SERVING EQUIPMENT MANAGEMENT PROFESSIONALS FOR OVER A QUARTER OF A CENTURY

Equipment Management Conference & Exhibition

February 25 – 27, 2018

The Vinoy Renaissance St. Petersburg Resort & Golf Club • St. Petersburg, FL

PRESENTATIONS

ELFA
EQUIPMENT LEASING AND FINANCE ASSOCIATION

EQUIPMENT LEASING AND FINANCE ASSOCIATION
Equipping Business for Success

2018 EQUIPMENT LEASING AND FINANCE ASSOCIATION

PATRICK J. MAZZANTI

DISCLAIMER

- ALL OPINIONS ARE RAA ONLY
- NO ENDORSEMENT OF ANY MANUFACTURER OR COMPANIES

RAA IS NOT RESPONSIBLE FOR ANY DECISIONS BASED ON THIS PRESENTATION

RAILROAD APPRAISAL ASSOCIATES

- FOUNDED 1976
- OLDEST RAIL SPECIFIC APPRAISAL FIRM
- FULL INSPECTION SERVICE
- MANAGEMENT CONSULTING
- MEMBER EQUIPMENT APPRAISERS ASSOCIATION OF NORTH AMERICA - EAANA

AGENDA

- GENERAL OVERVIEW OF MARKET
- RAILCAR PRODUCTION
- RAILCAR SEGMENT OUTLOOK
  - OIL / ETHANOL / SAND MARKET
- LEASING MARKET
- Q & A

THEN AND NOW

2014

- 1.546 MILLION RAILCARS
- 267,000 IDLE – 17% OF FLEET
- TANK CAR REGULATION LOOMING
- PROJECTED BUILD 60K FOR 4 YEARS
- MARRIED 31 YEARS

2018

- 1.641 MILLION RAILCARS
- 305,624 IDLE – 18.6% OF FLEET
- TANK CAR MARKET UNCERTAIN
- PROJECTED BUILD 40K > 60K 2021
- STILL MARRIED

FEBRUARY 1, 2018 STORAGE STATISTICS

	Fleet	Storage	% Fleet	% of Storage	DEC16 Storage
Covered Hopper Cars	552,626	87,289	16%	29%	97,038
Tanks	408,748	101,533	25%	33%	114,606
Gondolas	214,945	41,545	19%	14%	52,764
Open Top Hoppers	139,542	39,388	28%	13%	33,122
Flats, Intermodal	201,158	17,486	9%	6%	26,450
Box Cars	107,478	14,409	13%	5%	18,528
Miscellaneous	17,385	3,974	23%	1%	4,739
Total	1,641,882	305,624	19%	100%	347,257

