where science meets humanity™

Second Quarter 2023

Financial Results and Business Update

July 25, 2023

Biogen

Non-GAAP financial information

This presentation and the discussions during this conference call include certain financial measures that were not prepared in accordance with accounting principles generally accepted in the U.S. (GAAP), including adjusted net income, adjusted diluted earnings per share, revenue growth at constant currency, which excludes the impact of changes in foreign exchange rates and hedging gains or losses, and free cash flow, which is defined as net cash flow from operations less capital expenditures. Additional information regarding the GAAP and Non-GAAP financial measures and a reconciliation of the GAAP to Non-GAAP financial measures can be found on slides 33-36 of this presentation and in the Q2 2023 earnings release and related financial tables posted on the *Investors* section of Biogen.com. We believe that these and other Non-GAAP financial measures provide additional insight into the ongoing economics of our business and reflect how we manage our business internally, set operational goals, and form the basis of our management incentive programs. Non-GAAP financial measures are in addition to, not a substitute for, or superior to, measures of financial performance prepared in accordance with GAAP.

We do not provide guidance for GAAP reported financial measures (other than revenue) or a reconciliation of forward-looking Non-GAAP financial measures to the most directly comparable GAAP reported financial measures because we are unable to predict with reasonable certainty the financial impact of items such as the transaction, integration, and other costs related to acquisitions or business development transactions; unusual gains and losses; potential future asset impairments; gains and losses from our equity security investments; and the ultimate outcome of litigation. These items are uncertain, depend on various factors, and could have a material impact on GAAP reported results for the guidance period. For the same reasons, we are unable to address the significance of the unavailable information, which could be material to future results.

Forward-looking statements

This presentation and the discussions during this conference call contain forward-looking statements, relating to: our strategy and plans; potential of, and expectations for, our commercial business and pipeline programs; capital allocation and investment strategy; clinical development programs, clinical trials, and data readouts and presentations; regulatory discussions, submissions, filings, and approvals; the potential benefits, safety, and efficacy of our and our collaboration partners' products and investigational therapies; the anticipated benefits and potential of investments, optimization of the cost structure including our "Fit for Growth" program, actions to improve risk profile and productivity of R&D pipeline, collaborations, and business development activities; our future financial and operating results; 2023 financial guidance. These forward-looking statements may be accompanied by such words as "aim," "anticipate," "believe," "could," "estimate," "expect," "forecast," "goal," "intend," "may," "plan," "potential," "possible," "prospect," "will," "would," and other words and terms of similar meaning. Drug development and commercialization involve a high degree of risk, and only a small number of research and development programs result in commercialization of a product. Results in early-stage clinical trials may not be indicative of full results or results from later stage or larger scale clinical trials and do not ensure regulatory approval. You should not place undue reliance on these statements.

These statements involve risks and uncertainties that could cause actual results to differ materially from those reflected in such statements, including: our dependence on sales from our products; uncertainty of long-term success in developing, licensing, or acquiring other product candidates or additional indications for existing products; failure to compete effectively due to significant product competition in the markets for our products; failure to successfully execute or realize the anticipated benefits of our strategic and growth initiatives; difficulties in obtaining and maintaining adequate coverage, pricing, and reimbursement for our products; our dependence on collaborators and other third parties for the development, regulatory approval, and commercialization of products and other aspects of our business, which are outside of our full control; risks associated with current and potential future healthcare reforms; risks related to commercialization of biosimilars; failure to obtain, protect, and enforce our data, intellectual property, and other proprietary rights and the risks and uncertainties relating to intellectual property claims and challenges; the risk that positive results in a clinical trial may not be replicated in subsequent or confirmatory trials or success in early stage clinical trials may not be predictive of results in later stage or large scale clinical trials or trials in other potential indications; risks associated with clinical trials, including our ability to adequately manage clinical activities, unexpected concerns that may arise from additional data or analysis obtained during clinical trials, regulatory authorities may require additional information or further studies, or may fail to approve or may delay approval of our drug candidates; the occurrence of adverse safety events, restrictions on use with our products, or product liability claims; risks relating to technology failures or breaches; problems with our manufacturing processes; risks relating to management and personnel changes, including attracting and retaining personnel; failure to comply with legal and regulatory requirements; the risks of doing business internationally, including currency exchange rate fluctuations; risks relating to investment in our manufacturing capacity; the direct and indirect impacts of the COVID-19 pandemic on our business; risks relating to the distribution and sale by third parties of counterfeit or unfit versions of our products; risks relating to the use of social media for our business; results of operations, and financial condition; fluctuations in our operating results; risks related to investment in properties; the market, interest, and credit risks associated with our investment portfolio; risks relating to share repurchase programs; risks relating to access to capital and credit markets; risks related to indebtedness; change in control provisions in certain of our collaboration agreements; fluctuations in our effective tax rate; environmental risks; and any other risks and uncertainties that are described in other reports we have filed with the U.S. Securities and Exchange Commission..

These statements speak only as of the date of this presentation. We do not undertake any obligation to publicly update any forward-looking statements.

Second quarter 2023 earnings call agenda

Introduction	**Chuck Triano** Head of Investor Relations
Key Highlights	**Christopher A. Viehbacher** President and Chief Executive Officer
R&D Update	**Priya Singhal, M.D., M.P.H.** Head of Development *Interim Head of Research*
Financial Update	**Michael McDonnell** Chief Financial Officer
Closing	**Christopher A. Viehbacher** President and Chief Executive Officer

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Key Highlights

Christopher A. Viehbacher

President and Chief Executive Officer

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Delivering breakthrough treatment for people with Alzheimer's

LEQEMBI®
(lecanemab-irmb) 100 mg/mL
INJECTION FOR INTRAVENOUS USE

First anti-amyloid mAb with Traditional Approval

CMS confirmed broader coverage with the CMS-facilitated registry now available to provide reimbursement and access

Regulatory filings under review in E.U., Japan, China, Canada, Great Britain and South Korea

Observed differentiated clinical profile

Efficacy observed across broad Early AD population, including low Tau population

Designed to target aggregated soluble and insoluble amyloid, providing potential for benefit from long-term dosing

ARIA-E rate of 12.5% observed in the Phase 3 Clarity AD Study

Launch underway in the U.S.

Activities focused on physician education and supporting healthcare infrastructure

Educating infusion centers on administration, safety and monitoring

ARIA education program in place

Biogen Eisai

Note: LEQEMBI (lecanemab-irmb) is being developed in collaboration with Eisai Co., Ltd; Eisai serves as the lead for lecanemab development and regulatory submissions globally; See LEQEMBI USPI for full prescribing information
AD = Alzheimer's disease; ARIA-E = amyloid-related imaging abnormality-edema; CMS = Centers for Medicare & Medicaid Services; mAb = monoclonal antibody

With “Fit for Growth”, we are refocusing our efforts to support sustainable growth

Where we were:

- High operating expenses despite mature product portfolio
- Over-investment in legacy products
- Highly centralized governance
- Many organizational layers and low span of control
- Neuro-focused R&D pipeline consisting of many high risk and expensive programs

Where we aim to be:

- Value-based decision making for existing products
- Competitive investment in new product launches
- Decision making closer to customers
- Greater agility, empowerment and accountability
- Focus on high value projects in R&D
- Potential diversification in rare diseases, immunology and neuropsychiatry

Reengineering of Biogen is expected to better align cost with expected revenue

Expected Cost Savings by 2025#

~ $1 Billion

Gross OPEX* Savings

~ $700 million

Net OPEX* Savings

Note: Estimated “Fit for Growth” savings are distinct from prior cost optimization initiatives
* OPEX = R&D expense + SG&A expense; # Expected savings based upon Biogen internal estimates vs. projected 2023 full year cost base

R&D Update

Priya Singhal, M.D., M.P.H.

