# EDEN

THE NATURAL SOLUTION

2019 ANNUAL GENERAL MEETING 14<sup>th</sup> May 2019 Institute of Directors, London

## INTRODUCTION TO EDEN RESEARCH



#### **ABOUT US**

Eden Research provides sustainable solutions for challenges in three key industries:







LON:EDEN AIM listed since 2012 Market cap £22m

We have intellectual property and expertise in plant-derived sustainable chemistry, microencapsulation and formulation technologies.

Eden is the only UK listed company focused on biopesticides for sustainable agriculture.

Globally, Eden is one of few biocontrol companies with proven products and regulatory authorisation.

#### **MEET THE TEAM**



#### SEAN SMITH CHIEF EXECUTIVE OFFICER

Over 25 years experience in the speciality chemicals and industrial biotechnology industries

#### LYKELE VAN DER BROEK NON-EXECUTIVE CHAIRMAN

Formerly Board member of Bayer CropScience and President of Bayer Animal Health, both divisions of Bayer AG

#### ALEX ABREY

Experienced Financial Director to a diverse range of businesses including financial and management consultancy

#### **ROB CRIDLAND** NON-EXECUTIVE DIRECTOR

CHIEF FINANCIAL OFFICER

Until recently, Rob served as Chief Financial Officer of Itaconix plc, having joined from Renovo Group plc where he was Executive Director of Finance and Business Development



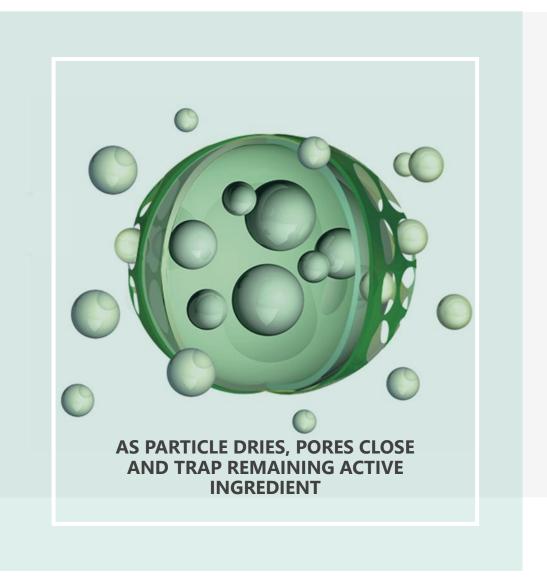


### **OUR TECHNOLOGY**

#### WE HAVE DEVELOPED A NATURAL FORMULATION TECHNOLOGY, SUSTAINE<sup>TM</sup>

Particles are derived from **natural yeast cells**.

Sustaine encapsulates active ingredients and provides for the **sustained release** of these ingredients enabling their **safe, more efficient use**.

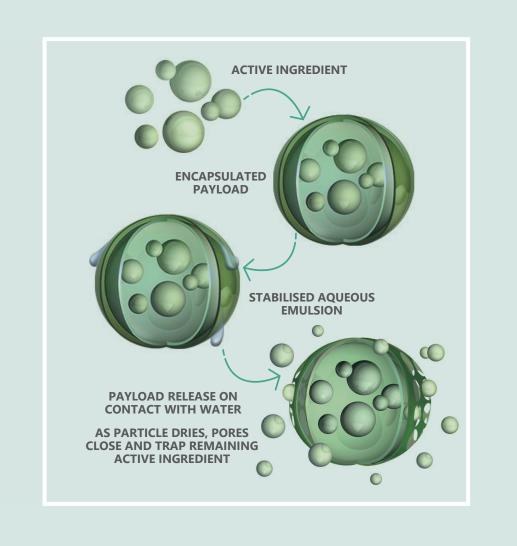


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#### **COST EFFECTIVE**

USEFUL ACROSS A WIDE RANGE OF ACTIVE INGREDIENTS

> A HIGH CAPACITY DELIVERY SYSTEM

VERSATILE AND ROBUST

NATURAL AND SUSTAINABLE

SIMPLY PROCESSED AND USED WITH STANDARD EQUIPMENT

## INDUSTRY APPLICATIONS

We work globally through multi-national and local partnerships to develop and launch solutions for challenges facing **three key industries**.



