



Bord Gáis Networks

Networks Transformation Programme

PCTY – London

10th May 2011

Contents



Vision and Scope of the Networks Transformation Programme

Networks Transformation Programme Timeline

Key Success Factors

- Technology Choices
- Focus on Data and Integration
- Engaging the Business : Conference Room Pilots

Experience post Go Live

Bord Gáis Networks – Quick Facts

Background

Irish Gas Market Place:

- Bord Gáis is the key player, owning and operating the majority of the Irish and Northern Irish (Firmus Energy) T&D Networks
- Networks: asset owner & network operator for Ireland's Gas T&D network
- Supply: provides gas to ~650,000 gas users
- Expanding dual fuel offering in Irish open market, began electricity campaign in February this year and has gained 300,000 customers
- Also moving into renewable energy forms, and building generation asset portfolio

Key Tenants of Bord Gáis Corporate Strategy:

- Outperform regulatory targets (financial / non-financial)
- Through the offering of dual fuel products with exemplary service the company will strengthen its customer base
- Through significant investment in new electricity and gas assets, value will be added for all shareholders

Key Financials

Turnover: €1,349m (2008)
 Profit before tax €119m
 Tangible Fixed Assets €3,543m

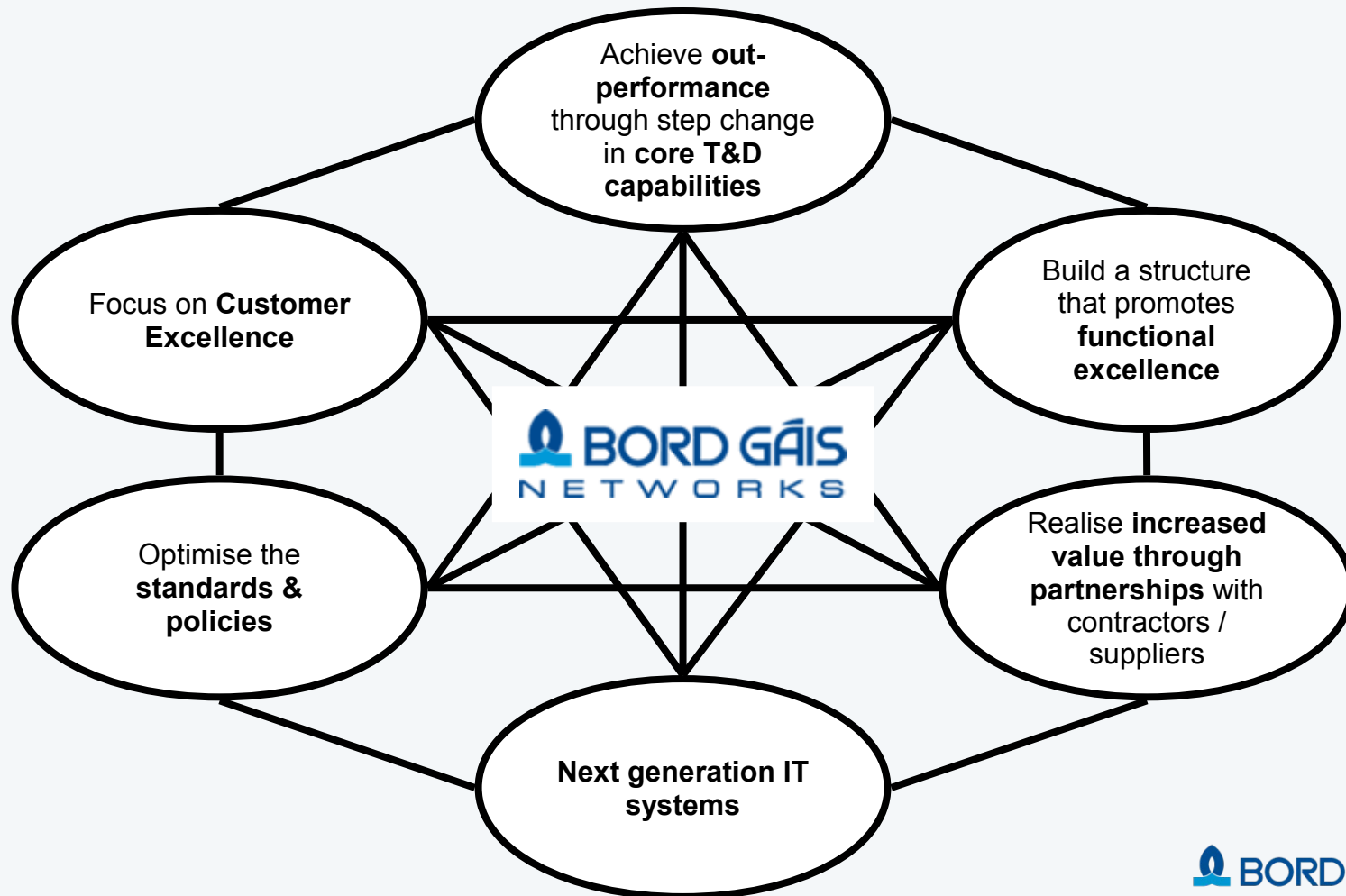
Bord Gáis Networks

Bord Gáis Networks builds and operates the natural gas networks in Ireland. It also owns and operates significant gas pipeline assets in Northern Ireland. It manages a full 24-hour emergency response service and handles over 20,000 call-outs a year.

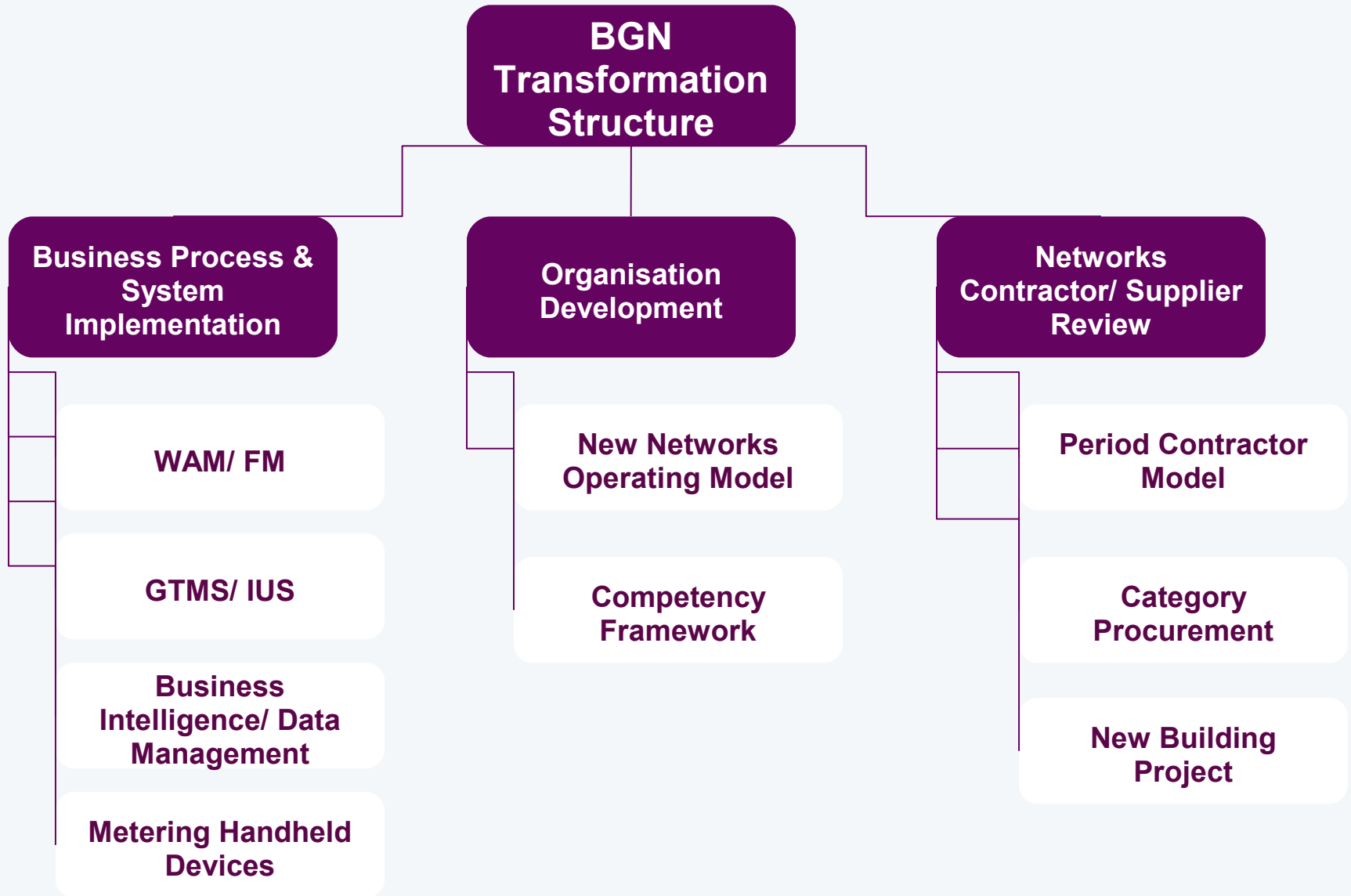


Networks Transformation Vision & Strategy

“Make BGN a best in class Network Utility Service Provider, and Improve our Customer Service capability, allowing us to meet our current and future regulatory targets and expectations”

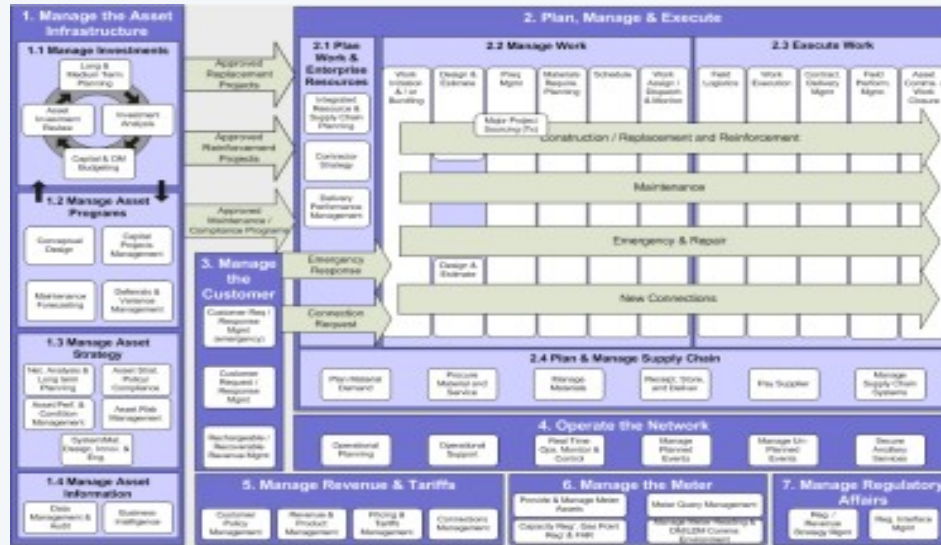


Transformation Structure and Scope

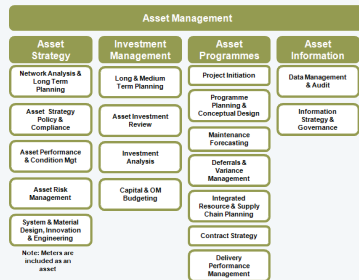


Delivering Excellence across Networks

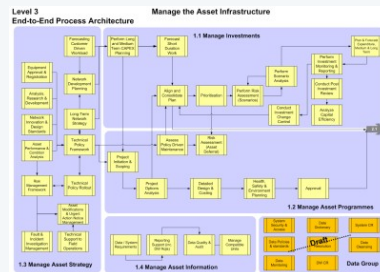
Transformation Scope



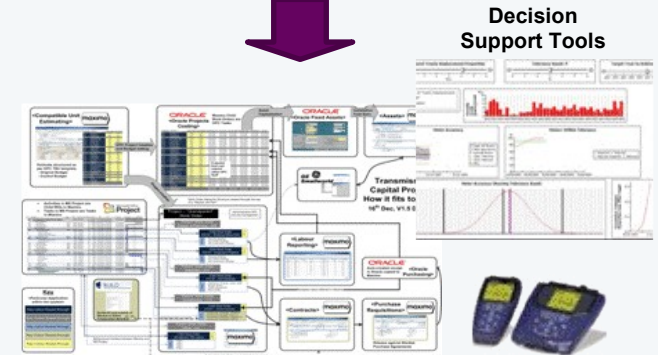
Bord Gáis Networks High Performance Utility Model



