



## **Introduction**

We are rightly proud of our safety record, which is the result of many years of sustained effort by our employees and contractors. Despite achieving a record-breaking run of 690 consecutive days without a recordable lost time accident in the last two years, we are far from complacent. Our aim is that all employees and contractors working for Northern Powergrid should go home at the end of each shift uninjured and in good health, after a productive and fulfilling day's work. For that reason, we plan to further improve our safety performance in the 2023-28 period.

We will continue to invest in our health and safety management programme so that we can deliver further improvement. This approach provides us with a broad range of 'tried and tested' policies and procedures, which are designed to keep our employees safe and manage the risks associated with operating our equipment. We continue to learn from others and value the sharing of best practice across our global group of companies and the UK energy sector. We continue to be actively involved with the Energy Networks Association (ENA) and the development of industry-wide approaches to health and safety.<sup>1</sup> We have developed strong relationships with our trade unions over many years and continue to value the important role they play in shaping our health and safety plans.

This annex sets out what we do to achieve such a high performance. It provides detail about the overarching framework that is in place to ensure we make the right decisions and we have provided some case studies on initiatives that we have introduced in the last few years to keep our workforce and the public safe.

## **Recognition of our safety performance by the Royal Society for the Prevention of Accidents (RoSPA)**

The RoSPA Health & Safety Awards is the longest-running occupational health and safety awards programme in the UK. In recognition of achievements in health and safety performance and for continued or improving standards of health and safety over a sustained period, Northern Powergrid (Northeast) plc received a RoSPA Order of Distinction for achieving 20 consecutive Gold Awards. Northern Powergrid (Yorkshire) plc also received a RoSPA Order of Distinction for achieving 17 successive Gold Awards.

## **Our safety strategy**

We are committed to meeting and exceeding the health and safety obligations placed upon us. To this end, we have our own internal procedures and codes of practice to ensure the health and safety of our colleagues, contractors and the customers we serve.

Rather than simply responding to problems when they arise, we firmly believe in routinely evaluating our activities and making changes where necessary to improve our health and safety performance. It is this proactive approach that has gained us our industry-leading safety position.

Our overarching forward plan for improving health and safety is our safety and health improvement plan (SHIP).

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<sup>1</sup> The ENA is the industry body that represents the transmission and distribution network operators for gas and electricity in the UK and Ireland.

Our plan is reviewed on an annual basis and draws together improvement strategies from:

- The UK electricity industry's 'Powering Improvement' strategy. As a member of the ENA we are committed to, and actively involved in, the Powering Improvement initiative that will support the UK electricity industry in its drive to have no life-changing injuries (zero RIDDOR reportable)<sup>2</sup> or major incidents by 2025, while also ensuring an engaged and healthier workforce. We will continue to work with the ENA in the period to 2023 to develop and deliver industry-wide health and safety improvements into the next eight-year period.
- Berkshire Hathaway Energy Company (BHE) safety improvement strategy. Our owners expect and require the very highest of health and safety performance and risk management across all BHE businesses. The BHE strategic safety plan is reviewed annually by senior safety professionals representing the various parts of BHE's business. Our annual review of the SHIP is based on continuous evaluation of our performance and the influence of the Powering Improvement strategy. We will continue to develop and share best practice initiatives across BHE.

### **ISO45001: occupational health and safety management system**

We have operated an externally accredited occupational health and safety management system (OH&SMS) since July 2004. Our OH&SMS was initially independently accredited by Lloyd's Register Quality Assurance (LRQA) as compliant with the occupational health and safety assessment (OHSAS) series 18001:1999 in July 2004. The OH&SMS was then subject to ongoing surveillance audits every six months and recertification audits every three years.

As part of our continuous improvement drive, we recognised that OHSAS 18001 was being replaced with a new and more challenging standard ISO45001:2018. To ensure that we remained at the leading edge of management systems, we completed a gap analysis against the new standard and then enhanced our management system to be ready to transition to the new standard. Our OH&SMS was formally accredited by LRQA as compliant with ISO45001:2018 in July 2019. Our OH&SMS continues to be subject to six-monthly surveillance assessments and a full recertification audit in 2022.

