



High-Impact Neuromedicines for Real-World Care

August 2026



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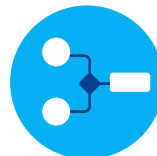
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Building a Fully Integrated Company Focused on Neuropsychiatric Disorders

Late-stage trials ongoing in schizophrenia (SCZ), bipolar depression and planned in adjunctive MDD



Positive registrational Phase 2 data highlights potential for differentiated profile in \$12B branded AP market¹



Streamlined path to approval in SCZ with a single Phase 3 trial based on positive FDA feedback



Significant expansion potential across psychosis and mood disorders, including long-acting formulations



Robust IP portfolio with issued COM protection through ~2041 (including potential PTE)²



Strong balance sheet that supports multiple clinical readouts, and runway beyond 2Q 2029

LB-102

Differentiated Profile Across Neuropsychiatric Disorders



Competitive clinical activity with potential for rapid-onset, sustained response



Potentially class-leading tolerability profile



Robust effects on cognition, negative symptoms and potentially anhedonia



Validated mechanism, once-daily, starting therapeutic dose



Potential first benzamide antipsychotic in the U.S.¹



Potential for first benzamide LAI¹ globally

Late-Stage Development Pipeline with Multiple Clinical Milestones and Runway Expected Beyond 2Q 2029

| Psychosis Related Disorders

Indication	Product	Route of Administration	Preclinical	Phase 1	Phase 2	Phase 3	Anticipated Milestones
Schizophrenia	LB-102	Oral					Topline data expected 1H 2027 Pre-NDA meeting expected 2H 2027
	LB-102	Long-acting injectable					LAI formulation development in 2026

| Mood Disorders

Indication	Product	Route of Administration	Preclinical	Phase 1	Phase 2	Phase 3	Anticipated Milestones
Bipolar 1 Depression	LB-102	Oral					Topline data expected 1Q 2028
Adjunctive MDD	LB-102	Oral					Topline data expected 1H 2029

\$327.8 million¹ as of June 30, 2026, exclusive of recent \$150 million private placement²

LB-102 is a Derivative of Amisulpride, an AP with More Than 2 Million Monthly Prescriptions Annually in Europe²

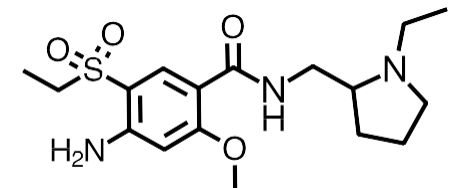
Approved ex-U.S. for SCZ, (-) symptoms of SCZ and dysthymia¹ with extensive use in mood disorders and anxiety²
Not available in the U.S. for psychosis-related or mood disorders

Advantages of Amisulpride

- Selectively inhibits D2, D3, and 5HT7 receptors with few off-target effects (e.g., 5HT2C, H1, α 1)³
- Among the highest effect sizes (0.73) compared with approved APs⁴
- Favorable tolerability profile with one of the lowest all-cause discontinuation rates^{4,5}

Limitations of Amisulpride

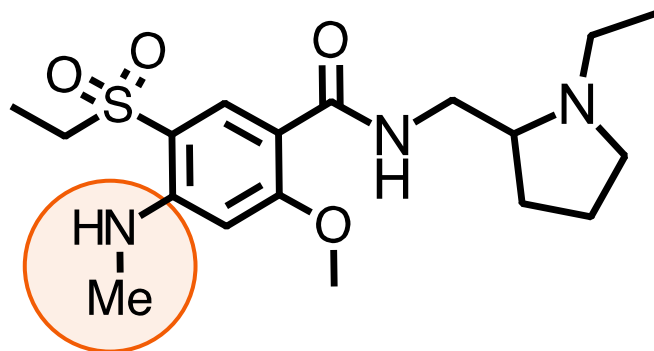
- Poor blood-brain barrier (BBB) penetration
- Requires high doses for SCZ (400-800 mg), increasing systemic exposure
- Twice daily (BID) dosing creates compliance challenges



Amisulpride

| LB-102 Was Purpose-Built to Address Amisulpride's Limitations

Designed to improve BBB penetration of amisulpride



LB-102

Methylation of amisulpride improved lipophilicity, enabling more efficient transport across the BBB and longer residence time in the CNS¹



