

# Spirax-Sarco Engineering plc

## Spirax Sarco UK Site Manufacturing.

Greg Godfrey-Williams: UK Supply General Manager



BUSINESS SUPPORT • ONLINE • IN PRINT • IN PERSON



13<sup>th</sup> March 2023 Welcome

**09.30 Arrival, welcome coffee/tea**

**10.00 Introduction C2S**

**10.05 Introduction and safety moment.**

- **Spirax Overview**
- **Sustainability Focus**

**10.40 Tours**

1. **Students** (*no PPE required*) meeting Spirax colleagues, apprentices and graduates for discussion career journey. *Tour of Tech centre and Assembly hall.*
2. **Business leaders** (PPE required) tour of factory follow process from start to finish.

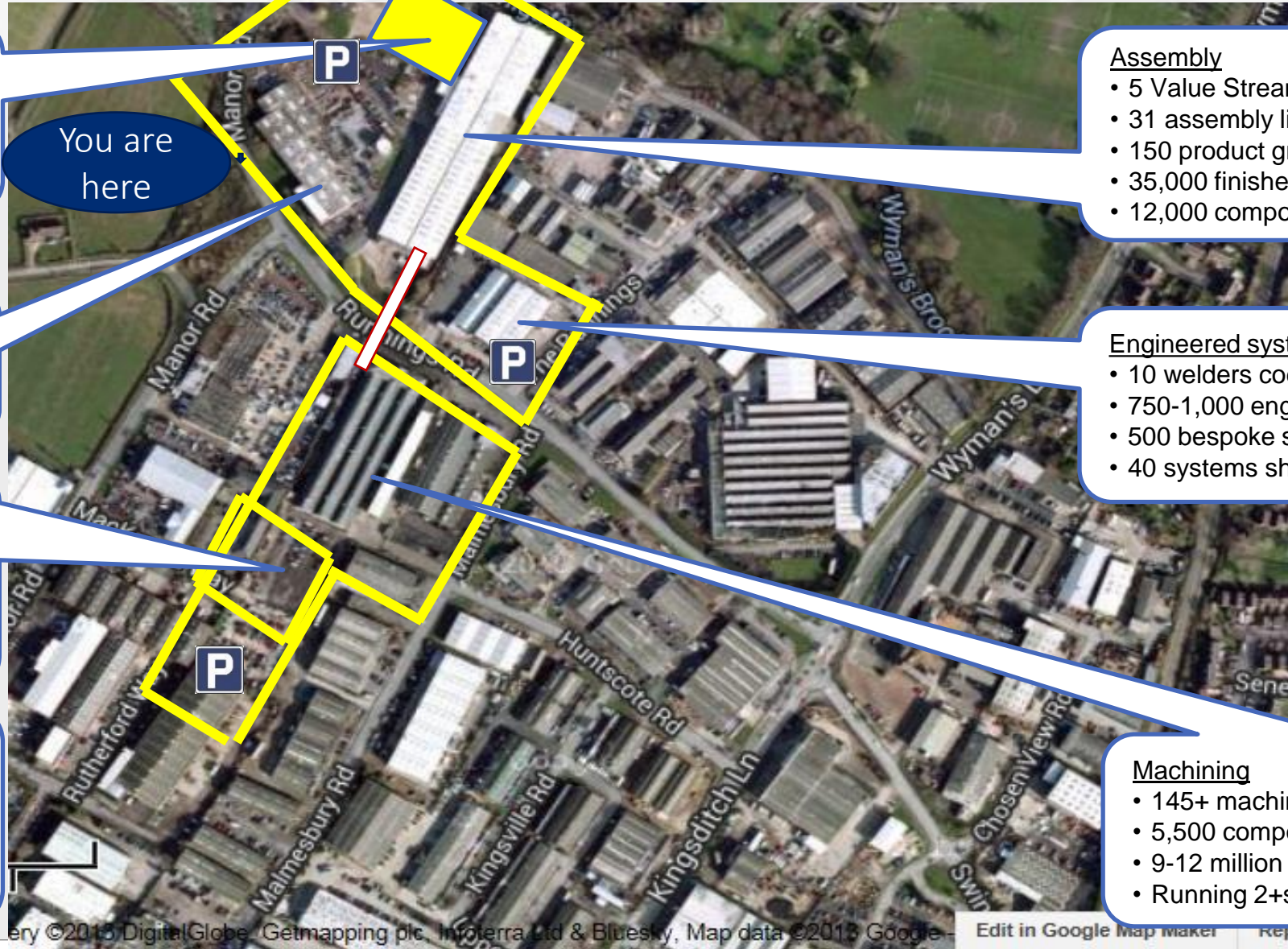
**12.00 Tour ends**

**Wrap up summary and Buffet lunch.**



# UK Supply Footprint and Overview

Spirax-Sarco Engineering plc



## Distribution

- 2450 parts stocked
- 35,000 product variances
- 500T per mth shipped
- 90+ Countries supplied

You are here

## Steam Business Development

Research and new product developments

## Good Receive Bay (GRB)

- Stock £4.3m
- Floor space 3,380 m<sup>2</sup>
- Storage; raw castings, forgings, bar.

## UK Supply

- 5 week order book
- 64,000 m<sup>2</sup> total site
- 23,000 m<sup>2</sup> buildings
- 580 employees
- £100m+ turnover pa

## Assembly

- 5 Value Streams
- 31 assembly lines
- 150 product groups
- 35,000 finished part numbers
- 12,000 component part numbers

## Engineered systems (ESMU)

- 10 welders coded to nuclear standard
- 750-1,000 engineered systems per year
- 500 bespoke systems/yr
- 40 systems shipped flat pack to Asia/Pac/Yr