Organisation Building Blocks



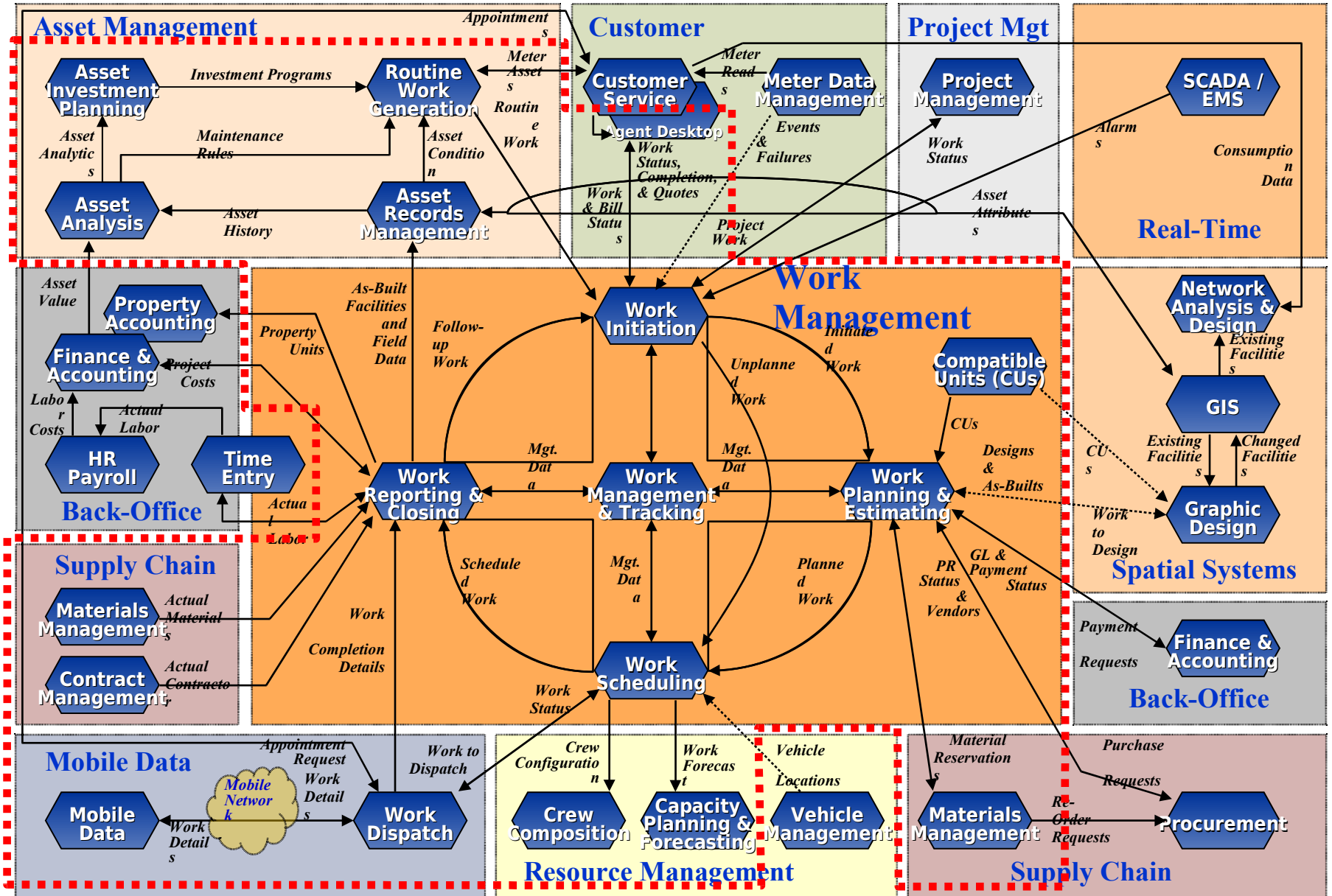
Business Processes



Systems Landscape

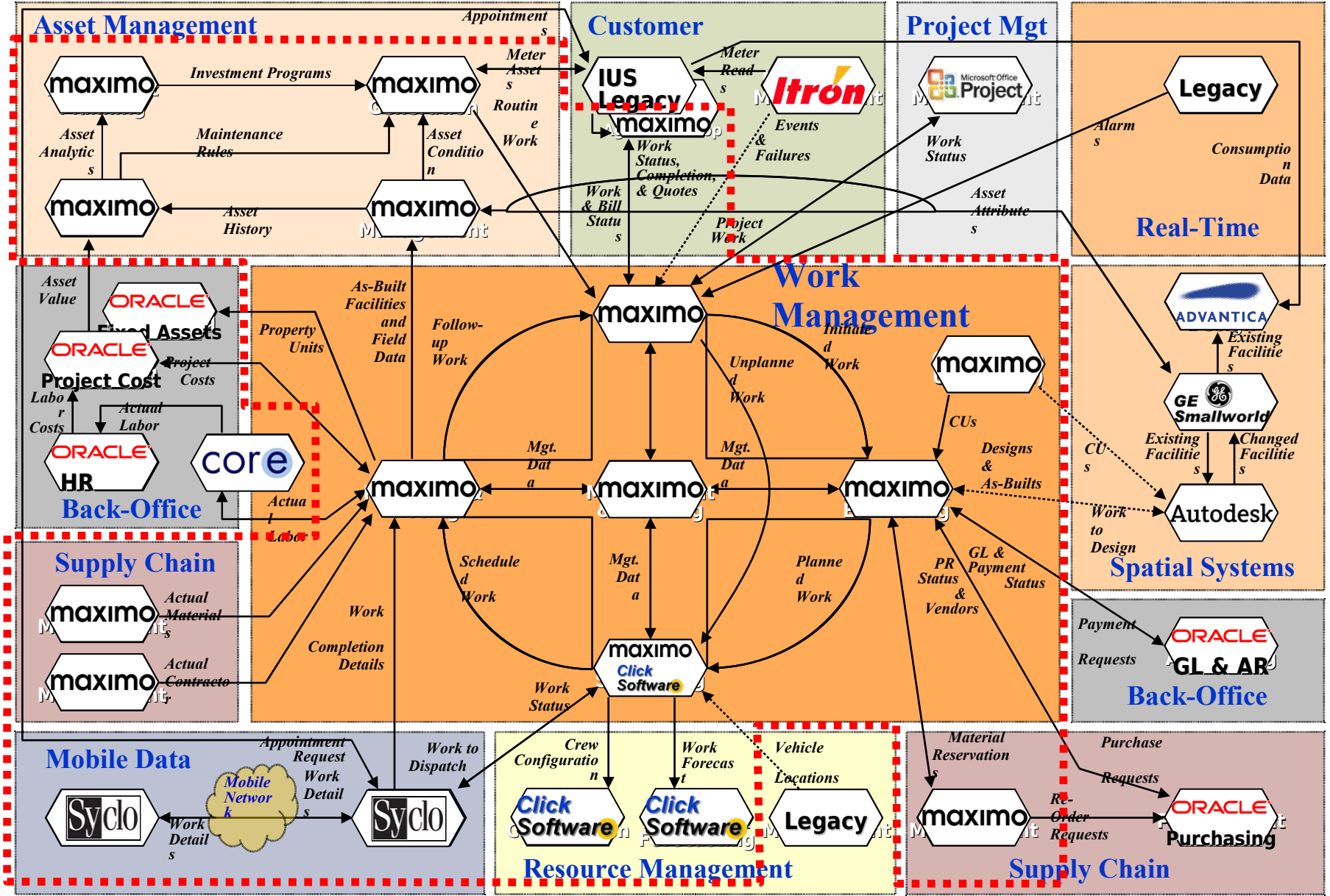
Solution Architecture - Applications

Project Scope



Solution Architecture - Applications

Project Scope



Solution Architecture - Supporting Technologies



Enterprise Service Bus (Oracle Fusion Middleware)

Decision Support and Reporting / Enterprise Data Warehouse

Document Management Integration (MS SharePoint)

E-Mail Integration (MS Outlook)

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Experience post Go Live

2009

2010

WAM / FM Go Live

2011

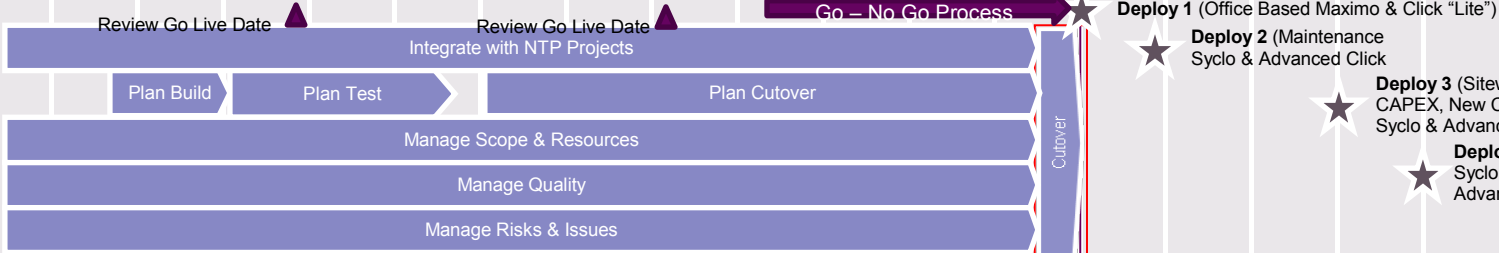


May to Sep Oct Nov Dec Jan Feb Mar Apr May Jun Jul Aug Sep Oct Nov Dec Jan Feb Mar Apr

