



LBT INNOVATIONS



CLEVER CULTURE  
SYSTEMS

# LBT Innovations

*Proven AI technology disrupting global microbiology market*

Brent Barnes  
CEO & Managing Director  
January 2023

ASX code: LBT

[lbtinnovations.com](http://lbtinnovations.com)

# Disclaimer

This document contains certain forward-looking statements that involve risks and uncertainties. Although we believe that the expectations reflected in the forward-looking statements are reasonable at this time, we can give no assurance that these expectations will prove to be correct.

Given these uncertainties, readers are cautioned not to place undue reliance on any forward-looking statements. Actual results could differ materially from those anticipated in these forward-looking statements due to many important factors, risk and uncertainties including, without limitation, risks associated with estimating potential quantity and timing of sales, risks associated with medical device development and manufacture, risks inherent in the extensive regulatory approval processes mandated by regulatory authorities, delays in clinical trials, future capital needs, general economic uncertainty and other risks detailed from time to time in the Company's announcements to the ASX.

Moreover, there can be no assurance that others will not independently develop similar products or processes or design around patents owned or licensed by the Company, or that patents owned or licensed by the Company will provide meaningful protection or competitive advantages.

All reasonable efforts have been made to provide accurate information, but the Company does not undertake any obligation to release publicly any revisions to any "forward-looking statement" to reflect events or circumstances after the date of this presentation, except as may be required under applicable laws. Recipients should make their own enquiries in relation to any investment decisions from a licensed investment advisor.

## **NOT AN OFFER FOR SECURITIES**

This Presentation is not a prospectus, product disclosure statement or other offering document under Australian law (and will not be lodged with ASIC) or any other law. This Presentation does not constitute an offer, invitation, solicitation or recommendation with respect to the purchase or sale of any shares nor does it constitute financial product or investment advice nor take into account your investment objectives, taxation situation, financial situation or needs. An investor must not act on the basis of any matter contained in this Presentation but must make its own assessment of the Company and conduct its own investigations and analysis. Before making an investment in the Company, a prospective investor should consider whether such an investment is appropriate to their particular investment objectives and financial situation and seek appropriate advice, including legal, taxation and financial advice appropriate to their jurisdiction and circumstances.

## **UNITED STATES**

The Company's securities have not been and will not be registered under the U.S. Securities Act of 1933, as amended (the Securities Act), or under the securities laws of any state or other jurisdiction of the United States. Accordingly, the Company's securities may not be offered or sold, directly or indirectly, within the United States or to, or for the account of benefit of, U.S. Persons (as defined in Regulation S under the Securities Act as amended). This Presentation may not be distributed within the United States or to any person in the United States.

## **OTHER JURISDICTIONS**

This Presentation may only be accessed in other jurisdictions where it is legal to do so.

# Recent Company Highlights

Established partnerships with global leaders

## **\$3.0m Non-dilutive funding secured expands APAS® market opportunity**

- Product development for new \$10bn pharmaceutical industry vertical
- APAS benchtop instrument to deliver digital microbiology for all laboratories

## **Improved Go-To-Market strategy**

- Thermo Fisher Exclusive Distributor for APAS Independence (United States and Europe)
- Full control of product commercialisation through Clever Culture Systems acquisition



**ThermoFisher**  
S C I E N T I F I C



# Leaders in intelligent microbiology automation

**OUR MISSION:** To **disrupt microbiology**, with **intelligent automation** solutions, that **improve workflow practices** for all laboratories.



## Innovative AI platform

One instrument - multiple products



## Generating sales globally

Australia, Germany, UK, US



## Exciting product pipeline

Digital plate reading for all labs



APAS® Independence in action at Health Services Laboratory, UK



LBT INNOVATIONS



CLEVER CULTURE  
SYSTEMS

ASX code: LBT

# Clinical microbiology: US\$6.5bn global market<sup>1</sup>

Current laboratory workflow remains highly manual – **Ripe for disruption**



## **Rising incidence of infectious diseases**

>2.4bn culture plates read annually



## **Increasing demand on clinical resources**

Workforce vacancy rates >10% in US<sup>2</sup>



## **Technology advancements**

New products needed to meet demand



## **Exciting investment opportunity**

Market growth at 6.5% per annum<sup>3</sup>



1. LBT Internal Company Market Research

2. The American Society for Clinical Pathology 2020 Vacancy Survey of Medical Laboratories in the United States

3. Market Research Report, marketsandmarkets.com (Oct 2020): Clinical Microbiology Market by Application (Food, Pharma, Manufacturing, Chemical, Environment), Disease (Respiratory, Std, Uti), Product (Instrument, Analyzer, Reagent), End User (Hospital, Diagnostic Lab, Academia) - Global Forecast to 2025



