PEOPLE FIRST
GO HOME SAFE

CONWAY
great people : great work

10-YEAR STRATEGY

THE BIG TEN IN 10

EXECUTIVE SUMMARY

People are our greatest asset. To achieve our vision for all people to go home each day without life-changing harm, we have identified a new 10-year strategy; the Big Ten in 10. This is a transformational approach that prioritises the greatest health and safety risks to our business; and that requires significant investment and commitment from FM Conway.

An in-depth analysis of both our business and the industry identified the gaps in our previous health and safety approach and the reliance on luck for safety, which has helped to shape the Big Ten in 10 strategy. This document identifies the Big Ten Risks, the tools required to eliminate them and the measurement controls to monitor and evaluate performance.

This 10-year strategy prioritises FM Conway's approach to health and safety to help achieve the elimination of the Big Ten Risks by 2030.

VISION

People First : Go Home Safe is our commitment to always putting people first. People are our greatest asset and we want to ensure they go home every day without any life-changing harm.

PEOPLE FIRST
GO HOME SAFE

ANALYSIS

LAGGING INDICATORS

Lagging Indicators have historically been considered a good measure of strong health and safety performance. However, reviewing historical industry and FM Conway accident data demonstrated that a high-consequence accident was possible, EVEN when all existing key performance indicators (KPIs) were green.

The Deepwater Horizon industrial incident is an example of how lagging KPIs are misleading. At the time of the explosion and resulting oil spill, they were seven years 'Lost Time Accident' free. Then suddenly, one major accident resulted in the death of 11 people.

This analysis identified that there was an element of luck keeping people safe.

RISK PROFILING

The analysis of 10 years of health and safety data, with a focus on incidents that could have resulted in high-consequence harm, allowed us to identify the weak signals as precursors to an incident occurring.

A comprehensive review across the business and workshops was undertaken, with operational teams suggesting what they perceived to be the biggest risk to life and serious harm in their work activities.

By triangulating this with industry data, a new approach to health and safety that focused only on high-consequence harm was created.

STRATEGY

The Big Ten in 10 is our 10-year strategy for eliminating the potential of the 10 biggest risks that cause life-changing harm.

Temporary Works

TEMPORARY WORKS

There will be no failure of any temporary work solution designed and installed across our projects.

Confined Spaces

CONFINED SPACES

Where it is not possible to eliminate working in a confined space, we will implement engineering controls to reduce and manage the entry process.

Safe Digging Practices

SAFE DIGGING PRACTICES

We will eradicate all avoidable utility damages from the business.

Traffic & Pedestrian Interface

TRAFFIC & PEDESTRIAN INTERFACE

We will implement engineering controls that prevent people coming into contact with our moving vehicles and plant.

Subcontractor Control

SUBCONTRACTOR CONTROL

As a minimum, we will self-deliver 90% of the works that we undertake, and where we cannot self-deliver, we will engage with subcontractors and ensure full adherence to People First : Go Home Safe.

Isolation & Guarding

ISOLATION & GUARDING

We will ensure that all fixed and mobile plant deemed to have high-risk repair and maintenance operations, will be designed or retrofitted with dual controlled, cross-monitored interlocks, where removal of guards or opening access doors will automatically make the plant safe.

Working at Height

WORKING AT HEIGHT

Where it is not possible to eliminate working at height, we will implement physical protection.

Lifting Operations

LIFTING OPERATIONS

All equipment will be purchased and designed to have safety critical controls that eliminate people coming into contact with the consequences of lifting operations.