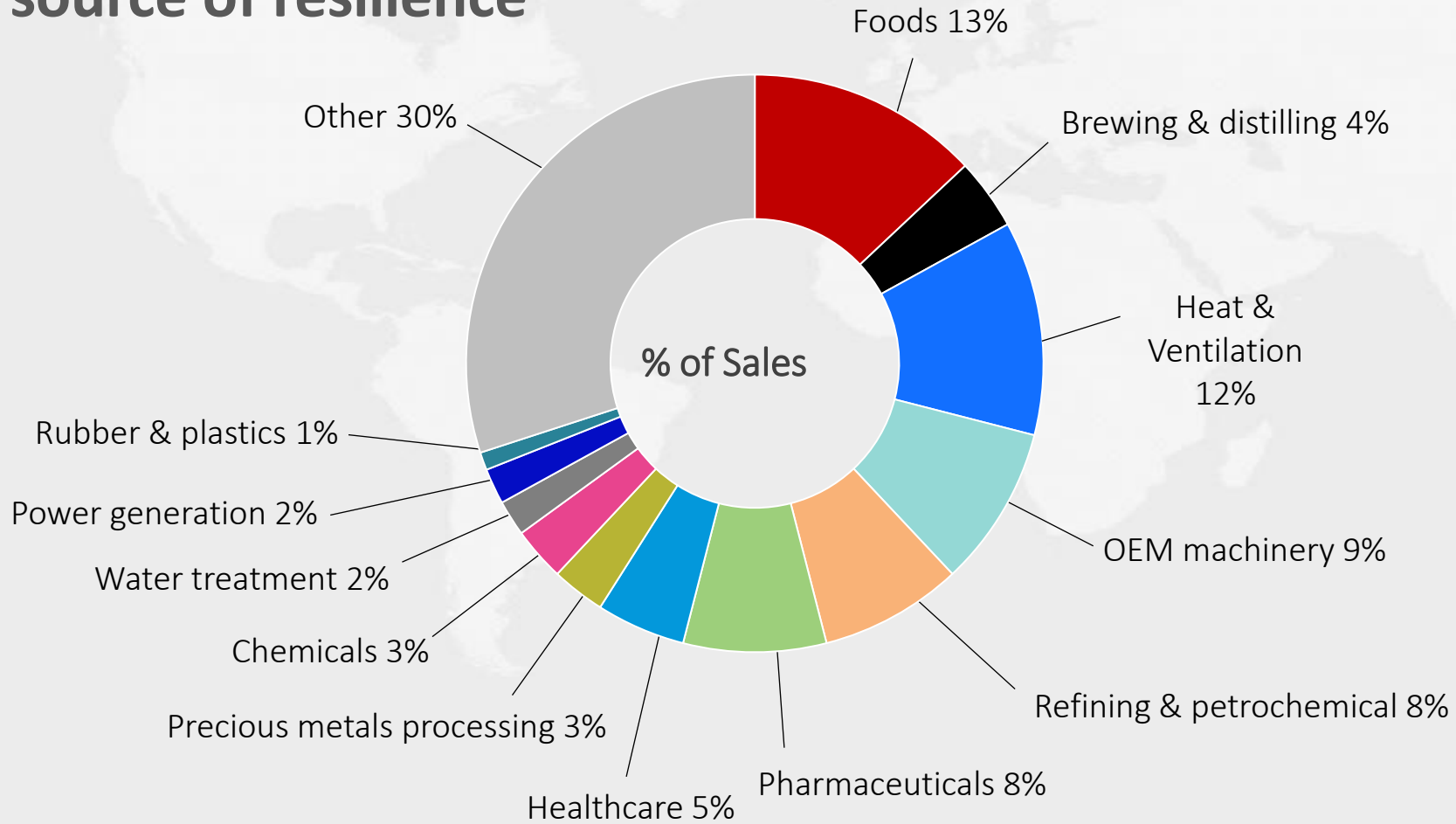
## Machining

- 145+ machine tools
- 5,500 component part numbers
- 9-12 million components made per year
- Running 2+shifts

©2015 DigitalGlobe, Getmapping plc, InfoTerra Ltd & Bluesky, Map data ©2015 Google - Edit in Google Map maker

# Diverse markets and broad customer base

## A source of resilience



Largest industry segment 13% of sales and no single customer greater than 1%



Introduction to *One Planet: Engineering With Purpose* Sustainability Strategy

# Our Purpose



**Our Purpose** – Create sustainable value for all our stakeholders as we engineer a more efficient, safer and sustainable world.

## Our Sustainability Mission

To become a global leader in industrial sustainability by operating responsibly and leveraging our expertise and influence to deliver solutions that address global sustainability challenges.