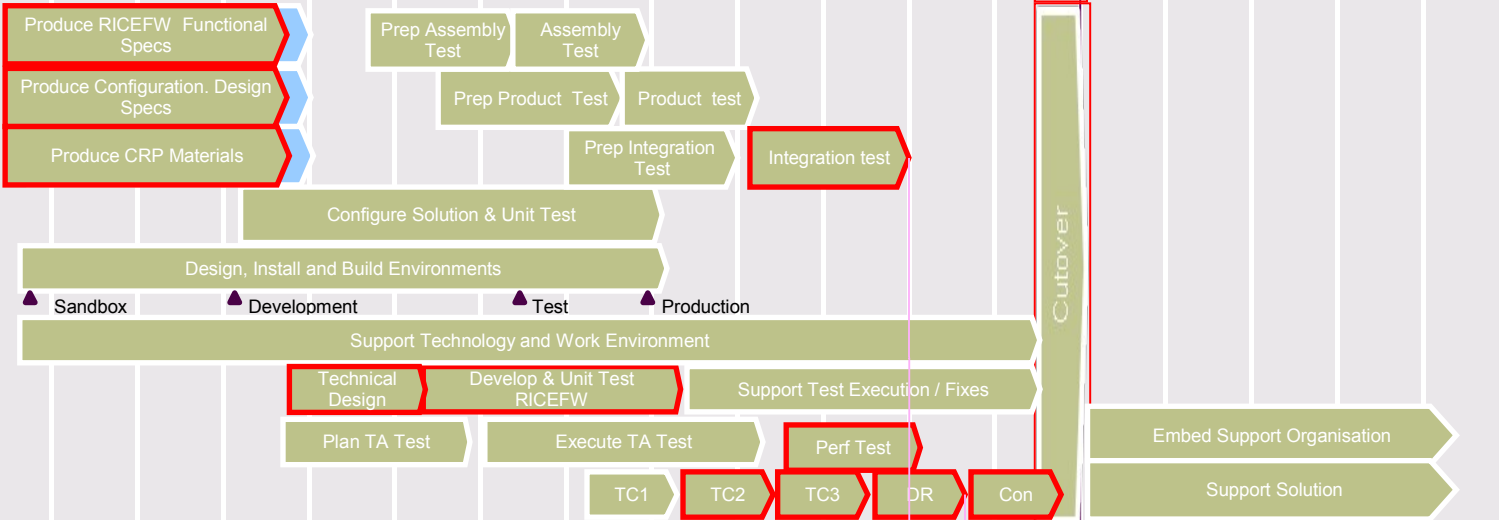
Phases



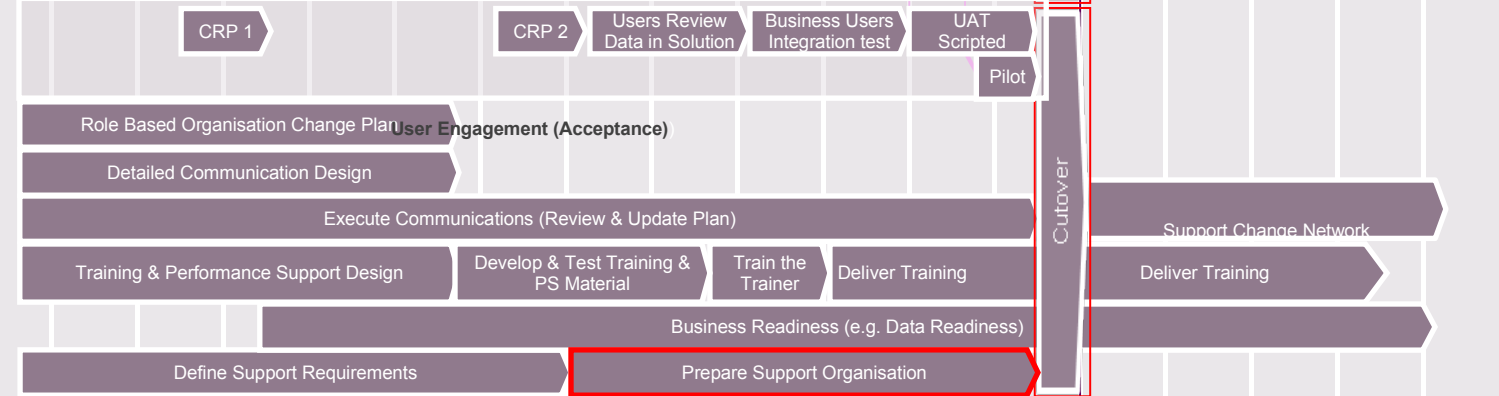
Project Management



Application Delivery



Business Delivery



- ★ **Deploy 1** (Office Based Maximo & Click "Lite")
- ★ **Deploy 2** (Maintenance Syclo & Advanced Click)
- ★ **Deploy 3** (Siteworks, CAPEX, New Connections Syclo & Advanced Click)
- ★ **Deploy 4** (PRE Syclo & Advanced Click)

TOM and PDD

Cutover

The Right Team

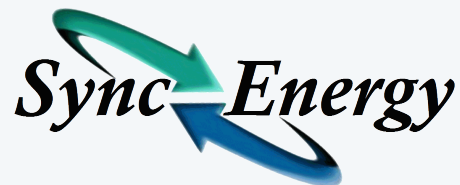


- Program Leadership
- Executive Sponsorship
- Training Delivery
- Data Quality



High performance. Delivered.

- Program Management
- Business Transformation
- Systems Delivery / Industry Experience
- Change Management / Training
- Local UK/Ireland Resources
- Maximo / Click / Syclo Experience



- Maximo Functional and Industry Experts
- Maximo Technical Experts
- T&D Best Practices

Contents



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- **Engaging the Business : Conference Room Pilots**

