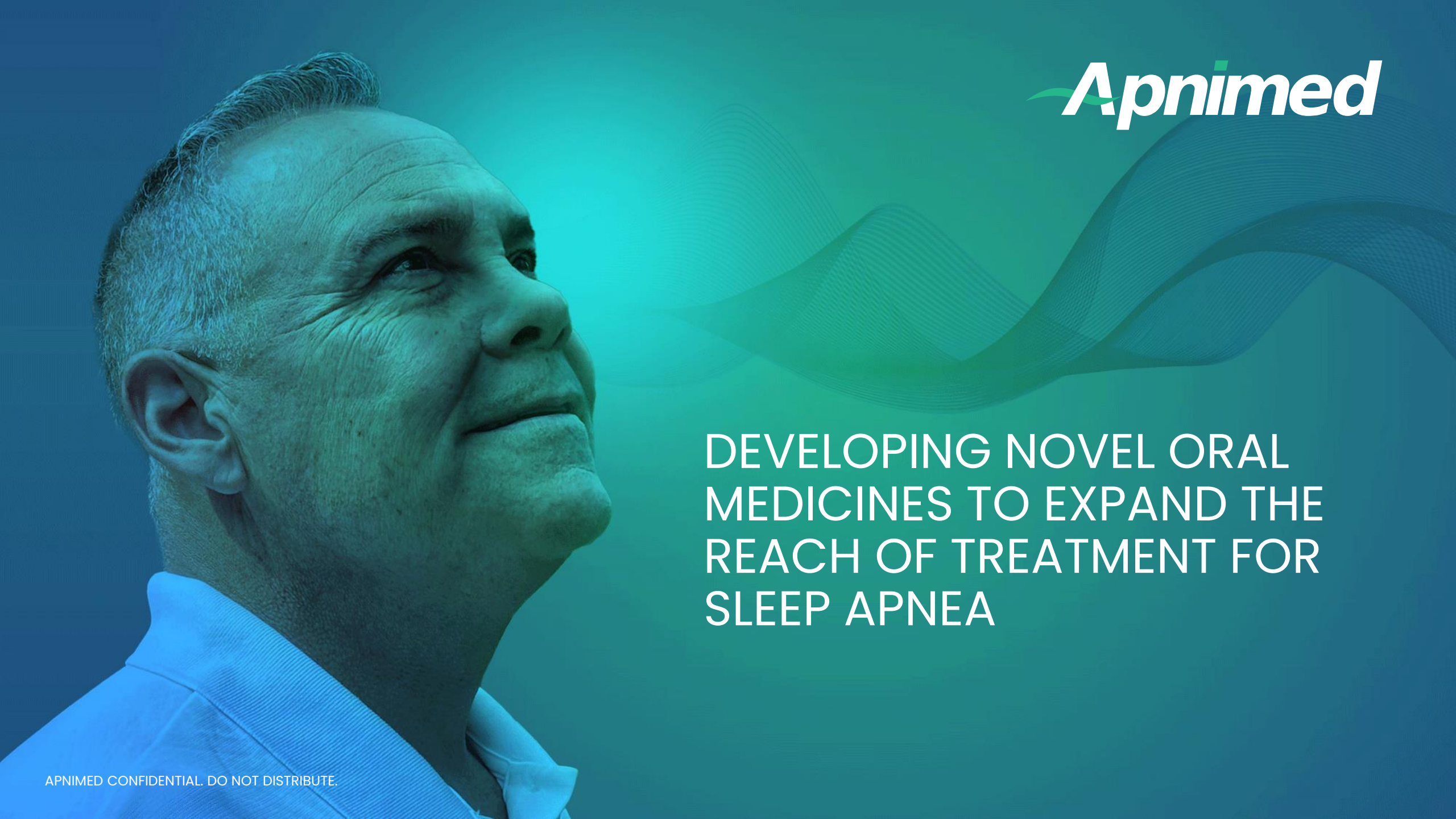

Apnimed

DEVELOPING NOVEL ORAL MEDICINES TO EXPAND THE REACH OF TREATMENT FOR SLEEP APNEA

DISCLAIMER

Forward-Looking Statements

This presentation contains forward-looking statements within the meaning of, and made pursuant to the safe harbour provisions of, The Private Securities Litigation Reform Act of 1995. All statements contained in this presentation, other than statements of historical facts or statements that relate to present facts or current conditions, including but not limited to, statements regarding possible or assumed future results of operations, research and development plans, regulatory activities, market opportunity, competitive position and potential growth opportunities are forward-looking statements. These statements involve known and unknown risks, uncertainties and other important factors that may cause our actual results, performance or achievements to be materially different from any future results, performance or achievements expressed or implied by the forward-looking statements. In some cases, you can identify forward-looking statements by terms such as “may,” “might,” “will,” “should,” “expect,” “plan,” “aim,” “seek,” “anticipate,” “could,” “intend,” “target,” “project,” “contemplate,” “believe,” “estimate,” “predict,” “forecast,” “potential” or “continue” or the negative of these terms or other similar expressions. The forward-looking statements in this presentation are only predictions.

We have based these forward-looking statements largely on our current expectations and projections about future events and financial trends that we believe may affect our business, financial condition and results of operations. These forward-looking statements speak only as of the date of this presentation and are subject to a number of risks, uncertainties and assumptions, some of which cannot be predicted or quantified and some of which are beyond our control. You should not rely on these forward-looking statements as predictions of future events.

The events and circumstances reflected in our forward-looking statements may not be achieved or occur, and actual results could differ materially from those projected in the forward-looking statements. Moreover, we operate in a dynamic industry and economy. New risk factors and uncertainties may emerge from time to time, and it is not possible for management to predict all risk factors and uncertainties that we may face. Except as required by applicable law, we do not plan to publicly update or revise any forward-looking statements contained herein, whether as a result of any new information, future events, changed circumstances or otherwise.