# Welcome

Sustainable Packaging and Biodiversity | Spirax Sarco Engineering PLC



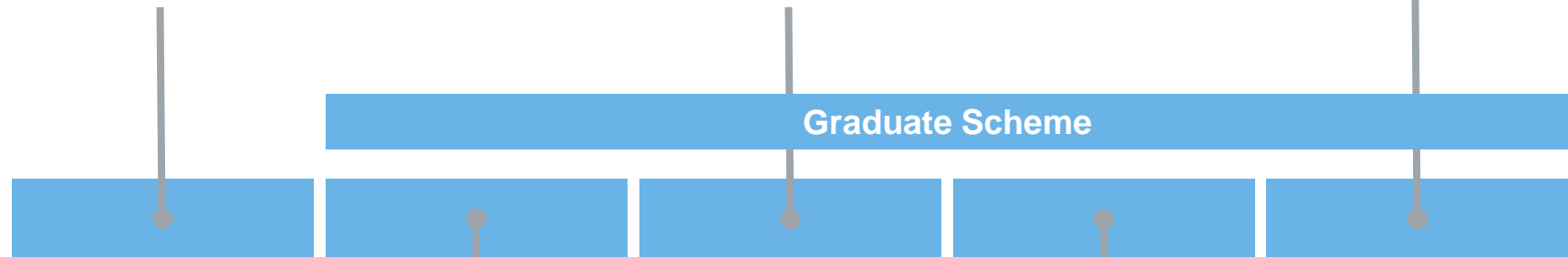
# Ashleigh Robinson

Business Development Manager, EMEA, Chromalox

Year in Industry, SBD  
*2018-2019*

Sales Excellence, EMEA  
*March 2021-Oct 2021*

Business Development, CHX  
*March 2022- Oct 2022*



Product Development, UK Supply  
*Sept 2020-March 2021*

Pilot Packaging Project, UK Supply  
*Oct 2021- March 2022*

Graduate Scheme

# Introducing our Cheltenham Company

## So what do we do?

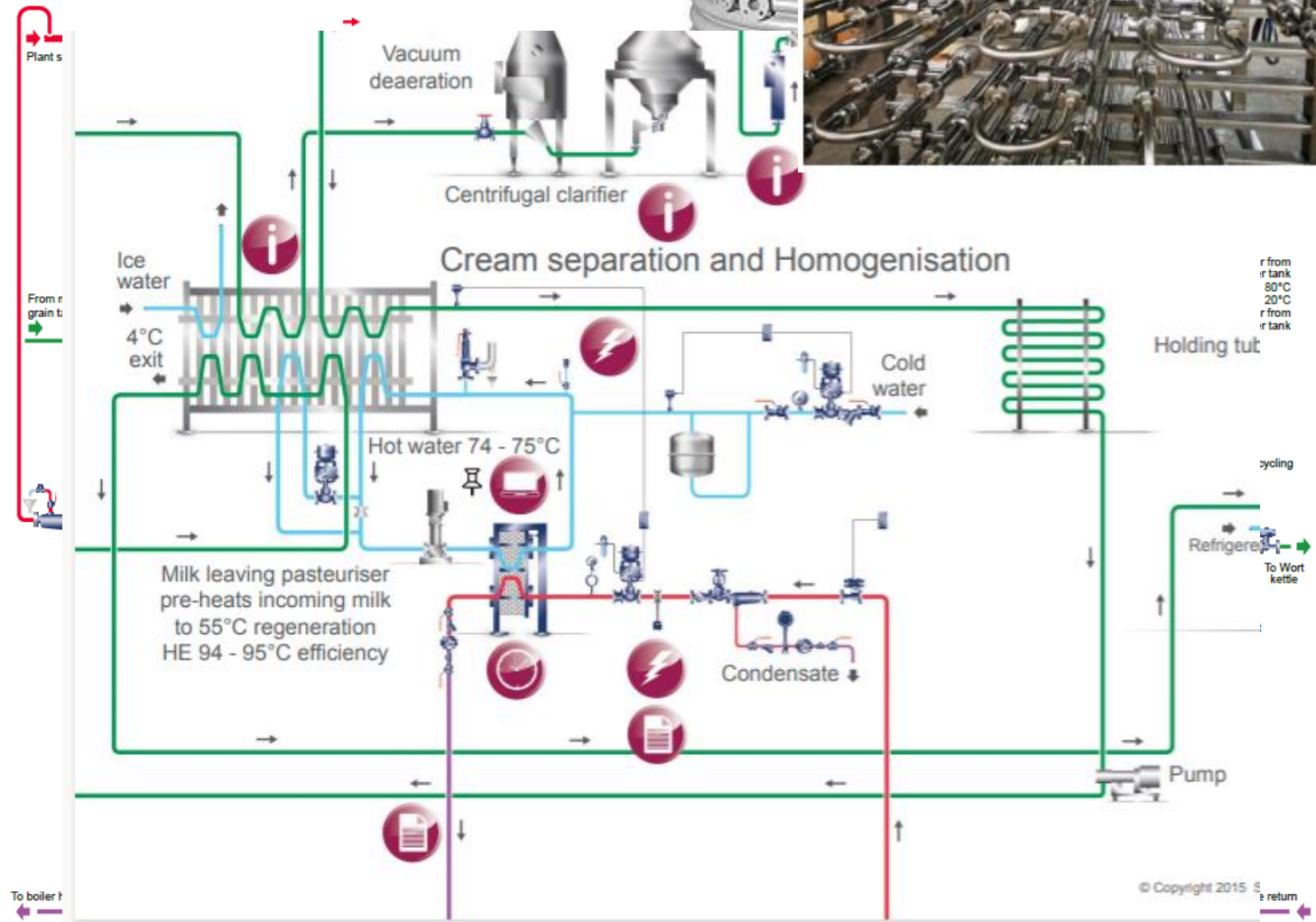


First for Steam Solutions

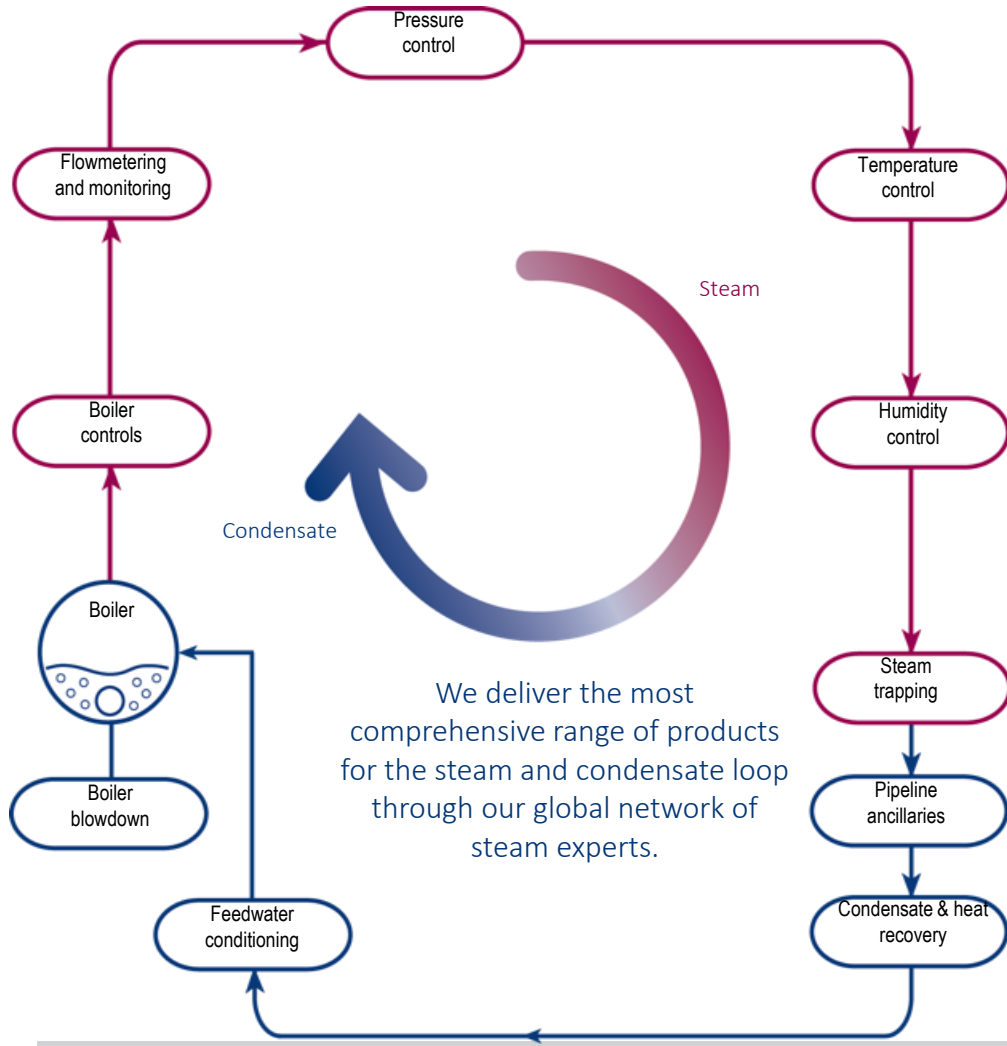


# spirax sarco

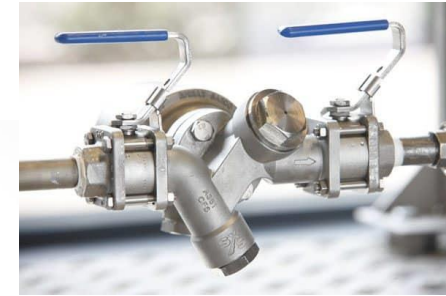
First for Steam Solutions



# Our Products



We deliver the most comprehensive range of products for the steam and condensate loop through our global network of steam experts.



## UK Supply | Manufacturing

Runnings Road, Kingsditch Trade Park



## UK Sales | Sales Company

Northcroft House, Charlton Kings



## Spirax Sarco Engineering PLC | Head Quarters

Charlton House, Charlton Kings



Spirax-Sarco Engineering plc

Thermal Energy Management

Steam  
Specialties

**spirax**  
**sarco**  
First for Steam Solutions

**GESTRA**  
Engineering excellence

industrial and commercial  
steam systems

[www.spiraxsarco.com](http://www.spiraxsarco.com)  
[www.gestra.com](http://www.gestra.com)

Electric Thermal  
Solutions

**CHROMALOX**  
Advanced Thermal Technologies

**Vulcanic**

**DUREX**  
INDUSTRIES

**THERMOCOAX**

electrical process heating  
and temperature  
management solutions

[www.chromalox.com](http://www.chromalox.com)  
[www.thermocoax.com](http://www.thermocoax.com)

Watson-Marlow

**WATSON**  
**MARLOW** Fluid  
Technology  
Solutions

niche peristaltic pumps  
and associated fluid path  
technologies

[www.wmfts.com](http://www.wmfts.com)

**ONE PLANET**  
ENGINEERING WITH PURPOSE

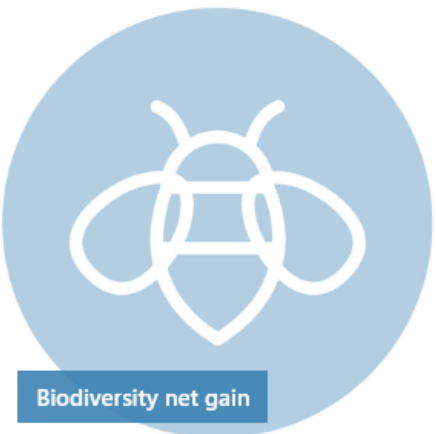
Our purpose at  
Spirax-Sarco  
Engineering is to  
create sustainable  
value for all our  
stakeholders as we  
engineer a more  
efficient, safer and  
sustainable world.

# One Planet – Sustainability Strategy

What are our focuses?