### **Our safety indicators**

As part of our safety management system we monitor our safety performance against a number of lagging and leading indicators as set out in table 1. We have well-established mechanisms that allow us to record and investigate our performance against each of the lagging indicators. These lagging indicators allow us to measure the overall effectiveness of our safety performance in terms of how many incidents we have had and whether people have been hurt as a result. However, we recognise that concentrating just on our performance against lagging indicators does not tell us how well we are doing as an organisation to prevent incidents and accidents. To achieve this, we also monitor our performance against a range of leading indicators that are focussed on future safety performance and how we can continually improve.

Our approach to leading indicators can be summarised into three broad categories – engagement visits, audits and hazard/near-miss reporting.

We have an established engagement visit programme where our senior leaders and senior operational colleagues undertake a minimum of four site engagement visits each year to discuss safety with our workforce and contractors.

We undertake a range of audit programmes, from independent safety audits to first-line supervisor audits, with the aim that all of our front-line colleagues are audited at least once per year.

Finally, hazard and near-miss reports provide valuable insights on safety issues that can be proactively addressed. We monitor the number of reports raised and the number of colleagues who submit a report, which is an indicator of the engagement with this proactive safety programme.

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<sup>2</sup>. RIDDOR: Reporting of Injuries, Diseases and Dangerous Occurrences Regulations 2013.

Lagging indicators	Leading indicators
<ul style="list-style-type: none"> <li>Occupational Health and Safety Administration (OSHA) accident rate<sup>3</sup></li> <li>No. of OSHA recordable accidents<sup>3</sup></li> <li>No. of non-OSHA incidents<sup>3</sup></li> <li>No. of vehicle accidents</li> <li>No. of switching incidents<sup>3</sup></li> <li>Harsh driving events per 100 miles</li> <li>Days lost due to accidents</li> <li>Days since last accident<sup>3</sup></li> <li>Days since last vehicle accident</li> <li>Days since last switching incident<sup>3</sup></li> </ul>	<ul style="list-style-type: none"> <li>No. of leadership site engagement visits</li> <li>No. of technical staff site engagement visits</li> <li>No. of enhanced safety audits</li> <li>No. of supervisor audits</li> <li>No. of hazard and near-miss reports</li> <li>No. of colleagues submitting hazard and near-miss reports</li> <li>No. of trade union safety representative workplace inspections</li> <li>No. of senior authorised person audits</li> <li>% compliance of daily site risk assessments</li> </ul>

Table 1: Lagging and leading indicators

### Our safety and health improvement plan (SHIP)

Our SHIP continues to be an integral part of our safety management system and has enabled us to deliver class-leading safety performance. Our forward-looking approach to safety improvement planning will continue to be based on a plan that is reviewed and refreshed every year. This structured approach also provides the flexibility to incorporate any necessary changes both quickly and effectively.

Our SHIP focuses on the areas where the risk is greatest and is aimed at continuing to implement procedural, technological and behavioural changes to improve risk management and develop a positive, cooperative and forward-thinking health and safety culture. Our SHIP contains initiatives designed to ensure that we adhere to and develop our policies and procedures in order to assist in injury prevention and health promotion. As a result, we will be able to meet our goals in the following areas:



Figure 1: SHIP structure and approach

Safety is embedded in our business and our safety strategy helps to ensure that we are always looking for innovative ways to make our operations safer. We have provided case studies, which describe specific initiatives or programmes that we have delivered in the last few years to keep our colleagues, our contractors and the public safe.

<sup>3</sup> Indicators for Northern Powergrid workforce and contractor

**Case study: mental health and wellbeing**

We recognise the importance of positive mental health and wellbeing among our workforce. In the 2015-23 period we introduced our mental health first aid programme, in which more than 60 volunteers from across our business were provided with training on how to identify the signs of mental health problems and provide initial support to other colleagues. The list of mental health first aiders is published on our company intranet and at each of our facilities. These volunteers are an initial point of contact, can provide support and signpost colleagues to official support mechanisms, or just be there for someone if they need to talk.

In conjunction with establishing this programme we also trained over 200 managers to raise their awareness of mental health problems and their role in supporting colleagues who require it.

The mental health first aid programme has been particularly important during the COVID-19 pandemic. We have issued regular communications to our workforce to signpost the availability of our mental health first aiders and the company's employee assistance programme provided via our external service provider, Validium. This programme enables our workforce to access free counselling as well as relationship, finance and legal advice. Our 'Wellbeing Wednesday' communication programme has shared a range of tips and advice aimed at helping colleagues and their families positively navigate through the pandemic. The 'Wellbeing Wednesday' communications have been issued on a regular basis and addressed a range of subjects from managing motivational pressure on social media and powering your mind through healthy eating to managing pandemic media overload and how to sleep well, work remotely and adapt to change.

