

2QFY23 – US partners, FDA-cleared sensors set the scene

Adherium's 2Q release highlighted its significant progress in recent months on multiple fronts. With strategic partnership agreements now in place with Perigon Health, CareCentra and Dulcian Health, the company is well positioned to leverage its expanded portfolio of FDA-cleared digital sensors and a proprietary platform in the context of a total digital solution to large and diverse asthma and COPD patient populations. The first billings for remote patient monitoring of patients in the US have been submitted and reimbursed by US Medicare, which bodes well for onboarding of new patients under the distribution agreements.

FDA clearances – now 91% of top 20 brands

Adherium continues to expand its portfolio of Hailie® sensors with physiological parameters. In November 2022, it received FDA 510(k) clearance to market the Hailie® sensor to pressurised metered dose inhaler (pMDI) users of GSK's Ventolin®, Advair®, and Flovent®. Adherium now covers 91% of the top 20 US branded medications by sales volume (up from 71% in 2021).

CareCentra partnership

In September 2022, Adherium announced a partnership agreement with CareCentra, Inc, a US-based behaviour-shaping company. CareCentra has an AI-driven persuasive technology platform designed to customise a range of patient management protocols for a variety of downstream US health organisations.

Dulcian Health partnership

In September 2022, Adherium announced a partnership agreement with Dulcian Health to integrate and deploy the Hailie® platform. Dulcian is a leader in chronic care management for physician practices in the US and has been focusing on developing software that adds functionality to electronic health record systems for over 20 years. Integration is well underway with the company guiding to first patient onboarding in 3QFY23.

Perigon agreement generates first billings

Early implementation of the 3-year distribution agreement with Perigon Health 360 (signed in July 2022), incorporating the Hailie® digital product portfolio into Perigon's Medesto drug and therapy monitoring platform, has resulted in initial billings for US patients monitored. This is expected to continue in 3QFY23.

2QFY23 cash flow

Adherium reported cash on hand at 31 December 2022 of \$12.9m; compared with cash outflows in the quarter of \$2.4m, largely driven by staff and corporate costs.

Valuation

We value Adherium at A\$114m, or \$0.02 per share (previously \$0.03), using DCF methodology on free cash flow. This incorporates the A\$13.5m raised at \$0.005 representing 2.7bn new shares. Key risks include customer mix, pricing, resource and capital allocation, and reimbursement.



Adherium is an ASX-listed digital health company specialising in remote e-health devices and data analytic services, focused on patient adherence, remote monitoring and data management solutions for patients, physicians, payers and providers. Its expanded digital sensor coverage and cloud-based SaaS Hailie® platform offer a single-source solution to optimise management of patients with chronic respiratory diseases, specifically difficult-to-treat and severe asthma and COPD.

www.adherium.com

Stock	ADR.ASX
Price	A\$0.004
Market cap	A\$20m
Valuation	A\$0.02 (previously \$0.03)

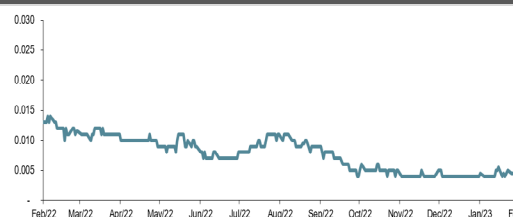
Company data

Cash on hand (31 Dec 2022)	A\$12.9m
Shares on issue	4.979m
Options and rights outstanding	1623.6m

Potential catalysts

- US Medicare reimbursement news flow
- Onboarding of new patients
- US partnership agreements

ADR share price (A\$)



Source: FactSet.

