

Investment Management Lite:

A Unique Approach to Capital Spend

Host Speakers:

Dan Nunes, Synactive

Rumi DeSilva, Synactive

Customer Speaker:

Dave Nelsen, PacifiCorp

Agenda

- GuiXT by Synactive
- Utility Company's Using GuiXT
- Introduce Dave Nelsen
 - Manager SAP Functional Support
- Customer Presentation: PacifiCorp
 - Investment Management Lite...
- Questions & Answers



Simplify, Clarify, and Optimize SAP

- **GuiXT Technology**
 - Embedded in SAP
 - Certified by SAP for NetWeaver Portals
 - No backend code changes
- **Benefits**
 - **Faster SAP Data Entry**
 - Input sets automatically fill in common information in SAP fields
 - Set default values
 - Less manual entry for users means fewer mistakes
 - Streamline business processes, remove unwanted fields, and consolidate screen tabs



Utilities Industry

- Pace of Change Has Increased Substantially
 - Tough economic environment
 - Difficult access to capital
 - Rising costs and environmental concerns
- Rate Increases Unavoidable
 - Driven by rising costs, expiring rate caps and increased capital investment requirements
- New Production to Meet Demand
 - Environment compliance
 - Consistent customer service
 - Shareholder value



Utility Companies

- **Case Study I**
 - Provides water to more than 400,000 individuals
 - Owns nearly 3,000 miles of transmission and distribution mains
 - Covers a service area of more than 270 square miles
- **Case Study II**
 - One of the largest electricity/natural gas providers in the upper Mid- and Northwest
 - Serves approximately 656,000 customers
 - Regulated electric/natural gas distribution, transmission, and energy supply
- **Case Study III**
 - Sixth largest public utility company in the US
 - Serves approximately 1.1 million customers
 - Service territory more than 900-square-miles

Case Study I

Utility Provides Water to More than 400,000 Individuals

- Module: Investment Management
- Transactions: CJ20N – Project Builder
 - Project builder is used to manage projects that require detailed planning of activities and resources.

Case Study I

Customer Challenges

- Reports built outside project builder
- Multiple processes, screens, and transactions required to build reports
- Time necessary to complete transactions increases, leads to low productivity

GuiXT Solution

- Project builder process is simplified using GuiXT
- Report creation now done by the click of a button on the project builder screen
- Navigation to other screens and transactions to create reports not necessary

The screenshot displays a SAP project management interface. At the top, it shows 'Identification and view selection' with fields for 'Project Def. #' (MC-07037) and 'Proj. Location' (58th terr & Switzer, Colton Lake South). Below this is a 'Basic data' section with a 'Long txt' tab. The 'Status' section shows 'System Status' as REL and 'User status' as 070. A 'Responsibilities' section lists 'Person Respons.' as 656 and 'Applicant no.' as blank. The 'Dates' section includes 'Start date' (09/18/2007), 'Finish date', 'Fcst start date', and 'Finish date (F)'. On the right side, there are several action buttons: 'CREATE PROJECT ORDER', 'LIST ORDERS', 'RUN ZPA REPORT', 'DETAILED ACTUALS', 'LIST PURCH. DOCUMENTS', and 'MIGO PROJ. POS'. The bottom right corner shows the user ID 'CJ20N'.

Case Study II

Utility is One of the Largest Providers of Electricity and Natural Gas in the Upper Midwest and Northwest

- Module: Plant Maintenance
- Transactions: IW51, IW52, IW53
 - Service Notifications
 - Used to report a problem, request work, or record an event or activity

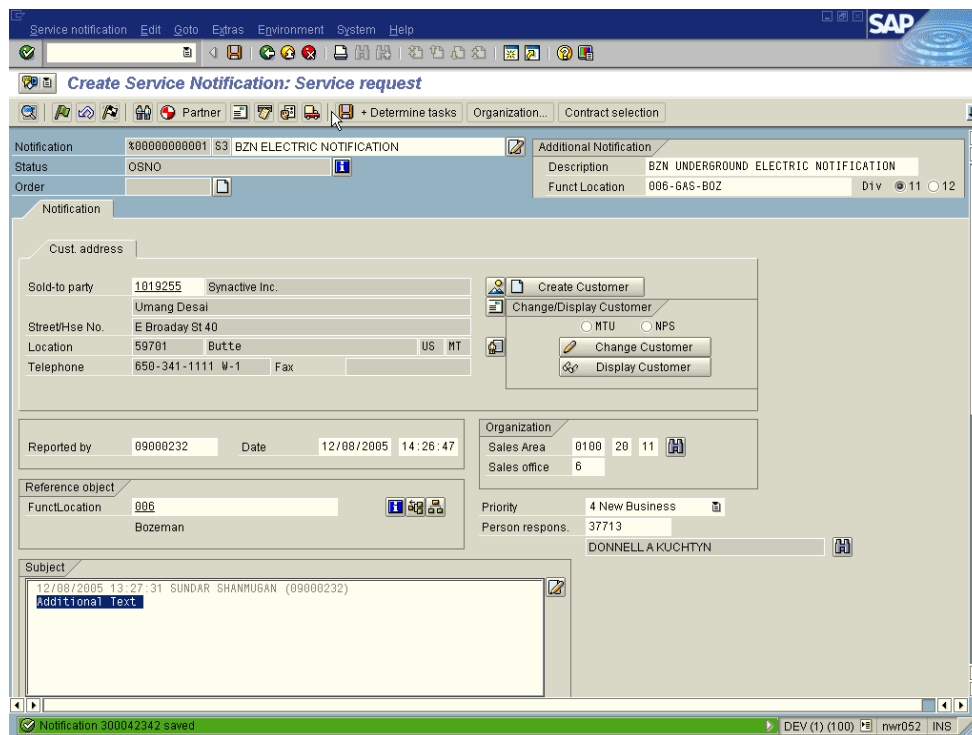
Case Study II

Customer Challenge

- Users must navigate through multiple tabs and screens to enter information
- Redundant fields
- RMA status changes take 4-5 clicks

