

All-Island System Services Supplier Charge

Recommendations Paper

April 2025

Executive Summary

In their High Level Design Decision¹, the SEM Committee decided that the System Services Future Arrangements (SSFA) should be funded through a supplier-based MWh charge. The SEM Committee's Decision on System Services Future Arrangements Phase III: Detailed Design & Implementation (SEM-23-103²) then required the TSOs to consult on and submit a Recommendations Paper to the SEM Committee (SEMC) on the new All-Island System Services Supplier Charge (the "FASS Charge").

The TSOs published the All-Island System Services Supplier Charge Consultation Paper³ on 31 July 2024. A virtual industry workshop was held on 5 September 2024 to support the consultation process, and the consultation period closed on 18 September 2024. Fifteen responses to the Consultation Paper were received, all of which were non-confidential, and are published along with this Recommendations Paper.

This paper sets out the TSOs' recommendations to the SEMC regarding the implementation of the FASS Charge, reflecting the feedback received on the Consultation Paper through stakeholders' written responses and input to the industry workshop. This paper also summarises that feedback and provides the TSOs' commentary in response.

The key recommendations contained in this paper are as follows:

- The forecast cost of System Services for the purpose of setting the FASS Charge will relate to:
 - the DASSA, net of Compensation Payments, and including any real-time security payments (subject to design, consultation and SEMC decision);
 - any contracts awarded under the Layered Procurement Framework (LPF) and the Fixed Contracts Framework; and
 - other All-Island System Services, which may not be procured or remunerated through the DASSA, the Layered Procurement Framework or the Fixed Contract Framework⁴.
- The forecast cost will be included in a report submitted by the TSOs to the RAs for approval each year, along with the other values relevant to the setting of the FASS Charge Rate.
- The timeline for setting of the FASS Charge Rate will align with the existing tariff setting timelines.
- Any final settlement of DS3-related charges that is required post go-live of the FASS arrangements will go through the existing charges, and not the FASS Charge.
- The k-factor will comprise the actual k-factor for the Y-2 year, and an estimated Y-1 k-factor.
- The All-Island Demand forecast will be used in setting the FASS Charge Rate.
- The FASS Charge Rate will be calculated as follows for year, y :
$$\text{FASS Charge Rate}_y (\text{€/MWh}) = (\text{Forecast Cost}_y + \text{K-Factor}^5) / \text{Forecast Demand}_y$$
- The FASS Charge will be calculated on an Imbalance Settlement Period basis, with each TSO calculating the FASS Charge for each All-Island Supplier Unit, v , in their jurisdiction, in each Imbalance Settlement Period, γ , as follows:

$$\text{FASS Charge}_{v\gamma} = Q_{MLFv\gamma} \times \text{FASS Charge Rate}$$

¹ [System Services Future Arrangements High Level Design Decision Paper.pdf](#)

² [SEM-23-103 - SSFA Phase III - Phased Implementation Roadmap - Decision Paper.pdf \(semcommittee.com\)](#)

³ [FASS-Charge-Consultation-Paper-July-2024-EirGrid.pdf](#);

[All-Island System Services Supplier Charge Consultation Paper | SONI Consultation Portal](#)

⁴ It is noted for completeness that the costs of jurisdictional System Services (e.g. Black Start), will continue to be recovered through the respective jurisdictional mechanisms and will not form part of the FASS Charge.

⁵ Where the k-factor will comprise the actual k-factor for the Y-2 year, and an estimated Y-1 k-factor.

- The total FASS Charge for the given Charging Period will be:

$$FASS\ Charge_{vCP} = \sum_{\gamma=1}^{CP} FASS\ Charge_{v\gamma}$$

- The settlement timeframes for payments to service providers under FASS should be set such that monies will be collected in from Suppliers through the FASS Charge before these payments out are due.
- The FASS Charge settlement timeframes will be the same as the existing TUoS settlement timeframes employed by each TSO.
- Provision should be made for Within Year Adjustment to the FASS Charge Rate in certain circumstances. The TSOs consider that clear criteria, in terms of rates of over- or under-recovery, for triggering a review of the need to adjust the FASS Charge Rate should be defined.
- Provision should be made within the settlement rules defined in the FASS Code to address the scenario where the aggregate amount that the TSOs are due to pay System Services providers in respect of a settlement period exceeds the available funds. Such funds being the aggregate of the available revenues recovered via the FASS Charge and the available funds under the TSOs' proposed working capital facilities. In this situation, only once the available funds are exhausted, the TSOs would reduce the payments owed pro-rata across System Services providers until the total payment can be met with the funds available. The TSOs' ability to access working capital facilities will be an outcome of their respective price control processes.
- The FASS Code will be used as the legal basis for the FASS Charge. The TSOs' existing TUoS settlement and credit cover processes will be used, and the FASS Code will refer out to the relevant existing TSO documentation. This approach is contingent on the necessary modifications to Supplier licences having been made to include an obligation to accede to the FASS Code.
- The TSOs observe that there remains considerable complexity and uncertainty associated with the concept of trading period based charging, and that a consultation and detailed design process would be required before such an approach could be implemented. The methodology set out in this paper ensures that the FASS Charge Rate can vary on an Imbalance Settlement Period (and therefore DASSA Trading Period) basis. Adding the functionality to *calculate* the FASS Charge Rate on a trading period basis will only become possible once the detailed design of a granular charge is developed, and as such only an annual charge will be delivered for FASS go-live.
- If the FASS Charge is not implemented in advance of go-live of the DASSA arrangements, then the existing mechanisms for recovery of DS3 costs will be used on a temporary basis.

The table below gives a high-level overview of the feedback received from industry to each of the questions posed in the Consultation Paper and of the areas where changes have been made by the TSOs in response to this feedback in arriving at the final recommendations, along with the TSOs' high-level rationale for each recommendation.

The TSOs are submitting this Recommendations Paper to the SEMC for consideration. In accordance with the regulatory approved Phased Implementation Roadmap, the target date for the SEMC decision is by January 2025. Following the SEMC's final decision, the TSOs will proceed to develop the systems and processes required to implement the FASS Charge, taking into account the interdependencies with other workstreams within the FASS Programme, and work with industry to ensure participant readiness.

Question		Industry Feedback	Change to TSOs' Proposal	TSOs' Recommendation	Rationale for Recommendation
1	Do you have any comments on the proposed approach to establishing the forecast System Services cost?	Mixed	No Change, but additional clarity provided.	<p>The forecast cost will relate to:</p> <ul style="list-style-type: none"> • The DASSA, net of Compensation Payments, and including any real-time security payments (subject to design, consultation and SEMC decision) • Any LPF or Fixed Contracts • Other all-island SS not procured through the DASSA, LPF or Fixed Contracts <p>The forecast cost will be submitted to the RAs for approval at least 3 months before the start of the Tariff Year.</p> <p>Final approved values to be published by the TSOs within 5 days of the RAs' decision, or of approval of the TSO's respective statements of charges, whichever is the later.</p> <p>Final settlement of DS3 related charges post go-live of the FASS will go through the existing mechanisms.</p>	In line with SEMC decision that the charge will fund all services procured on an all-island basis.
2	Do you have any comments on the proposed approach to establishing the k-factor?	Supportive	No Change.	<p>The k-factor will be included in the FASS Charge submission made to the RAs.</p> <p>Where the legal basis is the FASS Code, the k-factor will comprise the actual k-factor for the Y-2 year and an estimated Y-1 k-factor.</p> <p>[Note that if the TUoS frameworks were to be the legal basis, then the Y-1 k-factor would require amendments to SONI's TSO licence.]</p>	<p>Use of K-factor is standard and in line with SEMC decision.</p> <p>Estimated Y-1 k-factor will help manage expected volatility and has a precedent within Imperfections.</p>
3	Do you have any comments on the proposed approach [to the	Supportive	No Change.	The All-Island Demand forecast be used in setting the FASS Charge Rate.	Alignment with SEMC decision and with other market charges.

	All-Island Demand Forecast]?				
4	Do you agree that the proposed methodology reflects the SEMC decision?	Supportive	No Change.	<p>The FASS Charge Rate will be calculated as follows for year, y:</p> $\text{FASS Charge Rate}_y (\text{€}/\text{MWh}) = (\text{Forecast Cost}_y + \text{K-Factor}^6) / \text{Forecast Demand}_y$ <p>The FASS Charge Rate will be included in the FASS Charge submission.</p> <p>SONI will convert the FASS Charge to GBP using the average exchange rate over the last five business days in July, in keeping with existing processes.</p>	<p>Alignment with SEMC Decision.</p> <p>Alignment with existing processes.</p>
5	Do you have any comments on the proposed approach to calculating the FASS Charge [Including Storage impact]?	Supportive	No Change.	<p>The FASS Charge will be calculated on an Imbalance Settlement Period (ISP) basis, with each TSO calculating the FASS Charge for each All-Island Supplier Unit, v, in their jurisdiction, in each Imbalance Settlement Period, γ, as follows:</p> $\text{FASS Charge}_{v\gamma} = \text{QMLF}_{v\gamma} \times \text{FASS Charge Rate}$	<p>QMLF is the all-island demand data available.</p> <p>Calculating the charge on an ISP basis helps to provide for increased granularity of charging in the future.</p>
6	Do you have any comments on the proposed approach to levying the FASS Charge?	Mixed	No Change, but additional clarity provided.	<p>The total FASS Charge for the given Charging Period will be:</p> $\text{FASS Charge}_{vCP} = \sum_{\gamma=1}^{CP} \text{FASS Charge}_{v\gamma}$ <p>The settlement timeframes for payments to providers under FASS should be set such that monies will be collected in from Suppliers through the FASS Charge before these payments out are due.</p> <p>The FASS Charge settlement timeframes are to be the same as the existing TUoS settlement timeframes employed by each TSO.</p>	<p>Minimising cashflow imbalance.</p> <p>Alignment with existing processes.</p>

⁶ Where the k-factor will comprise the actual k-factor for the Y-2 year, and an estimated Y-1 k-factor.

7	Have we correctly identified the building blocks of the methodology?	Mixed	No Change, but additional clarity provided.	That provision be made for Within Year Adjustment to the FASS Charge Rate. The TSOs consider that clear criteria, in terms of rates of over- or under-recovery, for triggering a review of the need to adjust the FASS Charge Rate should be defined.	Alignment with SEMC publications and with approach for Imperfections.
8	Do you agree with the TSOs' proposed methodology for implementing the FASS Charge [including Cashflow Risk]?	Not Supportive		Provision should be made in the FASS Code to address the scenario where the aggregate amount that the TSOs are due to pay System Services providers in respect of a settlement period exceeds the available funds. Such funds being the aggregate of the available revenues recovered via the FASS Charge and the available funds under the TSOs' proposed working capital facilities. In this situation, only once the available funds are exhausted, the TSOs will reduce the payments owed pro-rata across System Services providers until the total payment can be met with the funds available. For clarity, the provision in the FASS Code will ensure that the amount for each individual provider that is short paid would be tracked, and providers reimbursed when the funds were recovered and after any working capital facility payments were made.	Essential for financing purposes to define the procedure that would apply as a backstop. Consistency with TSC provision.
9	Do you have any comments on the TSOs' assessment of the two routes for providing a legal basis for the FASS Charge?	Not Supportive	Significant Change.	The FASS Code (rather than the TUoS framework) will be used as the legal basis for the FASS Charge, contingent on the required Supplier licence amendments. The TSOs' existing TUoS settlement and credit cover processes will be used, and the FASS Code will refer out to the relevant TSO documentation in which these processes are described.	Recognition of the strong industry support for this approach, given the advantages of transparency, flexibility and in particular, interactive governance.
10	Are there other considerations not identified here that are relevant to the use of either the FASS	Not Supportive		The TSOs would like to highlight that the use of the FASS Code is contingent on the necessary amendments being made to Supplier licences to reflect the obligation to accede to the code.	

