NuStar

2022 Citi

One-on-One Midstream / Energy Infrastructure Conference

AUGUST 16-17, 2022

Forward-Looking Statements

Statements contained in this presentation other than statements of historical fact are forward-looking statements. While these forward-looking statements, and any assumptions upon which they are based, are made in good faith and reflect our current judgment regarding the direction of our business, actual results will likely vary, sometimes materially, from any estimates, predictions, projections, assumptions or other future performance presented or suggested in this presentation. These forward-looking statements can generally be identified by the words "anticipates," "believes," "expects," "plans," "intends," "estimates," "forecasts," "budgets," "projects," "could," "should," "may" and similar expressions. These statements reflect our current views with regard to future events and are subject to various risks, uncertainties and assumptions.

We undertake no duty to update any forward-looking statement to conform the statement to actual results or changes in the company's expectations. For more information concerning factors that could cause actual results to differ from those expressed or forecasted, see NuStar Energy L.P.'s annual report on Form 10-K and quarterly reports on Form 10-Q, filed with the SEC and available on NuStar's website at www.nustarenergy.com. We use financial measures in this presentation that are not calculated in accordance with generally accepted accounting principles ("non-GAAP") and our reconciliations of non-GAAP financial measures to GAAP financial measures are located in the appendix to this presentation. These non-GAAP financial measures should not be considered an alternative to GAAP financial measures.

Our Solid Second Quarter Results Once Again Demonstrated the Strength and Resilience of Our Business

★ Last year, we delivered on our promise to fund our spending with internally generated cash flows, funding 112% of our strategic capital from excess adjusted DCF[1] in 2021, up 11% over 2020, ***and we are on track to increase our internally generated cash flows in 2022 and beyond***

Q2 2021

Up 16%

Permian Crude System Throughputs

Up 20%

Northern Mexico Refined Products Supply System Throughputs

Q2 2022

★ Excluding the contribution from the Eastern U.S. terminals we sold in October 2021 and the Point Tupper terminal we sold in April, our second quarter 2022 EBITDA[1] was comparable to 2Q21

1 - Please see Appendix for reconciliations of non-GAAP financial measures to their most directly comparable GAAP measures

We Expect Full-Year 2022 to be Even Stronger Than Last Year

Even Stronger in 2022

Stronger
Adjusted EBITDA
$700-750MM*

Stronger
Debt-to-EBITDA Ratio
Improved From 2021

Stronger
% of Spending Funded From Internally Generated **Cash Flows**

* - Please see Appendix for reconciliations of non-GAAP financial measures to their most directly comparable GAAP measures.

In 2022, We Have Kicked Off an Optimization Initiative In Order to Maximize Our Internally Generated Cash Flows

2022 Optimization Initiative

Kick-off: March 2022 → **Phase #1:** Up to ~$60MM Cost and Spending Reductions Identified for 2022 and 2023, in total → **Phase #2:** In progress

★ Earlier this year, we kicked off an initiative to optimize our spending across our business to:

- Scrutinize every dollar of OPEX and G&A expenses, with the goal of making meaningful strides in our cost structure to maximize internally generated cash flows
- High-grade every dollar of our strategic spending to ensure that we only execute projects that meet or beat our internal hurdles and are lean, efficient and effective

★ In our first phase of optimization, we have already identified *almost $60 million* in cost and spending reductions, across 2022 and 2023

We Believe That Our Optimization, Combined With Our Sale of Point Tupper, Will Allow NuStar to Continue to Improve Our Debt-to-EBITDA Ratio in 2022

- ★ By deploying proceeds from our recent assets sales to reduce debt, we were able to reduce our Debt-to-EBITDA ratio for year-end 2021 below 4.0x[1]
- ★ Optimization and the proceeds of the Point Tupper sale are expected to allow us to continue to reduce our leverage this year, and we expect to demonstrate continued meaningful improvement by year-end 2022…

4Q20 Actual	4Q21 Actual	2Q22 Actual	2022 Outlook
4.24x[1]	3.99x[1]	3.93x[1]	Continued Improvement

1 - Please see Appendix for reconciliations of non-GAAP financial measures to their most directly comparable GAAP measures

This Year, We are On-target to Self-fund Our $115-145 Million Strategic Growth Capital Program for Our Core Asset Footprint

Renewable Fuels

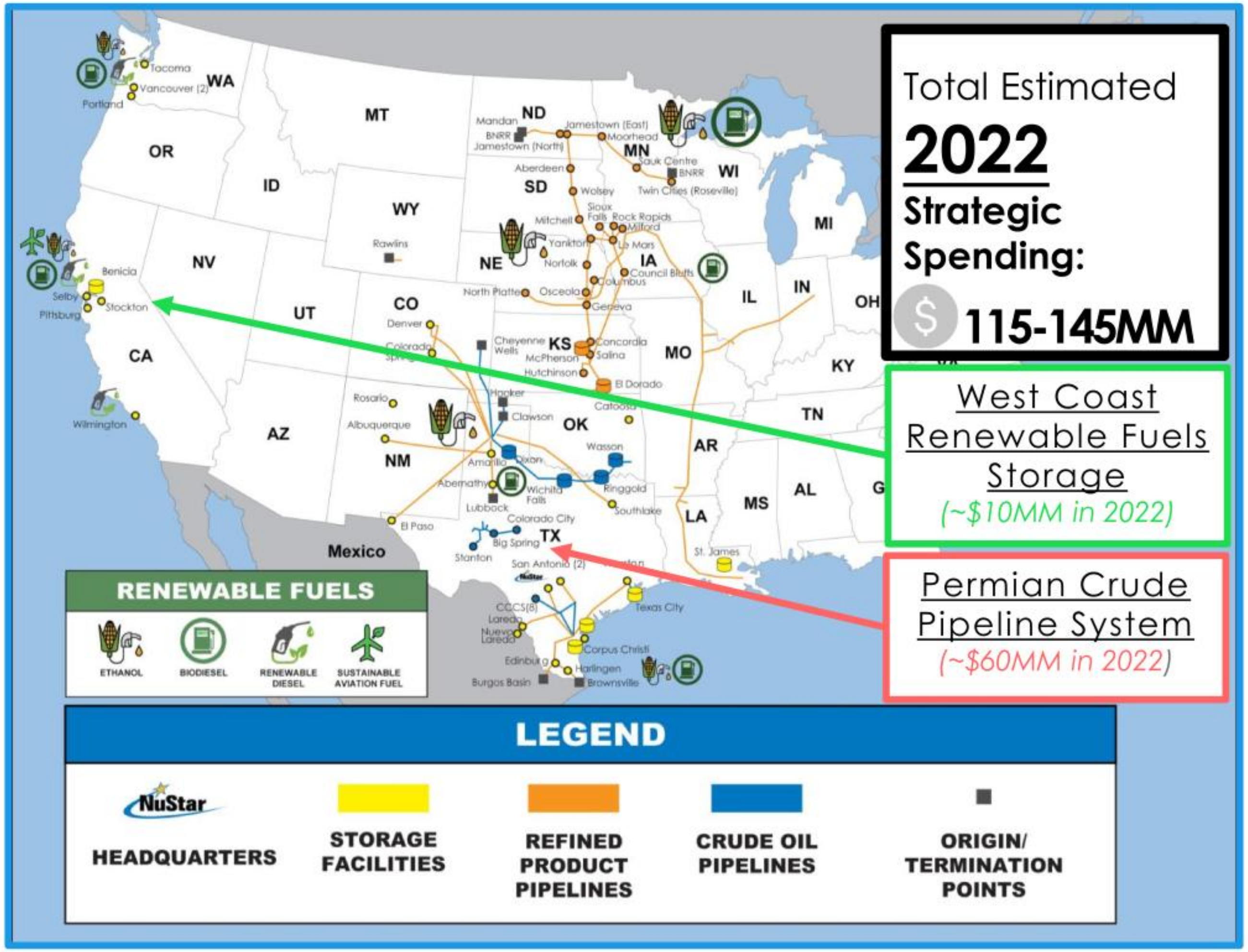
- ***Established:***
  - West Coast Network
  - Ethanol & bio-diesel blending
- ***Developing:***
  - Ammonia System

