

Corporate Update



Jefferies 2018 Healthcare Conference London, November 14, 2018 Sean McCarthy, *D. Phil.* President and Chief Executive Officer

# Forward Looking Statements

#### **Special Note Regarding Forward-Looking Statements**

This presentation may contain projections and other forward-looking statements regarding future events. All statements other than statements of historical facts contained in this presentation, including statements regarding our future financial condition, technology platform, development strategy, prospective products, preclinical and clinical pipeline and milestones, regulatory objectives, expected payments from and outcomes of collaborations, and likelihood of success, are forward-looking statements. Such statements are predictions only and 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. These risks and uncertainties include, among others, the costs, timing and results of preclinical studies and clinical trials and other development activities; the uncertainties inherent in the initiation and enrollment of clinical trials; expectations of expanding on-going clinical trials; availability and timing of data from clinical trials; the unpredictability of the duration and results of regulatory review; market acceptance for approved products and innovative therapeutic treatments; competition; the potential not to receive partnership milestone, profit sharing or royalty payments; the possible impairment of, inability to obtain and costs of obtaining intellectual property rights; and possible safety or efficacy concerns, general business, financial and accounting risks and litigation. Because forward-looking statements are inherently subject to risks and uncertainties, 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. More information concerning us and such risks and uncertainties is available on our website and in our press releases and in our public filings with the U.S. Securities and Exchange Commission. We are providing this information as of its date and do not undertake any obligation to update or revise it, whether as a result of new information, future events or circumstances or otherwise. Additional information may be available in press releases or other public announcements and public filings made after the date of this presentation.

This presentation concerns products that have not yet been approved for marketing by the U.S. Food and Drug Administration (FDA). No representation is made as to their safety or effectiveness for the purposes for which they are being investigated.



# Reinventing Therapeutic Antibodies

- Antibodies are a very successful therapeutic class in many disease areas
  - 2017: Half of the top 10 selling drugs were mAbs
- Major opportunity to target antibodies to disease tissue
  - Enable new targets/mechanisms
  - Reduce toxicities
  - Maximize efficacy
- CytomX is targeting cancer tissue using Probody™ Therapeutics
  - A versatile platform
  - Leverages intrinsic protease activity in tumors

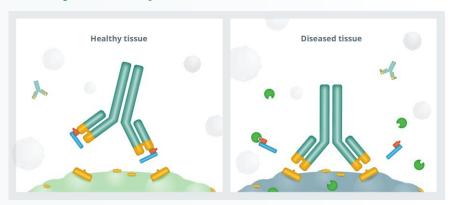
### **Proteases: Active in Tumor Tissue**

Imaging of Active Protease<sup>1</sup>



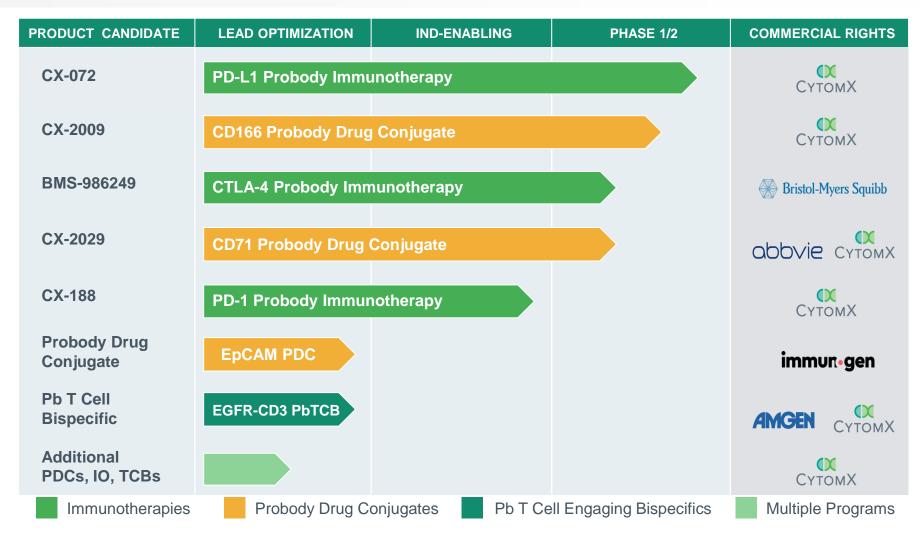
1. Matriptase: LeBeau, et al., PNAS 2012