Head of Development

Interim Head of Research

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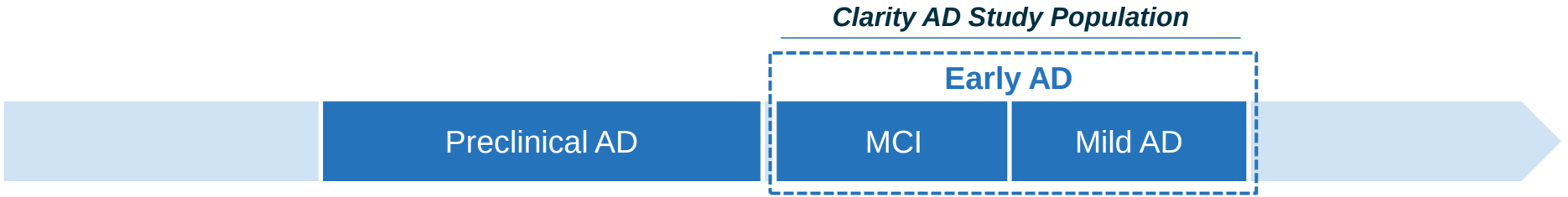
Continuing to generate data on LEQEMBI across early disease continuum



Phase 3 AHEAD 3 – 45 Trial
Potential to delay or prevent onset of AD

Subcutaneous formulation
New data from Clarity AD SC sub-study to be presented at CTAD '23
Expected Regulatory Filing by Q1 '24

Maintenance dosing
Data generation ongoing in Study 201
Expected Regulatory Filing by Q1 '24

Ongoing analysis of data from the Phase 3 Clarity AD study

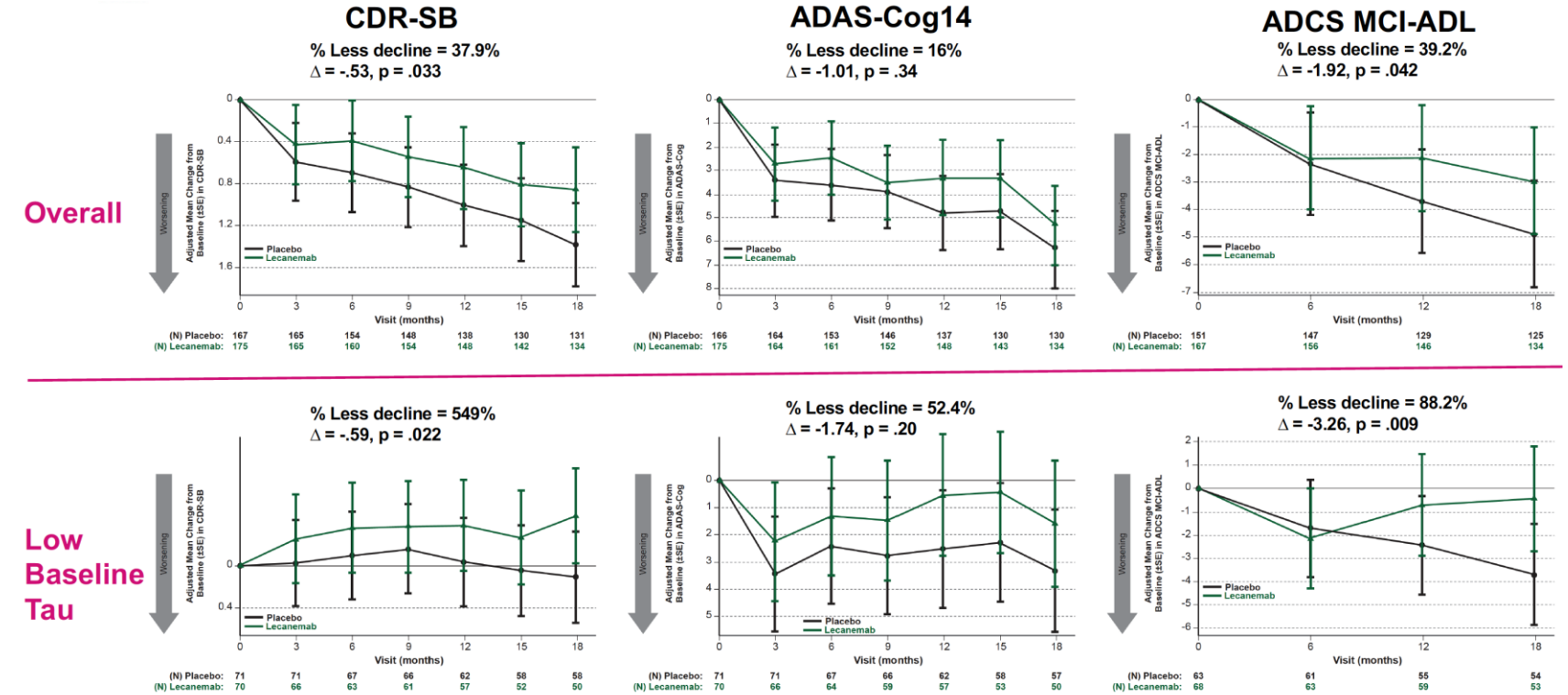
AHEAD 3-45 Trial
Evaluating preclinical Alzheimer's with varying levels of amyloid brain pathology*

- **A3:** intermediate Aβ (20-40 CL)
- **A45:** elevated amyloid (>40 CL)

Primary endpoints will evaluate change on Preclinical Alzheimer' Cognitive Composite 5 (A45) and change in amyloid PET (A3) vs. placebo

Note: LEQEMBI (lecanemab-irmb) is being developed in collaboration with Eisai Co.; Eisai serves as the lead for lecanemab development and regulatory submissions globally
*Amyloid brain pathology assessed via amyloid PET at screening
AD = Alzheimer's disease; CL = centiloid; CTAD = Clinical Trials on Alzheimer's Disease annual conference; MCI = mild cognitive impairment; OLE = open-label extension; PET = positron emission tomography; SC = subcutaneous

New analysis presented at AAIC shows slower clinical decline in low tau PET subgroup with LEQEMBI



Source: Irizary, AAIC 2023

Note: LEQEMBI (lecanemab-irmb) is being developed in collaboration with Eisai Co.; Eisai serves as the lead for lecanemab development and regulatory submissions globally
Data from Tau PET substudy and includes subjects with a baseline tau PET; Using the MK6240 tau PET probe, tau accumulation in the brain was defined as low tau accumulation group (MK6240 cutoff value <1.06, 141 subjects), intermediate accumulation group (MK6240 cutoff value between 1.06 and 2.91, 191 subjects), and high accumulation group (MK6240 cutoff value >2.91, 10 subjects); AD = Alzheimer's disease; PET = positron emission tomography

Advancing a diversified Alzheimer's pipeline that spans molecular targets and modalities

Program	Target	Modality	Preclinical	Phase 1	Phase 2	Phase 3	Marketed
ADUHELM (aducanumab)	Amyloid-β	mAb					
LEQEMBI (lecanemab)*	Amyloid-β	mAb					
BIIB080	Tau	ASO					
BIIB113	OGA	small molecule					
Undisclosed assets	Amyloid-β	mAb					
ATV-Amyloid-β	Amyloid-β	mAb					
Undisclosed assets	Genetically Validated Targets	undisclosed					

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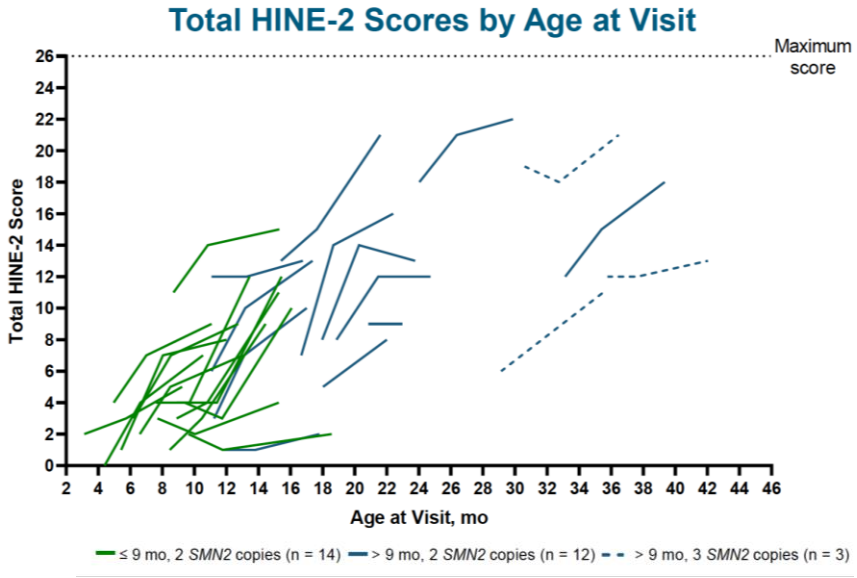
Eisai serves as the lead for lecanemab development and regulatory submissions globally; BIIB080 is licensed from Ionis Pharmaceuticals, Inc.; ATV-amyloid-β is licensed from Denali Therapeutics
ASO = antisense oligonucleotide; mAb = monoclonal antibody; OGA = O-GlcNAcase

