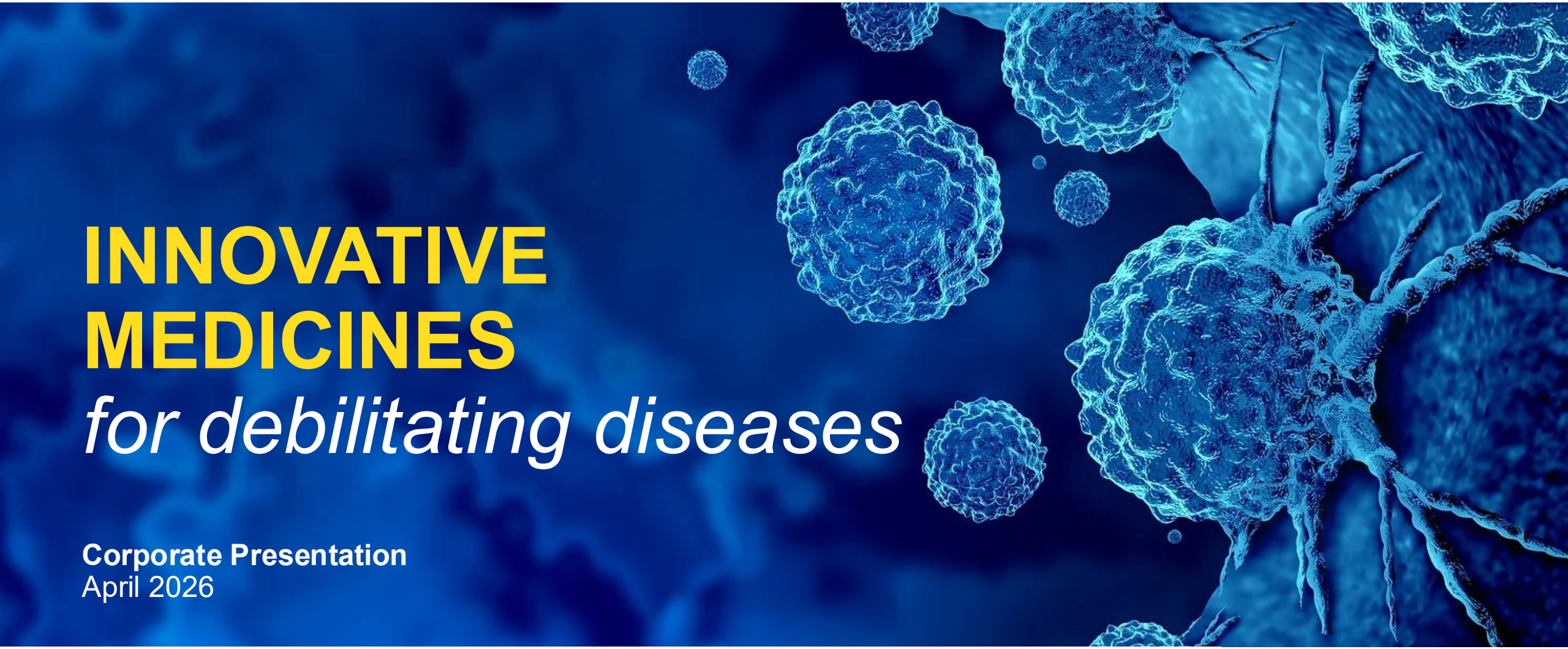
Lirum THERAPEUTICS



INNOVATIVE MEDICINES

for debilitating diseases

Corporate Presentation
April 2026

Disclaimer

This presentation and the accompanying oral presentation shall not constitute an offer to sell or the solicitation of an offer to buy any securities in any state or jurisdiction where such offer, solicitation or sale would be unlawful, nor shall there be any sale of these securities in any state or jurisdiction in which such offer, solicitation or sale would be unlawful prior to registration or qualification under the securities laws of any such state or jurisdiction. Recipients of this presentation should carefully review the Company's Registration Statement on Form S-1, including the risk factors contained therein, before making any investment decision.

Forward Looking Statements

Some of the statements we use in this presentation contain certain forward-looking statements within the meaning of Section 27A of the Securities Act of 1933 and Section 21E of the Securities Exchange Act of 1934, each as amended. You can identify some of these forward-looking statements by words or phrases, such as "aim," "anticipate," "assume," "believe," "contemplate," "continue," "could," "design," "due," "estimate," "expect," "goal," "intend," "may," "objective," "plan," "positioned," "potential," "predict," "seek," "should," "target," "will," "would" or other similar expressions. We have based these forward-looking statements largely on our current expectations and projections about future events that we believe may affect our financial condition, results of operations, business strategy and financial needs.

These forward-looking statements include statements relating to the timing, progress and results of preclinical studies and clinical trials for our product candidates, including our product development plans and strategies; the timing, scope and likelihood of regulatory filings and approvals, including opportunities to use expedited regulatory pathways and final regulatory approval of our product candidates; the potential benefits and market opportunity for our product candidates; expectations regarding the size, scope and design of clinical trials; our plans and strategy with respect to our drug development efforts; our manufacturing, commercialization, and marketing plans and strategies; our plans to hire additional personnel and our ability to attract and retain such personnel; our estimates of the number of patients who suffer from the diseases we are targeting and potential growth in our target markets; our expectations regarding the approval and use of our product candidates; our competitive position and the development and impact of competing therapies that are or may become available; expectations and strategies for entering into potential collaborations and additional licensing agreements; our intellectual property position, including the scope of protection we are able to establish and maintain for intellectual property rights covering product candidates we may develop, including the extensions of existing patent terms where available, the validity of intellectual property rights held by third parties, and our ability not to infringe, misappropriate or otherwise violate any third-party intellectual property rights; the rate and degree of market acceptance and clinical utility of product candidates we may develop; our estimates regarding expenses, future revenue, capital requirements and needs for additional financing; our future financial performance; the period over which we estimate our existing cash on hand will be sufficient to fund our future operating expenses and capital expenditure requirements; the impact of laws and regulations; pandemics, epidemics, and other major world crises; and our anticipated use of the net proceeds from our initial public offering, as well as other factors included in the "Risk Factors" in our Registration Statement on Form S-1, as amended (File No. 333-277822) (the "Registration Statement") filed with the Securities and Exchange Commission (the "SEC"), which is available at https://www.sec.gov.

The forward-looking statements made in this presentation relate only to events or information as of the date on which the statements are made. Except as required by law, we undertake no obligation to update or revise publicly any forward-looking statements, whether as a result of new information, future events or otherwise, after the date on which the statements are made or to reflect the occurrence of unanticipated events

This presentation also contains market data related to our business and industry, including projections that are based on a number of assumptions. If these assumptions turn out to be incorrect, our actual results may differ materially from the projections based on these assumptions. As a result, the market for our product candidates may not grow at the rates projected by these data, or at all.

Investment Highlights

Clinical Stage Biopharmaceutical Company Focused on the Treatment of Debilitating Diseases

Veteran Team with Proven Track Record

- ✓ History of substantial shareholder value creation
- ✓ Multiple US and international approvals and commercial launches
- ✓ M&A Exit

New Opportunity Identified

- ✓ **LX-101**: Clinical-stage, payload-bearing, targeted therapy directed to IGF-1R with differentiated MOA
- ✓ Tremendous commercial potential in wide range of IGF-1R-driven oncology and autoimmune indications, including Thyroid Eye Disease (TED)

Near-Term Value Creation Potential

- ➢ Focus on indications with opportunities for both near-term value creation and expedited approval pathways

Lirum THERAPEUTICS

MOA = mechanism of action

Lirum Team: Track Record of Approvals & Launches

Ivan Bergstein, MD
Chairman

Ken Hoberman
Director

Peter McDonald
Chief Executive Officer

- ✓ **Veteran leadership team**
- ✓ **Proven track record of shareholder value creation**
- ✓ **Multiple drug approvals and commercial launches**

***Notably**: ELZONRIS was approved on the basis of an innovative 3-stage, non-randomized, Phase 1/ 2 trial*
And with a novel regulatory endpoint created by the company and its PIs

ELZONRIS® (tagraxofusp-erzs) Injection — Stemline®
✓ Commercial; oncology; US and EU

ORSERDU® elacestrant — MENARINI group — Stemline® A Menarini Group Company
✓ Commercial; oncology; US and EU

briumvi™ ublituximab-xiiy 150 mg/6 mL injection for IV — TG Therapeutics
✓ Commercial; neurodegenerative; US & EU

Auryxia® (ferric citrate) tablets — KERYX BIOPHARMACEUTICALS, INC
✓ Commercial; renal; US

Lirum THERAPEUTICS

LX-101: Novel IGF-1R Targeted Therapy

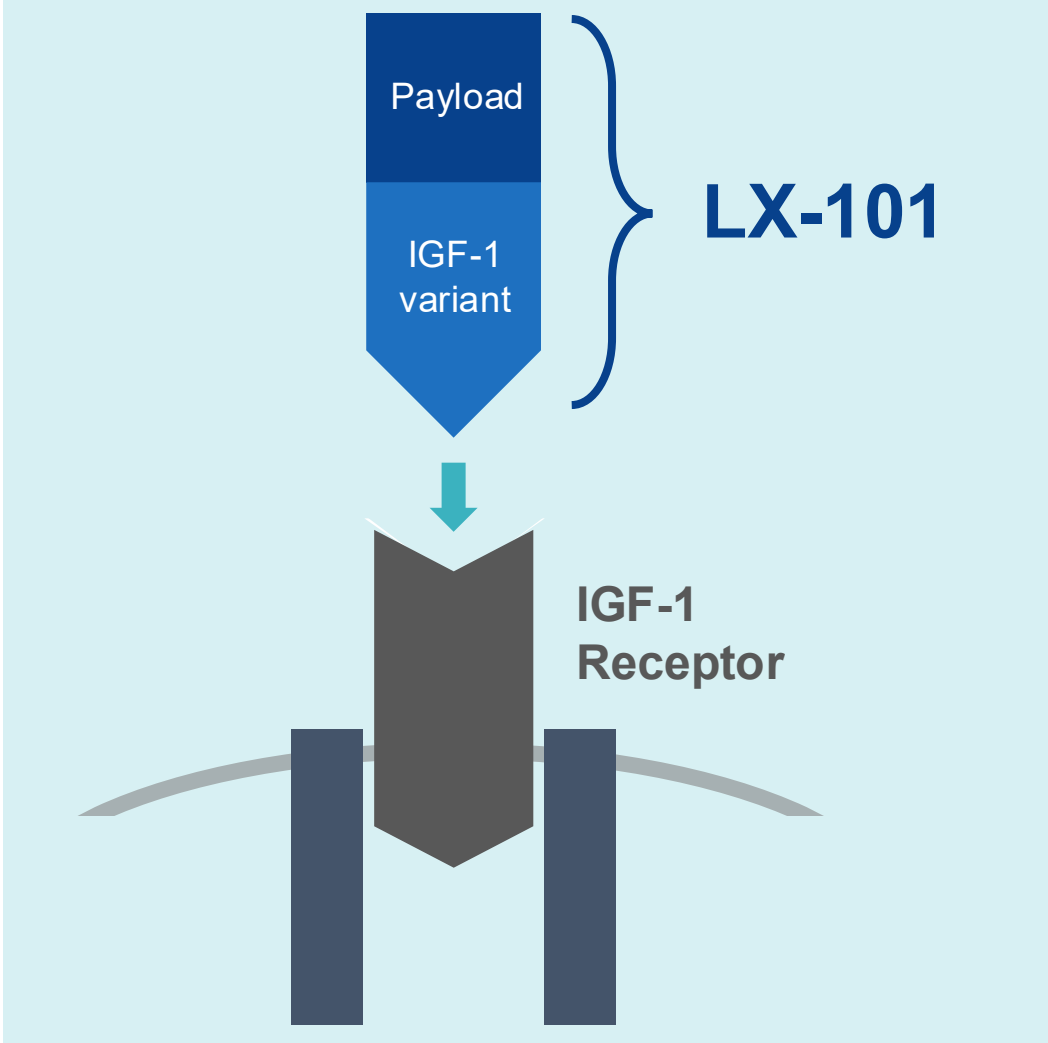
Precision Targeting
Targeted therapy, with novel payload-based approach, to IGF-1R