### **Probody™ Therapeutics: Activated in Tumor Tissue**





# Deep and Differentiated Probody Pipeline



\$464.6M in cash at end of Q3 2018

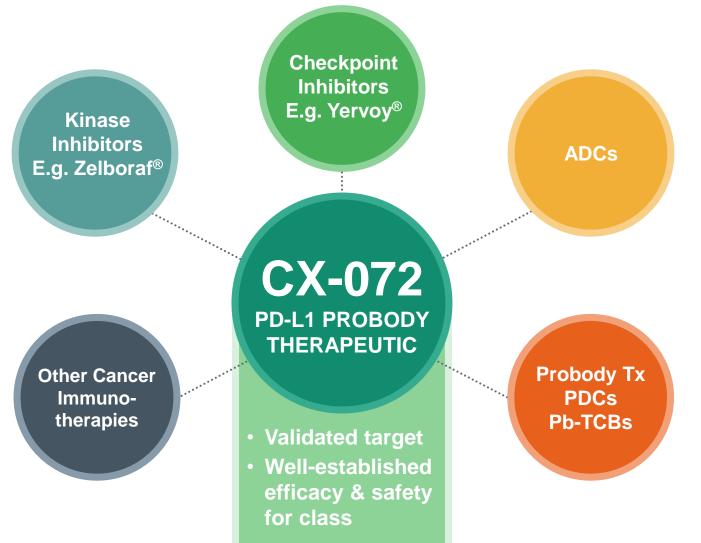




CX-072 Anti-PD-L1 Probody Therapeutic



# CX-072 as a Potentially Differentiated Centerpiece of Combination Cancer Therapy





# Full Potential for Combination Immunotherapy is Limited by Immune-Related Toxicities

# **Historical Data Shows Combination Toxicities**

#### Nivo + Ipi toxicity

	The second second		
	Nivolumab Mono	lpilimumab Mono	Nivo + Ipi Combo <sup>1</sup>
	melanoma	melanoma	melanoma
	3mg/kg every 2 weeks	3mg/kg every 3 weeks	nivo 1mg/kg + ipi 3mg/kg every 3 weeks
ORR	44%	19%	58%
Treatment related Grade 3/4 AEs	16%	27%	55%
Discontinued Drug	8%	15%	36%

<sup>1.</sup> Larkin et al., NEJM, July 2015.

# Results from MSKCC Expanded Access Program<sup>2</sup>

- 64 patients with advanced or unresectable melanoma
- Nivolumab + Ipilimumab
- 38 (59%) Grade 3/4 irAE
- 46 (72%) required steroids
- 91% irAE leading to emergency department visits, hospitalizations and systemic immunosuppression



<sup>2.</sup> Shoushtari AN, et al.JAMA Oncol. 2018; 4(1):98-101. doi:101001/jamaoncol.2017.2391

