**13-140 Peterson Twin-631B Tamper compactor with Hyster C400B compacting wheels and two singl-axle Caterpillar 631B scraper tractor**



*During the 1960s, Peterson built two different designs of compacting machines based on the single-axle tractor fronts of the 631B scraper. The model shown in March 1966 was the second and last design offered, the Peterson Twin-631B Tamper. This 720-flywheel-horsepower compactor was used at one major dam building project in 1966 and actually outperformed every other machine of its type. But the unit was never sold outright and was eventually dismantled, ECO Collection*

*Eric C. Orlemann, 2000.*

**TWIN-631B TAMPER**

The Twin-63 IB Tamper was another example of Buster building a specialized machine suited to a customer’s particular job requirements. The unit was designed for crews at Atkinson’s Briones Dam contract in California to compact the extremely rocky material they were encountering. Buster’s design called for two single-axle 63IB scraper tractors, minus their scraper bowls. They were placed in line and connected by a large overhead box-section beam. The tires were removed and replaced with Hyster C400B compacting wheels, with 102 tamping feet per drum. Total power output for the rig was 720 flywheelhorsepower. The front of the unit, which was actually the rear of the 63IB tractor, was equipped with a cushioned push-block for scraper loading duties. The operator’s controls were also relocated to the rear of the 63IB tractor, now making it the front. When it started operation in 1963, it looked like the unit was going in reverse, when in fact it was going forward. Caterpillar Research took an interest in Buster’s unconventional design and considered it briefly as a possible “superpusher” for scraper operations. Researchers restored rubber tires to the design and ran it through tests, but the concept was put on hold as soon as Buster’s Quad-Trac D9G tractors became available.

 By March 1966, a more refined design of the Twin6318 Tamper was built by Peterson for use on the Oroville Dam project. The unit was much like the previous design, but now the operator’s controls were in the front of the lead 63IB tractor. The front ends of the 63IB units faced the forward travel of the machine. But the cushioned pushblock was history. This design was intended as a compactor only. In fact, it out performed every other compaction device used on the dam project.

*Источник: www.constructionequipment.com*

**Tandem 631 Stomper and Push-Loader**

“More Power!”—it was a catchphrase in the “Home Improvement” comedy series, but it’s also a demand many contractors make of their construction and mining equipment, pressing manufacturers for machines that can do more in less time. The ways of developing and applying “more power” are extremely varied, however, and the term doesn’t just involve applying more horsepower to a given task.

In 1960, Guy F. Atkinson Co. was awarded the prime contract for Briones Dam, a water-supply project in the hills near Oakland, Calif. The approximately 10 million cubic yards of embankment material involved in the project could be handled by scrapers (a fleet of a dozen 40-cubic-yard Euclid SS-40 models, assisted by eight Cat DW21 scrapers, which were later replaced by 10 more SS-40s). Compacting this material, however, was another matter.

Initially, compaction was done with sheep-foot rollers, a pair of 50-ton pneumatic proof rollers, and a Hyster C410A pad-foot compactor. Cat D-8 crawlers pulled the sheep-foot drums, and DW-21 prime movers drew the Hyster and the proof rollers. But the material contained a significant amount of rock, and the composition of the material defied efforts to compact it to specification.

Buster Peterson, employed by the regional Cat dealer, Peterson Tractor Co., had established a reputation for creating innovative machine designs and making machine modifications in order to resolve difficult problems—and Buster tackled the compaction situation. His solution was the Dual 631 compactor, nicknamed Stomper. The machine consisted of two 631A prime movers and had pad-foot wheels in place of tires. The prime movers were yoked together end to end, with an operator’s station in front and the engines trailing. Its speed and considerable weight were more than enough to deal with compacting the obstinate material on the Atkinson job, and the dam was finished in 1963.

A second such machine was assembled at some point, and in 1963, Atkinson put two machines it termed “631A crusher/compactors” up for sale. Then, from 1963 through 1965, Atkinson used a rubber-tired, tandem 631A push-loader (shown) on the section of California’s San Luis Canal that it built; this machine was listed for sale afterwards.

Peterson went on to build another compactor, the 70-ton Twin 631B Tamper, with both tractors running forward, joined by an entirely redesigned yoke, and rolling on Hyster C400B wheels.

Peterson Tractor’s history book mentions only two Dual 631s, the Briones 631A and the 631B. The origin of the second tandem 631A is a mystery; Peterson surely had a role in it, and the only logical conclusion is that it was omitted from the history and/or assembled by Atkinson using components from Peterson. It’s also logical to conclude that one of the “stompers” was converted to the push loader. Final dispositions of these remarkable machines are unknown.

*Источник: contractormag.co.nz*

**Caterpillar 631B**.

 Весной 1962 года компания Caterpillar запустила большую часть своей новой линейки скреперов с тягачами серии “600". Всего было 11 новых машин, в том числе 631B, рассчитанный на 30 кубических ярдов. 631B был оснащен 6-цилиндровым двигателем Caterpillar с турбонаддувом мощностью 360 лошадиных сил модели D343T, сопряженным с 9-ступенчатой планетарной коробкой передач Cat powershift. Максимальная скорость была около 32 миль в час. Он был полностью гидравлический и весил пустой около 35 тонн.

 В течение 1965 года компания Caterpillar ответила на отраслевой запрос на "усиленную" версию машины для более жесткой работы. Конечным результатом стало внедрение Caterpillar "навесного устройства", которое обеспечило ряд преимуществ.

 Caterpillar запустила модернизированную версию 631B в 1967 году, первоначально с навесным устройством, предлагаемым в качестве опции. Он также переработал крылья трактора, придав им квадратную форму и увеличил мощность двигателя до 400 л. с. на маховике.

 В этом виде 631B оставался в производстве до 1969 года, когда он был заменен на 631C. Caterpillar построил более 4000 631B.