#### **CROP PROTECTION MARKET**

Conventional crop protection products face major challenges such as:

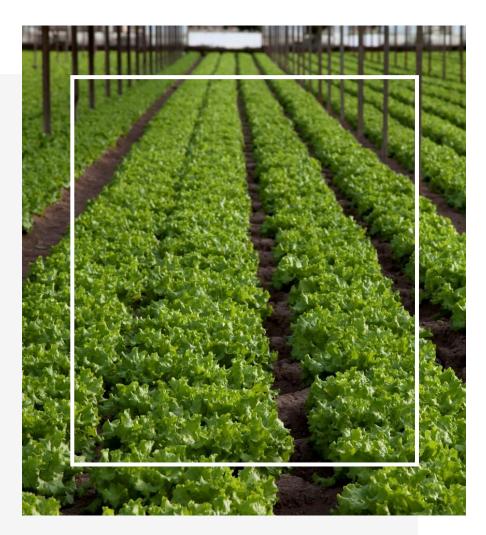
The global crop protection market is valued at approx. **\$58 billion in 2017**  The biopesticide market is projected to reach **\$8.8 billion by 2022** 

Consumer concerns l over food safety

Increasingly challenging regulatory requirements

Farmers seeking effective alternatives

Neonicotinoid insecticides were worth \$3.1 billion globally but are now facing withdrawal in Europe and elsewhere. Conventional crop protection products formulated with Sustaine and Eden's active ingredients can help address many of these issues.

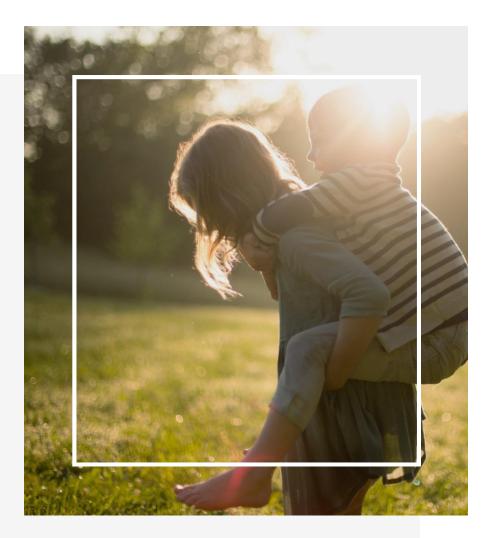


#### **CROP PROTECTION MARKET**

The dominant molluscicide approved for use in the EU is **metaldehyde**. The UK banned metaldehyde in 2018. **AHDB estimates that a lack of slug control products will cost UK agriculture £100 million per year!** 

The re-registration of **copper-based products** as fungicides was approved in the EU but a **33% reduction in use limit was imposed.** 

New EU rules have prohibited any substance identified as an **Endocrine Disruptor** from being used in plant protection products. **The new rules will nonetheless have an impact upon the availability of insecticides and fungicides.** 







### **OUR PRODUCT FOCUS**

Our focus is on crop protection, developing products based on sustainable chemistries to protect high-value crops from pests and disease, with equal or better performance when compared with conventional pesticides.

Critically, our products are exempt from pesticide residue limits and can be used up to the point of harvest giving growers reduced risk, maximum flexibility and security.





Root knot

nematodes

FUNGICIDES Botrytis, powdery mildew, downy mildew

NEMATICIDES



Mites and

INSECTICIDES white flies



MOLLUSCICIDES Slug and snail control

## OUR CURRENT PRODUCT FOCUS

Our products harness the biocidal activity of naturally occurring molecules produced by plants as part of their defence systems. **These active ingredients are known as terpenes**.

Our biopesticides, formulated with Sustaine, add value compared to conventional pesticides by:

**Enabling sustained delivery,** increasing residual efficacy and reducing use rates

Tackling resistance build-up

**Protecting plants** from potentially damaging chemicals

Allowing solvent-free, stable formulations with high loadings of active ingredients

Naturally binding to plant and animal surfaces improving efficacy and retention

Providing flexible formulation options

Exemption from maximum residue levels

Low or no pre-harvest intervals giving growers maximum flexibility, security and control

## **PRODUCT COMMERCIALISATION**

We now have commercial partners in place across six continents.



