# CD388: A Novel Long-Acting Antiviral for the Prevention of Seasonal Influenza NAVIGATE Phase 2b Clinical Trial Results

- Presented by: Rick A. Bright, PhD, on behalf of the Cidara CD388 NAVIGATE Study Team
- 8<sup>th</sup> ISIRV Antiviral Group (AVG) Meeting
- Singapore | September 17, 2025

## **Forward-looking Statements**

These slides contain forward-looking statements within the meaning of the Private Securities Litigation Reform Act of 1995.

The words "may," "will," "estimate," "plan", "anticipate," "expect," "potential," "could," "project," and similar expressions (including the negative thereof), are intended to identify forward-looking statements. Because such statements are subject to risks and uncertainties, actual results may differ materially from those expressed or implied by such forward-looking statements. Such statements include, but are not limited to, statements regarding Cidara's research and development efforts; preclinical and clinical development activities; plans, projections and expectations for and the potential effectiveness, safety and benefits of, its product candidates, including CD388 and other product candidates from the Cloudbreak platform; whether CD388 may have significant advantages beyond and in addition to flu vaccines; and advancement of its strategic plans.

Projections, assumptions and estimates of the future performance of the markets in which Cidara operates are necessarily subject to a high degree of uncertainty and risk, including, Cidara's ability to obtain additional financing; the success and timing of Cidara's preclinical studies, clinical trials and other research and development activities; receipt of necessary regulatory approvals for development, as well as changes to applicable regulatory laws in the United States and foreign countries; changes in Cidara's plans to develop its product candidates; Cidara's ability to obtain and maintain intellectual property protection for its product candidates; and the loss of key scientific or management personnel. These and other risks and uncertainties are described more fully in Cidara's Annual Report on Form 10-K for the fiscal year ended December 31, 2024, filed with the United States Securities and Exchange Commission ("SEC") on March 6, 2025, and in Cidara's other filings with the SEC.

Additional risks and uncertainties may emerge from time to time, and it is not possible for Cidara's management to predict all risk factors and uncertainties. Cidara cautions that the foregoing list of factors is not exclusive and not to place undue reliance upon any forward-looking statements which speak only as of the date of this presentation. Except as required by law, Cidara does not undertake any obligation to update publicly any forward-looking statements for any reason after the date of this presentation to conform these statements to actual results or to changes in its expectations.

## **Executive Summary**

# The CD388 NAVIGATE Study for Prevention of Influenza Met Primary and All Secondary Endpoints

- The primary endpoint of Preventive Efficacy (PE) of protocoldefined ILI events at 24 weeks was met with statistical significance at each dose group
- All secondary endpoints also met statistical significance in each dose group

- Placebo attack rate was 2.8% for primary endpoint
- There is a clear dose response relationship
- 76% PE at the high (450 mg) dose
- Safety profile and tolerability were similar to placebo at all doses
- PE was maintained to 28 weeks with statistical significance at all doses
- Loss to follow up rates were low and similar in all arms

### Influenza Disease Burden

Influenza continues to drive significant morbidity and mortality despite available vaccines and antivirals

#### In the United States (Each Season)<sup>1</sup>

CDC estimates 2024-2025 Flu Season

47M - 82M

Influenza illnesses

21M - 37M

Influenza medical visits

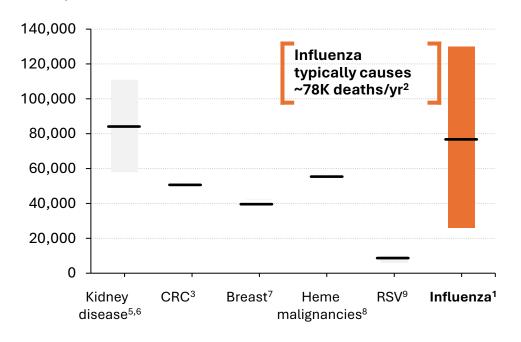
610K - 1.3M

Influenza hospitalizations

27K - 130K

Influenza deaths

# Influenza Mortality in the US is Similar to Breast Cancer, CRC, & All Blood Cancers<sup>3,4</sup>



# No Existing Solution Offers Adequate Protection for At-Risk Subjects

**Treatment Interventions** 

Influenza
Therapeutics
and Vaccines

#### Limitations

Traditional Flu Vaccines





- Widely available but low efficacy (~30-50% in healthy subjects)
- Lower efficacy with strain mismatches and/or reduced health status or immune compromised

