

**Action Summary – 15 May 2024**

Analyst Theodore R. O'Neill – Business and model update

- Company is executing its plan to achieve greater recurring revenue through subscriptions and services. In 2024, we expect SaaS subscriptions to become the dominant source of revenue.
- We believe its VIROO® platform is taking share and becoming a global benchmark for multi-user VR applications. Its combination of security features, and simplicity of operation are driving adoption.
- **Larger Contracts.** The company is increasingly seeing larger contracts with it recently signing off for 12 new VIROO® rooms and a new 3-year subscription from another
- **Expansion in the U.S.** ~40% of 2023 signed contracts were from customers in the U.S. Supporting this new business, the company appointed a new executive to lead its U.S. Operations. John Cunningham was appointed in 2023. He has built high performing direct and indirect sales organizations for leading technology companies such as Unity Technologies (private), Aruba Networks (private), Motorola (MSI-NR), HP (HPE-NR), & Verizon (VZ-NR). As a pioneer in the XR and AI industry, John helped organizations such as the US Department of Defense, Army Corps of Engineers, Lockheed Martin (LMT-NR), NASA, Siemens Energy, and the City of Orlando implement XR and AI into their operations.
- **Adjusting our 2024 and 2025 estimates.** While this is a company whose customers are driven by changes in technology and should be somewhat immune to slowing global GDP growth, out of an abundance of caution for potentially slowing worldwide GDP, we have lowered our 2024 EPS estimates to €0.03 from €0.04. For 2025 we have lowered our revenue and EPS estimates to €5.4MM and €0.037 from €6.2MM and €0.07, respectively.
- **Attractive Valuation.** Based on our discounted future earnings model, the value of all future earnings stands at €10/share.

5/14 price: €8.00	Market cap: €36 million	Multiple of book: 24x	Market Cap/2025 Sales: 7.2
Diluted shares outstanding: 4.5MM	Insider ownership: >80%	3-mo avg. daily trading volume: 400	Dividend/Yield: NA/NA

**GAAP estimates (EPS in EUR – Revenue in EUR thousands)**

Period	EPS	Revenue	Op Margin
1H22A	N/A	€1,484	
2H22A	N/A	€1,735	
FY22A	<u>N/A</u>	<u>€3,219</u>	<u>0.88%</u>
1H23A	€0.04	€2,148	
2H23A	<u>(€0.04)</u>	<u>€2,404</u>	
FY23A	<u>€0.00</u>	<u>€4,552</u>	<u>3.38%</u>
1H24E	€0.01	€2,400	
2H24E	<u>€0.02</u>	<u>€2,700</u>	
FY24E	<u>€0.03</u>	<u>€5,100</u>	<u>6.47%</u>
1H25E	€0.01	€2,500	
2H25E	<u>€0.03</u>	<u>€2,900</u>	
FY25E	<u>€0.04</u>	<u>€5,400</u>	<u>7.30%</u>

Numbers may not total due to rounding. See the full model at the end of this report.