Securing patent protection for intellectual property



Developing our product pipeline



Gaining regulatory approval



Signing commercial agreements



Identifying suitable industrial partners





Investment in research and development



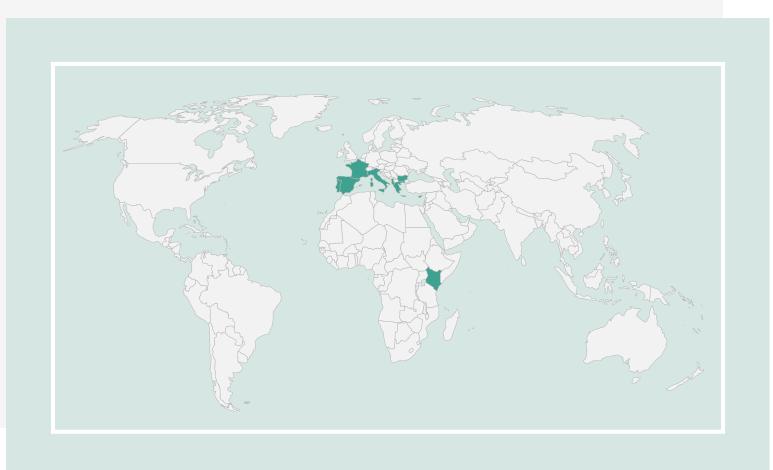
#### WHERE WE ARE NOW



#### WHERE WE ARE NOW

**Product sales have commenced** in key markets where we have authorization to market and sell our first product, Mevalone.



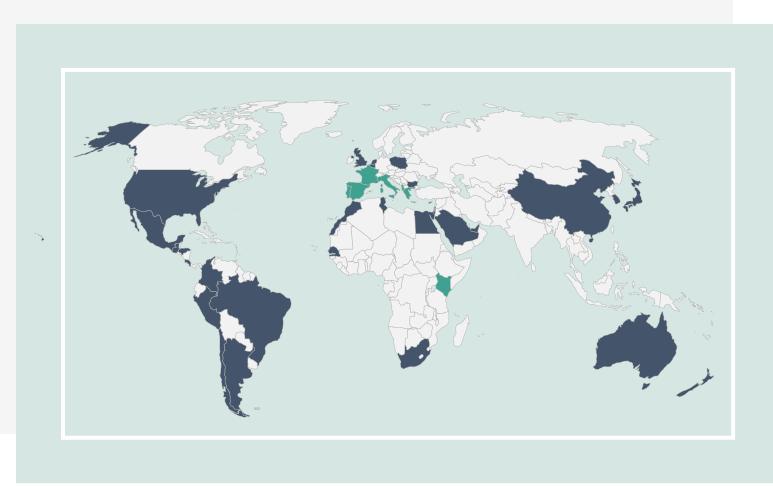


### **NEW PARTNERSHIPS AND REGULATORY ACTIVITY**

Eden Research has regulatory clearance

for its first product in multiple countries with approval expected for its second product in 2019.

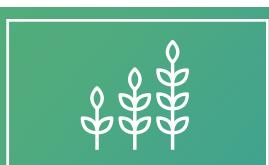




## ACHIEVING OUR VISION

Our vision is to be **the leader in sustainable bioactive products** enabled or enhanced by our novel encapsulation and delivery technologies.





SIGNIFICANT MARKET POTENTIAL



UNIQUE TECHNOLOGY CLEAR COMMERCIAL PROGRESS



SKILLED AND EXPERIENCED PROFESSIONALS



TRAJECTORY OF FINANCIAL GROWTH

## A GROWING GLOBAL MARKET

- The global biopesticides market is projected to be worth more than \$8.8 billion by 2022
- The biopesticides market is growing at a CAGR of approximately 17% per annum
- Animal health market value estimated to exceed \$33 billion by 2020

Eden's proven addressable market today is more than \$1.2 billion.

In the future, this grows to more than \$4 billion, not including Sustaine.



SIGNIFICANT MARKET

POTENTIAL





SKILLED AND EXPERIENCE PROFESSIONALS



FINANCIAL GROWTH

## SIGNIFICANT MARKET OPPORTUNITIES

High demand for sustainable products that can compete with conventional products on ease-of-use, efficacy, safety, cost and reliability

- Ongoing pressure on the conventional pesticides market, which is subject to increased scrutiny and regulatory pressures contributing to significant disruption
- Increasing time and cost of bringing new chemical products to market:
  12 years and around \$300 million

- Significantly lower costs of bringing biopesticides to market – around \$25-50 million
- Significant barriers to entry
- Major product withdrawals across all segments of the conventional crop protection industry are having a significant impact on growers leaving them with lower yields and declining productivity







SIGNIFICANT MARKET POTENTIAL LEAR COMMERCIAI PROGRESS



SKILLED AND EXPERIENCED PROFESSIONALS



TRAJECTORY OF FINANCIAL GROWTH

## **UNIQUE TECHNOLOGY**

- Ownership of the patents behind the
  Sustaine encapsulation technology
- Significant investment in patent protection and the registration of new actives
- Proven efficacy with strong commercial validation by farmers and our partners
- Scope to exploit the core technologies beyond existing markets and products

Eden's products serve as sustainable alternatives to conventional chemicals without limitations such as residue limits, pest resistance, pre-harvest intervals, long field re-entry periods or increasing restrictions on use.

Residue-free crops command a higher value and have a significant commercial advantage in the valuable export markets.