GuiXT Solution

- Required fields and status information brought to first tab
- Issued goods and delivery are completed automatically
- Action box items are customized, preventing users from performing restricted actions



Case Study III

Utility is the Sixth Largest Public Utility Company in the US

- Module: Plant Maintenance
- Transactions: IW51, IW52, IW53
 - Service Notifications
 - Notifications are used to report a problem, request work, or record an event or activity

Case Study III

Customer Challenges

- Limited network connectivity
- Limited data capacity
- Data manually re-entered in to SAP database at EOD

GuiXT Solution (Offline)

- Eliminates network connectivity issues
- Stores HUGE amount of data
- Upload data in to SAP with a single click

The screenshot displays the SAP Notification Details interface. At the top, there is a navigation bar with a 'Main Menu' button and several action buttons: 'Back', 'Save', 'Ready for Upload', and 'Update Values'. The main form contains various input fields for notification details, including:

- Sub Area: 38_01
- Route Number: [empty]
- Address: 1730 I ST
- City: SACRAMENTO
- Zip Code: 95811
- Name: DHS PROPERTIES, LLI
- Meter Reading Instruction: SMUD KEY 1
- Crew Type: B
- REMARK1, REMARK2, REMARK3, REMARK4: [empty]
- TB Map: 297 E4
- Functional Loc: 2183102
- Notify Date: 12/14/2009
- Reported By: XOPEKERT
- Phone: 916-636-1870
- Location Notes: RIGHT REAR QUADRAN
- How Notify: P
- REMARK3, REMARK4: [empty]
- Notif Type: W2
- Notification: 1110995141
- Order: 30063872
- Responsible: [empty]
- Priority: [empty]
- Required Start, Required End, Completion Date: [empty]
- Offline Status: P

Below the form is a 'Long Text' field containing 'ALLEY 18 TO 19TH:::'. At the bottom, there is a 'Tree List' table with the following data:

Seq	Species Desc	Quantity	Work-type Desc	CL Desc	TGR	Hazard	Sig_Desc	Cyc Lmt	Gr Stmp	Replace	LongTxt Ind
001		2	V - PRUNE	"19"-4'							
002		1	NO WORK THIS CYCLE	>4'							
003	DEC - LIQUID AMBER (S	1	SIDE PRUNE	"19"-4'							.X

At the bottom of the interface, there are buttons for 'Tree Detail', 'Add Tree', and 'Delete'.

Investment Management Lite: A Unique Approach To Managing Capital Spend

Dave Nelsen

Introduction

- Presenter
 - Dave Nelsen - PacifiCorp
 - Manager SAP Functional Support
 - WM & HR Modules
 - Contact
 - 801-220-4938
 - dave.nelsen@pacificorp.com

Introduction...continued

- PacifiCorp
 - Regulated electric utility located in the western United States
 - 6,500 employees
 - Division MidAmerican Energy holding company (MEHC)
 - Operate in 6 western states servicing 1.7 million customers
 - Generation capacity: 9,140 mw

Introduction...continued



Jim Bridger - Rock Springs, WY

- 12 Thermal Plant Sites (coal, natural gas, geo-thermal)
- Provide 83% of Generation



Lake Side (natural gas) - Lindon, UT

Introduction...continued

- 47 Hydro Plants
- Throughout WA, OR, ID, UT, MT, CA

Yale - Lewis River, WA



Merwin - Lewis River, WA



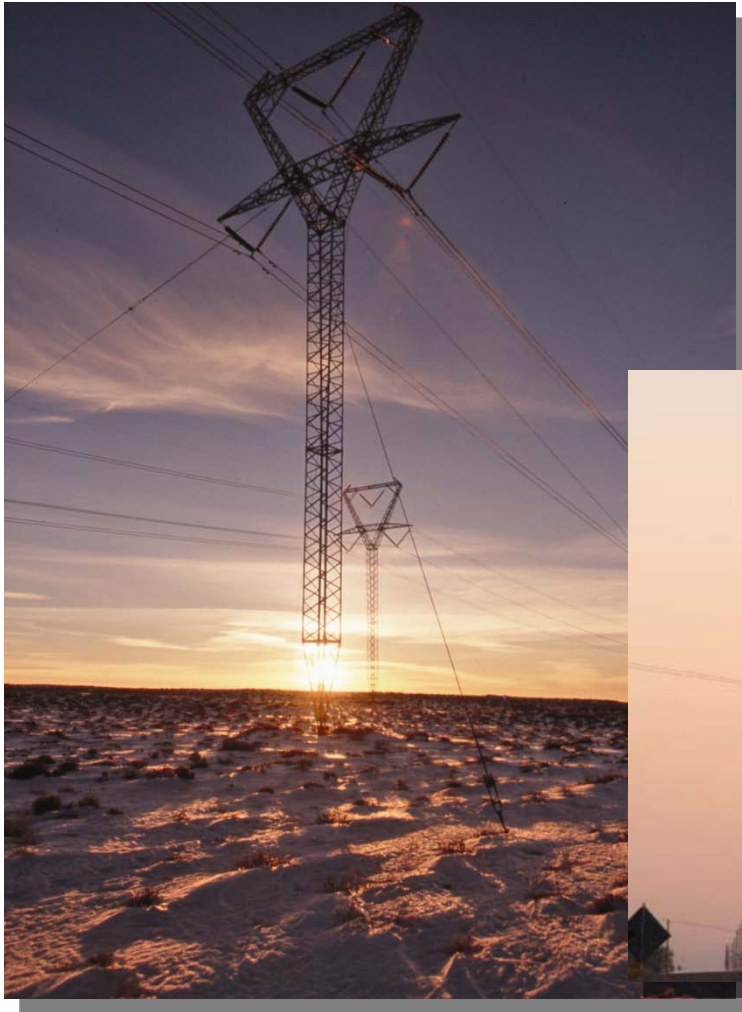
Introduction...continued



- 10 Wind Sites (WA & WY)
- 537 Turbines
- Approx. 900 MegaWatts



Introduction...continued



- Transmission Lines: 15,700 miles
- Distribution Lines: 59,000 miles
- Substations: 900



