

# PLASTICS CARS

by David G. Casdorff

Photos courtesy Freight Cars Journal

## ANATOMY OF A MODERN PLASTICS CAR

- ▼ COVERED HOPPER
- ▼ FOUR COMPARTMENTS
- ▼ 5,000+ CU.FT. CAPACITY
- ▼ PNEUMATIC OUTLETS
- ▼ LINED (IF STEEL BODY)
- ▼ AAR CAR TYPE CODE C214

One of the few times I can correctly use a plural version of a word (plastics) in singular construction. Plastics are everywhere today. Since the 1960s, the plastics industry has made quantum leaps. In the United States, it seems everything is made of plastic. The freight-car industry has shared in that growth primarily in the tank and covered hopper car sectors. There are many kinds of plastics. Some forms are liquefied and sent in tank cars as styrene monomers. But, the bulk of plastics are sent as small solid pellets in large covered hopper cars. The freight-car industry often refers to these (appropriately) as “pellet hoppers” or “plastic pellet cars” (although flakes and powders are sometimes transported).

Early plastics cars were only about 3,500 cubic feet. In less than 30 years the sizes have grown to a capacity of over 6,000 cubic feet. Today, the standard is still 5,800 cubic feet with the new high-cube sizes (6,000+) gaining rapidly.

### Modeling the Plastics Cars in HO Scale

Front Range made an ACF 4,650 Center Flow® three-bay (not real common in plastics service, but used). Front Range (later McKean) made a four-bay ACF Center

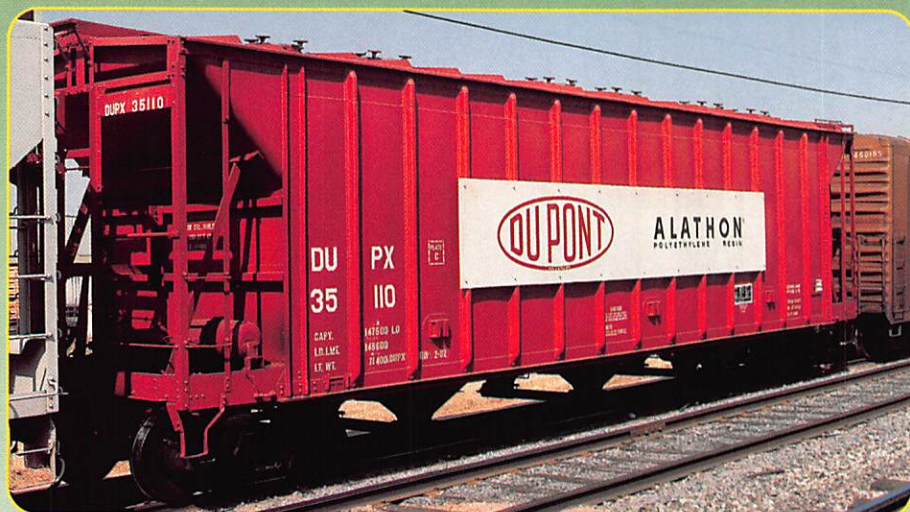


CCBX 58792 is part of the new generation of “high-cube” plastics cars. This one was built by Thrall in 1995. It has a 6,270 cu.ft. capacity. GRL is 286,000 lbs. (110-ton nominal).

Flow® that can be used for the ACF 5701 and 5800 versions (very common) and can

even be modified to the early version of the Thrall 5800. Athearn’s four-bay ACF Center Flow® is good for the 5,250 cu.ft. size (less commonly seen today in plastics service). Overland Models made brass models of the very common straight-sided Pullman-Standard 5,820 cu.ft. capacity car and the less common but very unique looking Richmond Tank Car, a 5,800 cu.ft. capacity car. There is a serious need in the modeling world for a correct (not a “stand-in”) good modern 5800 cu.ft. design, a high-cube steel design and a high-cube aluminum design. The big drawback for marketing these is of course the lack of color. Most modern plastics hoppers are various shades of gray (I love it!).

