

Rhythm Pharmaceuticals

Focus on next round of pipeline updates for future upside; Reit. Buy and raising PO

Reiterate Rating: BUY | PO: 49.00 USD | Price: 41.51 USD

Current uptake is strong ... and we think largely baked in

RYTM shares have had an impressive bull run recently, which we think is warranted given the strong performance of Imcivree despite GLP-1 pressures. We revisit our model estimates and make several adjustments following conversations with RYTM mgmt and rare obesity KOLs. We note while our KOLs are impressed with Imcivree's clinical profile, its high annual price (~\$360K) continues to be an access barrier for BBS and PPL pts. We think this overhang with payor coverage will continue near term and as such lower our estimated BBS peak penetration to 30% (prev. 40%). We also no longer assume RYTM will lower Imcivree's price when it expands into HO per mgmt commentary. We now estimate peak un-risk- adjusted HO sales of \$1.5bn in 2032 (2H25 launch). We also continue to assume healthy commercial sales growth modeling peak BBS and PPL sales of \$570mn in 2029. Lastly, we increase our pipeline plug to \$700mn for RYTM's next-gen asset, RM-718, and recent LB54640 acquisition. While commercial performance looks largely baked into the current market price, we believe there is still room for potential upside within the pipeline. We reiterate our Buy with new \$49 PO (prev. \$31).

Future upside to come from pipeline opportunities

RYTM entered an agreement with LG Chem to acquire the global rights of LB54640 (oral MC4R agonist). At deal closing, RYTM will assume development responsibilities and expects to initiate the 2 planned ph 2 studies in HO and PPL later this year. The company highlighted LB54640 has demonstrated similar efficacy and safety to Imcivree in ph 1 studies but with no off-target hyperpigmentation. Mgmt notes the acquisition does not detract from their excitement for next-gen asset, RM-718, which is a weekly MC4R agonist also designed to mitigate hyperpigmentation (IND accepted; initiate ph 1 study in 1H24). We continue to view RYTM as a leader in rare obesity and are encouraged by the pipeline adds as they look to build on Imcivree's commercial success.

KOLs bullish on HO as long as reimbursement is there

Mgmt also reported the ph 3 trial evaluating Imcivree in HO has completed enrollment with topline data expected in 1H25. To help set expectations, we spoke to two KOLs who highlighted the 25.5% weight loss reduction seen in the 1-yr LTE HO study is a significant improvement over GLP-1 combo (<13%) and single agent (<10%) options. Both KOLs expect the ph 2 and LTE data to translate to ph 3 as the usage of a pbo should increase the treatment effect given these pts almost never naturally lose weight. If approved today, our KOLs would offer Imcivree to 100% of their HO pts. However, both KOLs expect patient access will likely be the biggest hurdle for uptake given current challenges in getting Imcivree covered for their BBS and PPL pts.

Estimates (Dec) (US\$)	2021A	2022A	2023E	2024E	2025E
EPS	(1.40)	(3.47)	(3.16)	(2.25)	(0.35)
EPS Change (YoY)	53.9%	-147.9%	8.9%	28.8%	84.4%
Consensus EPS (Bloomberg)			(3.19)	(2.38)	(1.37)
DPS	0	0	0	0	0
Valuation (Dec)					
Free Cash Flow Yield*	-6.2%	-7.4%	-6.5%	-4.2%	-0.1%

* For full definitions of *IQmethod*SM measures, see page 5.

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Refer to important disclosures on page 6 to 8. Analyst Certification on page 4. Price Objective Basis/Risk on page 4.

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Timestamp: 11 January 2024 04:29PM EST

11 January 2024

Equity

Key Changes

(US\$)	Previous	Current
Price Obj.	31.00	49.00
2023E Rev (m)	80.2	78.7
2024E Rev (m)	170.4	155.3
2025E Rev (m)	383.4	291.6
2023E EPS	-3.11	-3.16
2024E EPS	-1.97	-2.25
2025E EPS	0.99	-0.35

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Stock Data

Price	41.51 USD
Price Objective	49.00 USD
Date Established	11-Jan-2024
Investment Opinion	C-1-9
52-Week Range	15.50 USD - 50.28 USD
Mrkt Val (mn) / Shares Out (mn)	2,350 USD / 56.6
Free Float	99.6%
Average Daily Value (mn)	35.50 USD
BoFA Ticker / Exchange	RYTM / NAS
Bloomberg / Reuters	RYTM US / RYTM.OQ
ROE (2023E)	-70.8%
Net Dbt to Eqty (Dec-2022A)	-18.6%
ESGMeter TM	Medium

