

Scaling Sustainability with SAP

Harnessing ESG Data, Cloud ERP and AI to drive Sustainable Business

Eamon Fenwick, Sustainability Advisory APAC - SAP

PUBLIC

Disclaimer

The information in this presentation is confidential and proprietary to SAP and may not be disclosed without the permission of SAP.

This presentation is not subject to your license agreement or any other service or subscription agreement with SAP. SAP has no obligation to pursue any course of business outlined in this document or any related presentation, or to develop or release any functionality mentioned therein. This document, or any related presentation, and SAP's strategy and possible future developments, products, and platforms, directions, and functionality are all subject to change and may be changed by SAP at any time for any reason without notice. The information in this document is not a commitment, promise, or legal obligation to deliver any material, code, or functionality. This document is provided without a warranty of any kind, either express or implied, including but not limited to the implied warranties of merchantability, fitness for a particular purpose, or noninfringement. This document is for informational purposes and may not be incorporated into a contract. SAP assumes no responsibility for errors or omissions in this document, except if such damages were caused by SAP's willful misconduct or gross negligence.

All forward-looking statements are subject to various risks and uncertainties that could cause actual results to differ materially from expectations. Readers are cautioned not to place undue reliance on these forward-looking statements, which speak only as of their dates, and they should not be relied upon in making purchasing decisions.

For all recent and planned innovations, potential data protection and privacy features include simplified deletion of personal data, reporting of personal data to an identified data subject, restricted access to personal data, masking of personal data, read access logging to special categories of personal data, change logging of personal data, and consent management mechanisms.



- ESG expectations
- Sustainability a team sport
- Sustainability data journey
- ERP-centric sustainability
- Enterprise-wide approach
- Where to start

ESG expectations continue to grow



Regulatory frameworks are evolving quickly From optional to mandatory – and auditable

Global best practice for how organizations communicate and demonstrate accountability for their impacts on the environment, economy and people.

GRI -> beyond climate, to nature and other factors

The Climate Corporate Data Accountability Act requires companies in California to report their Scope 1, 2, and 3 GHG emissions.

SB253/SB261 -> SEC

CSRD will start to have impact in 2024; up to 50,000 companies within the EU need to start recording their sustainability impact.

EU CSRD -> CBAM & EU DR

Comprehensive global baseline of sustainability disclosures focused on the needs of investors and the financial markets.

ISSB – IFRS S1 & S2 -> ASRS

Regulators, jurisdictions and international standards to use TCFD's recommendations in development of climate related reporting standards.

TCFD -> ISSB

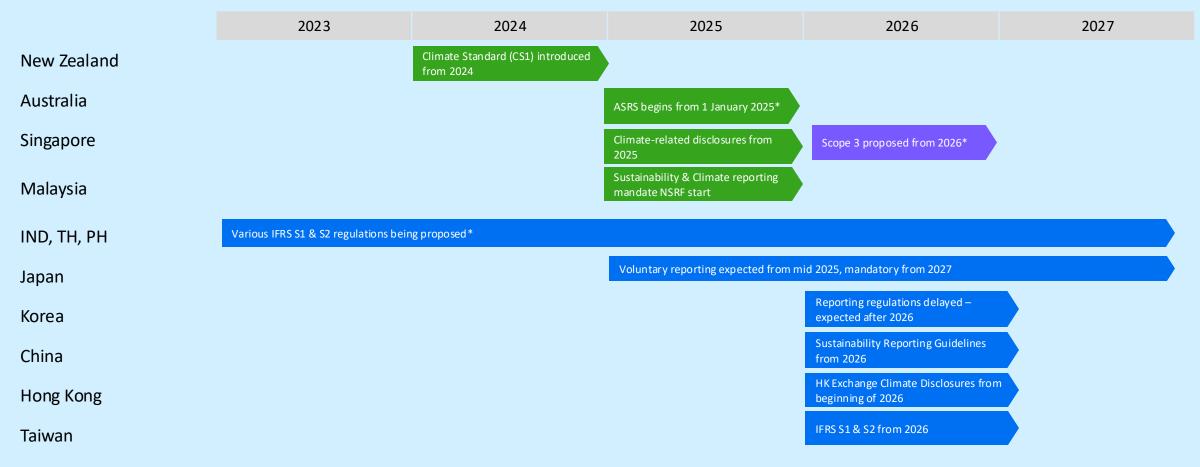
Audit-ready, granular data

Integrated reporting across carbon & financials

Simplified data management & reporting that scales as regulations evolve

Most Asian markets are implementing IFRS S1 & S2 sustainability/climate disclosures

Regulation & Proposed Introduction Date



Beyond corporate strategy & steering – perspectives by personas



compliance while efficiently transitioning to sustainable growth with aligned financial and nonfinancial metrics and goals

 $\widehat{\mathbf{0}}$

priorities

Outcomes

needed

and comply with the regulations that matter to my business

sustainability goals by embedding sustainability metrics across your supply chain

goals and outcomes

landscape; integrate sustainability data, apps and governance

Sustainability data – best practice journey

Capabilities



Sustainability Transformation

Why Cloud ERP-Centric Sustainability?



Go Beyond Reporting: Transforming Sustainability Insights into Action

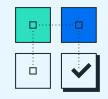


Status Reports are Only Snapshots

Last-mile, high-level reporting on sustainability metrics provides valuable information but only offers a momentary view, leaving out crucial insights into why gaps exist.

Understanding the Gaps

Achieving sustainability goals requires identifying gaps between current status and targets by uncovering root causes like inefficiencies, supply chain issues, or operational misalignments.



X

Driving Impactful Change

Closing sustainability gaps requires granular, real-time data connecting business processes and sustainability metrics for continuous monitoring, timely intervention, and improvement.

98% reduction in time needed to collect relevant ESG metrics

80% reduction in time needed to generate a draft report Automated ESG Report Generation

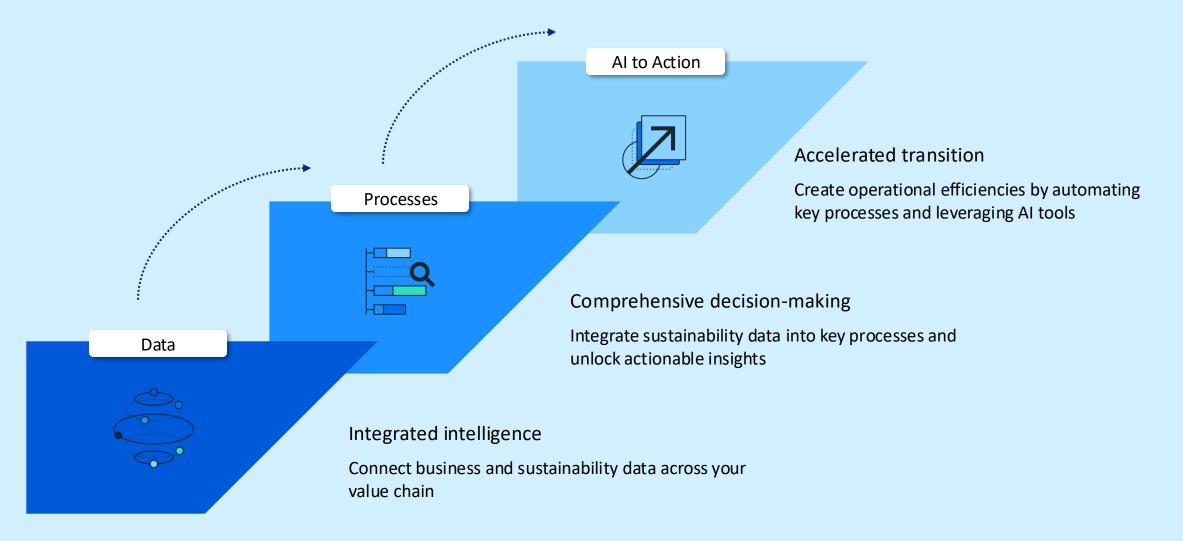
Save time & effort, while using reliable data with AI

Generate comprehensive sustainability reports with best practice templates, generative AI text, and SAP and non-SAP data



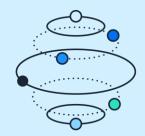
SAP Business Suite unlocks enterprise sustainability

SAP Sustainability solutions integrate with ERP and Applications drive your business forward



Integrated intelligence

Connect business and sustainability data across your value chain



Leverage and extend existing data

Break down data siloes to establish a clean core with an end-to-end sustainability data foundation.

Accelerate with AI

Streamline data preparation, automate manual processes and unlock insights with AI to enhance accuracy, minimize risks, and accelerate ESG compliance.

Audit-ready and transparent

Use granular and traceable ERP data for transparent and audit-ready disclosures, compliance and risk management.

Business capabilities





Product and Corporate carbon footprint calculation



Supply chain data exchange

(Star Passes Viewald					@ 💌
Inbounds				10	Inbounds (5)
Plantant (C)	Tester		Distance Takes		
	ø		¢ =		
Forder Change					Arithment Process
48					
		- 4			
ksboursds (322)					
# Product (D)	Napile (K)	Autory Status	Pargetet Status		
C - Prame Mole (P1204)	Bikefect (00100)	Requested	10 Zma		Footprint requested
- frame Rear Trangle (CTVD)	Bite/Sect (03420)	Provider	No Zone		This will rainfy your suggister that you reaso requireded date.
2 Beat Rube (14361)	Billio Tech (SCHOL)	Requested	No Dea		
Chairman W1201	Binefact (0x20)	Department	to Date.		View Messahl Province
(II) Parts Table (17998)	Mine Sealt (FLA.31)	Requiring	Anthrea		
Fars Qrawe-(3459R)	ForkManner (F127K)	Nor-squarter	No Date		
Distance Table (A.1008)	ParkName (F12N)	Not-reparried	No Data		
C LowerLag (1178)	PickMaster (F12N)	Requested	herdens		
C Handlahar they (2000)	HandleTech (h0875)	Destind	relat		
C Handhale Grips milling	D-lp/beak (20054)	motel	trans.		
C Handlattar Sterr (CCCP)	Deserving (18034)	(included)	. WARD		
The Assessed in Children	Carbon History (Carthol	Personal .	1004		

Comprehensive decision-making

Integrate sustainability data into core processes so you can make the right decisions in real time



Contextualized data

Connect, validate, and contextualize the highly complex and variable data sources across the enterprise to integrate sustainability into key processes and unlock actionable insights.

ERP-embedded capabilities

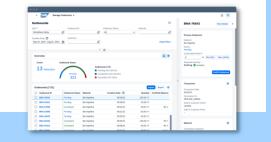
Enable quicker and more informed decisions with embedded ESG reporting, carbon accounting and environmental health & safety capabilities that support your sustainable business goals.

Ready for change

Respond to a rapidly changing sustainability landscape with Al-enabled, cloud-based solutions, enabling agile, scalable responses to regulatory and market developments.

Business capabilities





Workplace Safety



Regulatory compliance

B → D ← C → B → D → C → C → B → D → C → C → B → D → C → C → B → D → C → C → Ser		int Million Million Million
to have a set of the s		
Turnowr	Capital Expenditure	Operational Expenditure
Rea by Economic Advity		
Analy F1 The Analysis of Street Stree	Analyza and a second se	Applied pairs a pro- ant and a pro- physical provide provide provide pro- physical provide pro- physical provide pro- physical pro- tect

Carbon accounting

ChocoMagic - Cocoa has 033+ among 29.97 tornes					Bhase Reference Chai
29.97 tonnes					
Second Information Line Born					
Famaction Even		Date & Time		Quantity by Milli Emission Scope	
Journal Stray		Journal Erms Dave: Jamusty 20, 2009 211 31 PW		Score 1: E-CEDe	
Company Coloc SIXD (bernany)		Period. 1		500×2 81239	
Journal Watery Challed By: Jonan, Mark		Marcal West 2014		Totale X 20197-00326	
Line Rooms (M. Barlanda, V.					
Annual of Annual A	GHL Calegory	Codes	Gentle	Ellin Tulai Unit of Munant Cord Center	Profit Center
76202 (newstary ingradients)	32 Parihanelignals and services	27.18000	0.000	irres.	Manual Standards
752522 (newstary legesland)	3.4 Updeser Temperature and Datibutes	0.000	0.000	larrant.	Million (sherbourd)
1111 (Carloot Input)	3.1 Parchaseligents and services	6.000	2774000		Millel (derhours)
1111 (Carbon Input)	3.4 - Uptman Tumportation and Datibution	6.000	8.21242	arran	Salabal (simhwork)

Extended Producer Responsibility

Nocolate Coskies						
one lystem distancióla on thermy stricture		(5)(7)				
gertengeteren Art	ped Postaria	0.00				
terrs (8)						
Technologi (const	Participage Barrant	Sala Tren	Gardy Willing	Elling.	George Sprains	
hinay	Chandian Cashin Inlay PLUMUMUMUM	Jan 1, 303	and the state	15	Energi Tar	
	Chautine Control Plan Physical (Chautine Plan)	Art 1,000	100 Peor 1		E-months.	
hit primes	Obsorbine Codeling Leaver part of Res Ph. (2011) 481, 481	Art 1, 2020	100 Page 1	10	Energiette	
	Channing Costiles Upper part of Res PE_CON_URP.001	.lar.1, 303	100 Para 1	N	Entered Tax	
In amile y	Chaudule Carlon Carlon (N_1010_Link_01)	Jar 1, 200	20 Perc 4	16	Edward Ter	
	Athene Tape PE_IEE_TAP_IEE	Ar 1.80	28 4 1	10	Eramitin .	
Satury Rangest	Palat 19,709,00,00	Arc1, 202	100 Para		Enternal/Tax	
	Real-Six PURCEUR	Jar 1,300	28 -		Edward/Te	
vigred Products						
Den (C)						
Total		Paragement Retail/Frank	Report NCS: US differen		Source Summ	
Tarbo d'Alfred d'Estate		Arc. 107	Do D THE Data (also		form Ta	

Accelerated transition

Elevate your environmental and social outcomes while growing your business in a modern, low-carbon, circular economy



Streamline sustainable operations

Create operational efficiencies by automating key processes and leveraging AI tools to reduce carbon and material usage along the value chain.

Measure and adapt

Accurately measure the financial and sustainability implications of your decisions and align your strategic, operational, procurement, and design processes.

Proactively transform

Transition to a sustainable business by acting on new regulations and enhancing supply chain resilience to proactively prepare for physical climate risk while accelerating growth.

Business capabilities





Design rules management

· Str manage	g Conjulater -		and the last		-		
Demo GreenLine 3	2023 -						
	and inch	Constant of			Transformer,		
log-1	-0. Doct-200	R 1000				1	1 O
				338			
Packaging Complians	ca of Products (N						* * *
maker .	Raining to specific .	And inter	Report Real	Parametrization in constraint	And Complement (14)	Address and a second	and address of the second
No. of Concession, No.	23 and 18	No.	Section (Section)	-	Θ	Collaboration .	-
States States		Sector	Brancise Sectors			a se produced	1944
100 (A.)10, 20.	40, 90, 90, 100, 100	Construction of Construction	100.00		9	in the second	(max, house, has, how
	100,001,001,000,000	inter a	1000-100 1000-100	-	9	> # 2 %/844	101,000,00,00,00
Shariban SPLRINGS	100 F100 F100	terrally.	Anne Line Anne Line	-	9	141404	See, Second, Sold, Sec.
Statio che blac 197, A. H. N. H	ALC: N. M. M.	Madelan Milleran	Annatolite Annatolite	-	0	$(1+2^{-1})^{-1} (1+2^{-1})^{$	1000, 2000, 200, 200
104004 1072/02/02	The base ment	No.	300,74	-	Θ	101000	Stat, Second, Full, Stat
No. of Street, or other	10 10 10 10 10 10 10 10 10 10 10 10 10 1	the last		-	9	Laborat	line, hereit, fiel, far-
Support of the Husbarry	CORNER STREET	800 Total	Tener Line	-	0	Latitude .	And Address Property

Al-assisted report generation

Generate ESG Reports with Al				1 9 6 B
auto (6 Senders (6		0.0		
Report Templates (2)		Province of Report Template		New 8 11 10 0
Tengine bare	Decision	1 Decide Survey	1.74	Million II I I I I I I I I I I I I I I I I I
Gamera Did Stagers Sub-plane	a grant this read	2. Manufacture at 1712	and second a	
BRIT Deve Dage	A server Cit. synt	1. Elementer futer have 11. Carlos hapet annound 13. Vario hapet 14. Versi vage 13. Versi vage 14. Versi vage 14. Versi vage 14. Versi vage 14. Versi vage hall the futer setting 14. Versi vage hall the futer setting	Marganetics.	
		 L. Local-ARD, metric in Germanic system, and Ethios processors 5.1 doest analysis and composition 		
		1.1 Arit compliant and follows researched		
		A Green to Paper		
		1.000 improvement Processo		

Identify Scope 3 Emissions Effectively

Automating Emissions Factor Mapping with AI

Challenges

- Thousands of purchased products, materials and suppliers
- Suppliers unable to provide product carbon footprint



Manage Purchased Product Footprints 🗸

1.84063127702429

kgCO2e / Kilogram

1.44578305955339

kgCO2e / Kilogram

Cow Milk (PRD_08)

7.6 Medium

7.5 Medium

Solution

• Use SAP AI Assistant to identify matching emissions factors from LCA* databases

Release

?

NW

6

ឲ្

Q

230990, 23319

230990, 23319

F	Footprint Suggestion								
	Similarity Score	Emission Factor	Emission Factor Name	Validity	Emission Factor Package	Emission Factor Location	Commodity Code		
	8.3 High	1.26663137106386 kgCO2e / Kilogram	milk production, from cow	Jan 1, 2009 - Dec 31, 2023	ecoLCA	CA	40120, 40150, 40140, 02211		
0	8.3 High	1.97593618136444 kgCO2e / Kilogram	yogurt production, from cow milk	Jan 1, 2010 - Dec 31, 2023	ecoLCA	CA	40510, 40520, 40590, 22241		
0	8.1 High	2.48640189825613 kgCO2e / Kilogram	butter production, from cream, from cow milk	Jan 1, 2007 - Dec 31, 2023	ecoLCA	GLO	40510, 40520, 40590, 22241		
0	8.1 High	3.77123874954717 kgCO2e / Kilogram	butter production, from cow milk	Jan 1, 2007 - Dec 31, 2023	ecoLCA	GLO	40510, 40520, 40590, 22241		
0	8.1 High	12.46886469851272 kgCO2e / Kilogram	cheese production, soft, from cow milk	Jan 1, 2007 - Dec 31, 2023	ecoLCA	GLO	40640, 40630, 40620, 40610, 40690, 22251		
0	7.7 Medium	1.42248166084028 kgCO2e / Kilogram	tofu production	Jan 1, 2010 - Dec 31, 2023	ecoLCA	CA	230990, 23319		
0	7.6 Medium	1.52030479939823 kgCO2e / Kilogram	soybean beverage production	Jan 1, 2010 - Dec 31, 2023	ecoLCA	CA	230990, 23319		
0	7.6 Medium	0.84472181012824 kgCO2e / Kilogram	ethanol production from whey	Jan 1, 2000 - Dec 31, 2023	ecoLCA	ROW	230990, 23319		

Jan 1, 2012 - Dec 31,

Jan 1, 2012 - Dec 31,

2023

2023

ecoLCA

ecoLCA

GLO

GLO

palm date production.

conditioned and dried,

palm date production.

conditioned and dried

organic

80% reduction in time and effort

Elevate your outcomes while growing your business

Deliver value to your customers, investors and wider ecosystem



Sustainable business value

Managing financial and other sustainability data in an ERPcentric, cloud-based, AIenabled solution can help **meet rising requirements and future-proof the business.**

//

IDC Infobrief: "Boost your Sustainability Performance with ERP-Centric, AI-Driven Solutions, Assessment"

The Cloud ERP Centric Sustainability Journey

Elevate and accelerate sustainability transformation with SAP cloud ERP

Start Now Establish a foundation of accurate, reliable sustainability data for regulatory compliance.

Simple Reliable Expand and Evolve

Build a future-proof sustainability platform for integrated, data-driven decision making, target setting, and progress tracking.

> Investor trust Executive compensation

Stakeholder sentiment

Act and Lead

Empower transactional-level sustainability decisions across ERP business processes, and lead the way in making impactful change.



Transactional level decisions

- New products and services
- Continuous innovation

A holistic sustainability strategy, embedded at the core of the business with cloud ERP, transforms disruption into a competitive advantage.

Thank you.

Contact information:

Eamon Fenwick, SAP APAC

eamon.fenwick@sap.com