**Cash balance (in EUR thousands)**

• 2022A	• €172
• 2023A	• €301
• 2024E	• €659
• 2025E	• €109

**Debt (in EUR thousands)**

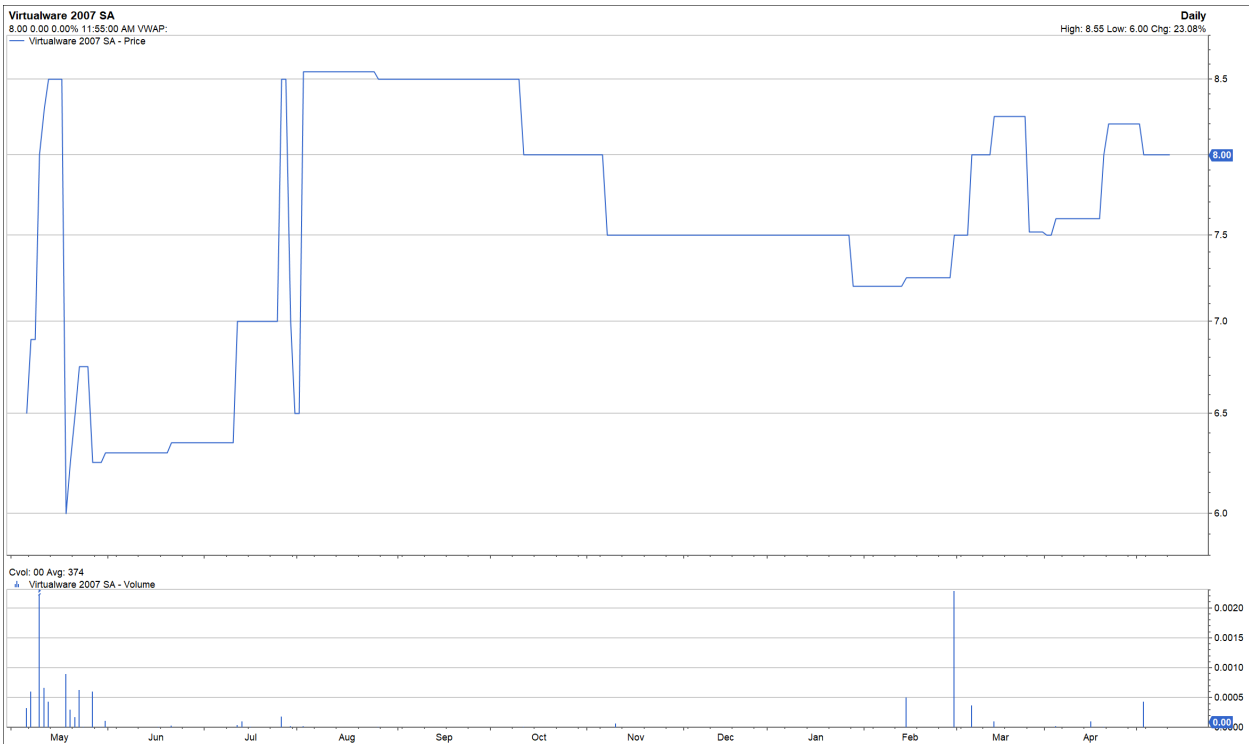
• 2022A	• €1,197
• 2023A	• €1,000
• 2024E	• €1,000
• 2025E	• €1,000

**Risks/Valuation**

- Risks: emerging technology, potentially competitive markets, regulatory risk, technological risk, foreign currency exchange risk
- Our €10 price target is derived from our discounted future earnings model.

**Company description:** Virtualware S.A. develops industrial virtual reality platforms for the nuclear, medical, educational, and defense industries in Spain and internationally. Founded in 2004, it has become the European leader in immersive technology for industrial use over time. Its flagship product, VIROO, offers VR as a Service, making Virtual Reality accessible to companies of all sizes and sectors. Additionally, Virtualware S.A. is involved in Evolv, a manufacturer of immersive tech-based medical rehabilitation devices.

Figure 1 – Virtualware – Eight Month Trading snapshot



Source: FactSet

## Valuation and Price Target

### Valuation Methodology

We believe MILVR is undervalued, and we support that belief with two valuation techniques. To determine our price target, we use a discounted future earnings model, which we then compare its valuation relative to peers. The following valuation techniques are being used:

- 1) The discounted value of all future earnings was used for our price target (see Figure 2)
- 2) Valuation relative to peers (see Figure 3)

### Discounted Future Earnings – Basis for Price Target

Our 12-month price target of €10 is based on a discounted earnings model. For valuation purposes, we sum up all future earnings and discount them by 8%. We assume the company grows rapidly until 2029 before growth eventually slows to GDP. Our valuation model is shown in Figure 2 below. Note, this model understates future new products and growth through acquisitions and probably understates the tax benefits, but offsetting that, the earnings never have a down year. The implied share price is €9.64, which we round to €10.

Figure 2 - Virtualware - Price Target Calculation

Implied Value of Future Discounted Earnings: € 9.64		
Year 0 is 2024		
Year	Forecast EPS	Discounted EPS
0	€ 0.03	€ 0.03
1	€ 0.04	€ 0.04
2	€ 0.08	€ 0.07
3	€ 0.18	€ 0.14
4	€ 0.35	€ 0.26
5	€ 0.58	€ 0.39
Terminal Value		€ 8.71

Source: Litchfield Hills Research LLC

### Valuation Relative to Peers

Figure 3 is a summary of our MLVR peer comparison. The average Market Cap/Sales for 2025 is ~4.67x and ranges from a low of 0.91x to a high of 7.19x and we would argue the shares should trade at the high end of the range. At our € 10.00 price target, its 2025 market cap to sales would be 8.3x and would define the high end of the range, but not by much. All of this broadly confirms our view that, along with our discounted earnings model, the shares are undervalued.