Novel Mechanism of Action
Differentiated mechanism with potential for efficacy and safety benefits over other IGF-1R-targeted agents

Rational Payload
Delivers methotrexate (MTX), a drug used to treat a variety of cancers and autoimmune diseases, including TED

Positive Clinical Experience
Well-tolerated with single agent activity in Phase 1a trials

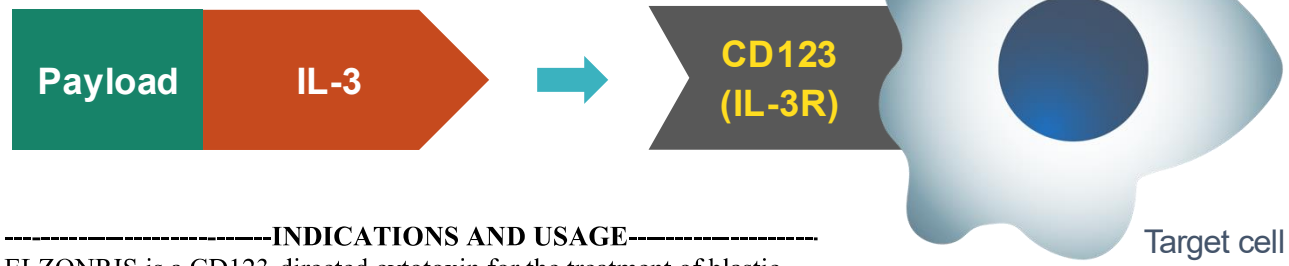
Large Market Opportunity
Wide range of oncologic & autoimmune indications, including TED



Lirum THERAPEUTICS

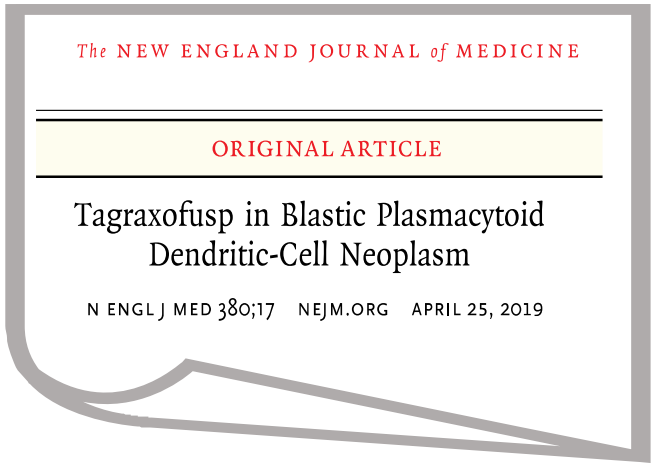
LX-101: Leveraging the Successful ELZONRIS Development Strategy

ELZONRIS
(tagraxofusp)

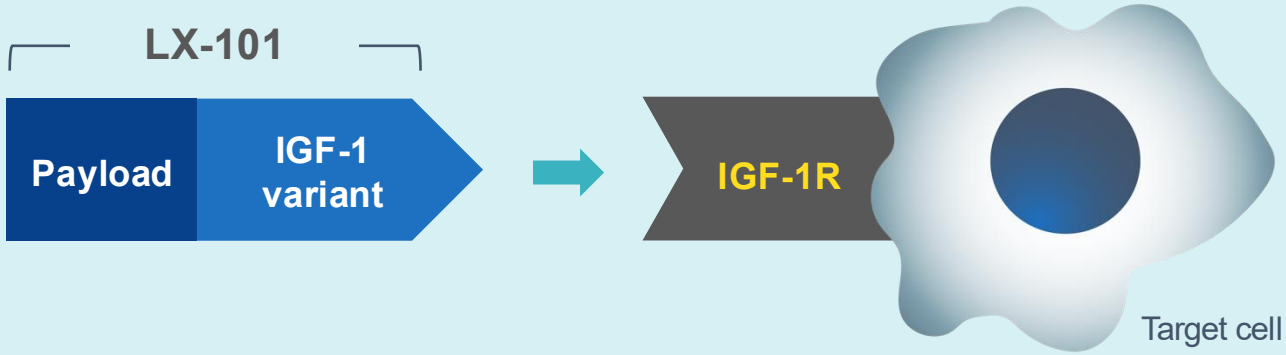


----------INDICATIONS AND USAGE----------
ELZONRIS is a CD123-directed cytotoxin for the treatment of blastic plasmacytoid dendritic cell neoplasm (BPDCN) in adults and in pediatric patients 2 years and older. (1)

- ✓ Breakthrough Therapy Designation
- ✓ US and EU approvals in BPDCN
- ✓ Commercial in US and EU



LX-101

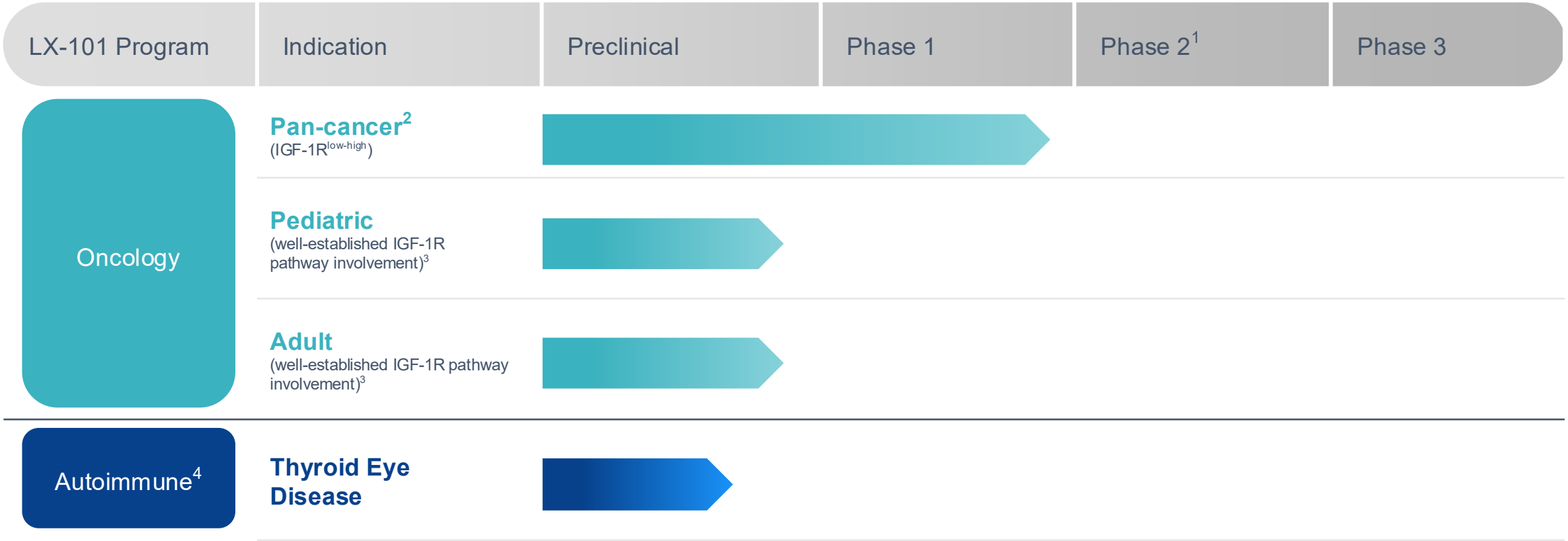


Leverage our experience:

- Targeted approach for indications of unmet need that enable innovative and expedited development
- ➢ Unlock commercial potential in both oncology and autoimmune, including TED, quickly and efficiently

Note: FDA approvals for related drugs may not be indicative of what may be required for approval of LX-101

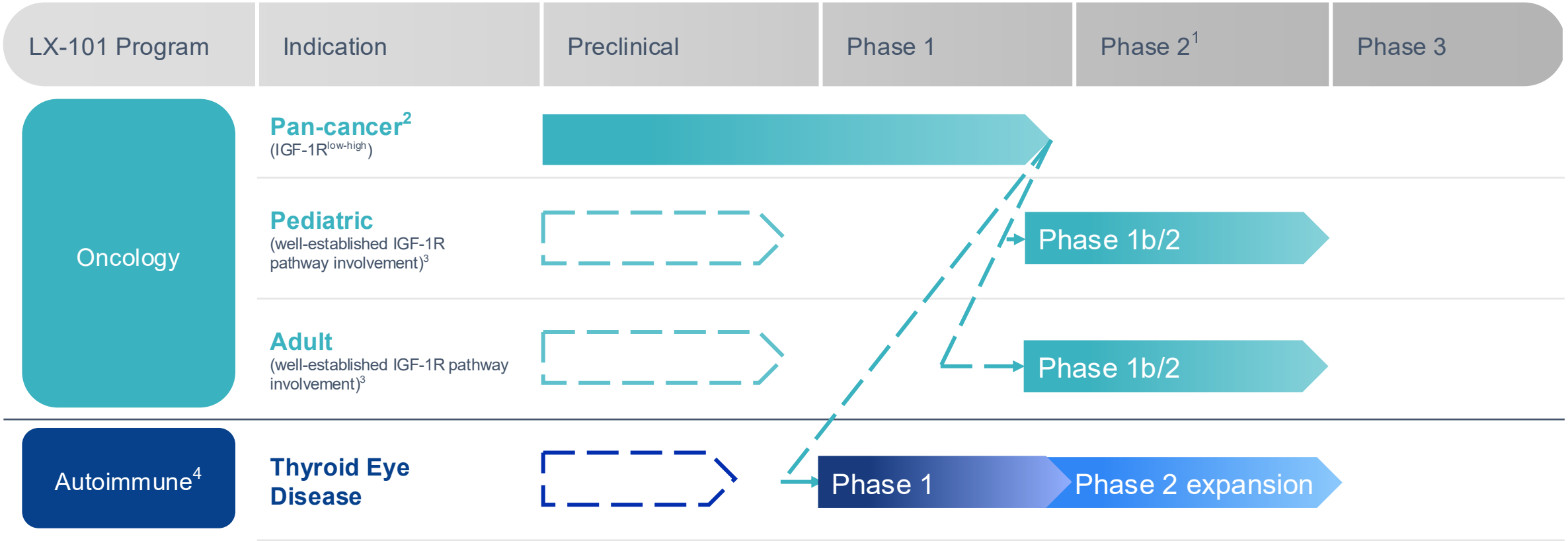
Lirum Pipeline: Focused on IGF-1R Driven Indications



[1]Some indications by virtue of certain factors (e.g., unmet medical need, etc.) could lend themselves to the possibility of pivotal phase 2 studies or other expedited development pathways, although we cannot be assured that LX-101 or any future products will qualify.
[2]This trial, conducted by the licensor with 765IGF-MTX, the former name of LX-101, enrolled patients with multiple cancer types including colorectal, endometrial, pancreatic, breast, basal cell carcinoma, Hodgkin's lymphoma, and others. IGF-1R expression was assessed on patient tumors via immunohistochemical staining and scored based on the proportion of cells that were positive (PS=proportion score; range 0%-100%) and Q score (range 0-7), which is the combination of PS and intensity score (IS).
[3]Cancers with "well-established IGF-1/IGF-1R pathway involvement" include those tumor types with genetic alterations relating to the pathway and/or elevated IGF-1R expression.
[4]Reviewing opportunities in other autoimmune diseases including rheumatoid arthritis, Graves' disease, Cushing's syndrome, lupus, Crohn's disease, and others.