# PROCLAIM-CX-072 Clinical Trial Design

#### **EXPLORATORY**

#### **EXPANSION**

#### **A1: DOSE ESCALATION**

**Initiation:** January 2017

Inclusion: PD naïve, unselected cancer types

**Data Presentation: ESMO 2018** 

#### **A2: MANDATORY BIOPSY**

Initiation: Q2 2018

**Inclusion:** Selected for PD-L1 positivity

Data Presentations: ESMO 2018, SITC 2018

#### D: 8 UNDISCLOSED TUMOR TYPES

Initiation: Q2 2018

#### **B: IPILIMUMAB COMBO**

Initiation: Q3 2017

**Inclusion:** Unselected cancer types **Data Presentation:** ESMO 2018

#### **SELECTED CANCER TYPES**

Initiation: 2019

#### **C: VEMURAFENIB COMBO**

Initiation: Q3 2017

Inclusion: V600E BRAF mutated melanoma, PD-naïve

**Data Presentation: 2019** 

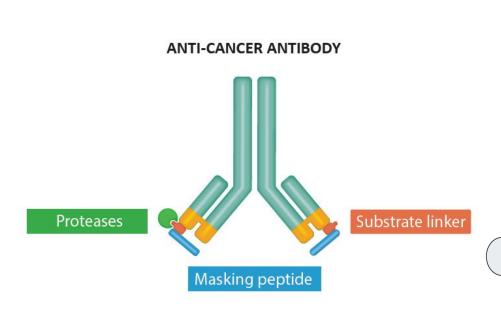


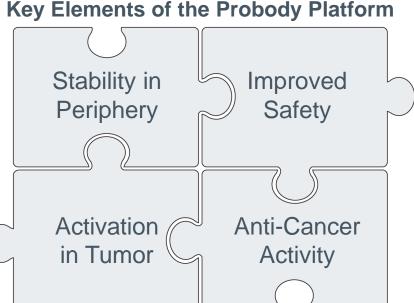






# CX-072 Data Presented in 2018 Provides First Integrated Picture of Clinical Performance of the Probody Platform





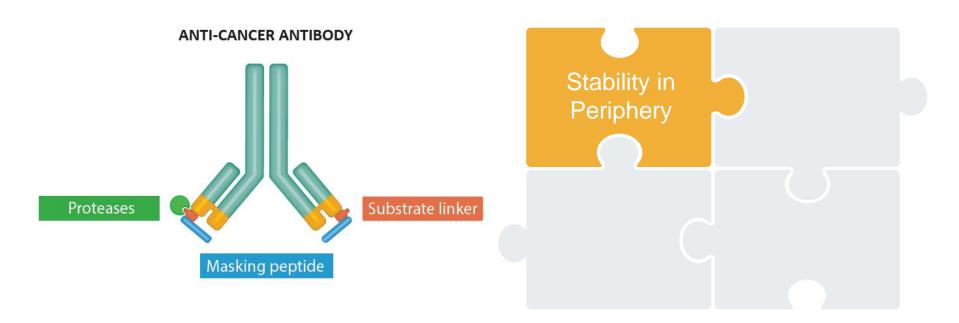






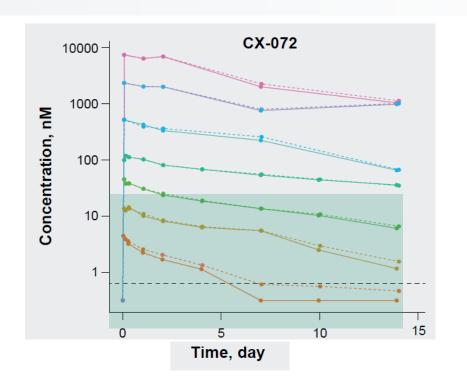


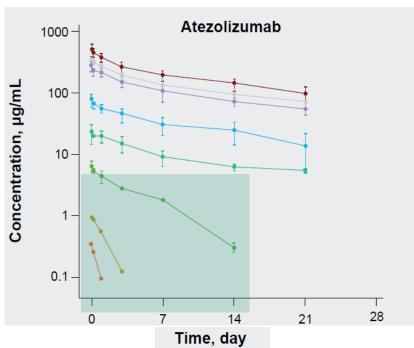
# Key Elements of Probody Platform



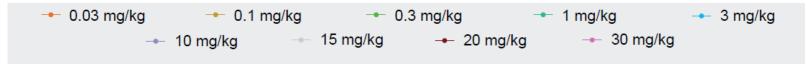


# PROCLAIM-CX-072 Dose Escalation: Minimal Peripheral Target Engagement for CX-072





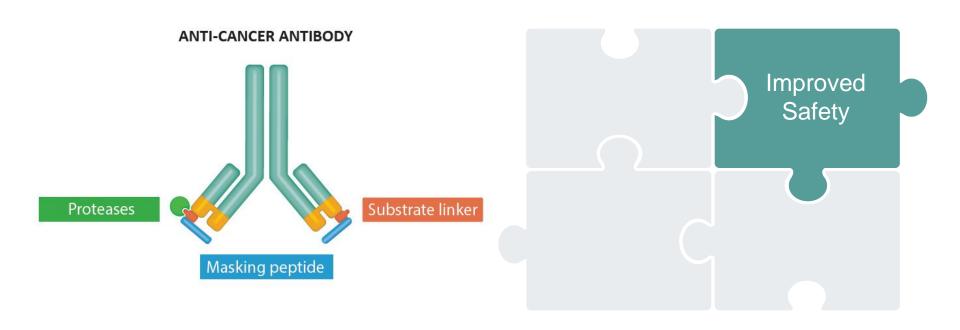
Published with permission Stroh et al. 2016. Clin Pharm Therap.



- Single-dose CX-072 PK data suggests that CX-072 circulates predominantly as the intact prodrug species
- Clearance is minimally influenced by target mediated drug disposition



# Key Elements of Probody Platform





# PROCLAIM-CX-072 Part A/A2 Dose Escalation: Safety

### **Monotherapy**

- MTD not reached in escalation through 30 mg/kg cohort
- · Probody therapeutic well tolerated
  - 5/46 (11%) patients experiencing a Grade 3/4 TRAE
  - 3/46 (7%) patients experienced a Grade 3/4 irAE

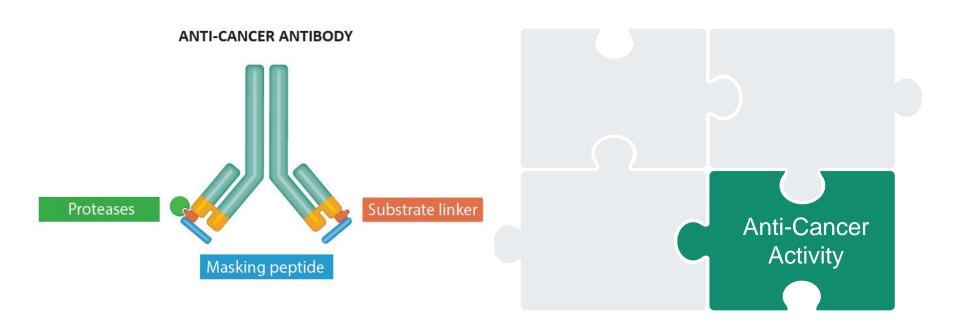
# **Ipilimumab Combination**

- Ipilimumab (3 mg/kg) combination: favorable safety profile
  - 20% Grade 3/4 rate trending below the level reported for other PD-1 pathway inhibitors in combination with ipilimumab<sup>1</sup>
  - 15% overall irAE rate
  - No new safety signals beyond those expected for other anti-PD-1 pathway inhibitors or ipilimumab



<sup>1.</sup> Larkin et al., NEJM, July 2015.