Introduction...continued

- SAP History
 - First implemented 1999 – R3 4.0b
 - Currently on R3 Release 4.7 (since 2003) – Upgrading to ECC6
 - SAP users: 6,500... but 2,500 daily
 - SAP Functionality in Use
 - FI, CO, HR, PM, PS, IM, EH&S, MM, AM, SD, SRD, BW 7.0, Netweaver 7.0

Learning Points

- How PacifiCorp uses Investment Management (IM) module to manage capital spend
- Key configuration points and user exits
- How GuiXT was used to streamline and control

How PacifiCorp Uses IM to Manage Capital Spend

- Implemented in 2006 – but only a “Lite” version

How PacifiCorp Uses IM...Process Outline

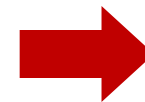
Put Idea Into IM

- Using APRs
- User status controls
- \$'s input by YR



Review List

- Justification docs
- Iterative cycle
- Includes WBS work



List is Approved

- By mgmt, MEHC
- = current YR plan
- = 3 YR plan
- = 10 YR plan
- Stored in a Z-table

Route APR

- Final scope
- Final estimate
- All necessary docs
- = spend authorization



Create WBS

- Created from APR
- Plan versions set up
- Orders created



Work / Forecast

- Actual costs posted
- PC APR?
- Compare FC to OCP
- Reallocate capital?

How PacifiCorp Uses IM to Manage Capital Spend...continued

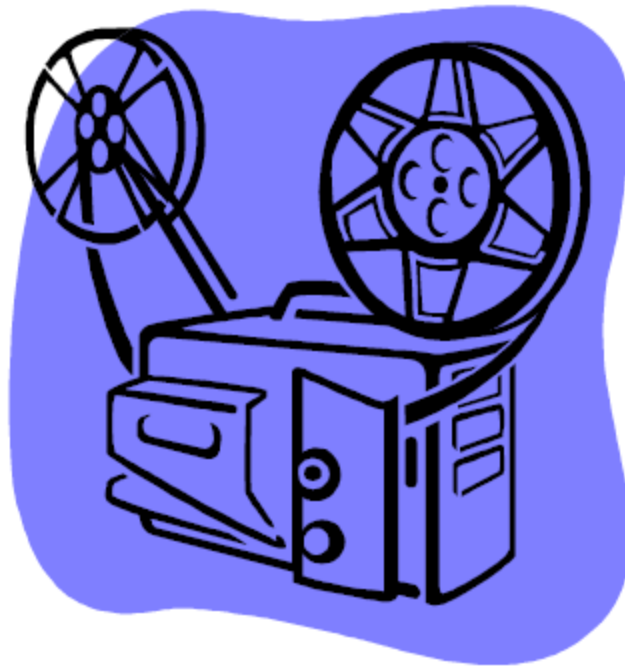
- Investment Program
 - Position ID's
- Appropriation Requests (APR's)
 - Cost object – but only planned dollars

How PacifiCorp Uses IM to Manage Capital Spend...continued

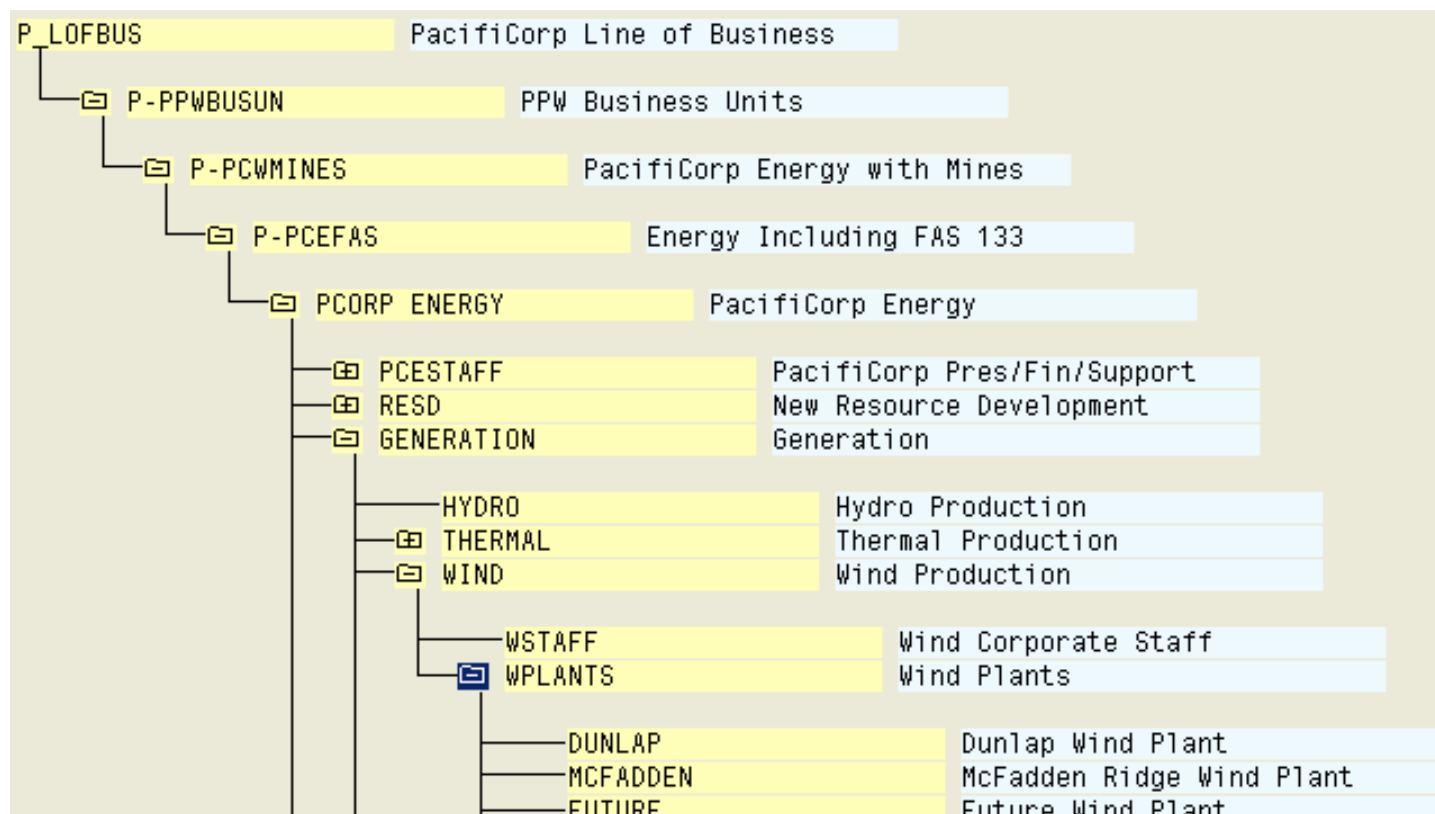
- **Tightly Integrated with PS**
 - Project creation from APR
- **User Defined Status'**
 - Parking lot, current year capital plan, 10 year capital plan
- **Workflow**
 - Persons involved
 - Electronic approval
- **BW: Ties It Together and Manages**