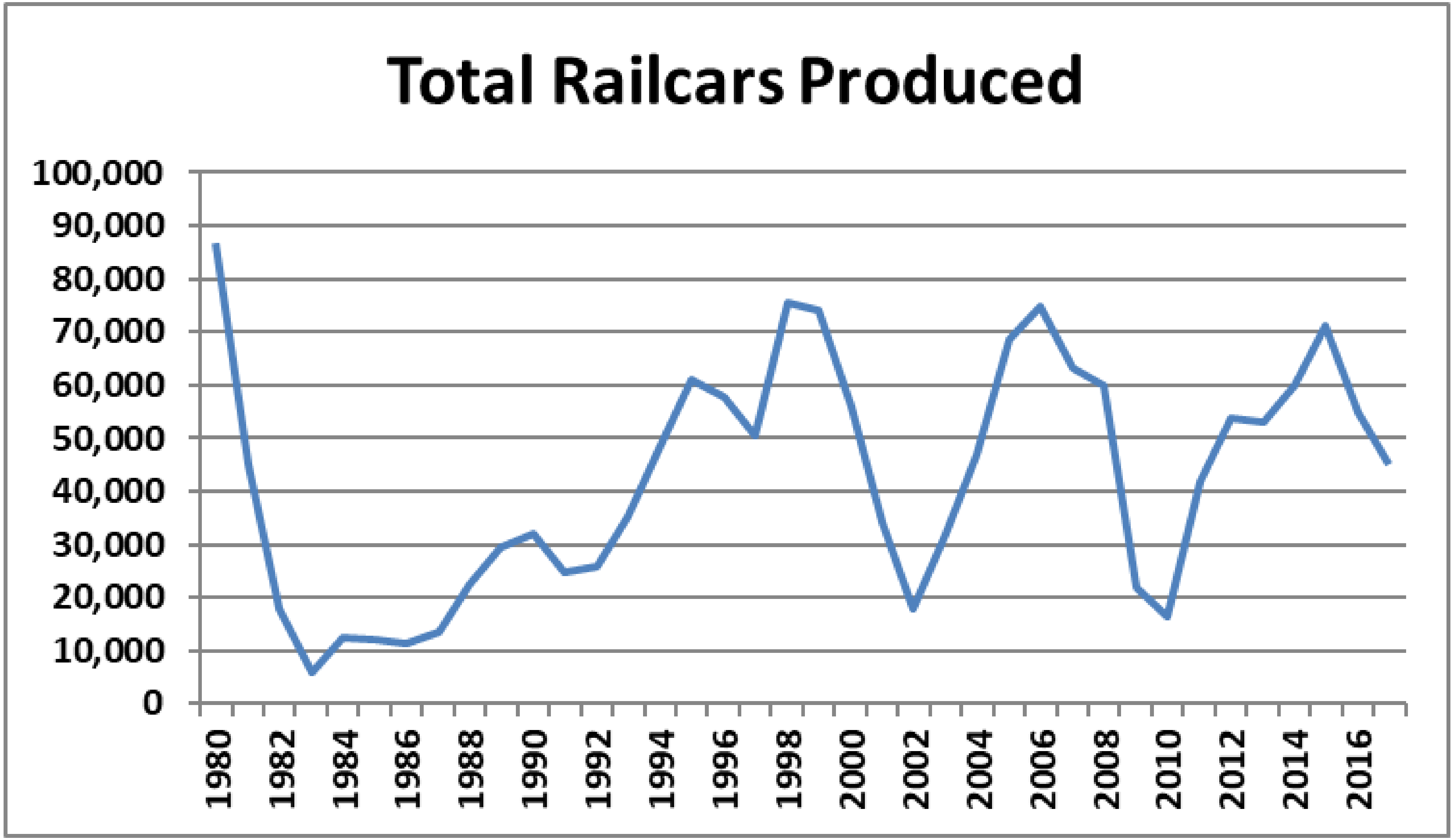
THEN AND NOW

2014

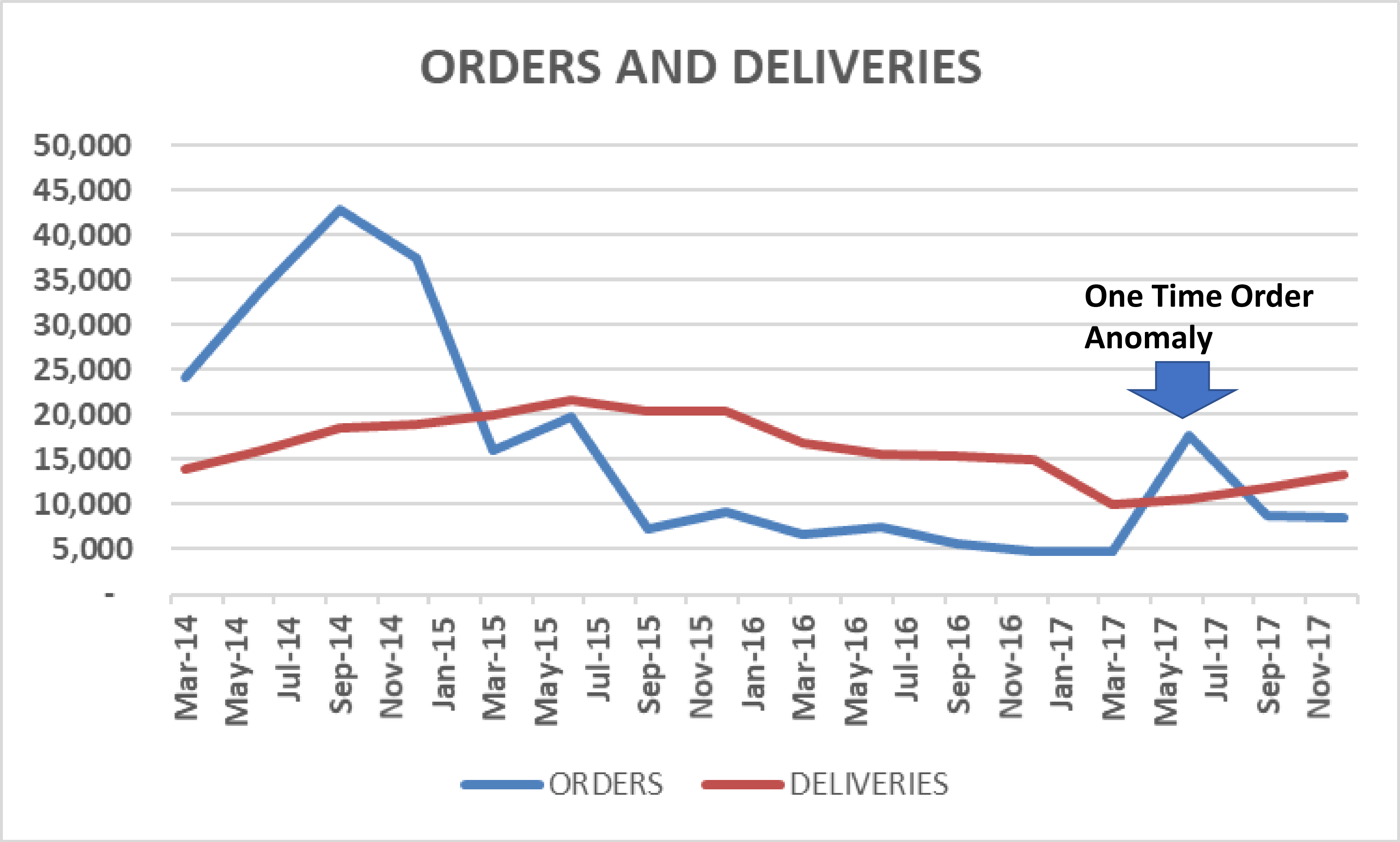
- 56,000 RAILCARS DELIVERED IN 2013
- TANK CARS - PRIMARILY OIL RELATED
- 73,000 UNIT BACKLOG AND GROWING