Net zero carbon



Biodiversity net gain



Environmental improvements



Sustainable products



Supply chain sustainability



Community wellbeing

**Reach Net zero by 2030**

**Deliver a biodiversity offset equivalent to the footprint of our global ops by 2025**

**Reduce water consumption by 15% by end of 2025**

**Eliminate all non-recyclable, non-biodegradable or virgin packaging by 2025**

**Embed sustainability criteria in all new supplier and purchasing qualification by 2023**

**Deliver 150,000+ hours of employee volunteering by 2025**





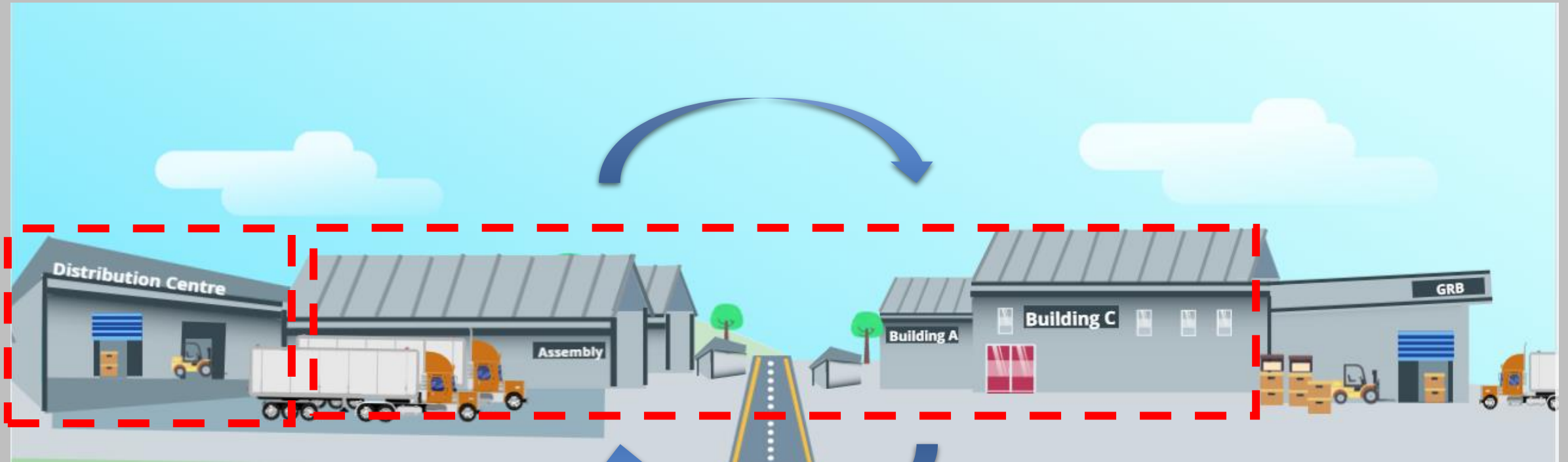
**ONE PLANET**

ENGINEERING WITH PURPOSE

**SUSTAINABLE PACKAGING INITIATIVE  
THE STEAM SPECIALTIES PILOT**

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# Our Manufacturing Site



UK SUPPLY  
RUNNINGS ROAD

# The Why?

October 2020 to September 2021

## Plastic Packaging Used



98,000kg of plastic



200,000m<sup>2</sup> of plastic



250,000 kg Co<sub>2</sub>

## What does that mean..



568,000 iPhones



27 International Rugby Pitches



Run 1010 Teslas for a year



- Paper Usage - 2520 kg
- 282 000 kg wood crushed and chipped

# What are our focuses?



Introduction of Paper Tape



Paper Document Enclosed Envelopes



Eliminating the Use of Pallet Wrap Internally



Replacing Wood in Shipments



Alternative Flange Protectors



Cardboard Pallets



Standardised Crate/Box Packaging



Reduction of Paper Use in the Warehouse



STS17 & CTM plastic packaging



Sustainable Spares/Parts Bags



Replacing Plastic Banding (Parcels <20kgs)



Replacing Plastic Banding (Primary Packed DPs)



Plastic Banding Recycling



Reuse of Received Pallets

# Plastic Tape



What are we looking to replace?



What is it used?

- All Domestic and Export Parcels
- Some Primary Packaging



# THE FACTS

The current product contains plastics, in fact annually, it is:

 **24900 m<sup>2</sup> /year**

That's the same as:



**Area of 21 Olympic Swimming Pools**

Or equivalent to:



**Heating a house for 21 Years**

By implementing our new solution, we will reduce the amount of plastic we use by:



**100%, and less rolls of paper tape required**

# Our Solution



Paper Tape



Benefits

- 100% Paper
- 100% Recyclable with Box
- Brandable

# Spares Bags



## What are we replacing..?

Range of Plastic Bags used in the spares and parts packaging



Replacing our plastic bags for our parts with cardboard and paper alternatives

## Where is it used?

- Most product lines
- All spares lines



# THE FACTS

The current product contains plastics, in fact annually, it is:



**22,000 m<sup>2</sup>**

That's the same as:



**Surface Area of 18 Olympic swimming pools**

Or equivalent to:



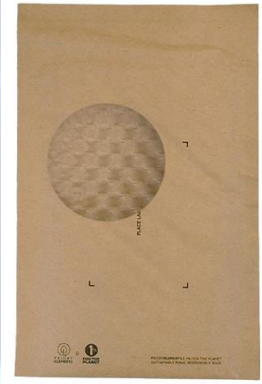
**Area covered by 1 mile of dual carriage way**

By implementing our new solution, we will reduce the amount of plastic we use by:



**> 90% a year**

# Our Solution



Benefits  
100% Recyclable  
Made from Recycled Material



# Pallet Wrap (Internal Use)



What are we replacing..?

Use of pallet wrap to transport



Find a re-usable solution for transporting our items internally.

Where is it used?



- Across and between all three scopes

# THE FACTS

The current product contains plastics, in fact annually, it is:



54,250 m<sup>2</sup>

That's the same as:



Surface Area of 43 Olympic swimming pools

Or equivalent to:



Annual Output of 430 household solar panels

By implementing our new solution, we will reduce the amount of plastic we use by:



100%

# Our Solution



Benefits

- Re-usable
- Easy to Store
- Long life span
- Repairable
- Easy to use

# Paper Documents Enclosed

What are we replacing..?



Plastic Document Enclosed

What are they used?