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Financial Summary

Exhibit 1 – Financial summary

Adherium						
Year end 30 June, AUD unless otherwise noted						
MARKET DATA						
Price	\$	0.004				
52 week high / low	\$	0.0-0.1				
Valuation	\$	0.02				
Market capitalisation	\$m	19.9				
Shares on issue (basic)	m	4979.3				
Options / rights	m	1623.6				
Other equity	m	0.0				
Shares on issue (diluted)	m	6602.8				
12-MONTH SHARE PRICE PERFORMANCE (A\$)						
INVESTMENT FUNDAMENTALS						
		FY20A	FY21A	FY22A	FY23E	FY24E
Reported NPAT	\$m	(11.4)	(15.0)	(10.0)	(11.4)	(2.0)
Underlying NPAT	\$m	(11.4)	(15.0)	(10.0)	(11.4)	(2.0)
Reported EPS (diluted)	¢	(360.0)	(170.0)	(46.2)	(51.7)	(4.1)
Underlying EPS (diluted)	¢	(360.0)	(170.0)	(46.2)	(51.7)	(4.1)
Growth	%		-52.8%	-72.8%	11.8%	-92.1%
Underlying PER	x	nm	nm	nm	nm	nm
Operating cash flow per share	¢	(2.3)	(1.3)	(0.4)	(0.6)	(0.1)
Free cash flow per share	¢	(2.4)	(1.3)	(0.5)	(0.6)	(0.1)
Price to free cash flow per share	x	nm	nm	nm	nm	nm
FCF Yield	%	nm	nm	nm	nm	nm
Dividend	¢	0.0	0.0	0.0	0.0	0.0
Payout	%	0.0%	0.0%	0.0%	0.0%	0.0%
Yield	%	0.0%	0.0%	0.0%	0.0%	0.0%
Franking	%	0.0%	0.0%	0.0%	0.0%	0.0%
Enterprise value	\$m	19.2	15.3	4.7	14.7	13.3
EV/EBITDA	x	(2.1)	(1.2)	(0.5)	(1.3)	(6.1)
EV/EBIT	x	(2.2)	(1.2)	(0.5)	(1.3)	(6.3)
Price to book (NAV)	x	0.2	0.2	1.5	1.1	3.4
Price to NTA	x	0.2	0.2	1.5	1.1	3.4
KEY RATIOS						
		FY20A	FY21A	FY22A	FY23E	FY24E
EBITDA margin	%	nm	nm	nm	nm	nm
EBIT margin	%	nm	nm	nm	nm	nm
NPAT margin	%	nm	nm	nm	nm	nm
ROE	%	nm	nm	nm	nm	nm
ROA	%	nm	nm	nm	nm	nm
Net tangible assets per share	\$	0.0	0.0	0.0	0.0	0.0
Book value per share	\$	0.0	0.0	0.0	0.0	0.0
Net debt/(cash)	\$m	(0.8)	(4.6)	(15.2)	(5.2)	(6.6)
Interest cover/ (EBIT/net interest)	x	nm	nm	nm	nm	nm
Gearing (net debt/EBITDA)	x	nm	nm	nm	nm	nm
Leverage (net debt/(net debt + equity))	x	nm	nm	nm	nm	nm
DUPOINT ANALYSIS						
		FY20A	FY21A	FY22A	FY23E	FY24E
Net Profit Margin	%	nm	nm	nm	nm	nm
Asset Turnover	x	0.3	0.0	0.1	0.3	1.5
Return on Assets	%	nm	nm	nm	nm	nm
Financial Leverage	x	0.0	0.0	0.0	5.3	7.2
Return on Equity	%	nm	nm	nm	nm	nm
HALF YEARLY DATA						
		2H20	1H21	2H21	1H22	2H22
Total Revenue	\$m	0.8	0.2	0.5	1.8	1.5
Operating expenses	\$m	(6.1)	(8.6)	(5.0)	(6.9)	(6.1)
EBITDA	\$m	(5.3)	(8.4)	(4.5)	(5.1)	(5.0)
EBIT	\$m	(5.4)	(8.4)	(4.6)	(5.1)	(5.1)
PBT	\$m	(2.8)	(8.4)	(2.4)	(5.1)	(4.9)
Reported NPAT	\$m	(2.8)	(8.4)	(2.4)	(5.1)	(4.9)
PROFIT AND LOSS						