Apnimed

Discovering, developing, and commercializing novel, oral therapies that address the neurobiology of sleep-related breathing diseases

- **Founded:** 2017
- **Headquartered:** Cambridge, MA
- **Employees:** >60
- **Capital Raised:** >$280M

OUR MANIFESTO

Declaration of beliefs, intention, and motivation

Apnimed stands boldly for people living with obstructive sleep apnea (OSA) and other sleep-related breathing diseases that deprive people of the oxygen and sleep they need to be healthy and thrive in life.

We envision a new era where novel oral therapies lower the complexity of intervention, expand the reach of diagnosis and treatment, and elevate the expectations and health of people around the world.

APNIMED LEADERSHIP TEAM

Larry Miller, MD
Chief Executive Officer

Dennis Molnar
Chief Operating Officer

Ron Farkas, MD, PhD
Chief Medical Officer

Gina Marek
Interim Chief Financial Officer

Luigi Taranto Montemurro, MD
Chief Scientific Officer

Barry Wohl
Chief Business Officer

Graham Goodrich
Chief Commercial Officer

John Yee, MD, MPH
SVP, Medical Affairs

John Cronin, MD
SVP, Clinical Development

BOARD MEMBERS

Larry Miller, MD
Chair

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Former EVP, Parexel

Isaac Cheng, MD
Morningside

Chris Dimitropoulos
Alpha Wave Ventures

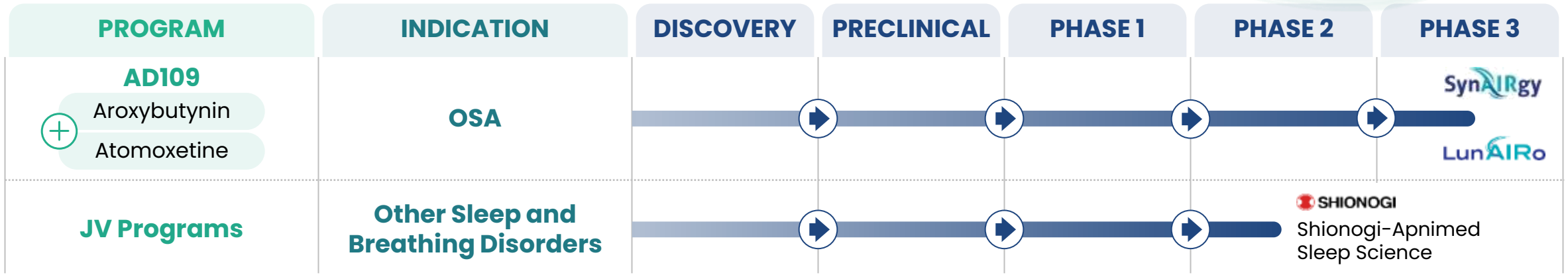
Paul Fonteyne
Former Chairman and CEO, Boehringer Ingelheim US

François Beaubien
Sectoral Asset Management

Dennis Molnar
Chief Operating Officer

SELECTED INVESTORS

CURRENT PRODUCT PIPELINE



UPCOMING MILESTONES

- ✓ Phase 3 SynAIRgy/LunAIRo trials are fully enrolled
- ○ Topline data for LunAIRo and SynAIRgy in 2Q ‘25
- ○ NDA Submission to FDA Q1 ‘26

APNIMED IS POISED TO TRANSFORM THE TREATMENT OF OSA

and other sleep-related breathing diseases with novel, oral medicines

INNOVATIVE PRODUCT

Our lead candidate, **AD109** offers new hope for people living with OSA

- Potential to be the first oral therapy targeting the neuromuscular dysfunction of OSA

- Phase 3 program evaluating Mild, Moderate & Severe OSA and potential to
  - Reduce airway obstruction
  - Improve oxygenation
  - Reduce level of fatigue
- Strong MARIPOSA Phase 2b data + vast set of prior trials to demonstrate safety and tolerability profile[3-5]
- Phase 3 Topline expected in mid-2025

UNTAPPED MARKET

OSA is very large market with a massive unmet need

- ~80M prevalence in the U.S, 1 billion WW[5,6]
- ~23M diagnosed (US) over past 5 years[5]
  - Majority are NOT actively treating

Significant limitations with current OSA treatments

- CPAP is highly effective, but low compliance and persistence[7,8]
  - Long-term compliance <50%
- GLP-1's may provide benefit, but only for subset with obesity[9]

EXPERIENCED & RESOURCED TEAM

Well-positioned to succeed with AD109 and beyond

- Deep Scientific, Clinical, Regulatory and Commercial expertise
- Efficient asset development and regulatory pathway
- Robust intellectual property
- Strong balance sheet, backed by respected investors

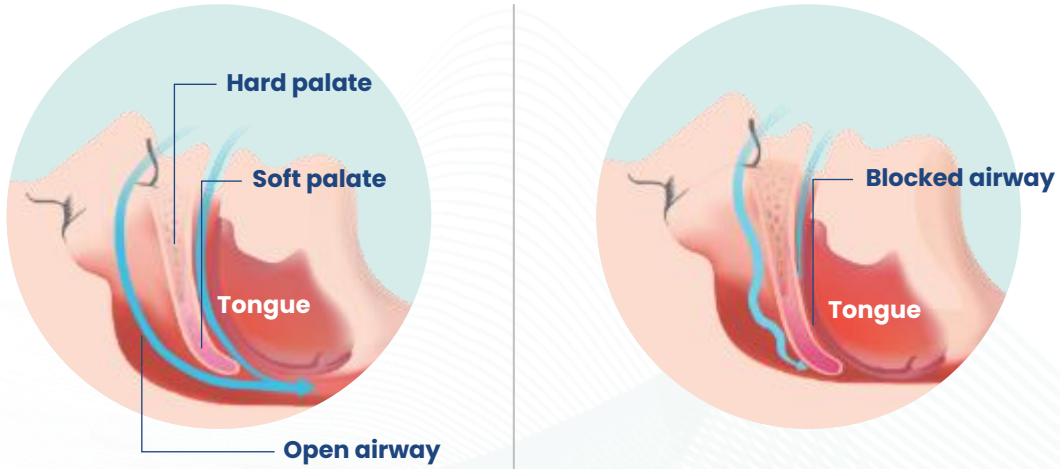
1. Parallel-Arm Study to Compare AD109 to Placebo with Patients with OSA (SynAIRgy Study). NCT05813275. Updated Sept 19, 2024. Accessed Oct 2, 2024. https://clinicaltrials.gov/study/NCT05813275. **2.** Parallel Arm Trial of AD109 and Placebo With Patients With OSA (LunAIRo). NCT05811247. Updated May 1, 2024. Accessed Oct 2, 2024. https://clinicaltrials.gov/study/NCT05811247. **3.** Schweitzer PK, et al. Am J Respir Crit Care Med. 2023;208(12):1316-1327. **4.** Rosenberg R, et al. J Clin Sleep Med. 2022;18(12):2837-2844. **5.** Data on file. Apnimed, Inc. 2024. **6.** Benjafield AV, et al. Lancet Respir Med. 2019;7(8):687-698. **7.** Patil SP, et al. J Clin Sleep Med. 2019;15(2):335-343. 8. Weiss T, et al. Patient Prefer Adherence. 2020;14:2337-2345. 9. Malhotra A, et al. N Engl J Med. 2024. doi: 10.1056/NEJMoa2404881..