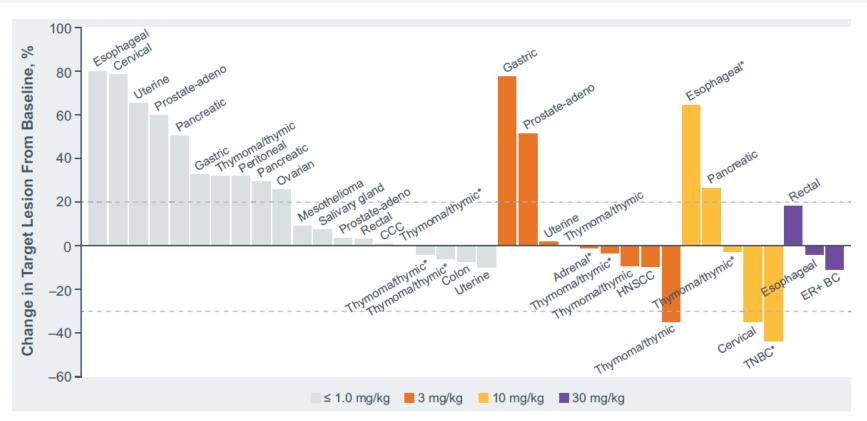
# Key Elements of Probody Platform





# PROCLAIM-CX-072 Monotherapy Dose Escalation: Best Tumor Shrinkage

### Comprised of Part A1 Follow-Up Patients and Part A2 New Patients at Lower Doses



Among patients with measurable target lesions at baseline (n = 37), target lesions decreased from baseline in 14 (38%) patients and at dose levels  $\geq$ 3 mg/kg in 10/17 (59%) patients per RECIST v1.1.

CCC, cholangiocellular carcinoma; ER+ BC, breast (ER+) carcinoma; HNSCC, head and neck squamous cell carcinoma; RECIST, Response Evaluation Criteria in Solid Tumors; TNBC, triple-negative breast cancer.

<sup>&</sup>lt;sup>a</sup> As evaluated per RECIST v1.1. Plots include evaluable patients with measurable disease at baseline.



<sup>\*</sup> Patient is still receiving treatment.

# **Patient Profile**

# **Treatment History**

# Initial CX-072 Case Study:

# Confirmed Partial Response in Triple Negative Breast Cancer Patient

39 years old, Microsatellite Stable. TMB low, PD-L1 negative

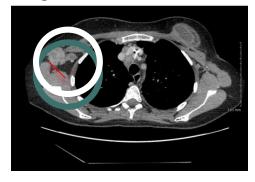
- Three prior lines of therapy
- Post mastectomy and left reconstruction with radiotherapy

Received CX-072 10 mg/kg

- **Confirmed Partial** Response
- Continues to receive CX-072 10mg/kg as of data cutoff; on treatment for 48 weeks

### **Reduction of Tumor Burden**

August 14, 2017 Baseline Scan







### **Reduction of Skin Lesion** Oct 9, 2017

Aug 30, 2017 Baseline



Sept 25, 2017 After 2 doses















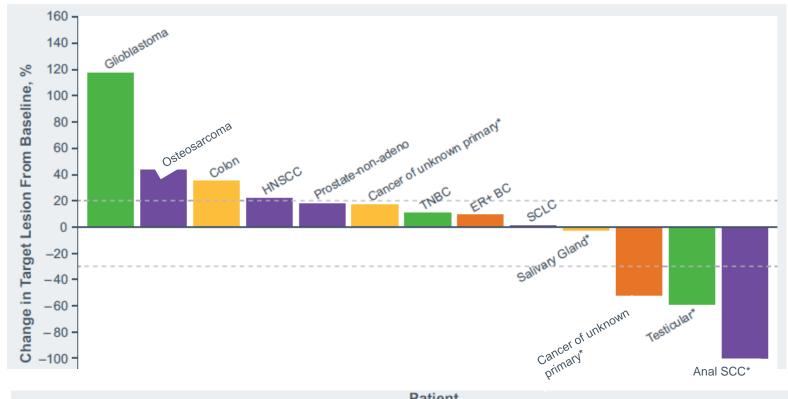
Jan 2, 2018 After 9 doses







# PROCLAIM-CX-072 Ipilimumab Combination: Best Tumor Shrinkage





ER+ BC, breast (ER+) carcinoma; HNSCC, head and neck squamous cell carcinoma; SCC, squamous cell carcinoma; SCLC, small cell lung cancer; TNBC, triple-negative breast cancer; RECIST, Response Evaluation Criteria in Solid Tumors

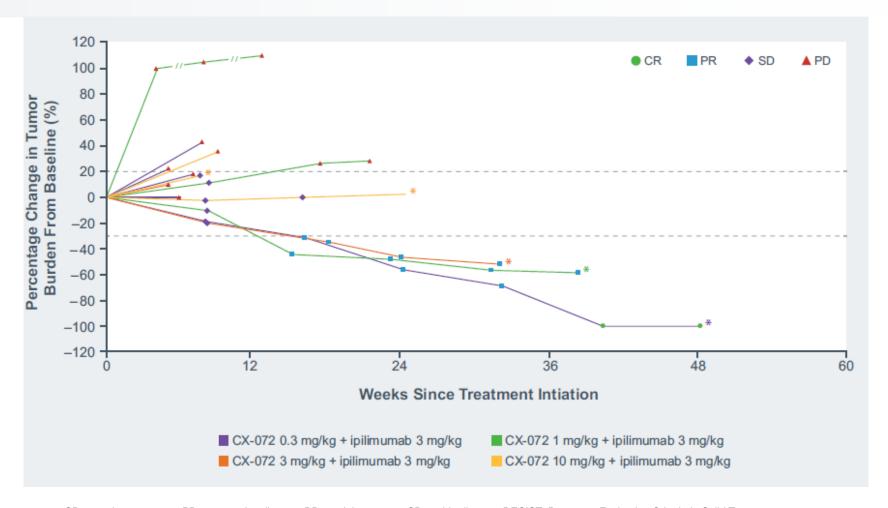
\* Patient is still receiving treatment.