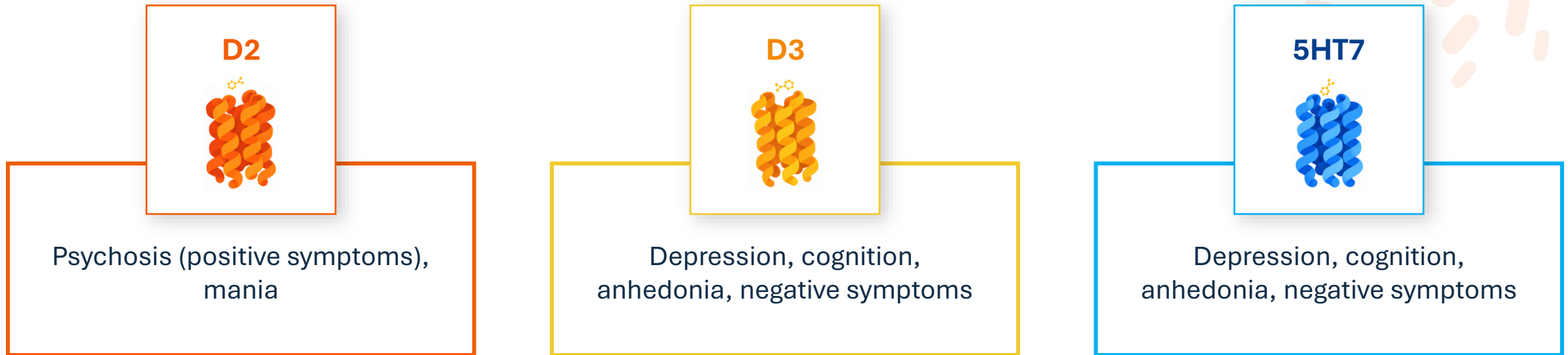
Advantages of LB-102 versus amisulpride

- ✓ Improved potency, lowering required dose and reducing systemic exposure – 50 mg LB-102 $\approx$ 400 mg amisulpride¹
- ✓ Enabled convenient once-daily dosing
- ✓ Supported new chemical entity status and Composition of Matter IP
- ✓ Potential for improved tolerability (e.g., lower EPS) validated by Phase 2 clinical experience
- ✓ Retained CNS receptor binding profile including lack of off-target effects²



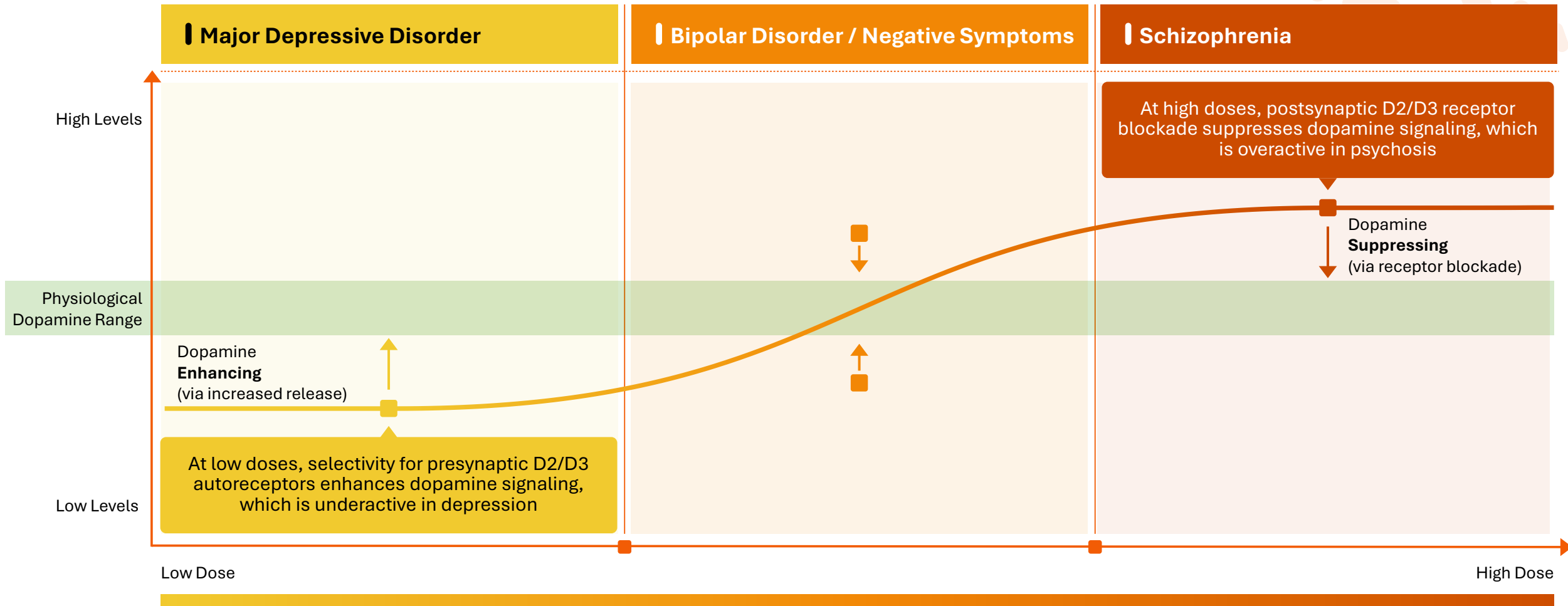
LB-102's Mechanism, Phase 2 Data, and the Heritage of Amisulpride Support Development in a Wide Range of Indications

LB-102 and amisulpride have a distinct CNS receptor binding profile among antipsychotics