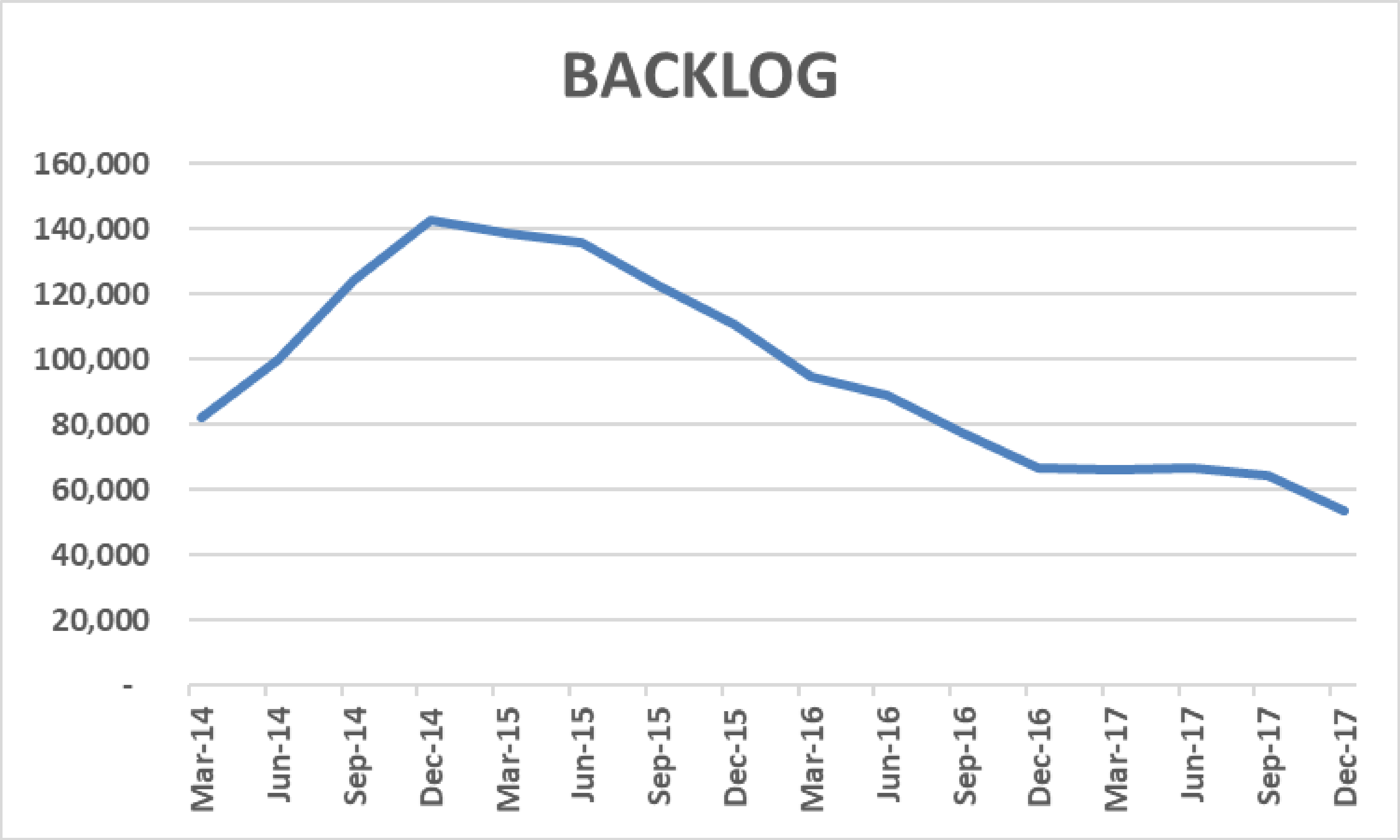
2018

- 45,000 RAILCARS DELIVERED IN 2017
- COVERED HOPPERS 53%
- TANK CARS 25%
- 58,000 UNIT BACKLOG AND SLOWING
- RECENT PRICE DECREASES



Total Railcars Produced
100,000
90,000
80,000
70,000
60,000
50,000
40,000
30,000
20,000
10,000
0
1980
1982
1984
1986
1988
1990
1992
1994
1996
1998
2000
2002
2004
2006
2008
2010
2012
2014
2016


ORDERS AND DELIVERIES
50,000
45,000
40,000
35,000
30,000
25,000
20,000
15,000
10,000
5,000
-
Mar-14
May-14
Jul-14
Sep-14
Nov-14
Jan-15
Mar-15
May-15
Jul-15
Sep-15
Nov-15
Jan-16
Mar-16
May-16
Jul-16
Sep-16
Nov-16
Jan-17
Mar-17
May-17
Jul-17
Sep-17
Nov-17
One Time Order
Anomaly
ORDERS
DELIVERIES


BACKLOG
160,000
140,000
120,000
100,000
80,000
60,000
40,000
20,000
-
Mar-14
Jun-14
Sep-14
Dec-14
Mar-15
Jun-15
Sep-15
Dec-15
Mar-16
Jun-16
Sep-16
Dec-16
Mar-17
Jun-17
Sep-17
Dec-17

DECEMBER 2017 BACKLOG – 58,275

Over 5000	6,147	11%
3500-5000	7,094	12%
Under 3500	17,605	30%
Covered Hoppers	30,846	53%
Open Top Hoppers	917	2%
Mill	1,655	3%
Steel Rotary	504	1%
Alum. Rotary	-	0%
Gondolas	2,159	4%
Tank Cars	16,612	29%
Boxcars	3,636	3%
Flat Cars	2,524	4%
Intermodal	3,636	6%

TANK CAR MARKET

- SOME BUILDING IN UNDER 23,000 GALLON MARKET
- MOST BUILDING IN 28,000 GALLON PLUS MARKET
- SOME BUILDING IN PRESSURIZED TANK CARS – LPG

- DOT 117 IS MAJORITY OF NEW TANK BUILD
  - WILL ACCELERATE AS WE MOVE TOWARDS 2023

OIL / ETHANOL TANK CARS

- NEW REGULATORY REGULATIONS – IN GENERAL
  - ALL OIL RAILCARS BY 2020
  - ALL ETHANOL RAILCARS BY 2023

- CURRENT FLEET – IN USE DECEMBER 2017
  - CBR 17,000   (PEAK 55,000) – 77% 1232, 18% DOT 117 (33% 117 RETROFITS)
  - ETHANOL FLEET 36,000 - 71% DOT 111, 9% 1232, 20% DOT 117
  - CBR / ETHANOL 13,000 RETROFIT 117R CARS IN 2017

TANK CAR TAKEAWAYS

- EXPECT SCRAPPING/RE-PURPOSING IN NEXT SEVERAL YEARS
  - ~ 25,000 DOT 111 NON-JACKETED TANKS
  - ~ 8,000 DOT 111 JACKETED TANKS

