Supernus Pharmaceuticals



Corporate Overview

September 2022



This presentation and other matters discussed today or answers that may be given to questions asked include forward-looking statements within the meaning of the federal securities laws. These statements, among other things, relate to Supernus' business strategy, goals and expectations concerning its product candidates, ability to integrate the acquired portfolio into its infrastructure, future operations, prospects, plans and objectives of management. The words "anticipate", "believe", "could", "estimate", "expect", "intend", "may", "plan", "predict", "project", "will", and similar terms and phrases are used to identify forward-looking statements in this presentation. Supernus' operations involve risks and uncertainties, many of which are outside its control, including the potential impact of COVID-19, and any one of which, or a combination of which, could materially affect its results of operations and whether the forward-looking statements ultimately prove to be correct. Supernus assumes no obligation to update any forward-looking statements except as required by applicable law.

Supernus has filed with the U.S. Securities and Exchange Commission (SEC) reports and other documents required by Section 13 or 15(d) of the Securities Exchange Act of 1934, as amended. Before you purchase any Supernus securities, you should read such reports and other documents to obtain more complete information about the company's operations and business and the risks and uncertainties that it faces in implementing its business plan. You may get these documents for free by visiting EDGAR on the SEC website at http://www.sec.gov.



Proven Execution in CNS & ADHD

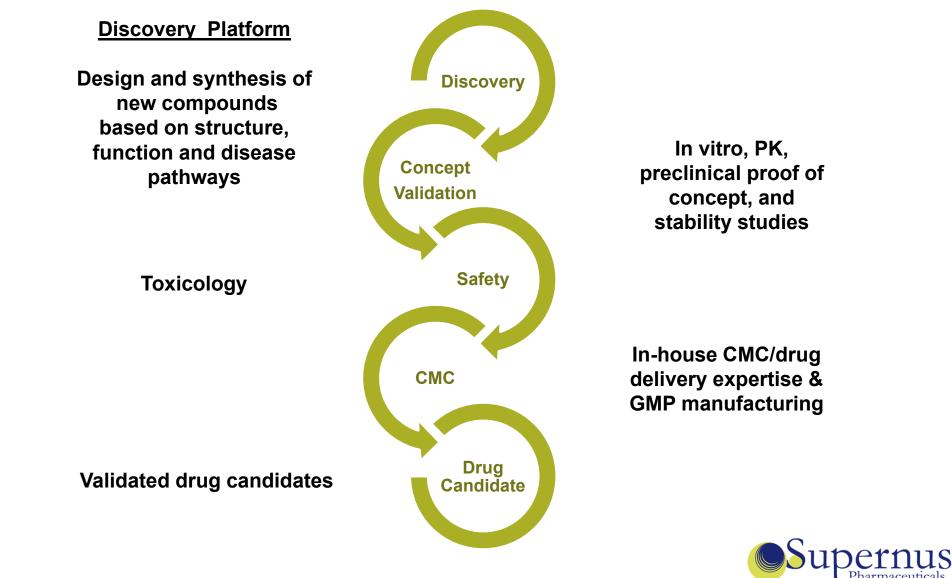
30+ Years of CNS experience including Four Products in ADHD



For several years, and prior to becoming independent in 2005, Supernus operated as Shire Laboratories, Inc., a division of Shire. SPN-830, SPN-820, SPN-817, SPN-840, SPN-845, SPN-443, SPN-446, and SPN-448 are product candidates in various stages of development. All trademarks are the property of their respective owners



Significant Experience & Capabilities in Drug Development



Robust CNS Pipeline to Drive Long-term Growth

<u>Program</u>	Indications	Discovery Preclinical Phase 1 Phase 2 Phase 3 NDA Market
Qelbree Viloxazine eterdet release capacité	ADHD- Adult	
SPN-830	PD	PDUFA Oct 2022
SPN-840	PD	
SPN-820	TRD*	
SPN-817	Epilepsy	
SPN-845	PD	
SPN-443	ADHD	
SPN-446	CNS	
SPN-448	CNS	

*TRD = Treatment Resistant Depression PD = Parkinson's Disease





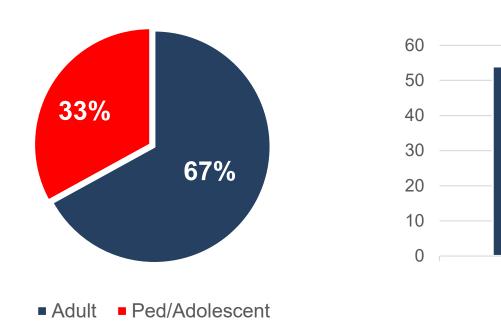
- Launched in May 2021 for patients 6 to 17 years of age
 - Sales force of approximately 195 sales representatives
 - Clinical feedback from the market in line with Phase III clinical data demonstrating a well-differentiated profile
- Launched in May 2022 for adult patients
- IP with expirations from 2029-2033
- ADHD market is significant with 80 million prescriptions/year¹





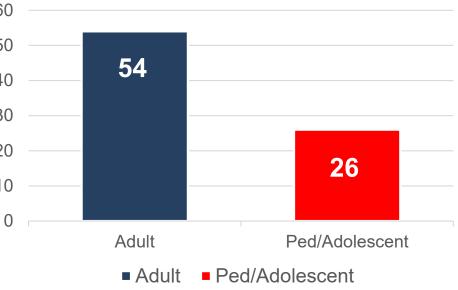
ADHD Adult Opportunity: Significant Market Segment

2021 Total ADHD U.S Market - 80 Million Prescriptions



% of Market

2021 Prescriptions (millions)

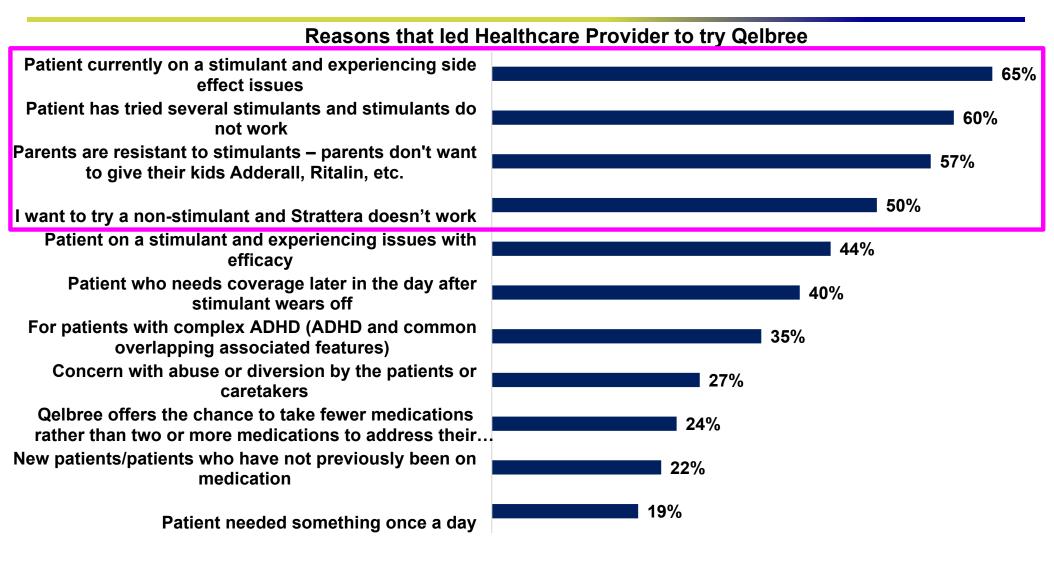




Source: IQVIA

Top Reasons to Try Qelbree[®]

Patients Having Issues With Stimulants & Looking For a Non-Stimulant That Works

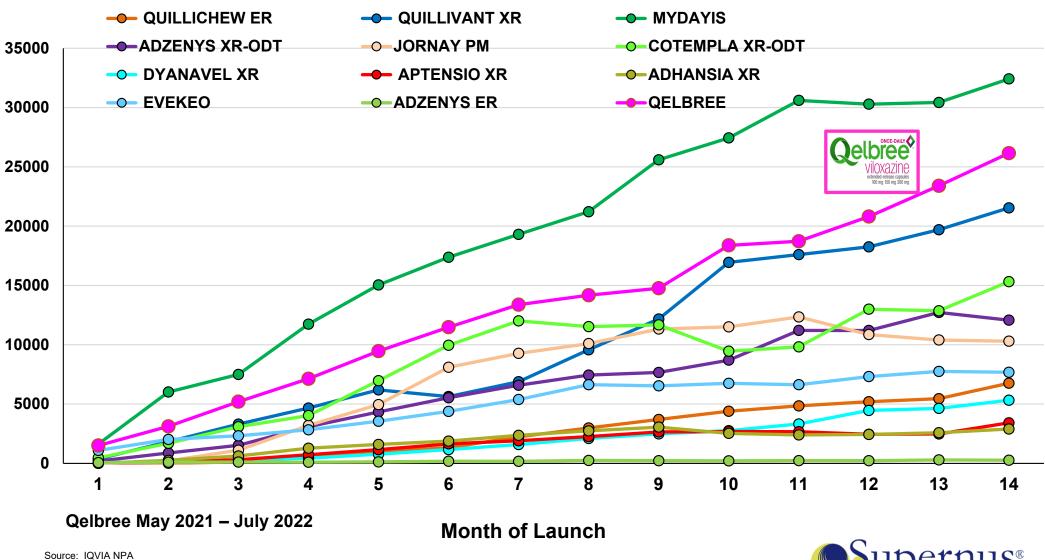


Source: Internal market research among Qelbree prescribers – n=104.

Q28. Thinking about the patients you have put on Qelbree, what medications were they on/what issues were they having that led you to try Qelbree?



ADHD Launch-Aligned Monthly Prescriptions





Monthly Prescriptions since Launch



Source: IQVIA NPA



Major Presence in Parkinson's Disease (PD)

1 Million U.S. PD Patients - Market Expected to Grow to \$6.2B by 2026 ⁽¹⁾





Significantly Decreased Dyskinesia and OFF Time, Thereby Significantly Increasing Good ON Time

GOCOVRI achieved reductions in dyskinesia & OFF episodes without having to adjust levodopa dose

Primary endpoint

J27% DECREASE IN DYSKINESIA

10.1-point reduction in UDysRS score

(-17.7 GOCOVRI vs. -7.6 placebo)^{(1)(2)†}

(1) Elmer LW, CNS Drugs. 2018.

Placebo-adjusted, pooled results from pivotal trials st

(2) Data on file. Adamas Pharma LLC, Emeryville, CA.

* Pooled results from 2 independent positive, pivotal, Phase 3, randomized, placebo-controlled trials (Study 1 and Study 2) in PD patients on levodopa. Study 1, a 24week study, was conducted in 121 PD patients with dyskinesia (GOCOVRI [n = 63], placebo [n = 58]). Study 2, a 12-week study, was conducted in 75 PD patients with dyskinesia (GOCOVRI [n = 37], placebo [n = 38]).

+ In Study 1, GOCOVRI reduced the UDysRS total score by 15.9 points (vs 8.0 with placebo) (P = 0.0009), decreased OFF time by 0.6 hours (vs an increase of 0.3 hours with placebo) (P = 0.0171), and increased GOOD ON time by 3.6 hours (vs 0.8 hours with placebo) (P < 0.0001) from baseline. In Study 2, GOCOVRI reduced the UDysRS total score by 20.7 points (vs 6.3 with placebo) (P < 0.0001), decreased OFF time by 0.5 hours (vs an increase of 0.6 hours with placebo)

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Secondary endpoints



1-hour decrease

OFF TIME

(-0.6 GOCOVRI vs. 0.4 placebo) (1)(2)†

36%

DECREASE IN

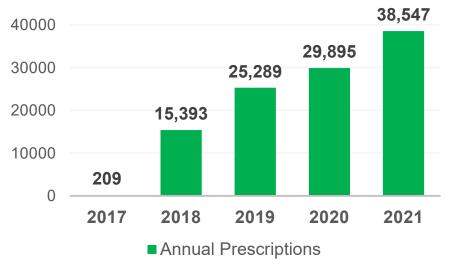
2.4-hour increase

(3.8 GOCOVRI vs.1.4 placebo) (1)(2)†





- IH 2022 Net Sales: \$47.3M, 25% growth vs. 2021
- IH 2022 Prescriptions: 21,665, 19% growth vs. 2021
- Indications:
 - For the treatment of dyskinesia in patients with PD receiving levodopa-based therapy, with or without concomitant dopaminergic medications
 - Adjunctive treatment to levodopa/carbidopa in patients with PD experiencing "off" episodes

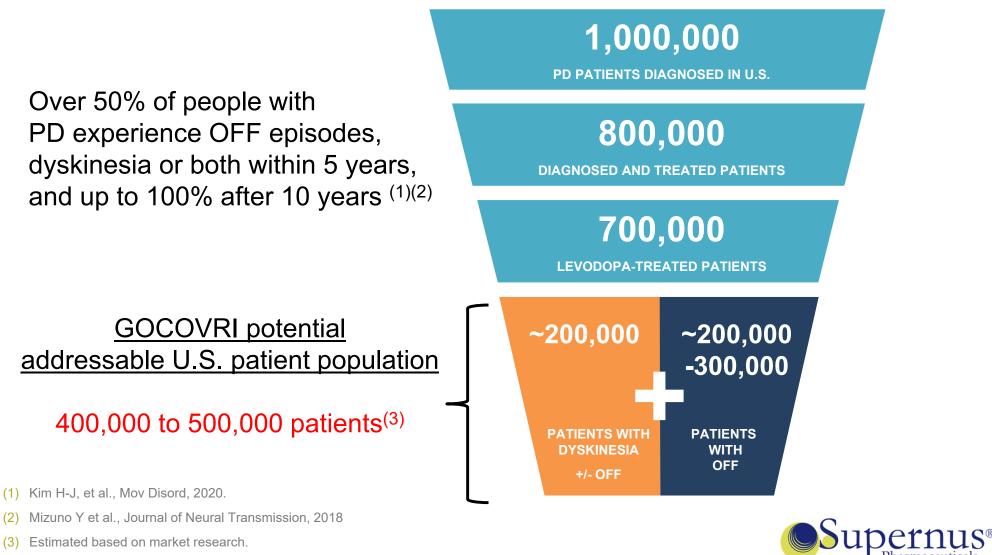


Supernus[®]

Source: Company Records, Adamas Press Releases



Significant Target Patient Population



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(3)

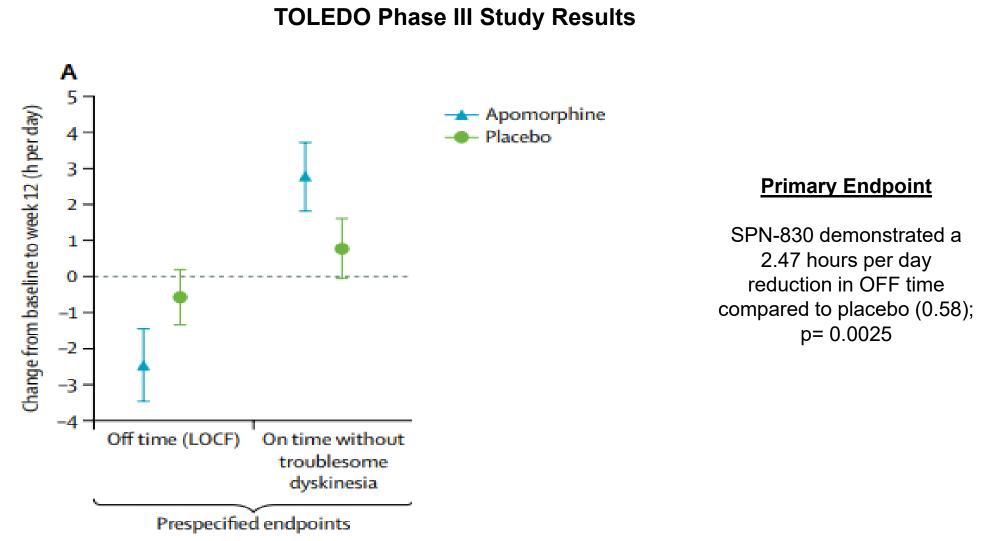
SPN-830

Novel Apomorphine Subcutaneous Injection Device

- Non-invasive dopaminergic stimulation therapy for continuous treatment of ON-OFF episodes in PD
- Potentially first non-surgical continuous dopaminergic stimulation device
- Currently available options
 - Gastro-intestinal surgically implanted levodopa/carbidopa infusion
 - Deep brain stimulation
- Could be eligible for Orphan Drug Designation and 7-year exclusivity
- NDA filing accepted by FDA with early October 2022 PDUFA



SPN-830 Novel Apomorphine Subcutaneous Injection Device



Regina Katzenschlager et al, The Lancet Neurology. 2018;Vol 17(9):749-759



- First-in-class selective brain mTORC1 activator
 - Directly activates mTORC1 enhancing synaptic activity and cellular metabolism in the brain
- Early efficacy signal on HAMD-6 scale in TRD patients
 - Rapid onset of action (signal at 2 hours)
 - Meaningful effect sizes (>0.4 through 3 days on 1 dose)
- Multiple ascending dose (MAD) study demonstrated:
 - drug penetration and target engagement
 - favorable safety/tolerability profile across broad range of doses
- Initiated Phase II clinical trial in TRD
- Significant market opportunity
 - Major depressive disorder (MDD) affects approximately 17.3M U.S. adults¹
 - ~30% of MDD patients are treatment resistant²



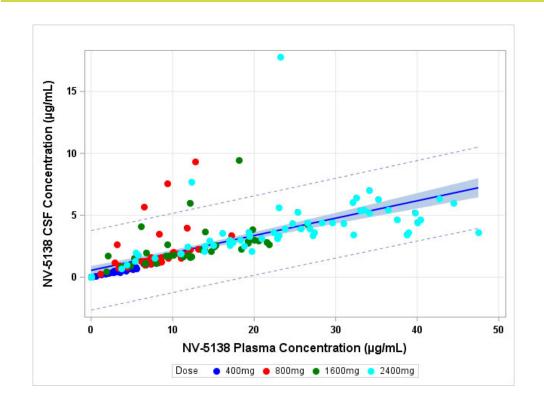
¹⁻ National Institute of Mental Health, 2017 National Survey on Drug Use and health

²⁻ Rush AJ Et al.(2006) Acute and Longer-Term Outcomes in Depressed Outpatients Requiring One or Several Treatment Steps: A STAR*D Report. The American Journal of Psychiatry,163(11), 1905-1917

- Healthy subjects, placebo-controlled pharmacokinetic study
 - 5 Cohorts: 400 mg, 800 mg, 1600 mg, 2400 mg and 3000 mg
- Plasma & cerebrospinal fluid (CSF) drug concentration
 - 400 mg 2400 mg dose levels
 - Single dose, at Day 1
 - Multiple doses, at Day 7
- Metabolomic biomarkers of mTORC1 activation
 - Concentrations measured in CSF for 400 mg 2400 mg dose levels
 - N-acetylmethionine
 - N-formylmethionine
 - Orotic acid



SPN-820 CSF Concentration vs. Plasma Concentration

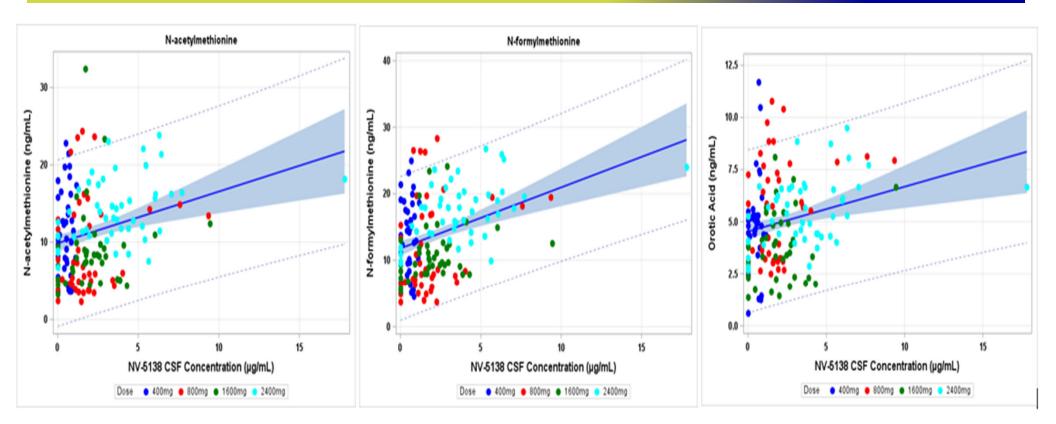


Dots represent the observed data, the solid line represent the model predicted curve, the shaded area represent the 95% confidence interval on the predicted curve, and the dotted lines delimit the 95% prediction interval.

SPN-820/NV-5138 CSF concentrations significantly increase with the increase in plasma concentrations (p < 0.0001)



Biomarker Concentrations vs. SPN-820 CSF Concentrations



Dots represent the observed data, the solid line represent the model predicted curve, the shaded area represent the 95% confidence interval on the predicted curve, and the dotted lines delimit the 95% prediction interval.

Biomarker concentrations significantly increase with the increase of SPN-820/NV-5138 CSF concentrations



Financial Summary and Guidance

1H 2022 Financial Results

- Total revenues of \$322.6 million, up 18% over 1H 2021
- Net earnings of \$33.5 million, up 14% over 1H 2021
- Cash, cash equivalents, and investments at \$508.2 million as of June 30, 2022, compared to \$458.8 million as of December 31, 2021.



Financial Summary and Guidance

Full Year 2022 Financial Guidance¹

	(\$ millions)
Total Revenues	\$640 - \$680
Combined R&D and SG&A expenses	\$460 - \$490
Operating Earnings - GAAP	\$20 - \$40
Adjustments:	
Amortization of intangible assets	\$80 - \$85
Share-based compensation	\$20 - \$25
Contingent consideration	\$8 - \$12
Depreciation	\$2 - \$3
Operating Earnings - non-GAAP	\$130 - \$165

¹ Guidance as confirmed on August 3, 2022





Positioned For Long-Term Growth

Diversified CNS Portfolio

Qelbree[®], Oxtellar XR[®], Trokendi XR[®], APOKYN[®], GOCOVRI[®], XADAGO[®], MYOBLOC[®]

Innovative Pipeline in CNS

Qelbree [®]	ADHD (Adult)
SPN-830	PD
SPN-820	TRD
SPN-840/845	PD
SPN-817	Epilepsy