Enhanced Vaccines





- Modest efficacy improvements (~20% relative increase)
- · At-risk groups remain exposed to flu infections and burden

**Antivirals** 





- Most effective when initiated <48 hrs of symptom onset</li>
- Short half-life limits use for pre-exposure prophylaxis (PrEP)

### **Existing vaccines and antivirals have significant limitations**

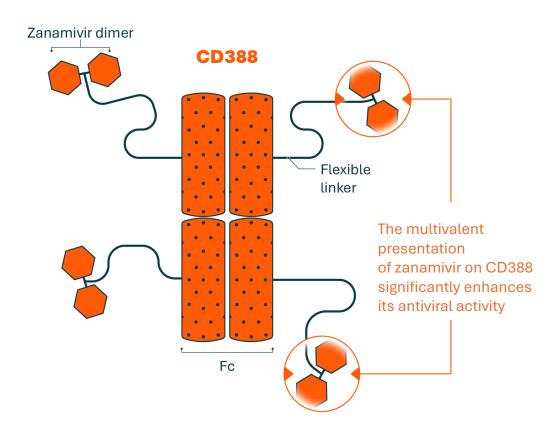
Note: https://www.cdc.gov/flu-vaccines-work/php/effectiveness-studies/index.html. Accessed 21OCT2024; https://tinyurl.com/9y3bh9f6; (last 3-years flu season average for any influenza infection in adults over 18); Hughes K, Middleton DB, Nowalk MP, et al. Effectiveness of Influenza Vaccine for Preventing Laboratory-Confirmed Influenza Hospitalizations in Immunocompromised Adults. Clin Infect Dis. 2021;73(11): e4353-e4360; Influenza VE in Elderly over 65 (https://tinyurl.com/2xt89p4c).

# Revolutionizing influenza protection



# CD388, A Drug-Fc-Conjugate, is Part of a Novel Drug Class

**CD388** is a Drug-Fc-Conjugate (DFC) that arrays multiple copies of zanamivir, the active ingredient of FDA-approved influenza drug Relenza®, on a clinically validated human antibody fragment engineered for extended half-life.



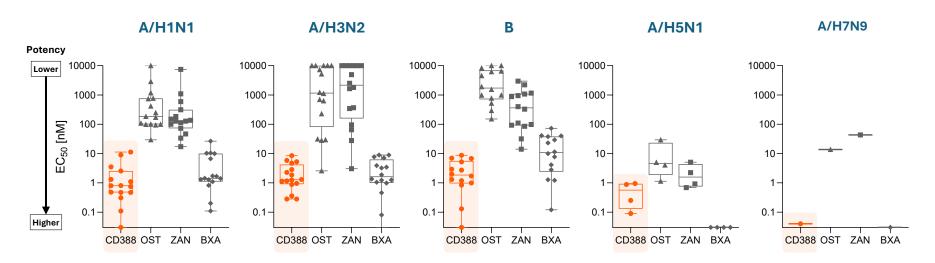
# CD388 can complement seasonal influenza vaccines

#### **CD388** has the Potential to Overcome the Limitations of Vaccines

Attribute	CD388 Target Product Profile	Seasonal Flu Vaccines
Spectrum	Universal against all flu strains and in all people	Variable coverage of seasonal strains YoY and substantially less effective in high-risk populations
Administration	Once per season	Once or twice per season
Safety	No expected immune mediated safety issues. No hypersensitivity reactions in Ph 1, Ph 2a <sup>1</sup> , or Ph 2b	Potential for immune mediated safety concerns
Manufacturing	Consistent year-round manufacturing with no change based on influenza strain	Must be manufactured anew every flu season (NH & SH)

## **Broad Influenza Prophylaxis**

Cytopathic Effect Activity Versus Influenza Subtype Panels1



CD388 demonstrated antiviral activity across diverse seasonal and high pathogenicity strains, including H5N1 & H7N9

A/Vietnam/1194/2004 – clade 1 A/Indonesia/05/2005 – clade 2.1.3.2 A/Turkey/2005 – clade 2.2.1 A/Hong Kong/156/97 – clade 0