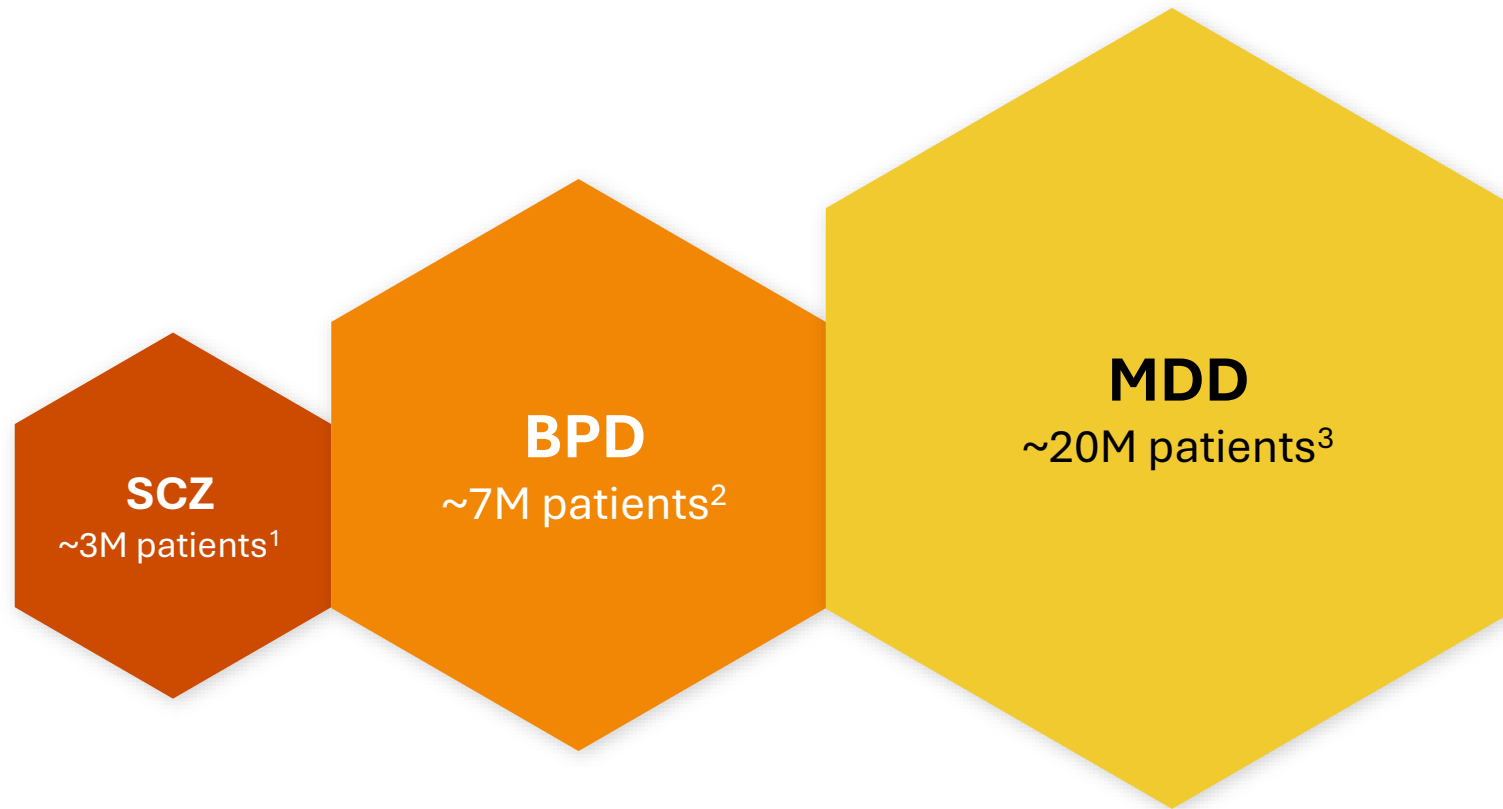
- Selective binding profile with few off-target effects drives favorable tolerability profile
- Potential to preferentially engage presynaptic autoreceptors implicated in mood, anhedonia and cognition at lower doses¹
- LB-102 Phase 2 data demonstrated clinical activity in positive, negative, cognitive symptom domains, and potentially improved tolerability
- Amisulpride clinical experience validates potential for broad range of efficacy

Distinct Mechanism of LB-102 and Amisulpride Underlies Efficacy in a Potential Range of Indications



Established Antipsychotic Development Path Unlocks Multi-Indication Value

Development of APs typically starts in schizophrenia to anchor dose and premium pricing; enables efficient expansion to bipolar depression and MDD, **increasing the addressable market by ~10x**



Numerous Blockbuster Products

2025 U.S. sales

Vraylar \$3.6B

Rexulti \$1.9B

Abilify \$1.1B

High-Value Acquisitions

Intra-Cellular acquired for \$14.6B

| Schizophrenia



Schizophrenia Remains a High-Burden Disease with Persistent Treatment Gaps

Schizophrenia is a Prevalent and Debilitating Disease with No Cure



~3M

people in the US with schizophrenia¹



~80%

of patients relapse within 5 years²

Persistent Symptoms and Treatment Limitations Continue to Drive Disability and Switching, Hinder Adherence



~74%

discontinue medications within 18 months due to lack of efficacy or burdensome side effects⁴ (e.g., sedation, EPS, GI effects)



BID

BID dosing, food effects, need for titration hinder adherence



~60%

experience persistent negative symptoms not adequately addressed by current treatments³