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See page 3 for abbreviations

iQprofileSM Rhythm Pharmaceuticals

iQmethodSM – Bus Performance*

(US\$ Millions)	2021A	2022A	2023E	2024E	2025E
Return on Capital Employed	-67.1%	-50.1%	-48.8%	-41.9%	-7.4%
Return on Equity	-30.9%	-66.0%	-70.8%	-64.5%	-11.8%
Operating Margin	-5,391.9%	-1,101.1%	-235.5%	-87.5%	-8.7%
Free Cash Flow	(146)	(174)	(154)	(100)	(2)

iQmethodSM – Quality of Earnings*

(US\$ Millions)	2021A	2022A	2023E	2024E	2025E
Cash Realization Ratio	NM	NM	NM	NM	NM
Asset Replacement Ratio	0.4x	0.2x	10.0x	10.0x	10.0x
Tax Rate	NM	NM	NM	NM	NM
Net Debt-to-Equity Ratio	-20.2%	-18.6%	-82.0%	-72.0%	-61.9%
Interest Cover	NA	NA	NA	NA	NA

Income Statement Data (Dec)

(US\$ Millions)	2021A	2022A	2023E	2024E	2025E
Sales	3	17	79	155	292
% Change	NA	435.3%	366.1%	97.3%	87.8%
Gross Profit	3	15	70	138	260
% Change	NA	477.3%	374.8%	97.3%	87.8%
EBITDA	(171)	(181)	(186)	(136)	(26)
% Change	-24.7%	-5.6%	-2.8%	26.6%	81.0%
Net Interest & Other Income	100	(2)	4	4	5
Net Income (Adjusted)	(70)	(181)	(181)	(131)	(21)
% Change	48.0%	-160.2%	0%	27.4%	84.2%

Free Cash Flow Data (Dec)

(US\$ Millions)	2021A	2022A	2023E	2024E	2025E
Net Income from Cont Operations (GAAP)	(70)	(181)	(181)	(131)	(21)
Depreciation & Amortization	1	2	1	0	0
Change in Working Capital	14	(20)	(7)	(8)	(28)
Deferred Taxation Charge	NA	NA	NA	NA	NA
Other Adjustments, Net	(91)	26	39	45	52
Capital Expenditure	0	0	(5)	(5)	(5)
Free Cash Flow	-146	-174	-154	-100	-2
% Change	-19.8%	-18.6%	11.6%	35.1%	97.9%
Share / Issue Repurchase	162	204	125	0	0
Cost of Dividends Paid	0	0	0	0	0
Change in Debt	0	0	0	0	0

Balance Sheet Data (Dec)

(US\$ Millions)	2021A	2022A	2023E	2024E	2025E
Cash & Equivalents	59	128	281	194	197
Trade Receivables	1	6	11	21	49
Other Current Assets	248	220	46	50	79
Property, Plant & Equipment	3	2	17	21	26
Other Non-Current Assets	18	26	16	16	16
Total Assets	330	383	371	303	367
Short-Term Debt	0	0	0	0	0
Other Current Liabilities	43	40	45	64	97
Long-Term Debt	2	78	78	78	78
Other Non-Current Liabilities	NA	NA	NA	NA	NA
Total Liabilities	45	118	124	142	175
Total Equity	284	264	247	161	191
Total Equity & Liabilities	330	383	371	303	367

* For full definitions of iQmethodSM measures, see page 5.

Company Sector

Biotechnology

Company Description

Rhythm Pharmaceuticals is a biopharma company focused on developing and commercializing peptides for treatment of rare genetic metabolic disorders. Lead asset Imcivree (setmelanotide) is approved in POMC/PSCK1 and LepR deficiency obesities and Bardet-Biedl syndrome and is in late-stage development for multiple additional rare genetic diseases causing early-onset obesity.

Investment Rationale

We rate RYTM shares Buy. We believe that RYTM's lead asset, Imcivree, will address a severe unmet need in rare forms of early-onset obesity caused by genetic mutations. While launch in initial indications was slow given the limited number of patients, we see a larger market opportunity as the company expands to other indications including Bardet-Biedl syndrome. We look for signs of commercial sustainability as the launch progresses and potential impact from next-gen obesity drugs.

Stock Data

Average Daily Volume 855,137

Quarterly Earnings Estimates

	2022	2023
Q1	-1.05A	-0.92A
Q2	-0.89A	-0.82A
Q3	-0.79A	-0.76A
Q4	-0.75A	-0.66E

Abbreviations

BBS: Bardet Biedl syndrome

GLP-1: glucagon-like peptide 1

HO: hypothalamic obesity

IND: investigational new drug

KOL: key opinion leader

LTE: long-term extension

MC4R: melanocortin 4 receptor

Mgmt: management

Ph: phase

PPL: POMC (proopiomelanocortin), PCSK1 (proprotein convertase subtilisin/kexin type 1)
and LepR (leptin receptor) rare obesities

Price objective basis & risk

Rhythm Pharmaceuticals (RYTM)

Our DCF-derived PO of \$49/share includes \$27/share for Imcivree (setmelanotide) for treatment of POMC null, leptin receptor deficiency (LepR), Bardet-Biedl syndrome (BBS) and basket indication, and \$15/sh for hypothalamic obesity (HO). We use a 14% WACC on pipeline expenses, 11% on basket and HO, and 9% in approved indications including PPL deficiency and BBS. We assume no terminal value, consistent with other companies under coverage. The remainder of our valuation is cash and pipeline.

Downside risks to our price objective and estimates are unsuccessful clinical trials, lower-than-expected diagnosis rate, higher-than-expected operating costs, lower-than-expected market penetration, potential for dilutive cash raises in the future and any unexpected management changes.

Upside risks are faster-than-anticipated commercial uptake and progress in additional genetic obesity indications.

Analyst Certification

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US - Biotechnology Coverage Cluster

Investment rating	Company	BofA Ticker	Bloomberg symbol	Analyst
BUY				
	4D Molecular Therapeutics, Inc.	FDMT	FDMT US	Tazeen Ahmad
	Alnylam Pharmaceuticals	ALNY	ALNY US	Tazeen Ahmad
	Amicus Therapeutics	FOLD	FOLD US	Tazeen Ahmad
	Annexon Biosciences	ANNX	ANNX US	Tazeen Ahmad
	Apellis Pharmaceuticals	APLS	APLS US	Tazeen Ahmad
	Argenx SE	ARGX	ARGX US	Tazeen Ahmad
	Arvinas	ARVN	ARVN US	Tazeen Ahmad
	Ascendis Pharma	ASND	ASND US	Tazeen Ahmad
	Biocryst Pharmaceuticals Inc	BCRX	BCRX US	Tazeen Ahmad
	BioNTech	BNTX	BNTX US	Tazeen Ahmad
	Denali Therapeutics	DNLI	DNLI US	Tazeen Ahmad
	Inozyme Pharma, Inc.	INZY	INZY US	Tazeen Ahmad
	Merus	MRUS	MRUS US	Tazeen Ahmad
	Neurocrine Biosciences	NBIX	NBIX US	Tazeen Ahmad
	PepGen Inc	PEPG	PEPG US	Tazeen Ahmad
	Prothena Corporation	PRTA	PRTA US	Tazeen Ahmad
	Rhythm Pharmaceuticals	RYTM	RYTM US	Tazeen Ahmad
	Sarepta Therapeutics	SRPT	SRPT US	Tazeen Ahmad
	Ultragenyx Pharmaceuticals	RARE	RARE US	Tazeen Ahmad
NEUTRAL				
	Acadia Pharmaceuticals	ACAD	ACAD US	Tazeen Ahmad
	Incyte Corporation	INCY	INCY US	Tazeen Ahmad
	SAGE Therapeutics	SAGE	SAGE US	Tazeen Ahmad
UNDERPERFORM				
	Achilles Therapeutics	ACHL	ACHL US	Tazeen Ahmad
	Fate Therapeutics	FATE	FATE US	Tazeen Ahmad
	Fulcrum Therapeutics	FULC	FULC US	Tazeen Ahmad
	Pharvaris	PHVS	PHVS US	Tazeen Ahmad
	PTC Therapeutics	PTCT	PTCT US	Tazeen Ahmad

iQmethodSM Measures Definitions

Business Performance

Return On Capital Employed

Return On Equity
Operating Margin
Earnings Growth
Free Cash Flow

Quality of Earnings

Cash Realization Ratio
Asset Replacement Ratio
Tax Rate
Net Debt-To-Equity Ratio
Interest Cover

Valuation Toolkit

Price / Earnings Ratio
Price / Book Value
Dividend Yield
Free Cash Flow Yield
Enterprise Value / Sales

EV / EBITDA

Numerator

NOPAT = (EBIT + Interest Income) × (1 – Tax Rate) + Goodwill Amortization

Net Income
Operating Profit
Expected 5 Year CAGR From Latest Actual
Cash Flow From Operations – Total Capex

