

# Pixium Vision

## ESGO financing deal shores up balance sheet

Pixium has entered into a convertible notes financing arrangement with US-based healthcare investor European Select Growth Opportunities Fund (ESGO), for up to €30m of notes redeemable in cash and/or in shares, without interest, for a period of up to 36 months. The first tranche of €5.5m (gross) in notes was received on 14 July, and Pixium expects the funding will enable it to maintain operations to the end of Q123. While the possibility of a conversion of note tranche(s) to shares would increase the number of shares outstanding, this arrangement provides funding stability, thus enabling Pixium to execute on its Prima development strategy, which we believe could reach EU market approval in H125.

Year end	Revenue (€m)	PBT* (€m)	EPS* (€)	DPS (€)	P/E (x)	Yield (%)
12/20	2.1	(8.7)	(0.26)	0.0	N/A	N/A
12/21	2.7	(10.9)	(0.23)	0.0	N/A	N/A
12/22e	1.8	(12.3)	(0.22)	0.0	N/A	N/A
12/23e	0.8	(18.2)	(0.29)	0.0	N/A	N/A

Note: \*PBT and EPS are normalised, excluding amortisation of acquired intangibles, exceptional items and share-based payments.

## Funding to be used to advance the Prima programme

The [financing arrangement](#) is intended to allow Pixium to continue the [PRIMAvera registration-enabling European pivotal study](#) and complete patient enrolment, as well as to help fund the ongoing [US early feasibility study](#). PRIMAvra is designed to assess the Prima bionic vision system in 38 patients with geographic atrophy associated with dry age-related macular degeneration (dry-AMD). Pixium recently announced [the implantation of the first patient in the Netherlands](#). Assuming no significant new COVID-19 restrictions affect the European study sites, we remain confident that Pixium can meet its guidance of enrolment completion by year-end FY22. We maintain our estimate that primary 12-month data will be released in late 2023 or early 2024, leading to potential European approval in H125.

## Valuation: Minor changes to basic equity value/share

As of 26 July, Pixium's share price had declined c 56% from the €0.52 closing price on the day preceding the 14 July announcement, which we believe is likely due to investor concerns about the possibility of share dilution should note tranche(s) be converted to equity (as the amount of shares issued on a conversion request will depend on the prevailing share price). **Nonetheless, we believe the ability of the company to raise funding in a challenging capital market environment demonstrates continued support and market interest for Pixium's underlying technology and its potential in patients with severe vision loss attributed to dry-AMD.** Pixium reported H122 results with expenditures slightly above our forecasts. After raising our FY22e and FY23e expense rates and updating our €/€/\$ forex assumptions, we obtain a pipeline risk-adjusted net present value (rNPV) of €136.5m, versus €130.0m previously. After adding pro forma H122 €0.9m net debt, we determine an equity value of €135.6m, or €2.27 per basic share (vs €2.31 [previously](#)). Conversion of the outstanding drawn ESGO convertible notes at €0.22/share would adjust our equity valuation to €1.69/share.

## Financing update

### Healthcare equipment & services

27 July 2022

**Price** €0.23

**Market cap** €14m

\$1.00/€

Pro forma net debt (€m) at 30 June 2022 0.9  
excluding €0.9m in lease liabilities

Shares in issue 59.8m

Free float 67%

Code ALPIX

Primary exchange Euronext Growth Paris

Secondary exchange N/A

### Share price performance



% 1m 3m 12m

Abs (53.7) (53.6) (67.3)

Rel (local) (54.7) (51.9) (65.0)

52-week high/low €1.3 €0.2

### Business description

Pixium Vision develops bionic vision systems for patients with severe vision loss. Its lead product, Prima, is a wireless subretinal implant system designed for dry-AMD. The company started implantations as part of a European pivotal study in early 2021.