# Leading the way in digital microbiology

APAS® Independence - **First** and **only** automated culture plate reader



## Product launched with global sales

Australia, Germany, UK, US



## Industry leading Channel Partner

Thermo Fisher Scientific



## Innovative platform technology

One instrument - multiple products



## Clinically proven

Over 25 scientific publications



## Global regulatory clearances

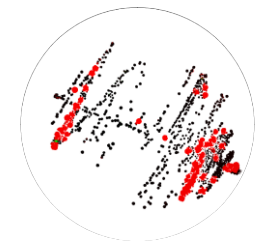
FDA, CE Mark, UKCA, TGA

**ThermoFisher**  
SCIENTIFIC



**APAS INDEPENDENCE**

**APAS® Independence instrument**  
Hardware platform for plate imaging



**APAS® Analysis Modules**  
AI algorithms for different applications



LBT INNOVATIONS



CLEVER CULTURE  
SYSTEMS

ASX code: LBT

# Major technology development completed

Technology validated – Clinically Proven – Regulatory Cleared



2016

## Technology validated

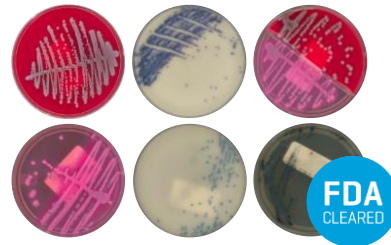
FDA Clearance for APAS® Compact device  
Single loading manual device



2018-2019

## Platform technology

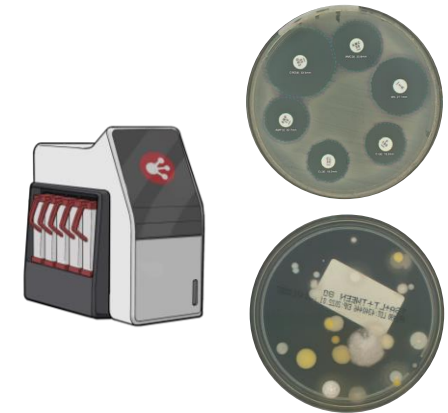
APAS® Independence product developed  
High-throughput device for culture plate reading  
FDA Clearance with Urine Analysis Module



2020-22

## Technology expansion

Addition of infection control analysis modules for MRSA and VRE  
Development of APAS®-AMR for antimicrobial Susceptibility Testing