New data presented at CureSMA show improved motor function in participants treated with SPINRAZA after Zolgensma®



Participants with two SMN2 copies (n=24) improved by a mean of over 5 points on HINE-2

Proud et al., CureSMA 2023

Phase 4 RESPOND Study

Open-label study evaluating SPINRAZA in participants who have previously received Zolgensma® and have suboptimal clinical status*

Most participants had investigator-reported suboptimal clinical status in multiple domains at baseline

Interim efficacy results show improvements in motor function in most participants as measured by increased mean total HINE-2 score from baseline to 6 months

No new emerging safety concerns have been identified in participants who received SPINRAZA after Zolgensma#

- SAEs were reported in 13/38 (34%) participants
- No SAEs were considered related to SPINRAZA or led to study withdrawal

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*Must have suboptimal clinical status in ≥ 1 of 4 domains (suboptimal motor function, abnormal swallowing/feeding ability for age; need for respiratory support or other) as determined by investigator at screening and Day 1 of study; #Median of 230.5 days in the study; HINE-2 = Hammersmith Infant Neurological Exam - section 2; SAE = serious adverse events; SMA = spinal muscular atrophy

Aiming to enable growth by optimizing R&D value

Completed initial substantial R&D prioritization with aim to improve the risk profile and productivity of the R&D pipeline

Programs to Watch

BIIB080 in Early AD

Tau-targeting ASO

Phase 1b data showed time- and dose-dependent reduction in CSF tau levels, and reduction in tau PET

Phase 2 CEILA Study currently ongoing

Litifilimab in Lupus

Subcutaneous anti-BDCA2 mAb

Estimated at least 5 million individuals worldwide have a form of Lupus[1]

Currently being evaluated in SLE (Phase 3) and CLE (Phase 2/3)

BIIB105 in Broad ALS

ATXN2-targeting ASO

~18,000 Americans may be living with ALS at any given time[2]

Phase 1/2 readout expected mid-year 2024

BIIB122 in Early PD

Small molecule LRRK2 inhibitor

Large unmet need with no approved disease-modifying therapies

Phase 2b LUMA Study currently ongoing

BIIB121 in Angelman Syndrome

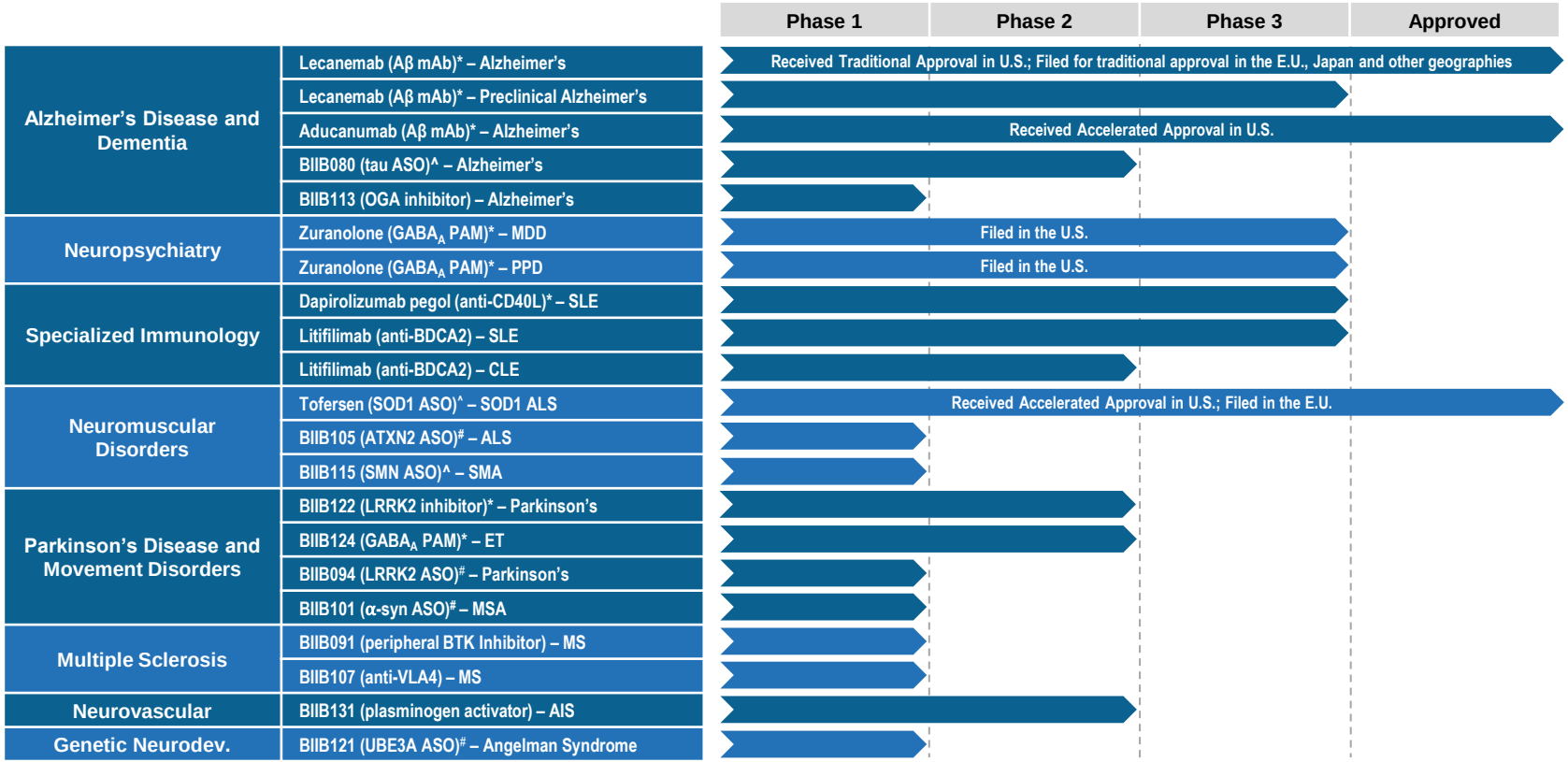
ASO designed to increase expression of functional UBE3A protein

Rare disease resulting in delayed development and intellectual disability

Phase 1 readout expected mid-2024

Note: BIIB080 is licensed from Ionis Pharmaceuticals, Inc; BIIB105 and BIIB121 are option agreements with Ionis Pharmaceuticals, Inc.; BIIB122 is a collaboration with Denali Therapeutics
1. Lupus Foundation of America https://www.lupus.org/resources/lupus-facts-and-statistics 2. Estimated using the same approach as Brown et al., 2021
ALS = amyotrophic lateral sclerosis; ASO = antisense oligonucleotide; BDCA2 = blood dendritic cell antigen 2; CLE = cutaneous lupus erythematosus; LRRK2 = leucine rich repeat kinase 2; mAb = monoclonal antibody; PD = Parkinson's disease; SLE = systemic lupus erythematosus

Advancing key late-stage assets with a reprioritized pipeline



Note: Q2 2023 update includes removal of BIIB122 Phase 3 program in Parkinson's LRRK2; Traditional approval of lecanemab (LEQEMBI) in the U.S.; Accelerated approval of tofersen (QALSODY) in the U.S.
* Collaboration program; # Option agreement; ^ Licensed from Ionis Pharmaceuticals, Inc.; AIS = acute ischemic stroke; ALS = amyotrophic lateral sclerosis; ASO = antisense oligonucleotide; CLE = cutaneous lupus erythematosus; ET = essential tremor; GABA = γ-Aminobutyric acid; Genetic Neurodev. = genetic neurodevelopmental disorders; LRRK2 = leucine rich repeat kinase 2; MDD = major depressive disorder; MS = multiple sclerosis; MSA = Multiple System Atrophy; OGA = O-GlcNAcase; PAM = positive allosteric modulator; PD = Parkinson's disease; PPD = postpartum depression; SLE = systemic lupus erythematosus; SOD1 = superoxide dismutase type 1; UBE3A = ubiquitin protein ligase E3A

Financial Update

Michael McDonnell

Chief Financial Officer

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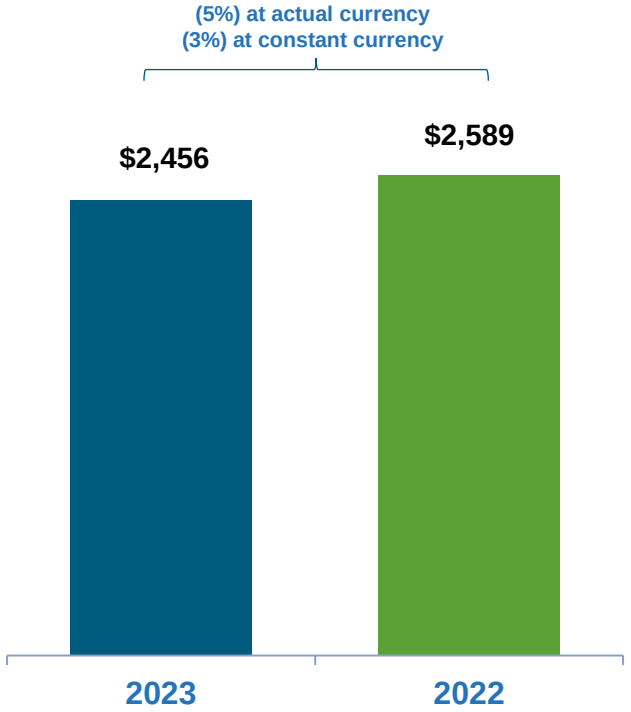
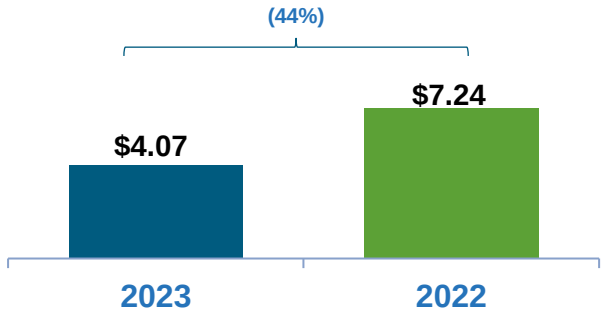
Second quarter 2023 financial results

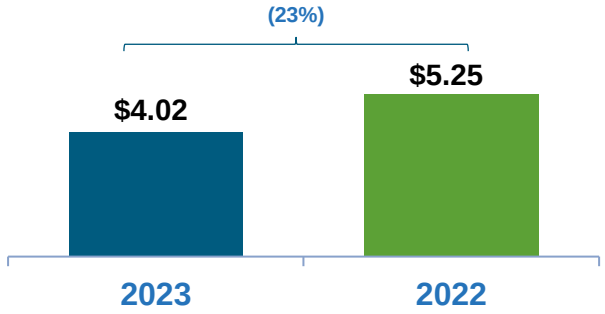
Q2 Total Revenue ($M)



Q2 GAAP Diluted EPS ($)



Q2 Non-GAAP Diluted EPS ($)



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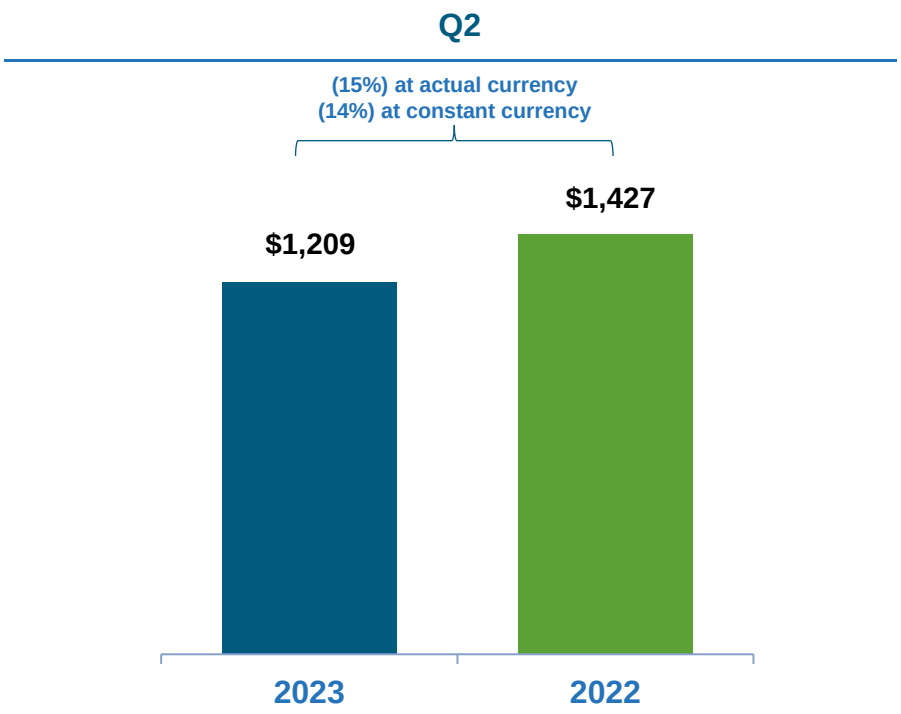
Percentage changes in revenue growth at constant currency are presented excluding the impact of changes in foreign currency exchange rates and hedging gains or losses. The current period's foreign currency revenue values are converted into U.S. dollars using the average exchange rates from the prior period.

Global multiple sclerosis product revenue

MS Product Revenue ($M)



Q2 2023 Highlights

- **TECFIDERA** was negatively impacted by generic competition in the U.S. and certain markets outside the U.S.
  - E.U. regulatory market protection extended until February 2, 2025
  - Some generics have not yet fully exited some E.U. markets
- **VUMERITY** benefited from a modest increase in global patients
- **TYSABRI** was negatively impacted by pricing pressure and competition
- **Interferons** were negatively impacted by the continued shift from injectable platforms to oral or high efficacy therapies

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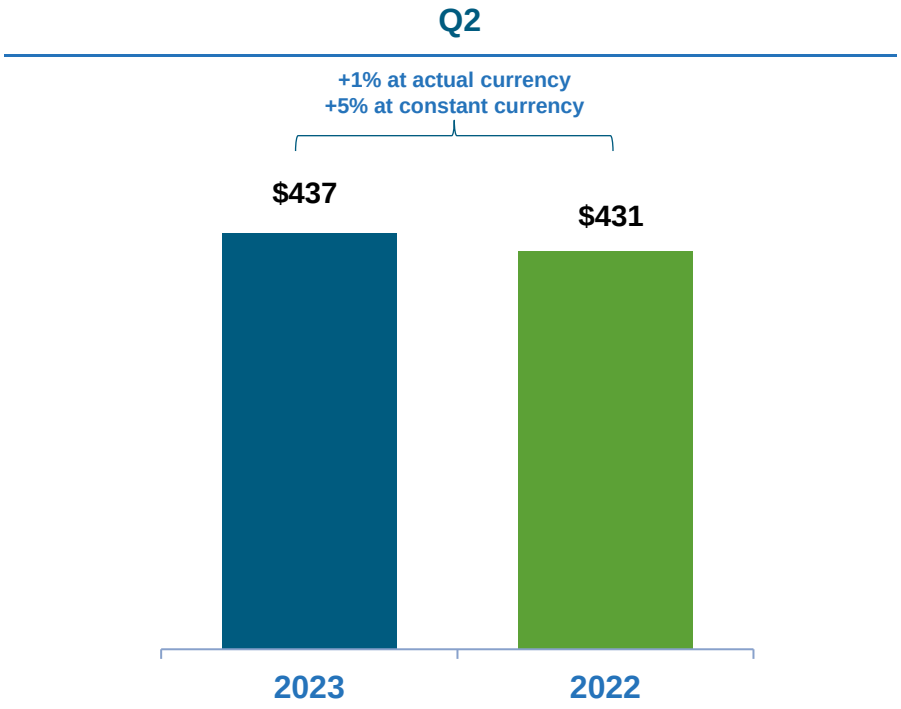
Global SPINRAZA revenue

SPINRAZA Revenue ($M)



Q2 2023 Highlights

- **U.S. SPINRAZA:** Revenue increased 12% with positive patient growth vs. prior year
- **ROW SPINRAZA:** Revenue declined 3% at actual currency and increased 1% at constant currency

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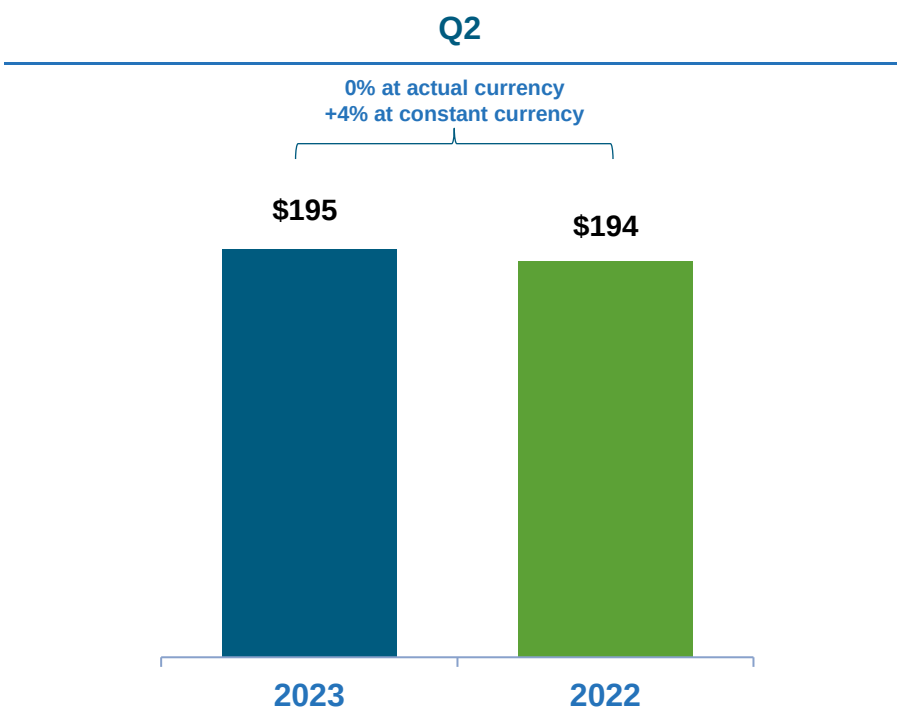
Biosimilars revenue

Biosimilars Revenue ($M)



Q2 2023 Highlights

- **Biosimilars:** Volume growth partially offset by continued pricing pressure for anti-TNFs in Europe
- **BYOOVIZ** (referencing LUCENTIS®) now launched in U.S., Canada, Germany, U.K., and Switzerland
- Process to evaluate strategic options for the biosimilars business ongoing

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Second quarter 2023 revenue highlights

($ in Millions)	Q2 2023	Q2 2022	Δ Y/Y	Δ (Constant Currency[#])
Multiple sclerosis product revenue[1]	$1,209	$1,427	(15%)	(14%)
Spinal muscular atrophy revenue[2]	$437	$431	1%	5%
Alzheimer's disease revenue[3]	($20)	$0	NMF	NMF
Biosimilars revenue	$195	$194	0%	4%
Other product revenue[4]	$4	$3	35%	32%
Subtotal	$1,825	$2,055	(11%)	(9%)
Revenue from anti-CD20 therapeutic programs	$433	$436	(1%)	(1%)
Contract manufacturing, royalty and other revenue[5]	$198	$98	102%	102%
Total revenue	**$2,456**	**$2,589**	**(5%)**	**(3%)**

[#] Percentage changes in revenue growth at constant currency are presented excluding the impact of changes in foreign currency exchange rates and hedging gains or losses. The current period's foreign currency revenue values are converted into U.S. dollars using the average exchange rates from the prior period.
[1] includes TECFIDERA, VUMERITY, AVONEX, PLEGRIDY, TYSABRI, and FAMPYRA.
[2] includes SPINRAZA.
[3] includes ADUHELM product revenue and revenue from LEQEMBI collaboration. Upon commercialization of LEQEMBI, we began recognizing our portion of the profit share on a net basis as a separate component of total revenue within revenue from LEQEMBI collaboration in our condensed consolidated income statements, as we are not the principal.
[4] includes FUMADERM and QALSODY.
[5] includes revenue from manufacturing of LEQEMBI beginning in the first quarter of 2023.
Numbers may not foot due to rounding. Percent changes represented as favorable/(unfavorable). NMF = No Meaningful Figure

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Second quarter 2023 financial results summary

($ in Millions)	Q2 2023	Q2 2022	Δ Y/Y
Revenue	**$2,456**	**$2,589**	**(5%)**
GAAP and Non-GAAP Cost of Sales	$593	$484	(22%)
% of revenue	*24%*	*19%*	
GAAP and Non-GAAP R&D Expense	$584	$529	(11%)
GAAP SG&A Expense	$548	$573	4%
Non-GAAP SG&A Expense	$534	$570	6%
GAAP Amortization	$53	$68	22%
Non-GAAP Amortization	$8	$7	(12%)
GAAP and Non-GAAP Collaboration Profit Sharing / (Loss Reimbursement)	$57	$29	(94%)
GAAP Other Income (Expense)	$121	$429	(72%)
Non-GAAP Other Income (Expense)	$15	($79)	118%
GAAP Taxes %	16.2%	17.1%	
Non-GAAP Taxes %	15.7%	15.2%	
GAAP Net Income Attributable to Biogen Inc.	**$592**	**$1,058**	**(44%)**
Non-GAAP Net Income Attributable to Biogen Inc.	**$585**	**$768**	**(24%)**
Weighted average diluted shares used in calculating diluted EPS	146	146	0%
GAAP Diluted EPS	**$4.07**	**$7.24**	**(44%)**
Non-GAAP Diluted EPS	**$4.02**	**$5.25**	**(23%)**

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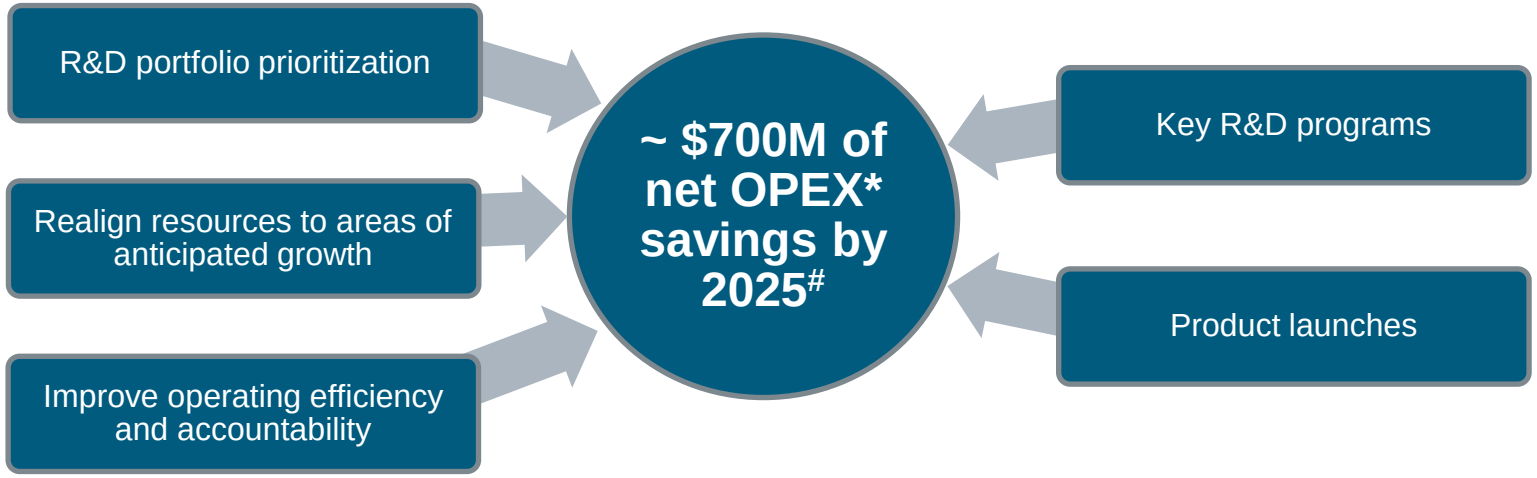
The above table is not an income statement. Numbers do not foot. Percent changes represented as favorable/(unfavorable).
Our GAAP financial measures and a reconciliation of GAAP to Non-GAAP financial results are at the end of this presentation.

Expected impact of new “Fit for Growth” program

Approximately $1 billion of gross OPEX* savings by 2025#

Approximately $300 million of OPEX* reinvestment



Expect total net OPEX* savings to be split roughly equally in 2024 and 2025

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Note: Estimated “Fit for Growth” savings are distinct from prior cost optimization initiatives
* OPEX = R&D expense + SG&A expense
# Expected savings based upon Biogen internal estimates vs. projected 2023 full year cost base

Balance sheet and cash flow

Balance Sheet
(as of June 30, 2023)

- **$7.3B** Cash and marketable securities
- **$6.3B** Debt
- **$1.0B** Cash position, net of debt

Cash Flow
(Q2 2023)

- **$487M** Net cash flow from operations
- **$71M** Capital expenditures
- **$416M** Free cash flow*

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Numbers may not foot due to rounding.

* Free cash flow is defined as net cash flow from operations less capital expenditures.

Reaffirming full year 2023 financial guidance

	Full Year 2023
Revenue	**Mid-single digit percentage decline***
Non-GAAP Diluted EPS	**$15.00 to $16.00**

* Versus reported revenue for full year 2022

Please see Biogen's second quarter 2023 earnings release, available at the Investors section of Biogen's website at investors.biogen.com, for additional 2023 financial guidance assumptions.

Biogen may incur charges, realize gains or losses, or experience other events or circumstances in 2023 that could cause any of these assumptions to change and/or actual results to vary from this financial guidance.

Please see slide 2 of this presentation for additional information on our use of Non-GAAP measures, including forward-looking Non-GAAP financial measures.

Closing

Christopher A. Viehbacher

President and Chief Executive Officer

Expected milestones with potential to support long-term growth

Expected Regulatory Decisions	2023 Q3	2023 Q4	2024 Q1
LEQEMBI in Early Alzheimer's disease			
• PMDA in Japan	●		
• EMA in E.U.			●
• NMPA in China			●
FDA PDUFA action date for zuranolone in the U.S.	●		

Expected Regulatory Submissions	Q3	Q4	Q1
LEQEMBI subcutaneous formulation			●
LEQEMBI maintenance dosing			●

Potential to further support growth trajectory through business development

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Note: LEQEMBI (lecanemab-irmb) is being developed in collaboration with Eisai Co., Ltd; Eisai serves as the lead for lecanemab development and regulatory submissions globally; See LEQEMBI USPI for full prescribing information; Zuranolone is being developed in collaboration with Sage Therapeutics, Inc; EMA = European Medicines Agency; E.U. = European Union; NMPA = National Medical Products Administration; PDUFA = Prescription Drug User Fee Act; PMDA = Pharmaceuticals and Medical Devices Agency

Questions & Answers

Appendix

Consolidated Statement of Income

(unaudited, in millions, except per share amounts)

	For the Three Months Ended June 30,		For the Six Months Ended June 30,	
	2023	2022	2023	2022
Revenue:				
Product, net	$ 1,845.8	$ 2,054.9	$ 3,609.1	$ 4,121.2
Revenue from LEQEMBI Collaboration	(20.7)	—	(39.6)	—
Revenue from anti-CD20 therapeutic programs	433.4	436.3	832.9	835.7
Contract manufacturing, royalty and other revenue	197.5	97.9	516.6	164.0
Total revenue	2,456.0	2,589.1	4,919.0	5,120.9
Cost and expense:				
Cost of sales, excluding amortization and impairment of acquired intangible assets	592.7	484.0	1,255.5	1,237.9
Research and development	584.2	528.6	1,154.8	1,080.3
Selling, general and administrative	548.0	572.6	1,153.0	1,207.5
Amortization and impairment of acquired intangible assets	52.9	67.5	103.1	134.4
Collaboration profit sharing/(loss reimbursement)	56.9	29.4	114.0	(87.9)
(Gain) loss on fair value remeasurement of contingent consideration	—	(4.5)	—	(11.6)
Restructuring charges	34.4	70.6	44.0	108.7
Other (income) expense, net	(121.2)	(428.6)	(51.8)	(165.3)
Total cost and expense	1,747.9	1,319.6	3,772.6	3,504.0
Income before income tax expense and equity in loss of investee, net of tax	708.1	1,269.5	1,146.4	1,616.9
Income tax (benefit) expense	114.8	216.7	165.5	342.3
Equity in (income) loss of investee, net of tax	—	(5.9)	—	(2.6)
Net income	593.3	1,058.7	980.9	1,277.2
Net income (loss) attributable to noncontrolling interests, net of tax	1.7	0.7	1.4	(84.6)
Net income attributable to Biogen Inc.	$ 591.6	$ 1,058.0	$ 979.5	$ 1,361.8
Net income per share:				
Basic earnings per share attributable to Biogen Inc.	$ 4.09	$ 7.25	$ 6.78	$ 9.30
Diluted earnings per share attributable to Biogen Inc.	$ 4.07	$ 7.24	$ 6.74	$ 9.27
Weighted-average shares used in calculating:				
Basic earnings per share attributable to Biogen Inc.	144.7	145.9	144.6	146.5
Diluted earnings per share attributable to Biogen Inc.	145.5	146.2	145.4	146.8

Consolidated Balance Sheets

(unaudited, in millions)

	As of June 30, 2023	As of December 31, 2022
ASSETS		
Cash and cash equivalents	$ 2,617.8	$ 3,419.3
Marketable securities	3,460.5	1,473.5
Accounts receivable, net	1,685.9	1,705.0
Due from anti-CD20 therapeutic programs, net	438.1	431.4
Inventory	1,333.5	1,344.4
Other current assets	895.9	1,417.6
Total current assets	10,431.7	9,791.2
Marketable securities	1,208.0	705.7
Property, plant and equipment, net	3,307.2	3,298.6
Operating lease assets	366.5	403.9
Intangible assets, net	1,776.4	1,850.1
Goodwill	5,753.7	5,749.0
Deferred tax asset	1,208.4	1,226.4
Investments and other assets	1,104.9	1,529.2
TOTAL ASSETS	$ 25,156.8	$ 24,554.1
LIABILITIES AND EQUITY		
Taxes payable	$ 260.0	$ 259.9
Accounts payable	445.4	491.5
Accrued expenses and other	2,481.1	2,521.4
Total current liabilities	3,186.5	3,272.8
Notes payable	6,284.6	6,281.0
Deferred tax liability	143.9	334.7
Long-term operating lease liabilities	304.4	333.0
Other long-term liabilities	776.9	944.2
Equity	14,460.5	13,388.4
TOTAL LIABILITIES AND EQUITY	$ 25,156.8	$ 24,554.1

Biogen

Product Revenue (US and Rest of World) & Total Revenue

(unaudited, in millions)

Product Revenue

	For the Three Months Ended June 30,					
	2023			2022		
	United States	Rest of World	Total	United States	Rest of World	Total
Multiple Sclerosis (MS):						
TECFIDERA	$ 66.5	$ 187.7	$ 254.2	$ 120.7	$ 277.2	$ 397.9
VUMERITY	130.3	15.9	146.2	129.9	6.9	136.8
Total Fumarate	196.8	203.6	400.4	250.6	284.1	534.7
AVONEX	145.9	74.4	220.3	171.0	87.7	258.7
PLEGRIDY	34.1	48.0	82.1	40.2	51.3	91.5
Total Interferon	180.0	122.4	302.4	211.2	139.0	350.2
TYSABRI	259.9	223.2	483.1	291.9	224.3	516.2
FAMPYRA	—	23.4	23.4	—	25.5	25.5
Subtotal: MS	636.7	572.6	1,209.3	753.7	672.9	1,426.6
Spinal Muscular Atrophy (SMA):						
SPINRAZA	155.8	281.3	437.1	139.8	291.3	431.1
Subtotal: SMA	155.8	281.3	437.1	139.8	291.3	431.1
Biosimilars:						
BENEPALI	—	109.2	109.2	—	115.8	115.8
IMRALDI	—	58.8	58.8	—	57.6	57.6
FLIXABI	—	20.1	20.1	—	20.5	20.5
BYOOVIZ[1]	7.0	—	7.0	0.5	—	0.5
Subtotal: Biosimilars	7.0	188.1	195.1	0.5	193.9	194.4
Other[2]	1.5	2.8	4.3	0.1	2.7	2.8
Total product revenue	$ 801.0	$ 1,044.8	$ 1,845.8	$ 894.1	$ 1,160.8	$ 2,054.9

	For the Six Months Ended June 30,					
	2023			2022		
	United States	Rest of World	Total	United States	Rest of World	Total
Multiple Sclerosis (MS):						
TECFIDERA	$ 141.2	$ 387.5	$ 528.7	$ 237.8	$ 570.0	$ 807.8
VUMERITY	223.8	30.6	254.4	255.1	9.7	264.8
Total Fumarate	365.0	418.1	783.1	492.9	579.7	1,072.6
AVONEX	248.5	144.2	392.7	319.0	169.3	488.3
PLEGRIDY	64.0	91.3	155.3	74.5	97.0	171.5
Total Interferon	312.5	235.5	548.0	393.5	266.3	659.8
TYSABRI	505.3	450.6	955.9	576.4	460.6	1,037.0
FAMPYRA	—	47.5	47.5	—	51.7	51.7
Subtotal: MS	1,182.8	1,151.7	2,334.5	1,462.8	1,358.3	2,821.1
Spinal Muscular Atrophy (SMA):						
SPINRAZA	302.5	577.9	880.4	303.1	600.5	903.6
Subtotal: SMA	302.5	577.9	880.4	303.1	600.5	903.6
Biosimilars:						
BENEPALI	—	218.2	218.2	—	230.5	230.5
IMRALDI	—	113.2	113.2	—	114.7	114.7
FLIXABI	—	40.5	40.5	—	43.0	43.0
BYOOVIZ[1]	15.2	0.4	15.6	0.5	—	0.5
Subtotal: Biosimilars	15.2	372.3	387.5	0.5	388.2	388.7
Other[2]	1.9	4.8	6.7	2.9	4.9	7.8
Total product revenue	$ 1,502.4	$ 2,106.7	$ 3,609.1	$ 1,769.3	$ 2,351.9	$ 4,121.2

[1] BYOOVIZ became commercially available in the U.S. during the third quarter of 2022 and commercially available in international markets in 2023.

[2] Other includes FUMADERM, ADUHELM and QALSODY, which became commercially available in the U.S. during the second quarter of 2023.

Total Revenue

	For the Three Months Ended June 30,		For the Six Months Ended June 30,	
	2023	2022	2023	2022
Product revenue	$ 1,845.8	$ 2,054.9	$ 3,609.1	$ 4,121.2
Revenue from LEQEMBI Collaboration	(20.7)	—	(39.6)	—
OCREVUS royalties	325.5	291.8	609.1	544.1
RITUXAN/GAZYVA®/LUNSUMIO™ revenue	103.6	139.9	216.1	283.1
Other revenues from anti-CD20 programs	4.3	4.6	7.7	8.5
Contract manufacturing, royalty and other revenue	197.5	97.9	516.6	164.0
Total revenue	$ 2,456.0	$ 2,589.1	$ 4,919.0	$ 5,120.9

Biogen

GAAP to Non-GAAP Reconciliation

Operating Expense, Other (Income) Expense, net and Income Tax (unaudited, in millions, except effective tax rate)

	For the Three Months Ended June 30,		For the Six Months Ended June 30,	
	2023	2022	2023	2022
Research and Development Expense:				
Total research and development expense, GAAP	$ 584.2	$ 528.6	$ 1,154.8	$ 1,080.3
Less: restructuring charges and other cost saving initiatives	0.4	—	0.4	—
Less: other	—	—	0.1	—
Total research and development expense, Non-GAAP	$ 583.8	$ 528.6	$ 1,154.3	$ 1,080.3
Selling, General and Administrative Expense:				
Total selling, general and administrative, GAAP	$ 548.0	$ 572.6	$ 1,153.0	$ 1,207.5
Less: restructuring charges and other cost saving initiatives	11.5	—	11.5	—
Less: other	2.7	2.2	5.1	2.0
Total selling, general and administrative, Non-GAAP	$ 533.8	$ 570.4	$ 1,136.4	$ 1,205.5
Amortization and Impairment of Acquired Intangible Assets:				
Total amortization and impairment of acquired intangible assets, GAAP	$ 52.9	$ 67.5	$ 103.1	$ 134.4
Less: amortization of acquired intangible assets	44.6	60.2	87.2	119.5
Total amortization and impairment of acquired intangible assets, Non-GAAP	$ 8.3	$ 7.3	$ 15.9	$ 14.9
Other (Income) Expense, net:				
Total other (income) expense, net, GAAP	$ (121.2)	$ (428.6)	$ (51.8)	$ (165.3)
Less: (gain) loss on equity security investments	(106.5)	77.2	(29.4)	267.9
Less: (gain) on sale of equity interest in Samsung Bioepis [A]	—	(1,505.3)	—	(1,505.3)
Less: litigation settlement agreement and settled fees [B]	—	900.0	—	900.0
Less: other	—	20.0	—	20.0
Total other (income) expense, net, Non-GAAP	$ (14.7)	$ 79.5	$ (22.4)	$ 152.1
Income Tax (Benefit) Expense:				
Total income tax (benefit) expense, GAAP	$ 114.8	$ 216.7	$ 165.5	$ 342.3
Less: Neurimmune step-up tax basis [C]	—	—	—	83.9
Less: international reorganization (2022) & income tax effect related to Non-GAAP reconciling items	5.9	81.5	(20.4)	25.6
Total income tax expense, Non-GAAP	$ 108.9	$ 135.2	$ 185.9	$ 232.8
Effective Tax Rate:				
Total effective tax rate, GAAP	16.2 %	17.1 %	14.4 %	21.2 %
Less: Neurimmune step-up tax basis [C]	—	—	—	5.2
Less: impact of GAAP to Non-GAAP adjustments	0.5	1.9	(0.3)	0.7
Total effective tax rate, Non-GAAP	15.7 %	15.2 %	14.7 %	15.3 %

Use of Non-GAAP Financial Measures

We supplement our GAAP consolidated financial statements and GAAP financial measures with other financial measures, such as adjusted net income, adjusted diluted earnings per share, revenue growth at constant currency, which excludes the impact of changes in foreign exchange rates and hedging gains or losses, and free cash flow, which is defined as net flow from operations less capital expenditures. We believe that these and other Non-GAAP financial measures provide additional insight into the ongoing economics of our business and reflect how we manage our business internally, set operational goals and form the basis of our management incentive programs. Non-GAAP financial measures are in addition to, not a substitute for, or superior to, measures of financial performance prepared in accordance with GAAP.

Our "Non-GAAP net income attributable to Biogen Inc." and "Non-GAAP earnings per share - Diluted" financial measures exclude the following items from "GAAP net income attributable to Biogen Inc." and "GAAP earnings per share - Diluted":

1. Acquisitions and divestitures

We exclude transaction, integration and certain other costs related to the acquisition and divestiture of businesses and items associated with the initial consolidation or deconsolidation of variable interest entities. These adjustments include, but are not limited to, the amortization and impairment of intangible assets, charges or credits from the fair value remeasurement of our contingent consideration obligations and losses on assets and liabilities held for sale.

2. Restructuring, business transformation and other cost saving initiatives

We exclude costs associated with our execution of certain strategies and initiatives to streamline operations, achieve targeted cost reductions, rationalize manufacturing facilities or refocus research and development activities. These costs may include employee separation costs, retention bonuses, facility closing and exit costs, asset impairment charges or additional depreciation when the expected useful life of certain assets have been shortened due to changes in anticipated usage and other costs or credits that management believes do not have a direct correlation to our ongoing or future business operations.

3. (Gain) loss on equity security investments

We exclude unrealized and realized gains and losses on our equity security investments as we do not believe that these components of income or expense have a direct correlation to our ongoing or future business operations.

4. Other items

We evaluate other items of income and expense on an individual basis and consider both the quantitative and qualitative aspects of the item, including (i) its size and nature, (ii) whether or not it relates to our ongoing business operations and (iii) whether or not we expect it to occur as part of our normal business on a regular basis. We also include an adjustment to reflect the related tax effect of all reconciling items within our reconciliation of our GAAP to Non-GAAP net income attributable to Biogen Inc. and earnings per share - diluted.

Biogen

Footnotes referenced in the tables above are included at the end of this presentation.

GAAP to Non-GAAP Reconciliation

Equity (Income)/Loss of Investee, Noncontrolling Interests, Net Income & Diluted EPS
(unaudited, in millions, except per share amounts)

	For the Three Months Ended June 30,		For the Six Months Ended June 30,	
	2023	2022	2023	2022
Equity in (Income) Loss of Investee, Net of Tax:				
Total equity in (income) loss of investee, GAAP	$ —	$ (5.9)	$ —	$ (2.6)
Less: amortization of equity in (income) loss of investee	—	7.1	—	14.4
Total equity in (income) loss of investee, Non-GAAP	$ —	$ (13.0)	$ —	$ (17.0)
Net Income (Loss) Attributable to Noncontrolling Interests, Net of Tax:				
Total net income (loss) attributable to noncontrolling interests, GAAP	$ 1.7	$ 0.7	$ 1.4	$ (84.6)
Less: Neurimmune step-up tax basis [C]	—	—	—	(83.9)
Less: net distribution to noncontrolling interests	—	—	—	(1.5)
Total net income (loss) attributable to noncontrolling interests, Non-GAAP	$ 1.7	$ 0.7	$ 1.4	$ 0.8
Net Income Attributable to Biogen Inc.:				
Total net income attributable to Biogen Inc., GAAP	$ 591.6	$ 1,058.0	$ 979.5	$ 1,361.8
Plus: amortization of acquired intangible assets	44.6	60.2	87.2	119.5
Plus: restructuring charges and other cost saving initiatives	46.3	70.6	56.0	108.7
Plus: (gain) loss on fair value remeasurement of contingent consideration	—	(4.5)	—	(11.6)
Plus: (gain) loss on equity security investments	(106.5)	77.2	(29.4)	267.9
Plus: net distribution to noncontrolling interests & amortization of equity in (income) loss of investee	—	7.1	—	12.9
Plus: gain on sale of equity interest in Samsung Bioepis [A]	—	(1,505.3)	—	(1,505.3)
Plus: litigation settlement agreement and settled fees [B]	—	900.0	—	900.0
Plus: international reorganization & income tax effect related to Non-GAAP reconciling items	5.9	81.5	(20.4)	25.6
Plus: other	2.7	22.2	5.1	22.1
Total net income attributable to Biogen Inc., Non-GAAP	$ 584.6	$ 767.0	$ 1,078.0	$ 1,301.6
Diluted Earnings Per Share:				
Total diluted earnings per share, GAAP	$ 4.07	$ 7.24	$ 6.74	$ 9.27
(Less) Plus: adjustments to GAAP net income attributable to Biogen Inc. (as detailed above)	(0.05)	(1.99)	0.67	(0.41)
Total diluted earnings per share, Non-GAAP	$ 4.02	$ 5.25	$ 7.41	$ 8.86

Biogen

Footnotes referenced in the tables above are included at the end of this presentation.

Notes to GAAP to Non-GAAP Reconciliation

[A] In April 2022 we completed the sale of our 49.9% equity interest in Samsung Bioepis to Samsung BioLogics in exchange for total consideration of approximately $2.3 billion. Under the terms of this transaction, we received approximately $1.0 billion in cash at closing, with approximately $1.3 billion in cash to be deferred over two payments. The first payment of $812.5 million was received in April 2023 and the second payment of $437.5 million is due at the second anniversary of the closing of this transaction.

During the second quarter of 2022 we recognized a pre-tax gain of approximately $1.5 billion related to this transaction, which was recorded in other (income) expense, net in our condensed consolidated statements of income for the three and six months ended June 30, 2022.

[B] During the second quarter of 2022 we recorded a pre-tax charge of $900.0 million, plus settlement fees and expenses, related to a litigation settlement agreement to resolve a qui tam litigation relating to conduct prior to 2015. This charge is included within other (income) expense, net in our condensed consolidated statements of income for the three and six months ended June 30, 2022.

[C] During the first quarter of 2022, upon issuance of the final National Coverage Determination related to ADUHELM, we recorded an increase in a valuation allowance of approximately $85.0 million to reduce the net value of a previously recorded deferred tax asset to zero.

This adjustment to our net deferred tax asset is recorded with an equal and offsetting amount assigned to net income (loss) attributable to noncontrolling interests, net of tax in our condensed consolidated statements of income, resulting in a zero net impact to net income attributable to Biogen Inc.

GAAP to Non-GAAP Reconciliation

Constant Currency & Free Cash Flow
(unaudited, in millions)

Revenue growth at constant currency vs. Q2 2022 and YTD 2022

Percentage changes in revenue growth at constant currency are presented excluding the impact of changes in foreign currency exchange rates and hedging gains or losses. The current period's foreign currency revenue values are converted into U.S. dollars using the average exchange rates from the prior period.

	Q2 2023 vs. Q2 2022	YTD 2023 vs. YTD 2022
Total Revenue:		
Revenue change, as reported	(5.1)%	(3.9)%
Less: impact of foreign currency translation and hedging gains / losses	(1.7)	(2.0)
Revenue change at constant currency	(3.4)%	(1.9)%
Total MS Product Revenue:		
Revenue change, as reported	(15.2)%	(17.2)%
Less: impact of foreign currency translation and hedging gains / losses	(1.6)	(1.9)
Revenue change at constant currency	(13.6)%	(15.3)%
Total SPINRAZA Revenue		
Revenue change, as reported	1.4 %	(2.6)%
Less: impact of foreign currency translation and hedging gains / losses	(3.4)	(3.6)
Revenue change at constant currency	4.8 %	1.0 %
Total SPINRAZA Rest of World Revenue		
Revenue change, as reported	(3.4)%	(3.8)%
Less: impact of foreign currency translation and hedging gains / losses	(4.8)	(5.4)
Revenue change at constant currency	1.4 %	1.6 %
Total Biosimilars Product Revenue:		
Revenue change, as reported	0.4 %	(0.3)%
Less: impact of foreign currency translation and hedging gains / losses	(3.5)	(4.2)
Revenue change at constant currency	3.9 %	3.9 %
Total Other Product Revenue (FUMADERM and QALSODY):		
Revenue change, as reported	34.5 %	15.3 %
Less: impact of foreign currency translation and hedging gains / losses	2.2	(0.6)
Revenue change at constant currency	32.3 %	15.9 %
Total Product Revenue and LEQEMBI:		
Revenue change, as reported	(11.2)%	(13.4)%
Less: impact of foreign currency translation and hedging gains / losses	(2.1)	(2.4)
Revenue change at constant currency	(9.1)%	(11.0)%
Total Contract Manufacturing, Royalty and Other Revenue:		
Revenue change, as reported	101.8 %	215.0 %
Less: impact of foreign currency translation and hedging gains / losses	—	(0.2)
Revenue change at constant currency	101.8 %	215.2 %

Free cash flow

We define free cash flow as net cash provided by (used in) operating activities in the period less capital expenditures made in the period. The following table reconciles net cash provided by (used in) operating activities, a GAAP measure, to free cash flow, a Non-GAAP measure.

	For the Three Months Ended June 30,		For the Six Months Ended June 30,	
	2023	2022	2023	2022
Cash Flow:				
Net cash provided by (used in) operating activities	$ 487.0	$ 736.5	$ 942.3	$ 898.3
Net cash provided by (used in) investing activities	(753.5)	693.5	(1,706.5)	45.5
Net cash provided by (used in) financing activities	(9.8)	(471.5)	(53.2)	(488.0)
Net increase (decrease) in cash and cash equivalents	$ (276.3)	$ 958.5	$ (817.4)	$ 455.8
Net cash provided by (used in) operating activities	$ 487.0	$ 736.5	$ 942.3	$ 898.3
Less: Purchases of property, plant and equipment	71.0	36.9	137.6	94.8
Free cash flow	$ 416.0	$ 699.6	$ 804.7	$ 803.5

Biogen