Lirum THERAPEUTICS

Lirum Pipeline: Focused on IGF-1R Driven Indications



[1]Some indications by virtue of certain factors (e.g., unmet medical need, etc.) could lend themselves to the possibility of pivotal phase 2 studies or other expedited development pathways, although we cannot be assured that LX-101 or any future products will qualify.
[2]This trial, conducted by the licensor with 765IGF-MTX, the former name of LX-101, enrolled patients with multiple cancer types including colorectal, endometrial, pancreatic, breast, basal cell carcinoma, Hodgkin's lymphoma, and others. IGF-1R expression was assessed on patient tumors via immunohistochemical staining and scored based on the proportion of cells that were positive (PS=proportion score; range 0%-100%) and Q score (range 0-7), which is the combination of PS and intensity score (IS).
[3]Cancers with "well-established IGF-1/IGF-1R pathway involvement" include those tumor types with genetic alterations relating to the pathway and/or elevated IGF-1R expression.
[4]Reviewing opportunities in other autoimmune diseases including rheumatoid arthritis, Graves' disease, Cushing's syndrome, lupus, Crohn's disease, and others.

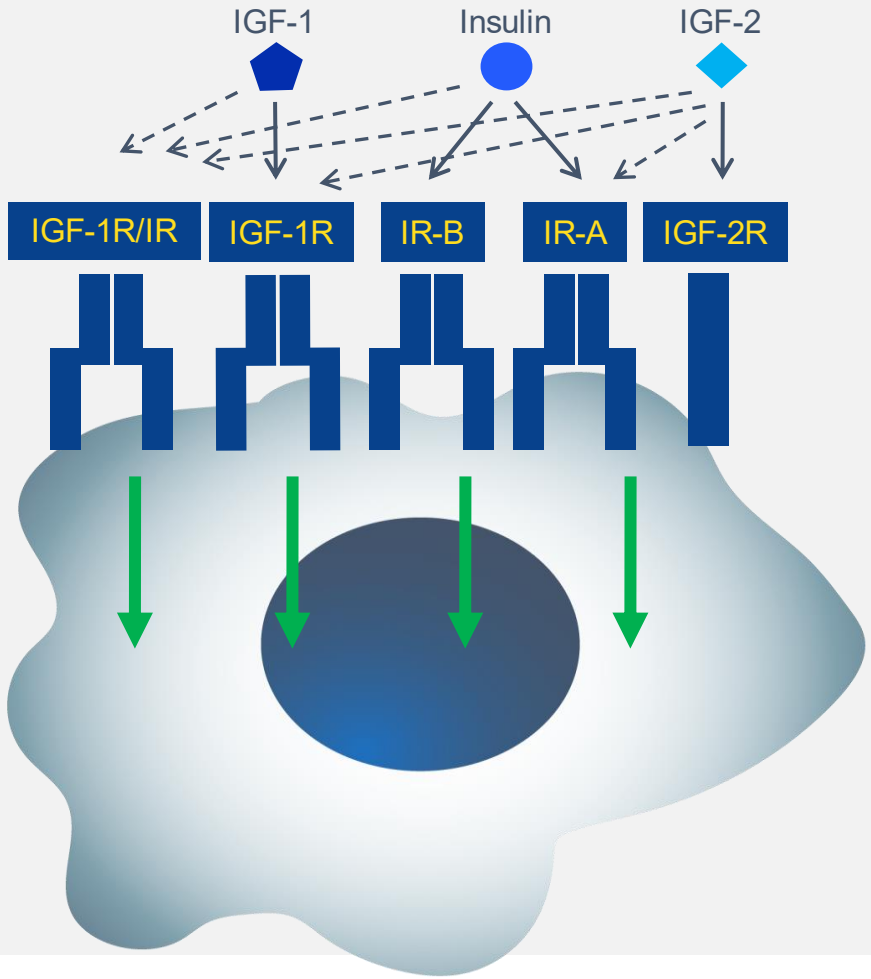
Lirum THERAPEUTICS

LX-101

Oncology

IGF-1R Pathway: A Major, High-Profile Target in Oncology

IGF Signaling



Tumor promotion

↑ Survival

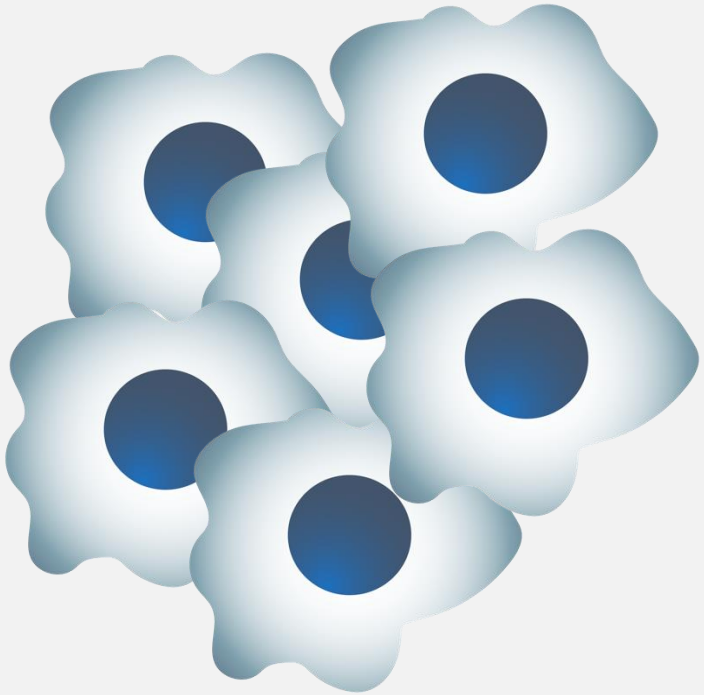
↑ Proliferation

↑ Migration

↑ Invasion

↑ Metastasis

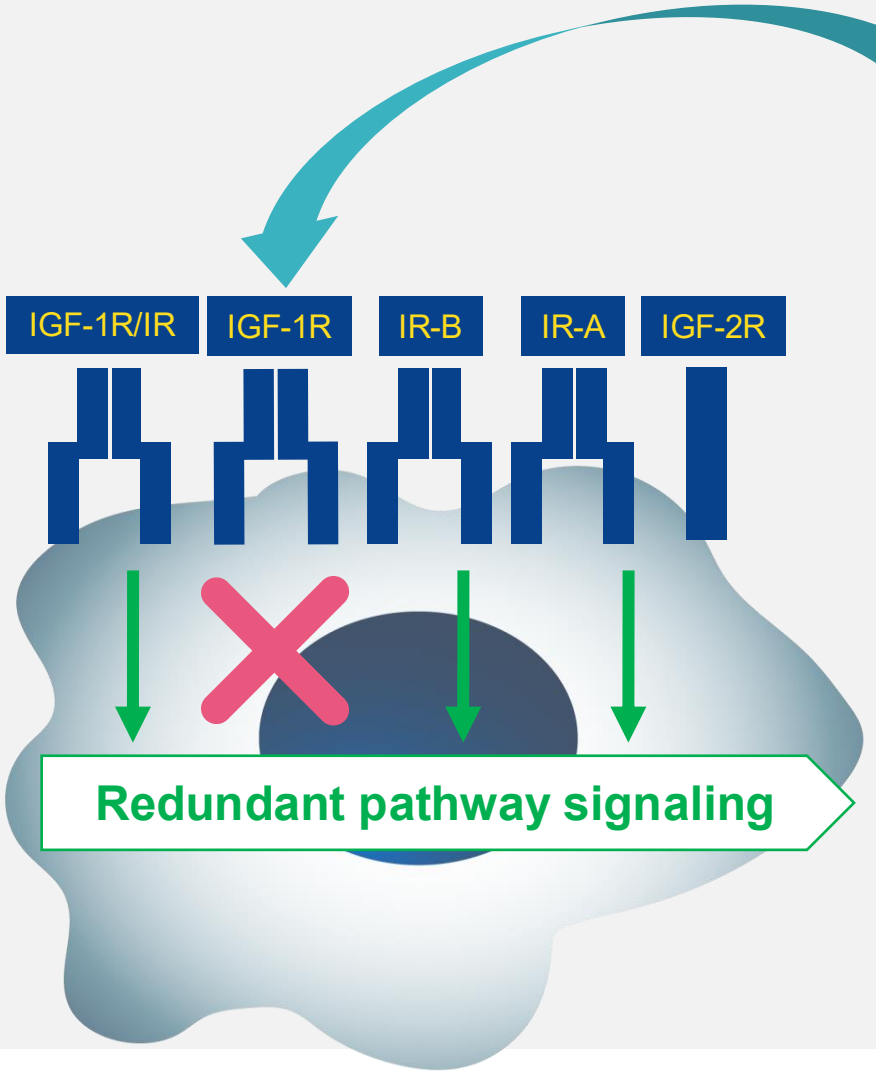
Clinical manifestation



Malignancy

Figure on the IGF signaling pathway adapted from Scotlandi, ASCO 2012

IGF-1R Directed Therapy: Redundant Pathways Limited Past Efforts



Cell escape

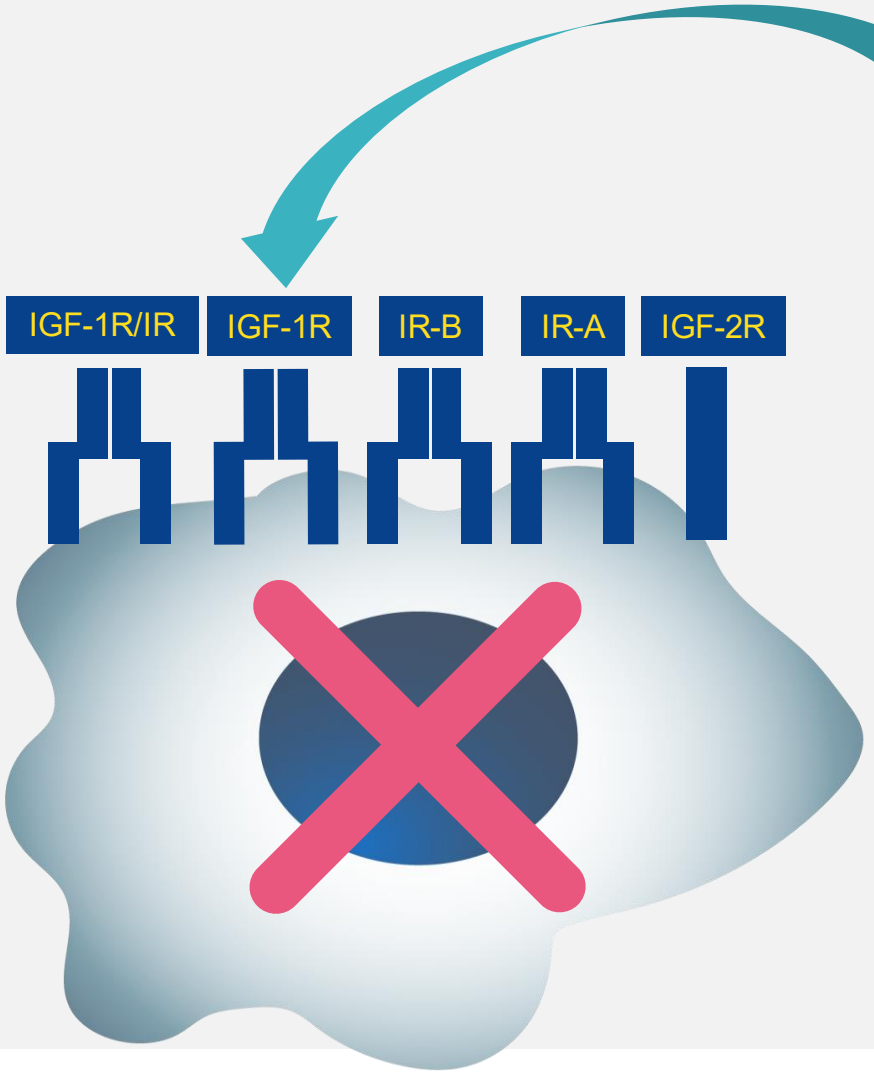
Historical Approach

- IGF-1/IGF-1R pathway is well-established in cancer, and past IGF-1R targeting approaches had evidence of clinical activity, but fell short of approval
- Cancer cells utilize escape mechanisms, including redundant pathways, enabling cells to *work-around* inhibition and continue to act as disease effectors