2023+

## Plate reading for all labs

Re-use core APAS® imaging platform across multiple products

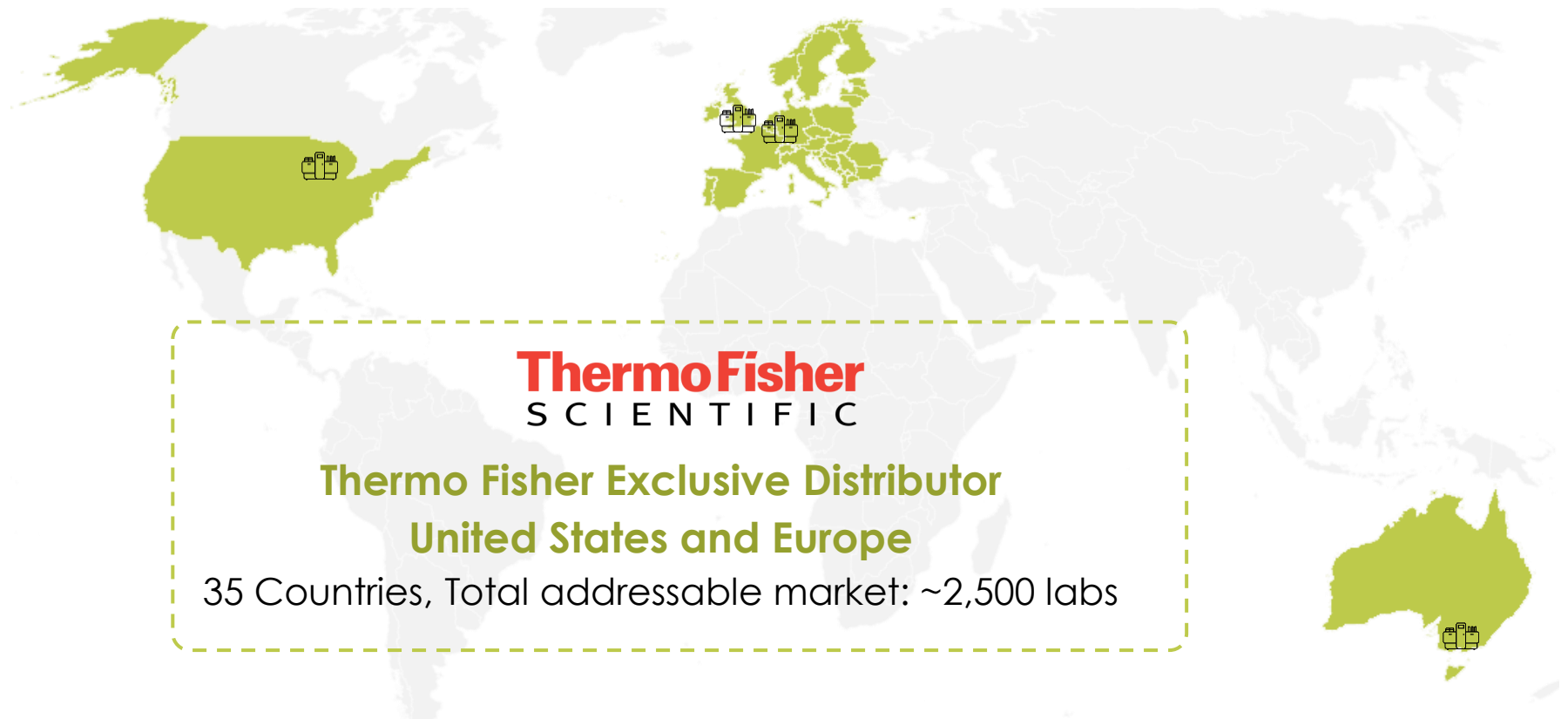
**NEW:** APAS® instruments

**NEW:** APAS® Pharma

**ThermoFisher**  
SCIENTIFIC

# Addressable market : ~2,500 Laboratories

Thermo Fisher EU distribution extends sales reach to **additional 30 countries**



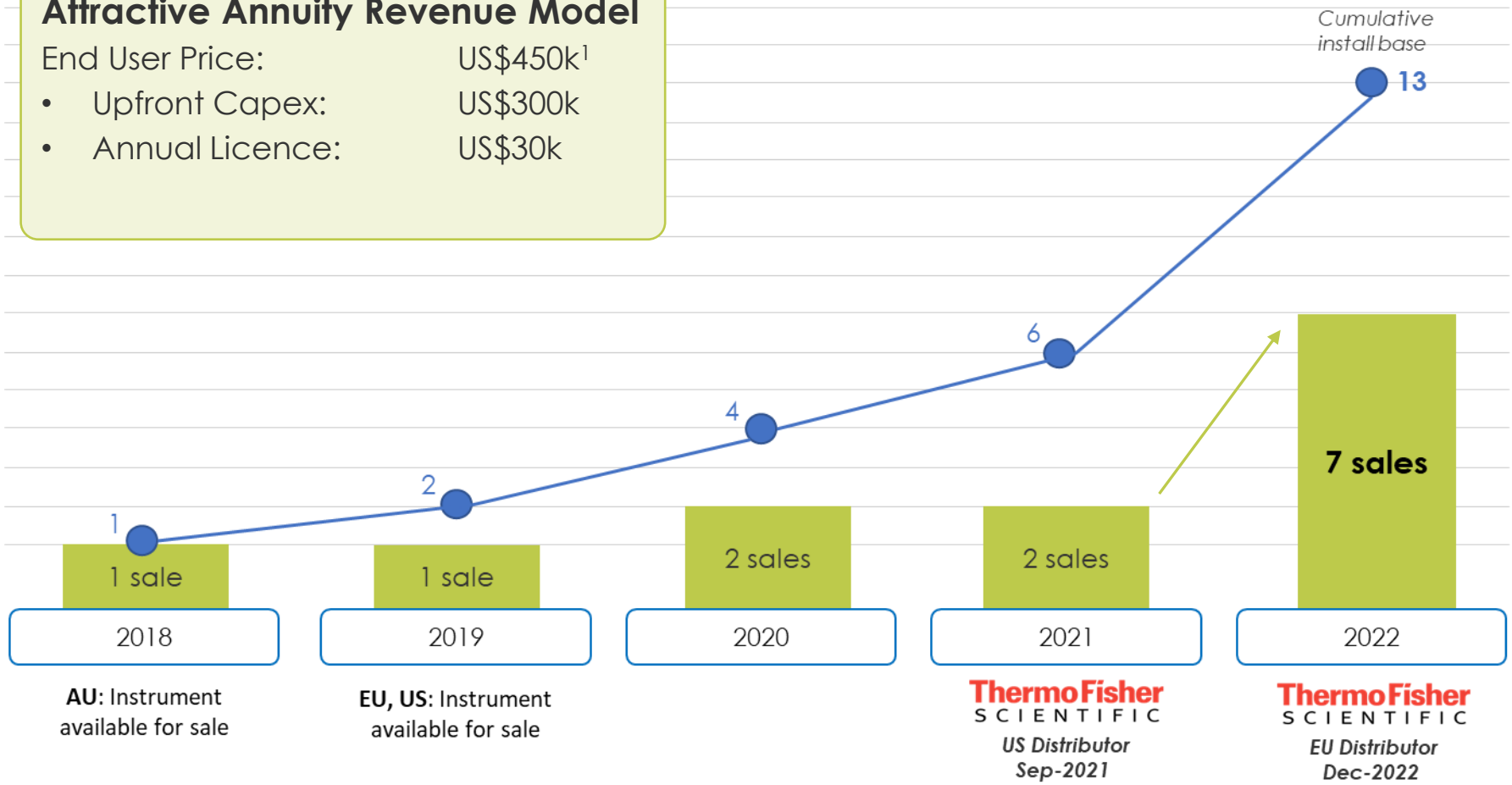


# 2023: Commercial traction building with partners

## Attractive Annuity Revenue Model

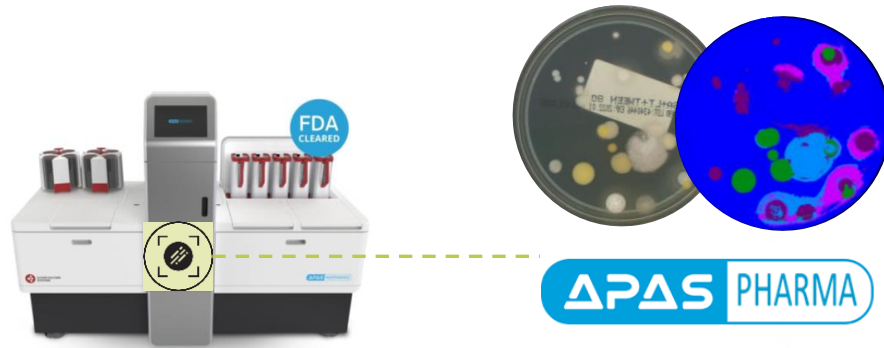
End User Price: US\$450k<sup>1</sup>

- Upfront Capex: US\$300k
- Annual Licence: US\$30k



# Pharmaceutical microbial quality control

Critical control process during aseptic sterile drug manufacturing



## APAS® Independence instrument

Hardware platform for plate imaging  
(available for clinical applications)

## Target Customers

- Big Pharma: Top 20 customers represent >200 manufacturing facilities
  - >US\$900bn in revenue
- Contract Drug Manufacturing Market: valued >US\$200bn (CAGR 7.2%)

## Product Development

- Successful proof-of-concept completed
- >\$1.5m funding secured with global partners for full product development
  - AstraZeneca
  - Thermo Fisher Scientific



# New products build APAS<sup>®</sup> market opportunity

## Growth driven by commercial partners

Established key reference sites and delivered on go-to-market strategy establishing distribution channels.