- All Domestic and Export Parcels
- Envelopes for some product IMIs

## THE FACTS

The current product contains plastics, in fact annually, it is:

 **1119 m<sup>2</sup> /year**

That's the same as:

 **6 Tennis Courts**

Or equivalent to:

 **35 Hour Flight**

By implementing our new solution, we will reduce the amount of plastic we use by :

 **100% a year**

## Our Solution



**Paper Document Enclosed**

Benefits

100% Paper

100% Recyclable with Box



# Paper Banding



What are we replacing..? *Plastic Banding*



Replacing our plastic banding with paper banding alternative

## What is it used?

- All Domestic and Export Parcels
- Some Primary Packaging

# THE FACTS

*The current product contains plastics, in fact annually, it is:*



**2064 m<sup>2</sup> /year**

*If we look at how much CO<sub>2</sub> is emitted to produce 1kg of plastic, that's equivalent to:*



**8900 Kg<sub>CO2</sub> / year**

*Which in Kwh output of an average power station of :*



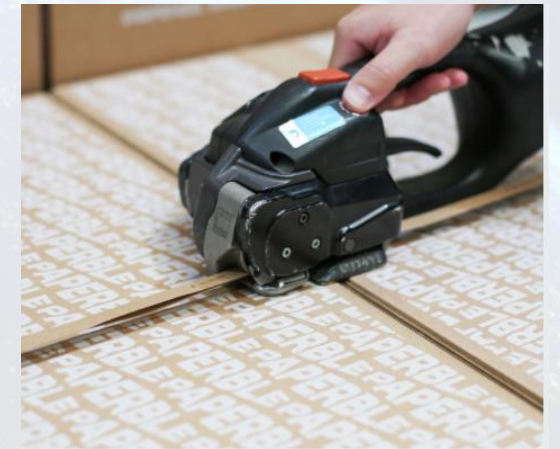
**Running 36  
Teslas a year**

*By implementing our new solution, we will reduce the amount of plastic we use by :*



**100%**

# Our Solution



## Benefits

100% Paper

100% Recyclable with Box

# Sustainability Coffee Morning

**Digitise work order, currently received 200 pieces of paper a day!**

**Tap leaking around sites**

**Netlon plastic netting wasted on daily basis and becomes unfit for use leading to further waste. Is there something else we can do?**

**Constant air leaks in compressor lines causes wasted energy as compressors constantly recharging. Air lines need maintenance**

**Large amount of scrap/waste around the business due to fixable errors. Make a initiative to educate and address**



# The Impacts

So far, annually..



20,000kg of plastic



88,000m<sup>2</sup> of plastic



47,100 kg Co<sub>2</sub> reduction

What does that mean..



16, 100 Laptops



12 International Rugby Pitches



Run 190 Teslas for a year

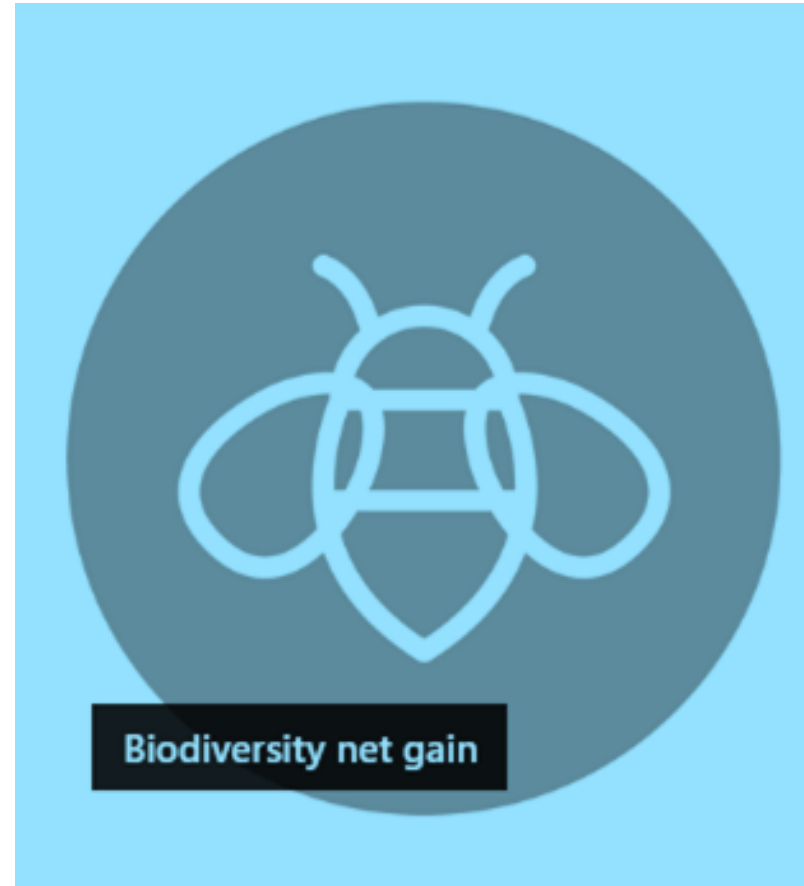
£18, 000\* Cost Savings

\*Based on Tape, Document Enclosed, Banding, Pallet Wrap and Paper Save



- Reduced paper use by 2520 kg
- 282 000 kg wood reused
- 1000 kg plastic we receive, recycled

# Biodiversity



**New partnerships with local communities  
focusing on environmental sustainability**

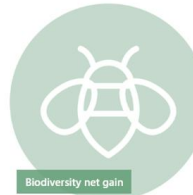
**Creating or restoring habitats**

**Raising awareness and providing  
opportunities for biodiversity**

**Reducing the environmental impact of our  
plants and sites**

# Biodiversity net gain

What are we doing locally and globally?



## UK Supply | Manufacturing

Runnings Road, Kingsditch Trade Park



CONFIDENTIAL | and/or source information

# Biodiversity net gain

What are we doing locally and globally?

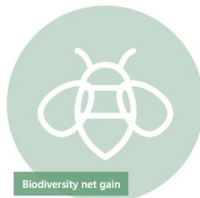
**UK Supply | Manufacturing**  
Runnings Road, Kingsditch Trade Park



# Biodiversity net gain

What are we doing locally and globally?

**UK Supply | Manufacturing**  
Runnings Road, Kingsditch Trade Park

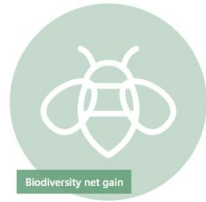


CONFIDENTIAL | and/or source information

# Biodiversity net gain

What are we doing locally and globally?