<sup>1.</sup> https://doi.org/10.1038/s41564-025-01955-3

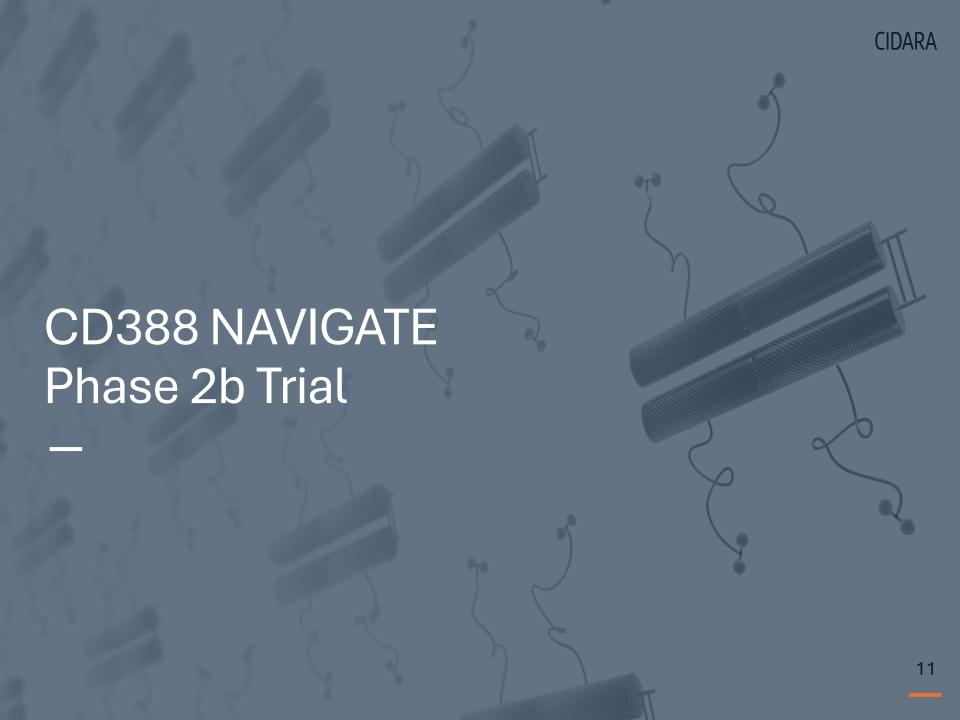
# CD388 Activity Observed Against Resistant Strains<sup>1</sup>

#### In Vitro Activity of CD388 and NAI Comparators vs NAI Resistant Strains

Influenza Strain	NA Genotype	CD388 IC <sub>50</sub> [nM]	Oseltasmivir IC <sub>50</sub> [nM]	Zanamivir IC <sub>50</sub> [nM]	>5X Shifts in NA inhibition IC <sub>50</sub> or		
A/Illinois/45/2019 (H1N1)pdm09	H275	1.30	0.3	0.19	In Vivo Activity of CD388 vs Zanan		
A/Alabama/03/202 0 (H1N1)pdm09	H275Y	0.98	426.8	0.16		Lethal Chall	enge Model <sup>2</sup>
B/Laos/0080/2016	H134	7.44	33.35	2.61	Influenza Strain	CD388 IC <sub>50</sub> [nM]	Zanamivir IC <sub>50</sub> [nM]
	11104	7.44		2.01	B/Laos/0080/2016 H134 (NAI-S)	0.3	1
B/Laos/0654/2016	H134N	4.66	171.8	310.8			
					B/Laos/0654/2016 H134N (NAI-R)	0.3	10

<sup>1.</sup> https://doi.org/10.1038/s41564-025-01955-3

<sup>2. 5</sup> mice/group treated a single IM dose of CD388 2-hours after viral challenge. Zanamivir dosed IN once daily for 5-days starting 2-hours after infection. Survival monitored for 21 days.



# CD388 NAVIGATE Trial Design\*

(NCT06609460)

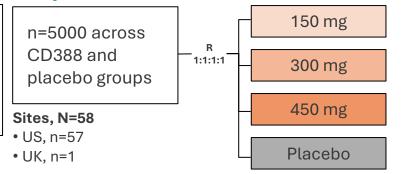
Blinded, randomized, controlled trial of CD388 in 3 doses vs placebo as a single SQ administration to assess efficacy and safety of CD388 in prevention of influenza in subjects not at risk for influenza complications

#### A Double-blind RCT of CD388 for Influenza Prophylaxis

#### **Study Population**

Generally healthy, unvaccinated adults aged 18-64 not at risk for complications of influenza

#### **Study Size**



#### **First/Last Dosed**

Sep 2024/Dec 2024

#### **Primary Endpoint**

Preventive Efficacy (PE) = defined by all 3 criteria:

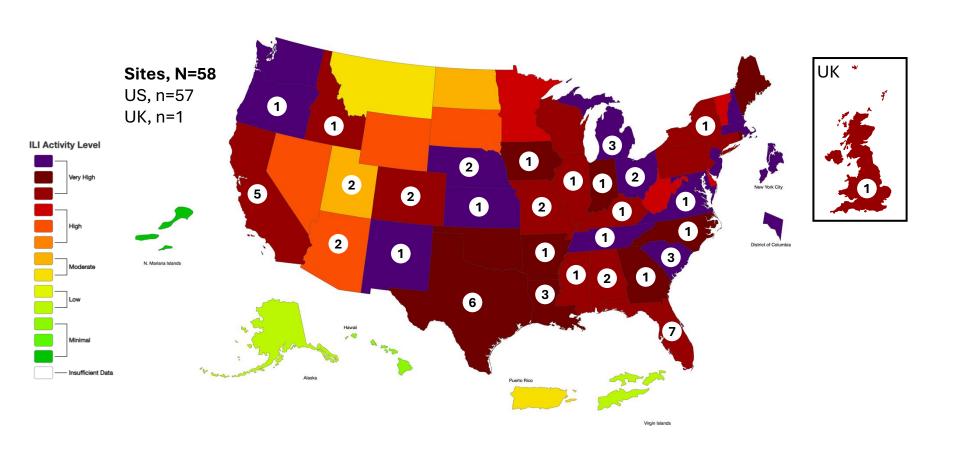
- PCR-confirmed influenza
- ≥2 respiratory or 1 respiratory and 1 systemic sign/symptom
- Body temp ≥38° C

Abbreviations: PCR, polymerase chain reaction; RCT, randomized controlled trial; SQ, subcutaneous.

<sup>\*</sup>Ph 2b originally designed as dose-ranging trial without statistical significance testing to select optimal dose to advance to Ph 3.

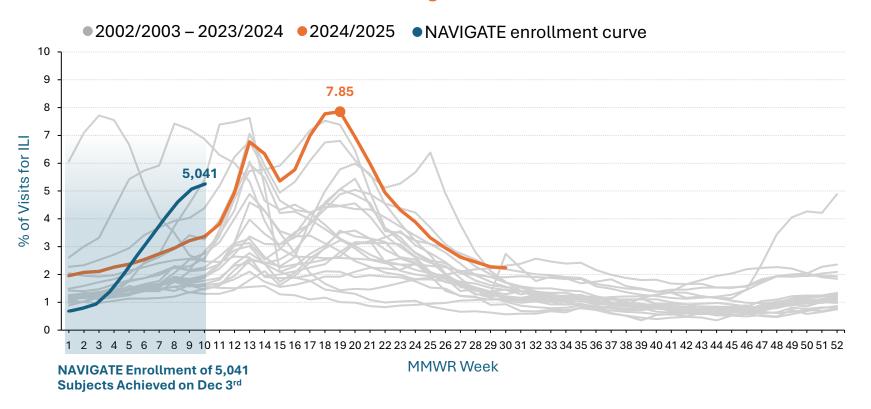
# **NAVIGATE Enrollment Site Map**

Overlay of Heat Map Demonstrating Influenza Activity at Peak of 2024-25 NH Season (Week of Feb 9)



# NAVIGATE Enrollment Curve Relative to NH Influenza Activity

% of Visits to the Doctor for Fever and Cough or Sore Throat for 2024/2025 Flu Season



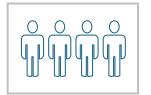
Flu season runs from early October (shown as week 1, corresponding to epi week 40) to the end of May. Data Sources: CDC and Datawrapper.

 ${\bf Abbreviations: ILI, influenza-like\ illness;\ MMWR,\ Morbidity\ and\ Mortality\ Week\ Report.}$ 

# **CD388 NAVIGATE Study Design Overview**

Primary measure between 7 days and 24 weeks, secondary measures out to 28 weeks

#### **Screening**



Healthy unvaccinated subjects – 5000 randomized

#### Day 1



- Study drug dosing
- ePRO training
- Baseline safety labs
- Baseline PK/ADA
- Baseline flu serology

#### Day 7 to 28 weeks



#### ARI surveillance and monitoring:

- Nasal swab for influenza infection
- ePRO symptom monitoring
- PK/ADA/Flu serology