**ThermoFisher**  
SCIENTIFIC

## New product

Expansion into pharmaceutical MQC market with global partners



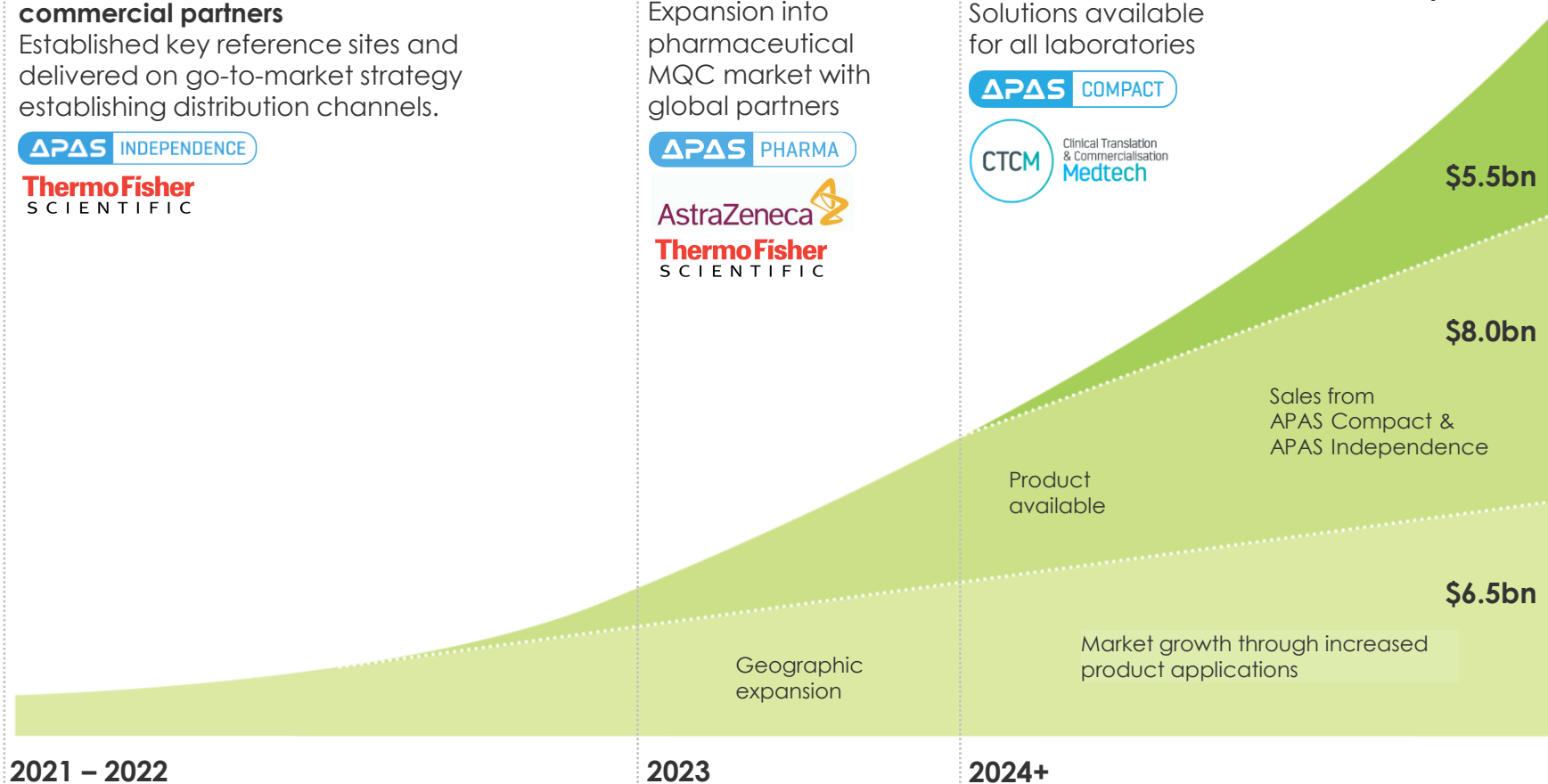
**AstraZeneca**  
**ThermoFisher**  
SCIENTIFIC

## New instrument

Solutions available for all laboratories



**TAM \$20bn**



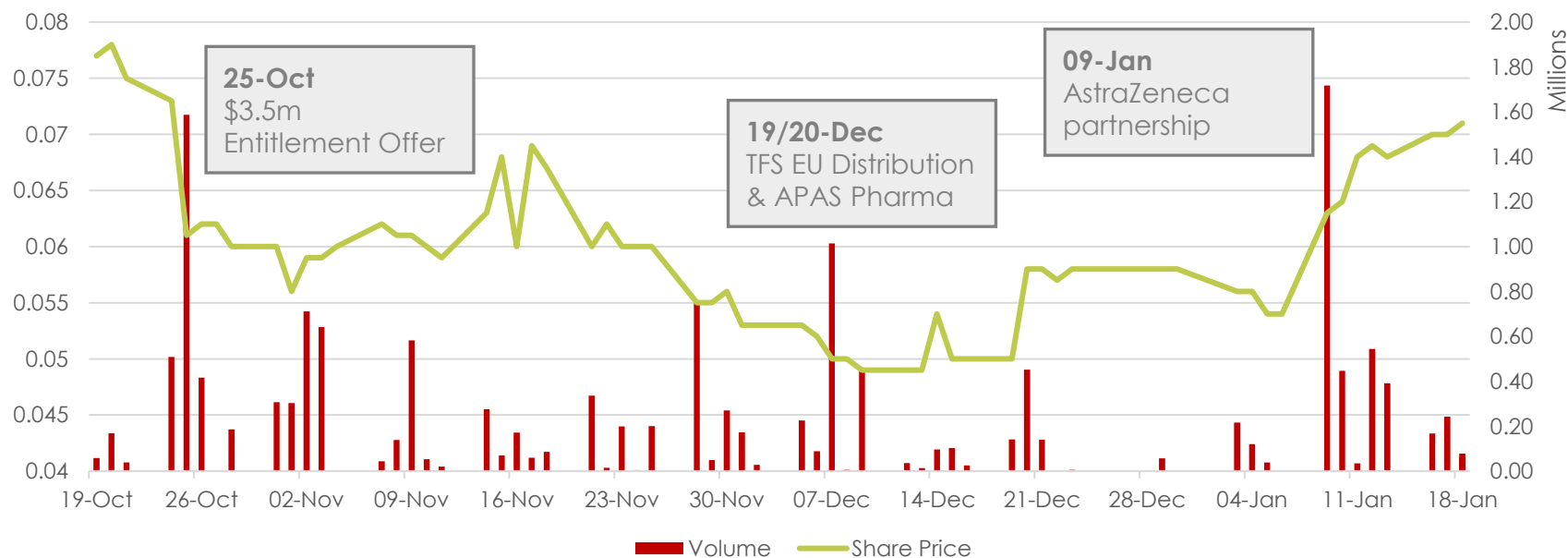
# Corporate overview

## Key Statistics (Closing price on 18 Jan 2023)

<b>Share Price</b>	\$0.07 per share
<b>12-Month Range</b>	\$0.049 - \$0.120
<b>Number of Shares</b>	330.6 million
<b>Options Issued</b>	27.4 million
<b>Market Capitalisation</b>	~\$23.5 million

## Financials (AUD)

<b>Cash &amp; Receivables</b>	\$3.5 million (31 Dec 22, inclusive of near-term, receivables)
<b>Cash Burn</b>	~\$1.8million per Qtr (prior to revenue inflows)
<b>SAFA Loan Facility</b>	\$1.9 million - Low interest rate, 5-year term (repaid by Nov-24)
<b>Key Shareholders</b>	<b>Industry: ~15%, Stable Top 20: ~35%</b>



# Investment highlights and outlook

No better time to be in microbiology diagnostics



*"We are very pleased to incorporate the APAS® Independence into our routine clinical workflow, where the instrument will be used daily to automate the reading of our MRSA cultures."*

– Prof. Hilmar Wisplinghoff  
Labor Wisplinghoff, Germany

2025

## Market leader in intelligent microbiology automation

### Technology: Validated & expanded

- Multiple APAS® products launched
- Largest database of digital culture plates

### Increased market opportunity

- Expanded distribution coverage
- New industry verticals added

### Customers: Established user base

- APAS® technology gold standard for culture plate reading

### Global sales and established ARR through licence fees