	Code or the TUoS framework as the legal basis for the FASS Charge?				
11	Do you require any information on the system design from the TSOs at this stage?	Mixed	No Change.	<p>The methodology set out in this paper enables the FASS Charge Rate to vary on an Imbalance Settlement Period (and therefore Trading Period) basis.</p> <p>The TSOs observe that there remains considerable complexity and uncertainty associated with the concept of Trading Period based charging, and that a consultation/detailed design process would be required before such an approach could be implemented.</p>	Most of the feedback related to the principles of Trading Period based charging, which were not the subject of this consultation.
12	Q12. Do you have any concerns around the impact of the TSOs' assessment of the required IT system design on your system readiness [Including granularity of charging]?	Mixed		<p>Adding the functionality to <i>calculate</i> the FASS Charge Rate on a Trading Period basis will only become possible once the detailed design of any granular charge is developed (and as such, only an annual charge will be delivered for FASS go-live), but the basic building blocks that can be identified at this stage (e.g. access to trading period demand data) will be reflected in the system design.</p>	
13	Do you have any comments on the TSOs' proposed contingency arrangements?	Supportive	No Change, but additional clarity provided.	That if the FASS Charge is not implemented in advance of go-live of the DASSA arrangements, then the existing mechanisms for recovery of DS3 costs will be used on a temporary basis.	Alignment with SEMC decision. Efficiency.

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Glossary

Term or Abbreviation	Meaning
DASSA	Day Ahead System Services Auction
DS3	Delivering a Secure, Sustainable Electricity System
FAM	Final Assignment Mechanism
FASS	Future Arrangements for System Services
FASS Charge	Future Arrangements for System Services Charge
HLD	High Level Design
ISP	Imbalance Settlement Period
LCIS	Low Carbon Inertia Services
LPF	Layered Procurement Framework
PIR	Phased Implementation Roadmap
RAs	Regulatory Authorities
RO	Reliability Option
SEM	Single Electricity Market
SEMC	Single Electricity Market Committee
SNSP	System Non-Synchronous Penetration
SSFA	System Services Future Arrangements
SSS Tariff	System Support Services Tariff [Northern Ireland] Also referred to as the SSS Charge
TSC	Trading and Settlement Code
TSO	Transmission System Operator
TUoS Charges	Transmission Use of System Charges
UR	Utility Regulator

Relevant SEMC Decisions

SEM-20-044	System Services Future Arrangements Scoping Paper
SEM-21-021	System Services Future Arrangements Decision Paper 1
SEM-22-012	System Services Future Arrangements High-Level Design Decision
SEM-23-103	System Service Future Arrangement Phase III: Detailed Design & Implementation - Decision Paper
SEM-24-066	Future Arrangements for System Services DASSA Market Design Decision Paper

Document History

Version	Date	Description of Changes
1.0	29 November 2024	TSOs' final recommendations paper as submitted to the Regulatory Authorities.
1.1	11 April 2025	Updates to include information and assessment related to two additional responses.

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1 Introduction

1.1 Background

EirGrid and SONI are the Transmission System Operators (TSOs) in Ireland and Northern Ireland. It is our job to manage the electricity supply and the flow of power from generators to consumers. Electricity is generated from gas, coal and renewable sources (such as wind, solar and hydro power) at sites across the island. The high voltage transmission network then transports electricity to high demand centres, such as cities, towns and industrial sites.

EirGrid and SONI have a responsibility to facilitate connections to the power system, including increased levels of renewable sources to generate on the power system, while continuing to ensure that the system operates securely and efficiently. The respective TSO licences include a requirement for the relevant TSO to contract for the provision of System Services.

The DS3 System Services arrangements were designed to facilitate new and existing technologies and participants to provide the System Services⁷ required to maintain a resilient power system up to 75% System Non-Synchronous Penetration (SNSP). As part of our Shaping Our Electricity Future Roadmap, the procurement of new system service capabilities from low carbon sources has been identified as an essential action to address the technical and operational challenges arising from the need to operate with SNSP levels up to 95% by 2030, which underpins achieving the renewable targets in Ireland and Northern Ireland.

1.2 System Services Future Arrangements

The SSFA (or FASS) Programme was officially launched by the SEMC in July 2020 with the publication of a Scoping Paper (SEM-20-044)⁸ for consultation.

As set out in the SEMC's SSFA Decision Paper 1 (SEM-21-021)⁹, the objective of the programme is:

“to deliver a competitive framework for the procurement of system services, that ensures secure operation of the electricity system with higher levels of non-synchronous generation.”

In April 2022, the SEMC published the SSFA High-Level Design (HLD) Decision (SEM-22-012)¹⁰. The HLD set out a framework for the competitive procurement of System Services, consisting of the following:

1. **Daily Auction Framework** for the procurement of some of the System Services through a daily spot market.
2. **Layered Procurement Framework (LPF)** comprising contracts with a term of more than a day and up to 12 months.
3. The existing **Fixed Contract Framework** to continue to be used to remove barriers to entry for new technologies with the use of more long-term contracts and ensure sufficient volumes of System Services, as required.

In December 2023, the SEMC published its SSFA Phase III: Detailed Design & Implementation Decision paper (SEM-23-103)², in which it decided that the commercial arrangements as described in the HLD should be progressed by the TSOs.

⁷ System Services are products, other than energy and capacity, that are required for the continuous, secure operation of the power system.

⁸ [SEM-20-044 System services future arrangements scoping paper.pdf \(semcommittee.com\)](#)

⁹ [SEM-21-021 System Services Future Arrangements - Decision Paper 1.pdf \(semcommittee.com\)](#)

¹⁰ [System Services Future Arrangements High Level Design Decision Paper.pdf](#)

1.3 Future Arrangements for System Services (FASS) Charge

In the SEMC SSFA HLD Decision (SEM-22-012), it was decided that System Services providers will receive payments from the TSOs, with the TSOs recovering the associated costs through a new standalone All-Island charge imposed on Suppliers (who may in turn recover this from their customers).

The SEMC decided that this new charge will:

- Initially be set on an **annual basis**, with the annual cost to be forecast by the TSOs and subject to regulatory approval.
- Be recovered from Suppliers through a **per MWh tariff**, set by reference to an annual All-Island electricity demand forecast, projected by the TSOs.
- Incorporate a **k-factor mechanism** to account for any deviation between the estimated and actual costs, with the k-factor to be calculated by the TSOs and subject to regulatory approval.

While the charge is to be set on an annual basis in the first instance, the SEMC has expressed the desire to potentially move to a more granular (down to a Trading Period basis) charge in the future, as market behaviours become better understood and the relationship between energy costs and System Services costs becomes clearer. This potential move to more granular charges should be taken into account in the systemisation to be undertaken by the TSOs. This means that while the charge will initially be based on annual TSO forecasts of cost and demand, this approach may be revisited in the future should the SEMC seek to review and implement a more granular charge.

The SEMC's Decision on SSFA Phase III: Detailed Design & Implementation (SEM-23-103) requires the TSOs to consult on and submit a recommendation paper to the SEMC on the new All Island System Services Supplier Charge (the "**FASS Charge**").

The TSOs published the All-Island System Services Supplier Charge Consultation Paper in July 2024, upon which this Recommendations Paper is based.

1.4 Phased Implementation Roadmap

In SEM-23-103, the SEMC specified that the FASS Programme should progress by reference to workstreams set out in a Phased Implementation Roadmap (**PIR**). The latest version of this PIR was published by the TSOs in September 2024¹¹, and Level 1 of the Roadmap is reproduced in Figure 1, showing the workstreams and projected timelines for this project.

The development and implementation of the FASS Charge sits within the Regulation and Licensing workstream.

¹¹ [FASS-TSOs-PIR-September-2024-EirGrid.pdf](#)

Phased Implementation Roadmap - Level 1 V2.0

Legend		
TSOs Led Activity	SEMC Decision	DS3 Activity
RAs Led Activity	RA TSOs Activity	New Activity

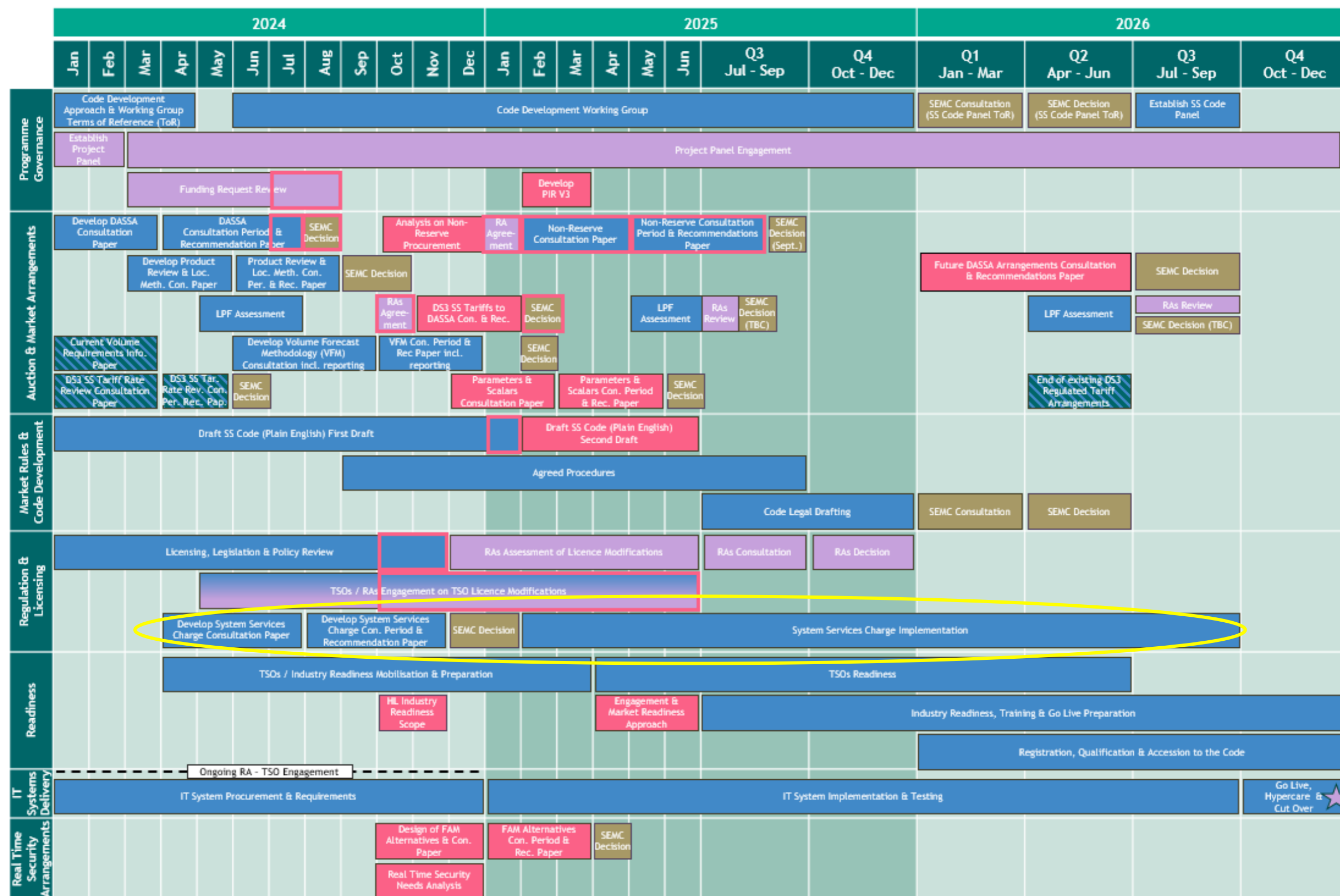


Figure 1: Phased Implementation Roadmap - Level 1

1.5 Purpose of this Paper

This paper sets out the TSOs' recommendations to the SEMC regarding the implementation of the FASS Charge, reflecting the feedback received on the Consultation Paper through stakeholders' written responses and input to the industry workshop. This paper also summarises that feedback and provides the TSOs' commentary in response.