Refined Products

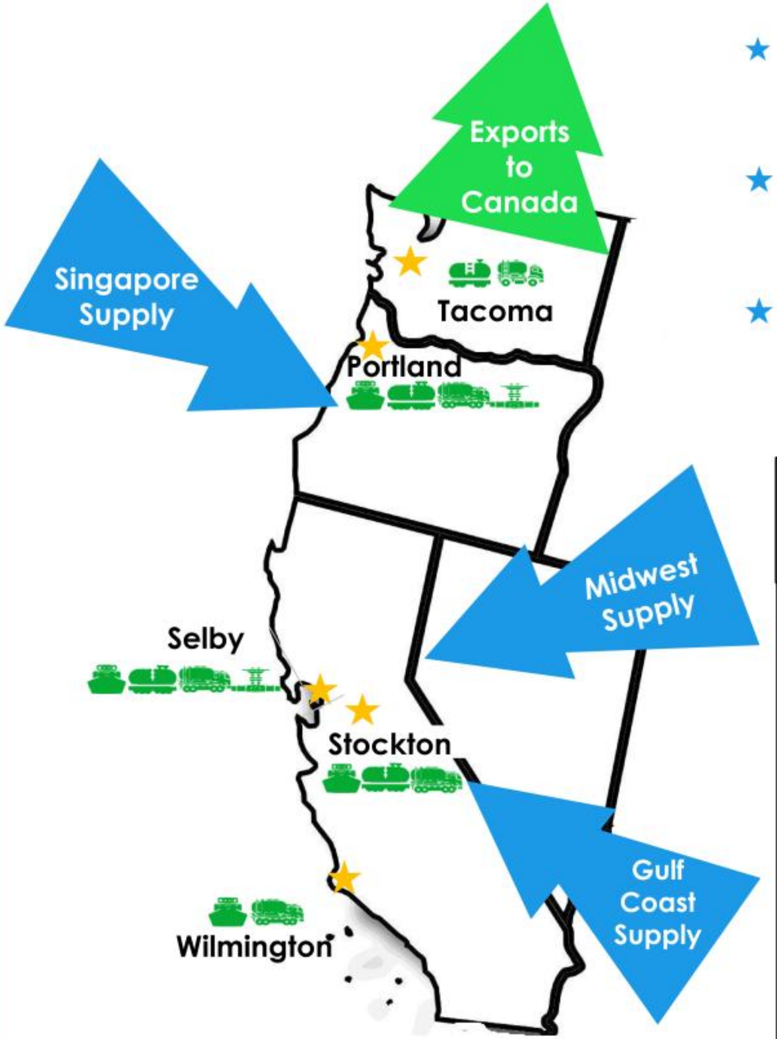
- Midcontinent
- Colorado/NM/Texas
- Northern Mexico

Crude Supply/Export

- Permian Crude System
- Corpus Christi Crude System
- St. James Terminal

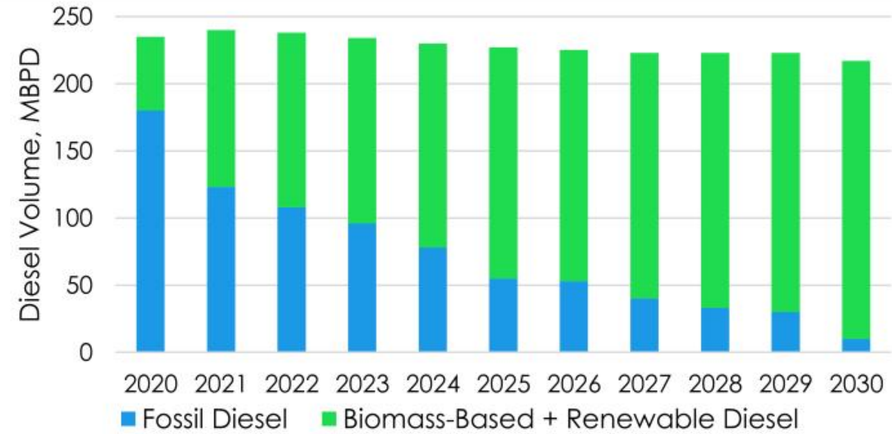


Carbon Emissions Reduction Goals Generate Growing Demand for NuStar's Well-positioned Midstream Logistics Now and in the Future



- Regulatory priorities on the West Coast and in Canada continue to dramatically increase demand for renewable fuels in the region
- At the same time, obtaining permits for greenfield projects is difficult, which increases the value of existing assets
- Our West Coast terminals have the access and optionality to receive and distribute renewable fuels across the West Coast

California's Transportation Fuel Supply With Low-Carbon Fuel Standard Compliance From Petroleum Diesel Alternatives



We Have Captured a Significant (and Still Growing) Proportion of the Region's Renewable Fuels Supply…

NuStar's Proportionate Share of California's Renewable Fuels Market

(Total Volume for the Four Quarters Ended March 31, 2022[1])

5%

BIODIESEL

13%

ETHANOL

21%

RENEWABLE DIESEL

87%

SUSTAINABLE AVIATION FUEL

- We expect our market share to increase in 2022, along with associated EBITDA, as we complete additional projects presently in planning or under construction
  - We intend to continue converting tankage to renewable fuels as the market demands
- Our facilities are positioned to benefit from new production and conversion projects for renewable diesel, sustainable aviation fuel (SAF), ethanol and other renewable fuels across the region

Source: California Air Resource Board (CARB)

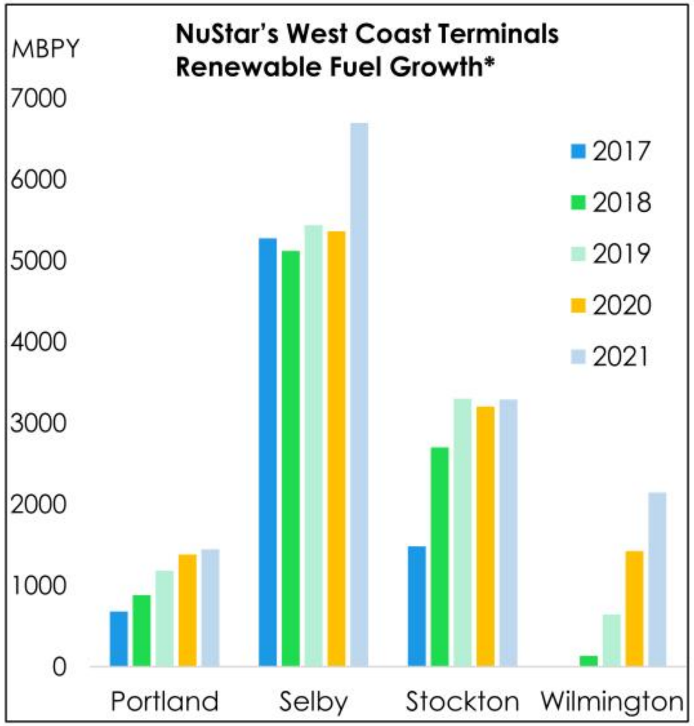
1 – Most recent data available

Renewable Fuels

... And We Continue to Partner With Key Customers to Develop Our Renewable Fuels Network, as LCFS Mandates Expand to Additional Markets

- ★ We have established ourselves as an early mover in the renewable fuels transportation market by developing and completing a number of projects to handle and store renewable fuels
- ★ These projects have allowed NuStar to capture market share and build on relationships with key global producers
  - Our facilities are positioned to benefit from new production and conversion supply projects as the renewable fuels market continues to grow

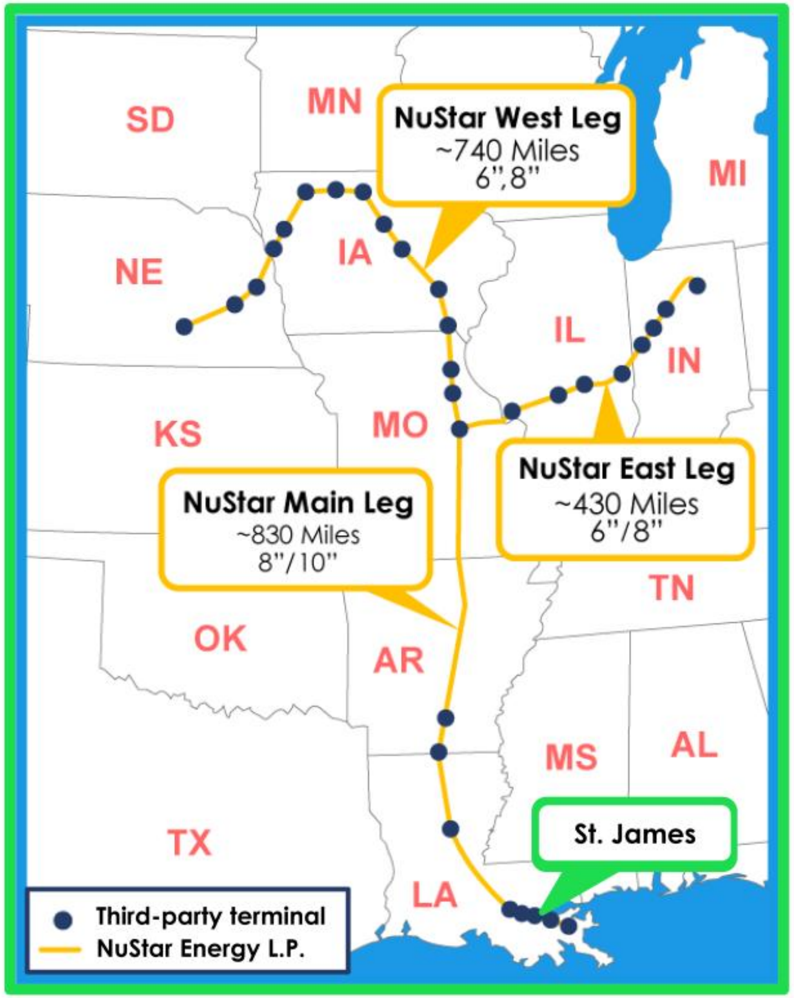
		Complete
Portland	Convert 36,000 bbls to **biodiesel**	✓
	Convert 57,000 bbls to **renewable diesel**	✓
Selby	Construct truck-loading for **renewable diesel**	✓
	Multimodal shipment of **SAF**	✓
	Convert 208,000 to **SAF**	✓
	Modify rail to handle **renewable feedstock** offloading	✓
Stockton	Convert 30,000 bbls to **biodiesel**	✓
	Convert 73,000 bbls to **renewable diesel** and expand **renewable diesel** handling to all 15 rail spots	✓
	Convert 151,000 bbls to **renewable diesel**	✓
	Connect to **ethanol** unit train offload facility	✓
Wilmington	Convert 160,000 bbls to **renewable diesel**	✓
	Reconfigure dock for enhanced marine capability	1H25 Est.