Experience post Go Live

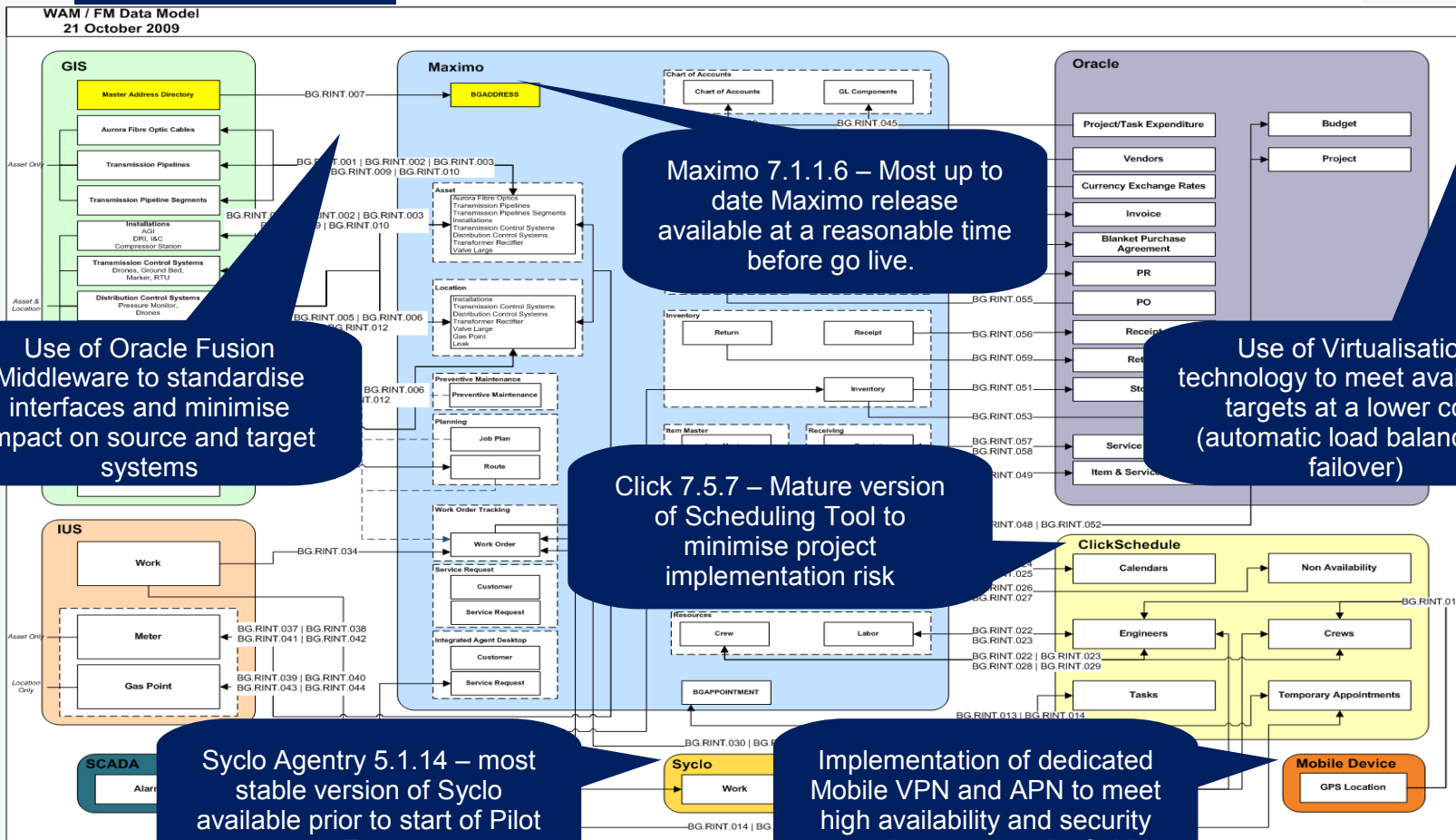
Key Success Factors

Technology Choices

Transparent Business Owned Change Programme

Focus on Data and Integration

Business Engagement



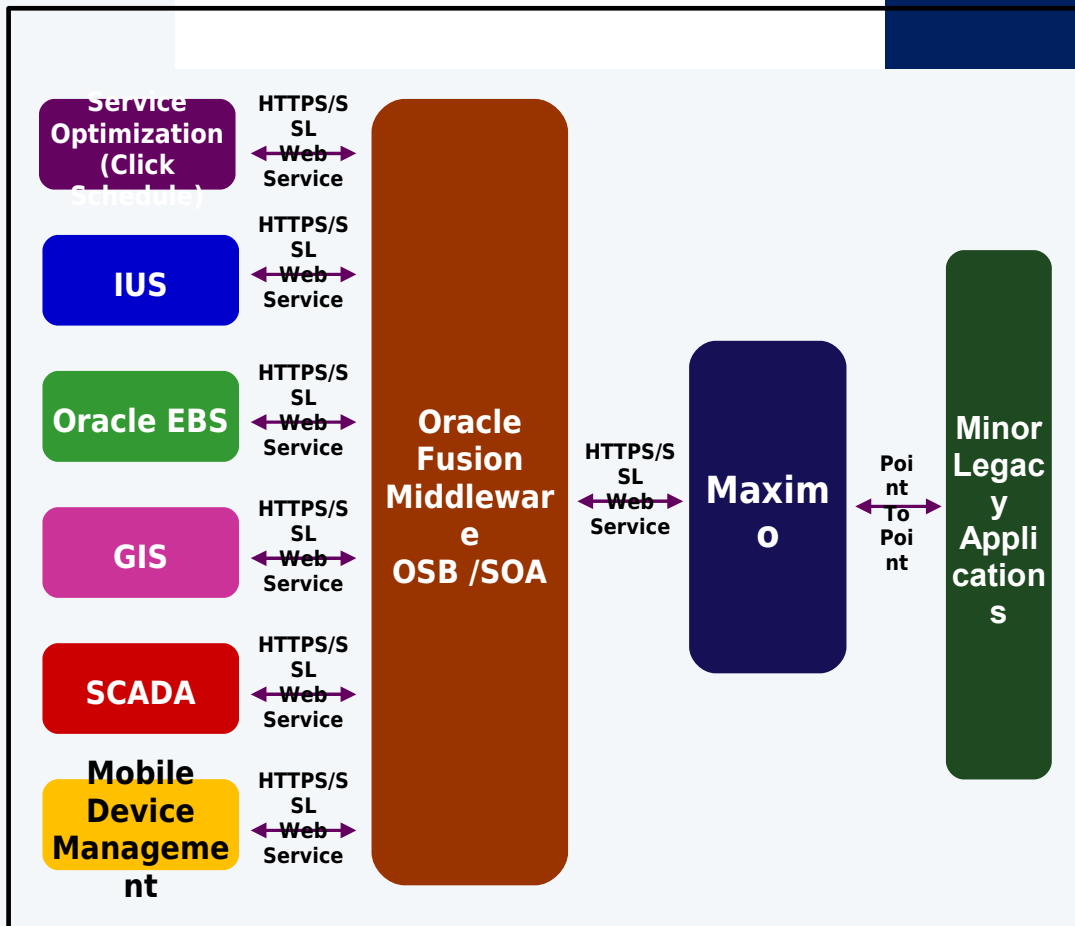
Key Success Factors

Technology Choices

Transparent Business Owned Change Programme

Focus on Data and Integration

Business Engagement



Oracle Fusion Middleware

- All major interfaces to Maximo via Oracle Fusion Middleware
- (SOA Suite 11g / Service Bus 11g)
- Synchronous / Asynchronous Interfaces
- Reusable Web Services
- Guaranteed message delivery
- Ordered delivery of messages where required
- Use of canonical message enables reuse across multiple applications e.g. Purchase Requisitions
- Centralised Monitoring of Interfaces via Middleware Administration Tool

Point to Point Interfaces

- Minor Legacy Applications via direct connection to Maximo

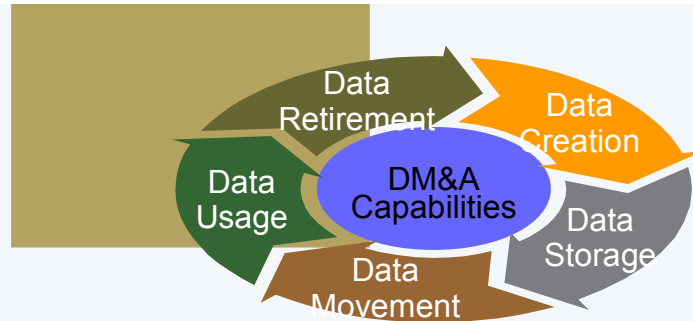
Key Success Factors

Business Engagement

Technology Choices

Transparent Business Owned Change Programme

Focus on Data and Integration



Data Governance	Data Structure	Data Architecture	Master Data	Data Quality	Data Security
<ul style="list-style-type: none">•Data Ownership•Data Stewardship•Data Policies•Data Standards	<ul style="list-style-type: none">•Data Modeling•Data Hierarrchy	<ul style="list-style-type: none">•Data Migration•Data Storage•Data Access•Data Archiving•Data Retirement	<ul style="list-style-type: none">•Master Data Management•Reference Data Management	<ul style="list-style-type: none">•Data Profiling•Data Cleansing•Data Monitoring•Data Compliance•Data Traceability	<ul style="list-style-type: none">•Data Privacy•Data Retention

Key Success Factors

Business Engagement

Technology Choices

Transparent Business Owned Change Programme

Focus on Data and Integration

Data Profiling was very important in understanding our data early

Estimated 60% of data is not fit for purpose

Functional Data Verification

Data Reconciliation & Profiling

Data Extract

Confirm they are happy with how the data has been loaded into Maximo,

Review the Data loaded in the Maximo and reconcile to Sample

Select a representative sample of Data from the Load file

Confirm that the data is fit for purpose for go-live

Key Success Factors

Technology Choices

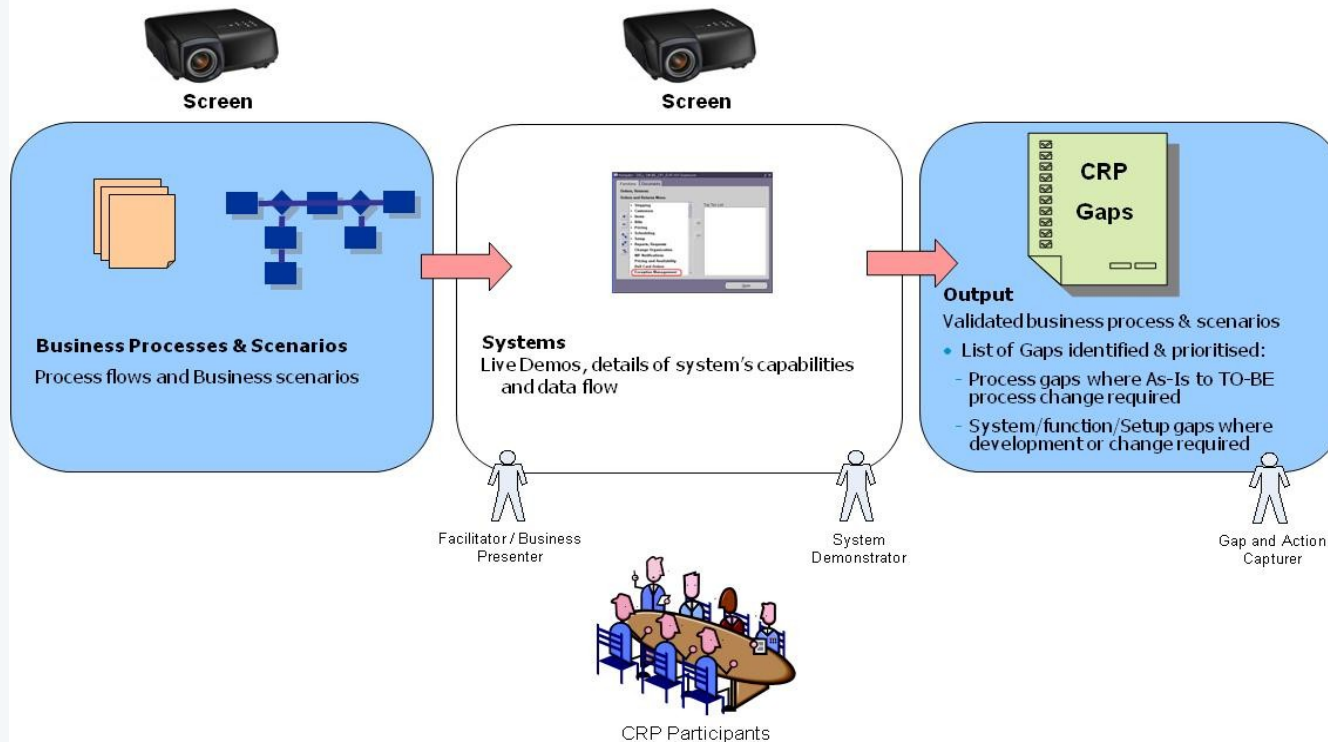
Transparent Business Owned Change Programme

Focus on Data and Integration

Business Engagement

Conference Room Pilots Engaged the Business as the programme progressed

Demonstration of NTP business processes & system functionality in tandem, providing the opportunity to validate & verify the future business processes and system functionality



Inventory of Conference Room Pilot (CRP) Scenarios

1. Construction – Large Transmission Project
2. Maintenance – PM Schedule / Survey programme
3. Emergency Response & Repair – Class 1 including GIS integration
4. Customer Requested New Connection
5. Appointment based Siteworks/ Customer Service Order – Fit/Set Meter
6. Distribution Project for replacements/refurbishments
7. Grid Control / SCADA Alarm
8. Additional Detail Flows
 - a. Inventory Management
 - b. Contractor Payment Management
 - c. Scheduling and Dispatch
 - d. Work Execution / Mobile

Emergency Response and Repair – Design Phase CRP

IAD
Welcome, Barry O'Donnell

Bulletins: (0) Go To Reports Start Center Profile Sign Out Help

Change Content/Layout Display Settings Create New Template Modify Existing Template Update Start Center

Favorite Applications

- Service Requests
- Work Order Tracking (T&D)

Quick Insert

- Escape Call
- No Gas Call
- New Call (Other)

Bulletin Board

Subject	Message	Post Date	Expiration Date
Gas outage	There is a damaged mains pipe on St.Margarets Road in Finglas.	02/12/2009	03/12/2009

Inbox / Assignments

Description	Owner Table	Due Date
No Assignments found for Barry O'Donnell		

Result Set

Service Request	Description	Due Date	Owner Table
1,003	Complaint regarding Work done by fitter	03/12/2009	BODONNEL
1,011	Customer wants to enquire about new connection charge	04/12/2009	BODONNEL
1,015	Customer Charter Query by customer.	04/12/2009	BODONNEL

1 - 3 of 3

IAD – Escape Call Scripting

Integrated Agent Desktop (IAD)

Bulletins: (0)

[Go To](#)

[Reports](#)

[Start Center](#)

[Profile](#)

[Sign Out](#)

[Help](#)

Find:



Select Action



List

Service Request

Escape

Related Records

Log

Specifications

Please Read: "Are you calling to report an Escape?"

Report Escape?

Please Read: "May I take your Name?"

Customer Name

Please Read: "May I take your GPRN Number (Meter Point Number) ?" If GPRN not available click the arrow to search:

GPRN Number

Meter

GPRN Point Status

GPRN Service Status

Please Read: "Is this the correct Address?"

Correct Address?

Select the button below to view work history at this location

Please Read: "Your Contact Numbers?"

Phone: (H)

Phone:
(M)

Please Read: "Is the gas escape Internal or External?"

Internal/External

Please Read: "At what location is the smell?"

Smell Location

Do you want to Enter Job Remarks?

Remarks

Please Read: "Can you Access your meter?"

Access Meter

Please Read: "Please confirm if you are able to turn off your Gas supply at the valve next to the meter?"

Turn off Meter

Please Read: "Are there any works in the area of the escape?"

Works in Area

Please Read: "Is the Smell from a Bord Gais Installation?"

BGN Installation

Please Read: "Is there broken or damaged Pipe?"

Damaged Pipe

Select the button below to Complete the Service Request

IAD – Escape Call Scripting – Safety Advice

Integrated Agent Desktop (IAD)

Bulletins: (0)

Go To

Reports

Start Center

Profile

Sign Out

Help

Find:

Select Action

List

Service Request

Escape

Related Records

Log

Specifications

Please Read: "Are you calling to report an Escape?"

Correct Address?

Please Read: "May I take your Name?"

Customer Name

Please Read:

(Meter Point M
click the arro

View Work Details

Please Read:

-- Do not operate an electrical appliance, switches, or equipment. If switched on leave on.

-- Do not smoke and extinguish any naked flames.

-- Do not use mobile phones in the vicinity of the escape

-- Do not work in the area of the escape

-- Remove all personnel from the affected area.

