

# **PS-4000** **PLACER/SPREADER**

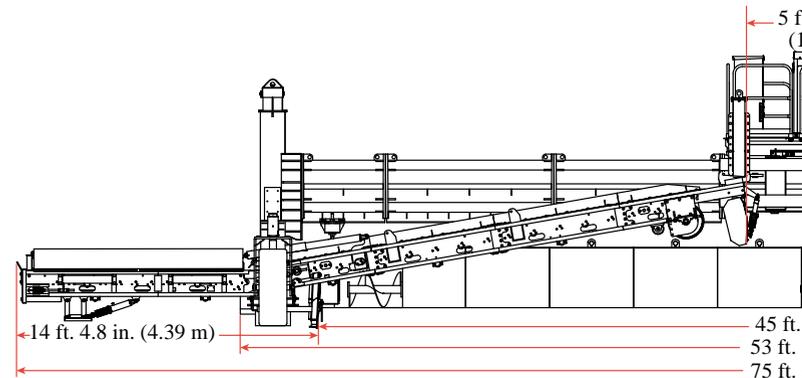
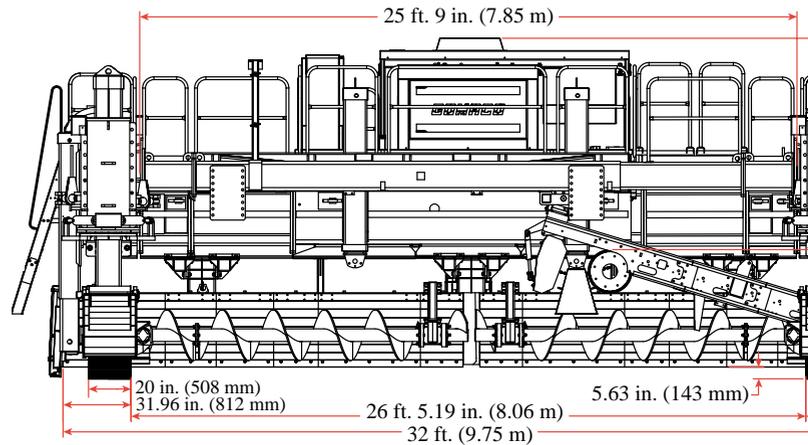


# **GOMACO**

*The Worldwide Leader in Concrete Paving Technology*

# HIGH VOLUME

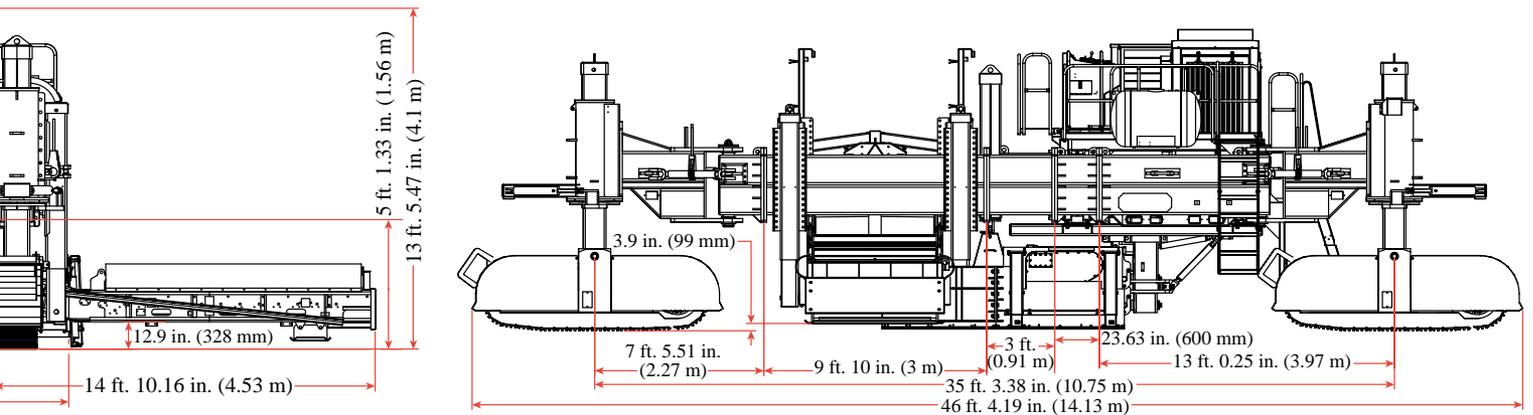
- The GOMACO PS-4000 is designed for maximum placing and spreading productivity in central mix operations. It will place and spread concrete up to 43 ft. (13.11 m) wide with the single conveyor or up to 50 ft. (15.24 m) with the twin conveyor system or spread concrete without the use of the conveyor system. The PS-4000 is also designed to easily place and spread base material such as stone and aggregate, prior to the placement of concrete.
- The symmetrical design of the conveyor system allows it to be mounted on the left or the right side, or twin conveyors can be mounted on both sides of the machine, depending on job-site logistics.
- The 5 ft. (1.52 m) wide GOMACO designed twin conveyor systems are built with the strength and durability to catch the concrete load from end-dump trucks.
- The two-track is equipped with the folding belt conveyor and the four-track is equipped with the sliding belt conveyor.
- The two-track placer with the folding belt conveyor hydraulically raises and lowers to allow trucks to pass by. Folding time is just eight seconds up and six seconds down, providing high production concrete placing and spreading. The four-track with the sliding belt conveyor hydraulically extends in seven seconds and retracts in seven seconds to allow trucks to pass by.
- The conveyor deflector controls the discharge of concrete onto the grade. A unique wiper system assures a clean and efficient operation.
- Final spreading of the material for the needed paving width is moved with a reversible hydraulically powered 20 in. (508 mm) diameter split auger.
- Hydraulically pressure-compensated sideplates provide edge control and a spreading depth up to 19 in. (483 mm).
- The GOMACO controller system provides electronic monitoring of grade and steering for placing and spreading accuracy. The sensors operate off the same stringline as the paver.
- The PS-4000 is designed to provide years of dependable and safe service. Emergency stop buttons are located on strategic areas of the machine to protect those working on and around the machine.