**UK Supply | Manufacturing**  
Runnings Road, Kingsditch Trade Park



## Malaysia

## Thailand

## South Africa



CONFIDENTIAL | and/or source information



# THANK YOU

Pilot Packaging Project | UK Supply | Ashleigh Robinson

# One Planet: Engineering with Purpose

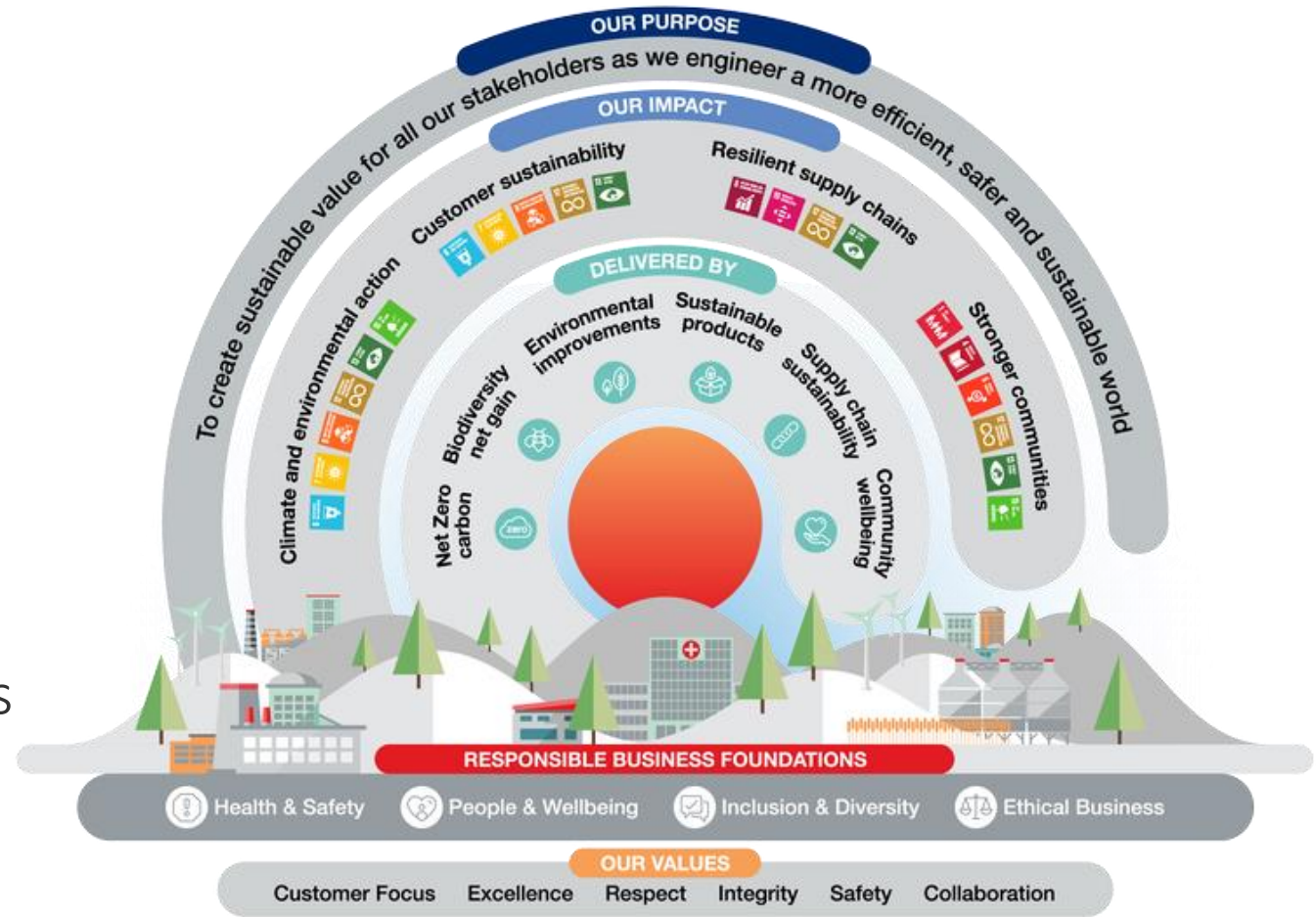
Delivering our Vision and Mission through our Group Sustainability Strategy

Through **six** strategic initiatives we will deliver:

- Climate and environmental action
- Customer sustainability
- Resilient supply chains
- Stronger communities

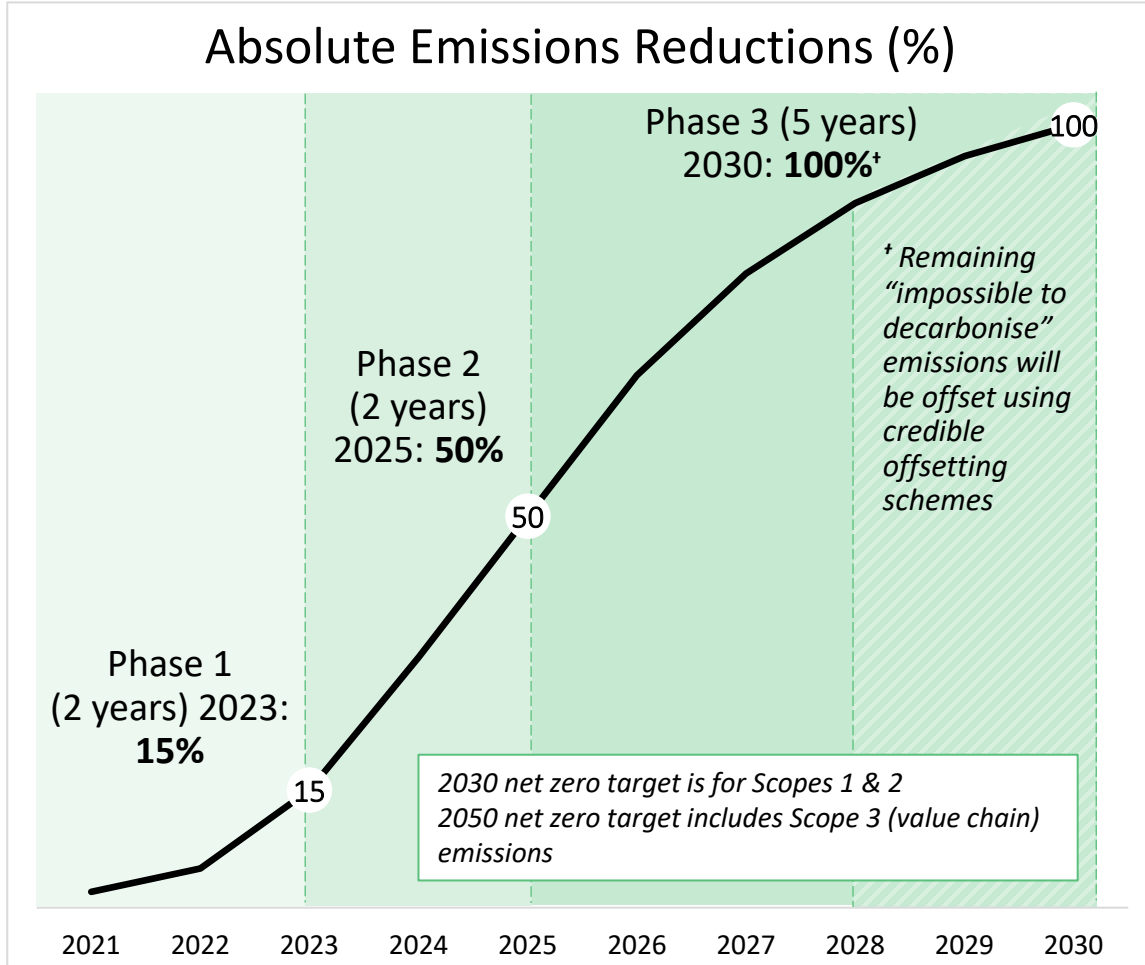
to achieve our Company purpose.

We are acting today to meet the world's sustainability challenges because we only have **One Planet**.



# Strategic Initiative 1

## Deliver Net Zero Greenhouse Gas Emissions

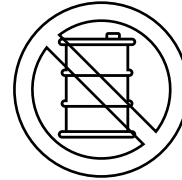


### 4 key activities & 2025 targets:



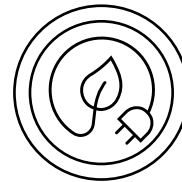
#### Reduce energy use

30% reduction in Group energy use from plant, equipment and building assets by 2025



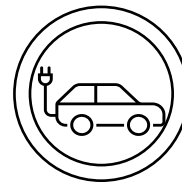
#### Decarbonise industrial processes by substituting fossil fuels for green electricity

50% reduction in Scope 1 and 2 GHG emissions by 2025, compared to a 2019 baseline



#### Transition to green energy contracts and renewable generation

80% of electricity sourced or self-generated from renewable sources by 2025

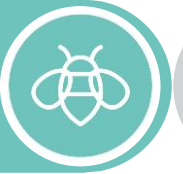


#### Reduce travel and transition to electric vehicles

60% of vehicle fleet to be electric by 2025 & a 15% reduction in travel (Scope 1)

## Strategic Initiative 2

### Deliver Biodiversity Net Gain



35

**Protect and restore biodiversity**, delivering a 10% net gain on our operational footprint by 2025



**Charitable partnership** to deliver a biodiversity offset 5x our global footprint



Deliver **biodiversity net gain of +10%** for all new manufacturing sites and facilities



Operating Companies to deliver **at least one biodiversity improvement on each site** or in the community by 2025



**Manage** our manufacturing operations to minimise risks to biodiversity



# Strategic Initiative 3

## Implement Environmental Improvements in Our Operations



### Water

A limited resource that is under increasing pressure.