* Includes biodiesel, ethanol, renewable diesel, renewable feedstock and SAF

We are Also Developing Near- and Long-term Opportunities for Our Ammonia System, Both Renewable and Conventional

- Our Ammonia Pipeline is the longest and only ammonia pipeline in the country, spanning over 2,000 miles and seven states, from Louisiana, north along the Mississippi to Missouri, and then northwest and east, to Nebraska and Indiana
- Today, we provide the lowest-cost option for transporting imported and domestically produced ammonia to fertilize crops in our nation's "breadbasket"
- We have capacity available to transport additional volumes, including "blue" or "green" ammonia
  - Currently running ~30 MBPD (~3,500 STPD[1]), but have operating capacity close to ~50 MBPD (~5,500 STPD)

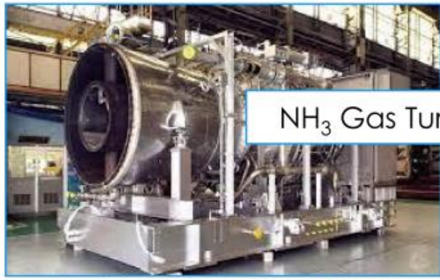


1 – short tons per day

Ammonia, the World's Second-most Widely Used Chemical, Offers Significant "Greening" Opportunities

- Ammonia is the basic building block for all types of nitrogen fertilizer which is an essential nutrient for growing plants
  - About 90% of the 200 million tons of ammonia (worth almost $80 billion in the aggregate) produced each year is used for fertilizer
  - About 50% of the world's food production depends on ammonia
- Traditional fossil-fuel ammonia production is estimated to contribute about 1.6% of global GHG emissions, which has driven interest in its de-carbonization
  - "Blue" ammonia is produced with natural gas, but the associated emissions are captured and stored
  - "Green" ammonia is produced using "renewable" electricity to power an electrolyser to extract hydrogen from water and an air separation unit to extract nitrogen from air, which are then combined, through a chemical reaction powered by renewable electricity, to produce ammonia
- In addition, "blue" and "green" ammonia have potential for use as lower-carbon alternative fuels: for engines/turbines to generate electricity, in alkaline fuel cells, as an up-to-70% blend ICE vehicles and for the maritime industry
- Ammonia can also be a lower-cost option for transporting hydrogen, which can be used for fuel cells or other applications. Ammonia is easier to transport and store than hydrogen, as it doesn't require cryogenic or high-pressure storage and can be relatively easily cracked to convert it to hydrogen

50%
of World's Food Production Depends on NH_3



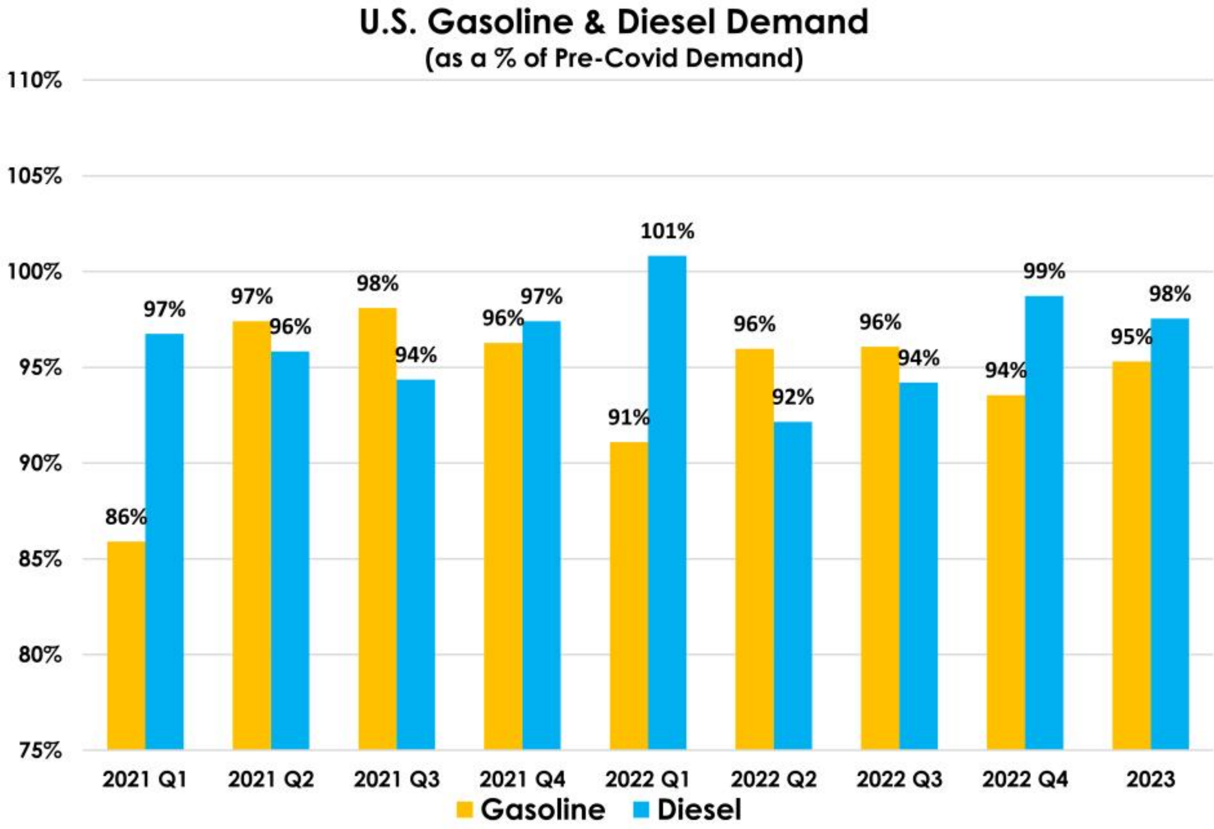
NH_3 Gas Turbine

70% NH_3-fueled Car

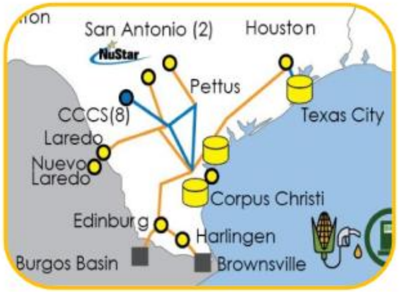
NH_3 Fuel-cell Ship

U.S. Gasoline and Diesel Demand was Strong Through 2021, and 2022 is Expected to Improve

- ★ Gasoline demand in the United States recovered throughout 2021 and is on track to remain near pre-Covid levels in 2022
- ★ Diesel demand exceeded pre-Covid levels starting in the first quarter of 2022 and is on track to remain at or near those levels through the remainder of the year



NuStar's Refined Products Systems Serve Key Markets Across the Midcontinent and Texas…