**Case study: innovation in protecting our staff from the effects of unintended electrical flashovers**

We ensure that our workforce are protected against the effects of an unintended electrical flashover or explosion, known as an 'arc flash', through the provision of state-of-the-art arc flash workwear. Our award-winning work with leading material manufacturers and clothing designers created a unique range of safety clothing for use when working on our network. The development and initial investment of almost £2m in providing our field staff with this protective clothing was delivered prior to the start of this eight-year period.

Since the initial implementation we have continued to work together with our workwear supplier, J&K Ross Ltd, to continue to improve the design based on developments in material technology and feedback from our staff who wear the garments.

Over the 2015-23 period, that search for continuous improvement has allowed us to make a number of improvements to the range of garments. Each improvement has been fully trialled with staff to ensure their views on fit and ergonomics are addressed and each garment is fully tested to ensure the level of arc flash protection is maintained. We have upgraded the material used to manufacture our wet weather clothing, which has significantly reduced its weight, making it more comfortable for the wearer. We have also introduced a one-piece wet weather product that is designed for overhead linesmen who are more exposed to adverse weather conditions.

Through feedback from the workforce we have made changes to our coveralls and workwear to improve the fit and ergonomics of the garments, and by changing the material we have addressed concerns about how these garments feel in the winter months. We are also enhancing the range of garments we provide to allow greater flexibility for both gender and religious beliefs.

We will continue to innovate in the area of arc flash protection in light of emerging knowledge and understanding to benefit fully from the investment we have made in our research and in doing so further reduce our risk exposure.

**Case study: vehicle telematics**

At the start of the 2015-23 period we introduced vehicle telematics solution into approximately 830 fleet vehicles. The telematics solution we selected has two distinct features, both of which are targeted at improving our driving performance and reducing the number of vehicle accidents we have. The telematics system is hard-wired into the vehicle and provides data on each driver's typical behaviour, such as excess speed, harsh acceleration, harsh braking and harsh cornering events. The system is also fitted with a forward-facing camera that continuously records driving footage and in the event of an accident can be downloaded and viewed.

Our objective for introducing the telematics system into our fleet vehicles was to improve driving behaviour and reduce the number of vehicle accidents. There were some secondary benefits however, such as improved utilisation of fleet vehicles, improved fuel efficiency and improved defence of third-party accident claims. The data collected from the system enables feedback to be provided to drivers on their driving style and highlights areas for improvement.

Since the introduction of the telematics system we have benefited from the availability of the forward-facing footage which has been a significant factor in improving our accident investigation processes. We have also been able to use camera footage in staff briefings, communication programmes and at individual driver coaching sessions, to raise awareness with our drivers of common hazards and help raise overall driving standards. The availability of telematics data on excess speed, harsh acceleration, harsh braking and harsh cornering events has enabled us to identify drivers who would benefit from intervention programmes either through classroom training or one-to-one driver training.

**Case study: advanced driver qualification**

In early 2020 we launched a voluntary programme to sponsor colleagues through the Institute of Advanced Motorists (IAM) RoadSmart<sup>4</sup> advanced driver qualification to enable us to continue to improve driving standards in the company. Our expectation was that we would have 100 colleagues enrol in the programme, but the initial response exceeded our expectations with more than 180 colleagues enrolling onto the programme.

Each of these colleagues will undertake the training in their own time and using their own vehicle. This is a significant time commitment, as each colleague will be expected to undertake between eight to 10 driving sessions accompanied by an IAM RoadSmart-accredited observer with each session lasting two hours. These sessions will take place over a three-to six-month period so that each colleague can embed the feedback from the instructor into their driving behaviours, they are then assessed with a practical advanced driving test at the end.

We are paying the course fee for all colleagues enrolling onto the programme, as we believe that in achieving the qualification our drivers will be equipped with more skills and knowledge to be safer on the roads.

The start of the accompanied driving sessions was delayed due to the pandemic but with the relaxation of restrictions from May 2021 these are now starting to be scheduled.

**Case study: good causes benefit in recognition of our 'safety champions'**

We introduced our safety champions scheme to recognise the teams in our company with the highest performing safety records. We believe it is essential that we acknowledge the valuable contributions our colleagues make in achieving high health and safety standards as individuals, and also when working together in their teams. This scheme recognises, reinforces and encourages attitudes and behaviours that directly contribute to our success in improving health and safety performance.