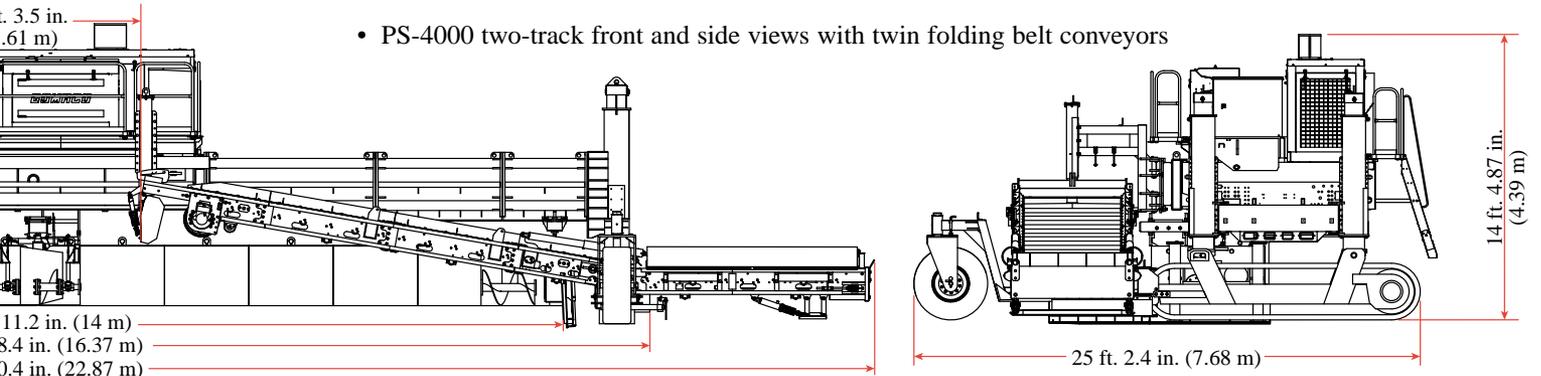
On this mainline paving project, the PS-4000 places 4000 ft. (1219 m) of stone per day over a geotextile fabric at a width of 32 ft. (9.75 m). The machine has the strength and durability to catch the stone from end-dump trucks. High production is achieved as the sliding belt conveyor hydraulically retracts in seven seconds to allow trucks to pass by. The retaining wheel mounted on the sliding conveyor, provides stabilization of the belt. The flow of material at the discharge end of the conveyor. The following day, the GOMACO PS-4000 places and spreads concrete over the base material.