-- The Senior Person on site should identify themselves to the Bord Gais representative

Please confirm that you have understood this safety advice

OK

Please Read: "Please confirm if you are able to turn off your Gas supply at the valve next to the meter?"

Turn off Meter

Please Read: "Are there any works in the area of the escape?"

Works in Area

Please Read: "Is the Smell from a Bord Gais Installation?"

BGN Installation

Please Read: "Is there broken or damaged Pipe?"

Damaged Pipe

Select the button below to Complete the Service Request

Complete SR

Completed SR – WO Creation Confirmation

IAD Bulletins: (3) Go To List Reports Start Center Profile Sign Out Help

Find: Select Action

List **Service Request** Related Records Log Specifications

Service Request* Reported Date CSR Name Owner Owner Group Status Attachments

End User Information **Caller Information**

GRPN Meter End User Name End User Phone (H) End User Phone (M) End User E-Mail Type of End User Domestic/IC? EAC Road Impact Type

System Message

Work Order 1005 Created

End User Street Address Information

Building Number Unit No. Building Name Building Group Name
Street Name Town GeoCode
Secondary St. Name County Latitude
Locality Postal Code Longitude
Secondary Locality Country

Caller Address

Service Request Details **Complaints**

Summary Classification
Details Class Description
Public/Private? Installer Number Installer Name Documentation Sent? Source
Complainants Name
Complainants Phone
Dept. Responsible
Category
Complaint Type

Meter Information **Meter Read**

Gas Point Status Meter Type Last Meter Read Date
Gas Service Status Meter Size Last Meter Read Meter Read Date
Gas Use Meter Number Next Meter Read Meter Read
Meter Position

Completed SR

View Call Script Flow

IAD

Bulletins: (3) Go To Reports Start Center Profile Sign Out Help

Find: Select Action

List Service Request Related Records Log Specifications

Service Request* 12345 Reported Date 5/01/10 07:45 AM CSR Name CHEINEMA Owner Owner Group CALLCTR Status NEW Attachments

End User Information

GRPN 368367 30, Clonard Street, Balbriggan, County
Meter M12345 Meters G4 Diaphragm Type

End User Name Susan Martin
End User Phone (H) 087 668 2798 End User Phone (W)
End User Phone (M) 087 432 8765 End User Fax
End User E-Mail smartin@abc.com
Type of End User Vulnerable End User?
Domestic/IC? Supplemental Charge Applies?
EAC SPC
Road Impact Type

Caller Information

Caller Name Susan Martin
Caller Phone (H) 087 668 2798 Caller Phone (M)
Caller E-mail smartin@abc.com
Contact Type Resident
Inbound/Outbound Inbound Use End User Details?

End User Updates

Updates Required?
Update Details

End User Street Address Information

Building Number 30 Unit No. Building Name Building Group Name
Street Name Clonard Street Town Dublin GeoCode
Secondary St. Name County Latitude 3954.6543
Locality Balbriggan Postal Code Ireland Longitude 8632.9871
Secondary Locality Country

Caller Address

Service Request Details

Summary Escape Call
Details Gas service hit by Water Company
Public/Private?

Classification RESPOND / ESCAPE
Class Description Respond to Escape
Installer Number
Installer Name
Documentation Sent?

Complaints

Source
Complainants Name
Complainants Phone
Dept. Responsible
Category
Complaint Type

Meter Information

Gas Point Status On
Gas Service Status Installed
Gas Use
Meter Position

Meter Type
Meter Size
Meter Number

Meter Read

Last Meter Read Date 13/10/2009
Last Meter Read 12321
Next Meter Read
Meter Read Date
Meter Read

ClickSchedule Semi-Automated Scheduling

The screenshot displays the ClickSchedule software interface. The main window shows a Gantt chart for 'Engineers Gantt [05/Jan/2010 - 06/Jan/2010]'. The chart is divided into two days: Tuesday, 05/Jan/2010, and Wednesday, 06/Jan/2010. The Gantt chart shows various tasks and calls, such as 'Call-10', 'Call-100', 'Call-1010', 'Call-1007', 'Call-101', 'Call-1011', and 'Call-10'. A yellow callout bubble points to the 'Schedule Wizard' dialog box, which is open in the foreground. The dialog box is titled 'Schedule Wizard' and contains a table of search results. The table lists the following options:

Engineer	Start	Finish	Region	Available	District
① Claire McNeill	05/01/10 15:30 PM	05/01/10 18:00 PM	Leinster	Yes	No
① Mick Killeen	05/01/10 15:30 PM	05/01/10 18:00 PM	Leinster	Yes	Yes
① Pat Tully	05/01/10 10:00 AM	05/01/10 15:30 PM	Leinster	Yes	Yes

Below the table, there are buttons for '< Back', 'Next >', and 'Cancel'. A yellow callout bubble contains the text: '...user launches Schedule Wizard (semi-automated scheduling) to return list of scheduling options'. The background Gantt chart shows a list of engineers on the left: Claire McNeill, Dave Morrison, Eoin Coyne, Kevin Shannon, Mick Killeen, and Pat Tully. The Gantt chart also shows a task 'Relocated to Munster:Cork City'.

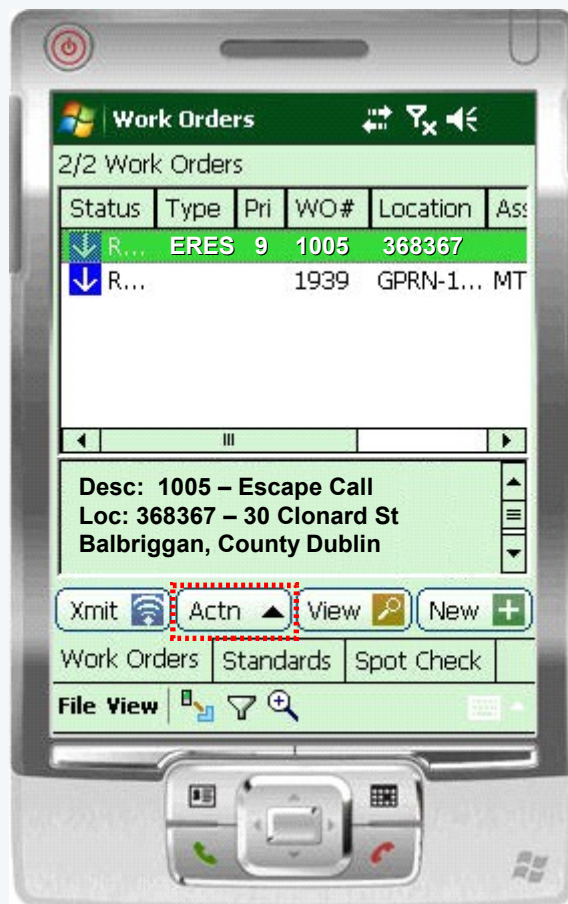
ClickSchedule Engineer Gantt

The screenshot displays the ClickSchedule software interface. The main window is titled "ClickSchedule from ClickSoftware - Engineers Gantt [05/Jan/2010 - 06/Jan/2010]". The interface includes a menu bar (File, Edit, View, Task, Engineer, Gantt, Tools, Window, Help), a toolbar, and a Views Bar on the left. The Views Bar contains icons for Engineers Gantt, Tasks List, Map, Messages Window, and Scheduling Monitor. The Navigation Tree on the left shows a hierarchy of locations: Galway & the West, Leinster Middle, Leinster North, Leinster North West, Leinster North Middle, Leinster North East, Leinster South, Munster, and Transmission. The main Gantt chart area shows a timeline from 06/01/10 08:15 to 06/Jan/2010. The chart displays various tasks as bars, with a red box highlighting a task labeled "Call-100" on Tuesday, 05/Jan/2010. A yellow callout bubble points to this task with the text: "...user has selected appropriate resource option and task is now displayed (scheduled) in Gantt chart against appropriate resource". Below the Gantt chart is a "Tasks List" table with the following data:

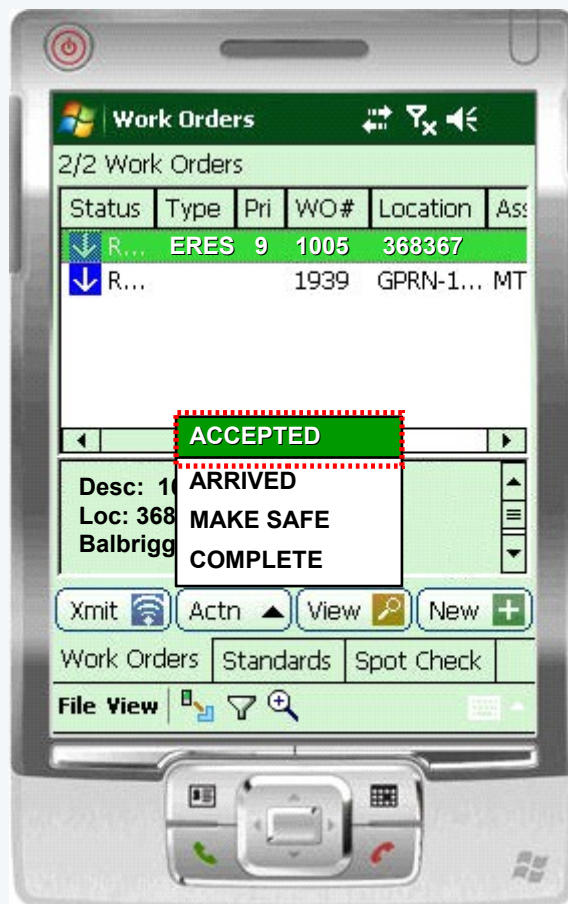
CallID	Number	TaskType	Confirma...	Priority	Status	Re
12345	1	Escape		9	ALLOC	
12345	1	Escape		9	ALLOC	
NE345	1	No Gas		7	ALLOC	
NE345	1	No Gas		7	NEW	Lein
NE345	1	Repair		8	IN PROG	Leinster Leinster
NE345	1	Repair		8	IN PROG	Leinster Leinster
NE						

The status bar at the bottom shows the current date as 07/Jan/2010 and provides summary statistics: In Domain: Tasks: 13, Selected: 1, Scheduled: 11, Engineers: 6.