➢ Leaves room for improvement

Figure on the IGF signaling pathway adapted from Scotlandi, ASCO 2012

IGF-1R Directed Therapy: Lirum's Rational Development Approach



No escape

Lirum Approach

- LX-101 delivers payload directed to IGF-1R+ cells
- Cytotoxicity prevents redundant pathway escape mechanisms
- Development plan targets cancers with well-established ties to the IGF-1 / IGF-1R pathway

➢ **More definitive and focused approach**

Lirum THERAPEUTICS

LX-101: Positive Clinical Experience[1]

Clinically tested

- 19 patients with advanced, pre-treated cancers in Phase 1a trials[2]
- Some IGF-1R expression[3] (IGF-1R$^{low-high}$)

Favorable safety experience

- Well-tolerated
  - Most common adverse events (AE): chills/rigors, hypoglycemia, nausea and vomiting
    - Including, grade 2: peripheral neuropathy (n=1); grade 3 (on an event basis): abdominal pain (n=6), back pain (n=1), bradycardia (n=1), hypoglycemia (n=1), hypertension (n=1), hypotension (n=1), syncope (n=1), lymphopenia (n=1), anemia (n=1); grade 4: hypotension (n=1)
  - Low rate of treatment-related hyperglycemia (a known class side effect of IGF-1R inhibition that is potentially treatment-limiting)
- No DLT or MTD reached → Further dose escalation and schedule optimization

Clinical activity

- 1 PR (at highest dose tested)
- 1 bone marrow CR, 4 stable diseases (including 1 pathologic CR) (at lower doses)

IGF-1R Expression

- All enrolled and evaluated patients (n=17/19) had some degree of IGF-1R expression (IGF-1R$^{low-high}$)[2]
  - 4/17 (24%) were “High IGF-1R Expressers” (IGF-1R^{high})[4]; 3/4 evaluable for disease control
  - 2/3 (67%) achieved disease control, including 1/1 (100%) at highest dose tested

[1] Source: Venepalli et al., Am J Clin Oncol, 2019; Alkhateeb et al., Anticancer Res, 2020; Investigator Brochure, April 25, 2017
[2]This includes two patients who were dose escalated due to disease stability lasting greater than two cycles. Additionally, two patients were treated in a separate trial at the 0.20 uEq/kg dose.
[3]IGF-1R expression ≥ 10% IGF-1R by IHC or ≥ 0.1% by flow cytometry.
[4]We considered “high IGF-1R expressers” (IGF-1R^{high}) as patients whose tumors had both a very high Q score (>=6) and very high PS (>90%).
DLT = dose limiting toxicity; MTD = maximum tolerated dose; PR = partial response; CR = complete response.

Lirum THERAPEUTICS

LX-101: Dose/Benefit Trend; High IGF-1R Expressers Appear Sensitive[1]

Dose (uEq/kg)	n (evaluable)	Disease Control	Dose/Benefit	High IGF-1R Expressers[2] (n=3 evaluable)
2.5	-		Not Dosed Yet	
1.6	-			
0.80	7 (4)	• PR	Dose/Benefit Trend	+
0.40	3 (3)	• SD		
0.20	9 (7)	• BMCR • SD (with pathologic CR) • SD • SD		+
0.1	1 (1)			
0.05	1 (1)			

100% (1/1)
Disease Control Rate at highest dose tested

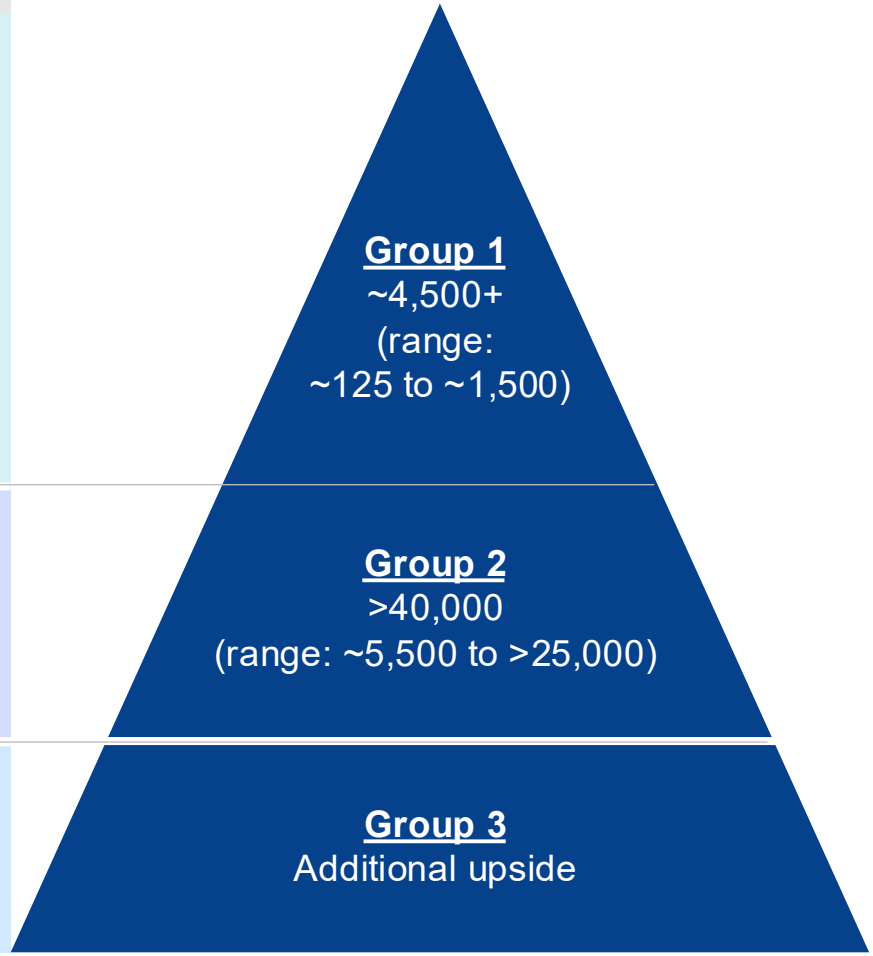
67% (2/3)
Disease Control Rate at all evaluable doses tested

[1] Source: Venepalli et al., Am J Clin Oncol, 2019; Alkhateeb et al., Anticancer Res, 2020; Investigator Brochure, April 25, 2017
[2] IGF-1R expression was assessed on patient tumors via immunohistochemical staining and scored as intensity score (IS, 0 = no stain, 1 = weak stain, 2 = intermediate stain, 3 = strong stain) and proportion score based on % of cells with IGF-1R positivity (PS, 0% - 9% = 0, 10% - 24% = 1, 25% - 49% = 2, 50% - 74% = 3, 75% - 100% = 4) combined to create a Q score (range 0-7). We considered "high IGF-1R expressers" (IGF-1R^{high}) as patients whose tumors had a very high Q score (≥ 6) with IGF-1R expression ≥ 90%.

LX-101: Indications with Strong Genetic and/or Epigenetic Links to IGF-1R

✓Strong Scientific Rationale ✓Potential for expedited regulatory pathways ✓Compelling commercial opportunities

Cancer Type	Epigenetic and Genetic Alterations		US Incidence
Ewing sarcoma	**IGF-1R and poor outcomes**	**EWSR1-FLI1**	
DSRCT	**IGF-1R and upregulation**	**EWSR1-WT1**	
GIST	**High IGF-1R in peds (WT)**	**NBF1-IGF1R**	
Rhabdomyosarcoma	**IGF-1R and short survival**	**PAX3/7-FKHR/FOXO1**	
Synovial Sarcoma	IGF-1R and more aggressive	SYT-SSX1/2	
Neuroblastoma	IGF-1R and poor outcome		
Osteosarcoma	IGF-1R and poor prognosis		
Wilms Tumor	IGF-1R and poor outcome	IGF-1R gene amplification	
Adrenocortical carcinoma	IGF-2 overexpression		
Head & Neck Cancers:			
• **HNSCC HPV(-)**	**IGF-1R and poor outcomes**		
• **Adenoid cystic carcinoma**	**IGF-2 overexpression**	**MYB-NF1B**	
Bladder cancer, invasive	IGF-1R and higher mortality		
Breast cancer, triple negative	IGF-1R and short survival		
Patient subsets in lung, breast, colorectal, prostate, ovarian, gastric, esophageal, etc.	IGF-1R expression and over-expression linked to poor outcomes		



GIST – Gastrointestinal stromal tumor; DSRCT – Desmoplastic small round cell tumor; HNSCC HPV(-) – head and neck cancer not associated with human papillomavirus

Gene Fusion in Ewing Sarcoma Linked to IGF-1R Pathway

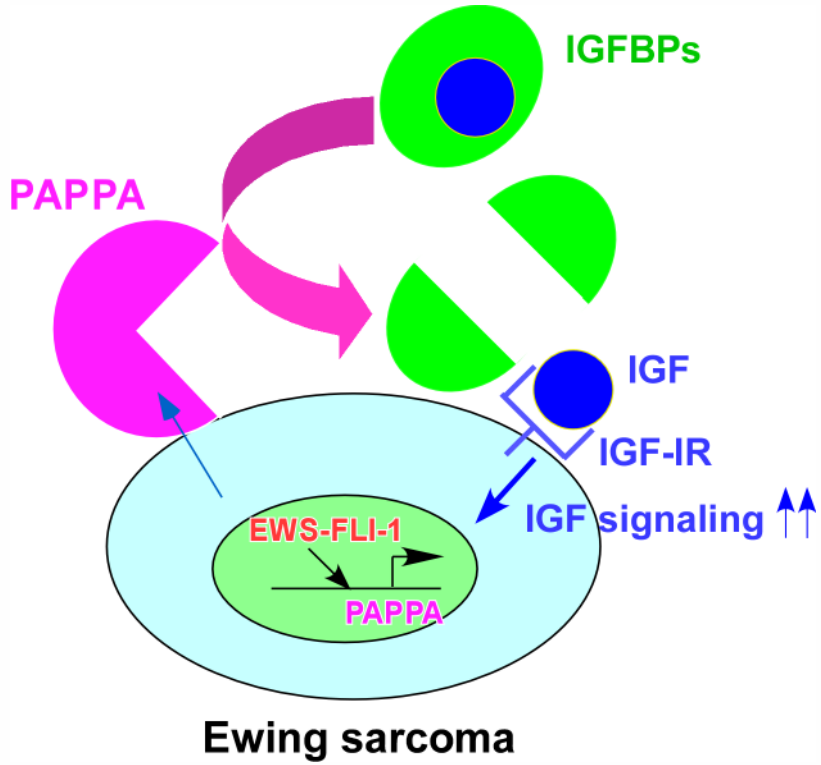


Figure : Model for the stimulation of IGF signaling by pappalysin-1 in Ewing sarcoma. EWS-FLI-1 directly activates the expression of pappalysin-1, which cleaves IGFBPs and increases bioactive IGF levels in the vicinity of cell surface, leading to enhanced IGF signaling and proliferation.