One patient (glioblastoma) had increases up to 392.6%, which have been omitted from this plot (with annotated values) in order to maintain readability. One evaluable patient had PD, as evidenced by a new lesion, and did not have a postbaseline target lesion assessment.

As evaluated per RECIST v1.1. Plots include evaluable patients with measurable disease at baseline.6



# PROCLAIM-CX-072 Ipilimumab Combination: Duration of Treatment per Patient



CR, complete response; PD, progressive disease; PR, partial response; SD, stable disease; RECIST, Response Evaluation Criteria in Solid Tumors \* Patient is still receiving treatment.

One patient (glioblastoma) had increases up to 392.6%, which have been omitted from this plot (with annotated values) in order to maintain readability. One evaluable patient had PD, as evidenced by a new lesion, and did not have a postbaseline target lesion assessment.

As evaluated per RECIST v1.1. Plots include evaluable patients with measurable disease at baseline.



# PROCLAIM-CX-072 Part A/A2 Dose Escalation: Anti-Tumor Activity

### **Monotherapy**

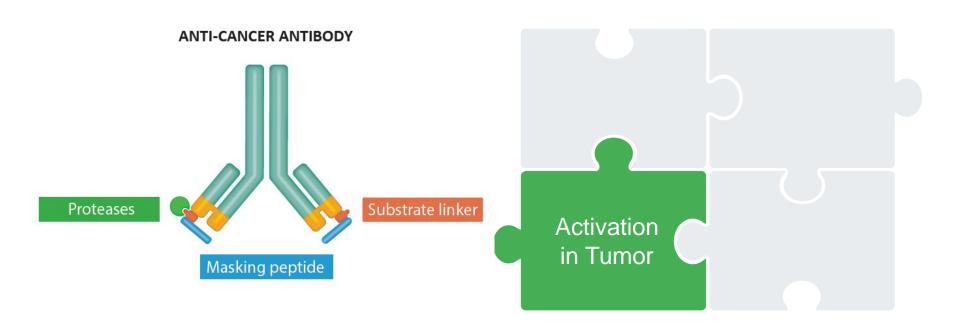
- Demonstration of antitumor activity across a range of tumor types
  - 3 objective responses in 18 evaluable patients (17%) treated at ≥3 mg/kg including those with negative PD-L1 expression
  - Includes 1 confirmed PR in a TNBC patient
- Objective responses in heavily pre-treated patients with a variety of generally non-immunogenic tumors

### Ipilimumab Combination

- 21% (3/14) confirmed objective responses, including 1 confirmed complete response (cCR)
  - cCR: Anal carcinoma
  - confirmed PR (cPR): Testicular cancer
  - cPR: Cancer of unknown primary

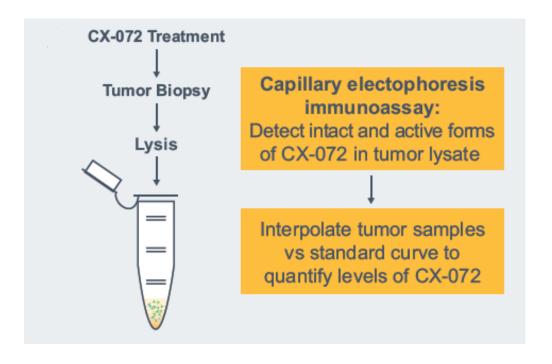


# Key Elements of Probody Platform





# Probody Therapeutic Activation/Unmasking Measurement in Tumor Samples from CX-072—Treated Patients



 On-treatment biopsies were obtained from a subset of patients either 3-5 days after dose 1 or after 4-6 weeks of CX-072 therapy



# Activated/Unmasked CX-072 Is Detected in Human Tumors at Doses ≥1 mg/kg

CX-072 Dose, mg/kg	Total CX-072, nM	Activated CX-072, nM	
30	734.0	221.0	
10	206.7	104.7	
10	165.3	65.4	
10	120.8	31.0	
10	57.7	10.2	
10	72.5	6.6	
3	55.6	8.5	
3	13.0	3.8	
3	28.2	3.8	
3	13.3	Not detectable	
3	2.6	Not detectable	
3	1.1	Not detectable	
3	Below LLOQ	Not detectable	
3	Below LLOQ	Not detectable	
1	18.8	6.4	
1	6.5	Not detectable	
1	Not detectable	t detectable Not detectable	
1	Not detectable	Not detectable	
0.3	8.7 Not detectable		
0.3	0.7 Not detectable		
0.3	0.5 Not detectable		
0.3	Below LLOQ	Below LLOQ	
0.3	Not detectable	Not detectable	

- Intratumoral total and activated CX-072 increased with dose
- First generation
   assay not sensitive
   enough to detect
   CX-072 in all tumors
   ≤ 3 mg/kg
- 10 mg/kg is being studied in Part D expansion cohorts

LLOQ, lower limit of quantification.