Midcontinent Systems-

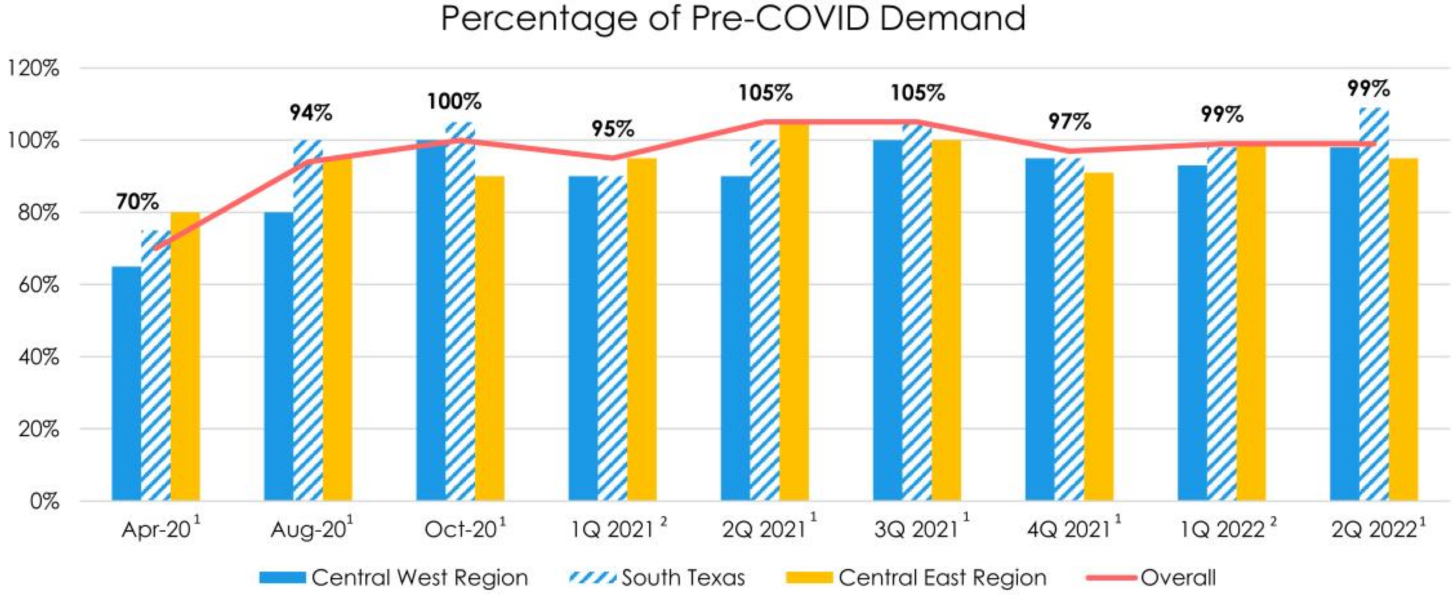
- ★ CENTRAL EAST: A 2,500-mile pipeline system with multiple delivery options
  - *East Pipeline* – This system serves important markets across the Midwest/West, with flexible refined product supply from refineries in McPherson, Kansas, El Dorado, Kansas and Ponca City, Oklahoma
  - *North Pipeline* – System flows from North Dakota to the Twin Cities, serving both rural markets and large cities with refined product supply from Mandan, North Dakota refinery
- ★ CENTRAL WEST: Comprised of over 2,200 miles of structurally exclusive pipeline, supplied from the McKee, Texas refinery serving markets in Texas and nearby states

South Texas Systems-

- ★ Around 700 miles of structurally exclusive pipeline, supplied from refineries located in Corpus Christi and Three Rivers, Texas serving markets in Texas and northern Mexico

... And Our Markets Have Proven Resilient (and are Expected to Continue to See Strong, Consistent Demand)

Total Refined Products

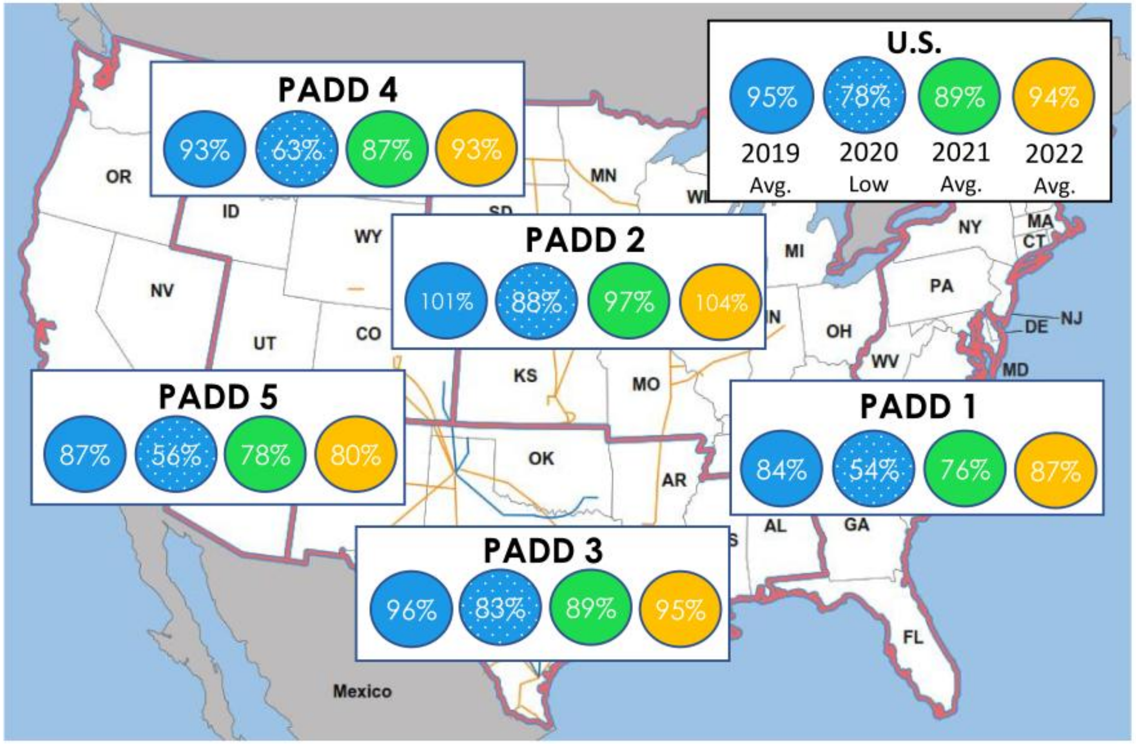


- ★ Our resilient asset base recovered quickly from April 2020's pandemic low
- ★ Full-year 2021 refined product throughputs were approximately **<u>105%</u>**[2] of our full-year 2019 (pre-Covid) levels
- ★ Our refined product throughputs for 2Q 2022 were approximately **<u>100%</u>**[1] of (pre-Covid) levels, despite operational issues at customer refineries in 2Q 2022

1 – Comparison versus 2019 demand; applicable periods adjusted for Northern Mexico projects for a comparable presentation; includes on-road product demand in our storage system
2 – Comparison versus 2020 demand; applicable periods adjusted for Northern Mexico projects; includes on-road product demand in our storage system

U.S. Refinery Utilization has Risen Along With Rebounding Product Demand

U.S. Refinery Utilization (by PADD, 2019-2022)



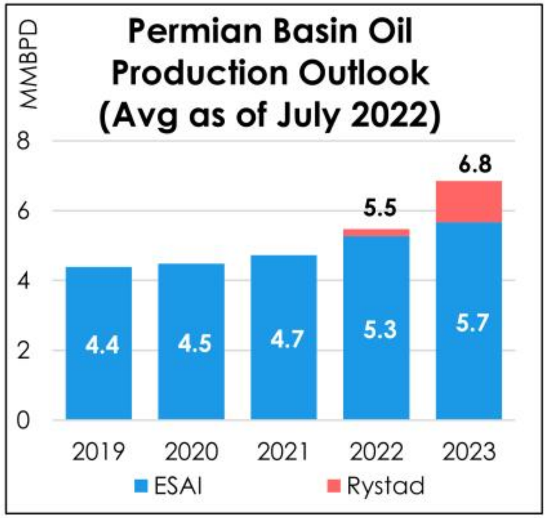
- ★ At the end of 2021, U.S. refinery utilization reached 89% and is currently expected to average 94% in 2022, up 5% over 2021 utilization levels
- ★ U.S. Gulf Coast refiners' location is expected to continue to provide several advantages, relative to other U.S. regions:
  - Better access to lower-priced natural gas, which should mitigate seasonal volatility
  - Capacity to upgrade heavy fuel oil
  - Better access to export markets for refined products

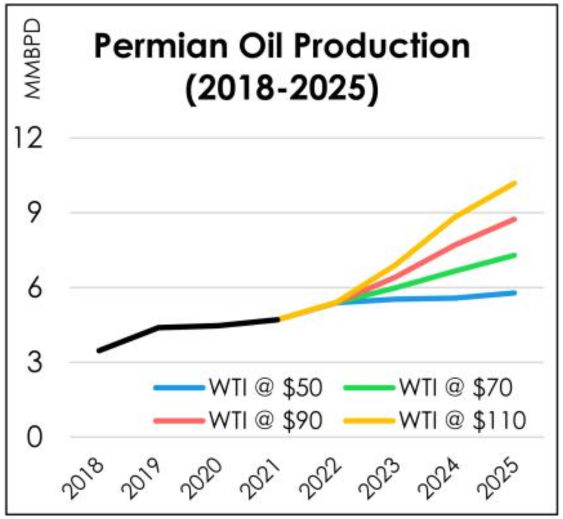
Source: ESAI

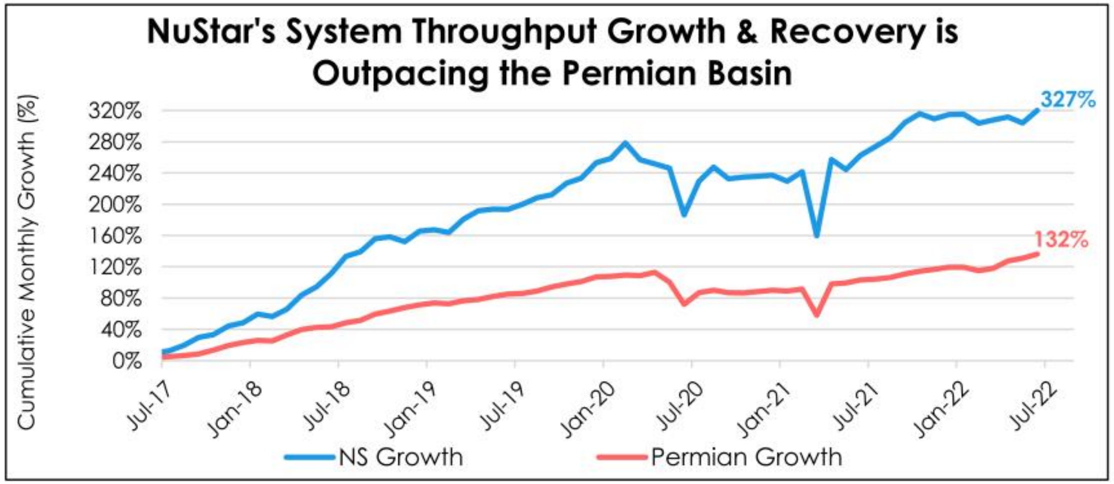
Crude Supply/Export

The Permian Basin is Leading the U.S. Shale Rebound, With Our Permian System Continuing to Outperform