1.6 Structure of Paper

Following this Section 1: Introduction, the paper is split into the following sections, which correspond to the topics set out in the Consultation Paper:

2. Consultation Overview
3. Forecast System Services Cost
4. K-Factor Mechanism
5. Forecast All-Island Demand
6. FASS Charge Rate
7. Calculation of the Charge
8. Settlement of the Charge
9. Summary of Proposed Methodology
10. Legal Basis of Levying the FASS Charge
11. Providing for Increased Granularity
12. Contingency Arrangements
13. General Comments

Each section contains an overview of the TSOs' original proposals and consultation questions posed, as relevant to that section, a summary of feedback from respondents, the TSOs' commentary in response to that feedback, and the TSOs' final recommendations to the SEMC reflecting the feedback received.

1.7 Next Steps

The TSOs will submit this Recommendations Paper to the SEMC for consideration. In accordance with the regulatory approved PIR, the target date for the SEMC decision is January 2025.

Following the SEMC's final decision, the TSOs will proceed to develop the systems and processes required to implement the FASS Charge, taking into account the interdependencies with other workstreams within the FASS Programme, and work with industry to ensure participant readiness.

2 Consultation Overview

2.1 Responses to the Consultation

The All-Island System Services Supplier Charge Consultation Paper³ was published on 31 July 2024 and closed on 18 September 2024. A virtual industry workshop was held on 5 September 2024 to support the consultation process, and the slides¹² were subsequently published, along with the workshop Q&A¹³.

Fifteen responses to the Consultation Paper were received, all of which were non-confidential, and are published alongside this Recommendations Paper. The respondents were:

- Aughinish Alumina
- Bord Gáis Energy
- Bord na Móna
- Electric Ireland
- Electricity Association of Ireland (EAI)
- Energia
- EP UK Investments
- ESB Generation
- Flexible Power Solutions Ltd
- Moyle Interconnector Ltd
- Pinergy
- Power NI
- PrePayPower
- RedoxBlox
- RWE Renewables
- SSE
- Wind Energy Ireland (WEI), Energy Storage Ireland (ESI) & RenewableNI (RNI)

2.2 Key Messages from Respondents

The Consultation Paper set out the TSOs' proposals for the implementation of the FASS Charge methodology and invited feedback from interested stakeholders on the 13 questions posed.

Respondents were generally supportive of many elements of the TSOs' consultation proposals, as related to the alignment of the methodology with the SEMC High Level Design decision, the use of the All-Island Demand forecast, the approach to establishing the k-factor, the implications of the methodology for storage units in Ireland, and the proposed contingency arrangements in the case that the FASS Charge is not implemented in advance of DASSA go-live.

However, respondents generally expressed a strong preference for the use of the FASS Code to provide the legal basis for the FASS Charge, as opposed to the TUoS frameworks as proposed in the Consultation Paper.

¹²https://cms.eirgrid.ie/sites/default/files/2024-09/FASS_Programme_SS_Charge_Consultation_Workshop_EirGrid.pdf
https://www.soni.ltd.uk/media/FASS-Programme-SS-Charge-Consultation_Workshop_SONI.pdf

¹³https://view.officeapps.live.com/op/view.aspx?src=https%3A%2F%2Fcms.eirgrid.ie%2Fsites%2Fdefault%2Ffiles%2Fpublications%2FFA%2FSS_Charge_Workshop_Q%2526A_EirGrid.docx&wdOrigin=BROWSELINK
<https://www.soni.ltd.uk/media/documents/2024-September-SOEF-Markets-SS-Charge-Consultation-Workshop-QA-.pdf>

Respondents were also generally very concerned about the proposed provision for pro-rata reduced payments to System Services providers in circumstances where the aggregate amount that the TSOs are due to pay System Services providers in respect of a settlement period exceeds the available funds. Such funds being the aggregate of the available revenues recovered via the FASS Charge and the available funds under the TSOs proposed working capital facilities.

Many respondents emphasized the need for clarity and transparency in relation to the timelines and processes involved in forecasting and setting the FASS Charge.

Finally, many respondents also commented extensively on the potential move to more granular charging in the future, which SEMC has stated it may make.

This feedback is set out in more detail in the sections that follow.

3 Forecast System Services Cost

3.1 Summary of Consultation Proposal

TSOs' Consultation Proposal

- Final settlement of DS3-related charges post go-live of the SSFA arrangements will go through the existing TUoS mechanism and not the FASS Charge.
- TSOs shall submit a report to the RAs 3 months before the start of each Tariff Year, proposing values to be used in the calculation of the FASS Charge for that Tariff Year.

The TSOs also stated that the forecast costs would be those linked to:

- a) the DASSA (including the FAM¹⁴ and net of any Compensation Payments);
- b) any contracts awarded under the Layered Procurement Framework and the Fixed Contracts Framework; and
- c) other All-Island System Services, which may in the first instance not be procured or remunerated through the DASSA, the Layered Procurement Framework or the Fixed Contract Framework.

The TSOs may use different approaches for defining the unit price/cost of different System Services, including (but not limited to) forward-looking modelling, historical data and/or a cost-based approach.

Question 1. Do you have any comments on the proposed approach to establishing the forecast System Services cost?

3.2 Summary of Consultation Responses

9 out of 17 respondents gave a view on the proposed approach to establishing the Forecast System Services Cost.

Some of these respondents asked for a clear timeline for publication of the approved FASS Charge. Many emphasised the need for early visibility of the FASS Charge to enable suppliers to adapt their customer offerings in good time, with some calling for publication of the TSOs' recommendations to the RAs at the time of their submission. One respondent observed that charges tend to only be published in late August, giving suppliers very little time to incorporate them into their strategies before the start of the tariff year

¹⁴ The FAM was included in the DASSA Design Recommendations paper submitted by the TSOs to the RAs. The SEMC Decision did not approve the FAM and stated that the TSOs could propose alternative designs if they considered such a mechanism was needed. For this reason, this Recommendations paper refers elsewhere to "real-time security payments" although the Consultation paper referred to the FAM.

on 1st October. They were concerned that the FASS Charge could be published without sufficient time for review and implementation in advance of the tariff year. Other respondents noted that there is an obligation on suppliers to communicate price changes to customers with a lead in notification period of at least 30 days. Two respondents considered that the publication of industry charges should provide suppliers with a minimum of two months' notice in advance of a tariff increase, while another pointed out that the publication of charges close to the start of the tariff year makes cost recovery and retail tariff setting challenging and thereby puts retail market competition at risk.

Many who responded to this question also stressed the need for industry consultation to take place as part of the process for setting the FASS Charge each year, with sufficient time allowed for this. They requested clarification that this would be the case, and one respondent also asked for confirmation that the FASS Charge submission would be subject to approval by the RAs.

One respondent asked that the TSOs share more on their approach to calculating the forecast system services cost, especially for the period covering the early days of FASS implementation. They also considered that the TSOs should be required to publish an annual look back report on the functioning of the charge, including quantification of consumer benefits and competition impact. Another was of the view that the TSOs and RAs should provide a multiyear forecast of system service costs to guide the industry.

One respondent considered that it is acceptable for final settlement of DS3 related charges to go through the existing TUoS mechanism, assuming that these charges persist for a relatively short period of time.

Another agreed that, at least initially, the TSOs should submit their estimated System Services costs to the RAs at least 3 months before the start of each tariff year.

3.3 TSOs' Commentary

The TSOs acknowledge respondents' comments regarding the need for early visibility and a clear timeline for publication of the FASS Charge. The intention is for the timeline for setting of the FASS Charge to align with the existing timelines for setting charges that use the All-Island demand forecast, such that the TSOs will submit a report to the RAs at least 3 months before the start of each Tariff Year containing the values to be used in the calculation of the FASS Charge for that year. The RAs will then assess and approve the submission, with the final approved values to be published by the TSOs within 5 days of the RAs' decision in each jurisdiction. The RAs may determine that a public consultation, including publication of the TSOs' submission, is appropriate as part of their assessment.

Regarding the approach to forecasting of System Services costs for the purpose of setting the FASS Charge, as stated in the Consultation Paper, the forecast System Services cost will be based on:

- projections of payments for the required volumes of System Services procured through the DASSA;
- actual costs for System Services volumes procured under long-term contracts (Layered Procurement Framework, Fixed Contracts Framework or other long-term contracts), where such costs are known (otherwise these will be in whole or in part forecasted); and
- projections of the payments for the expected volumes delivered for System Services that may be procured through a tariff-based process (if any).

The approach to forecasting required volumes will be in line with the Volume Forecast Methodology currently under development¹⁵. A range of approaches may be used to forecast the price of different System Services, including (but not limited to) forward-looking modelling, extrapolation from historical data, and/or a cost-based approach. This approach may need to evolve over time e.g. as more historical data becomes available, it will have a greater influence on the cost forecast.

¹⁵ [FASS-DASSA-Volumes-Consultation-Paper-September-2024-EirGrid.pdf](#)

Although further detail on the forecasting methodology, including price forecasts, will be made available to the RAs as part of the annual approval process, the TSOs are conscious that it would not be appropriate for pricing assumptions to be published given that these relate to competitive procurement processes. Finally, the TSOs consider that an annual look back report, including quantification of consumer benefits and competition impact, is a matter for consideration by the SEMC.

3.4 TSOs' Recommendation

The TSOs recommend that the forecast cost of System Services for the purpose of setting the FASS Charge will relate to:

- the DASSA, net of Compensation Payments, and including any real-time security payments (subject to design, consultation and SEMC decision);
- any contracts awarded under the Layered Procurement Framework and the Fixed Contracts Framework; and
- other All-Island System Services, which may not be procured or remunerated through the DASSA, the Layered Procurement Framework or the Fixed Contract Framework.

This forecast cost will be included in a report (the FASS Charge Submission) submitted by the TSOs to the RAs for approval each year, along with the other values relevant to the setting of the FASS Charge Rate and referred to later in this paper. The timeline for setting of the FASS Charge Rate will align with the existing tariff setting timelines, such that the TSOs will submit this report to the RAs at least 3 months before the start of each Tariff Year, with the final approved values to be published by the TSOs within 5 days of the RAs' decision in each jurisdiction.

Any final settlement of DS3-related charges that is required post go-live of the SSFA arrangements due to the resettlement or reconciliation of monies received prior to go-live will go through the existing System Services Charge in Ireland and SSS Tariff in Northern Ireland, and not the FASS Charge.

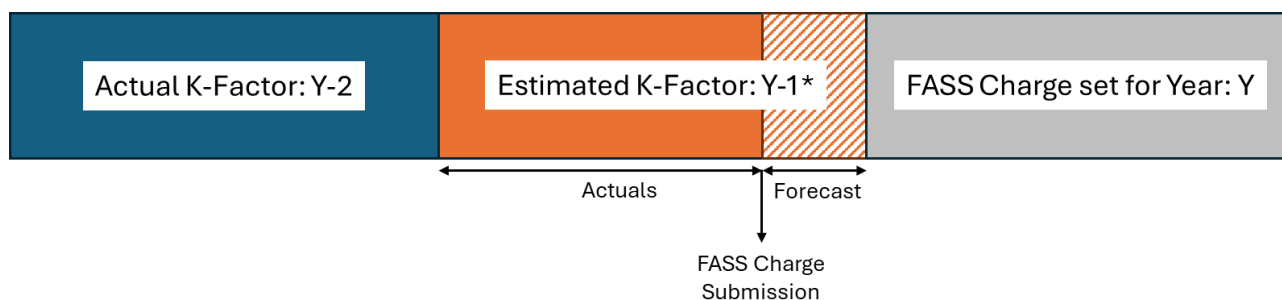
4 K-Factor Mechanism

4.1 Summary of Consultation Proposal

TSOs' Consultation Proposal

- The k-factor will be included in the FASS Charge Submission. The k-factor will comprise the Actual Y-2 k-factor, and, if provided for within the regulatory arrangements, and with approval of the RAs, an Estimated Y-1 k-factor.

Question 2. Do you have any comments on the proposed approach to establishing the k-factor?



* Estimated k-Factor: Y-1 will only be applicable if provided for within the regulatory arrangements and approved by the RAs.

Figure 2: Illustration of proposed k-factor mechanism for FASS Charge

The TSOs also noted that the inclusion of the Estimated Y-1 k-factor in a TSO levied charge may require modification of the Annex to the SONI TSO licence and that this would require a specific consultation by the UR under Article 14 of the Electricity Order 1992.

4.2 Summary of Consultation Responses

5 out of 17 respondents gave their views on the proposed K-Factor Mechanism.

These responses expressed general support for the inclusion of a k-factor in the setting of the FASS Charge, with a number of respondents also explicitly in favour of the incorporation of an estimated Y-1 k-factor to mitigate volatility.

In the expectation that there may be significant volatility in outturn System Services costs, plus the challenge to the TSOs in making accurate year-ahead cost forecasts, two respondents proposed that the k-factor mechanism be amended to facilitate smoothing. One respondent suggesting that this smoothing should occur over a 3-5 year timeframe.

One respondent observed that the outcome of the DASSA auctions will not necessarily flow through to System Services dispatch decisions and that this decoupled approach will make it more challenging to anticipate the full cost to customers. They considered that this issue will likely surface in the materiality of k-factor adjustments year-on-year. They were also of the view that the k-factor is likely to increase in line with the increasing need for system services to support renewable penetration and with the need for decarbonisation of system services.

4.3 TSOs' Commentary

The TSOs note the general support amongst those who responded to this question for the inclusion of the k-factor, along with the need to mitigate volatility to the extent possible, especially given the challenge in producing accurate cost forecasts. The objective of minimising volatility was also highlighted in the General Comments summarised in Section 13.

The TSOs consider that the k-factor is an essential component of the methodology as it provides the means of reconciling actual monies received with actual costs incurred. The TSOs also acknowledge the challenge associated with accurately forecasting the outcomes of a new market. The inclusion of an "Estimated Y-1 K-factor", which represents the most up to date information on actual money flows at the time that the FASS Charge parameters are submitted to the RAs, would help to mitigate the build-up of over- or under-recovery as it increases the frequency with which the rate of cost recovery is adjusted to reflect the actual rate of payments out to providers. It was stated in the Consultation Paper that the inclusion of an estimated Y-1 k-factor may require modification of the Annex to the SONI TSO licence, which would require specific consultation by the UR under Article 14 of the Electricity Order 1992. This was the case where the legal basis for the FASS Charge was proposed to be the TUoS framework. However, the TSOs' final recommendation is to use the FASS Code as the legal basis rather than the TUoS framework (see

Section 10), which would remove the need for a SONI TSO licence modification to facilitate the estimated Y-1 k-factor.

4.4 TSOs' Recommendation

The k-factor will be included in the FASS Charge submission made to the RAs. It will comprise the actual k-factor for the Y-2 year, and an estimated Y-1 k-factor. If the RAs accept the TSOs' recommendation that the FASS Code provide the legal basis for the FASS Charge, then there is no requirement for SONI TSO licence modifications to facilitate the estimated Y-1 k-factor.

5 Forecast All-Island Demand

5.1 Summary of Consultation Proposal

TSOs' Consultation Proposal

- The All-Island Demand forecast, as prepared by the TSOs, will be used in setting the FASS Charge.

Question 3. Do you have any comments on the proposed approach?

5.2 Summary of Consultation Responses

5 out of 17 respondents set out their views on the proposed approach to the Forecast All-Island Demand.

There was broad support for the use of the All-Island Demand forecast in setting the FASS Charge, with two respondents noting the alignment of this approach with that employed in the case of the Imperfections Charge and other market charges. Most respondents emphasized the need for transparency and for early visibility of the demand forecast, along with the other FASS Charge parameters. One respondent suggested that an estimate of the forecast value should be given in the GCS in line with the various multiyear scenarios, so as to aid supplier forecasting. Another questioned why the demand forecast for a given tariff year is only available in the previous May, given that the TSOs produce forecasts ten or more years ahead of time.

5.3 TSOs' Commentary

The TSOs acknowledge the support, from those respondents who commented, for the use of the All-Island Demand forecast. The TSOs also recognise the alignment of this approach with that of other relevant market charges, and the efficiencies that that brings. As regards visibility of this forecast, it is currently included in the TSOs' submission on the Imperfections Charge, which is typically published by the RAs in early July. This same forecast will be used as the basis for the FASS Charge. The TSOs longer term forecasts for the purpose of the Generation Capacity Statement are not forecasts of all-island SEM demand, but of the Total Electricity Requirement, and as such cannot be used for the purpose of setting SEM charges. The TSOs also note that the closer a forecast is made to the period concerned, the more accurate it is likely to be, which helps in mitigating cash flow risk.

5.4 TSOs' Recommendation

The TSOs recommend that the All-Island Demand forecast be used in setting the FASS Charge Rate.

6 FASS Charge Rate

6.1 Summary of Consultation Proposal

TSOs' Consultation Proposal

- In line with SEM-22-012 the FASS Charge Rate will be calculated as:

$$\text{FASS Charge Rate}_y (\text{€/MWh}) = (\text{Forecast Cost}_y + \text{K-Factor}) / \text{Forecast Demand}_y$$

- The FASS Charge Rate will be included in the FASS Charge Submission.
- SONI will convert the FASS Charge to GBP using the average exchange rate over the last five business days in July (in keeping with existing processes).

Question 4. Do you agree that the proposed methodology reflects the SEMC decision?

6.2 Summary of Consultation Responses

4 out of 17 respondents commented on the proposal for determining the FASS Charge Rate and on whether it reflects the SEMC decision.

All those who responded to this question agreed that the proposal is in line with the relevant SEMC Decision. Two respondents pointed out however that there are broader considerations of relevance than compliance with the SEMC Decision alone.

One of these respondents was of the view that the methodology should also meet the detailed objectives and assessment criteria set out in the HLD paper (including transparency, simplicity and consumer value), as well as wider objectives relevant to the retail market, such as supporting retail competition and avoiding customer harm.

The other respondent considered that the methodology needs far more consideration, transparency and development in connection with other related factors and how the final approach considers the impact on those who will ultimately fund the service.

6.3 TSOs' Commentary

The TSOs note that all those who responded to this question agreed that the proposed methodology reflects the SEMC decision (SEM-22-012). The TSOs also acknowledge the commentary regarding broader considerations in relation to the methodology than compliance with the SEMC decision. These have been considered in Section 13 on General Comments.

6.4 TSOs' Recommendation

The TSOs recommend that the FASS Charge Rate be calculated as follows for year, y :

$$\text{FASS Charge Rate}_y (\text{€/MWh}) = (\text{Forecast Cost}_y + \text{K-Factor}^{16}) / \text{Forecast Demand}_y$$

The FASS Charge Rate will be included in the FASS Charge Submission. SONI will convert the FASS Charge Rate to GBP using the average exchange rate over the last five business days in July, in keeping with existing processes.

¹⁶ Where the k-factor will comprise the actual k-factor for the Y-2 year, and an estimated Y-1 k-factor.

7 Calculation of the Charge

7.1 Summary of Consultation Proposal

TSOs' Consultation Proposal

- Charge will be calculated on an Imbalance Settlement Period basis
- Each TSO will calculate the FASS Charge for each Supplier in each Imbalance Settlement Period as follows:

$$\text{FASS Charge}_{v\gamma} = \text{QMLF}_{v\gamma} \times \text{FASS Charge Rate}$$

- SONI will invoice suppliers in GBP and EirGrid will invoice in Euro

Where:

$\text{QMLF}_{v\gamma}$ is the Loss-Adjusted Metered Quantity for Supplier Unit, v , in Imbalance Settlement Period, γ , in the SEM.

Question 5. Do you have any comments on the proposed approach to calculating the FASS Charge?

It was clarified by the TSOs at the industry workshop that the use of the All-Island demand data from the SEM i.e. the QMLF, means that storage volumes are not included in the calculation of the FASS Charge. This is because load from storage is treated as negative generation in the SEM, rather than demand.

7.2 Summary of Consultation Responses

7 out of 17 respondents gave a view on the proposed approach to calculating the FASS Charge.

Of these, six respondents commented on the fact that storage will not be subject to the FASS Charge according to the proposed methodology. All of these respondents were supportive of this approach, with many noting it to be appropriate as it avoids double charging. One respondent also pointed out that this approach ensures a level playing field for storage assets when participating in the System Services market, and avoids a situation where batteries are potentially paying for the provision of System Services, whilst providing System Services. They were of the view that needing to pay for System Services would substantially dilute the business case for future storage investment, as well as increasing customer cost due to double charging.

Many emphasised the need for the TSOs and the SEMC to confirm the design intent and principle that storage will not be subject to the FASS Charge going forward, so as to ensure investor confidence in case the QMLF definition changes in the future. One pointed out that Supplier demand should remain the basis upon which the charge is levied irrespective of whether it is applied as a flat rate or tiered charge.

Two respondents erroneously supported the idea that the FASS Charge will not apply to wind assets, as well as not applying to storage.

One respondent noted their agreement with the proposal that the FASS Charge Rate initially be set at the same value for all Imbalance Settlement Periods (ISP), along with the idea of building the capacity to align with a shorter ISP if required in future to avoid the need for additional system change then.

Another raised concerns about the fact that the FASS Charge will apply to all procurement mechanisms for System Services, where two out of three of these mechanisms are yet to be developed, meaning that the true exposure for customers is not yet known. This respondent also questioned the feasibility of setting a flat annual rate for the FASS Charge on an All-Island basis given the differing approaches to the calculation of System Services tariffs across the jurisdictions currently. They also stressed the need to consider the proportionality of charging on an All-Island basis for services that may not be uniformly required across the island.

7.3 TSOs' Commentary

The TSOs note the support from respondents for the principle of not recovering System Services costs from storage. The exclusion of storage load from the demand base used to calculate the FASS Charge Rate is an outworking of the use of the All-Island demand, which consists of the QMLF data from the SEM. In the SEM, storage load is treated as negative generation, rather than demand, and as such does not feature in the QMLF data.

This represents a change in approach from the status quo in Ireland, where the System Services Charge is applied to all demand, including from storage. In Northern Ireland, the SSS Tariff used for recovery of System Services costs currently, does not apply to storage load, being similarly calculated based on the QMLF data from the SEM.

While the application, or non-application, of the FASS Charge to specific categories of demand is principally a regulatory decision, the TSOs acknowledge the harmonisation of the approach to System Services cost recovery from storage that results from the use of the All-Island demand data.

Whilst a number of respondents supported the idea that the FASS Charge will not apply to wind assets, the TSOs would like to point out that this was not stated to be the case in the Consultation Paper, or at the industry workshop, and to clarify that demand from wind assets is included in the QMLF data from the SEM, and as such, will be subject to the FASS Charge.

With regard to the feasibility of setting a flat annual rate for the FASS Charge on an All-Island basis given the differing approaches to the calculation of System Services tariffs across the jurisdictions currently, the TSOs would like to clarify that the FASS Charge will be used for the recovery of costs associated with All-Island System Services, procured under FASS, through the common methodology set out in this paper, while the costs of jurisdictional System Services (e.g. Black Start), will continue to be recovered through the different jurisdictional mechanisms.