# PLACING AND SPREADING

- PS-4000 four-track front and side views with sliding belt conveyor



- PS-4000 two-track front and side views with twin folding belt conveyors



PS-4000 conveyor is designed to extend in seven seconds and the conveyor deflector directs the material for the paving operation.



The GOMACO-designed conveyor system on the PS-4000 provides quick, clean and efficient delivery of concrete to the grade. The 5 ft. (1.52 m) wide GOMACO twin conveyor systems are built with the strength and durability to catch the concrete load from end-dump trucks.



The spreading of either concrete or base material is quick and accurate with the reversible 20 in. (508 mm) diameter hydraulically powered split auger. The hydraulically pressure-compensated sideplates provide edge control and a spreading depth up to 19 in. (483 mm).

# PS-4000 SPECIFICATIONS

## ENGINE

**Type:** Turbocharged diesel, C-12 Caterpillar engine.

**Power:** 425 hp (317.1 kW) @ 2200 rpm.

## SERVICE CAPACITIES

**Fuel reservoir:** 200 gal. (757.1 L).

**Hydraulic oil reservoir:** 320 gal. (1211.3 L) oil reservoir on a three-point suspension system, independent of the main frame.

## AUTOMATED CONTROL SYSTEM

**Type:** Electronic-over-hydraulic.

**Controls:** GOMACO's Control System features self-diagnostics for front and rear grade, cross slope, steering, and Smart Steer controls for paving accuracy and ease of operation.

## TELESCOPING FRAME

**Telescoping:** Modular frame telescopes on the left side up to 3 ft. 6 in. (1.07 m).

## HYDRAULIC SYSTEM

### Track Circuit

**Pump:** One vane pump providing 40 gpm (151.4 Lpm) @ 2100 rpm.

### Auger Circuit

**Pumps:** Two open loop hydraulic vane pumps providing 24 gpm (90.85 Lpm) each.

### Lift Circuit

**Pumps:** One main lift pump provides 37 gpm (140.1 Lpm) @ 2100 rpm. One auxiliary lift pump provides 37 gpm (140.1 Lpm) @ 2100 rpm.

**Hydraulic oil cooling:** One stationary cooler with hydraulic fan to cool conveyor and auger circuit oil.

**Filteration:** Four 10 micron return line filters, two 10 micron control circuit filters and five 100 mesh sump filters.

## BELT CONVEYOR SYSTEMS

### Folding belt conveyor for the two-track placer:

**Width:** 5 ft. (1.52 m).

**Length:** Up to 31 ft. (9.45 m).

**Fold height:** 14 ft. (4.27 m).

**Hinge system:** Two 3.5 in. (89 mm) by 30 in. (762 mm) hydraulic cylinders.

**Hinge fold speed:** 8 seconds up and 6 seconds down.

**Belt drive:** Hydrostatic.

**Belt speed:** Variable speed control up to 491.5 fpm (149.81 mpm).

**Conveyor deflector:** Directs the flow of concrete at discharge end of conveyor.

### Sliding belt conveyor for the four-track placer:

**Width:** 5 ft. (1.52 m).

**Length:** Up to 31 ft. (9.45 m).

**Extension system:** 10 ft. (3.05 m) conveyor extension with two 4 in. (102 mm) by 30 in. (762 mm) hydraulic cylinders acting through a 1:4 cable pulley system to a trolley on a rail.

**Extension and retraction speed:** 7 seconds out and 7 seconds in.

**Conveyor vertical adjustment:** Up to 36 in. (914 mm) hydraulic vertical adjustment and an additional 33 in. (838 mm) manual adjustment in 3 in. (76 mm) increments, for a total vertical adjustment of up to 5 ft. 9 in. (1.75 m).

**Belt drive:** Hydrostatic.

**Belt speed:** Variable speed control up to 491.5 fpm (149.81 mpm).

**Conveyor deflector:** Directs the flow of concrete at discharge end of conveyor.

**Optional for both sliding and folding conveyors:** Pressure-compensated hydraulic belt tensioning for varying haul road height.

**Optional for both sliding and folding conveyors:** 3 ft. (.91 m) and 6 ft. (1.83 m) conveyor inserts for variable spreading of 26 ft. (7.92 m) and wider.

