# Exercise 'Everest' 2023 NEC Assurance Exercise Industry Briefing

Network Emergency Co-ordinator





#### Introduction >

Executive Summary >

Aim and Objectives >

Exercise Scope >

Live Data >

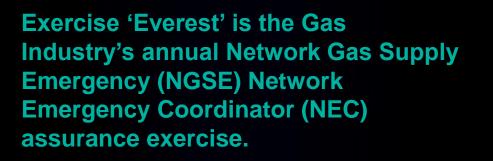
Exercise Participants >

Exercise Initiation >

Exercise Reporting >

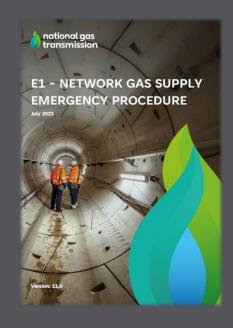
Contact >

Appendices >



Exercise Everest will focus on NEC communications with all industry participants through all stages of an emergency, both in the lead up and during an NGSE, and assure that industry participants are aware of their obligations to comply with NEC instructions.





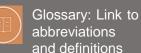
Click the image on the right to watch a short video which explains the NGSE Response Framework The 'E1 Network Gas Supply Emergency Procedure' sets out how NGSEs are managed. Version 11 will be published in August 2023. Click the image on the left to access this important document



This is an interactive document. The buttons below feature on the left bottom corner of each page for your convenience. Use them as follows:



Home: takes you back to this page



Navig you to

Navigation: takes you to the next or previous page

Introduction >

Executive Summary >

Aim and Objectives >

Exercise Scope >

Live Data >

Exercise Participants >

Exercise Initiation >

Exercise Reporting >

Contact >

Appendices >

## **Executive Summary**

- It is essential for the gas industry to be able to manage an emergency situation safely and effectively; the annual exercise is one of the key methods to demonstrate its preparedness.
- The NEC has a legal requirement to provide assurance that the gas industry can take action to manage and recover from a gas deficit emergency.
- Exercise Everest will utilise live demand data and simulate a series of supply losses to trigger an NGSE.
- Industry notifications shall be tested through the activation of a Gas Balancing Notification (GBN) and Emergency Declarations.
- Exercise Everest will seek to test communication methods between National Gas' Network Emergency Management Team (NEMT) and all relevant gas industry participants to complete the principal objectives set out in this briefing note.
- Exercise Everest will look to test that both gas and electricity participants can appropriately respond to a gas supply shortage which has electricity system implications.
- The NEC will request a feedback report from all participants involved upon completion of the exercise to inform the compilation of the post exercise report.

Tuesday 3<sup>rd</sup> October Pre-Emergency Wednesday 4<sup>th</sup> October Emergency Thursday 5<sup>th</sup> October Isolation

Introduction > Executive Summary >

Aim and Objectives >

Exercise Scope >

Live Data >

Exercise Participants >

Exercise Initiation >

Exercise Reporting >

Contact >

Appendices >

## **Aim and Objectives**

The aim of this exercise is to demonstrate that the Gas Industry is prepared and able to meet its obligations in the event of a Network Gas Supply Emergency (NGSE). This will be demonstrated by effective two-way communication processes across the industry and its stakeholders; timely and accurate information being shared between participants; and effective emergency strategies being produced and implemented.

In achieving this demonstration, the following objectives will be met:

- Test the management of an emerging gas supply shortage, through the use of warning notices and the establishment of proactive communication channels, then gain an understanding of how these are received by industry (post exercise)
- Test the development and delivery of the pre-emergency strategy, through:
  - o the simulated activation of all viable commercial and physical tools
  - the capability of the Primary Transporter to form an accurate situational awareness through industry collaboration
- Practice and enhance processes and tools associated with the interactions between gas and electricity organisations during times of whole energy system stress, supported by active participation from the Electricity System Operator and Electricity Distribution Network Operators
- Test industry's ability to warn and inform the public through participation of Corporate Affairs' representatives from the Energy Networks Association, Gas Transporters, the Electricity System Operator and Electricity Network Operators, including changes made to modernise the public appeals process
- Test that recommendations from previous industry emergency exercises have been delivered and are effective
- Validate emergency procedures, specifically, National Gas' E3; the E3 documents of the Distribution Networks; the E1 Network Gas Supply Emergency Procedure and NEC Safety Case

Introduction >

Summary >

Aim and Objectives >

Exercise Scope >

Live Data >

Exercise Participants >

Exercise Initiation >

Exercise Reporting >

Contact >

Appendices >

### **Exercise Scope**

Tuesday 3<sup>rd</sup> October Pre-Emergency

- Gas Transporter Collaboration
- Gas Balancing Notification (live issue marked for exercise)
- Gas Availability Status (GAS) Report