EWS-FLI1 gene fusion

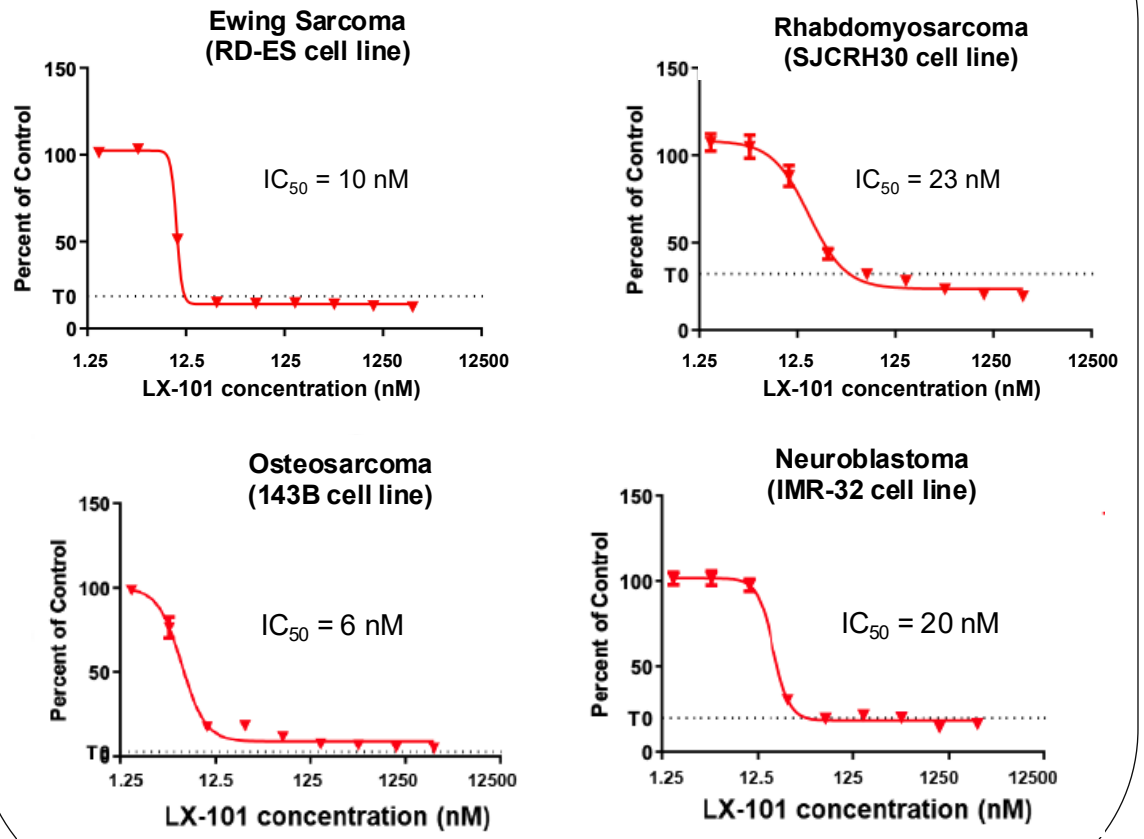
- **Aberrant fusion protein (transcription factor)**
- **Activates pappalysin-1**
- **Increases bioavailability of IGF-1 (by cleaving IGF binding proteins)**
- **Increased IGF-1 / IGF-1R signaling**

- "In the case of Ewing sarcoma, IGF-1R is ubiquitously expressed"*
- In Ewing sarcoma, IGF-1R expression is correlated with tumor proliferation and poor prognosis

*Olmos et al, *Sarc* 2011

LX-101: Broad Activity in IGF-1 / IGF-1R Prominent *Pediatric* Tumor Types[1]

LX-101: Activity in Select Pediatric Cancers

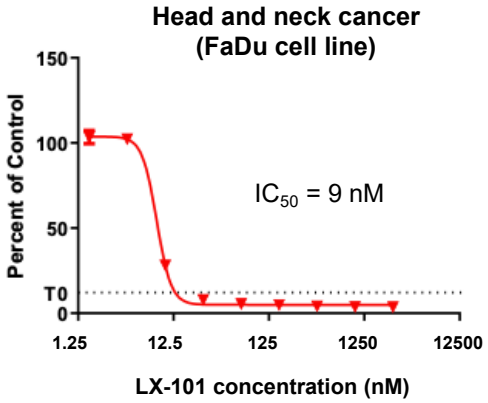


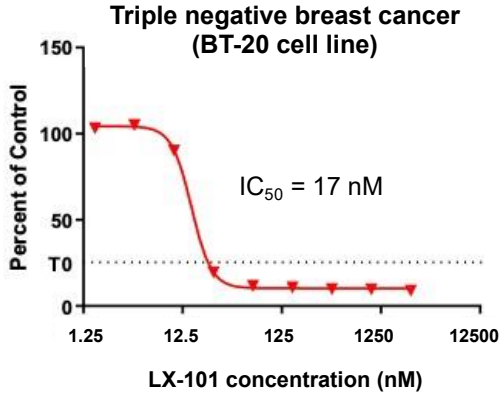
Population	Indication	Cell lines	Absolute IC_{50} (nM IGF)[2]
Reference	Breast	MCF7	35
Pediatric	Ewing sarcoma	RD-ES CADO-ES1 A673 SK-ES-1	10 14 14 29
	Adrenocortical carcinoma	SW-13 NCI-H295R	9 >2500
	Rhabdomyosarcoma	SJCRH30 (alveolar) TE 441.T (embryonal)	23 >2500
	Osteosarcoma	143B HOS U2OS Saos-2	6 7 32 >2500
	Synovial sarcoma	SW-982	>2500
	DSRCT	BOD JN; BER	100 >2500
	Neuroblastoma	SK-N-AS IMR-32 SH-SY5Y	16 20 30

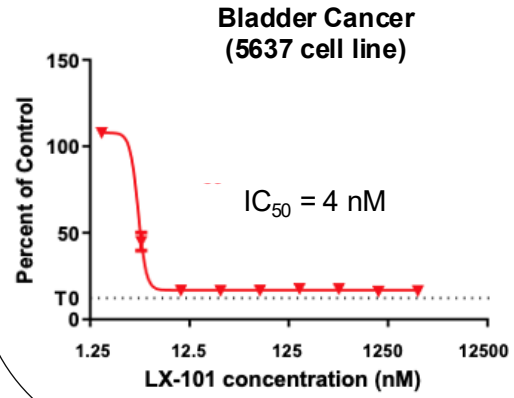
[1] *Source: Presentation ESMO TAT 2025*

LX-101: Broad Activity in IGF-1 / IGF-1R Prominent *Adult* Tumor Types[1]

LX-101: Activity in Select Adult Cancers



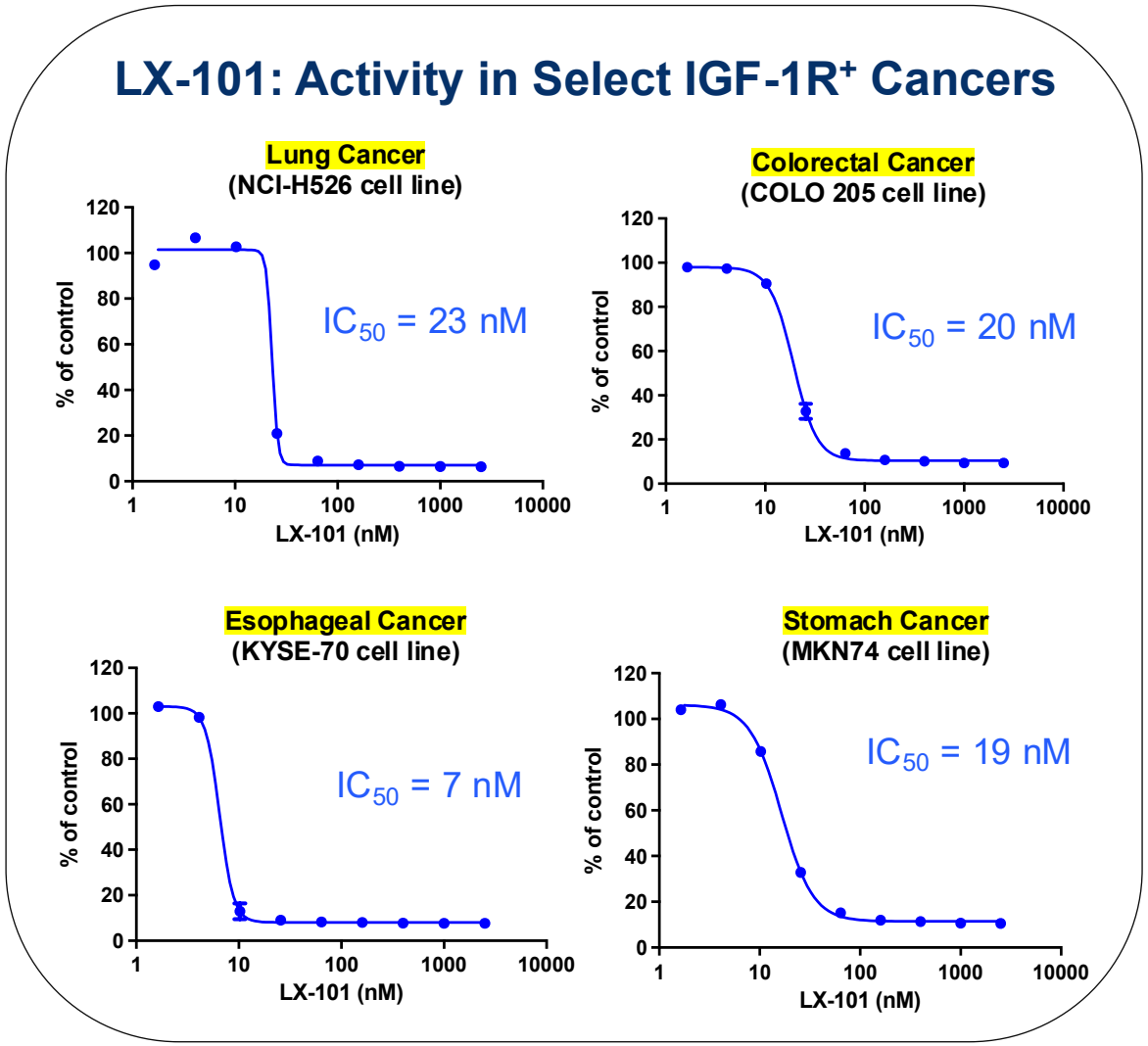




Population	Indication	Cell lines	Absolute IC_{50} (nM IGF)
Reference	Breast	MCF7	35
Adult	Head and neck cancer (HPV-)	FaDu (pharyngeal) SCC25 (tongue)	9 >2500
	Triple negative breast cancer	BT-20 HCC1143	17 >2500
	Bladder cancer	5637 T24	4 61

[1] *Source: Presentation AACR 2024*

LX-101: Activity Across Multiple Additional IGF-1R+ Cancer Types:
Potential For Companion Diagnostic and/or Tumor Agnostic Strategy



Population	Indication	Cell lines	Absolute IC_{50} (nM IGF)
Reference	Breast	MCF7	35
Adult	Lung	A549 NCI-H2122 NCI-H526	29 10 23
	Colorectal	COLO 205 HT-29	20 33
	Prostate	VCaP DU 145	>2,500 9
	Pancreas	Capan-2 PANC-1	>2,500 35
	Liver	Hep G2 HUH-7	9 18
	Esophagus	TE-1 KYSE-70	16 7
	Ovarian	OVCAR8 CAOV3	12 45
	Kidney	786-O Caki-1	5 69
	Stomach	MKN74 NUGC-4	19 30