Additional information can be found in *A Catalog of Modern Plastics Cars* and “High-Cube Plastics Cars” in *Freight Cars Journal* #80. Both are published by the Society of Freight Car Historians, P.O. Box 2480, Monrovia, CA 91017 or E-mail FR8CARS@aol.com.



DUPX 35110 (DUPX 35075-35224) is a 4,000 cu.ft. capacity car seen here in service during August 1984. DUPX is E.I. DuPont de Nemours & Co.





ACFX 36391. A few ACF 5,700 cu.ft. Center Flows® had some color...including this one built in December 1981 leased to American Hoechst. The Front Range/McKean four-bay covered hopper model was close to this car.

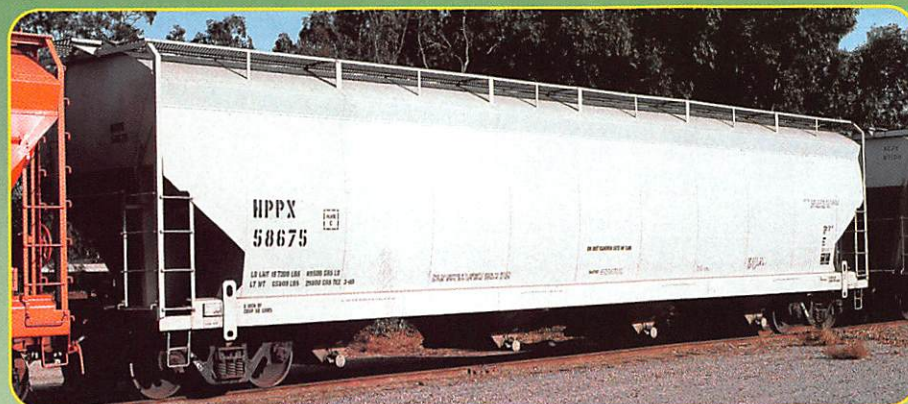


CPIX 2000 was built in December 1981 by ACF. This is a 5,250 cu.ft. capacity (probably the most colorful design size of all the plastics cars). CPIX is currently a reporting mark of ICI Acrylics Inc.

NPCX 7171 is a 5,400 cu.ft. design that was built in December 1981 (notice how many different designs were being offered in 1981 from ACF!). NPCX is currently a reporting mark of Equistar Chemicals, LP.



HPPX 58675. Thrall was one of the first builders to move in on the curved-sided plastics hopper design against ACF (Pullman-Standard, later Trinity was building straight-sided designs at the time). This is an early Thrall 5,800 cu.ft. design that can be identified by the large double-holed rectangular pull-here plates on the sidesill near each end. HPPX is Huntsman Polypropylene Corp.



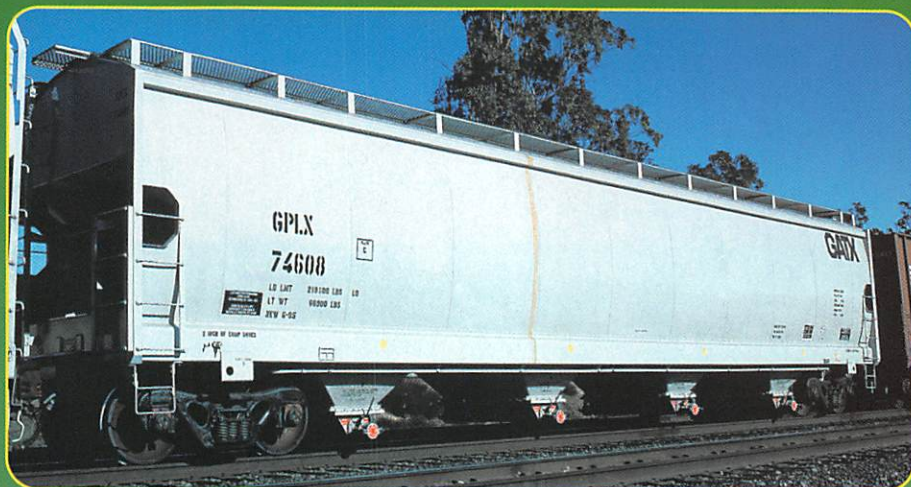
CCBX 50352 was built in November 1962 by Pullman-Standard. Rated at 3,520 cu.ft. — it's one of the first designs used for plastics transport. Seen here, in service, during August 1985. CCBX is Union Carbide.