CLEAR COMMERCIAL PROGRESS



NIFICANT MARKET POTENTIAL



UNIQUE TECHNOLOGY



SKILLED AND EXPERIENCED PROFESSIONALS



TRAJECTORY OF FINANCIAL GROWTH

## **CLEAR COMMERCIAL PROGRESS**

Product sales continue to progress well with expansion into new markets

- Solid commercial pipeline
- Regulatory clearance for product sales across multiple countries with applications pending in 29 new countries
- Commercial and collaborative relationships with strong industry partners

- Significant investment in commercialisation by key partners
- Key crops expected to grow from one to more than ten in the next three years
- Sales on two continents today – expected to expand to six in the coming years



CLEAR COMMERCIAL PROGRESS





SIGNIFICANT MARKET POTENTIAL



UNIQUE TECHNOLOGY



SKILLED AND EXPERIENCED PROFESSIONALS



TRAJECTORY OF FINANCIAL GROWTH

## **2018 HIGHLIGHTS**

Submission of first applications for the regulatory approval of active ingredients and products in the U.S. and Australia

Successful positioning of Mevalone as an early-season treatment contributing to product sales growth of 112% **Regulatory trials** supporting label extensions on crops and the authorisation in Central Europe for the **treatment of botrytis on grapes** 

Robust results supporting the first use of Mevalone for post harvest applications **Sipcam Oxon SpA** ("Sipcam") appointed as exclusive distributor for Mevalone in **ten new territories** 

Cedroz highly commended in 'Best New Biological Product' category at the 2018 Agrow Awards



SKILLED AND EXPERIENCED PROFESSIONALS



SIGNIFICANT MARKET POTENTIAL



UNIQUE TECHNOLOGY



CLEAR COMMERCIAL PROGRESS



TRAJECTORY OF FINANCIAL GROWTH

## SKILLED AND EXPERIENCED PROFESSIONALS

Strong Board and management team

Lykele van der Broek appointed as Non-Executive Director and Chairman – former Board member and COO of Bayer CropScience Wealth of experience in the **agriculture**, **consumer products** and **animal health** sectors globally

**Outsourcing of some functions** to maintain a flexible, low overheard base





SIGNIFICANT MARKET POTENTIAL



UNIQUE

**TECHNOLOGY** 



CLEAR COMMERCIAL PROGRESS



SKILLED AND EXPERIENCED PROFESSIONALS

TRAJECTORY OF FINANCIAL GROWTH

### **2018 FINANCIAL RESULTS**

Revenue **£2.8m** (2017: £1.9m)

Upfront and milestone payments **£1.2m** (2017: £1.1m) Operating profit\* **£0.02m** (2017: loss £0.6m)

Product sales increased 112% **£1.6m** (2017: £0.8m) Operating loss **£0.5m** (2017: £0.6m) Net cash **£2.5m** (2017: £3.7m)

\* before non-cash share based payment charge, amortisation and royalties refund



SIGNIFICANT MARKET POTENTIAL



UNIQUE

TECHNOLOGY

CLEAR COMMERCIAL PROGRESS





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TRAJECTORY OF FINANCIAL GROWTH

### **FINANCIAL POSITION**

Increased revenue generation from product sales Significant investment by key partners Robust balance sheet and cash position





## **OUR PRIORITIES**

#### **COMMERCIAL GROWTH**

- Regulatory clearance in new countries
- Revenue growth
- Partnerships for Mevalone in new territories
- Pursue collaboration with majors

#### **RESEARCH, DEVELOPMENT AND OPERATIONS**

- Supply chain optimisation
- Expansion of screening and field trials
- Accelerate commercialisation of Sustaine for conventional actives

#### **BUSINESS LINE DIVERSIFICATION**

- Bayer Animal Health commercial launches
- TerpeneTech product launches
- Pursue opportunities in the seed treatments market
- Expand crops and diseases treated
- Geographic diversification (seasonal and climatic variation)

#### STRENGTHENING AND GROWING THE TEAM

 Commercial, regulatory and technical roles

#### **SUMMARY**

- 01
- Significant scope for further exploitation of the Company's core technologies beyond biopesticides and crop protection
- 03

Biological solutions are the fastest growing segment of the crop protection industry, and Eden is the only UK-listed company with a focus on this market with proven products and a growing business 02

04

**Strong potential** for Eden Research's current and pipeline products **across a broad segment of the crop protection industry** with new crop and disease targets under active evaluation

Large potential for growth in biopesticides, conventional pesticides, animal health and consumer products based on solid foundations and commercialisation to date

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THE NATURAL SOLUTION

### THANK YOU