		FY20A	FY21A	FY22A	FY23E	FY24E
Revenue	\$m	2.2	0.4	0.5	3.0	3.0
Other income	\$m	0.0	0.4	2.8	2.6	2.6
Total Revenue	\$m	1.0	1.4	3.3	5.6	5.6
Operating expenses	\$m	(11.0)	(13.7)	(13.4)	(17.0)	(17.0)
EBITDA	\$m	(9.1)	(13.0)	(10.3)	(11.5)	(11.5)
Depreciation & Amortisation	\$m	0.3	0.1	0.2	0.1	0.1
EBIT	\$m	(8.8)	(12.8)	(10.1)	(11.4)	(11.4)
Net interest	\$m	(2.6)	(2.2)	0.0	0.1	0.1
Pretax Profit	\$m	(11.4)	(15.0)	(10.0)	(11.4)	(11.4)
Tax expense	\$m	0.0	0.0	0.0	0.0	0.0
Reported NPAT	\$m	(11.4)	(15.0)	(10.0)	(11.4)	(11.4)
Weighted average diluted shares	m	316.0	901.0	2,173.9	2,208.3	2,208.3
GROWTH PROFILE						
		FY20A	FY21A	FY22A	FY23E	FY24E
Revenue	%	0.0	39.4	132.1	66.4	66.4
EBITDA	%	(25.7)	45.5	(21.5)	13.7	13.7
EBIT	%	(19.9)	41.8	(20.9)	12.3	12.3
Reported NPAT	%	(3.4)	31.9	(33.2)	13.6	13.6
DPS	%	nm	nm	nm	nm	nm
BALANCE SHEET						
		FY20A	FY21A	FY22A	FY23E	FY24E
Cash	\$m	4.6	15.2	5.3	6.6	6.6
Receivables	\$m	0.6	0.6	1.6	1.2	1.2
Other	\$m	1.3	1.2	1.3	1.3	1.3
Current assets	\$m	6.5	16.9	8.2	9.2	9.2
PPE	\$m	0.2	0.1	0.2	0.2	0.2
Intangible assets	\$m	0.0	0.0	0.0	0.0	0.0
Other	\$m	0.0	0.0	0.1	0.1	0.1
Non current assets	\$m	0.2	0.1	0.3	0.3	0.3
Total assets	\$m	6.7	17.0	8.5	9.5	9.5
Trade and other payables	\$m	2.6	2.3	1.7	0.3	0.3
Borrowings	\$m	0.0	0.0	0.0	0.0	0.0
Other	\$m	0.7	0.7	1.3	1.3	1.3
Current liabilities	\$m	3.3	3.0	3.0	1.6	1.6
Other financial liability	\$m	0.0	0.0	0.0	0.0	0.0
Other liability	\$m	0.0	0.0	0.0	0.0	0.0
Non current liabilities	\$m	0.0	0.0	0.0	0.0	0.0
Total liabilities	\$m	3.3	3.0	3.0	1.6	1.6
Net assets	\$m	3.4	14.0	5.5	7.9	7.9
Share capital	\$m	87.7	110.2	110.5	124.3	124.3
Retained earnings	\$m	(58.3)	(73.4)	(83.4)	(94.8)	(94.8)
Other	\$m	(25.9)	(22.8)	(21.6)	(21.6)	(21.6)
Total equity	\$m	3.4	14.0	5.5	7.9	7.9
CASH FLOW						
		FY20A	FY21A	FY22A	FY23E	FY24E
Net loss for period	\$m	(11.4)	(15.0)	(10.0)	(11.4)	(11.4)
Depreciation & Amortization	\$m	0.3	0.1	0.2	0.1	0.1
Changes in working capital	\$m	0.3	0.0	0.0	0.0	0.0
Other	\$m	3.4	3.6	0.2	(1.0)	(1.0)
Operating cash flow	\$m	(7.3)	(11.3)	(9.6)	(12.4)	(12.4)
Payments for PPE	\$m	0.0	0.0	0.0	0.0	0.0
Other	\$m	(0.1)	(0.0)	(0.3)	(0.0)	(0.0)
Investing cash flow	\$m	(0.1)	(0.0)	(0.3)	(0.0)	(0.0)
Equity	\$m	11.4	22.9	0.0	13.7	13.7
Other	\$m	(0.1)	(1.0)	0.0	0.0	0.0
Financing cash flow	\$m	11.3	21.9	0.0	13.7	13.7
Cash year end	\$m	4.6	15.2	5.3	6.6	6.6
Free cash flow	\$m	(7.5)	(11.3)	(9.9)	(12.4)	(12.4)