Figure 3 – Virtualware – Valuation of Peers

FactSet Ticker	Company Name	Closing Price USD	Market Cap USD \$MM	EV USD \$MM	LTM Sales USD \$MM	Market Cap / LTM Sales	2025 Consensus Market Cap / Sales
MTTR-US	Matterport, Inc. Class A	\$4.42	1,390	1,055	160	8.71	6.98
IMMR-US	Immersion Corporation	\$8.30	264	82	71	3.74	6.61
KOPN-US	Kopin Corporation	\$0.76	90	68	40	2.23	1.65
VUZI-US	Vuzix Corporation	\$1.20	78	62	10	7.81	7.19
TOBII-SE	Tobii AB	\$0.40	93	43	71	1.31	0.91
VRAR-US	Glimpse Group, Inc.	\$1.14	19	15	12	1.63	
EXR-GB	Engage XR Holdings PLC	\$0.02	12	3	4	3.13	
	Average					<b>4.08</b>	<b>4.67</b>
	High					8.71	7.19
	Low					1.31	0.91
	25th Percentile					1.63	1.28
	75th Percentile					5.78	6.98
MLVIR-FR	Virtualware 2007 SA	\$8.61	39	41	5	8.59	7.24

Source: Litchfield Hills Research LLC and FactSet

## Financial Projections and Guidance

The company does not provide guidance. We have sought to make our estimates conservative, but it is hard to model a rapidly changing market as the company continues to execute its expansion plans into new markets and with new customers. We assume there will be some share growth though share compensation and we expect there will be demand for working capital as the company grows and we have factored that into our balance sheet and cash flow calculations.

