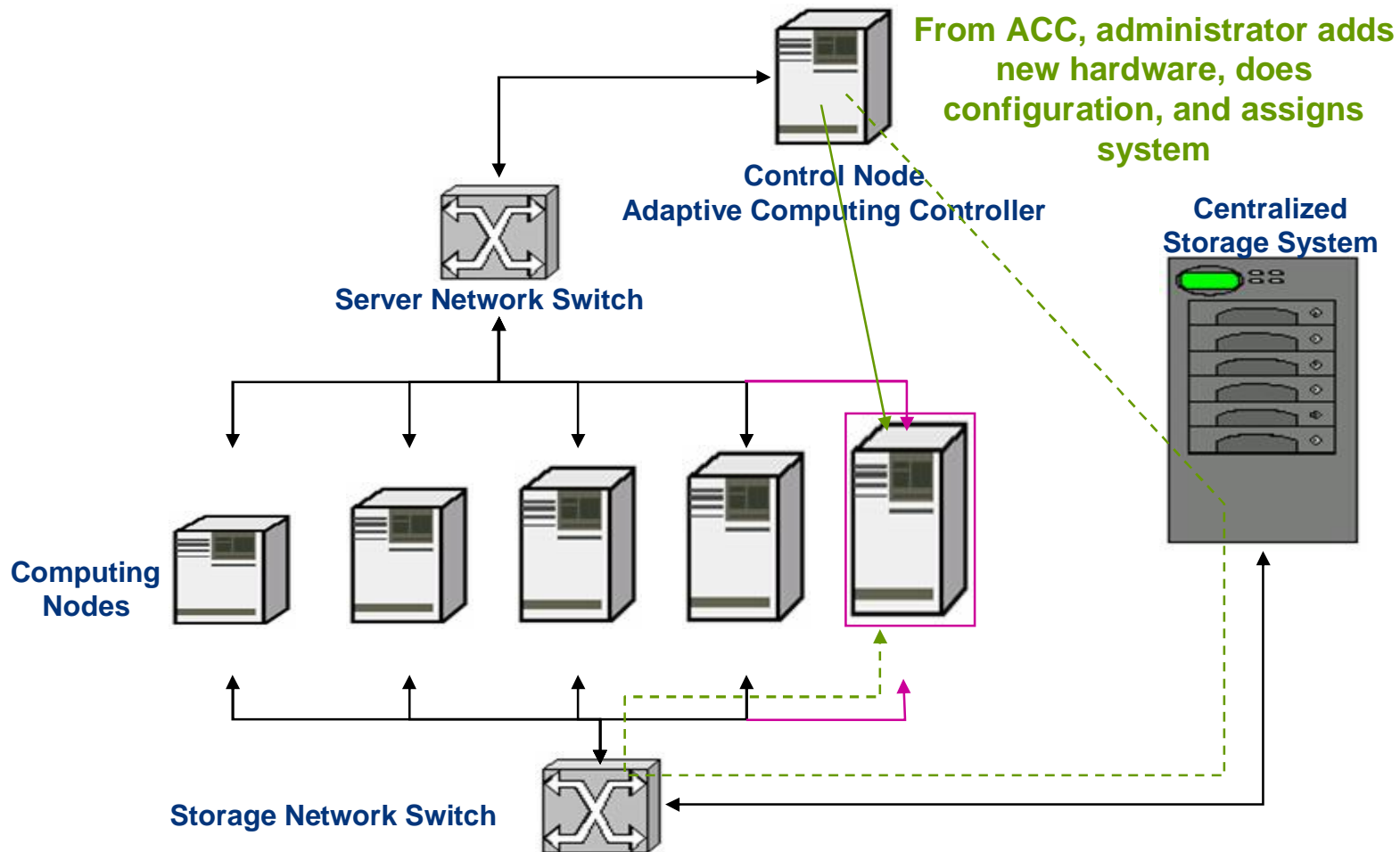


Fast, easy and secure hardware integration

Integrate Hardware with ACC



Administrator



Display of the Physical Landscape in ACC



Server List

Edit Save Cancel

	Hostname	Adaptive	Pool	Network(s)	Referenced Services
<input checked="" type="checkbox"/>	ac703n0	<input checked="" type="checkbox"/>	Production Pool	DEMONETWORK(eth0)	0
<input type="checkbox"/>	ac704n0	<input checked="" type="checkbox"/>	Production Pool	DEMONETWORK(eth0)	0
<input type="checkbox"/>	ac705n0	<input checked="" type="checkbox"/>	Production Pool	DEMONETWORK(eth0)	0
<input type="checkbox"/>	ac706n0	<input checked="" type="checkbox"/>	Production Pool	DEMONETWORK(eth0)	0
<input type="checkbox"/>	ac707n0	<input checked="" type="checkbox"/>	Production Pool	DEMONETWORK(eth0)	0
<input type="checkbox"/>	ac708n0	<input checked="" type="checkbox"/>	Production Pool	DEMONETWORK(eth0)	1
<input type="checkbox"/>	ac709n0	<input checked="" type="checkbox"/>	Production Pool	DEMONETWORK(eth0)	1
<input type="checkbox"/>	ac710n0	<input checked="" type="checkbox"/>	Production Pool	DEMONETWORK(eth0)	0

Zeile 3 von 26

Mass Operation

Reference Server ac701n0 **Map Setting**

Server Details

Hostname	ac703n0	CPU type	I386
Adaptive Enable	yes	CPU clock rate [MHz]	930
		Number of CPU(s)	2
		Main Memory [MB]	2019
		IP-Address	172.23.10.13
		Pool	Production Pool
		SAPS	5000

Network List

Add Remove

	Interface	Network
<input type="checkbox"/>	eth0	DEMONETWORK

Use Case „System Capacity Planning“



Customer Situation

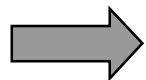
High startup costs for new SAP systems because of hardware max-sizing to fit for increasing load („plan a buffer for growth“).