Source: Company, MST Access.

Investment Thesis

Company Profile: Respiratory eHealth Specialist with Platform Solution

Adherium is a commercial-stage digital health technology company headquartered in Melbourne, Australia. The company develops and commercialises technologies that address suboptimal medication use and remote patient monitoring (RPM) and data management solutions in chronic respiratory disease. The company’s Hailie® solution uses proprietary inhaler-attaching sensor technology and a flexible service delivery cloud-based platform to support management of high-risk patient populations with chronic respiratory conditions such as ‘difficult-to-treat’ asthma and late-stage chronic obstructive pulmonary disease (COPD).

Company history: IPO and cornerstone AstraZeneca alliance added valuable experience

Adherium was founded by previous CEO Garth Sutherland in 2001 as Nexus6 and brought its first product to market in 2003. The company achieved 510(k) market clearance in 2009, introduced Bluetooth low-energy technology in 2012, and provided objective inhaler data capture in numerous clinical studies before listing on the ASX in 2015. The IPO raised A\$35m, supporting further product development of the company’s then Smartinhaler™ sensor range, along with branded sensor supply to key commercial client and multinational pharmaceutical company AstraZeneca (AZN). The company launched its first apps and portal in 2016. Adherium’s initial AZN agreement characterised the company’s main commercialisation strategy at the time, which relied on the sale of devices to international pharmaceutical companies, which in turn would provide them to patients via their distribution networks.

Business model: Delivering remote patient monitoring solutions to managers of high-risk populations with chronic conditions

Adherium’s transition to a medication adherence and data management platform provider widens its market scope to include all managers of large patient populations with chronic respiratory disease in the US healthcare value chain, such as integrated delivery networks, hospitals, and physician groups. Given the number of patients covered, these managers provide an opportunity to scale rapidly. The availability and recent expansion of reimbursement in the US for RPM (for physiological data) is also a key change in the market which supports adoption of Adherium’s Hailie® solution. We think successful deployment of the Hailie® platform with these companies and the release of value-adding enhancements, including physiological measures, will attract more clients and allow the company to realise its true value.

Adherium’s current portfolio of sensors covers 91% of the market (18 of the top 20 branded inhaler medications) vs 71% in 2021. This has been driven by (1) an expanded US reimbursement landscape with the new 2022 RTM code set published in January 2022, (2) a shift in the market share ranking of inhaler medications now covered by Adherium sensors, expanded by (3) Adherium obtaining FDA 510(k) clearance in July 2022 to market the connection of GlaxoSmithKline’s (GSK) Ellipta® inhaler with the Hailie® sensor with physiological parameters to monitor asthma/COPD medication use.

Exhibit 2 – Adherium corporate roadmap – Leveraging strategic partnerships and building scale



Source: Adherium.

Sensitivities and Risks

Adherium is operating in a relatively new and rapidly evolving segment of digital health. Commercialisation is still at an early stage and therefore exposes investors to various risks.

Competition

Explosive growth in telehealth and RPM, spurred on by the COVID-19 pandemic, has attracted a wide array of companies, including both new entrants and existing players seeking to grow their digital healthcare offering. Nonetheless, and despite the merger of market leaders Teladoc and Livongo in 2020, the market in the digital respiratory management category remains highly fragmented.

We think Adherium's sensor technology coupled with relatively broad coverage of inhaler presentations represent a competitive advantage over current inhaler e-monitoring device companies. By extension these sensors represent a significant point of differentiation when bundled with the highly scalable cloud-based platform given its ability to integrate multiple data inputs to create a powerful combination in chronic care management. Longer term we see value coming from data science-enabled insights that can be used to personalise management.

Realising Adherium's potential will take time, which adds execution risk and the further threat of new entrants or potential downstream customers developing their own digital health solutions in-house. Further, maintaining market share and competitive positioning could require additional marketing costs or price discounting.

Customers

Adherium's multi-channel strategy should deliver significant economies of scale subject to numbers and breadth of channel partners in the customer mix at any point in time. While working with managers of large patient populations supports rapid scaling of the business, an uneven distribution or concentration of revenues from a small group of customers in the mix could diminish pricing power. Further, contractual periods may not be competitive or acceptable, exposing the company to termination of large customer contracts and increased revenue volatility.

Resource and Capital Allocation

Adherium's commercial strategy relies on expansion of sensor coverage, integration of complementary devices onto its platform and identification of appropriate partners. These steps will involve appropriate allocation of resources and capital. Notwithstanding the technical risk, the challenge will be to sequence business initiatives and allocate resources effectively given current operating losses against strategic objectives.

Product Development and Regulatory Approval

Innovation and new product development will be required to fend off new entrants and increasing competition from established players as the market evolves. There is no guarantee that the company's investment into new products will meet the changing demands of the market or maintain favour with existing clients.

Reimbursement

Reimbursement is a key driver of adoption by physicians and payers. Recent changes to reimbursement policy in the US have been positive and largely driven by government responses to the COVID-19 pandemic. Although we think RPM will persist, current levels of reimbursement could be reduced over time.

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