# Estimated Intratumoral Target Occupancy of PD-L1 by Activated/Unmasked CX-072 Exceeds 98% at Doses ≥3 mg/kg

CX-072 Dose, mg/kg	Molar Ratio Activated CX-072: Median Reference PD-L1	Estimated Target Occupancy, %	
30 (n = 1)	271	99.97	
10 (n = 5)	116	99.65	
3 (n = 3 <sup>a</sup> )	9	98.87	

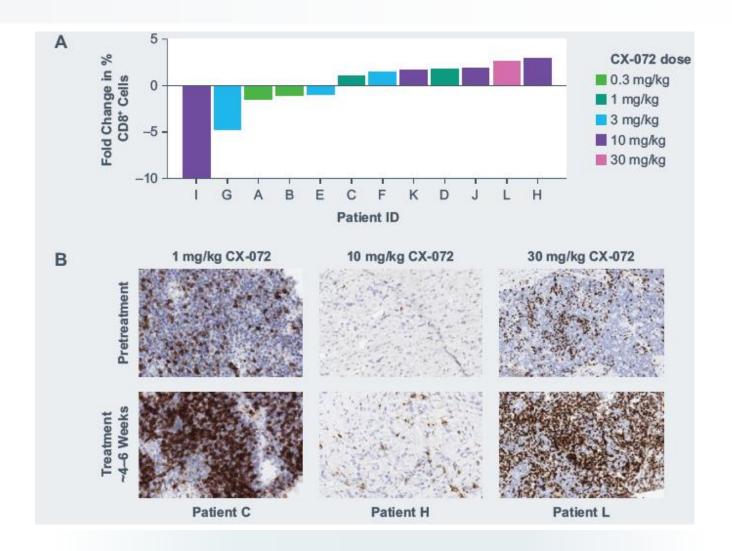
 For doses ≥10 mg/kg, the intratumoral concentration of unmasked/activated CX-072 was estimated to be ≥10x molar excess vs median PD-L1 concentration derived from a reference tumor set

PD-L1, programmed cell death ligand 1.

<sup>&</sup>lt;sup>a</sup> For 3-mg/kg biopsy samples, table shows data only from 3 of 8 biopsies for which activated/unmasked CX-072 was detectable.



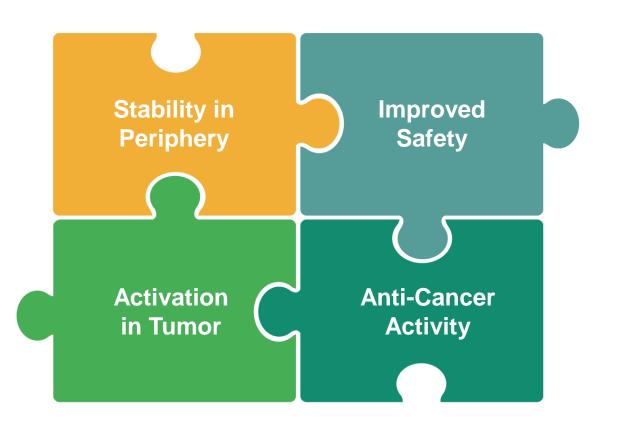
# CX-072 Treatment Increases Levels of CD8+ T Cells in Patient Tumors







# CytomX Data Presented in 2018 Provides Early Validation for Clinical Performance of the Probody Platform



- Integrated data support platform proof of concept
- Effective translation of preclinical data into clinical setting
- New paradigm for therapeutic antibodies



# PROCLAIM-CX-072 Next Steps: Clinical Proof of Concept Supports Program Expansion

EXPANSION	NEXT STEPS
CX-072 MONOTHERAPY D: 8 UNDISCLOSED TUMOR TYPES Initiation: 2Q 2018	Potential to advance one or more indications into registrational trials
CX-072 COMBINATION WITH IPILIMUMAB SELECTED CANCER TYPES Initiation: 2019	<ul> <li>Ongoing CX-072 10 mg/kg + 6 mg/kg ipi</li> <li>Expansion plans in 2019</li> </ul>
Enrollment ongoing Trial not initiated	