There have been three major variations in Trinity's 5,851 cu.ft. capacity plastic pellet hopper design. The first two are shown here. GGCX 1006 is the earliest with the full side-sheet length — only a small opening appears behind the fourth rung of the side ladders. The next version, GPLX 74608 has the asymmetrical six-side opening in place of the earlier small opening behind the fourth rung on the ladder. The latest variations have large side-sheet end cuts similar to ACF, Thrall and other designs.



CHVX 896289 is National Steel Car's version of a 5,800 cu.ft. car is their 5,810 cu.ft. design (later becoming a 5,847 cu.ft. design). Notice the large hat-shaped upper sill (where the roof meets the sides, basically) characteristic of the contemporary NSC plastics hopper designs. CHVX is Chevron Chemical Co.

UTCX 59720 is a later version of Thrall's 5,800 cu.ft. design with significant changes in the side sheet end cuts and of course lacks the large pull-her plates. Built February 1992. UTCX is Union Tank Car Co.

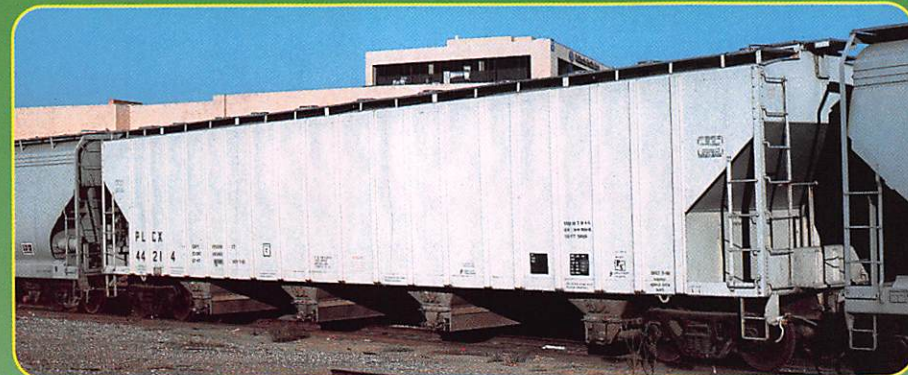






NCLX 44747 exhibits a bright livery for SCLAIR Polyethylene. This is a 4,460 cu.ft. car. Built in November 1968, it's one of the smaller sizes still being used today in plastics service. Photographed January 1996. NCLX is Nova Chemicals Ltd.

TIMX 60300 is a 6,011 cu.ft. capacity aluminum-bodied covered hopper for plastics service. In addition to being lighter, aluminum-bodied cars don't need to be lined. This car was built by Trinity Industries in 1998. So far there have been several hundred of these built. A very distinctive model this would be!



PLCX 44214. This 5,820 cu.ft. car was the big Pullman-Standard plastics hopper design of the '70s/early '80s. It was later built by Trinity in modified forms. Overland Models also made an HO scale model of this design.

DOWX 20124. The other early curved-sided competition for ACF was Richmond Tank Car (later Gulf Railcar) based outside of Houston, TX. This very distinctive design was also made in model form in HO scale brass by Overland Models. DOWX is Dow Chemical Co.



OCPX 71091 is a more contemporary version of ACF's 5,800 cu.ft. design. This one was built in 1994. There are a number of production variations (many subtle) in ACF's 5800s. OCPX is Occidental Chemical Corporation.