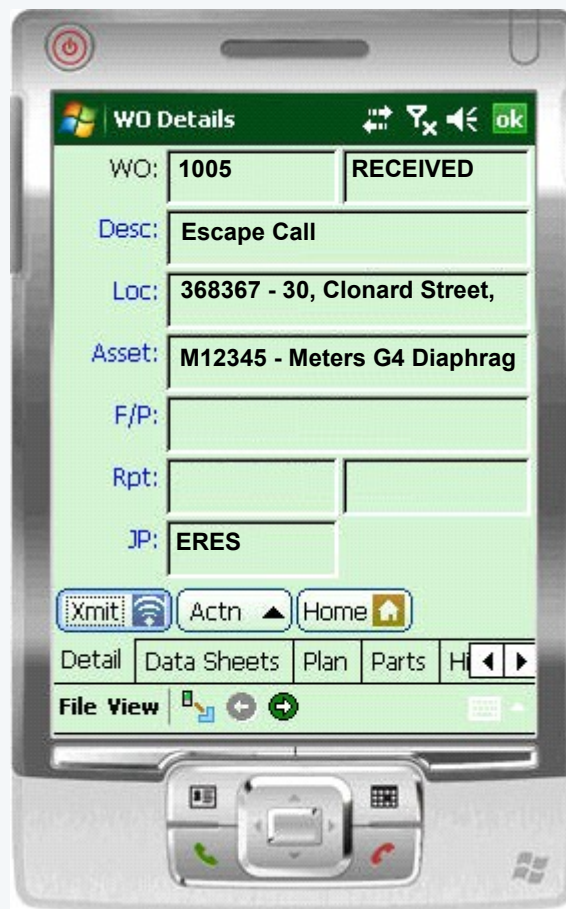
Syclo - Job List



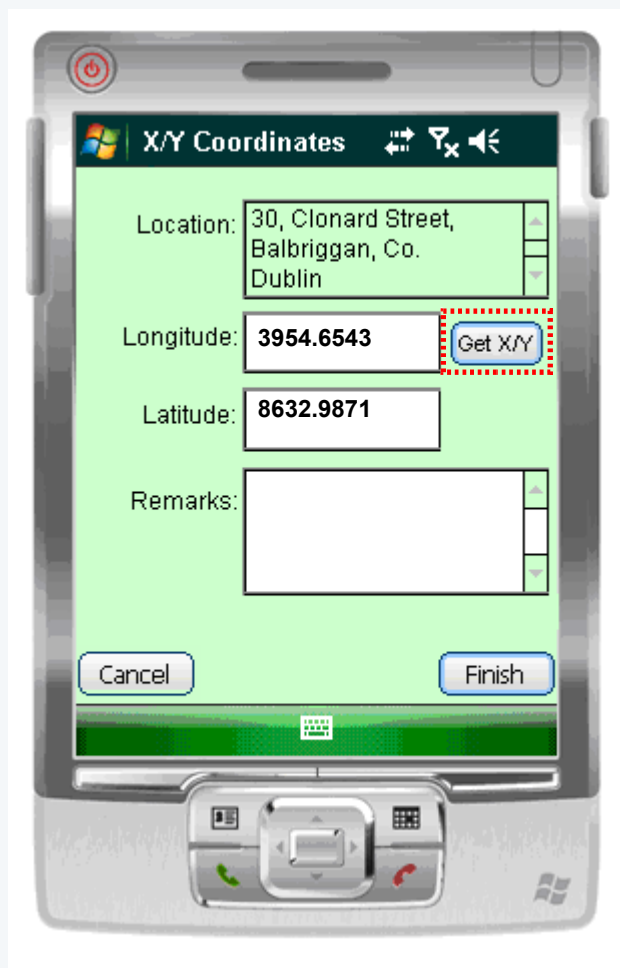
Syclo - Job List – Status Menu



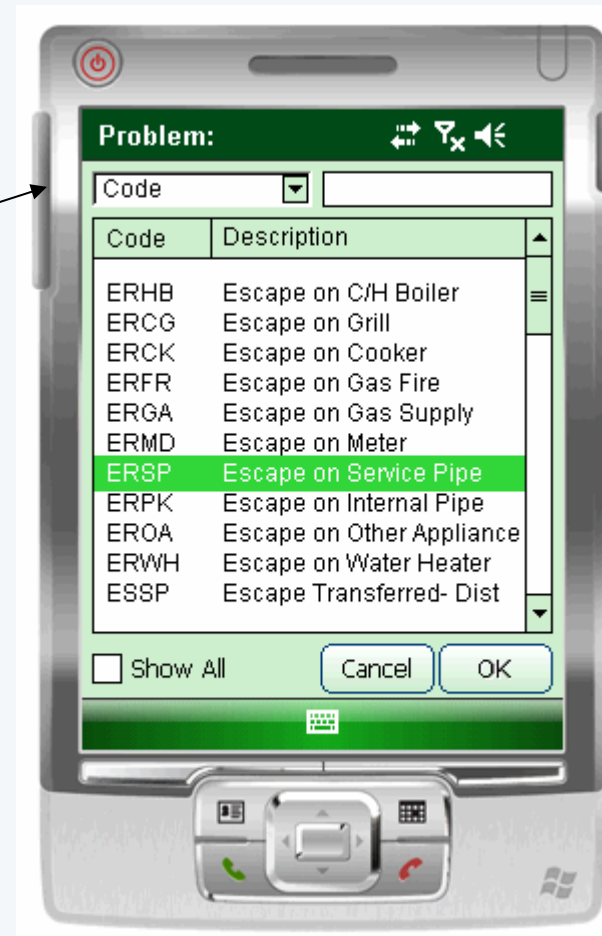
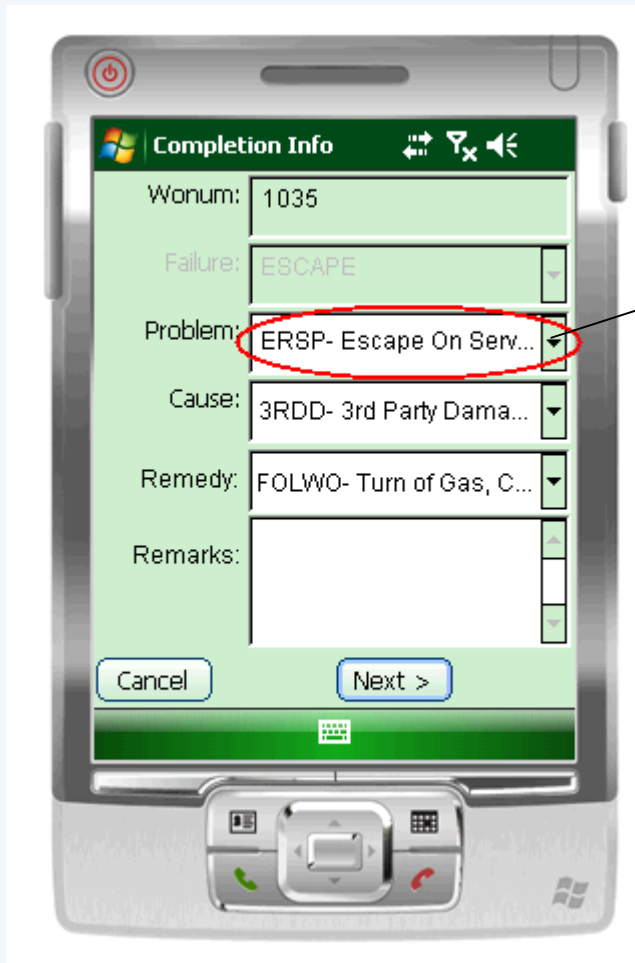
Syclo - Job Details