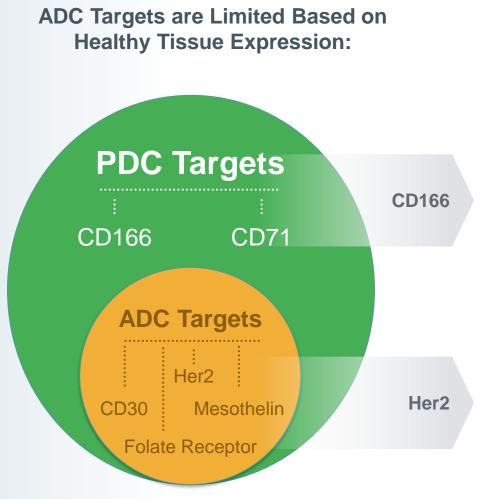




Probody Drug Conjugate Programs

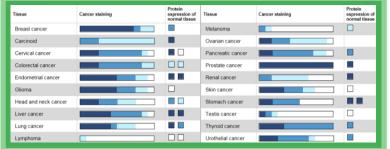


# Probody Technology Enables Selection of Better Antibody Drug Conjugate Targets



# PDC Targets May Have More Attractive Attributes:

- Higher Expression
- More patients
- Uniform Expression
- · More indications

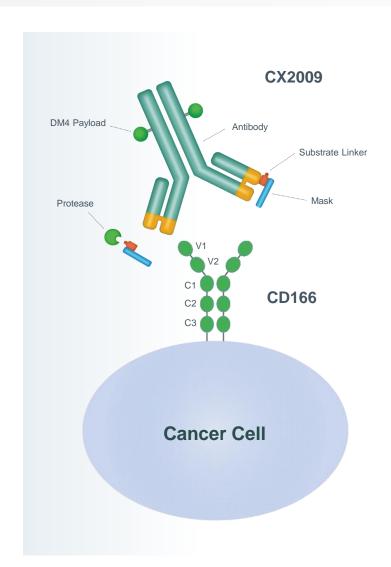


Tissue	Cancer staining	Protein expression of normal tissue	Tissue	Cancer staining	Protein expression of normal tissue
Breast cancer			Melanoma		
Carcinoid			Ovarian cancer		
Cervical cancer			Pancreatic cancer		
Colorectal cancer			Prostate cancer		
Endometrial cancer			Renal cancer		
Glioma			Skin cancer		
Head and neck cancer			Stomach cancer		
Liver cancer			Testis cancer		
Lung cancer			Thyroid cancer		
Lymphoma			Urothelial cancer		

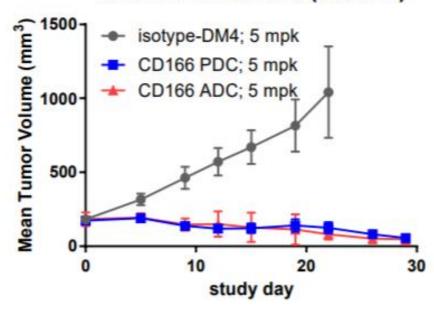
Source: Human Protein Atlas



# CX-2009: A Probody Drug Conjugate Targeting CD166 Preclinical Proof of Concept



# H292 tumor model (NSCLC)



### **GLP Toxicity Study Results:**

- Dosed up to 15 mg/kg in cynos
- Observed toxicity consistent with typical DM4 payload toxicity



# PROCLAIM-CX-2009: CD166-Directed PDC:

Exploratory Studies in 2018-2019 Drive Potential Expansion Studies in 2019-2020

#### **EXPLORATORY**

#### **EXPANSION**

#### A: DOSE ESCALATION

Initiation: Q2 2017
Inclusion: 7 cancer types
Data Presentation: 1H 2019

(Starting dose of 0.25 mg/kg. As of 11/2/18, dosing at 10 mg/kg)

**A2: BIOPSY REQUIRED** 

Initiation: Q2 2018
Inclusion: CD166+++
Data Presentation: 1H 2019

(Starting dose of 4 mg/kg. As of 11/2/18, dosing at 9 mg/kg) \*

**Enrollment ongoing** 



Trial not initiated

#### **B: COHORT EXPANSION(S)**

**Initiation:** 2018/2019

**Inclusion:** One or more of 7 cancer types

**Data Presentation: TBA** 

### Seven CD166+ tumor types in monotherapy dose escalation arm:

- Breast cancer
- Castration-resistant prostate cancer
- Cholangiocarcinoma
- Endometrial cancer
- Head and neck cancer
- Non-small cell lung cancer
- Ovarian cancer

#### Lung cancer



#### Breast cancer



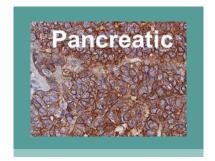
#### Ovarian cancer

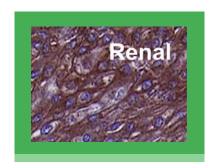




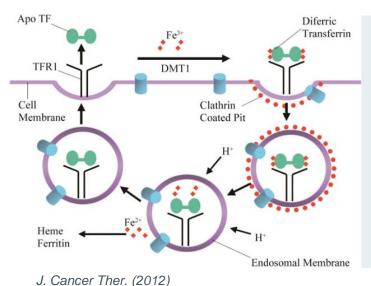
# CD71 is a High Potential Target for a Probody Drug Conjugate







