Project Nexus

Implementation Steering Group

2 June 2015



Note:

Since this document was issued on 01/06/15, an issue has arisen with respect to the readiness of the market trials testing environment for 05/10/15. An impact assessment is currently being conducted by Xoserve.

Contents

1.	Executive Summary
2.	Market trials start date
3.	Market trials duration and go-live
4.	Market Trials Governance
<i>A</i> .	Appendices

This document has been prepared only for Ofgem and solely for the purpose and on the terms agreed with Ofgem in our statement of work and under the framework agreement dated **11th August 2011**. We accept no liability (including for negligence) to anyone else in connection with our work or this document.

© 2015 PricewaterhouseCoopers LLP. All rights reserved. In this document, "PwC" refers to the UK member firm, and may sometimes refer to the PwC network. Each member firm is a separate legal entity. Please see <u>www.pwc.com/structure</u> for further details.

1. Executive Summary

1. Executive summary

Background:

 Following the decision made at the 1st May 2015 Steering Group to defer the 5th October 2015 go-live, we have focused since on establishing the options for a new go-live date.

The approach we have taken:

- We have worked with Xoserve to understand when retrospective amendments and unique sites are planned for delivery. We have also understood the outcome of their 'left to right' re-planning performed to date for market trials.
- We have revisited our assessment of project plans to better understand when parties are planning to complete their internal solutions (**page 23**).
- We have held a number of one-to-one conversations with shippers, GTs and iGTs that have asked to relay their thinking on a new go-live date and market trials. This has been supplemented by three teleconference meetings to allow a broader range of participants to share their views .
- **28 organisations** impacted by Project Nexus have attended these discussions and forums.

Go-live date findings:

• Through our discussions with Xoserve, we have identified two options for Nexus go-live for consideration by the Steering Group and their constituents.

Project Nexus PwC

- **Option 1** is the earliest go-live date for a single release that includes retrospective amendments and unique sites. This is based on the assumptions and timeline set out on **page 12**.
- Given the extended timelines estimated for option 1, we believe that a split release should (page 14) be considered. Core functionality is delivered in 'release 1', subsequently followed by retrospective amendments / unique sites as 'release 2'. This has not been subject to detailed planning by Xoserve and thus a finalised go- live date for the 2nd release cannot be confirmed.

Option 1:	Key mile stone	Date
single release	L2 market trials start (core)	1 st September 2015
Subject to	L3 / L4 market trials start (core)	5 th October 2015
industry buy- in into market trials approach	Retro / unique sites delivery into market trials	8 th February 2016
	Market trials end	4 th to 11 st April 2016
	Earliest go-live date	1 st June 2016
Option 2:	Key mile stone	Date
Option 2: dual / split release	Key mile stone Market trials start (core)	Date As Option 1
dual / split		
dual / split	Market trials start (core)	As Option 1

1. Executive summary

Go-live findings continued:

- Whilst addressing market feedback that three months of market trials is insufficient, the two options are built on the 'facilitative' market trials approach proposed by Xoserve. As noted below, market participants are not yet aligned on whether this approach is sufficient.
- The dates of any 'release 2' under **option 2** cannot be estimated with any certainty at this stage. Our experience suggests that a stabilisation period of at least six months would be would be required between 'release 1' and 'release 2'.
- Given the critical dependency on Xoserve, we recommend that their independent assurance provider reviews their re-planning
 to the favoured option and reports the findings to the Steering Group.

Other findings – enhancing the market trials approach:

- There is a fundamental mismatch in expectation between Xoserve's facilitative approach and the prescriptive 'command and control' approach that many participants believe is required to de-risk a change of this nature.
- For example, some participants expect test scripts to be prescribed, whereas the Xoserve approach is for participants to design their testing to the level that they feel is sufficient.

- Participants raised a fundamental number of questions regarding the scope, approach and extent of the market trials approach that suggest that this is not consistently understood.
- We have summarised these on **page 22** and recommend that these are clearly addressed in the revised market trials approach document that Xoserve are preparing.
- Based on our experience of similar industry changes, a more prescriptive approach is required to ensure that market trials achieves its objectives. As a minimum, more prescriptive guidance and monitoring is required around data file format testing and process scenario testing.
- This is addressed in part by the additional governance rigour incorporated into the proposed market trials and go-live readiness assessment framework. In addition, Xoserve will need to adapt their market trials approach (e.g. specifying the mandatory data files and scenarios for Level 2, Level 3 and Level 4 trials).
- To fully meet industry expectation, we believe that the scope and extent of market trial coordination activity will need to be increased to cover the gap that currently exists. This needs to be carefully balanced with the ability to start Level 3 and Level 4 trials on 5th October 2015.