How PacifiCorp Uses IM to Manage Capital Spend...continued

Demo



Demo: Investment Program



Demo: APR General Data Tab

Appropriation req. 10009463 App. req. type 61

Name U4 - BLR Pilot Torch Air Duct Upgrade

General data Status/Measure(WBS) Additional Fields Variant

General data

Reason for investmt 6F Asset Maint - Repair/Replace

Envir. investment 99999 Not Applicable

Priority

Implementation start 07/01/2008

Requesting organizational units

Requesting co. code 1000 PacifiCorp

Req. cost center 10401 G_DJ Produce Steam-4

Req. profit center 1077 Dave Johnston Plant Unit Four

Responsible organizational units

Plant 1515 Dave Johnston

Functional Location T-1515-4-PS U4 PRODUCE STEAM

Other General

Responsible Organization 6_PLANTS GEN Plants

Persons involved

Funct	Partner	Name	A. Address
IM: PersonResponsi ...	P96936	Thomas A Lancaster	
IM: Reviewer	P70701	Matthew N Loveland	

Demo: Status/Measure(WBS) Tab

Appropriation req. 10009463 App. req. type 61
 Name U4 - BLR Pilot Torch Air Duct Upgrade

General data Status/Measure(WBS) Additional Fields Variant

Status

System status	Released	Complete (techn.)
System Status	Replaced by measure	
User status	Accounting Review	
User Status	Economic Review	
User status	Active: Current Years	

Assignment to investment program position

Investment program
 Position ID

Measures to be carried out

WBS element	Pre.proj.	Short text
SDVJ/2008/C/074	<input type="checkbox"/>	U4 - BLR Pilot Torch Air Duct Upgrade

Demo: APR Variant Tab

General data | Status/Measure(WBS) | Additional Fields | Variant

General data | Plan versions | Plan values | Preinv.analysis | Documents

Plan values on the variant 0001

Period	Investment costs	Overhead costs	Combined costs	Revenue
Overall	900,000	50,969	950,969	
2009	100,000	4,820	104,820	
2010	800,000	46,149	846,149	
2011	0	0	0	
2012	0	0	0	
2013	0	0	0	
2014	0	0	0	
Total	900,000	50,969	950,969	