#### Final visit (Week 28):



- Final safety labs
- Final PK/ADA
- Final flu serology

# CD388 NAVIGATE Participant Demographics: Balanced Across All Arms

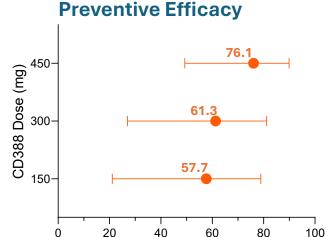
	-	-	-
$\boldsymbol{-}$	J	u	O

•	<b>150 mg</b> N=1,268	<b>300 mg</b> N=1,268	<b>450 mg</b> N=1,268	Placebo N=1,267
Age				
18 - <40 yrs (%)	649 (51.2)	640 (50.5)	646 (50.9)	620 (48.9)
40 - <64 yrs (%)	619 (48.8)	628 (49.5)	622 (49.1)	647 (51.1)
Mean (SD)	39.7 (12.67)	39.6 (12.91)	39.5 (12.94)	39.9 (13.19)
Median	39	39	39	40
Sex				
Male (%)	594 (46.8)	586 (46.2)	571 (45.0)	575 (45.4)
Female (%)	674 (53.2)	682 (53.8)	697 (55.0)	692 (54.6)
Race				
White (%)	930 (73.3)	911 (71.8)	876 (69.1)	885 (69.9)
African American (%)	225 (17.7)	240 (18.9)	246 (19.4)	245 (19.3)
Asian (%)	61 ( 4.8)	62 (4.9)	74 ( 5.8)	69 (5.4)
Other (%)	52 (4.1)	55 (4.3)	72 (5.7)	48 (5.4)

# Primary Endpoint Met With Statistical Significance in Each Dose Group

		_		
	<b>150 mg</b> N=1,268	<b>300 mg</b> N=1,268	<b>450 mg</b> N=1,268	Placebo N=1,267
Primary Endpoint*	n (%)	n (%)	n (%)	n (%)
Number of Participants Protocol-Defined ILI <sup>1</sup>	14 (1.2)	13 (1.1)	8 (0.7)	33 (2.8)
Preventive Efficacy (PE) (%)	57.7	61.3	76.1	-
95% CI (%)	21.1, 78.9	27.0, 81.2	49.3, 89.9	_
p-value	0.0050	0.0024	<0.0001	_

<sup>\*</sup>Statistical significance for grouped 300mg + 450mg dose groups was met (PE=68.6%, p<0.0001), allowing progression down hierarchy for testing of individual dose groups.



#### **Primary Endpoint**

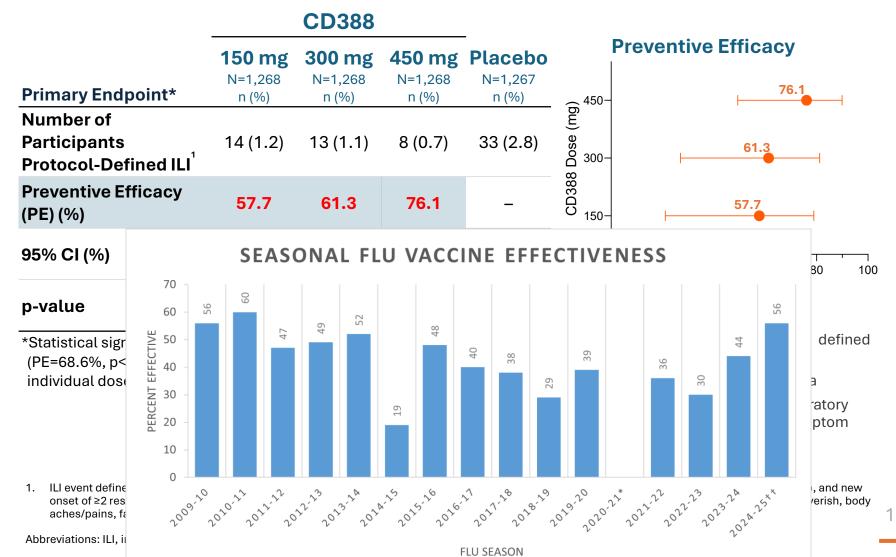
Preventive Efficacy (PE) = defined by all 3 criteria:

PE and 95% CI

- PCR-confirmed influenza
- ≥2 respiratory or 1 respiratory and 1 systemic sign/symptom
- Body temp ≥38° C

ILI event defined as central laboratory-confirmed RT-PCR+ influenza infection (nasopharyngeal swab), new onset of fever (oral temperature ≥38.0°C), and new
onset of ≥2 respiratory symptoms (nasal congestion, sore throat, cough) or ≥1 respiratory symptom and ≥1 systemic symptom (headache, feeling feverish, body
aches/pains, fatigue)