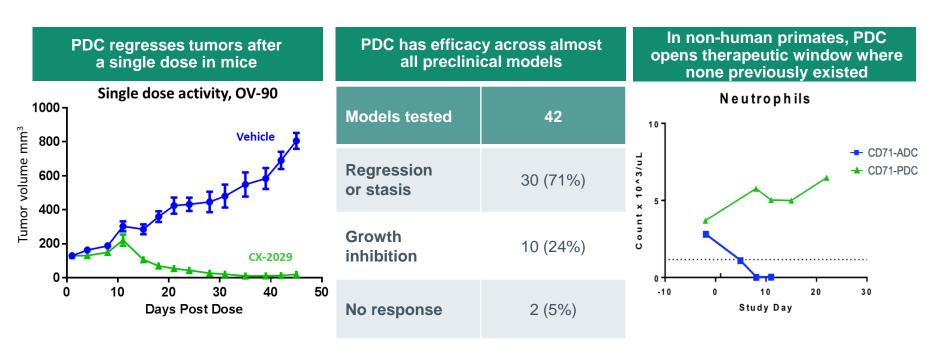




- Ubiquitously expressed on dividing, normal and malignant cells
- Mediates iron uptake required for cell division
- Professional internalizing protein: often used as a positive control in ADC experiments
- Expression in normal dividing cells prohibits development of a traditional ADC



# Probody Platform Has the Potential to Enable CD71 as a Drug Conjugate Target



Partnered with AbbVie: Co-development rights and profit split; \$25M milestone to CytomX received July 2018; Enrolling Phase 1/2 Trial





# PROCLAIM-CX-2029: CD71-Directed PDC Exploratory Studies in 2018-2019 Drive Expansion Studies in 2019-2020

# **EXPLORATORY EXPANSION** A: DOSE ESCALATION Initiation: Q2 2018 Inclusion: Solid Tumors, Lymphoma C: COHORT EXPANSION(S) **Data Presentation: TBA Initiation: TBD** Inclusion: Solid Tumors, Lymphoma **B: BIOPSIES REQUIRED Data Presentation: TBA** Initiation: 2019 **Inclusion:** Solid Tumors, Lymphoma **Data Presentation: TBA** Trial not initiated **Enrollment ongoing**

CytomX and AbbVie are co-developing a PDC against CD71, with CytomX leading pre-clinical and early clinical development





# Probody Drug Conjugate Summary CX-2009 (CD166) and CX-2029 (CD71)

# First-in-Class Profiles

- Novel modality (PDC)
- Novel targets, previously undruggable
- Uniquely enabled by our platforms

#### **Broad Potential**

- Targets are highly and broadly expressed in many cancer types
- Both programs advancing in Phase 1/2 studies
- Rapid path(s) to BLA submission could emerge
- CX-2009 wholly owned; CX-2029 partnered with certain retained U.S. commercial rights



# Major Alliances Broaden Our Pipeline of Probody Therapeutics



## abbyie



- 10 oncology, 2 non-oncology targets
- CTLA-4 Probody Tx in Ph. 1
- \$287 million earned to date
- \$4.8 billion in potential milestones, tiered royalties up to low-double digits

- CD71 (CX-2029) +
   2 additional targets
- Co-development,
   co-commercialization, and
   profit split on CX-2029
- IND on CX-2029 cleared in May 2018
- \$65 million earned to date
- Up to \$1B in potential milestones

- EGFR-TCB + 3 additional targets
- Co-development, profit split on EGFR-TCB
- \$1.4B in potential development, regulatory & commercial milestones
- \$60M earned to date
- CytomX receives rights to one Amgen preclinical TCB
- ~\$400 million to date from pharma partnering
- Two partnered assets in the clinic



# 2018 Achievements: Strong Execution Across Portfolio

# 2018 Highlights

### PROCLAIM-CX-072 (PD-L1 Probody Tx)

- ✓ Presented first in human CX-072 monotherapy clinical data at ASCO and ESMO
- ✓ Presented first in human CX-072 combination clinical data with ipilimumab at ASCO and ESMO
- ✓ Presented first clinical translation data at SITC
- ✓ First platform and clinical POC for an antibody prodrug

### PROCLAIM-CX-2009 (CD166 PDC)

✓ Monotherapy dose escalation at 10mg/kg

### PROCLAIM CX-2029 (CD71 PDC)

✓ Phase 1/2 Trial Underway

### PROCLAIM CX-188 (PD-1 Probody Tx)

✓ IND Filed



# **Upcoming Milestones**

### **2019 Upcoming Anticipated Milestones**

### PROCLAIM-CX-072 (PD-L1 Probody Tx)

☐ Updates 2019: Monotherapy Expansions, Ipilimumab Combination Next Steps, Zelboraf® Combination

### PROCLAIM-CX-2009 (CD166 PDC)

□ Update 1H'19: CX-009 Preliminary safety and efficacy readout from Parts A and A2

### BMS-986249 (CTLA-4 Probody Tx)

☐ BMS Anticipates Data Disclosures in 2019

### CX-2029 (CD71 PDC)

□ Trial in Progress

### CX-188 (PD-1 Probody Tx)

■ Trial Initiation





Corporate Update



Jefferies 2018 Healthcare Conference London, November 14, 2018

Sean McCarthy, D. Phil.

President and Chief Executive Officer