- WE NEED TO REPLACE ~20,000 DOT 111 ETHANOL CARS
- CBR BUILD IS DOT 117 – HOW MANY RETROFITS IN THE MIX

TANK CAR MARKET UNCERTAINTY IS CAUSED BY:

- OUTCOME OF PIPELINE LITIGATION – WHAT SIZE IS FLEET IN 2025
- FARM SUBSIDIES – WILL THEY SUPPORT FUTURE ETHANOL BLENDING
- OIL PRICES – GREAT AT $60 AND STABLE
- SLOW MARKET RETROFIT RESPONSE

SAND COVERED HOPPER CARS

- 2014/2015 PRICES CLIMB TO $85,000 PER RAILAR
- OVERBUILD
- DECEMBER 2016 25,000 CARS IN STORAGE
- PRICES DROP TO $70,000 PER RAILCAR
- NEW TECHNOLOGY AND RISE IN OIL PRICES
- APRIL 2017 BUILD IS BACK ON
- NEW CAR PRICE AROUND $75,000 TODAY

2009-2017 BUILD ~85,000 SAND HOPPERS

WHY?

- MORE SAND PER WELL HEAD
- INCREASED OIL PRICES
- SWITCH FROM EXPLORATION TO EXTRACTION

- PRICE DROP DUE TO MANUFACTURER DESIRE TO PRODUCE COUPLED WITH REDUCED DEMAND

SAND CAR MARKET CONCERNS

- LOCAL SOURCING OF FRAC SAND WILL HAVE IMPACT
- INCREASED OIL PRICES
- MANUFACTURER DISCIPLINE
- US INFRASTRUCTURE PLAN (CEMENT CARS)

RAA WATCHING FOR SIGNS OF OVERBUILD

IT MAY BE HERE ALREADY

OTHER CAR TYPES

HOT

- BULKHEAD FLATS
- GENERAL FLATS

LUKE WARM

- PD COVERED HOPPERS
- SPECIALTY COVERED HOPPERS
- ARTICULATED AUTO CARRIERS
- PLASTIC PELLET CARS

REPLACEMENT

- GRAIN COVERED HOPPERS
- MILL GONDOLAS
- BOXCARS
- AGGREGATE HOPPER CARS

COLD

- COAL CARS – GONDOLAS AND OPEN TOP HOPPERS
- LOCOMOTIVES

LEASING ENVIRONMENT

- IN GENERAL – RATES REMAIN DEPRESSED BUT STABLE

- SAND CARS – DROPPED TO $150 - BACK TO $450 PLUS
- OIL CARS – DROPPED TO $450 – BACK TO $750+
- ETHANOL RAILCARS DROPPED TO $150 – BACK TO $500+
- COAL GONDOLAS/HOPPERS - $100 NET IF LUCKY
- HIGHER RATES GO TO RELATIONSHIP BASED LESSORS

RFC SURVEY 2018 BIGGEST INDUSTRY CONCERN

SUCCESS IN THE RAILCAR MARKET

- **LONG TERM VISION** **-** LONG TERM VALUE SHORT TERM CYCLES
- **FLEET STRATEGY –** DIVERSIFICATION, TRANSACTIONAL, SPECIALIZATION
- **PATIENCE – DO NOT BE REACTIONARY**
- **RECOGNIZE INDIVIDUAL RAILCAR DRIVERS**
  - ECONOMIC USEFUL LIFE AND CONDITION OF RAILCAR
  - REPLACEMENT COST - TECHNOLOGICAL OBSOLESCENCE
  - REGULATORY ENVIRONMENT
  - CAR SUPPLY/DEMAND
  - COMMODITY
  - ALTERNATIVE USE

RAA BIGGEST CONCERNS TODAY

- BUILD OF RAILCARS - WATCHING CLOSELY
- MANUFACTURER BASED LEASING COMPANIES
  - MANUFACTURING SUPPORT OR A PROFIT CENTER?
- NEW MARKET ENTRANTS – CHEAP MONEY
- TOO MANY PARTIES CHASING TOO FEW DEALS
- AS DEMAND GOES UP ---- PRICES WILL TOO
- OWNERS WITH PRE-PRICE DECREASE CARS
- **LEASE RATES NEED TO REBOUND BEFORE WE BUILD**

PRESENTATION

- pat@railroadappraisals.com
- PRESENTATION AVAILABLE WEEK OF 3/12/18

- DROP BUSINESS CARD UP FRONT