(live population marked for exercise)

- Scale-back Off-peak Exit Capacity (consideration of live data by GSO but no further communications issued)
- Activation of Operating Margins Contracts (testing of contract activation process for

Exercise)

### Wednesday 4<sup>rd</sup> October Emergency

- Declaration of an NGSE (live issue of Emergency declaration marked for exercise)
- Stage 1: 'Admission of Emergency Specifications Gas' (live issue of Emergency Specification Gas Notifications marked for exercise)
- Stage 2: Entry Point Flow Directions (live issue of directions to maximise flows
- marked for exercise)Stage 2: Load Shedding
- Directions\* (live issue of directions to cease taking gas marked for exercise)

### Thursday 5<sup>th</sup> October Isolation

- Public Appeal (notional issue)
- Stage 3: Allocation and Isolation (live issue of allocation and isolation directions marked for exercise)

Note: The scope listed here is the expected activity live responders are likely to generate against the exercise scenario. The actual response may differ dependant on live strategy considerations and NEC approvals.

\* Load shedding exercises for the LDZs takes place separately to the delivery of the NEC Industry Exercise. Load shedding directions issued for Exercise Everest shall be regarding Interconnectors and National Transmission System connected customers. LDZ load shedding shall form part of the response strategy but delivery of load shedding directions shall be notional

Introduction > Executive Summary >

Aim and Objectives >

Exercise Scope >

Live Data >

Exercise Participants >

Exercise Initiation >

Exercise Reporting >

Contact >

Appendices >

### Live data

In previous exercises, simulated data has been used in the scenario in order to ensure processes to manage a Network Gas Supply Emergency are fully tested. This has included using real data and weather from periods of high demand. This has limited the use of live response tools and processes which would be utilised in a real event.

This year, the Gas Transporters have opted to utilise live data in order to provide further assurance and strengthen response capabilities. This approach does however lead to a reduction in the realism in the scenario, as more extreme and intensive scripted supply losses are necessary to cause system stress.

In each day of the exercise, a scenario of gas supply losses will be applied to live supply and demand data for the day. Supply losses will be applied to the live opening position, then any response activity associated with demand reduction will be applied as required.

Every morning of the exercise, National Gas' Exercise Control will hold a short webinar which exercise participants should attend to be briefed on the latest response position. Exercise Control will give a national perspective of the exercise conditions to be applied to the live data picture. All participants should apply any applicable supply or demand reduction data to the live data set.

Awareness of these data sets is assessed to be most relevant to the Gas Transporters, National Grid ESO and Distribution Network Operators who will have more intensive briefings on the subject shortly before the exercise. All other participants should respond to exercise communications as if the scenario were a real event, taking care to utilise the exercise protocols to denote that communications are related to the exercise, not real life, see 'Exercise Initiation' for more detail on these protocols.



Introduction > Executive Summary >

Aim and Objectives >

Exercise Scope >

Live Data >

Exercise Participants >

Exercise Initiation >

Exercise Reporting >

Contact >

Appendices >

## **Exercise Participation**

Government and Regulators	National Gas Transmission		and LNG Importation ninals	Storage Facilities	National Transmission System – Directly Connected
Department for	National Gas Crisis	TERM	INALS:	Aldbrough – Equinor/	Sites
Energy Security & Net Zero	Management Team (CMT)	Easington - Gassco, Langeled	St. Fergus - Ancala (Wood), SAGE	SSE Gas Storage	Gas Distribution
North Sea Transition	Network Emergency Management Team (NEMT)	Easington - Centrica	St. Fergus - NSMP (PX)	Hatfield Moor – Scottish Power	Network Operators
Authority (NSTA)		Storage, Rough	St. Fergus - Shell	Hilltop – EDF Energy	Cadent
Health and Safety Executive (HSE) <i>[Observing]</i>	Corporate Affairs Response Team	Easington - Perenco, Dimlington	St. Fergus - National Gas	Hole House – EDF	Northern Gas Networks (NGN)
		Burton Point - ENI	Teesside - Antin	Energy	SGN
Office of Gas and Electricity Markets (Ofgem)	(CART) National Transmission System (NTS) Silver Command	Bacton - Shell	(Wood), CATS	Holford – UniPer	Wales and West
		Bacton - Shell	Teesside - PX		Utilities (WWU)
		Bacton - National Gas	Barrow - Spirit Energy	Hornsea – SSE Gas Storage	Interconnectors
		Bacton - SEAL	Somerset Farm	Humbly Grove –	DDL DDL Compony
Network Emergency Coordinator (NEC)	National Grid Electricity System Operator (ESO)	Bacton - Perenco	Angus Energy	Humbly Grove Energy	BBL – BBL Company
		LNG TER	RMINALS:	Stublach - Storengy	Irish Interconnector – Gas Networks Ireland
	Electricity System Distribution Network Operators	Milford Haver	n – South Hook		(GNI)
Energy Networks		Milford Hav	ven – Dragon	Shippers	Interconnector Limited
Association		Isle of Grain -	- National Grid		