### Next events

Complete recruitment for PRIMAvra study H222

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## Review of financing characteristics

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The ESGO financing facility [is comparable to a previous financing facility that Pixium had entered into with ESGO in 2019](#), and it consists of zero-interest 12-month convertible notes. This new facility is divided into several tranches of notes, with each note having a nominal value of €10,000 and a maturity date of 12 months from the date of issue. The first three tranches amount to €9.5m and can be drawn in total within 140 calendar days of 13 July, with the remaining tranches drawn after an additional 140 days as required. Up to 3,000 notes can be issued as part of the facility over the 36-month duration, and the first tranche has now been drawn. This first tranche, which is for 550 notes and drawn on 13 July, provides Pixium with €5.5m in gross proceeds, of which €0.5m was used to repay a prior loan to ESGO. After factoring in issuance costs and the repayment of the prior loan, Pixium received about €4.615m net from this first tranche.

Pixium can draw down the second tranche (€2m, or 200 notes) in 70 calendar days (from 13 July), and the third tranche (also €2m, or 200 notes) in 70 calendar days following the second tranche. Subsequent tranches (up to 2,050 notes, or €20.5m) can be drawn 140 calendar days after the third tranche.

The notes are exercisable under usual circumstances at 95% of the lowest of the volume-weighted average daily price of Pixium shares in the 10 consecutive trading days immediately preceding the date of receipt of a conversion notice by Pixium (but excluding any trading days during which the investor sold any Pixium shares on the market). ESGO also has the option of requesting payment in cash or in shares.

To date, 30 notes (representing €0.3m in nominal debt) have been converted to equity, [leading to the issuance of 1.06m shares](#). Altogether, at the 26 July closing price of €0.23/share, the conversion of the remainder of the first tranche (520 notes) at a hypothetical conversion price of €0.22/share would lead to the issuance of 23.8m additional Pixium shares. Hence, this would dilute existing shareholders by c 28% (ie an investor with a 1% theoretical interest in Pixium would have their equity interest reduced to 0.72%).

We note that Pixium Vision is not obliged to draw on any of the remaining €24.5m in tranches covered by the ESGO agreement. The company continues to engage in dialogue with potential investors and is seeking additional potential sources of funding.

## H122 financial update

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Pixium [reported H122 results](#), which showed a slightly higher loss compared to our prior estimates, with an operating loss of €6.1m (H121: €4.8m), above our €5.2m estimate. R&D costs of €4.1m (+11% y-o-y) came above our €3.7m forecast, with the yearly rise driven by increased activity as the PRIMavera study increased enrolment as it covers more study sites. SG&A (including depreciation) was €3.1m (+4% y-o-y) versus our €2.3m estimate. The increase in SG&A was attributed by management as due to legal costs incurred as the company explored financing options, but we note that in H121 the company had also reported increased legal and other costs in relation [to the unsuccessful Second Sight transaction](#). Altogether, Pixium reported a free cash outflow (net operating cash flows plus net capex outflows) of €7.1m (H121: €6.1m), above our €5.2m estimate. The company reported a gross cash position of €7.22m, and €8.38m in total gross debt, resulting in a net debt position of €1.16m, excluding €0.9m in lease liabilities. This compared to a net cash position of €6.4m at YE21 excluding lease liabilities. Subsequent to quarter-end, €0.3m of the first ESGO tranche was converted to equity and hence we assume H122e pro forma net debt is €0.86m.

Operationally, the company maintains its guidance for reporting 12-month data for the [PRIMAvera](#) pivotal study at around YE23. The recent announcement of the first implantation at Rotterdam Eye Hospital in the Netherlands follows successful implantations within the PRIMAvera study in sites across the UK, France and Germany. The company expects new sites to open in Spain and Italy. We continue to estimate that the company could receive potential European market approval and launch the product in H125. Pixium also expects to complete enrolment for the five-patient US feasibility study ([PRIMA-FS-US](#)) before YE22.