Reduce water consumption by 15% by the end of 2025, compared to 2019



### Waste

Waste can impact the environment and wastes critical resources.

- Zero waste to landfill by 2025\*
- 10% reduction in waste by 2025, compared to 2019



### Environmental Pollutants

Some are still present in our operations creating environmental risk.

- Elimination of in-house solvent-based paint use by 2025\*\*



### Environmental Compliance

Being a leader requires proactively managing & exceeding our obligations.

All manufacturing sites certified to ISO 14001 standard or equivalent by 2025

\* Subject to regional waste processing limitations outside our control e.g. asbestos disposal

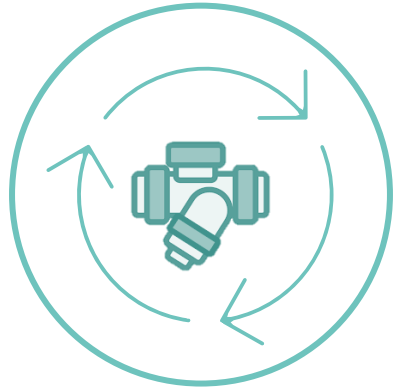
\*\* Unless mandated by customer requirements and with GEC approval

## Strategic Initiative 4

### Grow Sales of Products with Quantifiable Sustainability Benefits



37



#### Life cycle

Quantify the whole **life cycle** footprint and **sustainability benefits** of **selected existing** and **all new** solutions



#### Sales growth

Grow sales of solutions with **quantifiable sustainability benefits** to **customers**



#### Packaging

Eliminate all **virgin, non-recyclable** or **non-biodegradable packaging** by 2025



#### Knowledge

Increase and improve **market intelligence & Voice of Customer** around **sustainability**

*By embracing engineering with purpose and increasing our focus on the environmental impact and performance of our solutions, we can contribute to a better world now and for future generations.*

# Strategic Initiative 5

## Embed Sustainability Criteria in Supply Chain Management



Supply chain sustainability is critical for a healthy, lower-risk, high-performing supply chain



Define, identify and engage high-risk & strategic suppliers  
Introduce a **supplier sustainability monitoring platform**  
Refresh our **Supplier Sustainability Code**  
Include supplier sustainability criteria in supplier selection and standardise sustainability auditing of key suppliers

**80%**  
Suppliers  
confirmed as  
compliant by  
2025

**100%**  
Suppliers  
confirmed as  
compliant by  
2030



**Reduce our Scope 3 greenhouse gas emissions** from relevant emissions sources Category 1 (purchased goods and services) and Category 4 (upstream transport and distribution)

**25%**  
Reduction in carbon  
footprint by 2030

# Strategic Initiative 6

## Support the Wellbeing of People in our Communities



*Community engagement: All activities or charitable donations designed to have a positive impact on our local communities*

### Four principal mechanisms:



Company cash donations



Company in-kind donations



Colleague donations



Employee Volunteering

All colleagues are entitled to **three days of paid volunteering leave** each year

### Targets



- 150,000+ hours of employee volunteering by 2025



- >90% of colleagues to complete at least 1 day of volunteering per year by 2025



- £2 million of cash or in-kind donations (cumulative) made by our Group Companies by 2025

- Establish an Education Fund and donate at least £5 million by 2030





# Examples of some of the actions taken

40



- Removed solvent based paints from our process
- Removed environmentally harmful chemicals
- 100% renewable energy contracts
- Focused on packaging waste
- Reduction on consumption; water, energy.
- Recycle/repurpose
- Zero to landfill
- Removed gas powered CHP, converting to renewable electrical supply.
- Investments made with environmental benefits
- Fix and maintain leaks (air, water)
- LED lighting
- Biodiversity projects
- Sourcing decisions
- Involved everyone; 'everyone included'

*"Many little actions collectively make a meaningful difference"*

# Questions?



# C2S South West Business Awards 2023

In recognition of excellence in business and to celebrate  
individuals and organisations' success

Venue: Manor by the Lake, GL51 6PN

**Wednesday, 21st June 2023**



Proud to be working with the South West, Worcestershire, and Midland's leading businesses

[www.c2sbusinessawards.co.uk](http://www.c2sbusinessawards.co.uk) | [info@circle2success.co.uk](mailto:info@circle2success.co.uk)

# C2S South West Business Awards 2023

## 10 Categories to Enter

Sustainability Award  
Leadership Award  
Talent, Training and Development Award  
Employee Engagement Award  
Culture & Diversity Award  
Community Award  
Growth Award  
Employee of the Year  
Employer of the Year >15m  
Employer of the Year 15mil+



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**J U I C E**

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# C2S South West Business Awards 2023

**Sponsorship Opportunities Available**

Headline Sponsor  
Category Sponsors  
Event Programme Sponsors



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# C2S Leadership Month

## 4 Business Critical Topics

Culture and Employee Engagement  
Sustainability  
Leadership  
Brand & Marketing

6<sup>th</sup> March – 31<sup>st</sup> March





BUSINESS SUPPORT • ONLINE • IN PRINT • IN PERSON

# C2S CHARITY GOLF DAY

Friday 21st April 2023

Brickhampton Court Golf Complex  
Gloucester GL2 9QF

Golf: 9.00am - 6.00pm

Dinner: 6.00pm - 8.00pm

**JOIN US FOR PRIZE GIVING DINNER**

## How to Get Involved

- Enter a team £340 for 4 ball
- Join us for dinner & prizes £35
- Sponsor a hole
- Donate a raffle prize
- Visit the charity showcase

Find our more: [info@circle2success.co.uk](mailto:info@circle2success.co.uk)

*All prices plus vat.*

## The C2S Charities







# Cheltenham Cricket Festival 2023

## 27<sup>th</sup> July 2023

Gloucestershire V Worcestershire

Arrival: 10:30am  
Cricket: 11am  
Buffet Lunch: 1pm  
Afternoon Tea: 4pm



**THANK  
YOU**



**spirax**  
**/ sarco**

- **We plan to tour the facility starting at Goods Receiving where our materials arrive.**
- **We shall walk the process through machining, Clean Steam Pharmaceutical facility**
- **We shall then go to our Engineered Systems facility**
- **We will tour through Assembly**
- **We will then see our Finished Goods Warehouse & Despatch.**
- **Back collaboration Rooms.**



# Health and Safety Brief

- The health and safety of employees and visitors is of primary importance.
- Therefore on the tour you will all need to have Safety shoes, safety glasses and an orange Hi-Viz
- We have no planned fire drills so if the alarm sounds please follow tour guide
- Can I ask that during the tour you stay at all times with the tour guide
- We are going into a working operational factory.
- Fork lift trucks will be in operation. Please ensure you keep away from them.
- We may have a number of machine moves taking place and we will ensure you are kept away from any risks
- During the tour you may be tempted to handle products as some of them may be hot, have sharp edges and may be covered in oil. Please avoid.
- Please feel free to ask any questions we will endeavour to do our best to answer them.
- If you wish to take pictures of the process or products we have no problem (discretionary).
- Please be respectful when taking picture of employees as permission from the employee must be sought.
- We are aiming to get you back here at 12.00
- Any questions at this point?
- Enjoy the tour.