Occupational Health

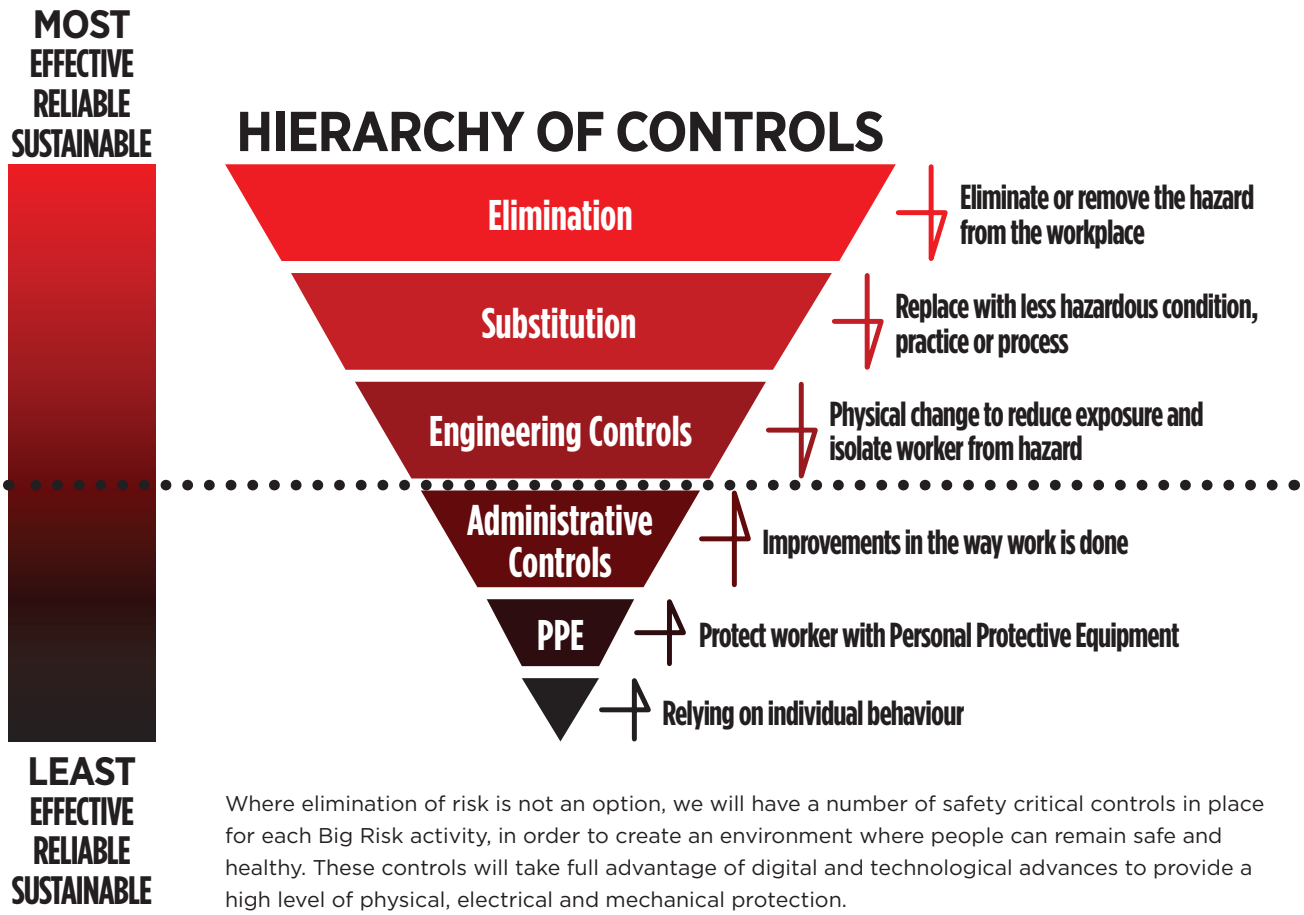
OCCUPATIONAL HEALTH

Where elimination is not possible, we will create a working environment where exposure to life-changing health risks is minimised; focusing on vibration, noise, dust and manual handling.

Occupational Road Risk

OCCUPATIONAL ROAD RISK

Through our actions, no road user will suffer life-changing harm involving our vehicles.