1. Executive summary

Key recommendations for the Steering Group:

• Below we set out a clear set of recommendations for consideration by the Steering Group. We have identified the relative level of effort that we believe is entailed to execute these actions and the level of impact we expect on the risk profile of the UK Link Replacement Programme and Nexus go-live.

#	Recommendation	Responsible	Relative effort to implement	Impact on risk profile
1	Steering Group members to canvas support from their constituents for the two proposed options for a new Nexus go-live dates. Feedback is to be given to the next Steering Group meeting on 15 June 2015 , with the objective of approving a preferred go-live date at this meeting for inclusion in the UNC.	Steering Group, market participants	Moderate	High
2	Xoserve to update their market trials approach to reflect the preferred go-live option and approach. The revised document should address the following:	Xoserve, PwC	Moderate	High / moderate
	 The feedback and questions raised to PwC by market participants (summarised on page 22); 			
	• Specification of the critical data flows that are mandatory for inclusion in Level 2 trials, together with a clear approach to testing and monitoring the progress of testing; and			
	• Specification of the process scenarios that link to the market critical processes and that are therefore mandated for Level 3 / Level 4 market trials. This should include a description of how the completion of this testing will be monitored between Xoserve and PwC.			
3	Xoserve's independent assurance provider should review the Xoserve delivery plans for the approved go-live date to highlight the level of risk associated and the current progress being made towards the market trial start date of 5th October 2015. The findings should be reported to the Steering Group.	Xoserve	Moderate / low	High

2. Market trials start date

2. Market trials start date – Level 2

Based on the rationale below, we recommend that Level 2 (file format) market trials should start on 1st September 2015 for a period of 4 weeks. In addition:

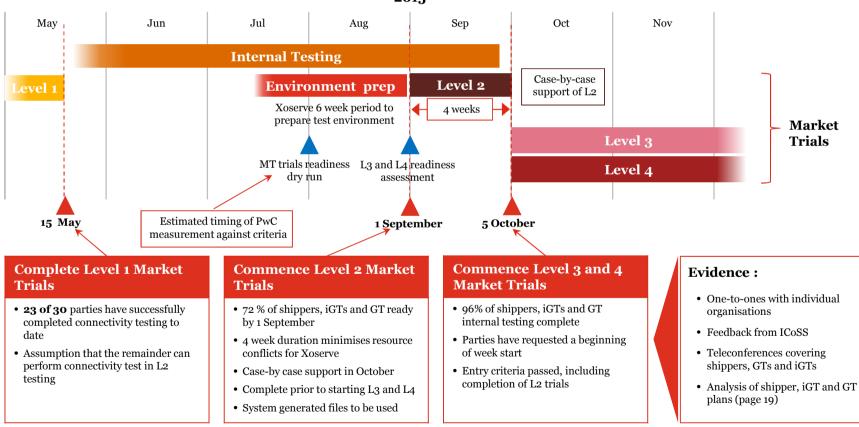
- Level 2 trials should be completed prior to an organisation starting Level 3 and Level 4 trials; and
- A more prescriptive approach is required, with files mandated for testing based on their significance to market processes.

Level 2 market trials should be completed prior to staring Level 3 (process) and 4 (change of ownership).	 Common consensus that the data file format testing is a critical component requiring significant rigour in execution. Broad agreement that successful completion of data file format testing should be an entry criteria for Level 3 and Level 4 trials. This will keep these phases from being contaminated by data file format issues. A more prescriptive approach should be taken, with mandated data files for verification (see below).
Level 2 market trials duration is 4 weeks, with 'exception only' support in October.	 Xoserve 'left to right ' plan of 4 weeks to conduct Level 2 trials. Participants did not raise concerns with this time period, beyond requesting support, by exception, for parties that are unable to test in September. An extended duration would divert Xoserve resources from other critical activities, such as user acceptance testing and 'core' delivery.
Level 2 trials should be started earlier than 1 st October 2015.	 Common consensus that Level 2 should start as soon as is possible. The majority (including Xoserve) stated that they can support Level 2 trials during September. Parties will use either manually generated files r system generated files from their test environments for L2 trials. We recommend the latter approach as it more closely replicates 'real life'. 72% of organisations plan to complete internal testing by the end of August (page 23), suggesting this is a valid start date*. Some provision may be needed to support any organisations that run late in October – but this would be on an exceptional, case-by-case basis.
	and other parties are able to support an earlier start for Level 2 market trials. However, unless a critical mass of June 2015 ats are ready, then an inefficient and elongated Level 2 format test will result. 9

2. Market trials start date – Level 3 and 4

Based on the following rationale, we recommend that Level 3 and 4 trials should start on 5th October 2015.