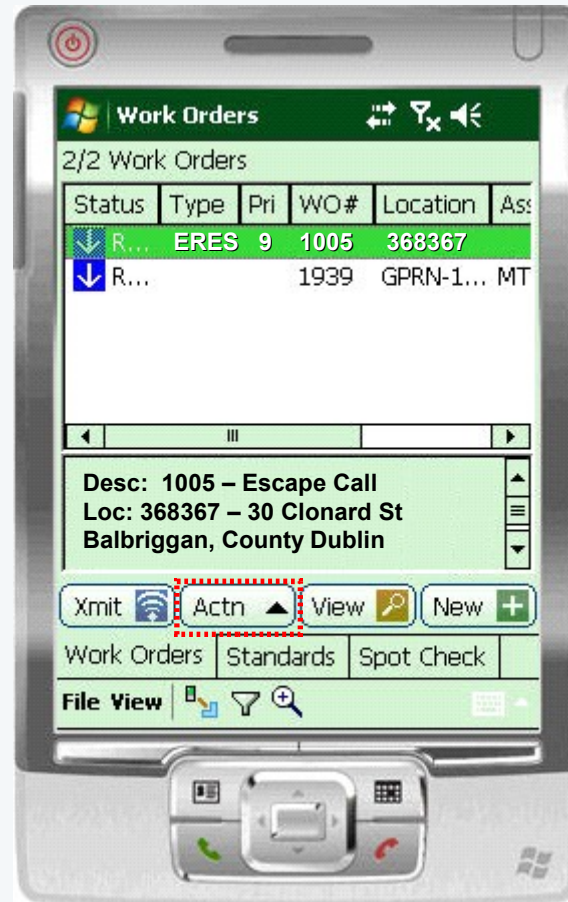
Syclo - X/ Y Coordinate



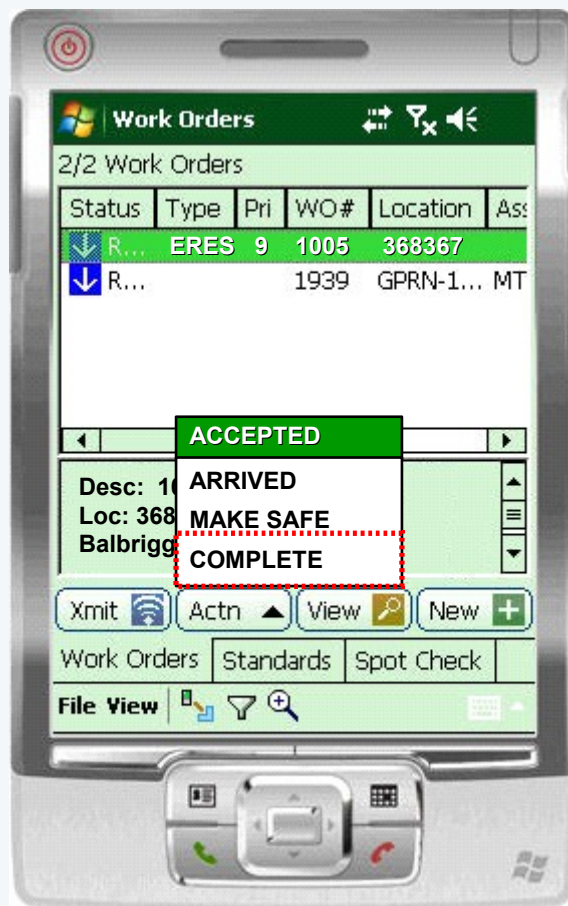
Syclo – Capture Failure Codes



Syclo - Job List



Syclo - Job List – Status Menu



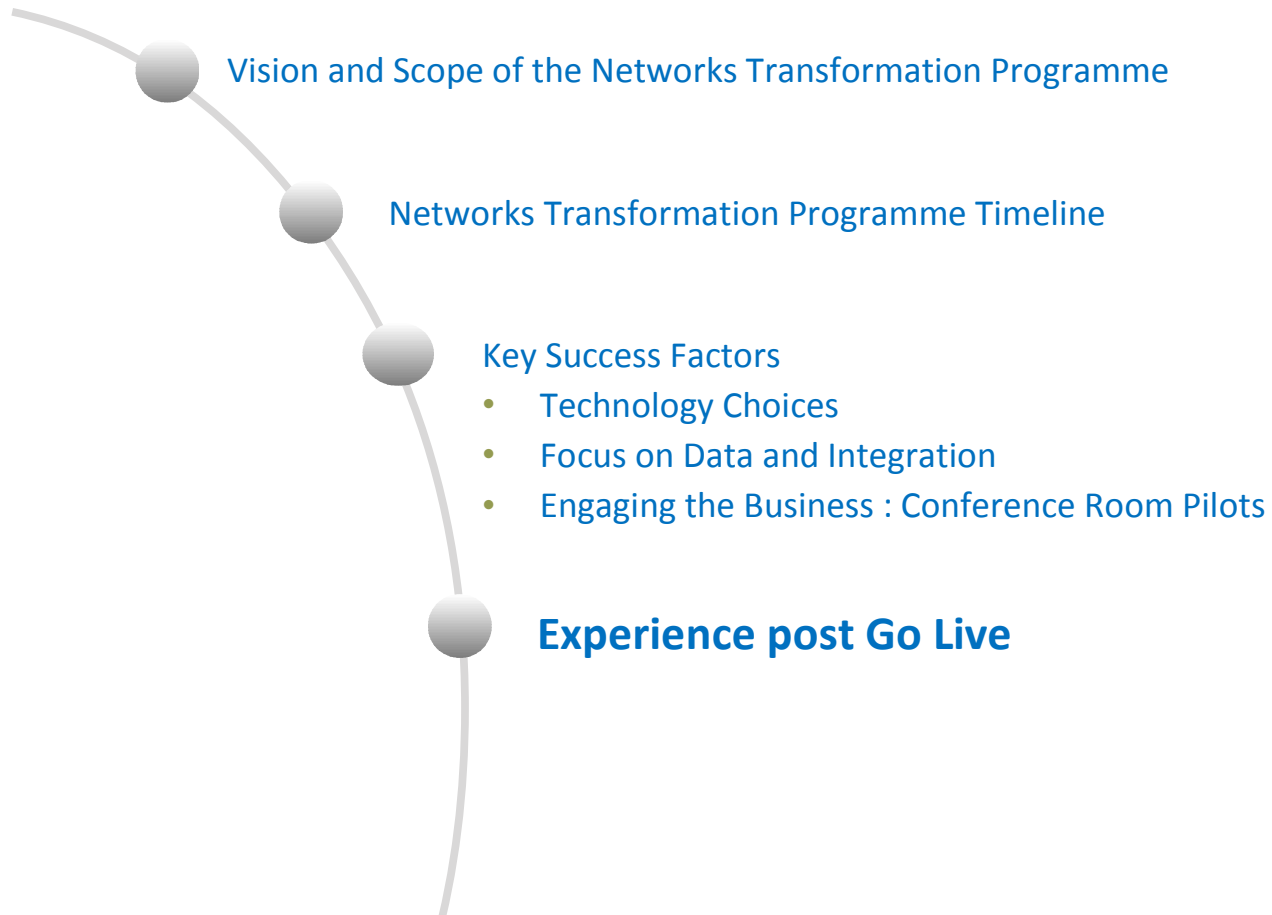
Other innovative features of the NTP Maximo Solution

- Integrated Agent Desktop (IAD) – Call Center application
- Prerequisites Management in Work Order Tracking
- “Bulk” work order creation for distribution projects and outage restorations
- Data requirements based on Status and Work Type – Table Driven
- Implementation of Calibrations solution
- Contractor Unit reporting for Payments
- “Projects” module

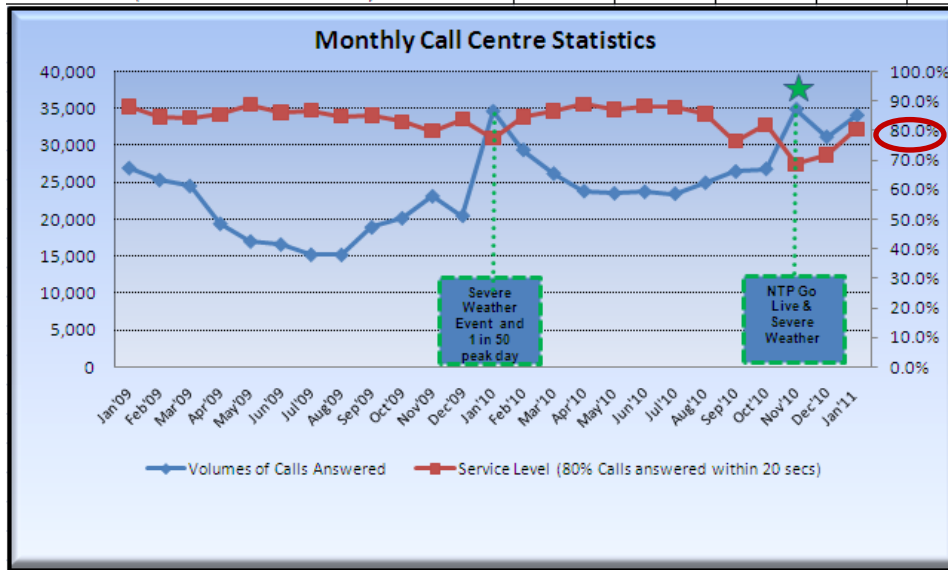
NTP Program Video



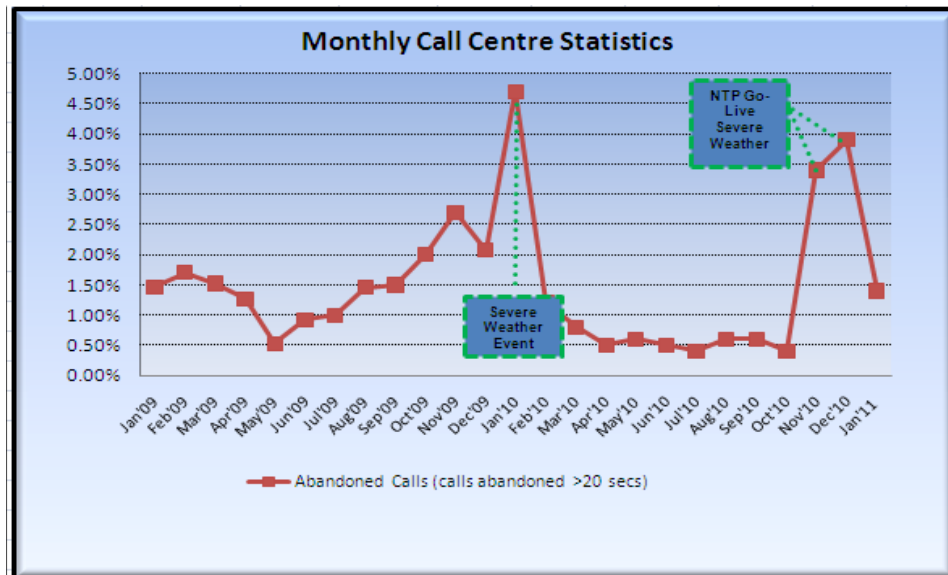
Contents



Call Centre



- No. of calls received in Call Centre increased over NTP Go Live due to a larger number of shipper queries on appointment and customer queries on appointments
- Severe weather event also increased the number of calls in Nov'10 & Dec'10
- Service Level dropped with the increased no. of calls handled in Call Centre

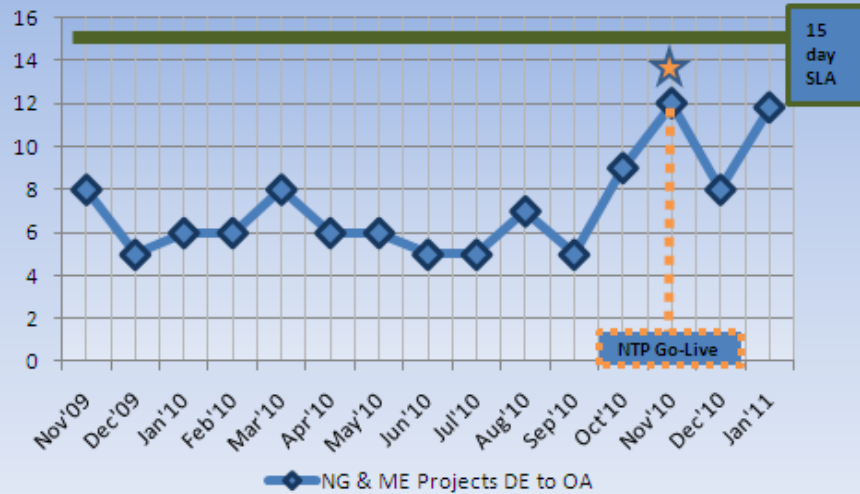


- No of abandoned calls (outside of Service Level of 20 seconds) peaked in Jan'10 due to severe weather event and also peaked at NTP go-live – severe weather also had an impact on the number of abandoned calls.

Projects & Estimations

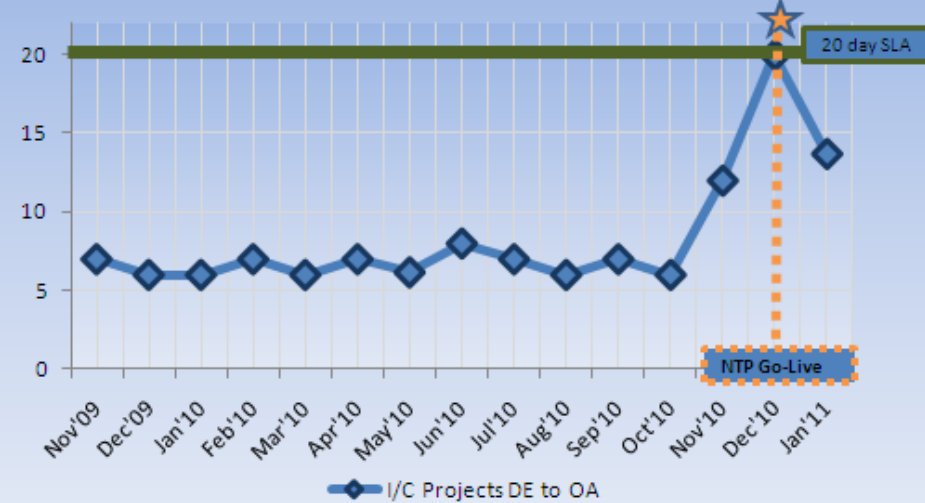
1

Average # of days for NG & ME estimates to move through project phases & 15 day SLA