The New Approach

System Relocation

Adaptive Computing reduces startup costs due to **flexible reaction on system growth**: installation of new systems on sufficient but not oversized server



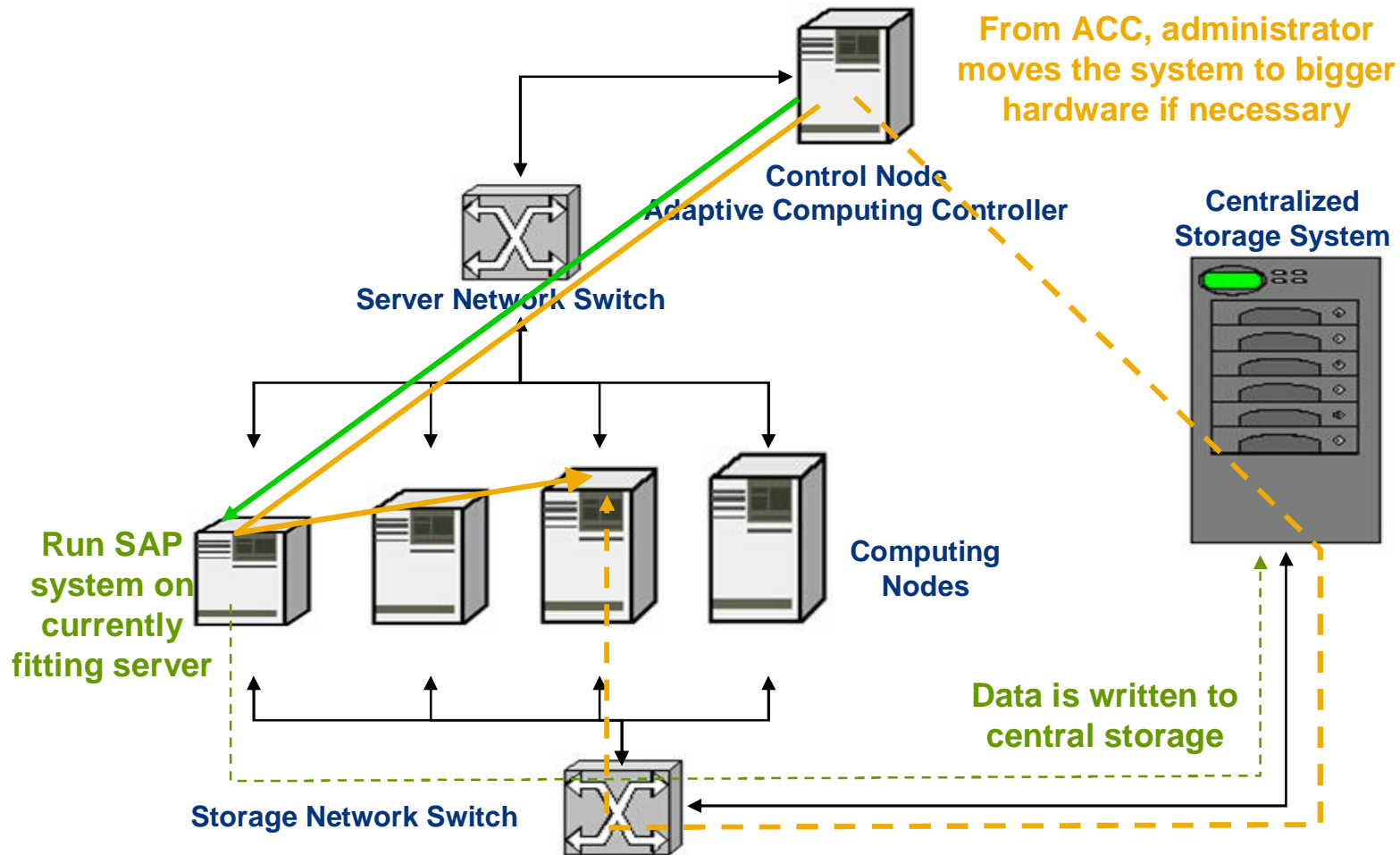
Save money with flexibility: only occupy really needed resources

„The results of the Quick Sizer provide you as a customer with estimated overall hardware requirements needed to fulfill peak throughput and volume business demands. One of the benefits of Adaptive Computing is that it provides flexibility in possibly unforeseen peak situations, helps to avoid over-sizing and assures the best possible capacity utilization.“

System Move to Bigger Hardware with ACC



Administrator



Physical Landscape in ACC



The displayed information helps to select the appropriate hardware for the installed system. In the logical landscape the system can be assigned to the selected hardware.

Adaptive Computing Controller | Welcome Astrid Tschense-Oesterle | [Help](#) [About](#) [Contact](#) [Log off](#) |

Detailed Navigation

- Logical Landscape
- Physical Landscape**
- Controller Log
- Task Planner
- Technical Settings

Adaptive Pools

Status	Pool Name
<input checked="" type="checkbox"/>	Administration P...
<input checked="" type="checkbox"/>	Production Pool
<input checked="" type="checkbox"/>	vWindows Pool

Physical Landscape

Show: All | Get: | Go | Refresh

Overview	CPU's	Clock Rate(MHz)	RAM(MB)	SAPS	OS	CPU Utilization	Mem Utilization	No of Services
ac705n0	2	930	2.019	5.000	Linux	50% green	49%	2
ac706n0	2	930	2.019	5.000	Linux	0% green	5%	0
ac707n0	2	930	2.019	5.000	Linux	0% green	5%	0
ac708n0	2	930	2.019	5.000	Linux	0% green	5%	0
ac709n0	2	930	2.019	5.000	Linux	0% green	5%	0
ac710n0	2	930	2.019	5.000	Linux	0% green	5%	0
ac799n0	4	2.794	3.947	10.000	Linux	0% green	7%	1
vWindows Pool								

Zelle 6 von 13

Server Detail | Properties | Server Log

Server Name	ac799n0	No of CPU's	4	Clock Rate(MHz)	2.794	OS	Linux
Server Pool	Production Pool	Memory	3.947	SAPS	10.000	IP Address	172.23.10.99

CPU Utilization: 0% green | Running Application Services: [N04 \(APP 01\)](#)

Mem Utilization: 7%

Shortcuts

- PAM

Use Case „Temporarily needed Test Systems“



Customer Situation

Too few and inflexible test systems, highly constrained systems resources on which to run tests:

Needs ability to easily set up or recreate and manage test system configurations



The New Approach

System Parking

Adaptive Computing means **resource sharing**. It increases your **flexibility** and helps you to choose from a **pool of test systems**.