- Because of its superior geology and low breakeven costs, the Permian Basin's shale production:
  - Exited 2021 at 5.1 MMBPD, representing approximately 55% of the nation's total shale output
  - Is projected to exit 2022 at 6.2 MMBPD, representing 22% growth compared to 2021 exit
- As of July, our system's throughput volumes are now up 49% above Covid lows, while the rest of the Permian is up 35% from Covid lows
- We expect to exit 2022 between 560 and 570 MBPD, which is 10% higher than our 2021 exit of ~520 MBPD







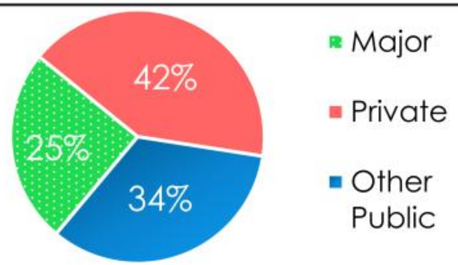
Source: Rystad, ESAI

Crude Supply/Export

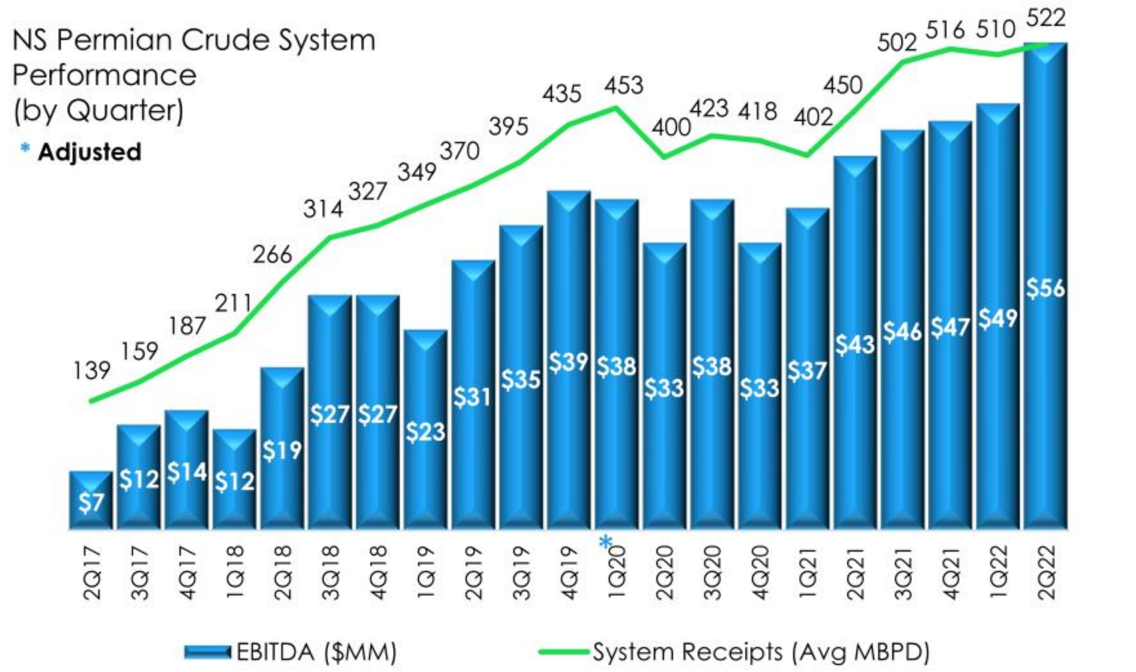
Our "Core of the Core" Location has Attracted Top-tier Customers Whose Activity is Supporting Steady Growth

- The quality of geological formations underlying our system attracts the strongest customers
  - ~67% of our system's revenue is generated from investment-grade (IG) rated and Non-IG BB-rated entities[1]
- We averaged 522 MBPD in 2Q22 (our best quarter since we acquired the system in 2017)
  - In June and July, we averaged 535 MBPD and 555 MBPD, respectively
- Our producers have averaged around 20-25 rigs throughout 2022, which provide an important platform for growth

NS System Producer-type[2] (% Average Daily Volume)



Producer Average Cost of Debt, Weighted by Acreage: 5.5%[3]



Please see Appendix for reconciliations of non-GAAP financial measures to their most directly comparable GAAP measures

1 – For the six months ended June 30, 2022
2 – For the month ended June 30, 2022
3 – As of August 11, 2022

Producers in the Basin Are Once Again Bullish on Permian Growth, Strength & Resiliency

ExxonMobil

"As global demand recovers, we continued to invest in our portfolio and grew our year-to-date production in the Permian by about 130,000 oil equivalent barrels per day versus the first half of 2021. **For the full year in the Permian, we expect to achieve 25% production growth for the second consecutive year.**"

OXY

"**Our Permian production delivery remains very strong, with a growth of approximately 100,000 BOE per day** when comparing the fourth quarter of 2021 to our implied production guidance for the fourth quarter of 2022. **We expect production in the second half of 2022 to average approximately 1.2 million BOE per day, which is notably higher than the first half of the year.**"

Chevron

"**Two of our Midland Basin** sites recently earned the highest ratings from Project Canary's independent certification program. **Production is at record levels and growing, in-line with guidance**, with our royalty position providing a distinct financial advantage for our shareholders."

ConocoPhillips

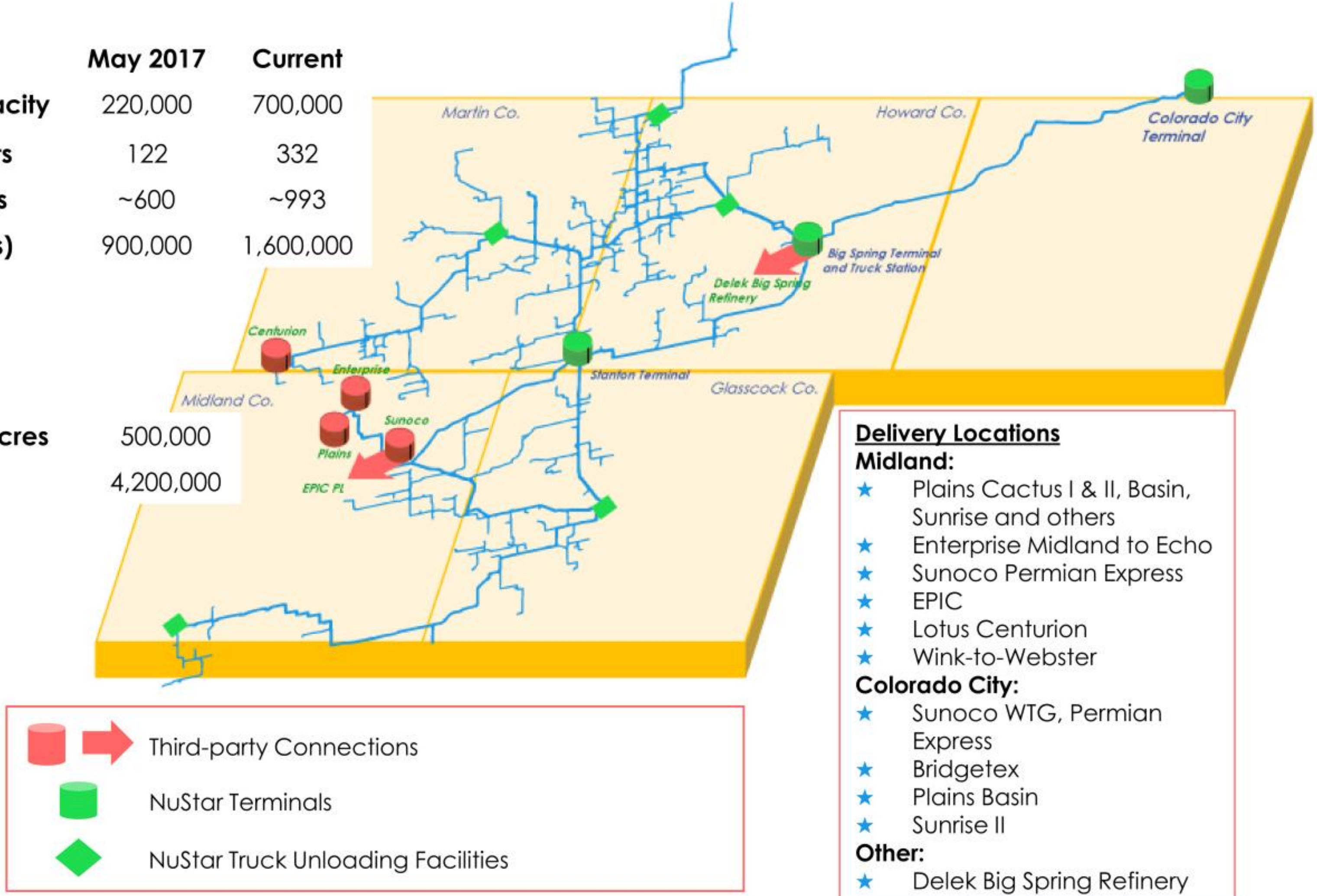
"In general, the production in both the Lower 48 and in the Permian is back half-weighted, and we expect low-single digit growth year-over-year on a pro forma basis. **But on an entry to exit basis, we expect Lower 48 to grow in the mid-to high-single digits, with the Permian at the higher end of that range.**"