7.4 TSOs' Recommendation

The TSOs recommend that the FASS Charge be calculated on an Imbalance Settlement Period basis, with each TSO calculating the FASS Charge¹⁷ for each All-Island Supplier Unit, v , in their jurisdiction, in each Imbalance Settlement Period, γ , as follows:

$$\text{FASS Charge}_{v\gamma} = \text{QMLF}_{v\gamma} \times \text{FASS Charge Rate}$$

SONI will invoice suppliers in GBP and EirGrid will invoice in Euro.

The TSOs would like to highlight the impact of using the All-Island demand as the basis for the FASS Charge in terms of the implications for storage units. Using the Supplier demand data from the SEM (i.e. the QMLF) leads to the non-application of the FASS Charge to storage load. It is noted that this is a change to the status quo in Ireland for recovery of system services costs under DS3.

¹⁷ Where a Supplier's QMLF is negative, this QMLF is set to zero to prevent Suppliers being paid out the FASS Charge. This is consistent with the treatment of export-only Suppliers under the Trading & Settlement Code.

8 Settlement of the Charge

8.1 Summary of Consultation Proposal¹⁸

TSOs' Consultation Proposal

- The settlement window for the FASS Charge is assumed to be offset from the DASSA settlement window. This should be taken into account in setting the timelines for payments to providers under the DASSA.
- The total FASS Charge for the Charging Period will be:

$$FASS\ Charge_{vCP} = \sum_{\gamma=1}^{CP} FASS\ Charge_{v\gamma}$$

For each Supplier Unit, v , Imbalance Settlement Period, γ , and Charging Period, CP .

Question 6. Do you have any comments on the proposed approach to levying the FASS Charge?

8.2 Summary of Consultation Responses

3 out of 17 respondents commented on the proposed approach to levying the FASS Charge.

One respondent identified the need for Suppliers and Generators to know the specific timings of settlement to be able to assess whether the proposed approach will work and to identify any issues. They requested that the TSOs share a best view of settlement timelines at this point, notwithstanding the ongoing development in related areas such as the FASS Code.

Another was of the view that the approach is acceptable provided that the FASS Charge is a fixed, flat charge, notified in October in line with other tariffs, with a clear and transparent true-up via a k-factor in the following year. They considered that this was not clear from the paper or the industry workshop.

Another respondent pointed out that the Consultation Paper provided no information on how the TSOs will settle “penalties” and monies owed. They referred to the industry workshop, where they understood the concept of reducing payments to providers who have not made payments to the FASS Charge had been raised and while they considered this approach could provide useful incentives, it should have been included in the Consultation Paper itself.

8.3 TSOs' Commentary

As set out in greater detail in Section 10 on the Legal Basis, the TSOs recommend the use of the established TUoS settlement timelines for the FASS Charge. The settlement timeframes are contained in SONI's Supplier TUoS agreement¹⁹ and in EirGrid's General Conditions of Connection and Transmission Use of System²⁰. These timelines will be given effect through the FASS Code, if the SEM Committee accepts the TSOs' recommendation to implement the charge via that mechanism.

The date on which System Services providers receive payment from the TSOs should be after the later of the two dates on which Suppliers pay the FASS Charge to the two TSOs. This is to ensure that the monies to be paid out to providers for a given month are first collected in from Suppliers (albeit that there will likely be a mismatch between the two amounts) and thereby help mitigate cash flow risk. This applies not

¹⁸ Note that in the Consultation Paper, the equation below referred to the “Settlement Window” rather than the “Charging Period”. “Charging Period” is the correct term in this context and the equation has been amended in this Recommendations Paper as a result.

¹⁹ <https://cms.soni.ltd.uk/sites/default/files/media/Supplier-TUOS-Agreement-Template.pdf>

²⁰ [General Conditions of Connection and Transmission Use of System](#)

only to the timeframes for payment of providers in the DASSA, but also to providers contracted under the other FASS procurement routes.

The TSOs would like to clarify that this consideration regarding the relative timing of charges and payments refers to the collection of the FASS Charge from Suppliers relative to the payment of FASS payments to providers and does not relate to charges for non-delivery that may be applied to providers via the DASSA arrangements. The settlement process for Compensation Payments, due from DASSA providers who have not met the commitment obligation associated with a DASSA Order, is being dealt with via the DASSA Design Development. Any amounts received in Compensation Payments by the TSOs over the year will be netted off the total outturn FASS Cost in the calculation of the k-factor for that year and therefore fed into the FASS Charge two years later (notwithstanding the potential for an Estimated Y-1 k-factor to also be used as per Section 4).

8.4 TSOs' Recommendation

The TSOs recommend that the total FASS Charge for the given Charging Period will be:

$$FASS\ Charge_{vCP} = \sum_{\gamma=1}^{CP} FASS\ Charge_{v\gamma}$$

The settlement timeframes for payments to providers under FASS should be set such that monies will be collected in from Suppliers through the FASS Charge before these payments out are due. The FASS Charge settlement timeframes are to be the same as the existing TUoS settlement timeframes employed by each TSO.

9 Summary of Proposed Methodology

9.1 Summary of Consultation Proposal

Building Block	SEM Committee Decision	TSO Proposals
Forecast Cost	<ul style="list-style-type: none"> Annual forecast initially All-Island forecast To be forecast by the TSOs Cover all System Services Future Arrangements procurement costs To be approved by the RAs 	<ul style="list-style-type: none"> TSOs shall submit a report to the RAs 3 months before the start of each Tariff Year, proposing values to be used in the calculation of the FASS Charge for that Tariff Year (the 'FASS Charge Submission') for approval For clarity it is noted that Final settlement of DS3-related charges post go-live of the DASSA arrangements will be recovered through the existing TUoS/SSS mechanisms and not the FASS Charge.
K-Factor	<ul style="list-style-type: none"> K-factor mechanism to be used K-factor to be approved by SEMC 	<ul style="list-style-type: none"> The k-factor will be included in the FASS Charge Submission. The k-factor will comprise the Actual Y-2 k-Factor, and, if provided for within the regulatory arrangements, and with approval of the RAs, an Estimated Y-1 k-Factor.
Forecast All-Island Demand	<ul style="list-style-type: none"> Annual all-island energy demand To be forecast by the TSOs 	The TSOs will employ the All-Island Demand Forecast, as currently employed in the setting of the Imperfections and other market charges.
FASS Charge Rate	<ul style="list-style-type: none"> Charge will be charged to suppliers based on actual demand in each period 	<p>FASS Charge Rate_Y (€/MWh) = (Forecast Cost_Y + K-Factor) / Forecast Demand_Y</p> <ul style="list-style-type: none"> The Charge Rate will be included in the FASS Charge Submission SONI will convert the FASS Charge Rate to GBP using the average forward exchange rate over the last five business days in July
Calculation of the Charge	<ul style="list-style-type: none"> Charge will be charged to suppliers based on actual demand in each period 	<ul style="list-style-type: none"> Charge will be calculated on an Imbalance Settlement Period basis Each TSO will calculate the FASS Charge for each Supplier in each Imbalance Settlement Period as follows:

		<p>FASS Charge_{vy} = QMLF_{vy} X FASS Charge Rate</p> <ul style="list-style-type: none"> SONI will invoice suppliers in GBP and EirGrid will invoice in Euro
Settlement of the Charge	<ul style="list-style-type: none"> The Charge will be levied by the TSOs 	<ul style="list-style-type: none"> The settlement window for the FASS Charge is assumed to be offset from the DASSA settlement window The total FASS Charge for the settlement window will be: $FASS\ Charge_{vS} = \sum_1^S FASS\ Charge_{vy}$

Table 1: Building blocks of the FASS Charge methodology, with the SEM Committee's decisions and TSO proposals (as set out in the Consultation Paper) in respect of each one.

In addition to the building blocks of the methodology, the TSOs also set out in the Consultation Paper their proposed approach to management of the acknowledged cash flow risk associated with collection of the FASS Charge.

The TSOs noted that in addition to the working capital facilities that will be required, it will be necessary to define contingency arrangements to apply where such facilities are exhausted. These arrangements being that in the event that the aggregate amount the TSOs are due to pay System Services providers in respect of a settlement period exceeds the available funds (such funds being the aggregate of the available revenues recovered via the FASS Charge and the available funds under the TSOs' proposed working capital facilities) the TSOs would reduce the payments owed pro-rata across System Services providers until the total payment can be met with the funds available. The amount for each individual provider that is short paid will be tracked, and providers will be reimbursed when the funds are recovered (and after any working capital facility payments are made).

The TSOs also stated their view that, in addition to the proposed inclusion of the Estimated Y-1 k-Factor in the calculation of the total k-Factor, it would be prudent to include provision that a Within Year (Y) Adjustment could be made to the FASS Charge Rate where warranted, and subject to RA approval.

Finally, the TSOs noted that consideration may need to be given to setting the ex-ante FASS Charge Rate to reflect seasonality in the payments and/or revenue profiles, should it become evident that seasonal divergence in the payment and revenue flows over the year is driving cash flow challenges.

Question 7. Have we correctly identified the building blocks of the methodology?

Question 8. Do you agree with the TSOs' proposed methodology for implementing the FASS Charge?

9.2 Summary of Consultation Responses

Question 7

5 out of 17 respondents commented on Question 7 regarding the building blocks of the methodology as identified by the TSOs.

One of these believed that the building blocks had been correctly identified, while others were of the view that there are further considerations that should be reflected in the methodology, which are set out below.

- The timing of publication of the approved FASS Charge for a Tariff Year.

- More detail on the proposed timings for the settlement windows, beyond the proposal in the Consultation Paper that the FASS Charge settlement window will be ahead of the DASSA settlement window.
- The objectives of transparency and price stability for the retail market to ensure that the FASS Charge is designed in such a way that it does not interfere with the workings of a competitive retail market.
- Information on how the charges for non-compliance are recouped and held.
- The impact on suppliers from a charge that changes from a positive to a negative value e.g. in the case where a customer changes suppliers and a rebate is needed due to the change in the charge from a positive to negative value.
- The interaction of the FASS Charge with Imperfections and other system mechanisms.
- Final settlement of DS3 related charges post go live of the DASSA, given that DASSA is not anticipated to procure all of the current DS3 products, some of which will be delivered through either Fixed Contracts or the Layered Procurement Framework.
- Why the settlement of any DS3 arrangements post April 2026, which is 6 months in advance of the implementation of DASSA, is linked to the implementation of the DASSA.
- Potential implications for PPA type arrangements.

Question 8

10 out of 17 respondents gave their view on Question 8 regarding the TSOs' overall proposed methodology for implementing the FASS Charge. This included commentary in relation to the management of cash flow risk.

There was broad opposition to the proposal that the TSOs would reduce payments owed pro-rata across System Services providers in circumstances where a shortfall in monies collected were to persist, even after the available working capital facilities were exhausted. Many respondents were concerned by this, particularly given the heightened risk of a mismatch between monies collected and paid out in the early days of the DASSA. Respondents stressed the need for the TSOs to put in place alternative mechanisms for managing the cash flow risk. A number of respondents made the point that reducing payments to System Services providers in these circumstances would shift financial risk onto those providers and could undermine future investment and ultimately grid stability as a result.

One respondent noted that a similar provision exists in the Trading and Settlement Code but observed that the creation of such a provision in the case of the FASS Charge would constitute an amendment to the funding arrangements for System Services. This respondent also pointed out that there is no guarantee of the timeframe in which any shortage of funds paid to providers may be rectified.

A second respondent stated that if the proposed approach of pro-rata payment to System Service providers were to be progressed notwithstanding industry opposition, there would need to be more flexibility in assessing the FASS charge e.g. enabling the TSOs to review the charge rate where they were concerned about insufficient funds being available. The respondent noted that there is precedent for this within current Imperfection Charges processes.

A number of respondents were of the view that a longstop date, or maximum duration, should be provided for payments that have been suspended.

Another respondent explained that their concerns regarding reduction in payments to providers in certain circumstances were exacerbated by the statement during the industry workshop that any charges or "penalties" will be levied upon the system services provider prior to payments being made.

Many respondents proposed the establishment of a Socialisation Fund to support the FASS Charge, similar to that which exists within the CRM, with some querying why this option was not set out in the Consultation Paper. One respondent proposed that such a fund could include the incentive payments made

to the TSOs within the DASSA, while another suggested that monies recovered from “penalties” could be collected into it. A number of respondents also made reference to the reserve fund operated by the LCCC in GB as a precedent, with the amount held in the fund being calculated on a probabilistic basis. One respondent recommended including FASS shortfalls in the existing Imperfections pot, if not supported through a Socialisation Fund.

One respondent commented on the proposed Within Year adjustment and sought clarity regarding the notice period that would apply prior to such an adjustment to the charge rate being implemented. They also pointed out the importance of defining clear criteria for the utilisation of the Within Year adjustment. Another stated that they were strongly supportive of all potential cash flow risk management methods being implemented, including provision for Within Year adjustment. This respondent was of the view that the level of the TSOs’ working capacity facilities should be set sufficiently high as to account for the uncertainty in the required costs, particularly for the initial period of the future market arrangements.

Another respondent considered that the proposed methodology should incorporate an assessment of its impact on suppliers and customers, as well as the effect this methodology and the overall DASSA design will have on incentivising entry into the DASSA. This respondent also called for the involvement of the RAs to confirm that the methodology, design and approach are all appropriate and present a proportionate impact to customers to the benefit of current and future customers.

One respondent stated that they did not have particular issues with the proposed methodology for implementation, given that this is a standard approach.

9.3 TSOs’ Commentary

Question 7

Several of the further considerations that respondents noted should be considered in the methodology have been addressed elsewhere in this paper. Section 3 addresses the timing of publication of the approved FASS Charge and Section 8 provides more detail on the proposed settlement timing and covers Compensation Payments due from DASSA providers, while Section 13 deals with broader objectives of the methodology.

In regard to the impact on suppliers of a charge that changes from a positive to a negative value, the TSOs consider it highly unlikely that the FASS Charge would become negative, with the only evident route to a negative charge being substantial over-recovery leading to a very large negative k-factor that would outweigh the ex-ante cost forecast. Over-recovery of this scale would be unlikely, and in the event that it did manifest, would likely trigger a within year adjustment to the FASS Charge Rate (where provided for).

As to final settlement of DS3 related charges post go live of the DASSA, the TSOs would like to clarify the intention that (subject to the considerations set out in Section 12 regarding Contingency Arrangements) upon go-live of the DASSA, the FASS Charge will be the mechanism used to recoup the costs of all FASS arrangements i.e. the DASSA, Fixed Contracts, the Layered Procurement Framework, and any other All-Island System Services that are otherwise remunerated. In this context and for the avoidance of doubt, it is intended that any LCIS costs incurred in advance of go-live of the DASSA will be recovered through the existing mechanisms. Any final settlement of DS3-related charges that is required post go-live of the DASSA due to the resettlement or reconciliation of monies received prior to go-live will also go through the existing System Services Charge in Ireland and SSS Tariff in Northern Ireland. The TSOs note however that the transitional arrangements to apply between April 2026, when DS3 is to end, and December 2026 when the DASSA is to go live, are to be the subject of consultation in the coming months as reflected in the latest PIR, and that the details of the cutover between the funding of these transitional arrangements and the FASS Charge will need to be prescribed closer to the time. The costs of any system services that either TSO procures outside of the FASS arrangements (e.g. Black Start) will continue to be processed on a jurisdictional basis and will not be included in the new FASS charge.

Regarding potential implications for PPA type arrangements, insufficient detail was provided by the respondent to enable an understanding of what these are envisaged to relate to.

Question 8

The TSOs acknowledge respondents' concerns regarding the provision for reduction of payments to System Services providers on a pro-rata basis in circumstances where the aggregate amount that the TSOs are due to pay System Services providers in respect of a settlement period exceeds the available funds (such funds being the aggregate of the available revenues recovered via the FASS Charge and the available funds under the TSOs' proposed working capital facilities), along with calls for alternative measures to be put in place to prevent such an eventuality.

The TSOs would like to clarify that defining the procedure that would apply as a backstop is necessary for financing purposes and that pro-rata reduction in payments to providers is very much intended as a measure of last resort, noting that the similar provision contained in the Trading and Settlement Code has never been invoked. Indeed, the core objective of the recommended FASS Charge methodology set out in this paper is that the Charge will be capable of funding the required payments to FASS providers. This includes through management of the shortfalls that are expected to arise due to temporal mismatches between monies in and monies out.

Recognising the probability of such a mismatch between monies collected in via the FASS Charge and monies paid out to providers in a given month and between tariff years, the TSOs intend, as stated in the Consultation Paper, that working capital facilities will be put in place to manage where shortfalls arise. It will be important that these facilities are sized adequately, reflecting a probabilistic assessment of the cash flow risk exposure, to ensure that the likelihood that they are exhausted is minimised. The amount of working capital that the TSOs will be able to access to support FASS cash flow imbalances will need to be agreed by the RAs and accurately reflected in the respective TSO price control processes. The TSOs' ability to access working capital facilities will be an outcome of their respective price control processes. Ultimately such working capital facilities will have an upper limit and thus as noted above, defining the procedure that would apply as a backstop is necessary for financing purposes.

In addition, the TSOs consider, as stated in the Consultation Paper, that it would be appropriate to make provision in the design of the FASS Charge methodology for within year adjustment to the FASS Charge Rate in circumstances where the approved FASS Charge Rate either:

- (a) does not provide for the adequate recovery of anticipated costs and such under recovery is such that it is not appropriate to include as an adjustment in subsequent Years or
- (b) over provides for the recovery of anticipated costs and such over recovery is of such great materiality that it is not appropriate to include as an adjustment in subsequent Years.

In such a scenario the TSOs would submit to the RAs a Within Year (Y) Adjustment, detailing the level of deviation and the proposed Adjusted FASS Charge Rate to mitigate same for RA Approval.

The TSOs note the support from respondents for this Within Year Adjustment facility, as well as the request for clarity regarding the notice period that would apply and the emphasis on requiring clear criteria for when such an adjustment would be triggered. The notice period to apply in advance of implementation of an Adjusted FASS Charge Rate within year would allow for the notice period that Suppliers are required to give their customers before introducing price changes. The TSOs consider that clear criteria, in terms of rates of over- or under-recovery, for triggering a review of the need to adjust the FASS Charge Rate should be defined.

In regard to the creation of a socialisation fund similar to that which exists as part of the CRM, the TSOs consider that this would place an unnecessary burden on consumers, given the need to build up such a fund in the first place using consumer monies and the fact that any such fund would need to be in addition to working capital facilities. The TSOs' working capital facilities, where appropriately sized, serve the same purpose as a socialisation fund in effect, but at lesser impact to the consumer. In addition, the TSOs note that the Socialisation Fund that exists within the CRM is intended to cover the "hole in the hedge", which is a recognised risk within the design of the Reliability Option leading to an actual shortfall in monies collected in the form of RO Difference Payments relative to payments due out to Suppliers. This is different to the temporary shortfall due to cashflow imbalance, which is the matter at issue here. It is also important to note that SONI's TSO licence would need to be modified to allow such a mechanism to

exist in NI if the charges were to be levied under the established TUoS agreements. Therefore the TSOs do not recommend the inclusion of a socialisation fund.

As to the proposal that FASS Shortfalls be included in the Imperfections pot, the Imperfections Charge is defined within the scope of the TSC and collected in by the Market Operator, and as such, is entirely separate and distinct from the TSO-levied FASS Charge.

In summary, it is intended that Cashflow Imbalances arising within the FASS funding arrangements will be managed through:

- The Y-2 k-factor;
- The Y-1 Within Year k-factor;
- The TSOs' Updated Working Capital facilities; and
- Where warranted (as described above), a Within Year Adjustment to the FASS Charge Rate.

It is only in the case where a cash flow imbalance persists despite the above mitigants that the provision for reduction of payments to providers on a pro-rata basis would need to be invoked. It is the intention of the design of the methodology, through the inclusion of these mitigants, that the potential for such a scenario, while needing to be set out for financing purposes, will be mitigated. It is not the intention to, by design, apportion the risk of shortfalls across System Services providers as well as the TSOs. The dimensioning of the working capital facilities, which will be determined through engagement with the RAs and the TSOs' respective price controls, is key to ensuring that the TSOs can manage the shortfalls arising without any impact on System Services providers.

If the eventuality were to be reached however, where the TSOs' updated working capital facilities were exhausted despite the design of the k-factor and the provision for within year adjustment to the FASS Charge Rate, then as stated in the Consultation Paper, the provision in the FASS Code will ensure that the amount for each individual provider that is short paid would be tracked, and providers reimbursed when the funds were recovered and after any working capital facility payments were made. As such, it is not possible to define a timeframe or long stop date for providers to be reimbursed. The detailed drafting of this provision will be covered by the FASS Code workstream.

Finally, the TSOs would like to clarify in relation to the explanation given at the industry workshop regarding the timing of collection of charges versus payments being made to providers. This referred to collection of the FASS Charge from Suppliers each month, and the need for this to happen in advance of payments being made to providers each month. The settlement of Compensation Payments to which providers may be subject will be dealt with via the DASSA Design Development. Any amounts received in Compensation Payments by the TSOs over the year will be netted off the total outturn FASS Cost in the calculation of the k-factor for that year and therefore fed into the FASS Charge two years later (notwithstanding the potential for an Estimated Y-1 k-factor to also be used as per Section 4).

9.4 TSOs' Recommendation

The TSOs recommend that provision be made for Within Year Adjustment to the FASS Charge Rate in circumstances where the approved FASS Charge Rate either:

- (a) does not provide for the adequate recovery of anticipated costs and such under recovery is such that it is not appropriate to include as an adjustment in subsequent Years or
- (b) over provides for the recovery of anticipated costs and such over recovery is such that it is not appropriate to include as an adjustment in subsequent Years.

In such a scenario the TSOs will submit to the RAs a Within Year Adjustment, detailing the level of deviation and the proposed Adjusted FASS Charge Rate to mitigate same for RA Approval. The notice period to apply in advance of implementation of an Adjusted FASS Charge Rate within year will allow for the notice period that Suppliers are required to give their customers before introducing price changes.

The TSOs consider that clear criteria, in terms of rates of over- or under-recovery, for triggering a review of the need to adjust the FASS Charge Rate should be defined.

The TSOs note that provision in the FASS Code is required to cover an eventuality where the aggregate amount that the TSOs are due to pay System Services providers in respect of a settlement period exceeds the available funds. Such funds being the aggregate of the available revenues recovered via the FASS Charge and the available funds under the TSOs' proposed working capital facilities, such that, only once the available funds are exhausted, the TSOs will reduce the payments owed pro-rata across System Services providers until the total payment can be met with the funds available. The detailed rules governing this will be established within the FASS Code. The inclusion of this contingency is consistent with existing provisions in the TSC.

10 Legal Basis of Levying the FASS Charge

10.1 Summary of Consultation Proposal

The TSOs identified two options for providing the legal basis of the FASS Charge:

1. The FASS methodology and charge arrangements are set out within the FASS Code itself.
2. The FASS Charge Methodology is approved, and charge levied under the respective Supplier Transmission Use of System Agreements, which would be cross referred to from the FASS Code.

TSOs' Consultation Proposal

- The TUoS framework shall be used as the legal basis for levying the FASS Charge.

Question 9. Do you have any comments on the TSOs' assessment of the two routes for providing a legal basis for the FASS Charge?

Question 10. Are there other considerations not identified here that are relevant to the use of either the FASS Code or the TUoS framework as the legal basis for the FASS Charge?

10.2 Summary of Consultation Responses

Question 9

11 out of 17 respondents commented on Question 9 on the TSOs' assessment of the two routes for providing a legal basis for the FASS Charge.

6 of these 11 were of the view that the legal basis should be established in the FASS Code. Many of these respondents considered that the FASS Code would provide greater transparency, as well as flexibility to adapt the Charge over time, which will be important in the early days of the DASSA in particular. Many also strongly valued the ability for industry participants to raise modifications to the FASS Code, to be brought through a clear governance process via a modifications committee.

One also pointed out that using the FASS Code would protect against future changes to the UoS charging methodology and thereby provide greater investor certainty. Another was of the view that creating the distinct FASS Code and ensuring that the FASS charge is managed via that code is critical to ensuring the separation of the scheme from the TUoS Agreements and will provide greater clarity for all market participants.

A number of these respondents who were in favour of using the FASS Code also considered that the TSC could be a viable alternative that would bring the benefits of using an industry code, but without creating additional requirements for suppliers to accede to the FASS Code and establish additional credit cover facilities. One of these noted that additional time is likely to be required to adequately capture the charging arrangements in either the proposed FASS code or the TSC.

One respondent considered the TSC to be the best option and stated their view that the TSC provides a suitable approach for charging and settlement, is administered in a reliable manner that industry understands, and already requires accession by all participants relevant for the FASS charge and DASSA payment.

Another acknowledged that there are clear benefits and challenges with both approaches and suggested that there may be merit in setting out the charging methodology under the Supplier TUoS agreements initially and moving to the FASS Code once a given materiality threshold was reached, as this would allow for learnings to be captured and carried forward.

Another respondent stated that they could see merit in both approaches and were somewhat indifferent to the legal basis as long as there is transparency and the opportunity for industry input and that best use is made of existing market measures to minimise duplication.

One respondent considered that using the TUoS Agreements as the legal basis was the most pragmatic approach to take, given the existing arrangements in place in Northern Ireland for System Services cost recovery.

Numerous respondents referred to security cover requirements associated with the FASS Charge and noted that the amount of security cover required should be the same irrespective of the legal basis as the collateral will be set against the same charge. They called for the TSOs to ensure that there is no duplication of security cover under the FASS Code relative to the TUoS agreements. One respondent pointed out that it is not explained how the continued use of the existing TUoS charge for Black Start and any remaining DS3 services will be managed to avoid duplication on Suppliers.

Question 10

6 out of 17 respondents commented on Question 10 in relation to other considerations that are relevant to the use of either the FASS Code or the TUoS framework as the legal basis for the FASS Charge.

The themes highlighted in response to this question were similar to those summarised above in relation to Question 9. Some respondents pointed out that the assessment of options for the legal basis in the Consultation Paper does not consider the ability for industry to propose changes to the FASS Charge arrangements in the future, along with the need for transparency of any such changes. One considered that as FASS will be a new and complex market impacting all market participants, it will need a modification/governance process suitable to meet the wide-ranging interests of these participants, which should therefore remain separate from the TSO and supplier responsibilities set out in the TUoS agreements.

Other respondents raised the matter of security cover. One asked for further information as to what additional security cover will be required on suppliers as it is the TSO who is the buyer of these services rather than the retail suppliers, while recognising that some arrangements would need to be in place to ensure that if a supplier/customer left the market, the TSO would have a means of recovering the charges.

One respondent considered that the incompleteness of the overall DASSA design in terms of consumer protection, bidding code of practice, competition and market power issues weakens the basis of the Consultation and that electricity consumers should not be asked to sign up to a legal basis for charging for costs which are undefined and lack suitable competition controls.

10.3 TSOs' Commentary

Question 9

The TSOs acknowledge the strong industry support for the use of the FASS Code rather than the TUoS Framework as the legal basis for levying the FASS Charge, as well as the alternative proposal to use the TSC, to which Suppliers must already accede and post credit cover. The TSC governs settlement activities carried out by the licensed Market Operators through SEMO. In line with the TSOs' licensed functions, and as set out in SEM-22-012, the TSOs are responsible for settlement of system services charges, which as such doesn't fall within the scope of the TSC. However, the TSOs have identified an alternative approach that would bring the benefits of transparency, flexibility and interactive governance, which respondents have highlighted as important, while leveraging the existing TSO settlement and credit cover processes.

This approach would be to establish the legal basis for the FASS Charge in the FASS Code, such that the code would contain (alongside other relevant provisions):

- The obligation on Suppliers to pay the FASS Charge.
- The process and timeline for submission and regulatory approval of the FASS Charge parameters.
- The process and timeline for publication of the FASS Charge Rate.
- The algebra for calculating the FASS Charge Rate and monthly FASS Charge to be levied on Suppliers.
- The process and timeline for determination and regulatory approval of a Within Year Adjustment, as applicable.

The FASS Code would then refer out to the TSOs' existing TUoS settlement and credit cover processes, such that these established processes would be used for invoicing and collection of the FASS Charge monies, and for determination and administration of the associated credit cover. In acceding to the FASS Code, Suppliers would be agreeing to abide by the requirements of the relevant jurisdictional TSO's Supplier TUoS agreement²¹ and payment security policy²² for the purpose of the FASS Charge. This mechanism shall be clarified via legal drafting in the FASS Code.

This approach is considered to be optimal as it brings the benefits of using an industry code, as identified by respondents, while leveraging existing processes for collection and administration of charges by the individual TSOs. It is recognised that this approach will create the additional requirement for Suppliers to accede to the FASS Code, and for Supplier licences to be amended accordingly.

In relation to the question of the continued use of the existing TUoS charges for recovering the cost of jurisdictional System Services, this does not constitute a duplication of charges applied to Suppliers, as the costs being recovered through the two mechanisms (i.e. the FASS Charge and the System Services charge in IRE / SSS tariff in NI) are not the same.

Question 10

The TSOs note that many of the same themes were raised in response to Question 10 as to Question 9, and as such, have been addressed in the commentary on Question 9.

In relation to the query as to why additional security cover is required, given that the TSO is the buyer of System Services rather than Suppliers, FASS costs are ultimately recovered through the FASS Charge, paid by Suppliers, and it is therefore appropriate that security cover is posted by Suppliers to cover the potential scenario where they are in default.

²¹ <https://cms.eirgrid.ie/sites/default/files/publications/TUoS-Agreement-for-Suppliers-%28July-2013%29.pdf>
<https://cms.eirgrid.ie/sites/default/files/2023-08/GeneralConditionsofConnectionandUseofSystem%28July-2013%29.pdf>
<https://cms.soni.ltd.uk/sites/default/files/media/Supplier-TUOS-Agreement-Template.pdf>

²² SONI is obliged to apply the Payment Security Policy approved by the UR under Condition 31 of its TSO licence.

10.4 TSOs' Recommendation

The TSOs recommend that the FASS Code be used as the legal basis for the FASS Charge, recognising the strong industry support for this approach, given the advantages of transparency, flexibility and interactive governance. The existing TSO settlement and credit cover processes will be used, and the FASS Code will refer out to the relevant TSO documentation in which these processes are described. This approach is contingent on the necessary modifications to Supplier licences having been made to include an obligation to accede to the FASS Code. This Supplier licence amendment workstream will need to be incorporated into the FASS Programme and timeline.

11 Providing for Increased Granularity

11.1 Summary of Consultation Proposal

As per the SEMC's decision, in SEM-22-012, the FASS Charge is initially to be set annually by reference to an annual TSO cost estimate and energy demand forecast.

However, in SEM-22-012, the SEM Committee also states that:

*"A supplier-based MWh charge in line with option 2 in the consultation paper will be implemented initially. As market behaviours become better understood and the relationship between energy costs and system services costs becomes clearer the SEM Committee may move to Option 3, i.e. a trading period based charge. **This decision will be provided for in the systemisation that will be undertaken by the TSOs following the publication of this decision paper.**" [Emphasis added]*

Considering the complexities associated with moving to a trading period based charge, the TSOs proposed to undertake an assessment of building in the required functionality and to discuss the costs and benefits of this future proofing against a need that may or may not arise with the RAs to ensure that the optimum system specifications are delivered for go-live.

Stakeholders were welcomed to submit responses to highlight any information they would need at this stage from the TSOs and any impact this may have on their system readiness programme.

Question 11. Do you require any information on the system design from the TSOs at this stage?

Question 12. Do you have any concerns around the impact of the TSOs' assessment of the required IT system design on your system readiness?

11.2 Summary of Consultation Responses

Question 11

5 out of 17 respondents commented on Question 11 in relation to information required on the system design from the TSOs at this stage.

One pointed out that moving to a dynamically calculated FASS Charge Rate would require significant additional development of TSO, market participant and supplier systems and that more information on system design would be required to facilitate informed comment. Another appreciated that more granular treatment would bring with it the need for future IT changes and expressed their concern regarding deliverability of the large amount of IT change planned out to 2026. Another respondent queried how a more granular charge would work with PPAs. One respondent pointed out that any additional granularity in charging would not only require modification of the FASS methodology itself, but also further upgrades to Suppliers' and TSO systems, which would be complex and take time.

Question 12

12 out of 17 stakeholders responded to Question 12 regarding any concerns they had around the impact of the TSOs' assessment of the required IT system design on their system readiness.

Much of this commentary related to the principles of trading-period based charging versus charging at a flat annual rate, rather than to system readiness.

3 of the 11 respondents considered that a fixed charge rate is not appropriate as it insulates flexible customers from electricity price signals, providing customers with no means of "avoiding" the charge by shifting their behaviour and acting as a barrier to increased electrification. They were of the view that the charge should be dynamic, for example reflecting the carbon intensity of the grid on an hourly basis and

pointed out that day/night charging methodologies would fail to recognise that future consumers will need to follow weather patterns.

Other respondents recommended that the FASS Charge only be levied at certain times, such as when RES generation is low, so as to incentivise demand to move to times of higher RES generation, or as an initial step to only apply it (or do so at a higher rate) during certain hours, days and/or months. One of these respondents welcomed the proposal that the charge would in future be made ‘real time’, but pointed out the problem that suppliers, aggregators and consumers would need a ‘signal’, such as a forecast in advance, so that they could plan their consumption to avoid periods of system stress. Others also queried the mechanism for consumers to respond to a dynamic FASS Charge Rate, given a lack of visibility of the charge in real time, as well as insufficient knowledge of the price drivers to be able to predict trends in the charge. One respondent was of the view that a granular cost reflective charge would be almost impossible to forecast.

Many respondents also queried how a trading period based approach would work in practice and what it would seek to achieve in terms of consumer behaviour. These respondents pointed out that system services costs are likely to be higher at time of high renewables, when increased demand is beneficial for the system, and queried therefore whether a trading period based, per MWh, FASS Charge would send the right signals to consumers and produce the right outcomes in terms of decarbonisation.

One respondent considered that moving from the current day/night charge to a flat yearly charge to a granular trading period charge seems to be moving backwards and forwards without a clear pathway, especially at a time when concerted efforts are being made to encourage greater night-time consumption via smart tariffs. This respondent also pointed out that it is not clear what trend a truly cost reflective charge would follow, with such an approach likely resulting in instances where the FASS Charge was high while wholesale electricity prices were low, thereby undermining those price signals from the wholesale market.

One respondent also highlighted that the cost of system services is driven by a number of variables that may not be correlated and that the cost trend is likely to be difficult to interpret or predict as a result. This respondent was strongly opposed to purely cost reflective trading period-based charging in the future.