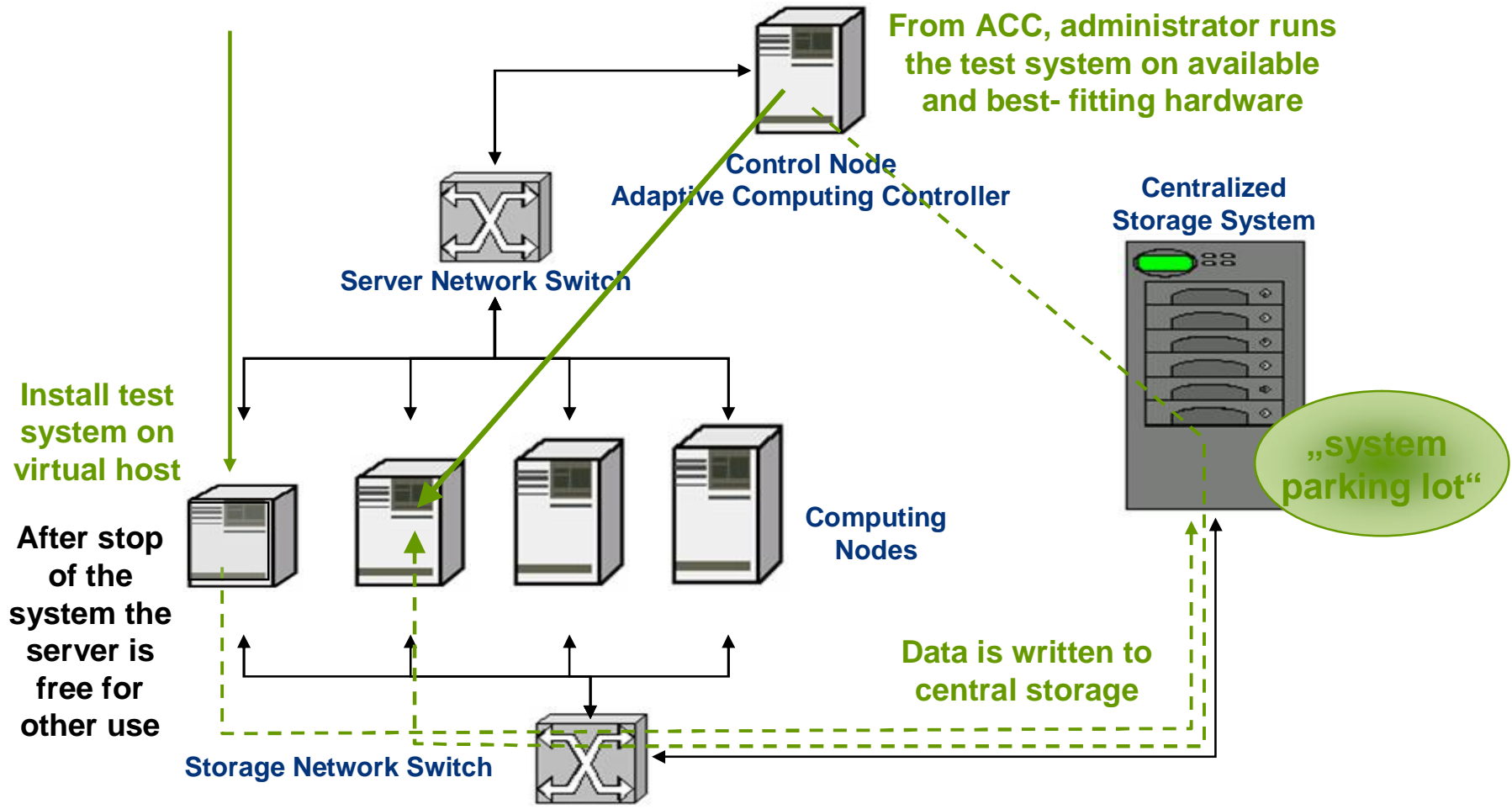


Gain flexibility: resource sharing with on-demand system start

Run Test Systems with ACC



Administrator



Use Case „Sandbox or Project Systems“



Customer Situation

Often, customers wish to pursue a **Proof of Concept (POC) project** or install a **sandbox system** to explore different/additional functionality. By definition these systems are usually temporary in nature and, in many cases, the hardware is rented or hosted.



The New Approach

Customers may implement POC and sandbox systems on **any available hardware**. If necessary, they may be **easily moved** to more appropriate hardware at a later point in time. Customers can get savings since they don't have to purchase additional resources through renting or hosting providers.



Save money, only pay for the time when resources are really used

Start Project Systems on Free Server



Adaptive Computing Controller

Welcome Georg Dittmar

Help About Contact Log off

Detailed Navigation

- Logical Landscape
- Physical Landscape
- Controller Log
- Task Planer
- Technical Settings

Adaptive Pools

Status	Pool Name
<input checked="" type="checkbox"/>	Adaptive Enabled...
<input checked="" type="checkbox"/>	Administration P...

Shortcuts

- service.sap.com/...