Source: 2Q 2022 Earnings Call Transcripts/Press Releases

We are Investing in Our Permian System in Pace With Our Producers' Growth

	May 2017	Current
System Capacity	220,000	700,000
Receipt Points	122	332
Pipeline Miles	~600	~993
Storage (bbls)	900,000	1,600,000

Dedicated Acres	500,000
AMI	4,200,000



Delivery Locations

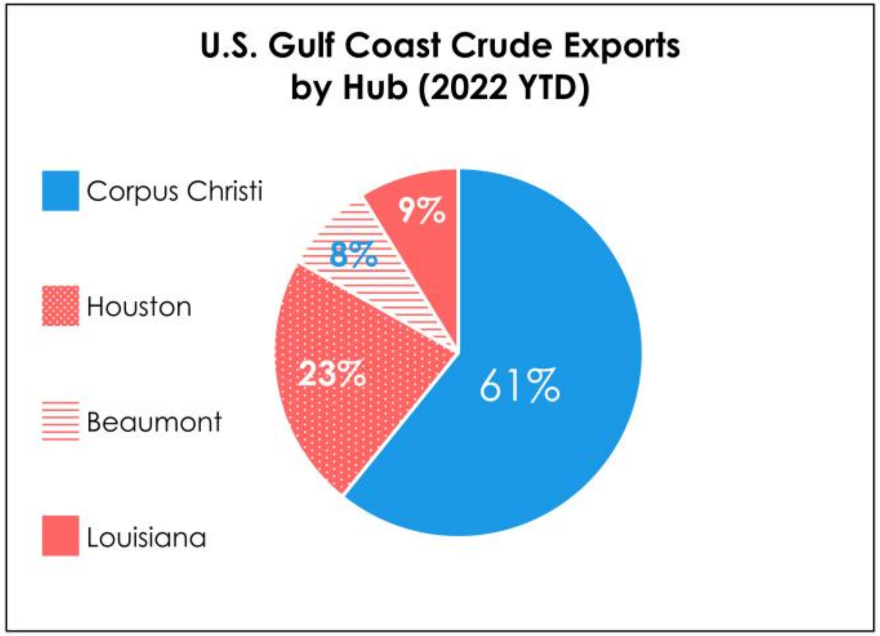
Midland:
- Plains Cactus I & II, Basin, Sunrise and others
- Enterprise Midland to Echo
- Sunoco Permian Express
- EPIC
- Lotus Centurion
- Wink-to-Webster

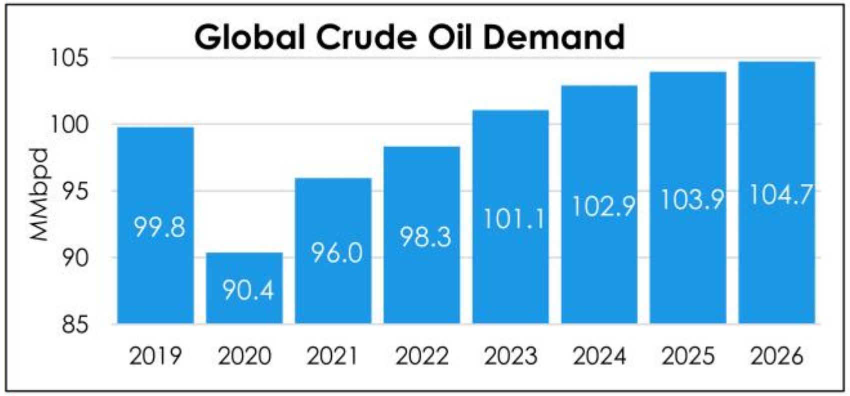
Colorado City:
- Sunoco WTG, Permian Express
- Bridgetex
- Plains Basin
- Sunrise II

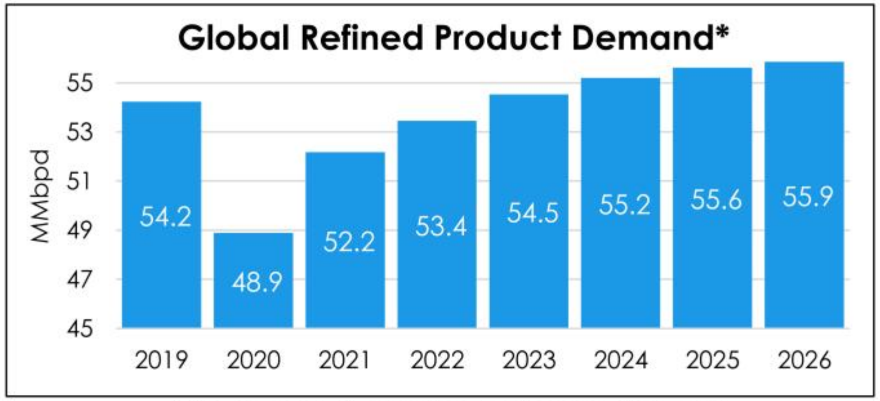
Other:
- Delek Big Spring Refinery

As Global Demand Recovers in 2022, Corpus Christi is Expected to be the Export Hub Best Positioned to Benefit From Future Growth

- ★ Corpus Christi has remained the dominant Gulf Coast crude exports hub since 2020, currently capturing 61% of the U.S. Gulf Coast's total export volumes
- ★ So far this year, recovering global demand and the ongoing war in Ukraine have increased U.S. Gulf Coast exports to pre-pandemic levels
- ★ Improved global refined product demand should continue to lead the way to further recovery in global crude demand







*Comprised of gasoline and diesel demand

Source: RBN Energy, ESAI

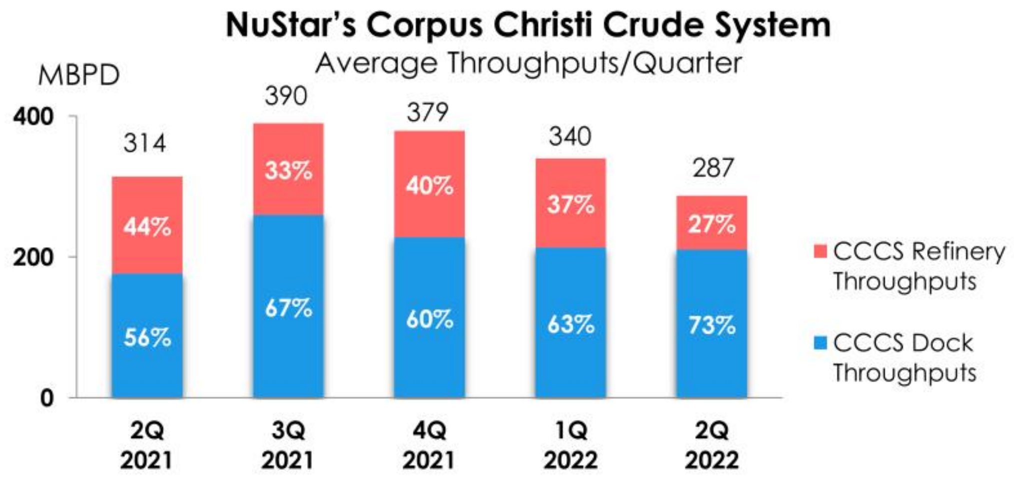
Crude Supply/Export

Our Corpus Christi Crude System's MVCs- for Export and Local Refinery Supply- Provide Strength & Stability

- The heart of our Corpus Christi Crude System (CCCS) is our North Beach Terminal, which receives barrels from our South Texas Crude Oil Pipeline System, our 12" Three Rivers Supply Pipeline and our 30" pipeline from Taft, as well as from third-party pipeline connections
- In July 2022, we extended our MVC contract with Trafigura for an additional year and a half, through December 2024

In-bound Capacity	***Storage Capacity***	***Outbound Capacity***
TOTAL: 1.2MMBPD • South Texas Crude System 16" Pipeline - 240MBPD • Taft 30"- 720MBPD and expandable • Harvest 16" Pipeline - 240MBPD	TOTAL: 3.9MMbbl • *Potential expansion 0.4MMbbl*	TOTAL: 1.2MMBPD • Export Docks- 750MBPD to 1.0MMBPD • Refinery Supply- 220MBPD

- Unlike most other midstream operators in the Port of Corpus Christi, NuStar provides unparalleled optionality for marine exports *and* extensive connectivity to local refineries
- U.S. shale production growth and improving global demand will drive the recovery and growth in our CCCS volumes