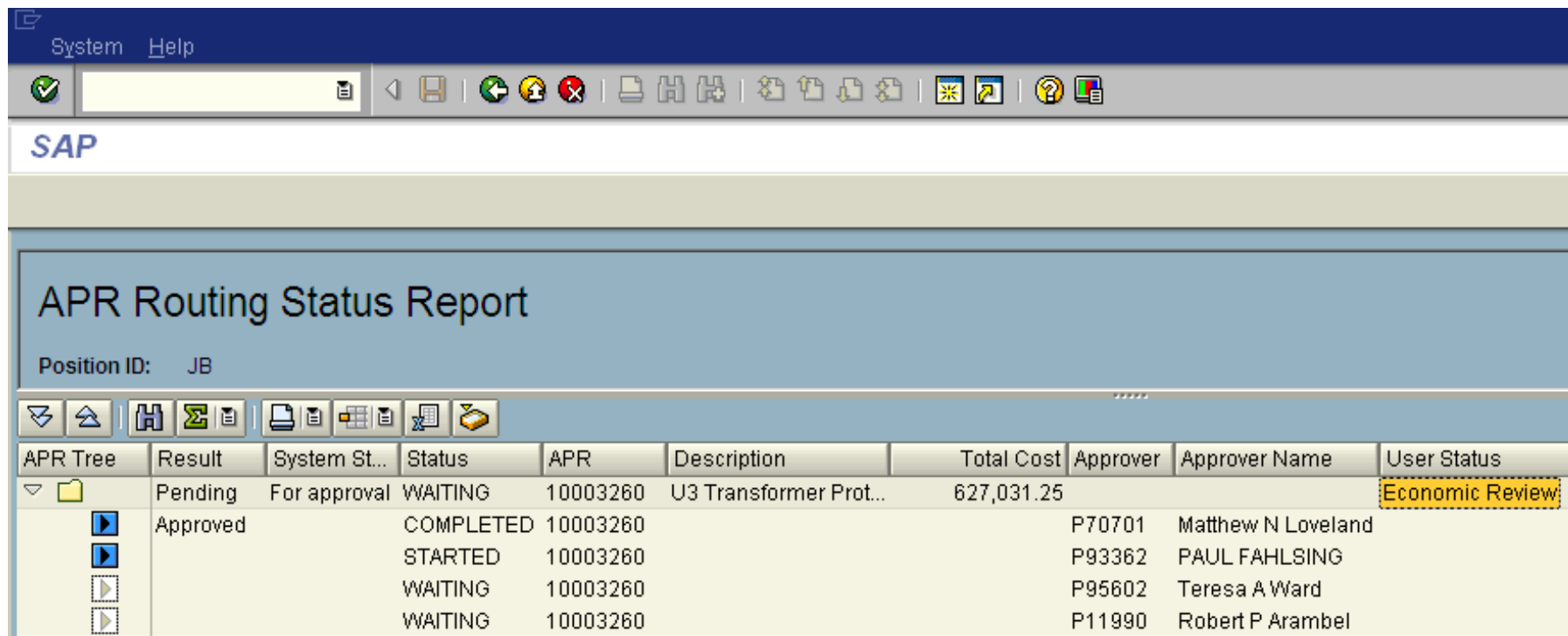
Currency USD 1

Override AFUDC and Capital Surcharge Values

AFUDC and Capital Surcharge (Overhead Costs)

Variant	Period	Capital Surcharge	AFUDC	Overhead Costs
0001	2009	2,750.00	2,070.00	4,820.00
0001	2010	22,000.00	24,149.00	46,149.00
0001	Total	24,750.00	26,219.00	50,969.00

Demo: APR Routing Status Report



System Help

SAP

APR Routing Status Report

Position ID: JB

APR Tree	Result	System St...	Status	APR	Description	Total Cost	Approver	Approver Name	User Status
▼	Pending	For approval	WAITING	10003260	U3 Transformer Prot...	627,031.25			Economic Review
▶	Approved		COMPLETED	10003260			P70701	Matthew N Loveland	
▶			STARTED	10003260			P93362	PAUL FAHLSING	
▶			WAITING	10003260			P95602	Teresa A Ward	
▶			WAITING	10003260			P11990	Robert P Arambel	

Demo: APR Create Project

General data Status/Measure(WBS) Additional Fields Variant

Status

System status: **Approved** Release [Icons]

User status: Accounting Review [Icon]

User Status: Active: Current Years

Assignment to investment program position

Investment program: PCORP-01 2008 PacifiCorp Investment Program

Position ID: CARBON Carbon Plant

Measures to be carried out

WBS element	Pre.proj.	Short text
	<input type="checkbox"/>	
	<input type="checkbox"/>	
	<input type="checkbox"/>	
	<input type="checkbox"/>	

[Navigation icons]

Project [Icons]

Demo: IM BW Report

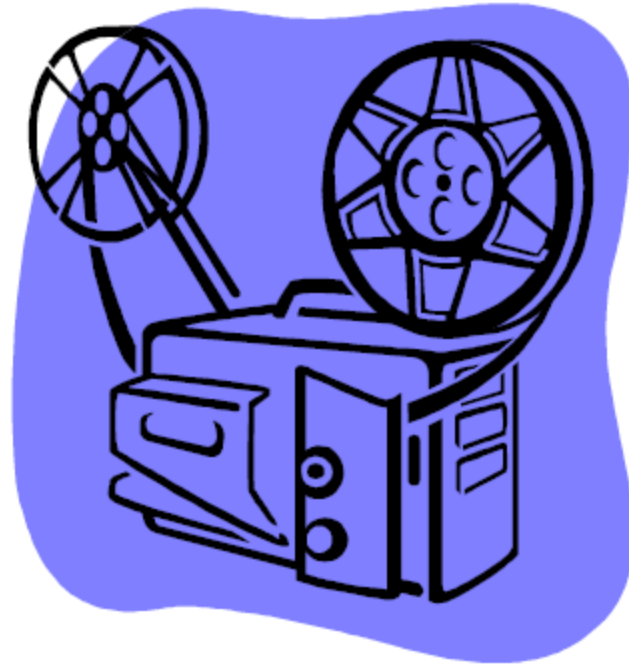
Position ID	WBS / APR	Text	Cost Element	001/2011	002/2011
CARBON	000010011192	U0 Motor Fire Pump Supply Line	4500/503400		
CARBON	000010011192	U0 Motor Fire Pump Supply Line	4500/585850		
CARBON	000010011192	U0 Motor Fire Pump Supply Line	4500/887302		
CARBON	SCAR/2007/C/028	U0 FLY ASH HANDLING SYSTEM	4500/503400	\$7,835	-\$35,571
CARBON	SCAR/2007/C/028	U0 FLY ASH HANDLING SYSTEM	4500/887302	\$161	-\$5,140
CARBON	SCAR/2007/C/504	U2 ECONOMIZER REPLACEMENT	4500/503400	\$	-\$31
CARBON	SCAR/2007/C/504	U2 ECONOMIZER REPLACEMENT	4500/887302	\$	-\$4
CARBON	SCAR/2007/C/539	U0 RAW WATER LINE	4500/503400	-\$77,843	\$
CARBON	SCAR/2007/C/539	U0 RAW WATER LINE	4500/887302	-\$1,604	\$
CARBON	SCAR/2008/C/012	BLANKET: ASBESTOS ABATEMENT CY 2008	4500/503400	-\$1,422	\$
CARBON	SCAR/2008/C/012	BLANKET: ASBESTOS ABATEMENT CY 2008	4500/887302	-\$29	\$
CARBON	SCAR/2008/C/014	U1 Alarm Management System	4500/503400	\$5,764	-\$5,764
CARBON	SCAR/2008/C/014	U1 Alarm Management System	4500/887302	\$119	-\$833