Logical Landscape

Show All Get Business Role Go View Simple Refresh

Overview	Description	Status	Server
CR1			
EP1			
ES1			
ES1 (DB)	SAP R/3 Enterprise 4.7 Database	Stopped	
ES1 (CI)	SAP R/3 Enterprise 4.7 Central Instance	Stopped	
ES1 (APP 01)	SAP R/3 Enterprise 4.7 Application Server	Stopped	
TRX			
Administration Pool			

Row 5 of 12

Application Services Properties Configuration Application Log

Start Application Service Relocate Application Service Stop Application Services Resource Check Enabled

Service Pool **Adaptive Enabled Servers** Status **Stopped**

Service Group **Production Systems** Service Type **webas_ci**

Business Role **SAP R/3 Enterprise 4.7** Running At Server

System ID **ES1** Service Name **ES1 (CI)**

Description **SAP R/3 Enterprise 4.7 Central Instance**

Required Hardware

SAPS	Memory	Select Server	SAPS	Memory
275	1,024	-- Auto select --	0	0

You may run the system randomly on any available hardware or manually select a server

Use Case „Training Systems“



Customer Situation

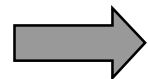
Traditionally, SAP systems are installed on a single server. In the case of training and demo systems, this can cause an **under-utilization** of hardware resources since not all systems may be in use at the same time and those that are in use may not utilize the full capacity of the hardware.



The New Approach

Server utilization e.g. with Dialog Instances

With Adaptive, customers may gain through **server consolidation** through a **pool of resources** that are available for *all* systems, instead of systems dedicated to individual applications. Free resources may be used, e.g. start dialog instance for performance intensive jobs.



Consolidate your server landscape and make best use of your hardware capacity

Task Planner in the ACC



Detailed Navigation

- Logical Landscape
- Physical Landscape
- Controller Log
- Task Planner**
- Technical Settings

Adaptive Pools

	Status	Pool Name
<input checked="" type="checkbox"/>	■	Administration P...
<input checked="" type="checkbox"/>	■	Production Pool
<input checked="" type="checkbox"/>	◇	windows Pool

Shortcuts

- PAM
- SMP adaptive
- Google

Task Planner Overview

Show Get

	Task Name	Date	Time	Recurrence	Resp. Administrator	Status
<input type="checkbox"/>	Batch_Balance_Start	28.02.2007	23:00:00	✓	Schmalzhaf, Gunther	◇
<input type="checkbox"/>	Batch_Balance_Stop	28.02.2007	08:00:00	✓	Schmalzhaf, Gunther	◇
<input type="checkbox"/>	Training_Start	28.02.2007	09:00:00	✓	Schmalzhaf, Gunther	◇
<input checked="" type="checkbox"/>	Training_Stop	28.02.2007	22:00:00	✓	Schmalzhaf, Gunther	◇
<input type="checkbox"/>						
<input type="checkbox"/>						
<input type="checkbox"/>						
<input type="checkbox"/>						

Zeile 1 von 4

Task Definition

Task Name: Training_Stop
Starting Date: 28.02.2007
Starting Time: 22:00:00

Recurrence: One Time Action
 Periodic Action on every
 Monday Tuesday Wednesday Thursday Friday Saturday Sunday

Action List

	Application Service	Action	Computing Node
<input type="checkbox"/>	ACS (CI)	Stop	
<input type="checkbox"/>	ACS (DB)	Stop	
<input type="checkbox"/>			
<input type="checkbox"/>			

Training Systems can be switched off in the evenings and on weekends. The hardware resources can be used for resource intensive processes of the productive systems. Automatic start/stop/relocate can be performed with the Task Planner.

Use Case „Resources for Special Campaigns and Activities“



Customer Situation

Systems may have a predictable usage pattern where **peak usage** consumes significantly more resources than standard usage and the peaks occur infrequently. (e.g. campaign with the Portal or year-end processing for FI). If a system is sized for these peaks, then computing resources may be **under-utilized**.



The New Approach

Planned Temporary Server Allocation (Scale out)

With Adaptive, customers can easily and quickly start further dialog instances, hence **assign additional computing resources** on a temporary basis to systems that have infrequent peak resource demands: use “shared service” computing resources.



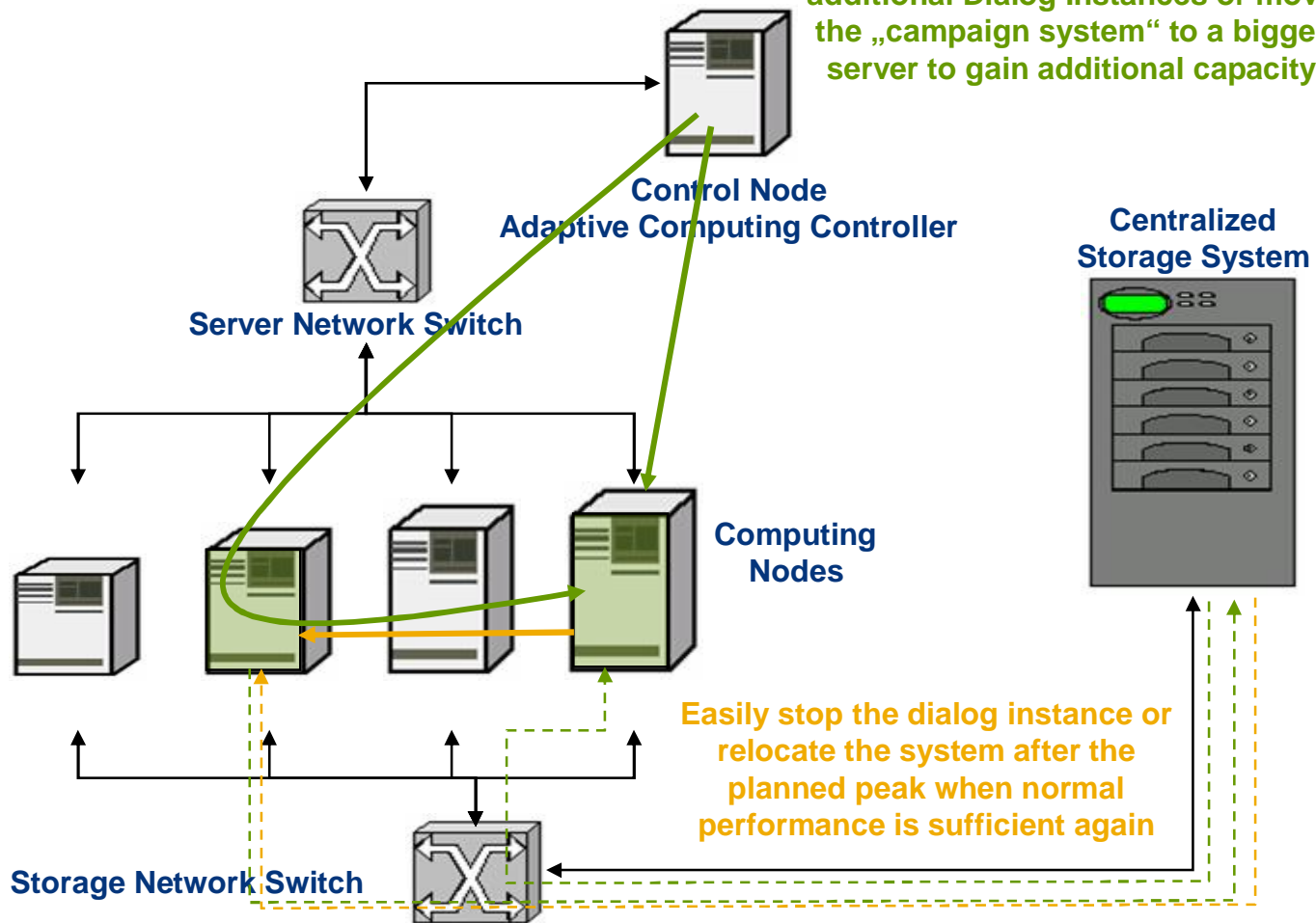
Prevent from hardware oversizing with resource sharing