## SPREADER AUGER SYSTEM

**Type:** Reversible 20 in. (508 mm) diameter hydraulically powered split auger.

**Auger speed:** Up to 45 rpm.

## STRIKE-OFF MOLD

**24 ft. (7.5 m) wide:** One 4 ft. (1.22 m) right-hand drive section, one 4 ft. (1.22 m) left-hand drive section, and one 4 ft. (1.22 m) power transition adjuster (PTA) section.

Balance of inserts per customer specifications. Hydraulically pressure compensated sideplates with adjustment up to 19 in. (483 mm).

## FOUR-TRACK SYSTEM

**Type:** Four hydraulically powered, gear-driven crawler tracks.

**Overall track length:** 10 ft. 11 in. (3.33 m) includes track fender.

**Track pad width:** 19.7 in. (500 mm).

**Gearbox reduction:** 104:1 gear reduction with two-speed hydraulic motors.

**Track speeds:** Low speed up to 18.3 fpm (5.58 mpm), and high speed up to 36.6 fpm (11.16 mpm).

**Track height adjustment:** Each track adjustable in 6 in. (152 mm) increments for 12 in. (305 mm) manual adjustment with 36 in. (914 mm) hydraulic adjustment.

**Track positioning:** Each track has manual pivoting track mount arms which allow track to pivot 19.5 in. (495 mm) to the outside and to the inside from the straight ahead position.

## TWO-TRACK SYSTEM

**Type:** Two hydraulically powered, gear-driven crawler tracks.

**Overall track length:** 13 ft. 9 in. (4.19 m) includes track guard.

**Track pad width:** 19.7 in. (500 mm).

**Gearbox reduction:** 104:1.

**Track speed:** Two-speed, low @ 18.3 fpm (5.58 mpm), high @ 36.6 fpm (11.16 mpm).

**Track height adjustment:** Each track is adjustable in 6 in. (152 mm) increments for 12 in. (305 mm) manual adjustment with 36 in. (914 mm) hydraulic adjustment.

## WEIGHTS

(variable, depending on number of options)

**Four-track transport weight:** 106,000 lbs.

(48,082 kg) without strike-off mold and conveyor.

**Four-track operational weight:** 182,000 lbs.

(82,555 kg) with strike-off mold and conveyor, placing and spreading 32 ft. (9.75 m) wide.

**Two-track transport weight:** 70,000 lbs.

(31,752 kg) without strike-off mold and conveyor.

**Two-track operational weight:** 90,000 lbs.

(40,824 kg) with strike-off mold and conveyor, placing and spreading 32 ft. (9.75 m) wide.

## DIMENSIONS

**Placing/spreading width:** Up to 50 ft. (15.24 m).

**Operational length with folding conveyor:** 25 ft. 2.4 in. (7.68 m).

**Operational length with sliding conveyor:** 46 ft. 11 in. (14.3 m).

**Operational width:** Up to 75.03 ft. (22.87 m).

## ATTACHMENTS AVAILABLE

Four corner outrigger system, manual operation.

Four corner outrigger system, hydraulic powered.

High-pressure water system.

Low-pressure water system.

Frame extensions.

Conveyor inserts.

7500 series strike-off mold with reversible 24 in. (610 mm) diameter hydraulically powered split auger.

Strike-off inserts.

Twin belt conveyor systems.

Other options are available to customize machine to accommodate applications and customer needs.

Cover Photos: Top photo, HW-090106-D4; Bottom photo, HW-090103-D34

MANUFACTURED UNDER ONE OR MORE OF THE FOLLOWING U.S. OR FOREIGN PATENTS: 3,299,786; 3,450,011; 3,541,931; 3,779,661; 3,959,977; 4,073,592; 4,136,993; 4,226,917; 4,343,513; 4,360,293; D-266,850; 853,607; 861,819; 954,773; 406,787; 1,147,187; 133,220; D-512,249; 4,717,282; 4,457,645; C-1,110,893; C-1,191,044; 12,890-1-0010; 5,061,115; 7,509,187; 7,509,615; 5,102,267; 5,101,360; 4,954,019; 4,984,639; 5,190,397; 5,209,602; 0,518,535; 2,067,126; 494,257; 69,031,836-7-08; 2,069,516; 5,924,817 AND PATENTS PENDING.

GOMACO Corporation reserves the right to make improvements in design, material, and/or changes in specifications at any time without notice and without incurring any obligation related to such changes.

Performance data is based on averages and may vary from machine to machine.

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