Some respondents also pointed to challenges of trading period granularity for suppliers in terms of implementation and pricing. One respondent pointed out that there might be difficulties for suppliers in passing on granular charges to customers, particularly in the context of fixed-price contracts or where consumers have limited flexibility to respond to price signals, which could lead to increased risk premiums and higher cost for consumers. Another stated that any cost reflective charge per trading period is not feasible, given the difficulty associated with forecasting such costs, along with the lack of smart metering in Northern Ireland. This respondent pointed out that ultimately from a Northern Irish perspective, the granularity would have little impact, given that the FASS charge will be folded into the retail tariff price along with other charges.

Many respondents emphasised the need for further consultation before any move to a more granular charge, along with the need to clearly demonstrate the benefit of more granular charging.

In regard to IT system readiness, one respondent considered that there was insufficient detail provided to be able to extrapolate the TSOs’ assessment as it could relate to their own future IT system readiness, while another pointed out that system readiness is always a cause for concern and called for constant ongoing industry engagement regarding IT and implementation issues.

11.3 TSOs’ Commentary

Question 11

The TSOs recognise the significant additional development of TSO and Supplier systems that would be required in order to move to a dynamically calculated FASS Charge Rate, along with the challenge to respondents in providing informed commentary on the system design without greater detail on this more

granular approach. The TSOs also note the concern in relation to deliverability of the scale of planned and potential IT changes.

Question 12

The TSOs note that many responses related to the principles of dynamic/trading-period granularity, with these principles having been the subject of the SEMC's High Level Design consultation (SEM-21-069).

In that consultation, the SEMC's preferred approach was to apply the FASS Charge on a trading period basis, *"as periods of low energy prices as a result of high renewable penetration may have high System Service costs, and applying the charges collectively at a given period is a more equitable approach compared to smearing the forecast costs over the year"*. In their High Level Design decision, SEMC opted for an annually set charge initially, with the requirement that settlement systems be capable of accommodating a move to higher granularity *"as and when appropriate in the light of operational experience of the market"*. SEMC stated that *"as market behaviours become better understood and the relationship between energy costs and system services costs becomes clearer"* they may move to a trading period based charge.

The scope of the methodology set out in this Recommendations Paper relates only to the annually set charge at this stage, as stated in the Consultation Paper. If SEMC were to decide to move to a more granular charge in the future, the TSOs expect that further consultation would occur, as requested by respondents.

The TSOs understand that the SEMC's intent is to observe the relationship between energy costs and System Services costs over time to gain insight into the incentives created for the demand side by a cost-reflective FASS Charge. We also note the obligation in European Law²³ to ensure that charges applied by network operators are cost-reflective. As set out in the TSOs' response to the SEMC HLD Consultation however, the costs of FASS will be driven not by the demand on which they are levied, but by other grid users. As such, it is difficult to see how demand can be incentivised to respond in a way that is useful to the system through a FASS Charge that directly reflects the cost of system services.

The TSOs also note that a proportion of the total FASS cost will be attributable to longer term contracts awarded under the Fixed Contract and Layered Procurement Frameworks, with pricing that does not vary by trading period, which would serve to dampen any signals that come from the DASSA pricing.

11.4 TSOs' Recommendation

In conclusion, and recognising the concerns raised by respondents, the TSOs observe that there remains considerable complexity and uncertainty associated with the concept of trading period based charging, and that a consultation and detailed design process would be required before such an approach could be implemented.

The methodology set out in this paper ensures that the FASS Charge Rate can vary on an Imbalance Settlement Period (and therefore DASSA Trading Period) basis. Adding the functionality to *calculate* the FASS Charge Rate on a trading period basis will only become possible once the detailed design of a granular charge is developed, and as such only an annual charge will be delivered for FASS go-live.

12 Contingency Arrangements

12.1 Summary of Consultation Proposal

TSOs' Consultation Proposal

- If the FASS Charge is not implemented in advance of go-live of the DASSA arrangements, the TSOs' existing mechanisms for recovery of DS3 costs will be used on a temporary basis.

²³ Regulation (EU) 2019/943 Article 18

12.2 Summary of Consultation Responses

6 out of 17 respondents gave their view on the TSOs' proposed contingency arrangements for the circumstance in which the FASS Charge is not implemented in advance of go-live of the DASSA.

A number of these respondents considered that use of the TSOs' existing mechanisms for recovery of DS3 costs in the case where the FASS Charge is not yet implemented was reasonable, with one noting that there appears to be little other option. One respondent was also of the view that the TSOs should think about what their decision point will be for going ahead with these contingency arrangements, so that it is not left to the last minute.

Another respondent pointed out that the TSOs' assumptions regarding the different elements that need to be in place for the FASS Charge to be implemented, should include implementation by suppliers of the new arrangements and of the necessary modifications to their billing systems. This respondent made the point that sufficient time needs to be allowed to ensure readiness on the supplier side.

Numerous respondents emphasised their strong preference for the FASS Charge to be implemented in advance of go-live of the DASSA arrangements as planned. One respondent considered that these contingency arrangements, if implemented, needed to be time limited. Another asked for greater clarity on what the TSOs are proposing as a transitional approach, noting that there is nothing in the paper that consults upon a transitional approach, but that at an industry workshop it was proposed that the current charging regime could apply if the charging methodology isn't in place for the end of DS3 tariff arrangements

One respondent expressed their concern regarding the proposed contingency arrangements, given the potential impacts on Business Planning and providers' cash flow arrangements. This respondent sought clarification on how the proposed DTUoS 2026/2027 tariff calculations and recovery mechanism for any system service-related portion of that charge will be managed alongside the introduction of the FASS Charge at a point during that tariff year, stating that this clarification is required to ensure that the TSOs have sufficient funding available to pay system services providers and to ensure that suppliers can appropriately forecast their costs over the 2026/27 year.

12.3 TSOs' Commentary

It is the TSOs' expectation and intention that the FASS Charge be ready for go-live of the DASSA, but it is nonetheless prudent to plan for a situation in which this is not the case as a result of the numerous inter-dependencies across the FASS Programme. The SEMC noted in their Detailed Design Consultation Paper (SEM-23-043) that:

"...the system services charge is not a dependency for the delivery of the first auction as the TSOs can recover their costs through the existing mechanisms until the charge is put in place"

The TSOs are conscious of the need to allow sufficient time for Suppliers to ready their own systems for this new charge, as reflected in the Readiness workstream of the PIR.

The TSOs understand the reference to the transitional approach to relate to the period between the end of the DS3 arrangements and go-live of the DASSA and note that the updated PIR includes a workstream dedicated to the development of this approach, which is planned to conclude with a SEMC decision in February 2025. For clarity, the TSOs confirm the intent that System Services costs accruing during this period will be recovered through the existing mechanisms, with the FASS Charge being implemented only from go-live of the DASSA and no earlier.

The TSOs acknowledge the commentary regarding implementation of the FASS Charge from December 2026 - a point during the Tariff Year rather than at the start, along with the need for there to be a decision point as to whether to invoke the contingency arrangements of employing the existing cost recovery mechanisms. These considerations will add complexity to the cutover from these existing mechanisms to the FASS Charge and the TSOs will seek to manage this in the most efficient and least disruptive way.

12.4 TSOs' Recommendation

The TSOs recommend that if the FASS Charge is not implemented in advance of go-live of the DASSA arrangements, then the existing mechanisms for recovery of DS3 costs will be used on a temporary basis.

13 General Comments from Respondents

Some feedback was received that did not relate to the specific questions asked in the Consultation Paper. The main themes of this general feedback are addressed below.

Principles of the FASS Charge

Many respondents were of the view that the FASS Charge methodology should not only address the objectives set out in the SEMC High Level Design, but also be designed to reflect more general principles such as transparency, efficiency, fairness, minimisation of price volatility, certainty for suppliers and consumers, and value for money for consumers. One respondent considered that the appropriateness of the application of the charge to consumers should be examined, given that it will likely be volatile, involve a recognised cash flow risk and potentially increase over time. This respondent pointed out that suppliers will bear the burden for system services costs while at the same time being mandated to incentivise positive demand reduction and that it would need to be made clearer why these are not in conflict.

The TSOs recognise the importance of these more general principles as highlighted by stakeholders. In relation to the appropriateness of the application of the charge to consumers, the TSOs note that consideration was given by the SEMC to an alternative “causer pays” approach whereby the costs would be borne by those grid users driving the need for system services, including generators for example, but that this was ruled out on the basis of respondents’ concerns regarding the difficulty in identifying the causer.

Consistency with other developments

Several respondents emphasised the importance of developing the FASS Charge in alignment with wider developments across the FASS programme and the wider energy market, so as to ensure consistency. Some respondents referred to potential network charging reform that may occur in the future and the need to be cognisant of this in the development of the FASS Charge methodology, so as to ensure it is compatible with such reform.

The TSOs acknowledge the importance of taking a holistic view when developing any individual element of the market arrangements. In regard to potential network charging reform (currently being considered by the CRU for Ireland only) that may take place in the future, the TSOs do not see this as a consideration for the FASS Charge methodology that is recommended in this paper, as this methodology will see the legal basis for the FASS Charge being set out in the FASS Code, albeit that the TUoS processes for settlement and credit cover will be used. The SEMC has decided that the FASS Charge will be an all island charge and it therefore sits outside the scope of any jurisdictional review in Ireland. Further detail on this can be found in Section 10.

Communicating the FASS Charge to consumers

One respondent expressed their view that there needs to be a clear public message explaining the FASS Charge, which can be passed on to customers, along with a simple non-technical explanation of the ‘drivers’ of the charge. This respondent also expressed their concern about the characterisation of the FASS Charge as a “supplier charge” when it is really a charge on electricity demand.

Regarding a clear public message explaining the FASS Charge, this will be provided in the charging statement published by each TSO containing the charge. It is also expected that such an explanation will be provided by the RAs through the relevant regulatory publications. In terms of visibility of the drivers of the FASS Charge, this will be provided through the regulatory submissions made by the TSOs, and expected to be published by the SEM Committee, as part of the annual charge setting processes. As to the characterisation of the FASS Charge as a “Supplier charge”, this reflects the fact that it is a charge to be levied by TSOs on Suppliers.

Decarbonisation

Numerous respondents commented on the role of the FASS Charge in facilitating decarbonisation, including in the context of increased electrification. One pointed out that FASS is intended to integrate renewable generation and deliver on decarbonisation targets, and it would seem logical that the charging mechanism to fund these services should also take decarbonisation into account by incentivising demand flexibility.

The TSOs acknowledge that the FASS Charge is to be implemented initially as a flat per MWh charge that is fixed on an annual basis, and that this design does not create incentives for the demand side to provide flexibility to the system. The SEMC consulted (SEM-21-069) on a number of options for the high-level design of the FASS Charge, including variations on the annually set Supplier Charge to which this Recommendations Paper relates. While their decision was that the charge will initially be set on an annual basis, they envisaged that the frequency of charge setting may increase as experience develops on the nature of pricing in the System Services markets, and on how this relates to energy market pricing. The TSOs understand therefore that the initial approach to setting the FASS Charge at a flat annual rate will be reviewed by the RAs as experience of the market develops. The question of increased granularity of the FASS Charge is examined in greater detail in Section 11.

Locational charging

Another respondent proposed that the FASS Charge should be developed in a way that reflects the benefit and specific locational need for system services, which could provide a signal for siting of such services in future, as well as a cost recovery mechanism.

This comment appears to propose to develop the FASS Charge in such a way as to reflect locational System Services. This would lead to there being different charge rates in different locations, reflective of the geographical distribution of System Services costs. It is not clear however how this could provide a signal for siting of System Services providers in future, as these providers would not be impacted by locational charging. Locational considerations as related to payments to providers are being dealt with through the Auction and Market Arrangements workstream.