## Valuation and financials

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Following the reported H122 financials, we have increased our operating expenditure (and primarily R&D cost) forecasts for 2022 and 2023, but have not revised our local-currency operating revenue projections, which remain comparable [to those published in our previous note](#). We now expect FY22e and FY23e operating losses of €12.5m, and €16.5m, respectively, up from our prior estimates of €10.4m and €14.1m, respectively. We have raised our PRIMAvera trial expenditure cost forecasts for FY22 and FY23 given the H122 expenditure rate. As a reminder, we also expect FY23e R&D costs to increase year-on-year as our model projects that the company will potentially start a separate US pivotal study in 2023. The company is continuing to work with the FDA to potentially enable PRIMAvera to be used as part of the strategy for eventually obtaining US registration and we plan to revise our forecasts accordingly once greater clarity is provided on the US clinical development path.

We have rolled forward our valuation and updated our forecasts to reflect the significant appreciation of the US dollar (we assume euro parity to the US dollar, versus our prior estimate of \$1.10/€). We have also made minor adjustments to our interest rate, working capital and depreciation forecasts. We assume a free cash outflow rate of €13.3m and €20.4m in FY22e and FY23e respectively, up from our prior respective estimates of €8.3m and €18.5m.

The first tranche (€5.5m initially, now reduced to €5.2m following conversions to date) of the ESGO facility is expected to enable Pixium to maintain operations through Q123. Including this tranche, we assume the company will raise €8.3m in total net debt in H222 (modelled as illustrative debt, although we believe this is likely to be funded by the ESGO facility), and a further €37m before the end of FY24, to complete the PRIMAvera study and all EU-related regulatory and preparatory commercial activities to bring Prima to commercial launch.

We now expect end-FY22 net debt (excluding leases) of €7.1m, up from €3.2m previously.

Following the adjustments described above, we now derive a pipeline rNPV of €136.5m, up from €130.0m previously. After including €0.9m pro forma H122 net debt, we determine an equity value of €135.6m, or €2.27 per basic share (previously €2.31 per share).

**Exhibit 1: Pixium Vision rNPV assumptions**

Product contribution	Indication	Status	NPV (€m)	Probability of success	rNPV (€m)	rNPV/share (€)	Launch year	Peak sales (€m) in 2030
Prima (net of R&D and SG&A costs) in EU market	Age-related macular degeneration with geographic atrophy	Pivotal study	593.9	25.00%	135.4	2.27	H125	474
Prima (net of R&D and SG&A costs) in US market	Age-related macular degeneration with geographic atrophy	Human feasibility trials	492.0	20.00%	95.9	1.61	H226	539
Net capex, NWC & taxes (Global)			(412.5)		(94.9)	(1.59)		
Total			673.5		136.5	2.28		
Pro forma Net cash (debt) at 30 June 2022 adjusted for ESGO note conversions to equity			(0.9)		(0.9)	(0.01)		
<b>Total equity value</b>			672.6		135.6	2.27		
Basic shares outstanding (000)			59,756					

Source: Edison Investment Research. Note: NWC refers to net working capital.

Assuming conversion of the €5.2m outstanding ESGO convertible notes from the first tranche at €0.22/share, and adjusting our net cash calculations accordingly, would adjust our equity valuation to €1.69/share from the addition of the resulting 23.8m shares.