In 2022, We Will Continue to Focus on NuStar's Strategic Priorities Across Our Business

Our Strategic Priorities:

1. Optimizing Our Business to Increase Cash Flow
2. Reducing Our Debt
3. Promoting Our ESG Excellence

NuStar

APPENDIX

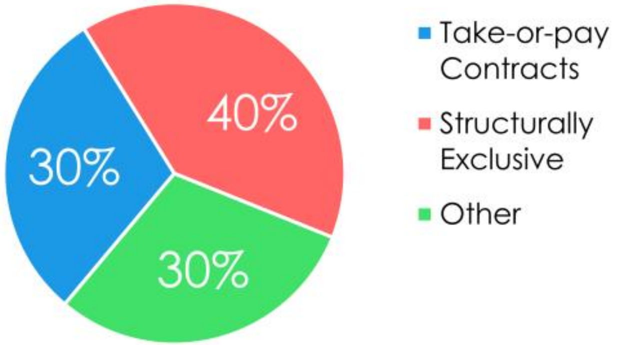
NuStar By-the-numbers

- Common Unit Price[1]: $15.04
- Distribution/CU/Year: $1.60
- Yield[1]: 10.6%
- Market Cap[1]: ~$1.7 billion
- Credit Ratings:
  - *Moody's: Ba3 (Stable)*
  - *S&P: BB- (Stable)*
  - *Fitch: BB- (Stable)*
- Enterprise Value[1]: ~$6.1 billion
- Total Assets: ~$5.0 billion
- Pipeline Miles: ~10,000
- Pipeline Volumes[2]: 1.8MMBPD
- Storage Capacity: ~49MMB
- Storage Throughput Volumes[2]: 396MBPD

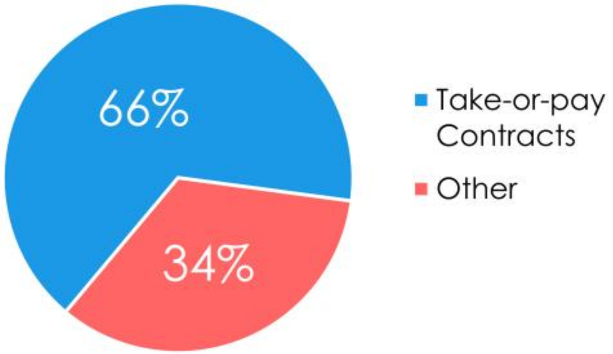
1. As of August 12, 2022
2. Average daily volume for the quarter ended June 30, 2022

Long-term Commitments From Creditworthy Customers

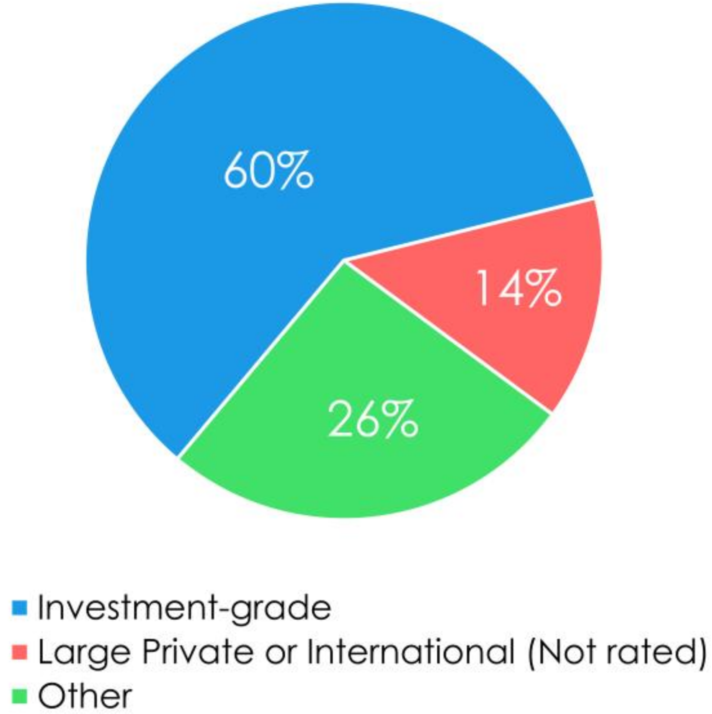
Pipeline Segment Contracted[1] Revenues
(% 2022 Forecast – as of 2Q22)



Storage Segment Contracted Revenues
(% 2022 Forecast – as of 2Q22)



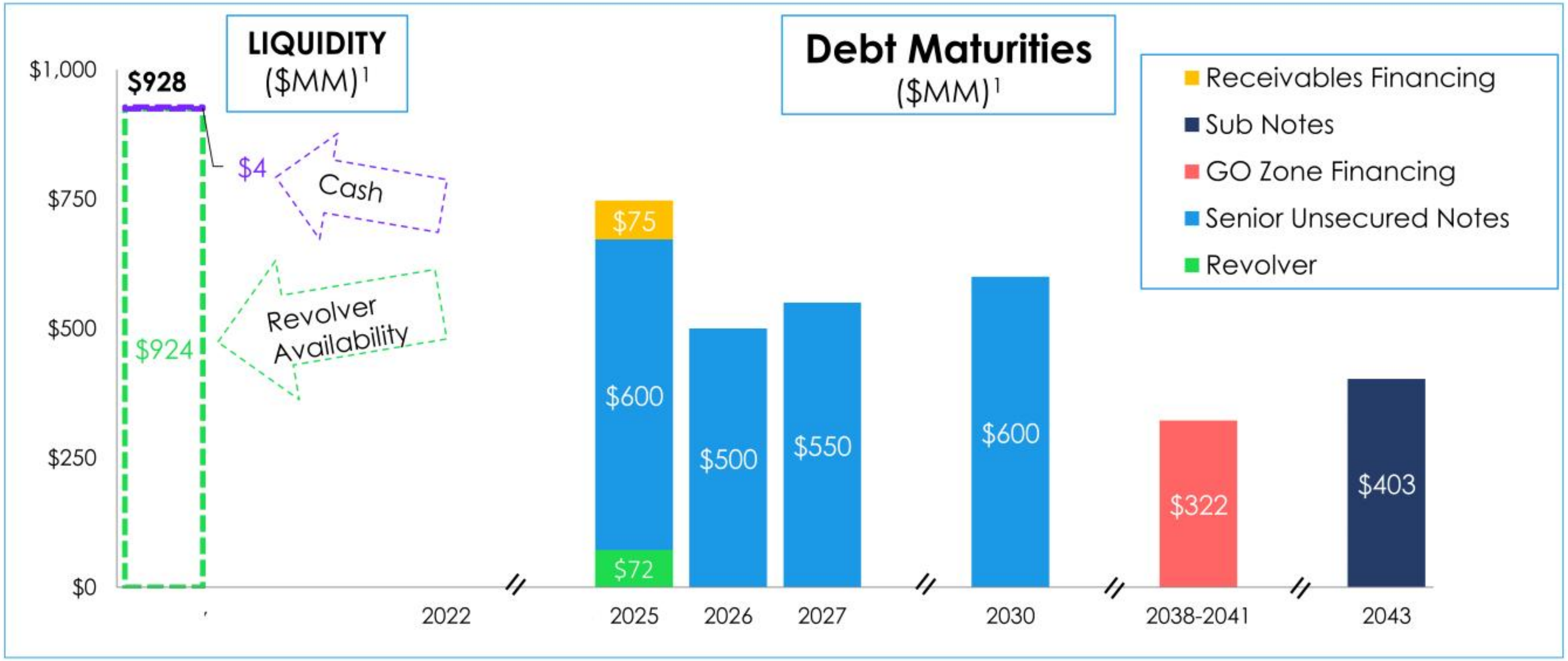
NuStar Investment-grade Customers
(% Pipeline/Storage 2022 Revenues)



1 - Committed through take or pay contracts or through structural exclusivity (uncommitted lines serving refinery customers with no competition)

Liquidity and Debt Maturity Schedule

- In January 2022, we extended the term our $1.0 billion revolver through April 2025 and our receivables financing agreement through January 2025
- We utilized proceeds from recent asset sales to pay-off bond maturities and further reduce debt balances
- We now have *over $900 million* available on our revolver, and our debt maturity runway is cleared until 2025



1 – Balances as of June 30, 2022

Capital Structure as of June 30, 2022 ($ in Millions)

$1.0B Credit Facility	$ 72
NuStar Logistics Notes (5.625%)	550
NuStar Logistics Notes (5.75%)	600
NuStar Logistics Notes (6.00%)	500
NuStar Logistics Notes (6.375%)	600
NuStar Logistics Sub Notes	403
GO Zone Bonds	322
Receivables Financing	75
Finance Lease Liability	56
Other	(37)
Total Debt	**$3,141**

Common Equity and AOCI	$ 188
Series A, B and C Preferred Units	756
Series D Preferred Units	626
Total Equity[1]	**1,570**
Total Capitalization	**$4,711**

★ **As of June 30, 2022:**

- Credit facility availability ~$924MM
- Debt-to-EBITDA ratio[2] 3.93x

1 - Total Equity includes Partners' and Mezzanine Equity (Series D Preferred Units)
2 - Please see Appendix for reconciliations of non-GAAP financial measures to their most directly comparable GAAP measures

Reconciliation of Non-GAAP Financial Information

NuStar Energy L.P. utilizes financial measures, such as earnings before interest, taxes, depreciation and amortization (EBITDA), distributable cash flow (DCF) and distribution coverage ratio, which are not defined in U.S. generally accepted accounting principles (GAAP). Management believes these financial measures provide useful information to investors and other external users of our financial information because (i) they provide additional information about the operating performance of the partnership's assets and the cash the business is generating, (ii) investors and other external users of our financial statements benefit from having access to the same financial measures being utilized by management and our board of directors when making financial, operational, compensation and planning decisions and (iii) they highlight the impact of significant transactions. We may also adjust these measures and/or calculate them based on continuing operations, to enhance the comparability of our performance across periods.