# UK Apprenticeships

spirax  
sarco

# WE ARE HIRING

Full Time

## APPRENTICES OPPORTUNITIES

ADVANCED MAINTENANCE APPRENTICESHIP

ADVANCED CRAFT APPRENTICESHIP

ADVANCED TECHNICIAN APPRENTICESHIP

Please visit the  
website below to apply

<https://earlycareers.spiraxlife.com>  
Applications close 31st March



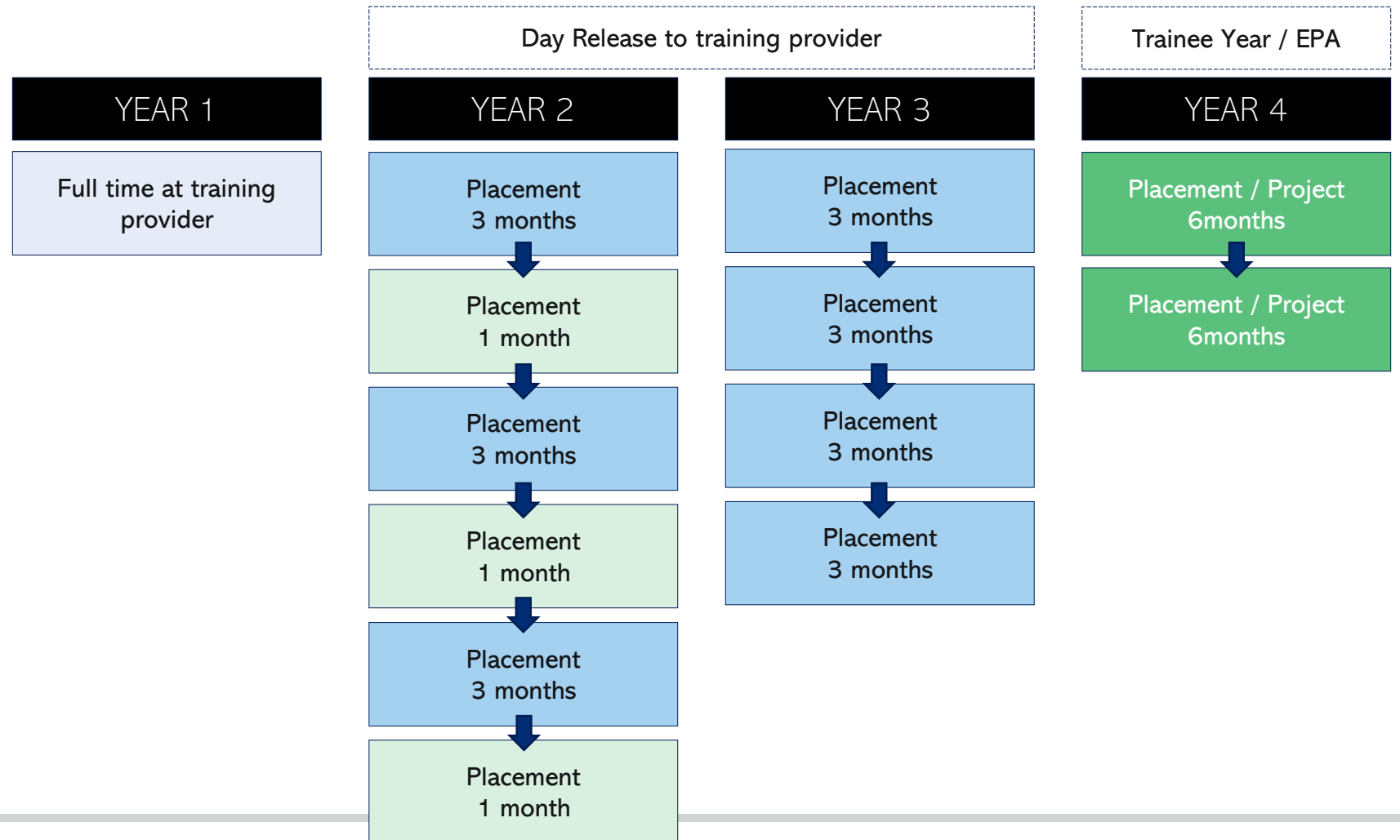
# SXS Apprenticeship Overview

## Aim:

To learn, contribute and provide exposure to the company to demonstrate the required knowledge, skills and behaviours for End Point Assessment.

## Current Offering:

- Technician
- Craft
- Maintenance
- Electrical



# The Apprentice Committee, Est 2018

- The Apprentice Committee is made up of 8 current apprentices from both the Craft and Technical fields.
- A new Chair and Co-chair are democratically elected each year from the 4<sup>th</sup> year apprentice pool.

## ORGANISATION & MANAGEMENT

- Unified voice for the apprentices to be heard.
- Reduce reliance on line managers and HR.
- Democratically lead
- Organise organisational activities – distributing workload
  - Site tours
  - Career events

## EDUCATION & DEVELOPMENT

- Drive through improvements in the apprenticeship programme.
- Organise educational visits
- Organise training
- Practice organisation & time management skills.



## MENTAL HEALTH & WELL-BEING

- Create a support network
- Mentoring programme for younger apprentices (buddy scheme)
- Arrange inclusive social events
- Engage with the wider organisation
  1. SEC
  2. Social Committee
  3. Charity Committee



YOU ARE HERE

# Business Areas



## SALES & SERVICE

We have a direct sales presence in over 60 countries, serving over 100,000 direct buying customers in 130 countries worldwide. With our direct sales channels accounting for over 70% of our global revenue, our technically-expert sales force is at the heart of our business.



## TRAINING

We help our customers identify any in-house engineering knowledge skill gaps and help to address them by offering a wide range of training courses in our 59 training centres worldwide.



## SUPPLY & MANUFACTURING

We manufacture over 1,500 core product lines globally. They encompass industrial and commercial steam system products, electrical process heating and temperature management products, and peristaltic and niche pumps and associated fluid path technologies.



## CORPORATE FUNCTIONS

Since we operate in both mature and emerging economies, in almost all industrial sectors and given our unique global coverage, we need the best Human Resources, Finance, Legal, Sourcing, Procurement, Marketing & Communications professionals to help us navigate our continued growth.



## RESEARCH & DEVELOPMENT

Through innovative R&D we continually develop and enhance our already broad range of products, pre-fabricated packages and site services so that we can continue to meet our customers' changing needs.



## AUDIT

To keep our customers' systems operating efficiently, we offer a comprehensive range of site audits, maintenance services and digital monitoring solutions.

# What we offer in return ...



Group personal pension scheme



Enhanced holiday entitlement



Private health care

Gym rates



Social & charity committee

## Company Benefits

a few of these are...

Subsidised restaurant

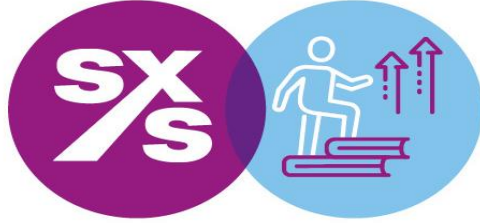


Development opportunities

Cycle scheme

Share save scheme

Life assurance



Apprenticeships

# Post-Apprenticeship Roles

We have an excellent success and retention rate, with previous learners having gone on to take up the following roles upon completion of their apprenticeship:

