# SEFARI Gateway: From Evidence to IMPACT

Delivering real-world change through knowledge exchange and innovation



The Rowett Institute

## Exploring our IMPACT

SEFARI Gateway (Scotland's Centre of Expertise for Knowledge Exchange and Innovation) drives knowledge exchange and innovation at the science—policy interface, ensuring research addresses Scotland's urgent climate, biodiversity, and food security challenges. Through specialist advisory groups, fellowships, and cross-sector partnerships, Gateway links research outputs to policy and practice, maximising impact across government priorities. Our projects demonstrate tangible benefits for Net Zero targets, biodiversity protection, public health, land use and communities, and food system resilience, while highlighting lessons on co-design, data access, and systemic thinking.

At SEFARI Gateway, we see impact as a pathway, not just the end-point of research outputs. It's about connecting evidence with the people who can actually use it policymakers, practitioners, and communities on the ground. We work with researchers and stakeholders to turn research outputs into real-world benefits both now and over the longer term. Our Impact Framework goes beyond what was planned or envisaged—it captures evidence that pathways from outputs to impact actually existed and functioned. We track how this happens across different areas: influencing policy, building environmental resilience, supporting communities, and growing the economy. By mapping these pathways clearly and telling the stories of how evidence gets used in practice, we make impact visible, measurable, and shareable.

We selected three case studies that demonstrate the impact pathways our framework captures. Each case shows evidence of real-world change stemming from research, with clear documentation of stakeholders and beneficiaries, the significance of the impact, the reach of the evidence, and the activities that enabled engagement.

## SEFARI Gateway IMPACT Case Studies

**Case Study 1: Conserving Genetic Diversity** 

Evidence: Scotland's biodiversity research underpinning the internationally recognised Genetic Diversity Toolkit.

Outputs: Updated Toolkit; new conservation "scorecards" for terrestrial (red squirrel, woolly willow) and marine species (coldwater coral, bottlenose dolphin); revised definitions of populations.

Stakeholders: NatureScot, JNCC, international biodiversity partners.

Beneficiaries: Conservation agencies, policymakers, and global biodiversity monitoring networks.

Impact/Outcomes: Toolkit embedded in the UN Convention on Biological Diversity (CBD) protocol; direct use in UK-level reporting; Scotland positioned as a global leader in biodiversity monitoring.

Reach: National (UK reporting) and international (CBD adoption).



### Case Study 2: Net Zero for Scotland's Food & Drink Industry

Evidence: Long-term SEFARI datasets and expertise on greenhouse gas emissions from agriculture and food systems.

Outputs: First sector-wide GHG emissions estimates since 1990; analysis of emissions trends (1990–2021); recommendations for monitoring.

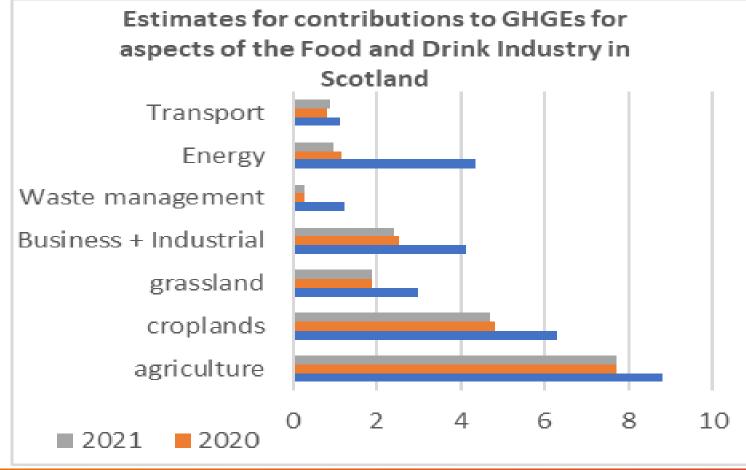
Stakeholders: Scotland Food & Drink, SG Net Zero Programme, Rowett Institute, SRUC.

Beneficiaries: Food and drink industry, agricultural producers, policymakers.

Impact/Outcomes: Provided robust baseline for Net Zero transition; informed industry strategy; identified primary agriculture as a priority for mitigation.

Reach: Sector-wide in Scotland; informing government and industry planning.

Significance: Shapes Net Zero pathways for one of Scotland's largest economic sectors; provides evidence base for policy and industry alignment.



### Case Study 3: Natural Capital in the NHS Estate

Evidence: Fellowship data and surveys of NHS estate use (2,449) adults across 14 Health Boards).

Outputs: Calculated annual value of NHS outdoor spaces (£82m health savings); quantified hours spent in outdoor NHS spaces (87m hours/year).

Stakeholders: Public Health Scotland, NatureScot, NHS Scotland, regional health boards.

Beneficiaries: NHS staff, patients, families, and communities using NHS outdoor spaces.

Impact/Outcomes: First global study of its kind; evidence adopted for SG natural capital reporting; supports NHS statutory duties; strengthens case for nature-based health and climate action.

Reach: Scotland-wide across NHS boards; potential model for international replication.

Significance: Demonstrates measurable health and financial benefits; informs statutory reporting and policy decisions at national level.



## SEFARI Gateway's pathway to IMPACT — Insights

The selected IMPACT Case Studies demonstrate:

- IMPACT is achieved at every scale from local health service decision-making to national food systems and international biodiversity policy.
- Evidence needs a vehicle tools like scorecards, baselines, and dashboards carry science into decisions that benefit public policy, society, economy, culture, health, and the environment.
- Engagement drives IMPACT when stakeholders and beneficiaries are clearly identified and involved, IMPACT follows.
- Reach and significance reinforce each other global credibility reinforces national policy value, which enables sector-wide adoption, creating lasting change.

include.

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Net Zero SAG - Jules Griffin (Rowett), Jamie Newbold (SRUC), Iain Clunie (SFD-Net Zero Programme)



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