Our board of directors and management use EBITDA and/or DCF when assessing the following: (i) the performance of our assets, (ii) the viability of potential projects, (iii) our ability to fund distributions, (iv) our ability to fund capital expenditures and (v) our ability to service debt. In addition, our board of directors uses EBITDA, DCF and a distribution coverage ratio, which is calculated based on DCF, as some of the factors in its compensation determinations. DCF is used by the master limited partnership (MLP) investment community to compare partnership performance. DCF is used by the MLP investment community, in part, because the value of a partnership unit is partially based on its yield, and its yield is based on the cash distributions a partnership can pay its unitholders.

None of these financial measures are presented as an alternative to net income, or for any periods presented reflecting discontinued operations, income from continuing operations. They should not be considered in isolation or as substitutes for a measure of performance prepared in accordance with GAAP.

Reconciliation of Non-GAAP Financial Information (continued)

The following is a reconciliation of net income (loss) to EBITDA, DCF, adjusted DCF, excess adjusted DCF and excess adjusted DCF over strategic capital expenditures (in thousands of dollars, except percentage data):

	Year Ended December 31, 2021	Year Ended December 31, 2020
Net income (loss)	$ 38,225	$ (198,983)
Interest expense, net	213,985	229,054
Income tax expense	3,888	2,663
Depreciation and amortization expense	274,380	285,101
EBITDA	530,478	317,835
Interest expense, net	(213,985)	(229,054)
Reliability capital expenditures	(40,266)	(38,572)
Income tax expense	(3,888)	(2,663)
Long-term incentive equity awards (a)	11,959	9,295
Preferred unit distributions	(127,399)	(124,882)
Goodwill impairment losses	34,060	225,000
Other impairment losses	154,908	—
Other items (b)	(12,833)	36,967
DCF	$ 333,034	$ 193,926
Loss on extinguishment of debt	—	141,746
Adjusted DCF	$ 333,034	$ 335,672
Less: distributions applicable to common limited partners	175,470	174,873
Excess adjusted DCF	$ 157,564	$ 160,799
Strategic capital expenditures	$ 140,867	$ 159,507
Excess adjusted DCF over strategic capital expenditures	112 %	101 %

(a) We intend to satisfy the vestings of these equity-based awards with the issuance of our common units. As such, the expenses related to these awards are considered non-cash and added back to DCF. Certain awards include distribution equivalent rights (DERs). Payments made in connection with DERs are deducted from DCF.

(b) For the year ended December 31, 2021, other items includes gains from insurance recoveries of $14.9 million related to damage caused by a fire in 2019 at our Selby terminal. For year ended December 31, 2020, other items includes a $34.7 million non-cash loss from the sale of our Texas City terminals in December 2020.

Reconciliation of Non-GAAP Financial Information (continued)

The following is a reconciliation of EBITDA to EBITDA, excluding the Point Tupper terminal and the Eastern U.S. terminals, which were sold in April 2022 and October 2021, respectively (in thousands of dollars).

	Three Months Ended June 30, 2022	Three Months Ended June 30, 2021
EBITDA	$ 175,134	$ 189,378
Divested assets:		
Operating (loss) income	$ (14)	$ 2,245
Depreciation and amortization expense	—	7,817
Other income, net	1,608	292
EBITDA of divested assets	$ 1,594	$ 10,354
EBITDA, excluding divested assets	$ 173,540	$ 179,024

The following is a reconciliation of net income to EBITDA and adjusted EBITDA (projected, in thousands of dollars):

	Projected for the Year Ended December 31, 2022
Net income	$ 193,000 - 226,000
Interest expense, net	205,000 - 215,000
Income tax expense	2,500 - 4,500
Depreciation and amortization expense	255,000 - 260,000
EBITDA	655,000 - 705,500
Gain on sale	(1,600)
Impairment loss	46,100
Adjusted EBITDA	$ 700,000 - 750,000

Reconciliation of Non-GAAP Financial Information (continued)

The following is the reconciliation for the calculation of our Consolidated Debt Coverage Ratio, as defined in our revolving credit agreement (the Revolving Credit Agreement) (in thousands of dollars, except ratio data):

	For the Four Quarters Ended June 30, 2022	Year Ended December 31, 2021	Year Ended December 31, 2020
Operating income	$ 190,045	$ 236,454	$ 209,102
Depreciation and amortization expense	262,228	274,380	285,101
Goodwill impairment losses	34,060	34,060	225,000
Other impairment losses	201,030	154,908	—
Equity awards (a)	13,801	14,209	11,477
Pro forma effects of dispositions (b)	(10,077)	(22,710)	(9,102)
Other	481	1,762	(2,496)
Consolidated EBITDA, as defined in the Revolving Credit Agreement	$ 691,568	$ 693,063	$ 719,082
Long-term debt, less current portion of finance leases	$ 3,137,275	$ 3,183,555	$ 3,593,496
Finance leases (long-term)	(51,959)	(52,930)	(54,238)
Net fair value adjustments, unamortized discounts and unamortized debt issuance costs	35,924	38,315	42,382
NuStar Logistics' floating rate subordinated notes	(402,500)	(402,500)	(402,500)
Available Cash Netting Amount, as defined in the Revolving Credit Agreement	—	—	(128,625)
Consolidated Debt, as defined in the Revolving Credit Agreement	$ 2,718,740	$ 2,766,440	$ 3,050,515
Consolidated Debt Coverage Ratio (Consolidated Debt to Consolidated EBITDA)	3.93x	3.99x	4.24x

(a) This adjustment represents the non-cash expense related to the vestings of equity-based awards with the issuance of our common units.

(b) For the four quarters ended June 30, 2022, this adjustment represents the pro forma effects of the dispositions of the Point Tupper and Eastern U.S. terminals. For the year ended December 31, 2021, this adjustment represents the pro forma effects of the disposition of the Eastern U.S. terminals. For the year ended December 31, 2020, this adjustment represents the pro forma effect of the disposition of the Texas City terminals.

Reconciliation of Non-GAAP Financial Information (continued)

The following are reconciliations of operating (loss) income to EBITDA and if applicable, adjusted EBITDA, for the Permian Crude System (in thousands of dollars):

	Three Months Ended						
	June 30, 2017	Sept. 30, 2017	Dec. 31, 2017	Mar. 31, 2018	June 30, 2018	Sept. 30, 2018	Dec. 31, 2018
Operating (loss) income	$ (3,424)	$ 1,050	$ 650	$ (1,847)	$ 3,605	$ 11,546	$ 10,878
Depreciation and amortization expense	10,227	11,005	13,165	13,477	15,059	15,235	16,589
EBITDA	$ 6,803	$ 12,055	$ 13,815	$ 11,630	$ 18,664	$ 26,781	$ 27,467

	Three Months Ended						
	Mar. 31, 2019	June 30, 2019	Sept. 30, 2019	Dec. 31, 2019	Mar. 31, 2020	June 30, 2020	Sept. 30, 2020
Operating income (loss)	$ 5,358	$ 13,543	$ 17,280	$ 21,132	$ (106,476)	$ 14,481	$ 17,627
Depreciation and amortization expense	17,647	17,182	18,114	18,154	18,606	18,928	20,115
EBITDA	$ 23,005	$ 30,725	$ 35,394	$ 39,286	(87,870)	$ 33,409	$ 37,742
Goodwill impairment loss					126,000		
Adjusted EBITDA					$ 38,130		

	Three Months Ended						
	Dec. 31, 2020	Mar. 31, 2021	June 30, 2021	Sept. 30, 2021	Dec. 31, 2021	Mar. 31, 2022	June 30, 2022
Operating income	$ 13,523	$ 16,912	$ 22,767	$ 25,515	$ 26,901	$ 28,545	$ 35,482
Depreciation and amortization expense	19,579	19,694	19,843	20,035	20,013	20,328	20,465
EBITDA	$ 33,102	$ 36,606	$ 42,610	$ 45,550	$ 46,914	$ 48,873	$ 55,947

NuStar Contact Information

INVESTOR RELATIONS

(210) 918-INVR (4687)
InvestorRelations@NuStarEnergy.com

SUSTAINABILITY

Sustainability@NuStarEnergy.com

And for additional information about corporate sustainability at NuStar, visit https://sustainability.nustarenergy.com/