- 96% of organisations will have completed their internal solution testing by 30th September 2015 (see **page 23**); and
- The majority can support L2 market trials during September 2015.



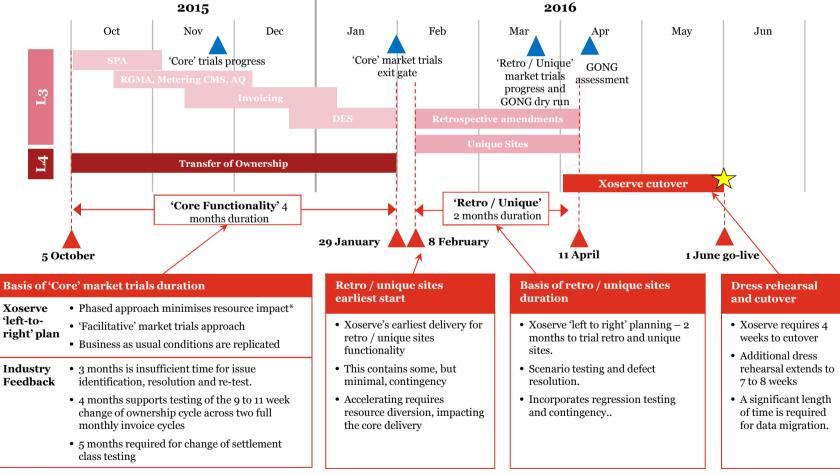
2015

3. Market trials duration and go-live

3. Market trials duration and go-live – option 1 (single release)

Level 3 and 4 market trials conducted over 8 months with an earliest go-live on 1st June 2016:

- Market trials for retro / unique sites starts on 8th February 2016, when build / test of this functionality is scheduled to complete.
- A valid market trials phase requires 4 months for 'core functionality' and 2 months for retrospective amendments and unique sites.



Project Nexus *Phasing is under review by Xoserve, e.g. to bring DES forward.



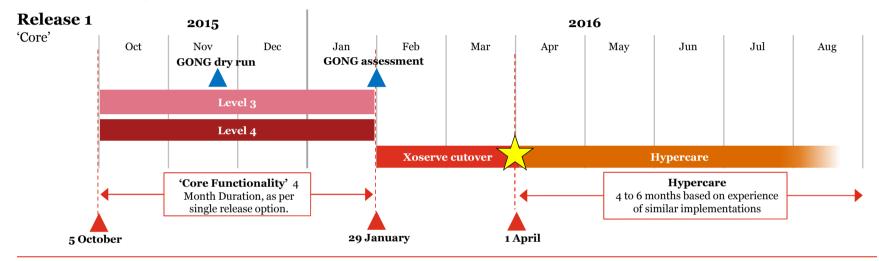
3. Compatibility of Option 1 with other industry changes

Option 1 is not directly dependent on other industry changes or processes. However, there is likely to be resource conflict s with the Smart DCC implementation across shippers and GTs.

	2015					2016				
Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	July +	Compatible with Nexus?
		Level	3 and 4			Xoserve	cutover	Ну	percare	Key assumption: 1 st June 2016 target go-live
	Wint	er Period C	Consumpti	on Peak						✓ Yes: avoids the winter period
		Europ	ean Trans	mission Re	gulation	7				 ✓ Decoupled from EU phase 2 ✓ After EU Phase 3 effective date of 1st May
							Smart DC	С	7	 No direct dependency / conflict with current Sma DCC go-live assumption of August 2016 Resource strain at shippers and GTs – the same resource s are supporting both programmes
CMA re	emedies pu	ıblished								 Competition and Markets Authority (CMA) conclusion published 26 Nov 2014 Remedies between June and November 2015
								AQ re	view	✓ Before to bulk of effort for AQ review
						AU	GE table as	per prio	r year	✓ AUGE process for 2016/2017 is already set to roll- over 2015 values, so no impact on Nexus
Mod 4	28 impler	nented	(Disaggre	ated of comj	plex supply p	ooints)				 Xoserve expects to meet Mod 428 implementation date with no impact on Nexus.
						Mod 514	Daily Met	ered Volı	untary sites	✓ National Grid will support DMVs for six months after Nexus Implementation. The date can roll forward with the Nexus go-live date in the UNC.
						1	Reconcilia	tion Valu	ies	✓ Mod 515 rolls forward with Nexus go-live, simila to DMV
					iG1	Γ072 cutov	er period			 iGT cutover period requires six non-effective days which may need to be adapted for bank holidays
Project PwC	Nexus				iG1	Г072 cutov				 iGT cutover period requires six non-e

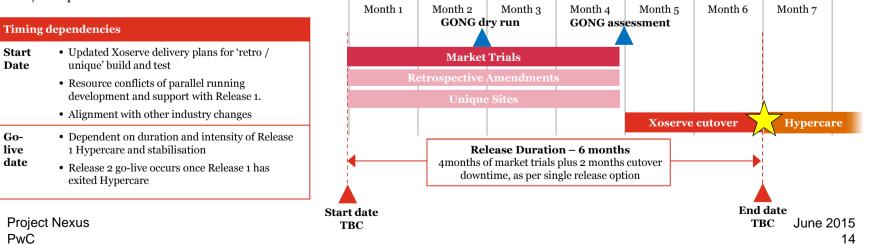
3. Market trials duration and go-live – option 2 (split release)

Go-live is split into two releases , with 'core functionality' earliest go-live 1st April 2016 and Release 2 at a date to be confirmed, but likely to be at least 6 months after release 1.



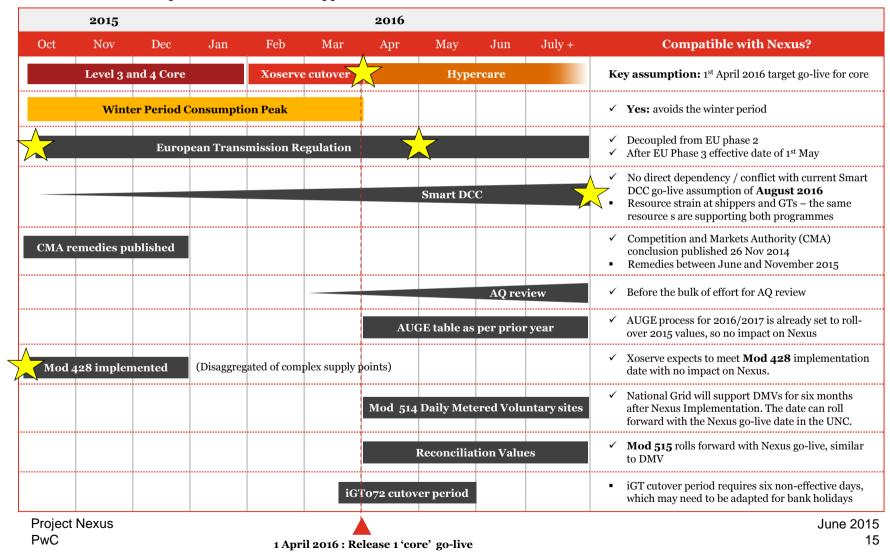
Release 2

'Retro / Unique'



3. Compatibility of Option 2 with other industry changes (Release 1)

Option 2 – Release 1 is not directly dependent on other industry changes or processes. However, there is likely to be resource conflicts with the Smart DCC implementation across shippers and GTs.



3. Compatibility of Option 2 with other industry changes (Release 2)

[Placeholder] – To be provided in an updated version w/c 8 June 2015

Option 2 - Release 2 compatibility with other industry changes. Information currently being collated and validated with Industry experts

		2016					2017			
Aug	Sept	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Compatible with Nexus?
	be con									

3. Advantages and issues of the two go-live options

- Both options delay benefits beyond the timescales originally expected, with extended development effort and cost across all parties involved.
- Based on our discussions over the last month, there is a clear industry preference for **Option 1**.

	Key advantages	Key issues
Option 1 – single release Earliest go-live = 1 st June 2016	 A single release of functionality lowers planning and scheduling complexity A strong industry preference for a single release No direct conflict or dependency with other industry changes Most participants are building their solution to incorporate retro / unique sites from day 1 One cutover / transition plan is more efficient 	 Market trials period is complicated by the later delivery of unique sites / retro and will require careful change control and regression testing Go-live two months before Smart DCC planned go-live. Resources likely to be supporting both Go-live is dependent on successful delivery of retrospective amendments / unique sites at a late stage in market trials
Option 2 – split release R1 (core) earliest go-live = 1 st April 2016 R2 earliest go-live = TBC	 Earliest benefits realisation on the delivery of the 'core' De-risks and simplifies the Xoserve delivery of the core functionality 	 Does not meet the preference for a single release A gap of at least 6 months is likely to be needed to stabilise release 1. This could be longer if significant defects are encountered across the industry Potential risk that release 2 may never be delivered if focus is lost Regression testing prior to release 2 go-live Parties may need to 'unpick' or workaround functionality that has already been developed and is not used in release 1

3. Market Trials Duration – Risks and Contingencies

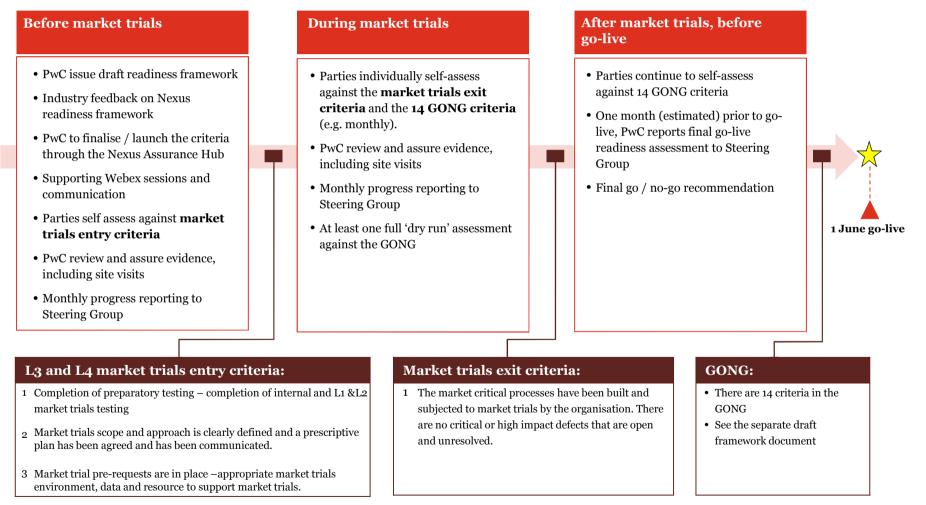
[Placeholder] - To be provided in an updated version w/c 8 June 2015

Risks to the completion of Market Trials in line with the proposed timelines for option 1 and option 2 and potential contingencies in place. Information currently being collated and validated with Xoserve.

4. Market trials governance

4. How we will assure the key milestones: market trials entry, exit and go-live

• We are issuing a draft go / no-go and market trials entry / exit criteria framework for feedback from market participants. This will play a key role in providing transparent data on the progress each organisation is making towards Nexus go-live.



Appendices

A1. Constructive feedback received on market trials approach

- Market participants have raised a range of questions suggesting the current 'facilitative' approach to market trials is not universally and consistently understood. In some cases, there is a fundamental difference of opinion on whether this approach is sufficient.
- In addition, further questions have emerged as a result of the 1st October 2016 go-live deferral and the later delivery of unique sites and retrospective amendments.
- Based on our experience, these are valid questions and have a bearing on the duration and effectiveness of market trials. Xoserve are generally aware of these points below and believe the majority will be addressed in a revised market trials approach.

Area	Market questions	Impact – why is this important ?		
1. Data file format testing	• Several participants highlighted that a 'gold standard' set of data files would be useful to test against (we concur wit h this view)	• Participants are able to validate their data file design with a higher level of confidence.		
	• Can market trials (Level 2) be more rigorous and prescriptive?			
2. Level 3 and Level 4 market trials – core functionality	• Can more prescriptive guidance be given on test scenarios and guidance?	• Participants require absolute clarity on these aspects in order to determine if the proposed		
	• Is there sufficient provision for testing of end-to-end processes, with re-work for defects?	period of market trials is sufficient.		
	• Has the impact of downtime over the Christmas period been factored into the plan?			
3. Defect management	• What provision is made for re-work following defect resolution?	• It is important that sufficient time is factored in for re-work and defect resolution prior to go-live.		
	• How much contingency is in the plan?			
	• Can a secondary support SLA be provided?			
4. Unique sites and retrospective amendments	• What scenarios and process areas are expected to be validated in market trials?	• Participants require absolute clarity on these aspects in order to determine if the proposed		
	• What will the primary and secondary support model periods / SLAs be during this period?	period of market trials is sufficient.		
	• What is the approach to ensuring that appropriate regression testing is built in?			
Project Nexus		June 2015		

A2. Market trials start date – analysis of shipper, GT and iGT plans

Our analysis of the scheduled completion dates for shipper, iGT and GT internal testing suggests that Level 3 and Level 4 market trials cannot start before the **5th October 2015**. This assumes that organisations keep to their current project plans.

