

Methodology Statement

2023

Introduction

Spirax Group ('Group' or 'Company') is a multi-national thermal energy management and niche pumping specialist. Our Company Purpose is to create sustainable value for all our stakeholders as we engineer a more efficient, safer and sustainable world.

This statement outlines the processes, assumptions and estimations used when calculating our non-financial data, as included in our 2023 Annual Report and Accounts.

Scope

We employ an 'operational control' definition to outline our Company boundary. Included within that boundary are manufacturing facilities, administrative and sales offices where we have authority to implement our operating policies.

Acquisitions, mergers and disposals

For acquisitions and mergers, we report in the financial year following their first full year of ownership. If inclusion of historic data for the acquired company causes a significant change to our baseline data, data will be restated in line with our restatement parameters below.

Any disposals will be reported against until they cease to come under our operational control. Baseline data will be restated to remove disposals in line with our restatement parameters below.

Restatement

Improvements in data availability, accuracy, or changes in published emission factors, company structure or calculation methodologies may cause changes in data compared to historic published figures. We will restate historic data if these changes cause a material difference of 2% or more compared to published figures.

In line with the Greenhouse Gas (GHG) Protocol, energy and GHG historic data will be restated where a change in company structure represents a material difference of 5% or more compared to published figures. The GHG protocol does not cover other types of sustainability data, e.g. water and waste, so these types of historic data will not be restated following a change in company structure.

When restating historic data due to changes in Company structure, we will restate existing Group data to take into account improvements in data availability and accuracy, even if these improvements wouldn't have otherwise met the 2% restatement threshold.

When considering acquisitions where accurate data are not available, we will use sustainability data captured in the new acquisition's first full year of ownership and extrapolate historic years' data based on annual revenues.

General: Greenhouse gas reporting

For all entities we have measured and reported on our relevant scope 1, scope 2 and partial scope 3 emissions for 2023. We have used the GHG Protocol Corporate Accounting and Reporting Standard and emission factors from the UK Government's GHG Conversion Factors for Company Reporting 2019, 2020, 2021, 2022 and 2023 data from the International Energy Agency 2019, 2020, 2021, 2022 and 2023, ISO 140064-1, and regionally specific Environmental Reporting Guidelines to calculate our total CO₂e emissions figures on a location-basis.

Scope 1 and 2

To report under the market-based method we have used the GHG Protocol data hierarchy, striving for the highest precision possible. For sites with green energy contracts, we have obtained emissions factors for the relevant tariff and/or supplier in the first instance, using the residual mix where supplier-specific emissions factors (SSEFs) are not available. For sites without green energy contracts, we follow the data hierarchy and apply location-based factors only where SSEFs or residual mix are not available. When entering new green contracts, we apply SSEFs (where available) from the start of the year and do not restate prior years with SSEFs. No certified green energy contracts are included in our market-based figures for 2019 or 2020.

Scope 3

Scope 3 calculations were completed in accordance with the Greenhouse Gas Protocol and ISO14064, as the standard recommended by the Science Based Targets initiative (SBTi), and in conjunction with third-party consultants Sphera.

The emission factors are extracted mostly from Sphera's software and database Sphera Managed LCA Content. Sphera Solutions GmbH, Leinfelden-Echterdingen, Germany. Further databases include DIN EN 16258, Energy Information Administration (IEA) and the US Environmental Protection Agency (EPA).

The respective data is evaluated with the impact measurement category GWP100 (according to IPCC AR5), excluding biogenic carbon, including climate carbon feedback:

- GWP means Global Warming Potential = measure of how much heat a greenhouse gas traps in the atmosphere up to a specific time horizon, relative to carbon dioxide
- A GWP is calculated over a specific time horizon, so here we analyse the 100-year time horizon global warming potential
- IPCC AR5 is the Intergovernmental Panel on Climate Change's (IPCC) Fifth Assessment Report
- Excluding biogenic carbon means that a credit for the carbon storage is excluded for the observed timeframe of 100 years, as we expect that it will be released during this time (some materials bind CO₂, such as timber)
- Factors include the climate carbon feedback of non-CO₂ gases.
- More information can be found here:
https://www.ghgprotocol.org/sites/default/files/ghgp/GlobalWarming-Potential-Values%20%28Feb%2016%202016%29_1.pdf

The following categories have been excluded from our Scope 3 calculations:

Scope 3 Category	Information/Documentation
Category 8 - Upstream leased assets	Spirax Group does not have leased assets to be allocated into this category.
Category 9 - Upstream Transportation & Distribution	This category is excluded, Spirax Group arrange and pay for all transportation from sites and therefore have no upstream transportation and distribution emissions.

Category 10 - Processing of Sold Products	There are no products sold which (may) require further processing. Category not applicable, excluded.
Category 13 - Downstream Leased Assets	Spirax Group does not lease any items to other companies. Category not applicable, excluded.
Category 14 - Franchises	Spirax Group does not operate any franchising models. Category not applicable, excluded.
Category 15 - Investments	Spirax Group does not have investments applicable for category 15. Category not applicable, excluded.

Biodiversity

When completing our biodiversity impact assessment, a biological data search was undertaken for the 'Zone of Influence', being a 10km radius around each of the 30 manufacturing sites in the Group at that time, and Group Headquarters. In each case this included a search of freely available information on a range of ecological databases including:

- IBAT biodiversity data (Important Bird Areas)
- Ramsar Wetlands (Ramsar Convention)
- Local fauna and flora legislation, policies and local development plans where freely available in the public domain in English
- Global Biodiversity Information Facility • Birdlife International's Data Zone
- The Global Invasive Species Database
- EU Natura 2000 sites,
- Previous flora and fauna studies conducted for the site or surrounds, if any
- Management plans for any protected areas within the 10km buffer if available
- Global Forest Watch database
- The List of Wetlands of International Importance
- World Database of Protected Areas (WDPA)
- Key Biodiversity Areas (KBAs)
- Alliance for Zero Extinction (AZE) sites
- IUCN Red List of Threatened Species (2019)
- Evolutionarily Distinct and Globally Endangered (EDGE) species database
- Broad-scale conservation priorities, including Biodiversity Hotspots, Endemic Bird Areas and High Biodiversity Wilderness Areas.

The data search was used to identify areas of high biodiversity value and identify whether there were any impact pathways by which our operations could affect these areas under normal or abnormal working conditions. Based on this assessment a risk level was applied to each site.

To calculate biodiversity net gain for new manufacturing sites and facilities, a method is applied based on the UK's DEFRA methodology, taking into account any locally-specific net gain methodologies. Where possible, sites are assessed before commencement of major construction work to establish a biodiversity baseline on which to base net gain calculations. If construction work had already commenced before the biodiversity net gain

commitment was established, a desktop calculation has been performed using historic maps and any other publicly available information.

Water

Where site-level data is not available for water, an agreed methodology is applied to calculate these missing data. Using consumption figures from similar sites, a per-capita average consumption is calculated each year and extrapolated to the missing sites by headcount.

Waste

Where site-level data is not available for waste, an agreed methodology is applied to calculate these missing data. Using production figures from similar sites, a per-capita average waste production is calculated each year and extrapolated to the missing sites by headcount. The assumption is made that the calculated waste produced will all be sent to landfill, in the absence of more accurate distinctions.

Customer environmental saving metrics

Our bespoke energy, water and carbon savings assessment tool models the impact of the annual sales of certain categories of products on the energy and water use of typical industrial site, with an average steam system and an average compressed air system. It calculates the reduction in fuel, electricity and water consumption resulting from reduced steam generation and increased heat recovery and the corresponding reduction in Greenhouse Gas (GHG) emissions in terms of the equivalent Carbon Dioxide (CO₂) emissions.

The model, developed in conjunction with Ricardo Energy & Environment (Ricardo), is used to calculate the typical energy savings realised by each type of product are based on the methodologies used by the Company's engineers to determine product effectiveness and efficiency, which we have validated against good practice guides on product design and case studies.

Detailed product design data is used to estimate one of the following parameters for each type of product, which are related to energy saving or usage factors:

- Avoided steam losses
- Amount of condensate recovered and reused
- Amount of flash steam recovered and reused
- Amount of steam monitored using steam metres
- Avoided compressed air generation

We have used Ricardo's technical knowledge of industrial steam and compressed air systems, impact assessment and carbon accounting to turn these methodologies into models that produce robust estimates of energy, carbon and water savings realised by installing Company products globally.

The methodology used to determine these energy, water and carbon savings has been independently assessed by Ricardo Energy & Environment. The carbon savings methodology covers the following categories of products:

Steam Specialties

- Flash Vessels
- Condensate Pumps
- Steam Traps
- Steam Meters
- BSA Bellows Sealed Stop Valves
- EasiHeat Heat Exchangers
- Smart Positioners
- Electric and Pneumatic (EL+PN) Controls
- Pressure Regulation Controls
- Safety Valves
- Steam Separators
- Product Insulation
- Blowdown Heat Recovery Packages
- EVC Heat Exchangers
- High Efficiency Heat Exchangers
- Modulating Level Controls

Watson-Marlow

- Certa Pumps

Electric Thermal Solutions

- TargetZero Steamvolt
- TargetZero Electrofit
- TargetZero Steam Battery

Only products that deliver savings that can be quantified with reasonable accuracy were included. The energy, water and carbon savings are based on the latest available regional emission factors. It should be noted that customer savings vary year-on-year due to changes in product mix and changes in regional emissions factors.