Key Configuration Points and User Exits

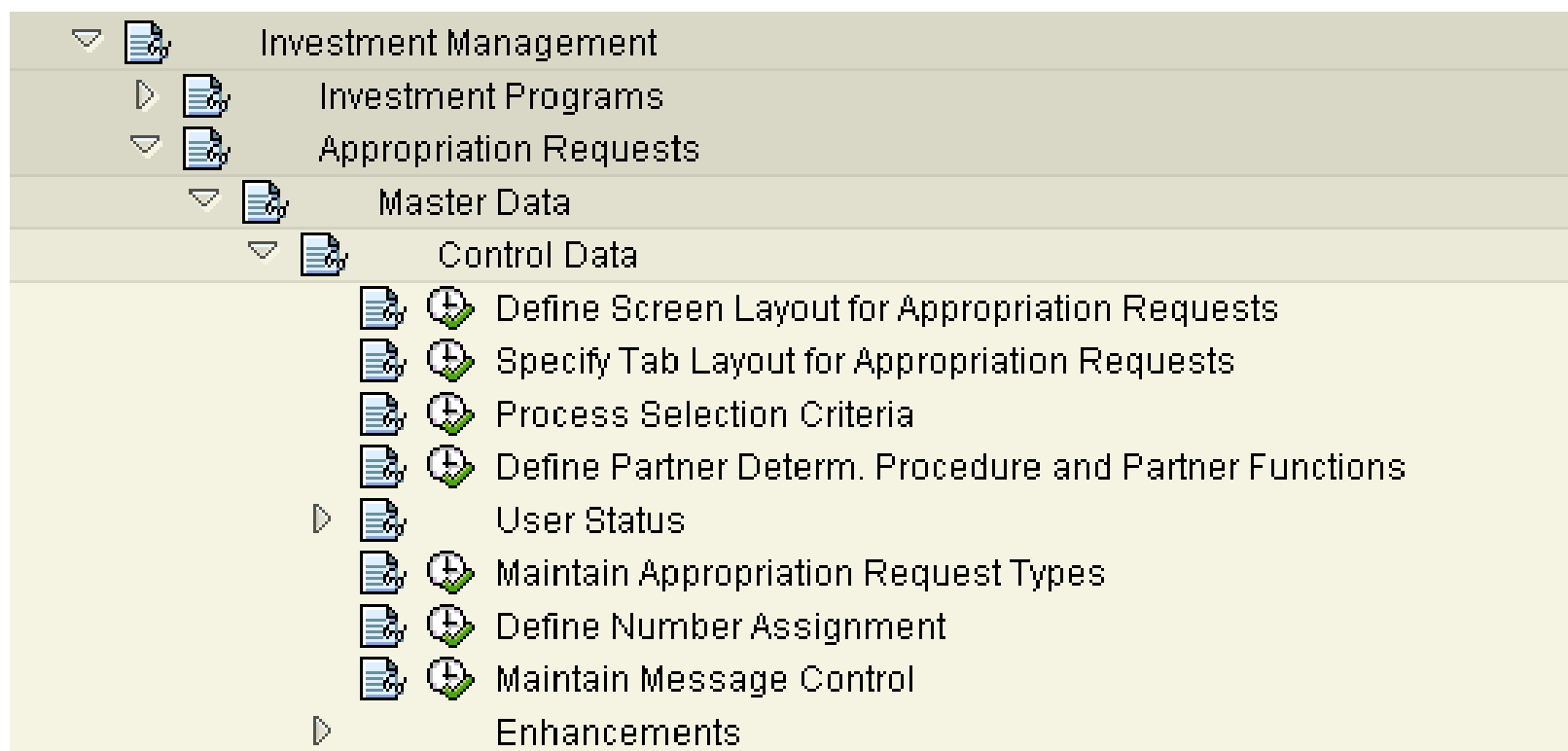
- Configuration
 - Program
 - APR Types
 - Powerful
 - Measures
 - Select in APR type
 - Workflow

Key Configuration Points and User Exits

Demo



Demo: Configuration



Key Configuration Points and User Exits...continued

- User Exits
 - Function Group – xai1 (one)
 - Used for additional fields tab, custom tables, etc.
 - Use configurator to place group boxes on tabs
 - BADI: CL_EX_APPREQUEST_UPDATE
 - Used for validation before save
- Workflow

How GuiXT Was Used to Streamline and Control

- GuiXT
 - More user friendly
 - Data validation and control

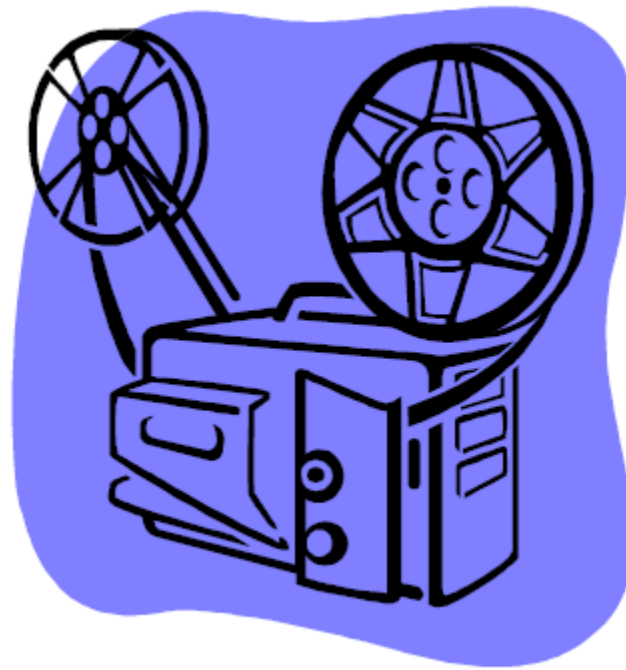
How GuiXT Was Used to Streamline and Control

- **Issues**

- Customized using configurator as much as possible
- Very few parameter ID's
- Many casual users
- Many approvers with little/no SAP experience
- Fiscal vs. Calendar year
- Incomplete project creation

How GuiXT Was Used to Streamline and Control

Before and After Demo





Demo: APR Creation Using Standard R3

Name

General data Status/Measure(WBS) Additional Fields Variant

General data

Reason for investmt 


Envir. investment 


Priority

Implementation start

Requesting organizational units

Requesting co. code

Req. cost center 

Req. profit center 

Responsible organizational units

Plant

Functional Location

Other General

Responsible Organization

Persons involved

Funct	Partner	Name	A. Address
IM: PersonResponsi ...			
IM: Auth Approver			

Demo: APR Creation Using Standard R3...continued

Appropriation req. App. req. type

Name

General data | Status/Measure(WBS) | Additional Fields | Variant

Status

System status For approval

User status

Assignment to investment program position

Investment program

Position ID

Measures to be carried out

<input type="checkbox"/>	WBS element	Pre.proj.	Short text
<input type="checkbox"/>		<input type="checkbox"/>	
<input type="checkbox"/>		<input type="checkbox"/>	
<input type="checkbox"/>		<input type="checkbox"/>	
<input type="checkbox"/>		<input type="checkbox"/>	

Project

Demo: APR Creation Using Standard R3...continued

Appropriation req. App. req. type

Name

General data | Status/Measure(WBS) | Additional Fields | Variant

Checkboxes

- Overhaul
- Obligated
- Technical Review
- Environmental Review
- Economic Review
- Repair/Replacement
- Removal/Salvage
- Retirement
- Asbestos Indicator
- Original Capital Plan

Other Data

Net Benefit to Capital Ratio (NBCR)	<input type="text"/>
Present Value Revenue Requirement (PVRR)	<input type="text"/>
Asset Location	<input type="text"/>
Joint Venture	<input type="text"/>
Rank	<input type="text"/>
Risk	<input type="text"/>

Demo: APR Creation Using Standard R3...continued

Other Data	
Net Benefit to Capital Ratio (NBCR)	<input type="text"/>
Present Value Revenue Requirement (PVRR)	<input type="text"/>
Asset Location	<input type="text"/>
Joint Venture	<input type="text"/>
Rank	<input type="text"/>
Risk	<input type="text"/>
Justification	<input type="text"/>
Just Opport Cost	<input type="text"/>
Probability	<input type="text"/>

Thermal	
Heat Rate	<input type="text"/> %
Availability (hrs)	<input type="text"/>

Hydro	
Hydro Prd Area	<input type="text"/>
Hydro Plant Facility	<input type="text"/>
Hydro Area Code	<input type="text"/>

Demo: APR Creation Using Standard R3...continued

Appropriation req. App. req. type

Name

General data | Status/Measure(WBS) | Additional Fields | Variant

Reporting

Cost Peak Month

Variant	System status	User status	Costs (USD)	Revenue (...)
				0

General data | Plan versions | Plan values | Preinv.analysis | Documents

Variant

Copied variant

Completion date

Start-up date

Demo: APR Creation Using Standard R3...continued

Appropriation req. App. req. type

Name

General data | Status/Measure(WBS) | Additional Fields | Variant

Reporting

Cost Peak Month

Variant	System status	User status	Costs (USD)	Revenue (...)
0001	CRTD		0	

General data | Plan versions | Plan values | Preinv.analysis | Documents

Assignmt to plan versions

Appr.year	Version	Version name	Auth....	Name	Variant	Appropriation req.
2008	9	Major Projects F...				
2007	9	Major Projects F...				
2006	9	Maioir Projects F...				

Demo: APR Creation Using Standard R3...continued

Appropriation req. App. req. type

Name

General data | Status/Measure(WBS) | Additional Fields | Variant

General data | Plan versions | Plan values | Preinv.analysis | Documents

Plan values on the variant 0001

Period	Investment costs	Overhead costs	Combined costs	Revenue
Overall			0	
2007			0	
2008			0	
2009			0	
2010			0	
2011			0	
2012			0	
Total		0	0	

Demo: APR Creation Using GuiXT

Appropriation req. App. req. type

Name

General data | Status/Measure(WBS) | Additional Fields | Variant

General

Reason for Investment

Environ. Reason

Implementation start (Calendar Date)

Est. Completion Date (Calendar Date)

Plant

Req. cost center

Responsible Org.

Functional Location

Joint Venture

Other Data

Overhaul

Asbestos

Economic Review Needed?

Investment Position

Investment Program

Position ID

Hydro Location Info

Prod Area

Plant Fac.

Area Cd.

Persons involved

Func	Partner	Name	A. Address
IM: Person Responsi ...	P11619		
IM: Auth Approver	P38623		

User Status

Parking Lot

Active: Current YRs (3 Years)

Active: 10 YR Plan

Demo: APR Creation Using GuiXT...continued

Appropriation req. App. req. type

Name

General data | Status/Measure(WBS) | Additional Fields | Variant

Reporting

Cost Peak Month Estimated current duration: 9 months.