Introduction > Executive Summary >

Aim and Objectives >

Exercise Scope >

Live Data >

Exercise Participants >

Exercise Initiation >

Exercise Reporting >

Contact >

Appendices >

## **Exercise Initiation**

The exercise will commence with the briefing of the National Gas System Operations Duty Officer c.09:00 hours, on Tuesday 3rd October 2023. The Duty Officer will review the scenario information and determine the requirement to mobilise. Upon the decision to mobilise, a message will be issued to industry, which will include a brief situation report, utilising established communication paths, stating:

### **"EXERCISE 'EVEREST' – START OF EXERCISE"**

The exercise will pause c.16:00 hours, on Tuesday 3rd October 2023, and re-commence with a short re-briefing c.09:00 hours Wednesday 4th October 2023. This process will repeat on Thursday 5th October 2023.

The exercise will end at the discretion of Directing Staff, in discussion with the HSE, c.16:00 hours, on Wednesday 5th October 2023. A message will be issued to industry stating:

### **'EXERCISE 'EVEREST' – END OF EXERCISE'**

A 'hot' debrief will take place immediately after the end of the exercise, for the National Gas participants. All other participants are requested to consider holding a similar debriefing session, in isolation, to gather feedback and identify lessons learnt.



Introduction > Executive Summary >

Aim and Objectives >

Exercise Scope >

Live Data >

Exercise Participants >

Exercise Initiation >

Exercise Reporting >

Contact >

Appendices >

## **Exercise Reporting**

Following the exercise and receipt of industry feedback, the Office of the NEC will prepare a report on Exercise Everest detailing the effectiveness of the industry response to NEC notifications. The report will incorporate industry feedback and relay recommendations for improvements to the emergency arrangements. This will be published on National Gas' and the HSE's websites.

Each organisation participating in Exercise Everest is requested to appoint an exercise observer who can provide observations and feedback on the exercise. National Gas will publish an online feedback form at the end of the exercise, in order to gather industry feedback and lessons learnt. A guide to 'exercise reporting' is available in the 'Industry Exercise Participant Requirements' section on the '<u>NGSE Pages</u>' on the National Gas website

Click the image on the right to review the Post Exercise Report for the 2022 NEC Industry Exercise 'Degree'





Introduction > Executive Summary > Aim and

Objectives >

Exercise <u>S</u>cope >

Live Data >

Exercise Participants >

Exercise Initiation >

Exercise Reporting >

Contact >

Appendices >

## Contact

Should you have any queries or require further information regarding any aspect of Exercise Everest, please visit the National Gas emergency information website, where the 'Industry Exercise Participant Requirements' tab features guides bespoke to groups of specific users namely: Directly Connected Sites; Shippers; Storage Operators; Supplementary Transporters; and Terminals.

#### www.nationalgas.com/safety-andemergencies/network-gas-supply-emergency

You can also get in touch with the National Gas Emergency and Incident Framework Team using the contact details provided below:

#### gasops.emergencyplanning@nationalgas.com



Introduction > Executive

Summary >

Aim and Objectives >

Exercise Scope >

Live Data >

Exercise Participants >

Exercise Initiation >

Exercise Reporting >

Contact >

Appendices >

### **Appendices**

The NEC

2

3

Industry Working Groups

### List of Abbreviations and Definitions



**NEC Assurance Exercise Everest** 

Introduction > Executive Summary > Aim and

Objectives >

Exercise Scope >

Live Data >

Exercise Participants >

Exercise Initiation >

Exercise Reporting >

Contact >

Appendices >

## **Appendix 1 – The NEC**

The Network Emergency Coordinator (NEC) is an independent industry role, established under the Gas Safety (Management) Regulations (GS(M)R), whose duty is to co-ordinate the actions across affected points of the gas network to prevent or minimise the consequences of a Network Gas Supply Emergency (NGSE). This is defined as "an emergency endangering persons arising from a loss of pressure in a network, or part thereof".

The role of the NEC is currently undertaken by National Gas Transmission and is independent from any commercial interests of any organisation within the Gas Industry.