Run Campaigns with ACC: Temporary Relocation or DI Start



Administrator

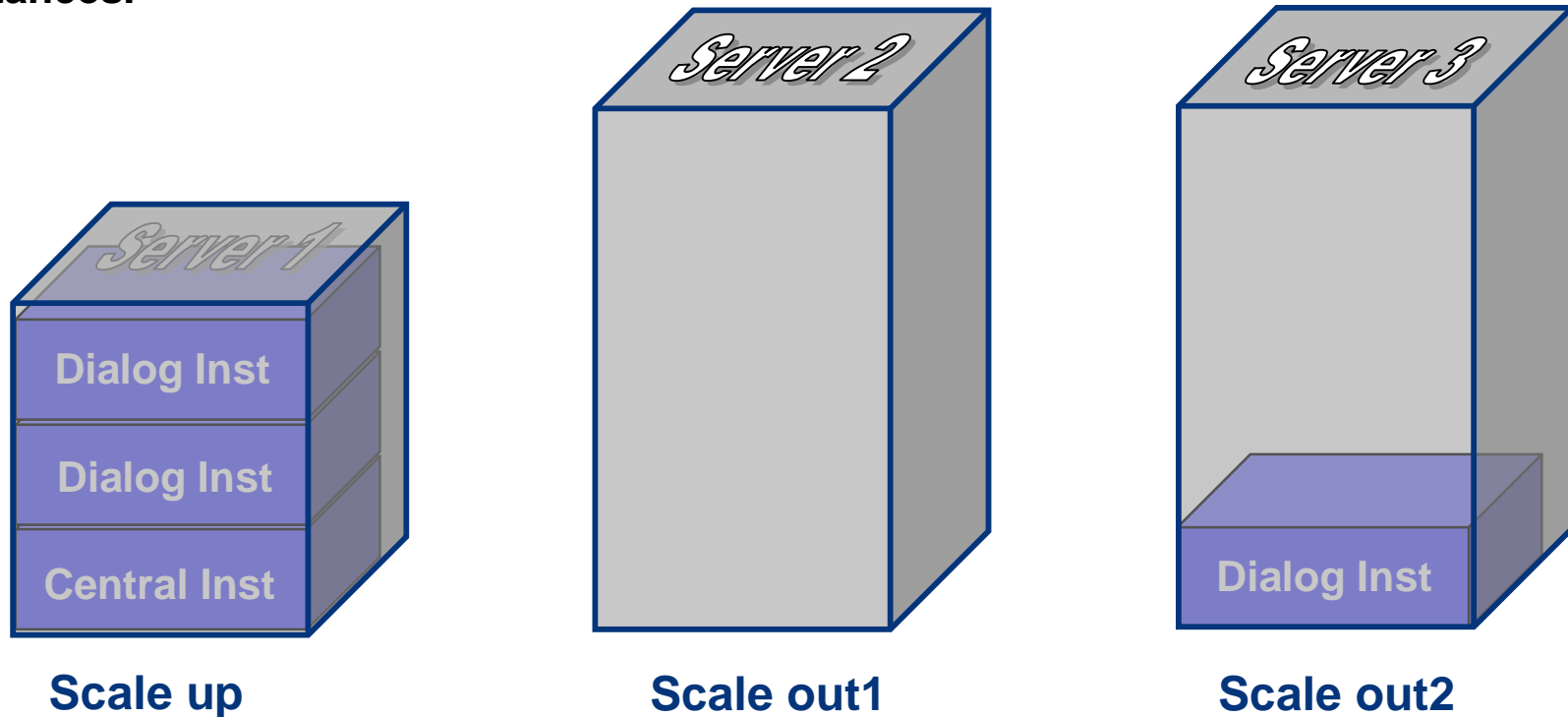
With ACC, temporarily start additional Dialog Instances or move the „campaign system“ to a bigger server to gain additional capacity



Allocation and Resizing Options



Two possibilities for increasing a system, hence resource allocation are *scale up* and *scale out*. *Scale up* means put more Dialog Instances in place (on the same server), *scale out* means move the Central Instance to a bigger server and adapt the system profile (ACC User Exit) to the server capability and/or to start Dialog instances.