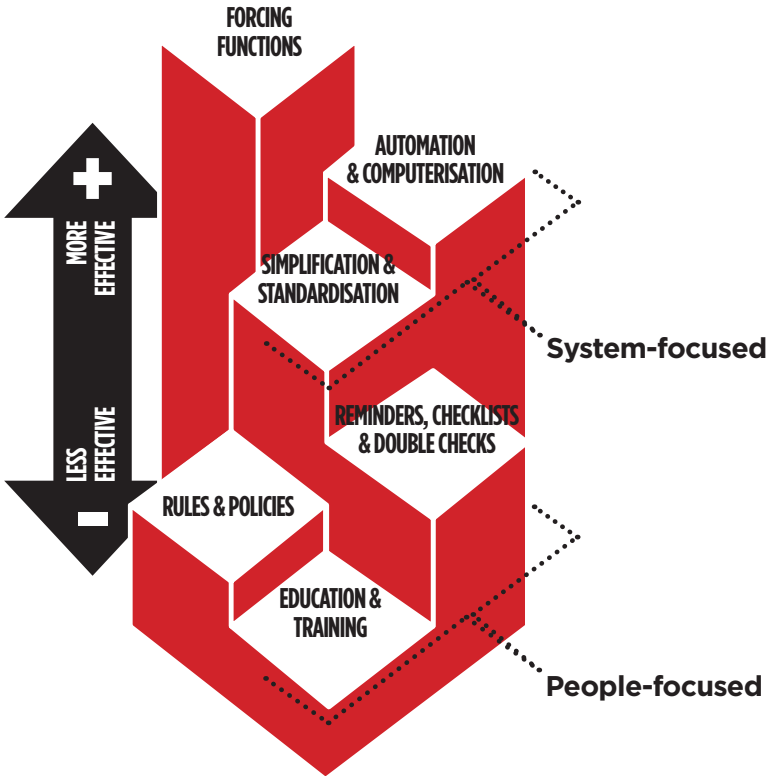


Where elimination of risk is not an option, we will have a number of safety critical controls in place for each Big Risk activity, in order to create an environment where people can remain safe and healthy. These controls will take full advantage of digital and technological advances to provide a high level of physical, electrical and mechanical protection.

HIERARCHY OF INTERVENTION EFFECTIVENESS

Moving from reactive to predictive risk management, we have considered the effectiveness of our current risk control strategy, from the reverse pyramid hierarchy of control to the practical implementation phases and most consistent controls. It is important to note that each of the steps support each other.

This enables a common ground approach, to ensure all employees apply a similar mindset to identify the right controls; and ensures a consistent quality outcome that does not rely on individual decision making, which could be influenced by other sociological and company factors.



TACTICS

LEADING INDICATORS

The Risk Profiling Analysis demonstrated the need to redirect the focus from historical Lagging Indicators to ones that measure implementation in the key Big Risk areas.

Leading Indicators are a measure preceding or indicating a future event used to drive and measure activities carried out to prevent and control injury.

We are identifying Leading Indicators, and their frequency rate within each division, across all Big Risk areas. Both corporate and divisional indicators will be set to dynamically drive improvement; with new Leading indicators introduced to the strategy as they become apparent, allowing the business to flexibly manage risk.

Below are examples of our Leading Indicators with accompanying case studies:

OCCUPATIONAL HEALTH:

The most common manual handling operations within FM Conway require the handling of paving slabs for reactive and planned works.

Reactive Works Leading Indicator -
To have 100% of reactive operatives using a Donkey slab lifter by close of 2020. The Donkey slab lifter has the ability to remove 50,000 slab handling operations a year across the business.

Planned Works Leading Indicator -
To secure investment for 80% of project work (involving slab laying) utilising Probst Jumbo lifting machines by close of 2021.

Occupational Health: https://www.youtube.com/watch?v=t8cpsGz39aI

CONFINED SPACES:

By 2023 all manhole surveys will be completed by remote means, resulting in the elimination of 20,000 confined space entries.