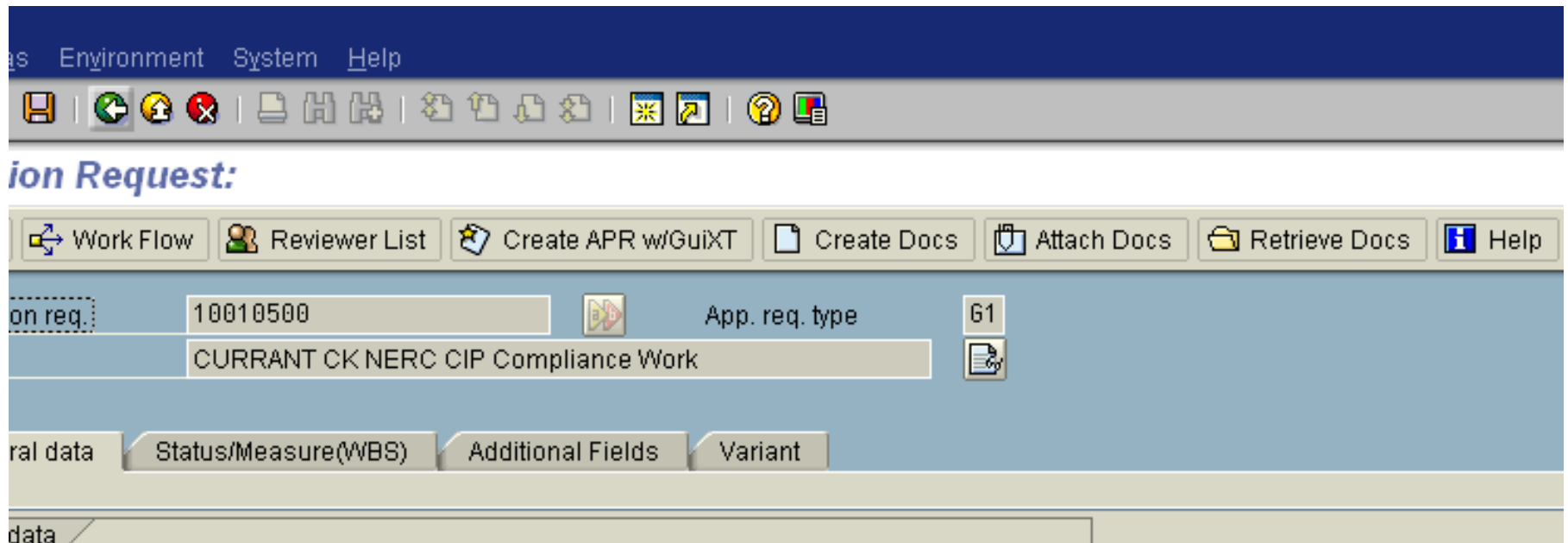
Variant	System status	User status	Costs (USD)	Revenue (...)
0001 APR Estimate	CRTD		0	

General data | Plan versions | Plan values | Preinv.analysis

Plan values on the variant 0001

Fis YR	Cal YR	Investment costs	Overhead costs	Combined costs
Overall				0
2010	CY 2009			0
2011	CY 2010			0
2012	CY 2011			0
2013	CY 2012			0

Demo: APR Creation Using GuiXT...continued



Demo: APR Approvals Using Standard R3

General data		Status/Measure(WBS)	Additional Fields	Variant
General data				
Name	Document Demo			
Reason for investmt	6A	Compliance - Safety		
Envir. investment	99999	Not Applicable		
Priority	<input type="checkbox"/>			
Implementation start	12/11/2009			
Requesting organizational units				
Requesting co. code	1000	PacifiCorp		
Req. cost center	10004	G_Nau Operations		
Req. profit center	1001	Naughton Plant (B/S) - Materials		
Responsible organizational units				
Plant	1535	Naughton Plant		
Functional Location	T-1530-1	CARBON PLANT UNIT 1		
Other General				
Responsible Organization	G_PLANTS	GEN Plants		

Demo: APR Approvals Using GuiXT

Appropriation req. 10011650 Document Demo
 Approp.request type 61 Generation Appropriation Request

APR Overview | Status/Assignment | Economics & Other | Annual Cash Flow/General

General data
 Name Document Demo
 IM Position ID Carbon Plant
 Responsible Person: See Persons Involved table below Priority
 Responsible Org. 6_PLANTS
 Plant 1535 Naughton Plant Unit 1
 Hydro PRD Area Hydro Plant Fac. Hydro Area Code
 Orig. Capital Plan Overhaul

100% Costs		PacifiCorp Share		Schedule	
Total	16,416	Total	0	Est. Start	12/11/2009
Total Orig.	0	Current YR		Est. Compl.	12/11/2010
Current YR	11,211	Avail Budget	2,707,189	Est. TECO	12/11/2010
Avail Budget	2,707,189	Bud-CY APR	2,707,189		
Bud-CY APR	2,695,978				

How GuiXT Was Used to Streamline and Control...continued


- Using GuiXT
 - Can also set up a project/WBS completely
 - Update planned values on the project

Best Practices



- Know the Business Process
- Get Executive Support
- Use Exits and BADI's
- GuiXT

Key Learning's...

- IM Can Be Used to Effectively Plan and Authorize Capital Spend
- Take Advantage of User Status'
- Take advantage of tools 
 - (workflow, BW, user exits, guixt, etc.)

**Thank You Very Much
For Your Time!**

Webinars: July & August

Manufacturing Industry

- Customer Presentation
 - Summit Electric Supply Company, Inc.
 - July 21, 2010 at 10:00 AM (Pacific)

Utility Industry

- Customer Presentation
 - Fairfax Water
 - August 18, 2010 at 10:00 AM (Pacific)

Questions & Answers

For More Information

Synactive, Inc.

www.GuiXT.com

Tel. +1-650-341-3310

rfi@guixt.com