Relocate a System to Appropriate Hardware



Select the system you want to move

The screenshot displays the SAP Logical Landscape Manager interface. On the left, there is a navigation pane with sections for 'Detailed Navigation' (Logical Landscape, Physical Landscape, Controller Log, Task Planner, Technical Settings), 'Adaptive Pools' (Administration P..., Production Pool, Windows Pool), and 'Shortcuts' (PAM, SMP adaptive, Google). The main area is titled 'Logical Landscape' and shows a tree view of the landscape. The 'ES1' system is selected and highlighted in orange. Below the tree, there are tabs for 'Application Service', 'Properties', 'Configuration', and 'Application Log'. The 'Relocate Application Service' button is active. A dropdown menu is open, showing a list of servers: ac704n0(5000), ac706n0(5000), ac707n0(5000), ac708n0(5000), ac709n0(5000), ac710n0(5000), and ac706n0(5000). The 'ac708n0(5000)' server is selected. Below the dropdown, there is a 'Required Hardware' section with a 'Select Server' button circled in pink. The hardware requirements are: SAPS 3.000, Memory 768, SAPS 5.000, and Memory 2.019. A 'Resource Check' dropdown is set to 'Enabled'. A callout box on the right says 'Select the appropriate hardware resource'.

Overview	Description	Status	Server
AC1			
EP1			
ES1			
ES1 (DB)	ES1 (DB)	OK	ac705n0
ES1 (CI)	ES1 (CI)	OK	ac705n0
ES1 (APP 01)	ES1 (APP1)	Stopped	
N04			
Windows Pool			

Service Pool	Production Pool	Status
SAP R/3		
SAP ERP		
ES1		
ES1 (DB)		

Required Hardware		
SAPS	3.000	SAPS 5.000
Memory	768	Memory 2.019

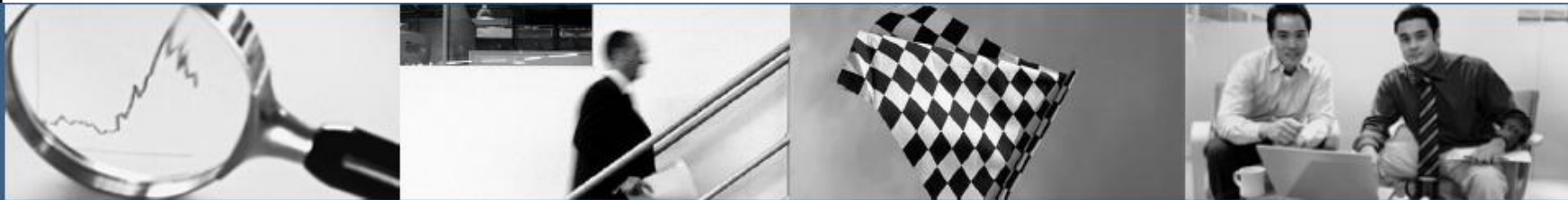
Select the appropriate hardware resource

Use Case „Test Landscapes“



Customer Situation

Accurate testing results are best produced on hardware that **mirrors the productive system** setup. For SAP landscapes with multiple productive systems, maintaining a mirrored hardware setup can be very costly. Resources may be re-assigned manually for test purposes; however this can also be a very time-consuming, mistake prone and costly effort.



The New Approach

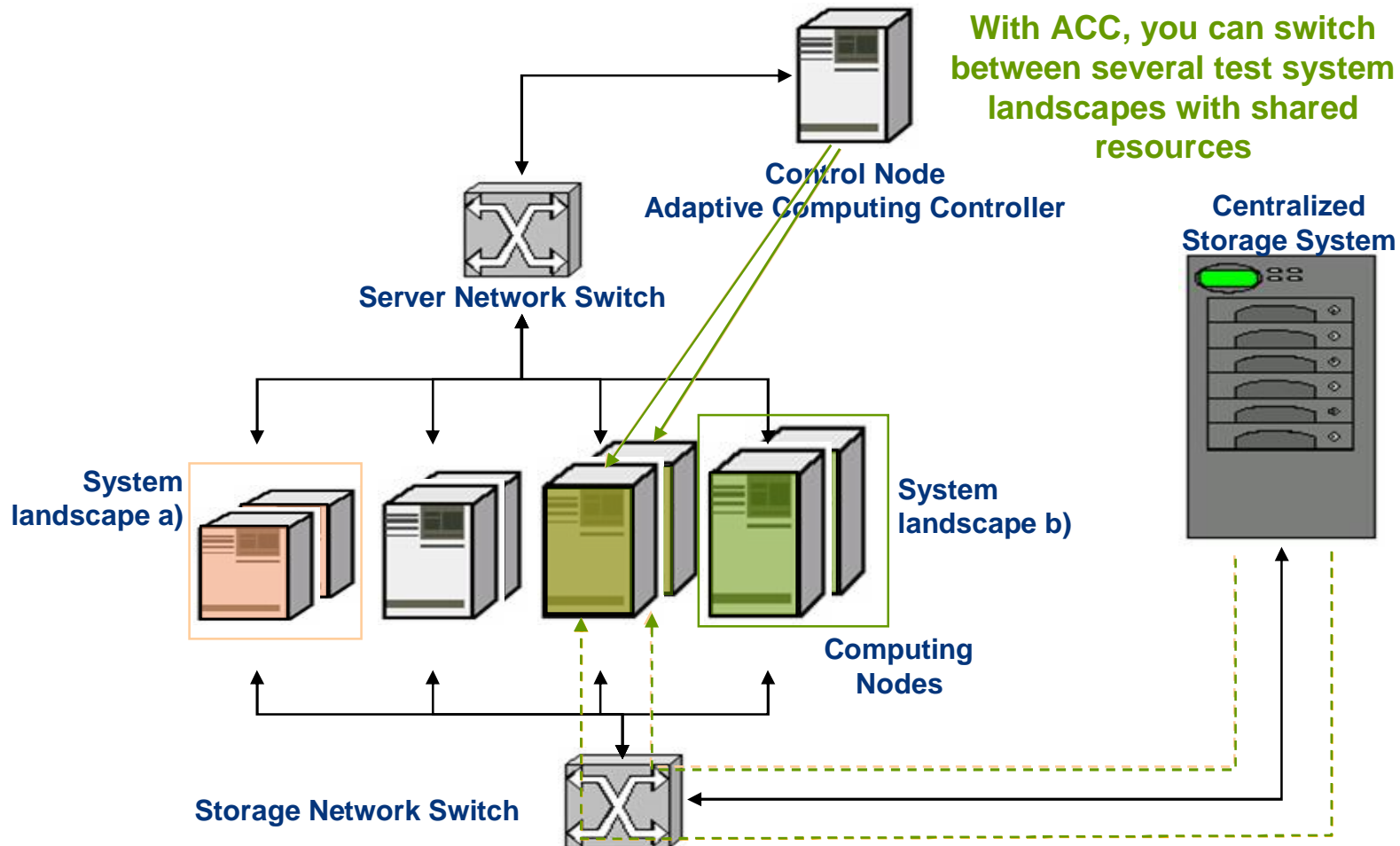
With Adaptive, a consolidated **pool of test system resources** may be maintained. This makes it very easy to have **multiple different test system setups** that can be quickly configured at a minimal cost.