Confined Spaces: https://www.youtube.com/watch?v=2oGsDX_5qRo

WORKING AT HEIGHT:

By 2028, all Clamshell vehicles will be operated from the ground level and will not require access to the platform, resulting in the elimination of 80,000 Working at Height activities.
This will be achieved by a 360-degree camera live feed to remote operating position on the ground.

TRAFFIC AND PEDESTRIAN INTERFACE:

To have an automated engineering control that prevents traffic and pedestrian interface within five metres on all high-risk plant and vehicles.

Traffic and Pedestrian Interface: https://www.youtube.com/watch?v=63ukJMjfmaI

BIG RISK IMPLEMENTATION:

The Systems Big Risk Indicator tracks the 'close-out' of the Red Risk Tracker, which identifies the actions required to mitigate and prevent recurrence of high-consequence events. This is managed and monitored through our Big Risk Corrective Frequency Action Rate and as a result, low-consequence incidents are not prioritised so that attention remains on events that could cause high-consequence harm.

The Big Risk Corrective Action Frequency Rate is calculated using the following formula:

$$\text{BIG RISK CORRECTIVE ACTION FREQUENCY} = \frac{\text{No. of Red Risk actions completed}}{\text{No. of Red Risk actions on tracker}} \times \text{No. of at risk workers}$$

LIFE-SAVING RULES

Life-Saving Rules empower all people to specifically manage each of the Big Risks. With five simple rules for each Big Risk, these rules have been adapted for Operatives, Managers and Directors to support the role they each play in managing risk.

There is no reliance on these rules, but they are necessary for the next 10 years as we look for opportunities to eliminate, substitute or put in place engineering controls to ensure that people can fail safely.

Lifting Operations (includes Rope Cranes, Lorry Loader, Grabs, Clamshell, Relocate, Plant Lorries industrial Fork Lifts, Hoist ie overhead gantry) (exclude penny lift mini digger)

Operative	**Supervisor (including Crane Supervisor/Manager/SNR**	**Head of Department / Director**
Respect the designated exclusion zone and never walk under a suspended load	Ensure an **authorised person** has prepared a lift plan	Ensure an appropriate number of trained people are available across the business as identified in the organisational training matrix; having completed training as AP, SS, CS
Be briefed on lift plans and ensure Safe Working Loads (SWL) are not exceeded	Establish and maintain the designated lifting exclusion zone	Ensure **Big Risk** audits have been completed to schedule
A competent slinger signaller/ crane supervisor/crane operator (Allimi, CPCS, NPORS qualified) should perform the lift	Ensure the lift plan is followed on site	Review and take remedial action identified as weak signals from **Big Risk** lifting audits and dashboards
All lifting accessories must be tagged and in test	Establish and maintain an approved traffic and pedestrian management plan	Employees and contractors are empowered to "STOP WORK" if they feel proceeding is unsafe
STOP if the answer IS NOT YES to ALL of the above	STOP if the answer IS NOT YES to ALL of the above	STOP if the answer IS NOT YES to ALL of the above

BIG RISK ACTIVITIES

All work activities that incorporated a Big Risk with their frequency per year, have been identified which has created a framework to identify Leading Indicators. Every three years, each division will be required to submit their Big Risk improvement plan to identify which activities can be targeted for elimination, substitution or the provision of engineering control to reduce the risk.

SIMPLIFICATION AND STANDARDISATION

Reviewing the health and safety management system removes unnecessary clutter and simplifies the approach, so that there are better controls for managing health and safety effectively.

COMMUNICATIONS

Only high-consequence or Big Risk related incidents are communicated via a bulletin or alert to the business. When they are communicated, it is only to specific groups that will benefit from the information.

BIG RISK EMPLOYEE FORUMS

Employee forums have been changed to a Big Risk agenda where employees are engaged on Big Risk profiling and the frequency of Big Risk activities.

BIG RISK DESIGN

Big Risk design requires designers to consider the hierarchy of control when designing construction projects; the same applies with the procurement of fixed and mobile plant, including installation.