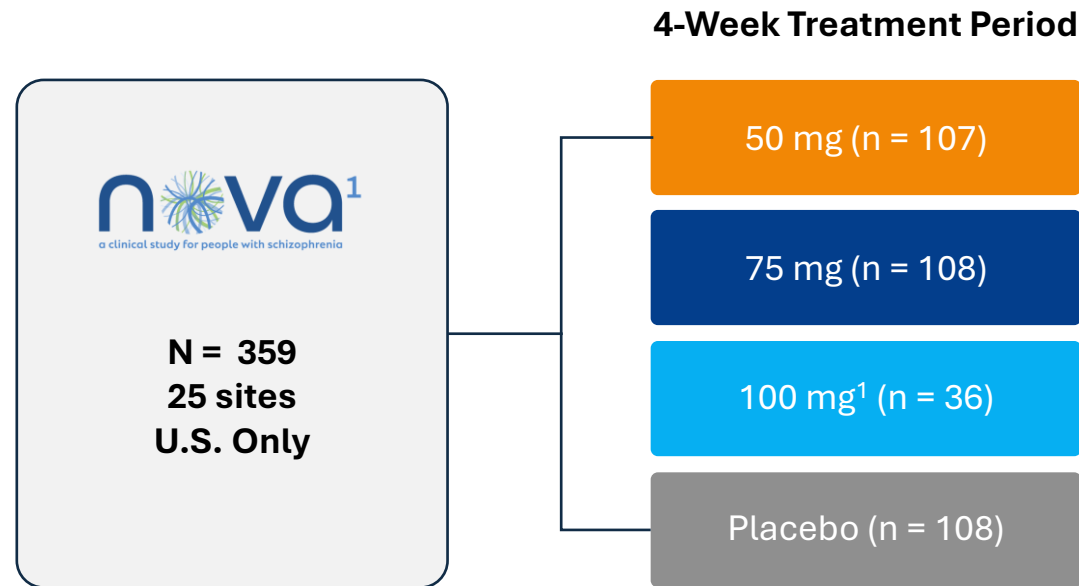


~80%

of patients experience cognitive impairment, a significant driver of functional disability⁵

Successful Phase 2 Acute SCZ Trial Has Potential to Be One of Two Pivotal Trials Required for Approval

NOVA -1 Phase 2 Trial Design



Primary Endpoint:

PANSS Δ from baseline at day 28

Secondary Endpoints:

CGI-S, PANSS positive and negative subscales, Marder factor

Exploratory Endpoint: Cognition

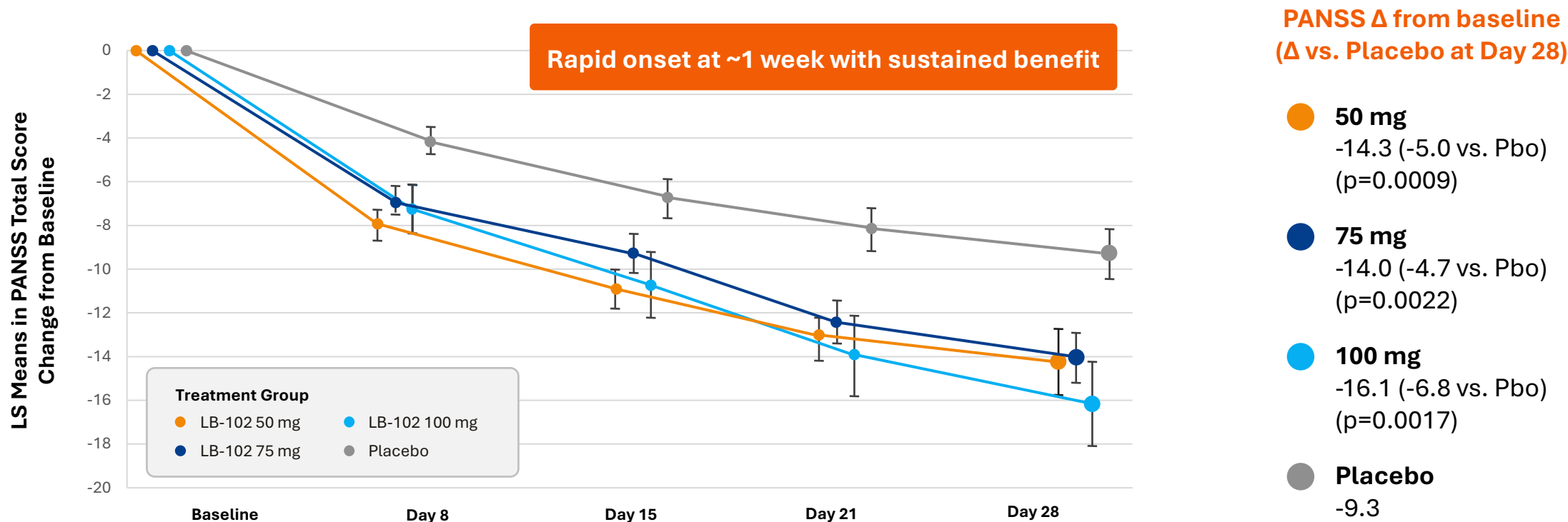
Designed trial to be potentially pivotal with large sample size, robust statistical analyses, conservative imputation of missing data

FDA noted, in writing, that our Phase 2 trial appeared to have many of the characteristics of an adequate and well-controlled trial — providing an opportunity for approval with one successful Phase 3 trial



Statistically Superior Clinical Activity to Placebo at All Three Doses

Clinically meaningful PANSS reduction in 4-week schizophrenia trial (baseline PANSS of 94)



Numerous measures implemented to control placebo rate, including screening to exclude professional patients, use of central raters, scale minimization, and close oversight of sites and CROs

Compelling Treatment Effect at Doses Planned for Phase 3

	Dose	Effect Size vs Placebo (completers)	Effect Size vs Placebo (MMRM)
LB-102 (Phase 2)	50 mg	0.61	0.50
	100 mg	0.83	0.64

- ✓ Results for LB-102 are near the top of effect size (ES) reported for approved first-line APs¹
- ✓ ES for 100 mg dose are in the range of those previously reported for amisulpride
- ✓ ES for 100 mg dose across both methods are greater than those reported for Cobenfy (0.56)²

Results demonstrate statistical robustness of Phase 2 trial and provide confidence heading into Phase 3

| Robust, Dose-Dependent Effect on Cognition in Phase 2, a Key Unmet Need

Global composite effect¹: psychomotor function, memory, attention, working memory and executive function

	Dose	Effect Size vs. Placebo	P-value
LB-102	50 mg (n=90)	0.26	0.0476
	75 mg (n=83)	0.41	0.0027
	100 mg (n=23)	0.66	0.0018

- Significant, dose-dependent improvement in cognition consistent with LB-102 mechanism
- Magnitude of benefit represents a significant potential advantage over existing therapies
- High rate of satisfactory completion of tests demonstrates reliability of data
- Broad patient population; effect observed without enriching analysis for severe cognitive impairment at baseline
- Cognitive deficits are highly prevalent, with significant unmet need spanning SCZ, bipolar depression and MDD²

Favorable Adverse Event (AE) Profile in Phase 2

Adverse Events Reported in ≥5% of Patients Number of subjects (% of treatment group)	50 mg (n=107)	75 mg (n=108)	100 mg (n=36)	Placebo (n=108)
Insomnia	27 (25.2%)	23 (21.3%)	14 (38.9%)	24 (22.2%)
Headache	12 (11.2%)	9 (8.3%)	2 (5.6%)	10 (9.3%)
Anxiety	10 (9.3%)	9 (8.3%)	4 (11.1%)	9 (8.3%)
Agitation	11 (10.3%)	6 (5.6%)	4 (11.1%)	10 (9.3%)
Weight increase	13 (12.1%)	8 (7.4%)	3 (8.3%)	4 (3.7%)
Hyperprolactinemia	11 (10.2%)	8 (7.5%)	6 (16.6%)	0
Blood creatine phosphokinase increased	4 (3.7%)	1 (0.9%)	2 (5.6%)	3 (2.8%)
Alanine aminotransferase increased	3 (2.8%)	1 (0.9%)	2 (5.6%)	1 (0.9%)
Somnolence	1 (0.9%)	4 (3.7%)	2 (5.6%)	0
Constipation	4 (3.7%)	1 (0.9%)	2 (5.6%)	0

- Most AEs were mild or moderate in severity and similar to placebo
- AEs leading to discontinuation were reported at the following rates: 50 mg (1.9%), 75 mg (2.8%), 100 mg (8.3%), Pbo (1.9%)
- Serious Adverse Events (SAEs) occurred at the following rates: 50 mg (less than 1%), 75 mg (less than 1%), 100 mg (2.8%), Pbo (1.9%)
- Comorbid conditions at entry influenced reporting of TEAEs, which were defined as any AE that began on or after the first dose, or any pre-existing condition that reappeared during treatment or follow-up. As a result, AEs such as insomnia appear elevated
- Weight gain reflects any increase without a threshold. We observed ~1.6 kg placebo-adjusted weight gain while preserving metabolic neutrality

Potentially Class-Leading Low Rate of EPS (Including Akathisia) Among D2 Antagonists and Partial Agonists

Total EPS Observed in LB-102 Phase 2 Trial

Number of subjects (% of treatment group)

Preferred Term	50 mg (n=107)	75 mg (n=108)	100 mg (n=36)	Placebo (n=108)
Dystonia	0	3 (2.8%)	1 (2.8%)	1 (0.9%)
Akathisia	1 (0.9%)	2 (1.9%)	0	1 (0.9%)
Extrapyramidal disorder	0	1 (0.9%)	1 (2.8%)	2 (1.9%)
Total EPS	1 (1.0%)	6 (5.6%)	2 (5.6%)	4 (3.7%)

- EPS is generally correlated with dopamine receptor occupancy (RO) rate
- EPS rates (including akathisia) observed with other D2 antagonists and partial agonists can reach more than 30%
- EPS rates with LB-102 lower than amisulpride despite 70-80% RO for LB-102

Low Rates of Other Adverse Events of Interest Support Potentially Class Leading Safety Profile



Prolactin-related AEs

Low rate (~1-5.6%); AEs were mild to moderate and did not result in discontinuation



Sedation

Single case of sedation among 251 patients exposed to LB-102 in Phase 2 trial



QTc Prolongation

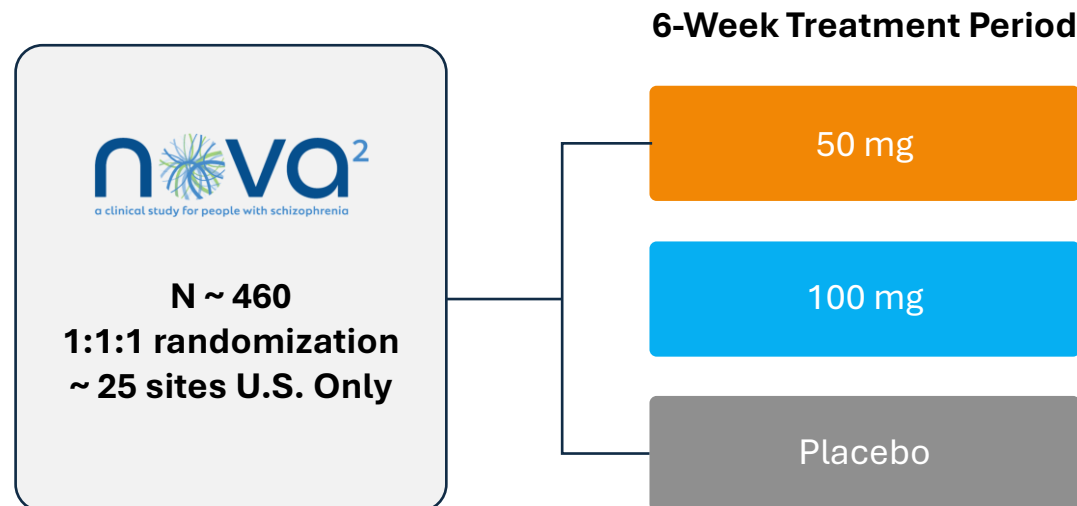
Minimal QT prolongation (4.3-5.4 ms); no patients met pre-specified stopping criteria

Robust Phase 3 Program for LB-102 in Schizophrenia

Phase 3 topline data readout expected in 1H 2027



Phase 3 Trial Design



Primary Endpoint:

PANSS Δ from baseline at Day 42 (6 weeks)

Secondary Endpoints:

CGI-S, PANSS positive and negative subscales, Marder factor, cognition, Personal and Social Performance Scale

Phase 3 (Inpatient)

- Low execution risk: Similar in scope to Phase 2
- Primary changes: 6-week duration; 3 versus 4 arms
- Doses selected to inform use in commercial setting

Open Label Extension (Outpatient)

- ~900 patients – rollover from Phase 3 trial + new patients
- Supports accrual of safety database for approval
- Subset analyses: cognition and negative symptoms

LB-102 has Potential to be the Branded AP of Choice in SCZ

Potential first benzamide in the U.S. for the treatment of SCZ



Compelling Evidence of Clinical Activity

- Rapid-onset at week 1, clinically meaningful PANSS reduction across all three tested dose levels
- Strong treatment effect (e.g., ES) at both 50 and 100 mg
- 6-week Phase 3 trial has potential to further improve PANSS reduction

Potentially Class-Leading Safety Profile + Simple Dosing

- Low EPS (including akathisia), QTc prolongation, negligible sedation
- No expected food effect or DDIs
- Few GI side effects, no orthostasis
- Simple QD dosing, starting therapeutic dose without titration

Differentiated Effects in Cognition and Negative Symptoms

- Robust, dose dependent treatment effect on cognition
- Significant effect on negative symptoms at 50 mg dose
- Additional supporting data from Phase 3 and OLE available at launch

Mood Disorders:

Bipolar Depression and Adjunctive
Major Depressive Disorder



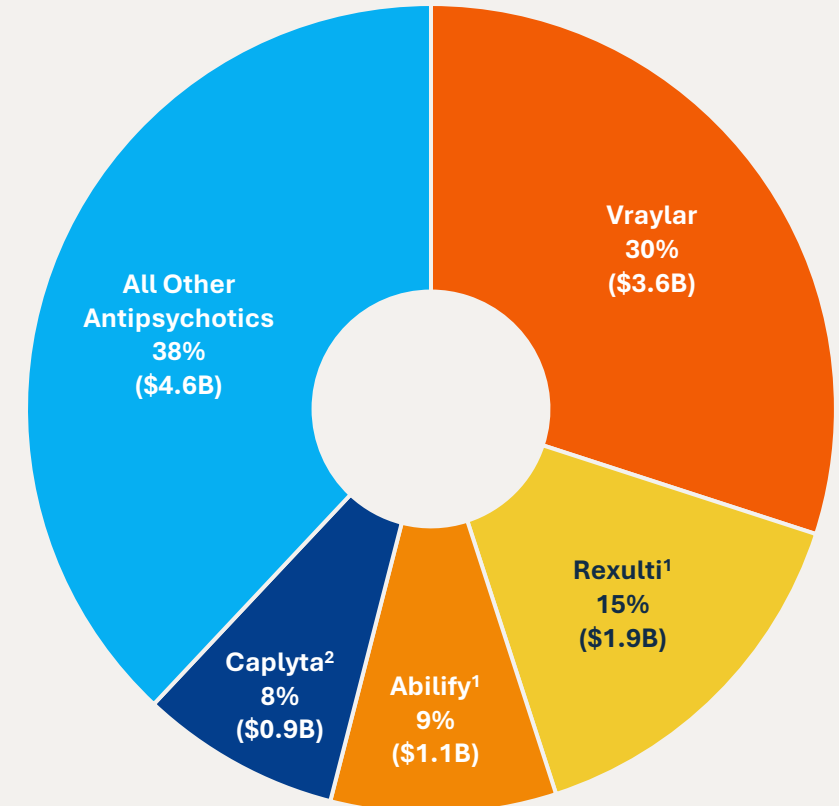
Achieving Blockbuster Status Typically Requires Expansion Beyond SCZ

- **Vraylar Approvals:** SCZ, Bipolar Mania, **BPD, MDD**
- **Rexulti Approvals:** SCZ, **MDD**, Alzheimer's agitation
- **Abilify Approvals:** SCZ, Bipolar Mania, **MDD**, Autism, Tourette's
- **Caplyta Approvals:** SCZ, **BPD, MDD**

1. North America Sales: Includes U.S. and Canada. Converted from JPY to USD based on exchange rate of 1 JPY to 0.00638 USD on 12/31/25; 2. 2025 revenue is comprised of J&J-reported Caplyta sales for Q2–Q4 2025 and Wall Street consensus estimates for Intra-Cellular Therapies' Q1 2025 Caplyta revenue. Intra-Cellular did not report Q1 2025 results amidst its acquisition by J&J, completed on April 2, 2025. Source: SEC filings, company reports, Wall Street research, EvaluatePharma; Approved indications from individual product labels in the U.S.

2025 Branded AP Sales in U.S.: ~\$12B

Four branded APs account for ~60% of sales



Bipolar Disorder and MDD Have Unmet Needs that Align Well with the Profile of LB-102

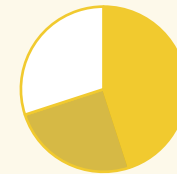
Efficacy Unmet Needs:

Residual symptoms are poorly addressed by current treatments and significantly impact function



~60%

have anhedonia¹ or cognitive deficits²



45 – 70%

experience anhedonia or cognitive deficits³

Safety/Tolerability Unmet Needs:

Poor tolerability drives suboptimal dosing, poor adherence, discontinuation, relapse, switching



~60%

of patients switch therapy due to safety or efficacy⁴



45%

of patients use adjunctive therapy to an ADT⁵

LB-102 has potential for market-competitive efficacy, a favorable tolerability profile and a unique opportunity to significantly improve residual symptoms

Multiple Lines of Evidence Support the Development of LB-102 in Bipolar Depression and Adjunctive MDD

High POS in planned Phase 2 trials



Strong Mechanistic Rationale



Validating Clinical and Real-World Experience with Amisulpride



Supportive Results from LB-102 Phase 2 Schizophrenia Trial

LB-102's Multimodal Mechanism Underlies Potential for Efficacy in Depression, Anhedonia, and Cognitive Impairment



Strong Mechanistic Rationale

- Selectivity for presynaptic autoreceptors at low doses increases dopamine signaling, which is underactive in depression
- D3 / 5HT7 also implicated in cognition and depression
- Lower doses also minimize potential for D2-mediated AEs common to APs, supporting effective dosing, improved tolerability and long-term use



Validating Clinical and Real-World Experience with Amisulpride



Supportive Results from LB-102 Phase 2 Schizophrenia Trial

Historical Amisulpride Data and Current Use Strongly Support LB-102's Potential in Mood Disorders



Strong Mechanistic Rationale



Validating Clinical and Real-World Experience with Amisulpride



Supportive Results from LB-102 Phase 2 Schizophrenia Trial

- Approvals in dysthymia and negative symptoms of schizophrenia
- As good or better than Paxil, Zoloft and significantly better than Pbo¹
- Significant benefit vs. Pbo in negative symptoms of schizophrenia
- >2 million monthly prescriptions in EU in 2023, including 20% for mood disorders²

Results from LB-102 Phase 2 SCZ Trial Further Support Potential to Achieve Differentiated Profile in Mood Disorders



Strong Mechanistic Rationale



Validating Clinical and Real-World Experience with Amisulpride

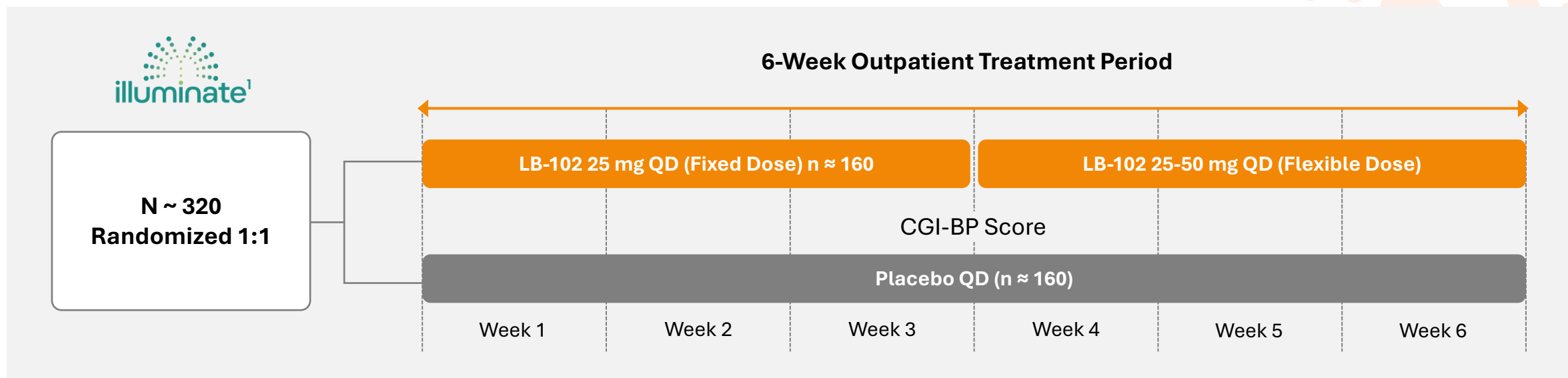


Supportive Results from LB-102 Phase 2 Schizophrenia Trial

- Market-competitive clinical activity with rapid onset as early as week 1
- Robust effects on cognition and negative symptoms¹
- Favorable tolerability profile with low EPS (including akathisia), minimal sedation, and few GI side effects¹
- Efficacy data that demonstrates ability to prevent emergence of bipolar mania
- Safety dataset for schizophrenia approval reduces cost and timeline to bipolar depression and adjunctive MDD approvals

Bipolar Depression: Potentially Registrational Phase 2 Trial Design

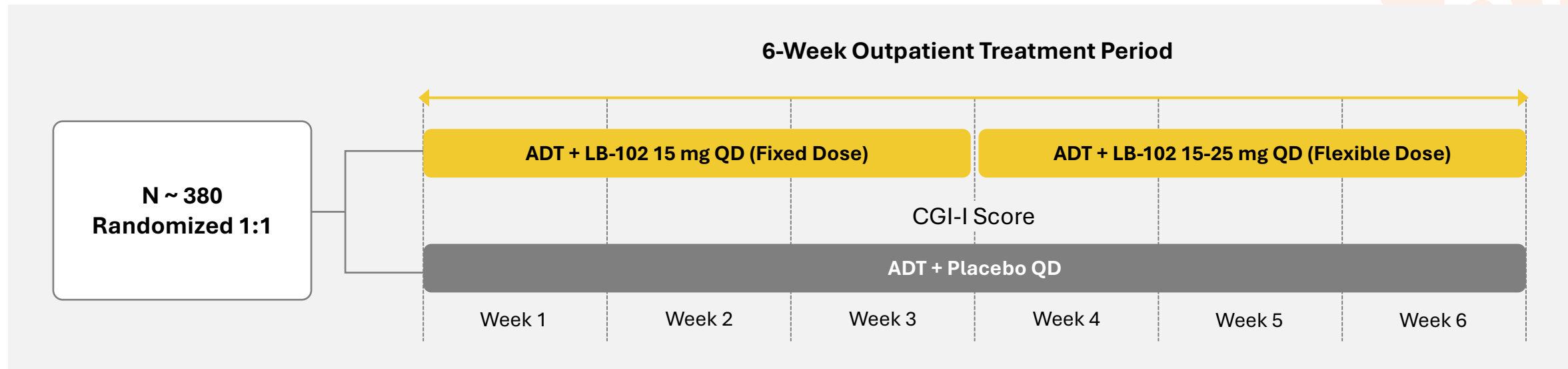
Topline data readout expected in 1Q 2028



- Inclusion criteria: Patients with ongoing depressive episodes associated with bipolar 1 disorder
- 25 mg fixed dose (first 3 weeks), flexible dose of 25 or 50 mg (Weeks 4-6)
- Primary endpoint: MADRS-10 at Week 6, all LB-102-treated patients vs Placebo
- Secondary endpoints: MADRS-6, CGI-BP, Cognition, Anhedonia, Safety, and Tolerability
- Two-arm and flexible dose design mitigate placebo effect¹

Adjunctive MDD: Potentially Registrational Phase 2 Trial Design

Topline data readout expected in 1H 2029



- Inclusion criteria: Inadequate response to 1-2 prior trials with standard antidepressants
- 15 mg fixed dose (first 3 weeks), flexible dose of 15 or 25 mg (Weeks 4-6)
- Primary endpoint: MADRS-10, all LB-102-treated patients vs Placebo
- Secondary endpoints: CGI-I/CGI-S, Anhedonia, Function, Cognition, Safety and Tolerability
- Two-arm and flexible dose design mitigate placebo effect¹

| Future Directions

Lead. Live. Boldly.



We are Pursuing Additional High Value, Clinically Validated Expansion Opportunities with Strong Clinical Rationale

Predominantly Negative Symptoms of SCZ

Rationale:

- Amisulpride outperformed placebo in three independent studies for negative symptoms¹
- Approved for SCZ with negative symptoms in the UK and Australia²

Next Steps:

- On track to receive FDA feedback by end of 2026
- Exploring label-enabling Phase 3b trial designs
- Potential for trial initiation in 2H 2027 (subject to regulatory feedback)

Alzheimer's Disease (AD) Psychosis/Agitation

Rationale:

- 40% of ~7M Americans with AD experience psychosis or agitation^{3,4}
- Amisulpride demonstrated clinical benefit in AD psychosis⁵ and was well-tolerated in elderly patients⁶

Next Steps:

- Elderly HV Phase 1 trial (safety/PK)
- Registrational-quality Phase 2 in AD psychosis/agitation (design TBD, based on outcome of HV trial)

Compelling Lifecycle Opportunity with LAI Formulation



LB-102 LAI

- Potential first-in-class benzamide LAI globally
- Supports global market expansion in SCZ and bipolar disorder
- Formulation development planned in 2026

LAIs reduce risk of relapse by offering the potential for:



Improved compliance



Consistent drug exposure



Reduced hospitalization and improved functional outcomes earlier in the disease²

A Compelling Sequence of Clinical Milestones

Anticipated Near-Term Catalysts	2026	2027	2028	2029
Schizophrenia	Initiated P3 trial (Q1)	Topline data (1H) Pre-NDA meeting (2H)		
Bipolar Depression	Initiated P2 trial (Q1)		Topline data (1Q)	
Adjunctive MDD		Initiation of P2 trial (early 2027)		Topline data (1H)

Cash runway expected to fund operations beyond Q2 2029

| Thank you

For more information, please contact ir@lbpharma.com



Lead. Live. Boldly.