**Exhibit 2: Financial summary**

	€000s	2018	2019	2020	2021	2022e	2023e
Year end 31 December		IFRS	IFRS	IFRS	IFRS	IFRS	IFRS
<b>PROFIT &amp; LOSS</b>							
Revenue		1,598	1,782	2,092	2,655	1,844	800
Cost of Sales		(41)	0	0	0	0	0
General & Administrative		(2,019)	(3,572)	(4,008)	(5,084)	(5,147)	(6,204)
Research & Development		(5,297)	(6,563)	(5,704)	(7,282)	(8,786)	(10,800)
EBITDA		(5,758)	(8,352)	(7,620)	(9,712)	(12,089)	(16,204)
Depreciation		(677)	(448)	(366)	(549)	(403)	(295)
Amortization		0	0	0	0	0	0
Operating Profit (before exceptionals)		(6,435)	(8,801)	(7,986)	(10,261)	(12,492)	(16,500)
Exceptionals		(5,859)	(69)	(448)	0	0	0
Other		0	0	0	0	0	0
Operating Profit		(12,294)	(8,870)	(8,434)	(10,261)	(12,492)	(16,500)
Net Interest		(1,277)	(1,006)	(699)	(669)	224	(1,673)
Profit Before Tax (norm)		(7,712)	(9,806)	(8,685)	(10,930)	(12,268)	(18,172)
Profit Before Tax (FRS 3)		(13,571)	(9,876)	(9,133)	(10,930)	(12,268)	(18,172)
Tax		0	0	0	0	0	0
Profit After Tax and minority interests (norm)		(7,712)	(9,806)	(8,685)	(10,930)	(12,268)	(18,172)
Profit After Tax and minority interests (FRS 3)		(13,571)	(9,876)	(9,133)	(10,930)	(12,268)	(18,172)
Average Number of Shares Outstanding (m)		18.5	22.3	34.0	48.5	56.5	63.5
EPS - normalised (€)		(0.42)	(0.44)	(0.26)	(0.23)	(0.22)	(0.29)
EPS - normalised and fully diluted (€)		(0.42)	(0.44)	(0.26)	(0.23)	(0.22)	(0.29)
EPS - (IFRS) (€)		(0.73)	(0.44)	(0.27)	(0.23)	(0.22)	(0.29)
Dividend per share (€)		0.0	0.0	0.0	0.0	0.0	0.0
<b>BALANCE SHEET</b>							
Fixed Assets		3,666	4,507	3,410	2,684	2,176	1,901
Intangible Assets		2,623	2,361	1,727	1,341	1,162	1,162
Tangible Assets		1,042	2,145	1,683	1,343	1,014	739
Current Assets		17,756	9,107	12,721	16,945	13,360	5,904
Short-term investments		0	0	0	0	0	0
Cash		15,629	6,792	10,566	14,505	9,618	2,250
Other		2,126	2,316	2,155	2,440	3,742	3,654
Current Liabilities		(2,044)	(2,880)	(3,885)	(6,483)	(6,002)	(2,881)
Creditors		(2,044)	(2,880)	(3,349)	(4,895)	(3,728)	(607)
Short term borrowings		0	0	(536)	(1,588)	(2,274)	(2,274)
Long Term Liabilities		(8,023)	(7,033)	(7,682)	(7,332)	(15,099)	(28,099)
Long term borrowings		(7,870)	(5,787)	(6,604)	(6,500)	(14,425)	(27,425)
Other long term liabilities		(153)	(1,246)	(1,078)	(832)	(674)	(674)
Net Assets		11,355	3,700	4,564	5,814	(5,565)	(23,175)
<b>CASH FLOW</b>							
Operating Cash Flow		(6,174)	(7,282)	(6,207)	(8,160)	(13,487)	(18,676)
Net Interest		(1,277)	(1,006)	(699)	(669)	224	(1,673)
Tax		0	0	0	0	0	0
Net Operating Cash Flow		(7,450)	(8,288)	(6,906)	(8,829)	(13,263)	(20,349)
Capex		(31)	(34)	(82)	(48)	(45)	(20)
Acquisitions/disposals		0	0	0	0	0	0
Financing		14,068	2,034	9,055	13,170	290	0
Net Cash Flow		6,587	(6,288)	2,067	4,293	(13,018)	(20,369)
Opening net debt/(cash)		(1,401)	(7,760)	(1,004)	(3,426)	(6,417)	7,081
HP finance leases initiated		0	0	0	0	0	0
Other		(228)	(468)	354	(1,302)	(480)	0
Closing net debt/(cash)		(7,760)	(1,004)	(3,426)	(6,417)	7,081	27,449
Lease debt		N/A	1,346	1,258	1,045	900	900
Closing net debt/(cash) inclusive of IFRS 16 lease debt		(7,760)	342	(2,168)	(5,372)	7,981	28,349

Source: Company data, Edison Investment Research

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