

1928 International Harvester Six-Speed Special: Suds-Wagon Supreme

by Thomas Glatch

By the end of the Roaring Twenties, the motor truck—like the automobile—had become an integral part of the American way of life. More than ever, the truck was eliminating its equine competition, and making serious inroads on rail transportation. There were 3,550,000 trucks registered in the U.S. in 1929, compared to 1,108,000 in 1920. Clearly, the era of modern trucking had arrived.

Pneumatic tires were rapidly becoming standard equipment on light- and medium-duty vehicles, permitting significantly higher speeds (and quicker delivery times) compared to the solid rubber tires they replaced. All-weather cabs with steel construction were also making their appearance. And four-wheel brakes, six-cylinder engines, and numerous other developments all helped to popularize trucking in the Twenties.

But motorized transportation remained a paradox. Paved highways and turnpikes allowing speeds above 45 mph were becoming more common, yet unpaved and sometimes impassible back roads still made up the majority of America's road network. As a consequence, trucks needed the ability to both run and crawl.

Enter the International Harvester Six-Speed Special. This innovative machine was one of the first trucks offered that combined the capability of high-speed highway running with the ability to tolerate mile after mile of low-speed, back-road lugging.

International Harvester Corporation—renamed Navistar in 1986—traces its roots to Cyrus Hall McCormick, the son of a Virginia farmer. In 1831, 22-year-old McCormick invented the first agricultural reaper, a product that revolutionized

By 1925, International Harvester was the largest full-line U.S. truck maker. Respected for its many innovations over the years, IH in 1927 debuted the first two-speed rear axle on the Six-Speed Special, marking a giant step forward for high-speed, long-distance trucking.



farming. He patented his invention and opened a Chicago factory in 1847 to produce it. It quickly changed the way of farming, as the *Milwaukee Sentinel* of August 30, 1861, reported: "The harvest is nearly over. The mammoth reapers have passed over the broad grain fields and in a few days done the labor that thousands of strong and sinewy arms could not have accomplished." McCormick's business grew and expanded in the United States, then became international in 1851 when he introduced the reaper to England. International Harvester went on to become one of the world's largest producers of agricultural equipment.

At the turn of the Twentieth century, McCormick Harvesting Machine Company and Deering Harvester Company—both of Chicago—ranked as the two major manufacturers of harvesting machinery. They merged, along with three smaller companies, and named the resulting firm International Harvester Company.

Not surprisingly, International Harvester's association with the agricultural industry led it into the truck business. In 1907, the company introduced a two-cylinder, high-wheeler car, the Auto Buggy. Shortly thereafter, a "grain box" model was offered. Called the Auto Wagon, this simple wagon-like vehicle was designed specifically with the farmer in

The two-speed rear axle, developed by Eaton Corporation and available at first *only* from International Harvester, combined with a three-speed transmission to provide six speeds forward. Standard on the Six-Speed Special (*left*), the combination provided greater flexibility for truckers, particularly at high speeds. This made it ideal for brewers (after Prohibition, of course!) who needed to get their product to market quickly.



Overloading or Over Speeding Will Void Warranty."

The Six-Speed Special was constructed at International's Springfield, Illinois, plant along with other medium-duty trucks. Several models were offered, among them a Depo Wagon. They went virtually unchanged through 1930, but in 1931 load capacity was increased to 1½ tons and the engine was bored, increasing displacement to 185.8 cubic inches and boosting horsepower to 39. Because of its over-the-road flexibility, the Six-Speed Special proved to be one of IH's best-sellers. Of course, beautiful full-color advertising in national publications such as *Saturday Evening Post*, *Life*, *Colliers*, and *Fortune* helped to publicize its virtues, and those of the rest of International Harvester truck line as well.

The brewing industry recognized the advantages of the motor truck over the horse earlier than most businesses. Since the turn of the century, breweries had relied on trucks to deliver their precious cargo. Before the development of efficient refrigeration systems and the introduction of pasteurization, beer had a very short shelf life, and so quick delivery times were of paramount importance to brewers. They were quick to discover that the Six-Speed Special was ideal both for short-distance delivery to local shops and for longer over-the-road destinations.