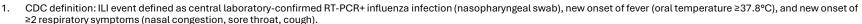
# Primary Endpoint Met With Statistical Significance in Each Dose Group



# Secondary Endpoints Demonstrate Statistical Significance at All Temperatures

#### **CD388**

Secondary Endpoints	<b>150 mg</b> N=1,268	<b>300 mg</b> N=1,268	<b>450 mg</b> N=1,268	Placebo N=1,267	Secondary Endpoints ■Fever≥37.8C ▲Fever≥37.2C		
Number of Participants with ≥37.8 Temp <sup>1</sup>	n (%) 15 (1.3)	n (%) 15 (1.3)	n (%) 8 (0.7)	n (%) 33 (2.8)	Dose (mg 450 – 300 – 300 –	76.1 55.3	
Preventive Efficacy (PE) (%)	54.7	55.3	76.1	_	150 –	5 <mark>4.</mark> 7	
95% CI (%)	16.7, 77.4	18.0, 77.8	49.3, 89.9	_	     	20 40 60 80 100 PE and 95% CI	
P-value	0.0084	0.0073	<0.0001	-	_		
Number of Participants with ≥37.2 Temp <sup>2</sup>	22 (1.9)	21 (1.8)	12 (1.0)	41 (3.5)	(bu) 450-	71.1	
PE (%)	46.5	49.6	71.1	_	Dose 300-	49.6	
95% CI (%)	10.2, 69.3	14.8, 71.9	45.8, 86.1	_	150- 150-	46.5	
P-value	0.0148	0.0083	<0.0001	-	0	20 40 60 80 100 PE and 95% CI	



ILI event defined as central laboratory-confirmed RT-PCR+ influenza infection (nasopharyngeal swab), new onset of fever (oral temperature ≥37.2°C), and new onset of ≥2 respiratory symptoms (nasal congestion, sore throat, cough) or ≥1 respiratory symptom and ≥1 systemic symptom (headache, feeling feverish, body aches/pains, fatigue).

# Safety Summary: No Safety Signals

- Safety profile and tolerability were similar in all arms with no safety signals observed
- There were no drug-related SAEs
- Treatment-emergent adverse events (TEAEs) showed no dosedependent pattern between CD388 and placebo groups
- Majority of TEAEs were unrelated to study drug and Grade1/ Grade 2
- Injection site reaction rates were subject-reported and similar across CD388 doses and placebo

	<b>150 mg</b> N=1,257 n (%)	<b>300 mg</b> N=1,263 n (%)	<b>450 mg</b> N=1,261 n (%)	<b>Placebo</b> N=1,260 n (%)
Any TEAE	521 (41.4)	515 (40.8)	524 (41.6)	515 (40.9)
Any SAE	8 (0.6)	8 (0.6)	6 (0.5)	13 (1.0)
Any drug- related SAE	0	0	0	0
Any ISR	270 (21.5)	310 (24.5)	318 (25.2)	251 (19.9)
Erythema	89 (7.1)	113 (8.9)	121 (9.6)	85 (6.7)
Induration	49 (3.9)	91 (7.2)	80 (6.3)	38 (3.0)
Pain	107 (8.5)	150 (11.9)	119 (9.4)	103 (8.2)
Tenderness	182 (14.5)	192 (15.2)	189 (15.0)	167 (13.3)

## **Summary and Next Steps**

# NAVIGATE Study Highlights the Potential of CD388 for Broad, Seasonal Influenza Prevention

- CD388 met all primary and secondary endpoints for prevention of influenza with statistical significance following a single subcutaneous administration
- CD388 demonstrated a benign safety profile at all tested doses
- NAVIGATE trial supports advancement of the 450 mg dose to Phase 3
- Pharmacokinetic and virology data to be presented at future conferences

### For More Information

- Please visit our luncheon "CD388: A New Modality for Broad Influenza Protection in Healthy and High-Risk Populations" (Drs. Fred Hayden and Rick Bright co-chairing)
  - Friday, Sept 19<sup>th</sup>, 13:00-13:45, Grand Ballroom 1, Level 4,
  - Waterfront Conference Center
- Andreev Konstantin (St. Jude): "A Single Prophylactic dose of CD388 Provides Protection Against highly Pathogenic Bovine-Origin Influenza A(H5N1) Virus in the Ferret Model"
  - Friday, Set 19<sup>th</sup>, 12:30-12:45

### Available for Q&A



**Les Tari, Ph.D.** CSO



Corrina Pavetto SVP, Clinical Operations