All design drawing and specification includes the Big Risk infographics to draw the operational teams' attention to the residual Big Risks that require additional controls.

BIG RISK SUPPLIER DAYS

Big Risk Supplier Days focus on continual improvement. By sharing the Big Ten in 10 strategy with the key supply chain, we can ensure that they will help to drive innovation.

COLLABORATION WITH INDUSTRY

Attendance and speaker slots at industry events to promote and raise awareness of the Big Ten in 10 strategy will help drive the elimination of the Big Risks.

FIVE-YEAR PLAN

The Five-Year Plan ensures that the key elements of the strategy are in place to help deliver the Big Ten in 10.

MEASUREMENT AND CONTROL

PERFORMANCE MONITORING

A new reporting system, that uses existing data sets, has been created to analyse weak signals.

Using the 'Nudge Theory', this reporting system now draws attention to the Big Ten Risks in the first instance. For example, Near Miss Reporting and Site Inspections.

All incidents are then reviewed and assigned a potential risk rating and categorised into the type of Big Risk.

BIG RISK AUDITS

Big Risk audits are severity weighted audit sheets used to confirm our Safe Systems of Work (SSoW), which are used as part of our Big Risk controls.

By continually repeating and understanding what is expected to control the Big Ten Risks through the audits, we are encouraging all to identify the weak signals and ensure appropriate controls are in place.

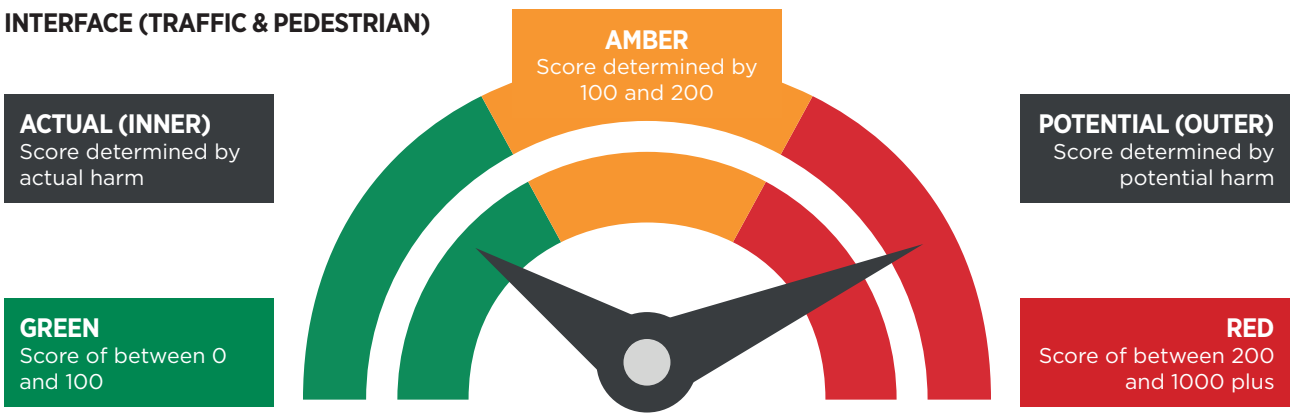
Dynamic Dashboards help to analyse the data and evidence to understand whether the appropriate risk controls are in place to manage the Big Ten Risks.

DYNAMIC DASHBOARDS

Dynamic Dashboards have been created with a focus on predictive assessment tools.

AFR and LTIFR still feature within dashboards, but no longer take precedent in monthly reviews unless they are mapped against a Big Risk. This helps in identifying historical trends against the risk categories.

Barometers help to identify the potential Big Risks on a monthly basis as opposed to actual harm recorded by Lagging Indicators. This is a predictive approach that allows focus on preventing the harm from occurring in the first place.



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CARE

As a family business we act with care and compassion

EXCELLENCE

Great people delivering great work, always

INTEGRITY

A business committed to doing the right thing

INNOVATION

Our passion is to always find a better way

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BIG TEN RISKS