The Six-Speed Special pictured here, owned by the Joseph Huber Brewing Company of Monroe, Wisconsin, is representative of the type of truck used by the industry after the repeal of prohibition in 1932. It was purchased in 1972 from the now-defunct Peter Hand Brewery of Chicago, along with other assets. Colorfully resplendent, flaunting Huber and Augsburger signboards, this International now serves to promote Huber products at parades and other functions.

Another brewery uses a team of Clydesdale horses to symbolize its heritage. The 132-year-old Joseph Huber Brewing Company would rather use its pretty and innovative International Harvester Six-Speed Special to illustrate its marriage of Old World craftsmanship and modern technology.

The Six-Speed Special (above) was rated at one-ton capacity. Although its 173-cid Waukesha engine turned out only 30 horsepower, the use of pneumatic tires and the two-speed rear axle combined to push the truck to a top speed of over 45 miles per hour—quite good in the days when most roads were still narrow, hilly, and curvy. The closed cab (opposite page), primitive by today's standards, featured roll-down side windows, a fold-out windshield, and a big steering wheel.

mind. The firm claimed that, "It is built as nearly as possible like a buggy. This type of vehicle has been serving country-town and rural people for years, and there is no reason why a simple motor vehicle of this type cannot serve them in the future." The Auto Wagon could haul crops and supplies to and from town, but it could also be used for Sunday jaunts with the family. A total of 4500 of the popular high-wheelers were built between 1907 and 1916. The Auto Wagon had indeed turned out

to be a logical adjunct to International's agricultural products.

International Harvester began producing conventional trucks in 1915. World War I spurred truck development in general, and International Harvester played a large part in the advances made during that period. After the war, International's truck business continued to grow; by 1925, the company was the largest full-line truck producer in the United States. In fact, calendar year registrations showed tremendous advances from 1926-1929: from 14,247 to 16,363 to 26,196 to 31,438. The Depression interrupted the steady growth, of course, but registrations were back up to the 1929 level by 1934 and exceeded 50,000 the following year.

Although International was building trucks with capacities of up to five tons, the emphasis in the spring of 1927 was on the new Series "S" ¾-ton Special Delivery. Wheelbase spanned

116 inches for 1927, but this was stretched to 124 inches for 1928. The Special Delivery was well-built and tough; in late 1927, one traveled 6618 miles from Nairobi to Algiers in 16 days. That it averaged over 400 miles a day and 15 mpg through Africa, including a trek across the Sahara Desert, speaks for itself.

Bowing in mid-1927 was the Six-Speed Special. Although it looked much like the Special Delivery and shared many of its dimensions and engine, this one-ton model differed from any other truck on the road because of a unique drivetrain feature: a revolutionary two-speed rear axle, a product developed and manufactured by Eaton Corporation. Two-speed axles are commonplace on today's trucks, of course, but this was the first time such an axle was offered by any company. Combined with a standard three-speed transmission, the two-speed axle doubled the number

of available forward speeds to six, while the competition could offer nothing more than four forward gears. The result, of course, was greater flexibility at very low or high speeds and a wider selection of intermediate gears.

Power came from a Waukesha Motors model AX four-cylinder engine. The L-head unit featured solid valve lifters and was fed through a Zenith carburetor. A 3.5-inch stroke and a bore of 4.5 inches translated into a displacement of 173 cubic inches and a rather modest output of 30 horsepower at 2700 rpm. Combined with the six-speed drivetrain, this was enough to push the Six-Speed Special to a top speed of over 45 mph, yet IH advertisements showed a loaded Special climbing a 50-percent grade (slowly).

Driver comfort was being given more consideration by manufacturers by this time, and International Har-

vester was no exception. The Six-Speed Special was fitted with an all-weather cab built of sheetmetal over a wooden framework. A fold-out windshield and roll-down glass side windows provided ventilation, while a large-diameter wood-rimmed steering wheel provided leverage for turning the Special, power steering being many years off into the future. It rode on wood-spoke wheels shod with 30 x 5 pneumatic tires. Beefy mechanical brakes on the rear wheels provided the stopping power; four-wheel brakes were only just coming into common usage on trucks.

Although the Six-Speed Special was rated at one ton, the manufacturer's plate on the truck allows for a maximum load of 2215 pounds: 5215 GVW (gross vehicle weight) minus 3000 pounds for "body load and equipment." Nonetheless, International made it clear that limits were not to be exceeded: "CAUTION.