OSA MARKET OVERVIEW

OSA IS A SERIOUS CHRONIC SLEEP-RELATED BREATHING DISEASE[1,2]

where the upper airway repeatedly collapses, causing intermittent oxygen deprivation

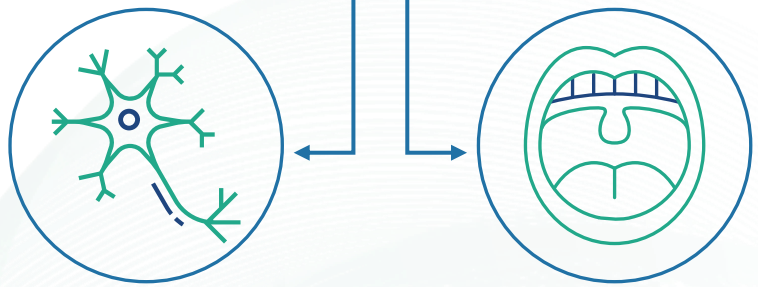
OSA PATHOPHYSIOLOGY[1,3]



Typical breathing during sleep

Obstructive sleep apnea (OSA)

CAUSED BY TWO OVERLAPPING MECHANISMS[1,3-5]



Neuromuscular dysfunction

Predisposing anatomic abnormalities

These mechanisms contribute to recurrent upper airway collapse during sleep, leading to disrupted breathing and sleep fragmentation

1. Dempsey DA, et al. Physiol Rev. 2010;90(1):47-112. **2.** Heilbrunn ES, et al. BMJ Open Respir Res. 2021;8(1):e000656. **3.** White DP, Younes MK. Compr Physiol. 2012;2(4):2541-2594.
4. Taranto-Montemurro L, et al. J Clin Med. 2019;8(11):1846. **5.** Perger E, Taranto-Montemurro L. Curr Opin Pulm Med. 2021;27(6):505-513.

OXYGEN DEPRIVATION DUE TO OSA

Increases the risk of long-term health consequences and acute symptoms that can be burdensome or dangerous to daily living.[1-5]

OSA CHRONIC MANIFESTATIONS[1-4]

- Hypertension
- Cardiovascular Disease
- Stroke
- Memory loss
- Type 2 Diabetes
- Depression
- Sudden cardiac death

OSA ACUTE MANIFESTATIONS[5]

- Daytime sleepiness
- Fatigue
- Cognitive impairment
- Loud snoring
- Dysphoria
- Motor vehicle accidents
- Workplace accidents

Without timely diagnosis and treatment, even mild OSA (AHI of 5-15) is associated with negative cardiovascular, neuropsychological, and quality of life outcomes[6-8]

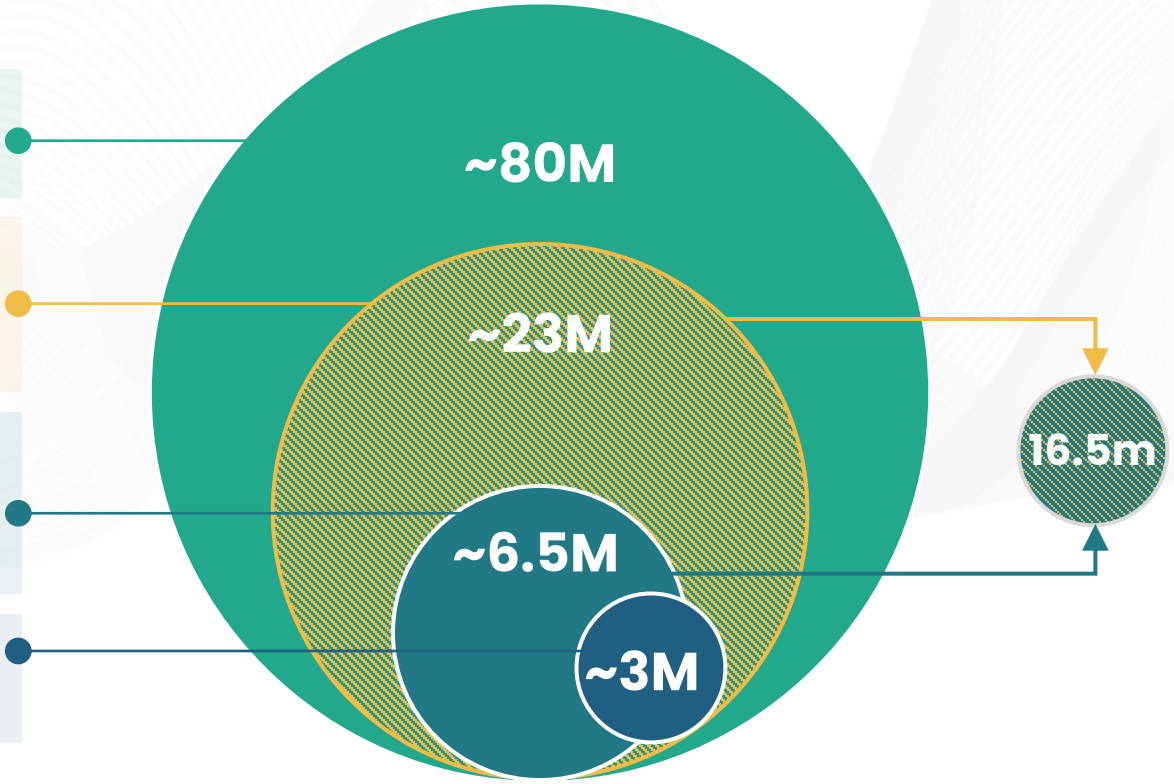
1. Dewan NA, et al. *Chest.* 2015;147(1):266-274. **2.** Marin JM, et al. *Lancet.* 2005;364(9464):1046-1053. **3.** Zhao DF, et al. *Sleep Breath.* 2024. doi: 10.1007/s11325-024-03083-4. **4.** Punjabi NM et al. *PLoS Med* 2009; 6(8):e100132. **5.** Kapur VK, et al. *J Clin Sleep Med.* 2017;13(3):479-504. **6.** Jackson ML, et al. *J Clin Sleep Med.* 2018;14(1):47-56. **7.** Barnes M, et al. *Am J Respir Crit Care Med.* 2002;165(6):773-780. **8.** Wimms AJ, et al. *ERJ Open Res.* 2024;10(1):00574-2023.