Figure 4 – Virtualware – Income Statement EUR €

	H1A	H2A	FY2022A	H1A	H2A	FY2023A	H1E	H2E	FY2024E	H1E	H2E	FY2025E
Business Total Revenue	1,484,378	1,734,997	3,219,375	2,148,018	2,403,990	4,552,008	2,400,000	2,700,000	5,100,000	2,500,000	2,900,000	5,400,000
Changes in inventories of finished goods and WIP	(28,243)	(151,089)	(179,332)	181,698	(175,300)	6,398	5,000	5,000	10,000	10,000	10,000	20,000
Work carried out by the company for its assets	313,984	324,922	638,906	241,174	286,434	527,608	225,000	225,000	450,000	275,000	275,000	550,000
Costs of Goods Sold	(422,299)	(346,243)	(768,542)	(452,601)	(731,524)	(1,184,125)	(600,000)	(675,000)	(1,275,000)	(600,000)	(696,000)	(1,296,000)
<b>Gross Profit</b>	<b>1,347,820</b>	<b>1,562,587</b>	<b>2,910,407</b>	<b>2,118,289</b>	<b>1,783,600</b>	<b>3,901,889</b>	<b>2,030,000</b>	<b>2,255,000</b>	<b>4,285,000</b>	<b>2,185,000</b>	<b>2,489,000</b>	<b>4,674,000</b>
<i>Unadjusted Gross Profit Margin %</i>	<i>75%</i>	<i>76%</i>	<i>75%</i>	<i>89%</i>	<i>66%</i>	<i>77%</i>	<i>77%</i>	<i>77%</i>	<i>77%</i>	<i>79%</i>	<i>78%</i>	<i>79%</i>
Other Operating Revenues	153,202	388,635	541,837	181,220	234,038	415,258	265,000	310,000	575,000	380,000	420,000	800,000
Personnel Expenses	(1,164,799)	(1,281,117)	(2,445,916)	(1,445,304)	(1,616,359)	(3,061,663)	(1,600,000)	(1,750,000)	(3,350,000)	(1,800,000)	(2,000,000)	(3,800,000)
Other Operating Expenses	(375,240)	(344,912)	(720,152)	(508,479)	(365,630)	(874,109)	(400,000)	(500,000)	(900,000)	(500,000)	(500,000)	(1,000,000)
Fixed Assets Depreciation and Amortization	(144,173)	(155,027)	(299,200)	(126,852)	(144,754)	(271,606)	(140,000)	(140,000)	(280,000)	(140,000)	(140,000)	(280,000)
Grants to non-financial assets and others allocation	59,533	-	59,533	21,605	21,605	43,210	-	-	-	-	-	-
Impairment gains/losses on disposal of NCA	-	-	-	(19,079)	(22,746)	(41,825)	-	-	-	-	-	-
Other Results	-	(18,324)	(18,324)	-	42,492	42,492	-	-	-	-	-	-
<b>Operating Income</b>	<b>(123,657)</b>	<b>151,842</b>	<b>28,185</b>	<b>221,400</b>	<b>(67,754)</b>	<b>153,646</b>	<b>155,000</b>	<b>175,000</b>	<b>330,000</b>	<b>125,000</b>	<b>269,000</b>	<b>394,000</b>
<i>Operating Margin %</i>	<i>-8.33%</i>	<i>8.75%</i>	<i>0.88%</i>	<i>10.31%</i>	<i>-2.82%</i>	<i>3.38%</i>	<i>6.46%</i>	<i>6.48%</i>	<i>6.47%</i>	<i>5.00%</i>	<i>9.28%</i>	<i>7.30%</i>
Financial revenues/(expenses)	(83,082)	(32,916)	(115,998)	(24,386)	(75,237)	(99,623)	(75,000)	(75,000)	(150,000)	(75,000)	(75,000)	(150,000)
<b>Income Before Tax</b>	<b>(206,739)</b>	<b>118,926</b>	<b>(87,813)</b>	<b>197,014</b>	<b>(142,991)</b>	<b>54,023</b>	<b>80,000</b>	<b>100,000</b>	<b>180,000</b>	<b>50,000</b>	<b>194,000</b>	<b>244,000</b>
Income Tax	-	525,933	525,933	-	(34,828)	(34,828)	(16,000)	(20,000)	(36,000)	(10,000)	(38,800)	(48,800)
<b>Net Income</b>	<b>(206,739)</b>	<b>644,859</b>	<b>438,120</b>	<b>197,014</b>	<b>(177,818)</b>	<b>19,196</b>	<b>64,000</b>	<b>80,000</b>	<b>144,000</b>	<b>40,000</b>	<b>155,200</b>	<b>195,200</b>
<i>Net Margin %</i>	<i>-13.93%</i>	<i>37.17%</i>	<i>13.61%</i>	<i>9.17%</i>	<i>-7.40%</i>	<i>0.42%</i>	<i>2.67%</i>	<i>2.96%</i>	<i>2.82%</i>	<i>1.60%</i>	<i>5.35%</i>	<i>3.61%</i>
EPS	€ 0.05	€ 0.14	€ 0.10	€ 0.04	€ (0.04)	€ 0.00	€ 0.01	€ 0.02	€ 0.03	€ 0.01	€ 0.03	€ 0.04
Number of shares	4,542,000	4,542,000	4,542,000	4,542,000	4,542,000	4,542,000	4,600,000	4,700,000	4,700,000	4,800,000	4,800,000	4,800,000