Numerator

Cash Flow From Operations
Capex
Tax Charge
Net Debt = Total Debt – Cash & Equivalents
EBIT

Numerator

Current Share Price
Current Share Price
Annualised Declared Cash Dividend
Cash Flow From Operations – Total Capex
EV = Current Share Price × Current Shares + Minority Equity + Net Debt +
Other LT Liabilities
Enterprise Value

Denominator

Total Assets – Current Liabilities + ST Debt + Accumulated Goodwill
Amortization
Shareholders' Equity
Sales
N/A
N/A

Denominator

Net Income
Depreciation
Pre-Tax Income
Total Equity
Interest Expense

Denominator

Diluted Earnings Per Share (Basis As Specified)
Shareholders' Equity / Current Basic Shares
Current Share Price
Market Cap = Current Share Price × Current Basic Shares
Sales

Basic EBIT + Depreciation + Amortization

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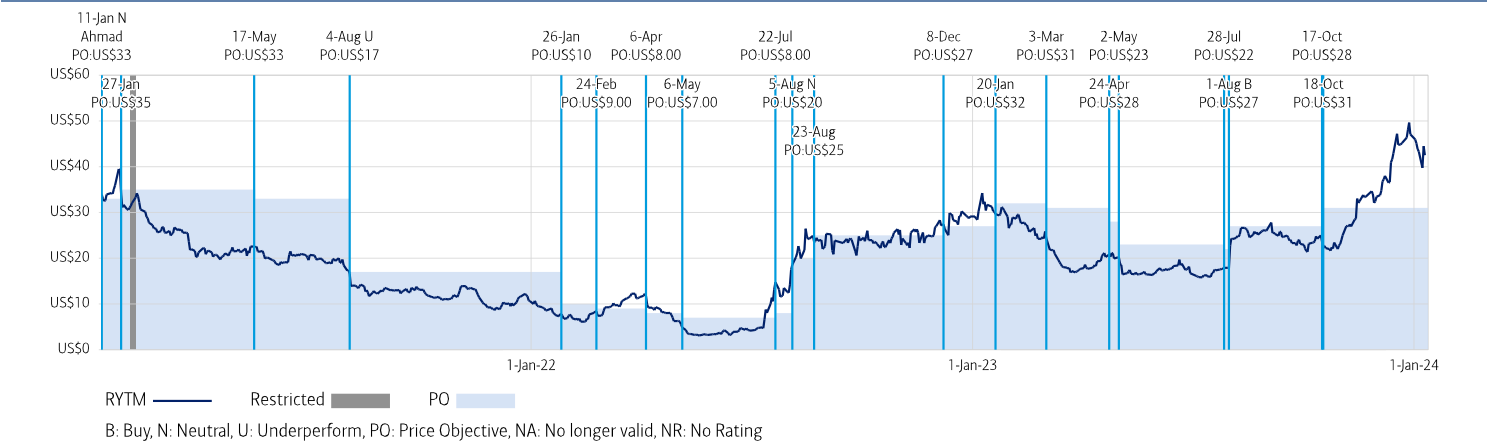
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Rhythm Pharmaceu (RYTM) Price Chart



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Equity Investment Rating Distribution: Health Care Group (as of 31 Dec 2023)

Coverage Universe	Count	Percent	Inv. Banking Relationships ^{R1}	Count	Percent
Buy	234	60.94%	Buy	115	49.15%
Hold	80	20.83%	Hold	36	45.00%
Sell	70	18.23%	Sell	29	41.43%

Equity Investment Rating Distribution: Global Group (as of 31 Dec 2023)

Coverage Universe	Count	Percent	Inv. Banking Relationships ^{R1}	Count	Percent
Buy	1895	53.62%	Buy	1083	57.15%
Hold	832	23.54%	Hold	454	54.57%
Sell	807	22.84%	Sell	383	47.46%

^{R1} Issuers that were investment banking clients of BofA Securities or one of its affiliates within the past 12 months. For purposes of this Investment Rating Distribution, the coverage universe includes only stocks. A stock rated Neutral is included as a Hold, and a stock rated Underperform is included as a Sell.

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Investment rating	Total return expectation (within 12-month period of date of initial rating)	Ratings dispersion guidelines for coverage cluster ^{R2}
Buy	≥ 10%	≤ 70%
Neutral	≥ 0%	≤ 30%
Underperform	N/A	≥ 20%

^{R2} Ratings dispersions may vary from time to time where BofA Global Research believes it better reflects the investment prospects of stocks in a Coverage Cluster.

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