Significant latent demand

OSA MARKET IN THE US IS CHARACTERIZED BY VERY LARGE PREVALENCE AND LOW RATES OF DIAGNOSIS AND TREATMENT

US MEDICAL CLAIMS ANALYSIS

(2019-2023)[a]



KEY INSIGHTS

- ~23M unique diagnosis claims suggests epi data under-estimates diagnosed population
- As many as ~16.5M of the 23M diagnosed are not actively treating with the standard of care
- Of the ~3M people diagnosed with OSA every year, 25% refuse CPAP

a Source: Komodo Commercial, Medicare (all parts), Medicaid medical claims data analysis between 2019-2023. Data on file. Apnimed, Inc. 2024.

CURRENT TREATMENT LANDSCAPE

Current treatment landscape

NO PHARMACOLOGICAL AGENT EXISTS TO ADDRESS THE UNDERLYING NEUROMUSCULAR DYSFUNCTION IN OSA

OSA TREATMENTS

LEGACY STANDARD OF CARE

PAP/CPAP/BIPAP

- Highly effective when used compliantly and persistently[1,2]
- Long-term compliance is less than 50%[3]
- ~34% of patients continue to use CPAP nightly long-term over 6 months or more[4]

OTHER INTERVENTIONS FOR NICHE POPULATIONS WITH STRICT ELIGIBILITY CRITERIA

Surgical Options[5]

- Highly invasive
- Risk of complications
- Limited success

Hypoglossal Neurostimulator[5-7]

- Moderate-to-severe only
- Long approval steps and timelines
- ~30% do not respond to treatment

Oral Devices[5]

- Limited efficacy data
- Used in milder OSA
- Uncomfortable

EMERGING TREATMENTS

GLP-1s[8]

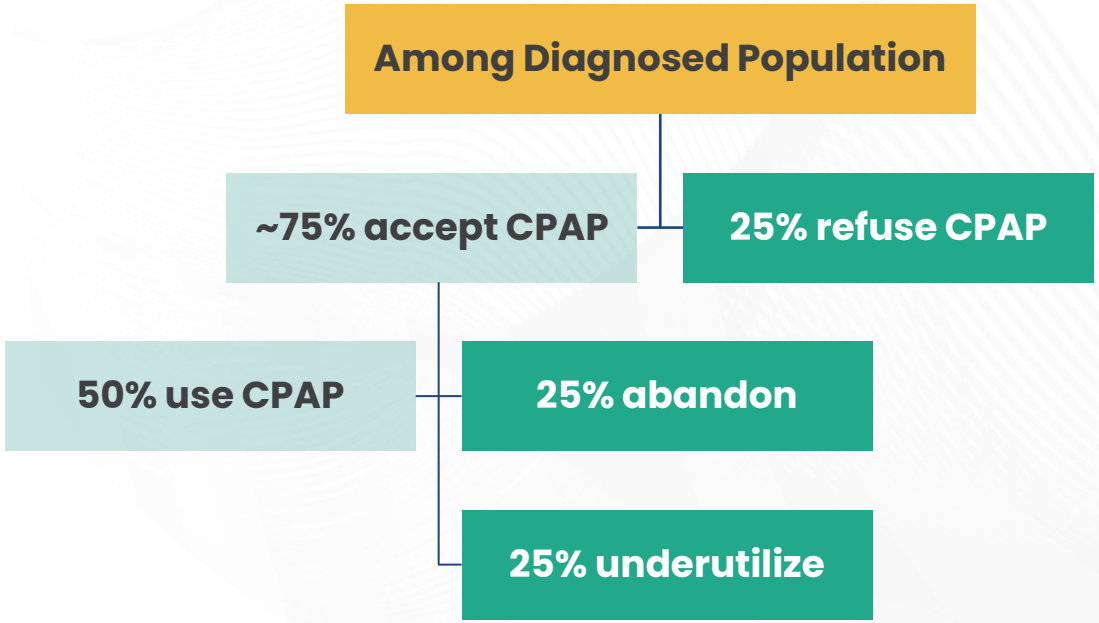
- Weight loss in people with obesity can help reduce AHI and address OSA symptoms
- Limited to segment with obesity
- Patients have residual OSA
- Does not target the underlying neuromuscular cause of OSA

1. Patil SP, et al. J Clin Sleep Med. 2019;15(2):335-343. **2.** McEvoy RD, et al. N Engl J Med. 2016;375:919-931. **3.** Weaver TE, Grunstein RR. Proc Am Thorac Soc. 2008;5(2):173-178. **4.** Rotenberg BW, et al. J Otolaryngol Head Neck Surg. 2016;45(1):43. **5.** Lv R, et al. Signal Transduct Target Ther. 2023;8:218. **6.** Strohl MM, et al. Curr Sleep Med Rep. 2017;3(3):133-141. **7.** Strollo PJ, et al. N Engl J Med. 2014; 370(2):139-149. **8.** Malhotra A, et al. N Engl J Med. 2024. doi: 10.1056/NEJMoa2404881.