We acknowledge the contribution made by individuals working with their colleagues as part of larger teams. Our field-based craft staff are placed in safety champion teams and their team performance during the year is measured based on accident performance, driving incidents and the other safety measures we routinely capture. Each year we make a

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<sup>4</sup> IAM is the UK's largest independent road safety charity.

donation totalling £10k to charities chosen by our top three performing safety champion teams. We are proud to encourage the highest level of safety performance among our colleagues, while at the same time supporting these good causes.

Over the 2015-23 period we have made donations totalling £65k to charities chosen by our teams, this included a one-off special award of £5k to our Humber Estuary safety champions team to allocate to their chosen charity, for their significant achievement of six years without a recordable OSHA accident.

#### **Case study: safety education for children and schools**

We have been active in communicating and raising awareness about the dangers of electricity to children and schools for more than 20 years. We support children's safety workshops and provide a number of real-life scenarios depicting potentially dangerous situations. We communicate safety messages with schools and children through a variety of means including:

- School talks - we visit schools and talk about the dangers of electricity to children between the ages of 11 and 14. These talks are designed for children in this age range and cover the risks associated with interfering with our equipment, the warnings signs shown on our substations and overhead lines, how to avoid danger and what to do in an emergency. In instances where our equipment is interfered with and we suspect children may have been involved or put at risk, we offer our safety talks to the schools in that immediate area. From 2015/16 to 2020/21, we saw 141,552 children through our programme of school talks.
- Safety education downloads - during the 2015-23 period we developed a series of interactive modules that can be downloaded from our website by teachers to support the teaching of science, technology, engineering and maths (STEM) subjects. The modules also provide information on how to stay safe around electricity and be aware of the dangers presented by our assets. Downloads of these education resources have benefited approximately 66,000 school children.
- Scouts partnership -in 2015-23, we entered into a partnership with the Scouts to support the home safety badge for UK Cubs aged from eight to 10 and a half. The home safety badge teaches Cubs about safety in and around the home and encourages them to spread the potentially lifesaving messages they have learnt. Over the three-year programme 29,000 children were awarded the badge.
- Safety during the pandemic - with schools closed we launched a digital animation campaign aimed at helping parents and guardians ensure children know how to play safe, stay safe and understand the dangers of ignoring warning signs around electrical equipment. The short animation, which we trialled in August 2020 and ran again in the following October and February school holidays, called on parents to discuss with their children the importance of not climbing poles and pylons, going into electricity substations, and fishing or flying kites or drones near overhead power lines. While primarily directed at parents, the video was created in a way that meant it could be shared with children. The digital animation campaign was visible on social media more than 657,000 times and achieved more than 209,000 views.

As each new generation comes along, our safety message must be refreshed and redelivered. We therefore anticipate keeping up the pace of our schools liaison programme throughout 2023-28, when we expect to play our part in educating a quarter of a million youngsters. In the next five-year period we will continue to support initiatives designed to get our important safety messages across to children.

**Safety engagement with the agricultural community**

The public safety initiatives contained in our SHIP include communications with the farming and agricultural community in the area we serve. The agricultural industry remains a high concern with the Health and Safety Executive (HSE) due to the number of serious accidents that occur as a result of agricultural plant making inadvertent contact with high voltage overhead lines and contributing to the number of fatal, near-miss and injury-related incidents.

We have collaborated with other distribution network operators (DNOs) through the ENA public safety committee to produce a hard-hitting public safety video that demonstrates the dangers posed by working too close to overhead power lines. Our 'Look Up, It's Live!' safety packs are provided to stakeholders as part of our safety education initiative, they provide valuable advice on staying safe near power lines, as well as what to do should inadvertent contact be made. We have recently started to collaborate with agricultural machinery dealerships across our region to establish another link with the agricultural community and will be providing the 'Look Up, It's Live!' safety packs in new or serviced agricultural machinery.

We have also collaborated with the National Farmers Union to include the 'Look Up, It's Live!' information in the spring/summer edition of their magazine for farmers and the farming community.

Public safety initiatives around overhead line contact incidents will remain a continued focus for the industry as a whole and we will continue to proactively provide detailed advice on the dangers posed by overhead power lines to all interested parties.



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