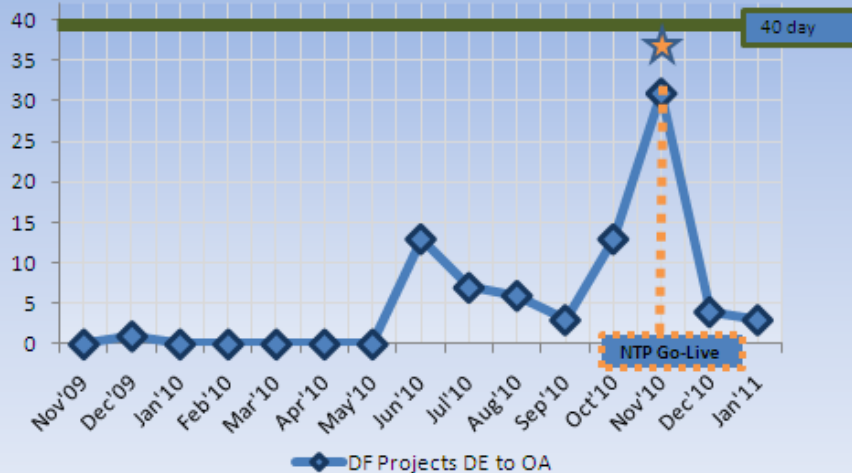
2

Average # of days for I/C estimates to move through project phases & 20 day SLA



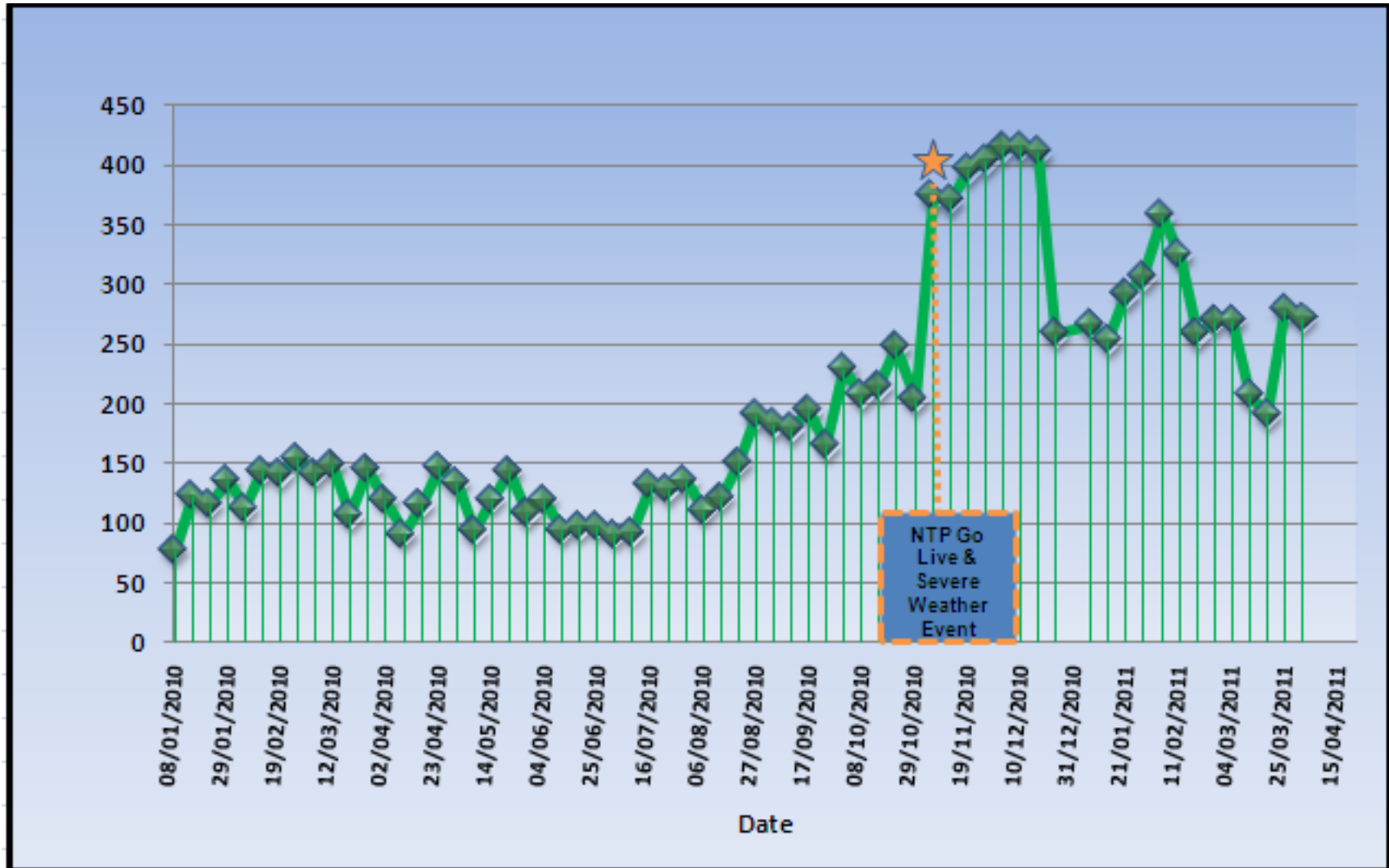
3

Average # of days for DF estimates to move through project phases & 40 day SLA



- (1) Shows that the average length of time for Non Gas Estate & Mains Extension Projects to reach Design / Operations Approval increased over the period of NTP Go-Live
- (2) Similarly for I/C estimates
- (3) Similarly for Development Feeder Main Projects (worth noting in this case that the size of the project can also lead to a slower rate of turnaround – this combined with new Maximo system contributes to Nov'11 peak)

Escalations – no's raised per week



Questions



Backup / CRP Slides

Do not remove

IAD – Escape Call Scripting – GPRN Search

Integrated Agent Desktop (IAD)

Bulletins: (0)

Go To

Reports

Start Center

Profile

Sign Out

Help

Find:

Select Action

List

Service Request

Escape

Related Records

Log

Specifications

Please Read: "Are you calling to report an Escape"?

Correct Address?

Please Read: "May I take your Name?"

Customer Name

Select Value

Filter By* CSR Name

Refresh

GPRN	Meter	WO Num	Name	Address	Telephone	E-Mail Address
<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	Clonard Dublin	<input type="text"/>	<input type="text"/>

Continue Cancel

IAD – Escape Call Scripting – GPRN Search Select

Integrated Agent Desktop (IAD)

Bulletins: (0)

Go To

Reports

Start Center

Profile

Sign Out

Help

Find:

Select Action

List

Service Request

Escape

Related Records

Log

Specifications

Please Read: "Are you calling to report an Escape"?

Correct Address?

Please Read: "May I take your Name?"

Customer Name

Select Value

Filter By* CSR Name

Refresh

GPRN	Meter	vVO Num	Name	Address	Telephone	E-Mail Address
				Clonard Dublin		
368367	M123456	Susan Martin	30 Clonard St, Balbriggan	087 382 44345	smartinn@abc.com	
123456	M543264	Susan Jones	34 Clonard St, Balbriggan	087 654 9864	sjones@over.ie	
768529	M883721	Chris Heineman	40 Clonard St, Balbriggan	087 324 99876	dch3l@sync.com	

Continue Cancel

IAD – Escape Call Scripting – Work History

Integrated Agent Desktop (IAD)

Bulletins: (0)

Go To

Reports

Start Center

Profile

Sign Out

Help

Find:

Select Action

List

Service Request

Escape

Related Records

Log

Specifications

Please Read: "Are you calling to report an Escape"?

Correct Address?

Please Read: View Work Details

Please Read:
(Meter Point)
click the arro

Location

Include Children?

Include Ancestors?

Include History?

Refresh

Please Read:

Select the but

Work Preventive Maintenance Routes Collections

Work Filter 1 - 10 of 91

Download

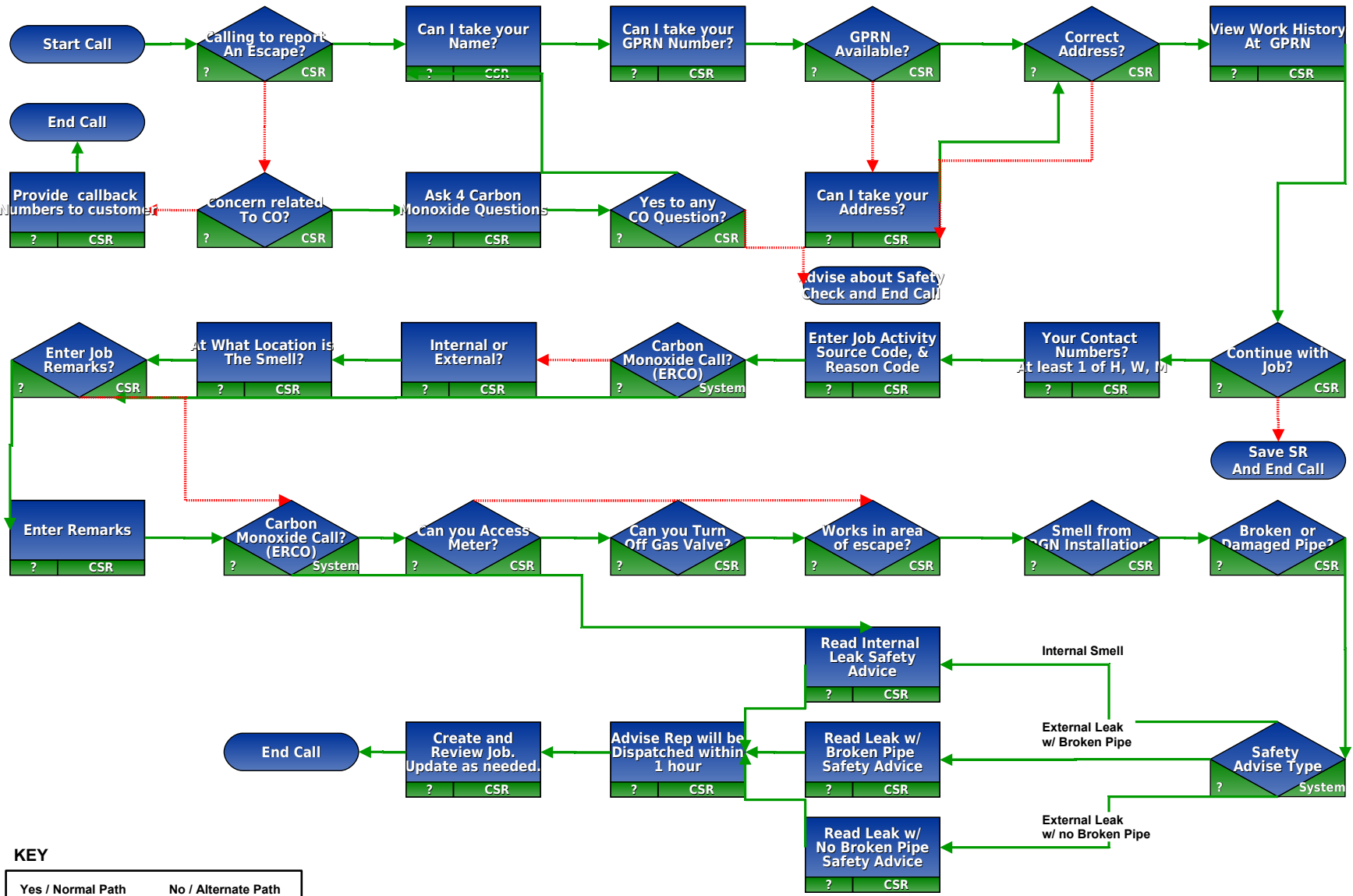
Record	Class	Status	Reported Date	Target Start Date	Description	Priority	History?	Is Task?
<input type="checkbox"/>							<input type="checkbox"/>	<input type="checkbox"/>
<input type="checkbox"/>	1004	SR	9/8/09 9:01 AM		Emergency Leak Call		<input type="checkbox"/>	<input type="checkbox"/>
<input type="checkbox"/>	WO1205	WORKORDER	9/23/09 3:26 AM	9/23/09 12:00 AM	PM fit Meter Flow control JT	3	<input type="checkbox"/>	<input type="checkbox"/>

Relate Records

OK

Emergency Call Script – Flow Diagram

Return to Completed SR



KEY
 Yes / Normal Path →
 No / Alternate Path - - - - -