Source: Company reports and Litchfield Hills Research LLC

Figure 5 – Virtualware – Balance Sheet EUR €

	FY2025E	FY2024E	FY2023A	FY2022A	FY2021A
Cash and Equivalents	109,217	659,217	301,082	172,164	502,144
Accruals	2,000	2,000	5,586	1,815	2,578
Short-term financial investments	-	400,000	310,293	398,726	283,434
Short-term investments in group companies and associates	-	-	-	-	21,610
Account Receivables and others	2,900,000	2,500,000	2,985,406	1,203,148	2,757,026
Inventories	150,000	150,000	99,414	136,780	210,241
<b>urrent Assets</b>	<b>3,161,217</b>	<b>3,711,217</b>	<b>3,701,782</b>	<b>1,912,633</b>	<b>3,777,033</b>
Deferred tax assets	2,000,000	2,000,000	2,088,204	2,120,730	1,592,634
Long-term financial investments	60,000	60,000	38,623	64,367	130,867
Long-term investments in group companies and associates	108,575	108,575	108,575	35,297	-
Property, plant and equipment	170,208	170,208	170,208	92,621	89,014
Intangible Assets	2,000,000	1,600,000	1,745,986	1,410,187	989,234
<b>on-Current Assets</b>	<b>4,338,783</b>	<b>3,938,783</b>	<b>4,151,596</b>	<b>3,723,202</b>	<b>2,801,749</b>
<b>otal Assets</b>	<b>7,500,000</b>	<b>7,650,000</b>	<b>7,853,377</b>	<b>5,635,835</b>	<b>6,578,782</b>
Short Term Accruals	1,000,000	1,000,000	1,220,851	508,181	
Account Payables and others	1,600,000	1,400,000	1,159,099	1,392,269	2,850,411
Short Term Debt	1,500,000	2,000,000	1,149,605	1,040,207	1,502,618
<b>urrent Liabilities</b>	<b>4,100,000</b>	<b>4,400,000</b>	<b>3,529,556</b>	<b>2,940,657</b>	<b>4,353,029</b>
Long Term Accruals	650,000	650,000	1,799,512	664,201	
Deferred tax liabilities	-	-	8,639	8,639	16,645
Long Term Debt	1,000,000	1,000,000	957,324	1,196,719	1,720,704
<b>on Current Liabilities</b>	<b>1,650,000</b>	<b>1,650,000</b>	<b>2,765,475</b>	<b>1,869,559</b>	<b>1,737,349</b>
Share Capital	1,300,000	1,200,000	1,144,840	799,625	409,402
Capital	158,970	158,970	158,970	158,970	158,970
Reserves and Retained earnings	1,513,282	1,318,082	1,174,082	640,655	250,432
Grants, donations and legacies received	350,000	300,000	342,980	35,227	67,254
External partners	100,000	100,000	70,527	(9,233)	11,748
Dividend Distributed -					
<b>quity</b>	<b>1,750,000</b>	<b>1,600,000</b>	<b>1,558,347</b>	<b>825,619</b>	<b>488,404</b>
<b>otal Equity And Liabilities</b>	<b>7,500,000</b>	<b>7,650,000</b>	<b>7,853,377</b>	<b>5,635,835</b>	<b>6,578,782</b>

Source: Company reports and Litchfield Hills Research LLC

Figure 6 – Virtualware – Cash Flow EUR €

	<u>FY2022A</u>	<u>FY2023A</u>	<u>FY2024E</u>	<u>FY2025E</u>
Net income/(loss)	438,120	19,196	144,000	195,200
Accruals	763	(3,771)	3,586	-
Short-term financial investments	(115,292)	88,433	(89,707)	400,000
Short-term investments in group companies and associat	21,610	-	-	-
Account Receivables and others	1,553,878	(1,782,258)	485,406	(400,000)
Inventories	73,461	37,366	(50,586)	-
Assets by deferred tax	(528,096)	120,730	-	(88,204)
Long-term financial investments	66,500	25,744	(21,377)	-
Long-term investments in group companies and associat	(35,297)	(73,278)	-	-
Property, plant and equipment	(3,607)	(77,587)	-	-
Intangible Assets	(420,953)	(335,799)	145,986	(400,000)
Short Term Accruals	508,181	712,670	(220,851)	-
Account Payables and others	(1,458,142)	(233,170)	240,901	200,000
Short Term Debt	(462,411)	109,398	850,395	(500,000)
Long Term Accruals	664,201	1,135,311	(1,149,512)	-
Liabilities by deferred tax	(8,006)	(0)	(8,639)	-
Long Term Debt	(523,985)	(239,395)	42,676	-
Capital	-	-	-	-
Reserves	(47,897)	514,232	-	-
Grants, donations and legacies received	(32,027)	307,753	(42,980)	50,000
External partners	(20,981)	79,760	29,473	-
Adjustments	-	(276,416)	(636)	-
<b>Total Cash Flow</b>	<b>(329,980)</b>	<b>(550,000)</b>	<b>358,136</b>	<b>(543,004)</b>

Source: Litchfield Hills Research LLC

**Disclosures:**

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Total return is defined as price appreciation plus dividend yield.

**Other Disclosures**



Virtualware S.A.

ENXTPA: MLVIR - Buy €10 PT

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