In addition, specialized tests may even be configured to run *on the production hardware itself*. Very accurate results of load and stress testing, upgrade timing, etc. may be achieved and appropriate tuning may be carried out.

ACC and Test System Landscapes



Administrator





Customer Situation

With their growing IT infrastructure, customers face the constant challenge of creating and updating nonproduction systems for testing, quality assurance, and training. In fact, most organizations operate multiple nonproduction environments for each live system - requiring them to deal with a whole host of logistical, technical, management, and cost issues.



The New Approach

On-demand tool „wake-up“ and system relocation

SAP Test Data Migration Server software and Adaptive Computing together solve this problem. TDMS enables you to easily create nonproduction environments with relevant extracts of business data for testing developments and upgrades (~30% of productive business data).

With Adaptive, the systems can be moved to bigger hardware during data extraction and then be relocated again. The TDMS server can be stopped until next data extraction. With this technology combination you can reach the optimum result: you can maximize the effectiveness and accuracy of your nonproduction systems and minimize infrastructure and maintenance expenses.



Maximize test data accuracy and Minimize infrastructure expenses

Agenda

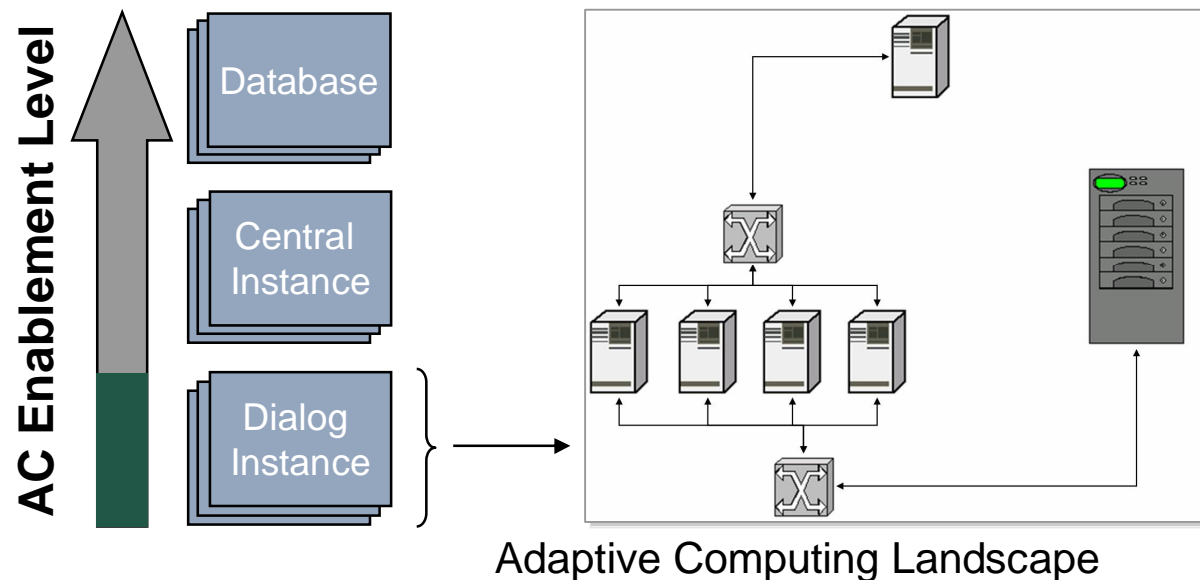


1. Introduction: What does Adaptive Computing do?
2. Saving Potentials with Adaptive Computing
3. Adaptive Computing Use Cases
4. **Concepts to start with Adaptive Computing**
5. Preview: Ramp-Up ACC 7.1

Concepts to start with Adaptive Computing (1)



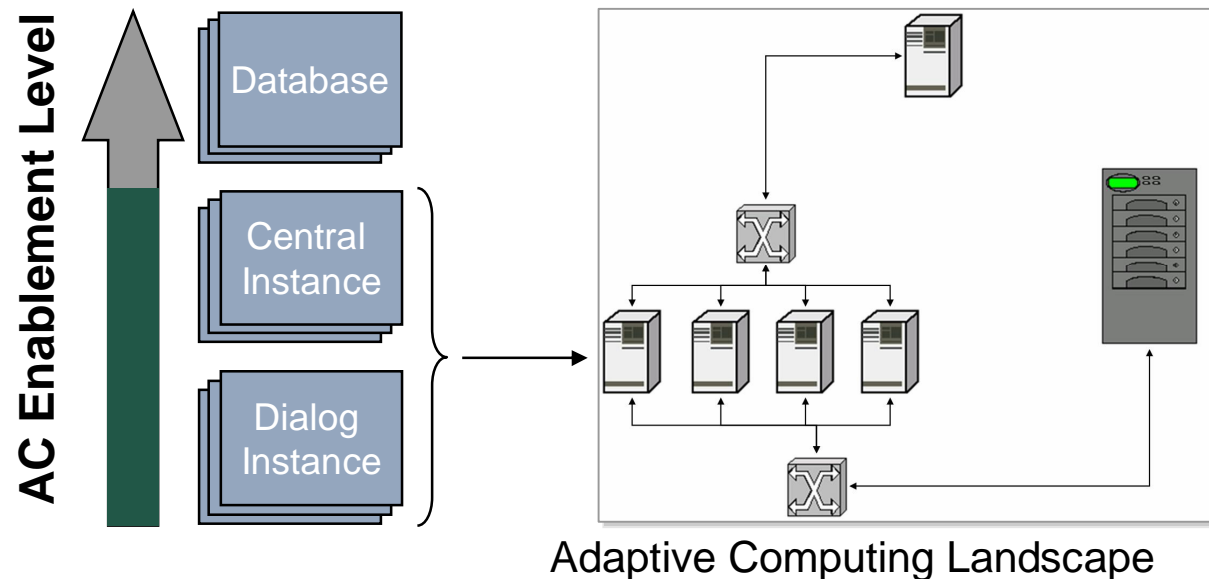
- Integrate Dialog Instances in ACC:
(CI and DB unchanged).
 - Install new DIs on virtual hostnames for the AC landscape.
 - Integrate the new DIs into the ACC.
 - Manage with logon groups the users move to the new instances.
 - Delete the traditionally installed DIs after the users are relocated.
 - ➔ no interruption of the operation.