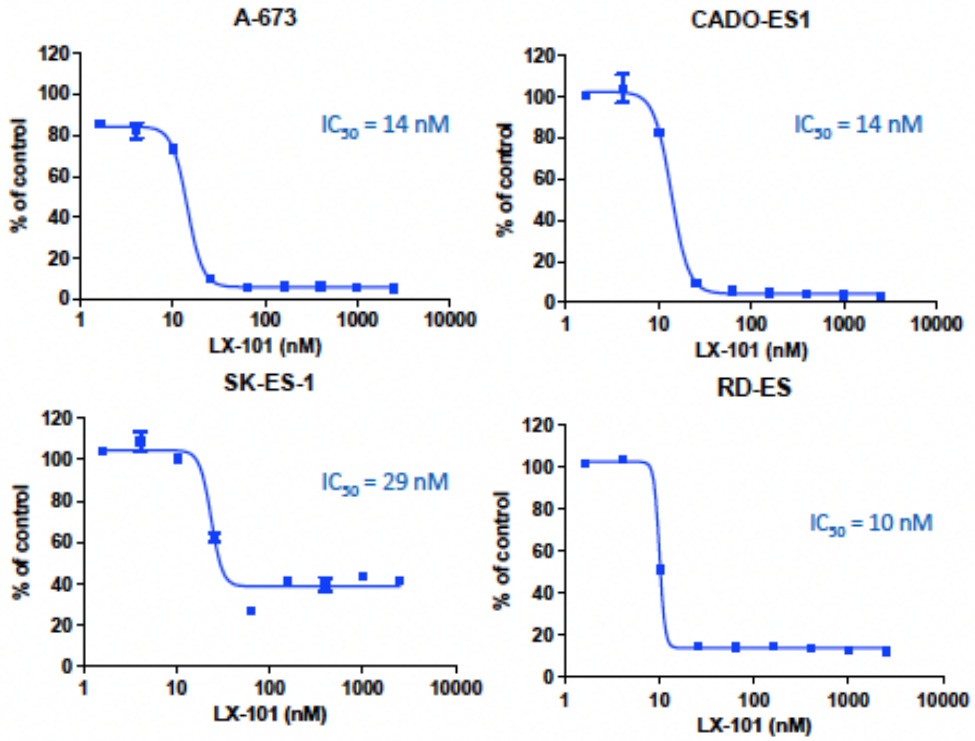
Lirum THERAPEUTICS

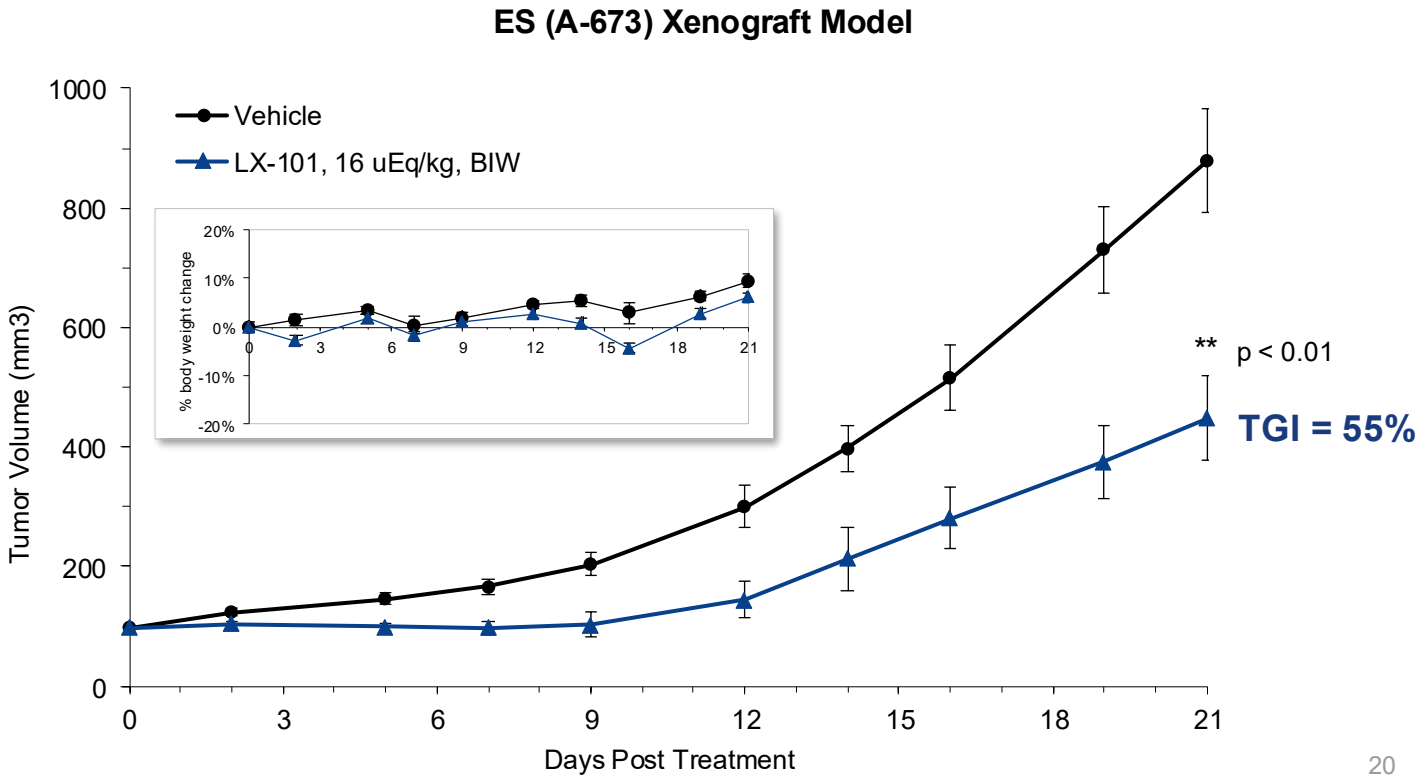
Source: Presentation ESMO TAT 2025

LX-101: Potent Activity in Ewing Sarcoma

LX-101 has potent activity against Ewing Sarcoma in vitro and in vivo

- Low nM IC50s against Ewing sarcoma cell lines, including EWSR1-FL1 and EWSR1-ERG gene fusion-positive cell lines
- Significant in vivo anti-tumor efficacy observed in the A-673 Ewing sarcoma xenograft model
- LX-101 administered IV at 16 uEq/kg (HED of 1.3 uEq/kg) twice a week for 3 weeks was well-tolerated



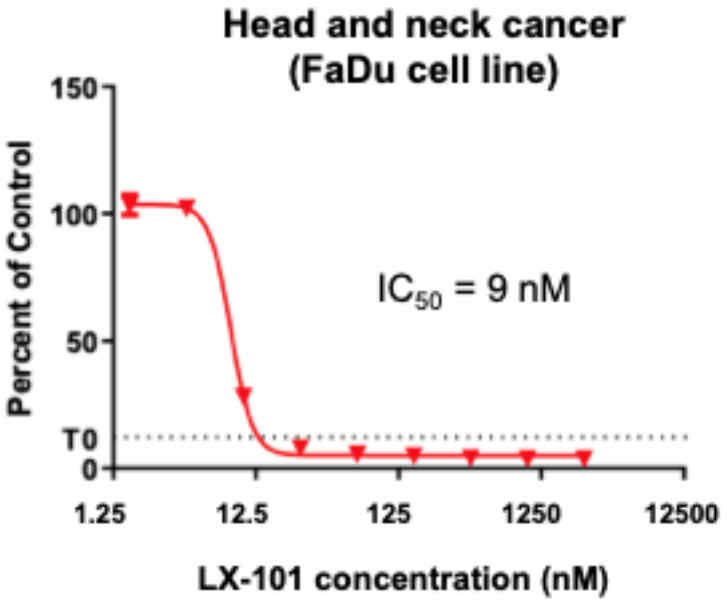


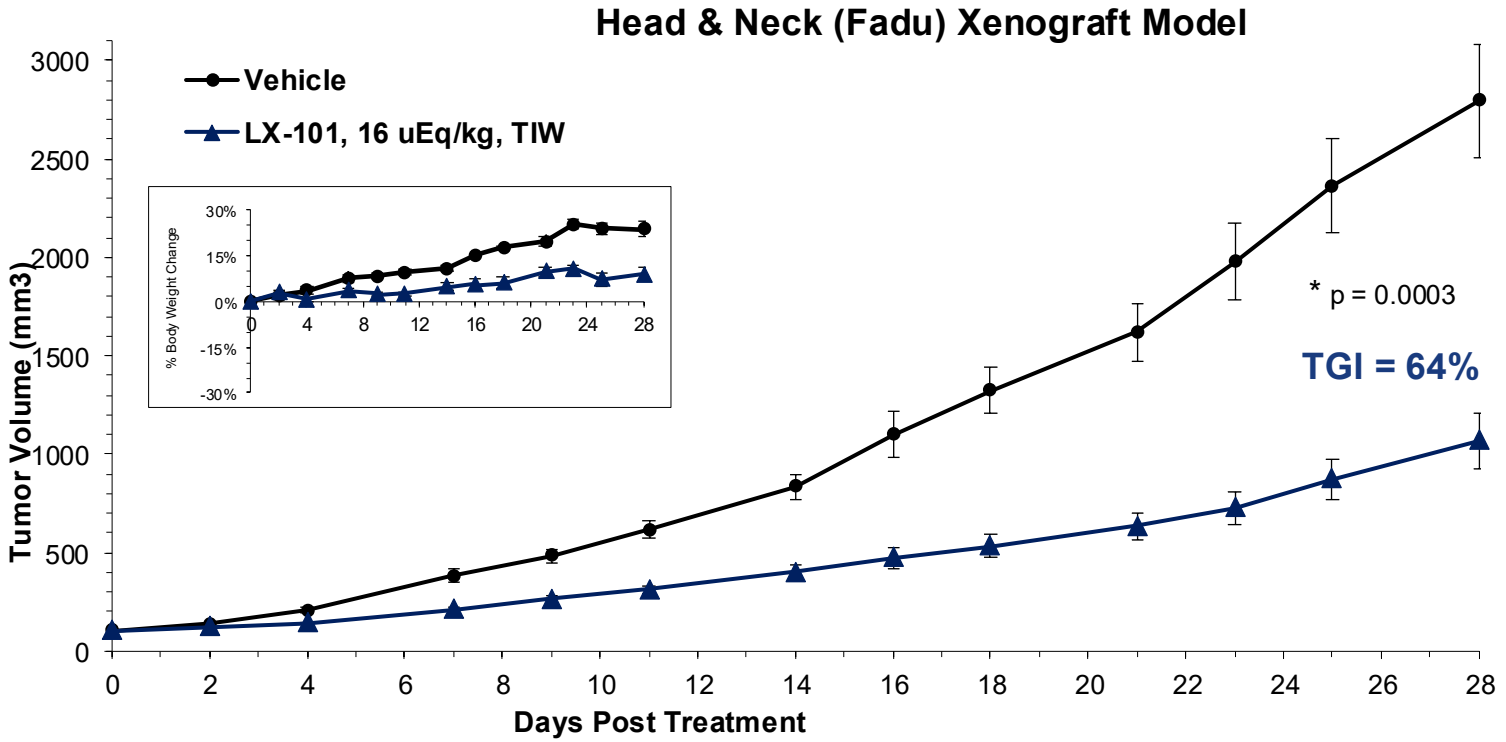
Source: Presentation ESMO TAT 2025; TGI = tumor growth inhibition

LX-101: Potent Activity in HPV-negative HNSCC

LX-101 has potent activity against HNSCC in vitro and in vivo

- Low nM IC50s against HNSCC FaDu, an HPV-negative cell line
- Significant in vivo anti-tumor efficacy observed in the FaDu HNSCC xenograft model
- LX-101 administered IV at 16 uEq/kg (HED of 1.3 uEq/kg) three times a week for 4 weeks was well-tolerated





Source: Lirum data on file; TGI = tumor growth inhibition

IGF-1R Prominent Pediatric Cancers

Attractive Regulatory and Commercial Opportunity with Strong Scientific Rationale

Areas of unmet medical need
Poor outcomes / No approved drugs or effective standard of care in 1L and/or later lines

Ewing Sarcoma (~500 US incidence)

- ~90% of cases arise from *EWS-FLI1* fusion which directly induces IGF-1R signaling and leads to ubiquitous overexpression of IGF-1R

Desmoplastic Small Round Cell Tumor (~125 US incidence)

- Virtually 100% of cases characterized by EWSR1-WT1 fusion which directly interacts with and causes overexpression of IGF-1R

Gastrointestinal Stromal Tumors (~5,000 US incidence)

- 10-15% of patients lack mutations in KIT or PDGFRA genes and are wild-type (WT) tumors
- Wild type tumors - especially pediatric cases - present with large IGF-1R overexpression

Rhabdomyosarcoma (RMS) (~400 US incidence)

- ~30% of cases are Alveolar RMS which carry poor prognosis and have a higher expression of IGF-1R
- ~60% of Alveolar RMS harbor the PAX3-FOXO1 fusion which directly induces overexpression of IGF-1R

Phase 1b (n=10-15)

Basket Trial
(Pediatric/IGF-1R-based tumors)

Multiple near-term value creation opportunities over 12-18 months

Multiple Phase 2 Expansion Options

- ES (n=25-35)
- DSRCT (n=3-5)
- GIST (WT) (n=10-15 adults & peds)
- RMS (n=3-6)
- Additional types (n=5-20)

Expedited Approval Opportunities

Head and Neck Cancers

Attractive Regulatory and Commercial Opportunity with Strong Scientific Rationale

Head & Neck Cancers

H&N squamous cell carcinoma (HNSCC)

- Large market (~66,000 US incidence)
- High unmet met need, especially in R/M setting

Rationale and Development Strategy

- HPV(-) subset of HNSCC is our initial area of focus
  - ✓ **Represents a naturally IGF-1R-enriched population**
  - ✓ Poor prognosis subset & does worse with checkpoint inhibitors versus HPV(+)
  - ✓ Meaningful initial commercial opportunity (~6,000 US incidence) with potential for expedited regulatory path
  - ✓ Plan to broaden within H&N and beyond

Adenoid Cystic Carcinoma (AdCC)

- Niche market (~1,200 US incidence), high unmet need
- Upon relapse after surgery, outcomes are very poor and treatment options limited
- No approved therapies or standard of care; ORR <20%

Rationale and Development Strategy

- ✓ 50-75% harbor the ***MYB-NFIB*** **gene fusion which directly affects IGF-1R pathway**
- ✓ ~50% of cases become R/M: 600 addressable US patients per year provide attractive regulatory opportunity for possible first (of many) approval(s)
- ✓ Opportunity for near-term value creation and expedited approval

Phase 1b (n=10-15)

- Cohort 1: HNSCC HPV(-)
- Cohort 2: AdCC

Phase 2 Expansion

- HNSCC HPV(-) (n=30-50)
- AdCC (n=8-12)

Expedited Approval Opportunities

Multiple near-term value creation opportunities over 12-18 months

LX-101: Highlights in Oncology

Summary/Key Points

- ✓ Next generation IGF-1R-targeted therapy
- ✓ Leverage positive clinical experience and exciting new data in IGF-1R+ cancers
- ✓ Focused development strategy targets indications with attractive regulatory paths and commercial opportunities

Key Value-Creating Milestones in Oncology (12-18 month timeframe)

Initiate Phase 1b/2 trials in IGF-1R prominent pediatric and adult H&N cancers → **Generate value-creating clinical data early in the development process** → **Focus on expedited regulatory paths**

Lirum THERAPEUTICS

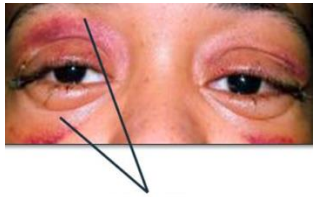
LX-101

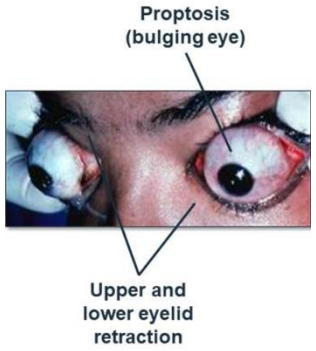
Thyroid Eye Disease

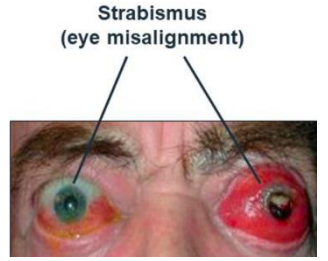
Thyroid Eye Disease (TED): Overview

The Condition

- TED is an autoimmune disease characterized by progressive inflammation and damage to tissues around the eyes
- Acute/active (1-3 years) and chronic (>3 years) phases
- Symptoms range from mild to severe (including possible vision loss), and repeated exacerbations can occur







The Opportunity

Incidence / Prevalence

- Acute phase: ~20-25K/year U.S. incidence
- Chronic phase: >70K/year U.S. prevalence

Large Market

- Tepezza®, FDA approved naked mAb to IGF-1R
- ~$2B in sales in '22 (3rd year on market)
- Over $3.5B estimated global market

Novel Approach

- Numerous opportunities for a novel, differentiated approach to penetrate this expanding and segmented market

Lirum THERAPEUTICS

Mohyi et al., J Mol Endocrinol, 2018; Verity et al., Eye (Lond), 2013; McAlinden Eye Vis (Lond), 2014; Horizon Therapeutics earnings releases and company reports

TED Market: Large Opportunity with Multiple Openings for New Entrants

Large and Rewarded Market

- Tepezza sales ~$1.9B (2025)
- Amgen acquired Horizon Therapeutics for $27.8B

Still Plenty of Room for Additional Drugs

- Despite Tepezza's success, multiple agents are currently enrolling patients in clinical trials
  - Testament to the high demand for more treatment options

Limitations of Current Therapy and Increasingly Segmented Market

- Refractoriness to initial therapy (~23%)
- Lack of Durability
  - 50-75% recurrence of proptosis, with one study reporting 50% worsening of proptosis over time
  - 47% reactivation of TED after 2yrs
- Adverse events
  - 10% ototoxicity
  - 46% auditory complaints and 25% with documented hearing loss and no improvement after 3 months of ceasing therapy
- Chronic disease
  - Largest segment, and payload-approach is rational in setting of possible lower signaling

LX-101 is unique among all other agents in this dynamic space as it is both:

1) **Directed to the only commercially validated target, and**
2) **Harbors a novel MOA with potential efficacy and safety advantages**

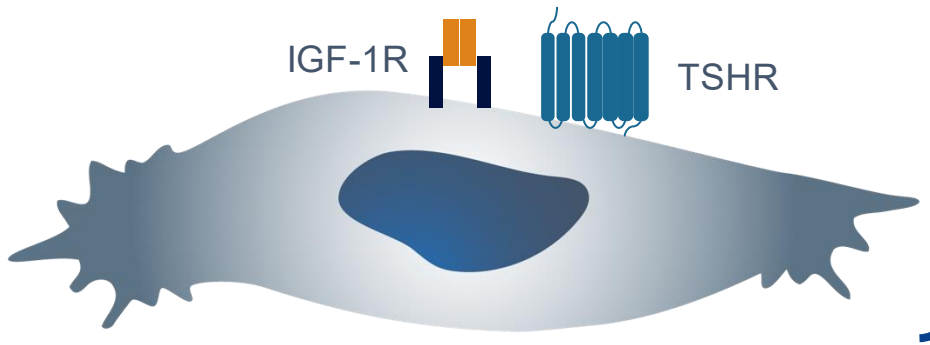
➢ **LX-101 is a prime new candidate in this large, growing, and increasingly segmented market that has expressed a clear demand for additional agents**

Lirum THERAPEUTICS

Douglas R et al, *NEJM* 2020; Rosenblatt et al, *Opthal Plast Recons Surg* 2024; Hwang et al, *Am J Ophthalmol* 2024; Kay-Rivest et al, *Otolaryngol – Head and Neck Surg* 2023; Kossler et al, *J Endocr Soc* 2021

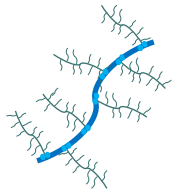
TED Pathogenesis[1]

Autoimmune process → **Overproduction of molecular and cellular factors** → **Extraocular muscle enlargement and orbital expansion**



Orbital fibroblast

Hyaluronan synthesis



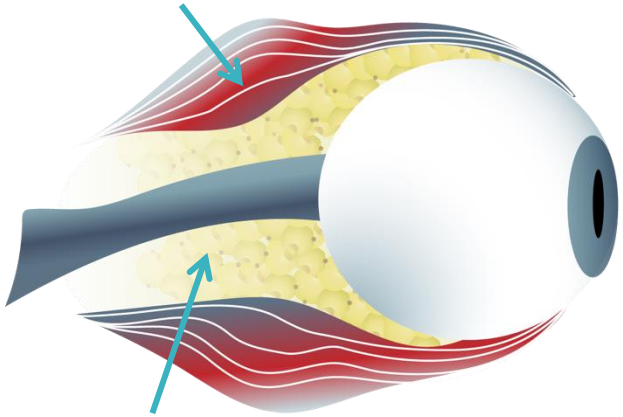
Differentiation (adipocytes, myofibroblasts)

Inflammatory cytokines

IL-6
IL-8
Eotax,
others

Inflammatory cytokines drive TED pathology and tissue remodeling

Enlarged Muscle



Expanded Orbital Tissue and Fat

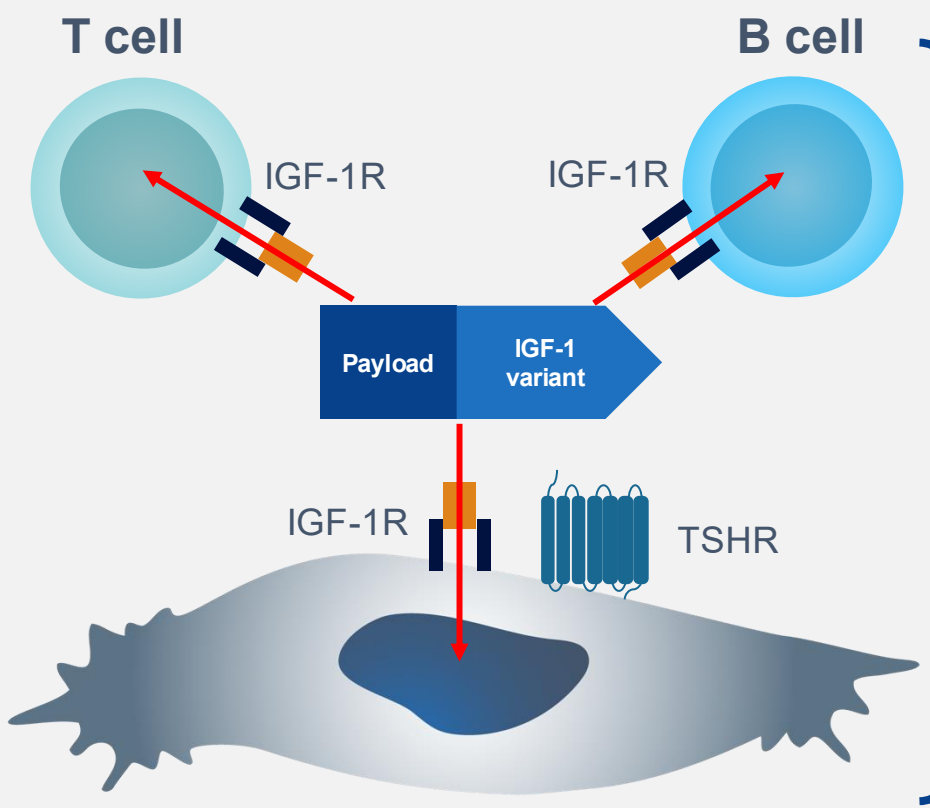
Proptosis, increased orbital pressure, congestion, periorbital edema, and other, sometimes sight-threatening, symptoms

TSHR = thyroid-stimulating hormone receptor

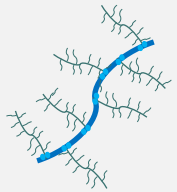
[1]Figures adapted from Ugradar et al., Eye (Lond), 2021; Iyer et al., Best Pract Res Clin Endocrinol Metab, 2012, Krieger et al., Pharmacol Ther, 2020

TED Pathogenesis[1]

Autoimmune process → **Overproduction of molecular and cellular factors** → **Extraocular muscle enlargement and orbital expansion**



Hyaluronan synthesis



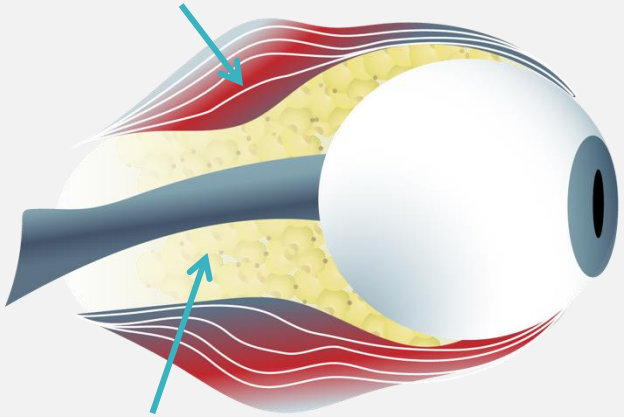
Differentiation (adipocytes, myofibroblasts)

Inflammatory cytokines

IL-6
IL-8
Eotax, others

LX-101 inhibits key pathogenic processes

Enlarged Muscle



Expanded Orbital Tissue and Fat

Proptosis, increased orbital pressure, congestion, periorbital edema, and other, sometimes sight-threatening, symptoms

TSHR = thyroid-stimulating hormone receptor

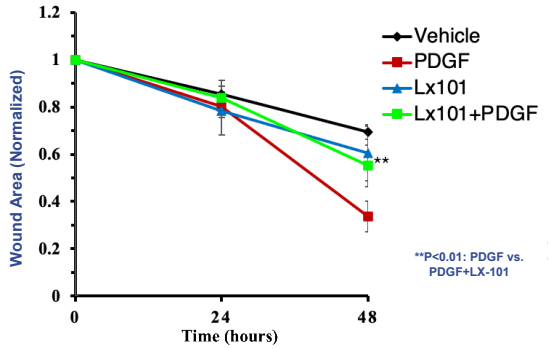
[1]Figures adapted from Ugradar et al., Eye (Lond), 2021; Iyer et al., Best Pract Res Clin Endocrinol Metab, 2012, Krieger et al., Pharmacol Ther, 2020

LX-101: Potent Inhibition of Key Pathogenic Processes in TED

Findings demonstrate LX-101 can:

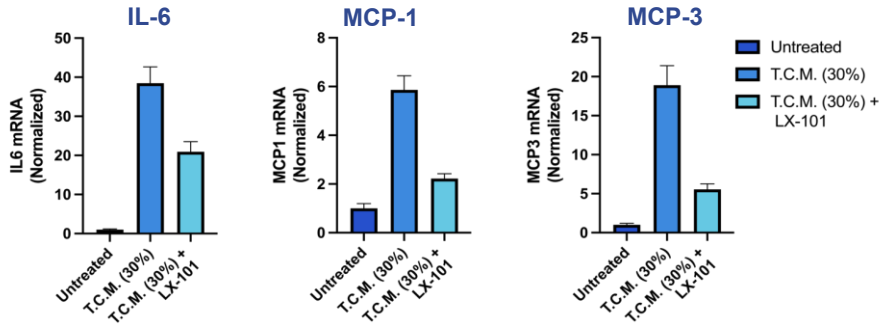
- Inhibit migration capacity of orbital fibroblasts, a marker of orbital tissue expansion and fibrosis,
- Decrease production of key inflammatory cytokines (IL-6, MCP-1, MCP-3),
- Reduce production of pro-fibrotic extracellular matrix (ECM) components (Periostin, LOX), and
- Modulate activity of TED T lymphocytes.

Inhibits Migration of TED OFs



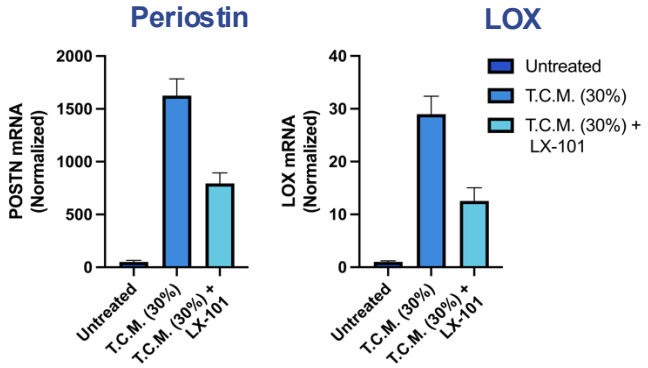
Inhibits OF migration capacity, a marker of orbital tissue expansion / fibrosis

Decreases Production of Key Inflammatory Cytokines



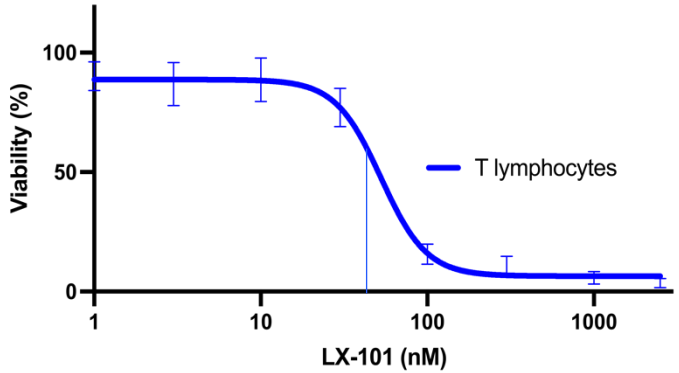
Decreases production of IL-6 and other key pro-inflammatory cytokines, by orbital fibroblasts

Reduces Production Pro-Fibrotic ECM Components



Mitigates production of pro-fibrotic extracellular matrix components by TED OFs

Modulates Activity of IGF-1R+ T Cells



Modulates IGF-1R+ T cell activity (IC50 ~52 nM)

Source: Presentation at 51st Annual NANOS Conference

LX-101: Highlights in TED

Summary/Key Points

- **Novel approach to commercially validated target**
- **Supported by exciting new data**
- **Potential for highly competitive efficacy and safety profile**
- **Attractive market opportunity**
  - >$3.5B globally
  - ➢ Increasingly segmented patient populations with multiple entry opportunities for LX-101

Key Value-Creating Milestones for TED

Phase 1 (n=20-30)

Patients not benefiting from available therapies and chronic patients

Phase 2 Expansion Arms

- Refractory
- Tolerability issues
- Suboptimal durability
- Chronic disease
- Other

Focus on expedited regulatory paths

Multiple near-term value creation opportunities over 12-18 months

Key Take Aways

Lead by a veteran team with strong track record of success

- ✓ History of shareholder value creation
- ✓ Multiple approvals and commercial launches
- ✓ M&A Exit

Innovative technology with differentiated MOA

- ✓ Positive clinical experience
- ✓ Differentiated profile compared to other IGF-1R targeted approaches
- ✓ Tremendous commercial opportunity in oncology and autoimmune diseases

Next Steps

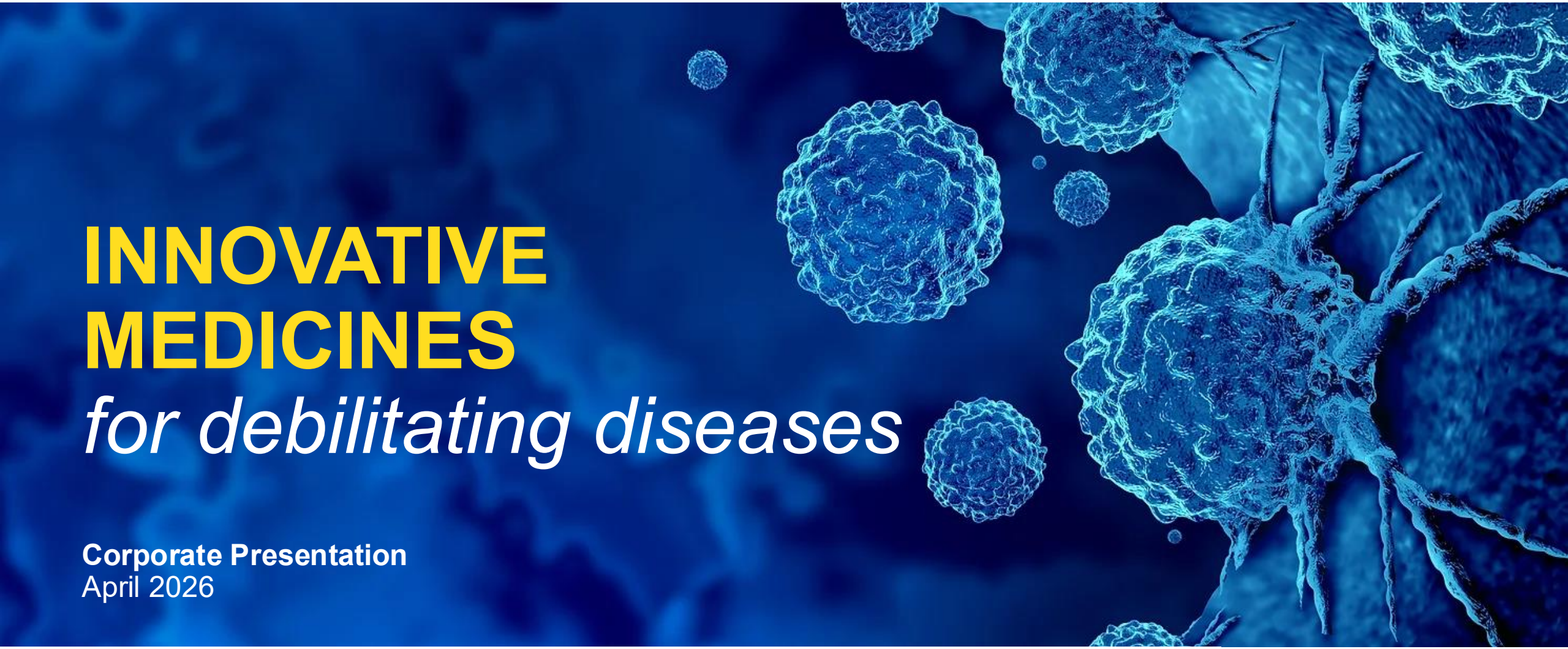
- ➢ Advance LX-101 into IGF-1R-driven cancers and TED
- ➢ Continue to opportunistically expand pipeline

Multiple Near Term Key Value-Creating Milestones

Initiate clinical trials focused on cancer types and TED segments of high interest → **Opportunity for near-term value-creating data in oncology and TED** → **Focus on expedited regulatory pathways in oncology and TED**

Lirum THERAPEUTICS

Lirum THERAPEUTICS



INNOVATIVE MEDICINES

for debilitating diseases

Corporate Presentation
April 2026