Industry participants such as Transporters and Shippers have a legal duty to cooperate with the NEC, who has the powers to direct the defined duty holders.

right to watch a short

video which explains the role of the NEC





### **NEC Assurance** Exercise Everest

## **Appendix 2 – Industry Working Groups**

Introduction > Executive Summary >	Energy Emergency Executive Committee	The Energy Emergency Executive (E3) and its Committee (E3C) are the principal fora for identifying both the risks and mitigating processes and actions necessary to manage the impact of emergencies affecting the supply of gas and/or electricity to consumers in GB.	ſ	Gas Task Group (GTG)	The GTG facilitates Gas Industry and government dialogue to enable effective emergency planning and response, effective development of policy, standards and codes, increase resilience through risk identification and delivery of mitigation actions; and to ensure continuous improvement through exercising and implementation of lessons learned.
Aim and Objectives > Exercise Scope >	(E3C)			Electricity Task Group (ETG)	The ETG's role is to ensure that the electricity sector in Great Britain is aware of, and prepared for, a variety of emergencies that may negatively impact electricity supply and, more widely, the energy sector.
Live Data > Exercise Participants > Exercise Initiation >	NEC Safety Case Forum	Bi-annual meetings are held with this Duty Holder group to ensure that developments to the NEC's Safety Case and responses to an emergency are agreed and implemented across the Gas Transporters.		Electricity & Gas Resilience Interactions Task Group	In 2021, the RIGSSE (Review of the Impact of a Gas Supply Shortage on Electricity) Task Group was formed to facilitate Gas Industry, Electricity Industry, Government and regulatory dialogue to review current 'whole energy system' interactions in the event of a gas supply shortage, or restrictions on the ability to transport gas, which impact the electricity network. The 'review' activities of the RIGSSE Task Group came to a close at the end
Exercise Reporting > Contact > Appendices >	E3 Alignment Group (E3AG) A subgroup of the NEC Safety Case Forum, focused on the alignment of NGS Management & operational processes between gas transporters. The group focuses primarily on the issues of			(EGRI TG) (formally RIGSSE)	of 2021 with the publication of an opportunities report. The RIGSSE Task Group has now been replaced by a more sustained position in the form of the EGRI (Electricity & Gas Resilience Interactions) Task Group, responsible for driving forward the RIGSSE opportunities which have not already been developed, and to horizon scan for further opportunity areas.
	transfe	mmunications, procedures, data Insfer and the responsibilities of the spective gas transporters.	Ļ	Communications Task Group (CTG)	The CTG exists to support and foster effective government, regulator and industry wide collaboration on issues relating to communications around gas and electricity sector emergencies.



Introduction > Executive Summary > Aim and

Objectives >

Exercise Scope >

Live Data >

Exercise Participants >

Exercise Initiation >

Exercise Reporting >

Contact >

Appendices >

### **Appendix 3 – List of Abbreviations and Definitions**

СТБ	Communications Task Group (see <u>App 2 – Industry Working</u> <u>Groups</u> )	GSO	Gas System Operator (National Gas)
DESNZ	Department for Energy Security & Net Zero (UK Government)	GTG	Gas Task Group (see <u>App 2 – Industry Working Groups</u> )
DNO	Distribution Network Operator (Electricity) (See ENA website – Who's My Network Operator)	HSE	Health and Safety Executive (UK Government)
E3C	Energy Emergency Executive Committee ( <u>App 2 – Industry</u> <u>Working Groups</u> )	LDZ	Local Distribution Zone within Gas Distribution Networks
EGRI	Electricity & Gas Resilience Interactions Task Group see ( <u>App 2 –</u> <u>Industry Working Groups</u> )	МСМ	Million Cubic Metres (Gas unit of measurement for NTS)
ENA	Energy Networks Association (See ENA website)	MN	Gas Margins Notice (See NG Website)
ESO	National Grid Electricity System Operator	NEC	Network Emergency Co-ordinator (see App 1 - The NEC)
GBN	Gas Balancing Notification (See NG Website)	NEMT	Network Emergency Management Team (National Gas - GSO)
GDN	Gas Distribution Network ( <u>See ENA website – Who's My Network</u> Operator)	NGSE	Network Gas Supply Emergency (See NG website)
GS(M)R	Gas Safety (Management) Regulations 1996	NTS	National Transmission System (National Gas)
GNCC	Gas National Control Centre (National Gas)	NTSA	North Sea Transition Authority (UK Government) (See NTSA website)

Emergency Specification gas	GS(M)R makes provision to widen the standard gas quality specification to 'prevent a supply emergency'	GAS Report	Gas Available Status Report which enables the GSO to better request information, via the OGA GAS Portal, to understand gas availability from the offshore and onshore sector
--------------------------------	--	------------	--



Network Emergency Co-ordinator