CPAP Initiation and persistence

EVEN AFTER BEING DIAGNOSED, THE MAJORITY OF PEOPLE EITHER REFUSE, ABANDON OR UNDERUTILIZE CPAP TREATMENT

CPAP INITIATION & PERSISTENCE[1,a]



COMMON CHALLENGES TO CPAP INITIATION & PERSISTENCE[2,3]

- **Long Lead Times:** Between prescription and initiation
- **Discomfort**: Masks can be too large, too small, leave red marks or give a feeling of claustrophobia
- **Partner Impact**: Can create a stigma, impact mobility, or be a burden in the bedroom.
- **Excess Air:** May experience bloating or gas pains
- **Dryness:** Can cause dryness and irritation
- **Maintenance:** Requires regular cleaning, maintenance and replacing of accessories

a. Source: Komodo Commercial, Medicare (all parts), Medicaid medical claims data analysis between 2019-2023.
1. Data on file. Apnimed, Inc. 2024. **2.** McEvoy RD, et al. N Engl J Med. 2016;375:919-931. **3.** Weaver TE, Grunstein RR. Proc Am Thorac Soc. 2008;5(2):173-178.

LILLY SURMOUNT–OSA trial synopsis

GLP1/GIP TRIAL DEMONSTRATED POSITIVE EFFECT IN SUBSET OF OSA WITH OBESITY; YET, HUGE UNMET NEED REMAINS

STUDY SCOPE AND RESULTS[1]

STUDY POPULATION

- Two Phase 3 trials of adults with moderate to severe OSA with 15 or more AHI events per hour plus obesity
- Patients with very high levels of OSA (Median AHI~50) and obesity burden (Median BMI~39)

SUMMARY RESULTS

- Subject achieved 18% weight loss over 12 months
- Significant reduction in AHI, reducing episodes by 55%
- Pooled safety outcomes vs placebo
  - Diarrhea: 24.0% vs 10.7%
  - Nausea: 23.6% vs 7.7%

REAL-WORLD CONTEXT AND IMPLICATIONS

- Study population reflects ~33% of total OSA prevalence[2]
  - ~60% with moderate / severe OSA are not obese[2]
  - ~60% percent of people with OSA have an AHI <15 (“Mild”)[3]
  - People with Mild OSA can experience high burden[4-6]
- Post 12 months: >40% of subjects still had AHI in moderate to severe range (AHI>15) and will require additional treatment[1]
- Weight loss is long-term process: Up to a full year to garner the full benefit for OSA[1]
- Reported real-world compliance rates for GLP-1s are ~50%, as many cannot tolerate or access[7]

1. Malhotra A, et al. N Engl J Med. 2024. doi: 10.1056/NEJMoa2404881. **2.** Esmaeili E, et al. Poster presented at: SLEEP 2024; June 1-5, 2024; Houston, TX. **3.** Benjafield AV, et al. Lancet Respir Med. 2019;7(7):687-698. **4.** Jackson ML, et al. J Clin Sleep Med. 2018;14(1):47-56. **5.** Barnes M, et al. Am J Respir Crit Care Med. 2002;165(6):773-780. **6.** Wimms AJ, et al. ERJ Open Res. 2024;10(1):00574-2023. **7.** Weiss T, et al. Patient Prefer Adherence. 2020;14:2337-2345.

Obesity is an important risk factor for OSA; however,

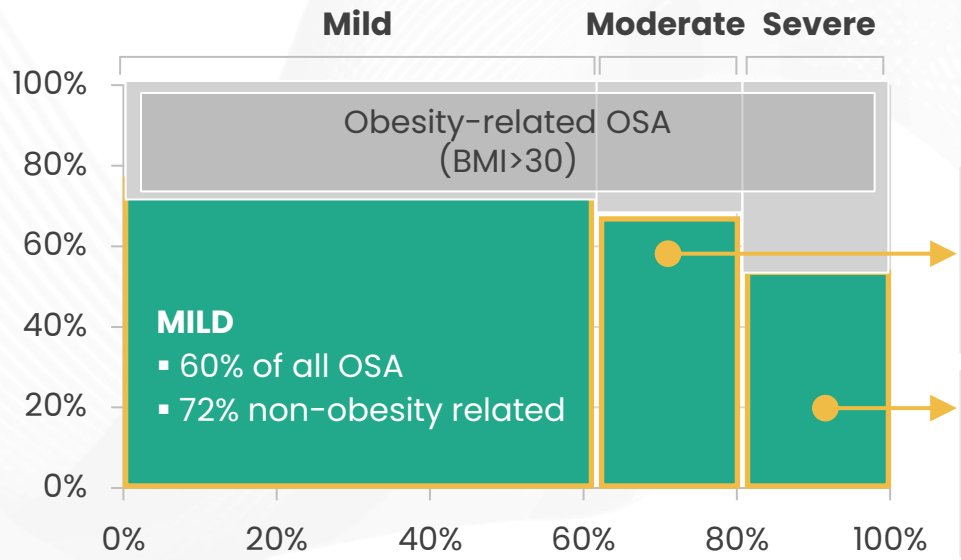
THE MAJORITY OF PEOPLE LIVING WITH OSA ARE NOT OBESE

PREVALENCE OF OBESITY WITH OSA

TOTAL OSA POPULATION[1]

BY OSA SEVERITY[1,2]

Mild, Moderate & Severe



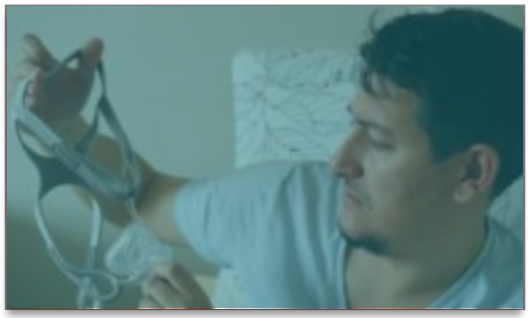
MODERATE
- 20% of OSA
- 65% non-obesity related

SEVERE
- 20% of OSA
- 53% non-obesity related

1. Esmaeili E, et al. Poster presented at: SLEEP 2024; June 1-5, 2024; Houston, TX. **2.** Data on file. Apnimed, Inc. 2024.

THREE PROFILES OF PEOPLE LIVING WITH OSA HIGHLIGHT THE NEED FOR NEW TREATMENT OPTIONS

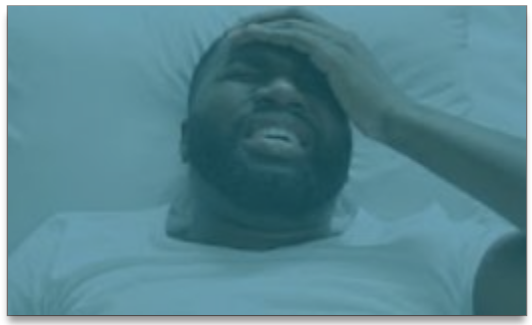
PROFILES OF PEOPLE LIVING WITH OSA



CPAP FRUSTRATED AND INTOLERANT

"I ditched mine after 2 months of sleepless hell."

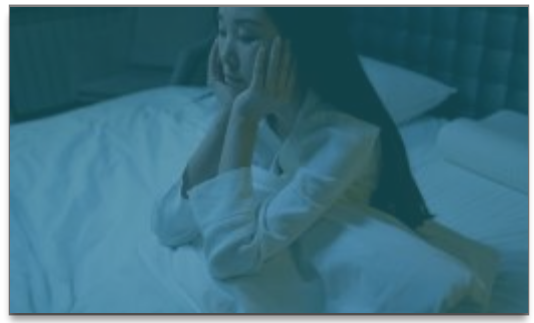
"I slept worse with it than without. The specialist on the phone and everyone else who chimed in went on how it can take a year to get used to it: A YEAR?!"



WEIGHT LOSS IS NOT ENOUGH

"I thought if I just lost the weight, I'd be fine."

"I've lost 30lbs. I thought the weight loss was really helping the sleep apnea, but in the past few weeks, I've woken up gasping for air almost as much as I did at my highest weight."



AVOIDING DIAGNOSIS DUE TO TREATMENT

"I think I have it but I'm afraid to admit it."

"Last year, my doctor referred me for a sleep study, and I was going to do it, but I chickened out - The idea of having sleep apnea and needing a CPAP machine just terrifies me."

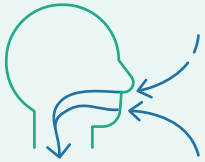
Quotes obtained from anonymous users on social media platform.

AD109 OVERVIEW

Phase 3 program aims to deliver the following aspirational value proposition

AD109 MAY REDUCE AIRWAY OBSTRUCTION, IMPROVE OXYGEN LEVELS AND REDUCE FATIGUE WITH A SAFE, TOLERABLE, ONCE-NIGHTLY PILL

REDUCED AIRWAY OBSTRUCTION



- May improve upper airway muscle activity during sleep[1,2]
- May deliver a reduction in AHI across mild, moderate, and severe patients with OSA[1,3]
- Phase 2 MARIPOSA: AD109 met the primary breathing endpoint (AHI reduction, $p<0.0001$)[1]

IMPROVED OXYGENATION

- May deliver a reduction in hypoxic burden, improving oxygen levels during sleep[1]
- Hypoxic burden predicts CVD morbidity & mortality in OSA[4]
- Phase 2 MARIPOSA: AD109 met secondary oxygenation endpoints (Reduction of oxygen desaturation index (ODI) $p<0.001$ and hypoxic burden (HB) $p<0.05$)[2]

REDUCED LEVEL OF FATIGUE

- May deliver improvement in PROMIS-Fatigue score, measuring[1,5]
  - Experience of fatigue
  - Interference of fatigue in daily activities

Broad target patient population

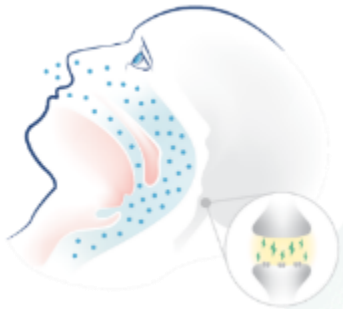
AD109 is being developed for all types of people with OSA - Mild, moderate, and severe; normal weight, overweight, and obese

1. Schweitzer PK, et al. *Am J Respir Crit Care Med.* 2023;208(12):1316-1327. **2.** Taranto-Montemurro L, et al. *Am J Respir Crit Care Med.* 2019;199(10):1267-1276. **3.** Rosenberg R, et al. *J Clin Sleep Med.* 2022;18(12):2837-2844. **4.** Azarbarzin A, et al. *Eur Heart J.* 2019;40(14):1149-1157. **5.** PROMIS-Fatigue: User manual and scoring instructions. Accessed from: https://www.healthmeasures.net/images/PROMIS/manuals/Scoring_Manual_Only/PROMIS_Fatigue_User_Manual_and_Scoring_Instructions_02202023.pdf. Updated: Feb 20, 2023.

BY TARGETING THE UNDERLYING NEUROMUSCULAR DYSFUNCTION OF OSA, AD109 MAY IMPROVE OXYGEN LEVELS

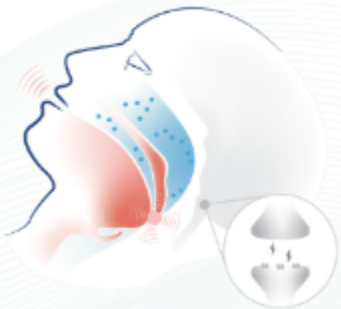
AWAKE
Full upper airway muscle tone

SLEEP
Lower tone → Upper airway collapse



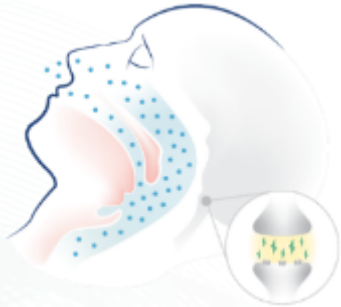
CNS drives upper airway muscle dilation while awake; no obstruction even with narrow airway[1,2]

UNTREATED OSA



Low CNS drive to airway dilator muscles leads to airway collapse and obstruction[2,3]

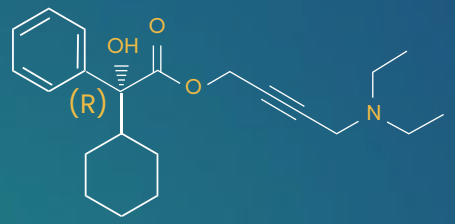
OSA TREATED WITH AD109



AD109 is believed to stimulate increasing firing of upper airway muscles and thus improves airflow and oxygenation[4,5]

1. Dempsey DA, et al. Physiol Rev. 2010;90(1):47-112. **2.** Chan E. et al. Am J Respir Crit Care Med. 2006;174(11):1264-1273. **3.** Cori JM, et al. Nat Sci Sleep. 2018;10:169-179. **4.** Schweitzer PK, et al. Am J Respir Crit Care Med. 2023;208(12):1316-1327. **5.** Taranto-Montemurro L, et al. Chest. 20202;157(6):1626-1636.

AROXYBUTYNIN

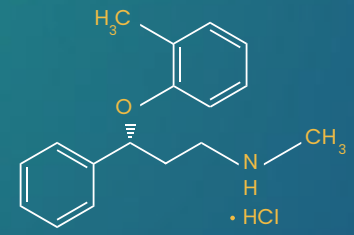


Novel anti-muscarinic (New chemical entity) is designed to stabilize the upper airway and sleep[4,5]

Single Tablet

Novel Co-formulation

ATOMOXETINE



Selective norepinephrine reuptake inhibitor, promotes adrenergic tone leading to muscle activation[4,5]

MARIPOSA Phase 2 Results

MARIPOSA: ONE-MONTH, DOUBLE-BLIND, PLACEBO-CONTROLLED PROSPECTIVE TRIAL OF AD109

PRIMARY ENDPOINT

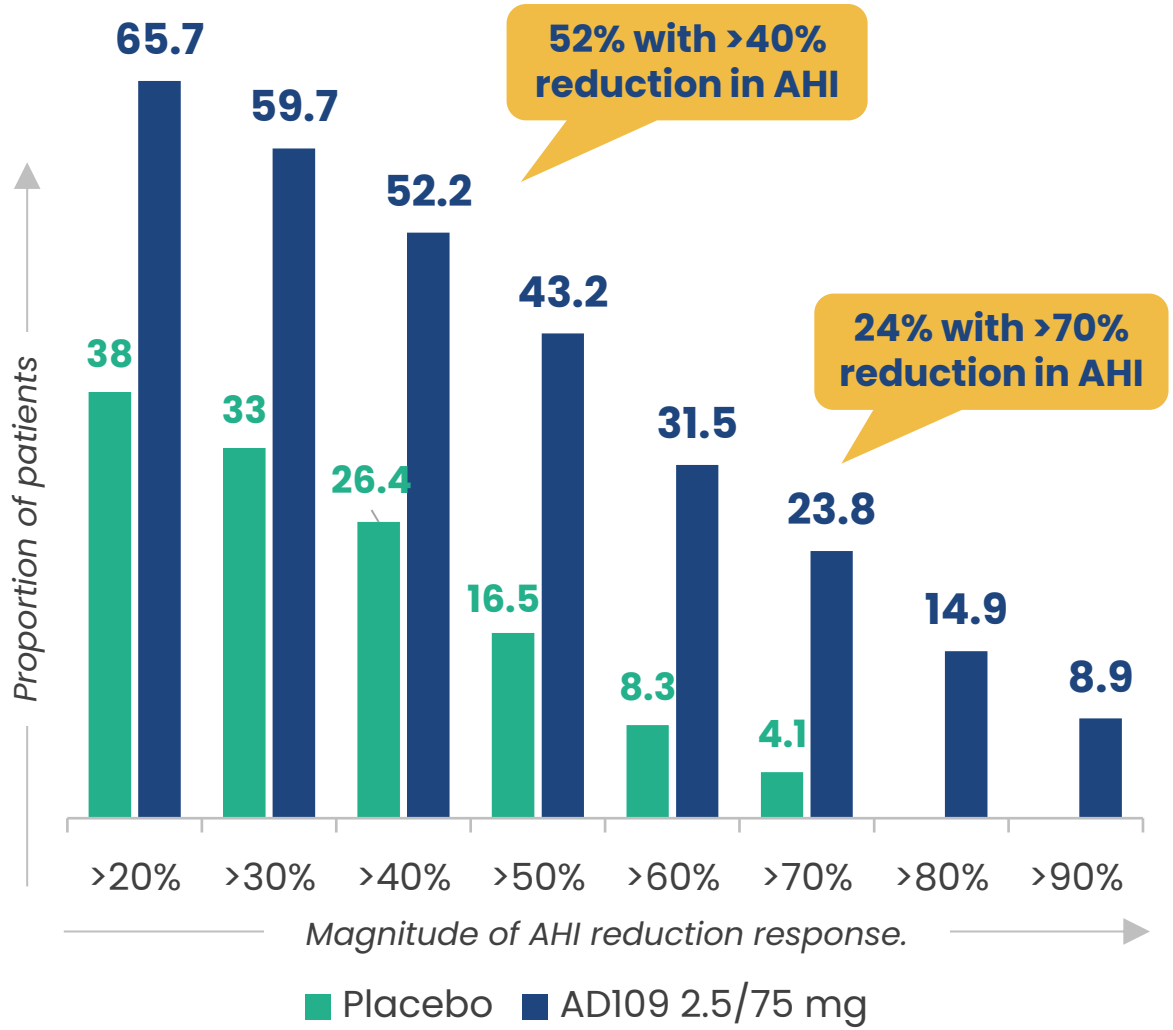
- 41% of all patients on the AD109 2.5/75mg dose saw their AHI[1] reduced below 10
- At that level of AHI reduction, no further Rx may be needed in the clinical setting
- AD109 vs placebo for AHI ($p<0.001$), with >40% reduction in AHI
- Stable efficacy over 1 month, reassuring for success over longer Phase 3 duration

Schweitzer PK, et al. *Am J Respir Crit Care Med*. 2023;208(12):1316-1327.

ADDITIONAL ANALYSIS

APNEA-HYPOPNEA INDEX (AHI[1]) RESPONDERS

Proportion of patients' reduction in AHI (%)



1. "AHI" references AHI4 used in MARIPOSA. AHI4 is Median AHI with a 4% or greater fall in oxyhemoglobin saturation (AHI4).

AD109 SHOWS POTENTIAL TO IMPROVE SYMPTOMS

PROMIS-FATIGUE patient-reported outcome (PRO)

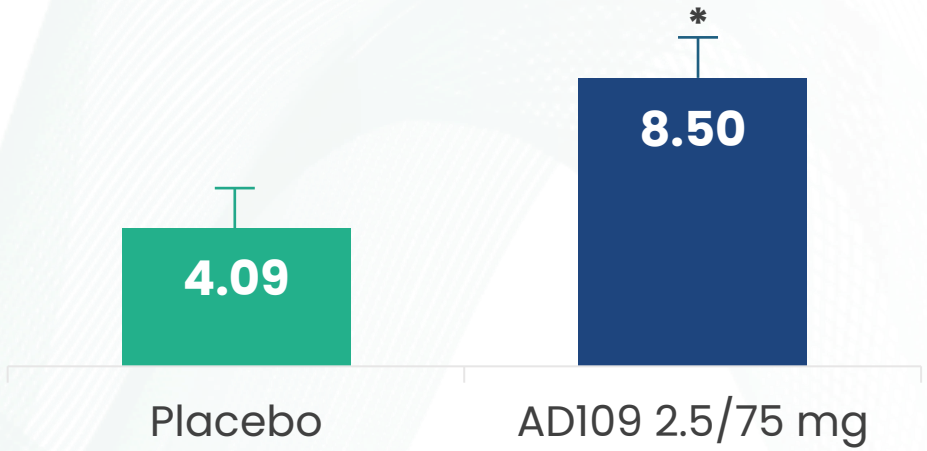
MARIPOSA

FATIGUE CAN BE A DEBILITATING SYMPTOM OF OSA[1]

PROMIS-FATIGUE is a validated scale that assesses...[2]

- Experience of fatigue
- Interference of fatigue with daily activities

PROMIS–FATIGUE (T-SCORE) REDUCTION RELATIVE TO BASELINE[3]



AD109 demonstrated a statistically significant signal with a clinically meaningful effect size

Data represent means (SEM)
*p<0.05 vs Placebo

1. Chervin RD. *Chest.* 2000; 118(2):372-379. **2.** PROMIS-Fatigue: User manual and scoring instructions. Accessed from: https://www.healthmeasures.net/images/PROMIS/manuals/Scoring_Manual_Only/PROMIS_Fatigue_User_Manual_and_Scoring_Instructions_02202023.pdf. Updated: Feb 20, 2023.
3. Schweitzer PK, et al. *Am J Respir Crit Care Med.* 2023;208(12):1316-1327.

ONGOING AD109 PHASE 3 PIVOTAL TRIALS

Topline Data	LunAIRo[1]	SynAIRgy[2]
	Q3 2025	**Q2 2025**
Study Design & Sample Size	• 660 participants • Randomized 1:1 to placebo vs. AD109 (aroxybutynin 2.5 mg/atomoxetine 75 mg) • 12-month dosing duration	• 646 participants in main cohort • Randomized 1:1 to placebo vs. AD109 (aroxybutynin 2.5 mg/atomoxetine 75 mg) • 6-month dosing duration
Primary Endpoint	Reduction in AHI	
Key Secondary Endpoint	Improvement in PROMIS-Fatigue score	
Study Population	• Adults (≥18yrs) with mild to severe OSA who decline or do not tolerate CPAP • BMI <40 in men and <42 in women	
Sites & Geographies	~65 US sites	~65 US & Canada sites
Initiation of Recruitment	September 2023	November 2023
Enrollment	Completed in April 2024	Completed in August 2024
Dosing	Once nightly (QHS)	
Clinicaltrials.gov Identifier	NCT05811247	NCT05813275

1. Parallel Arm Trial of AD109 and Placebo With Patients With OSA (LunAIRo). NCT05811247. Accessed from: https://clinicaltrials.gov/study/NCT05811247. Last updated: May 1, 2024. Accessed: Oct 3, 2024.
2. Parallel-Arm Study to Compare AD109 to Placebo with Patients with OSA (SynAIRgy Study) NCT05813275. Accessed from: https://clinicaltrials.gov/study/NCT05813275. Last updated: Sept 19, 2024. Accessed: Oct 3, 2024.

DAWN OF A NEW ERA IN OSA

Numerous tailwinds support the prospect of rapid adoption of AD109

1 LATENT DEMAND
Bolus of patients waiting who refuse, abandon or under-utilize CPAP

2 IMPROVED SCREENING
Explosion in wearable OSA screening tech

3 HOME TESTING TREND
Shift from In-Lab to Home Sleep testing improves ease of diagnosis

4 FOCUS ON CARDIOMETABOLIC HEALTH
Increased understanding of OSA link to CV / MET risk

5 NEW ALTERNATIVES TO CPAP
GLP-1 data challenging treatment convention in obesity-related OSA

END