Concepts to start with Adaptive Computing (2)



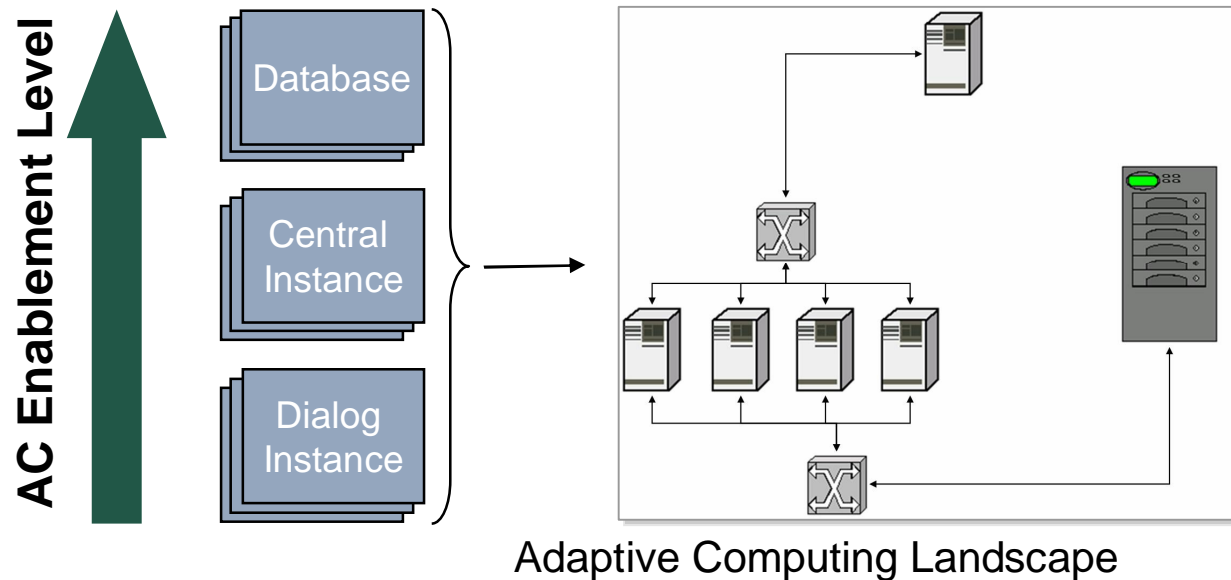
- Integrate Dialog & Central Instances in ACC:
(DB unchanged).
 - Move CI to virtual hostname (homogeneous system copy, host renaming...).
 - Install new DIs on virtual hostnames.
 - Integrate the new DI and CI into the ACC.
 - Delete the traditionally installed DIs after the users are relocated.
 - ➔ DB is unchanged, on UNIX DI & CI components on NFS.



Concepts to start with Adaptive Computing (3)



- Integrate Dialog, Central & DB Instances in ACC:
 - Install CI and DB to virtual hostnames.
 - Install new DIs on virtual hostnames.
 - Integrate all instances into the ACC.
 - Delete the traditionally installed entities.
 - ➔ Full benefits of the Adaptive Computing concept.



Integrate Dialog, Central & DB Instances in ACC:

- **Move CI and DB to virtual hostnames.**
- **Install new DI's on virtual hostnames.**
- **Integrate all instances into the ACC.**
- **Delete the traditionally installed.**
- ➔ **Full usage of the Adaptive Computing concept.**

Agenda



1. Introduction: What does Adaptive Computing do?
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3. Adaptive Computing Use Cases
4. Concepts to start with Adaptive Computing
5. **Preview: Ramp-Up ACC 7.1**

New ACC Release: Ramp-Up Preparations Running!



ACC 1.0 Release:

- Adaptive Computing Controller 1.0 available today

ACC 7.1 Release:

- Adaptive Computing Controller in SAP NetWeaver 7.1
- Ramp-Up start planned for January 2008

The new version of the Adaptive Computing Controller offers:

- Higher scalability: run hundreds of systems in your ACC landscape!
- Tight integration in central SAP administration system
- SAP system instance availability check
- Management of A1S systems
- Additional application support (TREX, LiveCache,...)
- New User Interface
- Drastically reduced Configuration effort

Future Enhancements:

- **Dialog Instance Provisioning in an Adaptive Computing landscape**
 - A Dialog Instance will be provisioned without pre-installation
- **Management of virtual servers with the ACC**
 - Virtual and Physical landscape map
 - Resize and Migrate of 3rd party virtualization technology in the datacenter
- **SAP System Cloning**
 - SAP System can be copied
 - After the cloning procedure the new SAP System is transformed into a fully-fledged new system

- **Adaptive Computing can help consolidating SAP system landscapes and hardware resources**
- **See that there are many different situations in which Adaptive Computing can be of help to save money and make operations easier, also in your company**
- **Know what can be expected from SAP's Adaptive Computing in future**

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