

Electrical System

Alternator

The alternator is connected to the rotating crank shaft of the engine with a serpentine belt. It converts the mechanical energy of the crank shaft's rotation to electricity. This electricity is used to recharge the batteries and power the electrical systems of the machine.

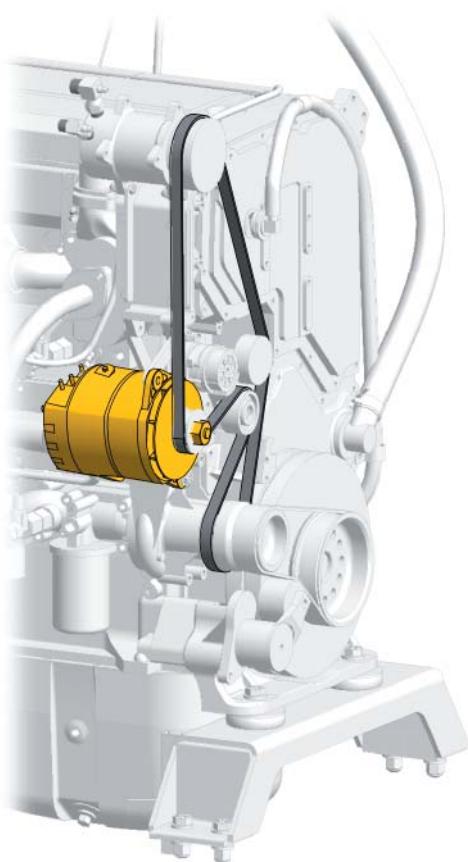


Figure 3-4-1 Alternator

Ignition

The ignition system uses an electric starting motor, activated with a key switch, much like the one on your personal vehicle.

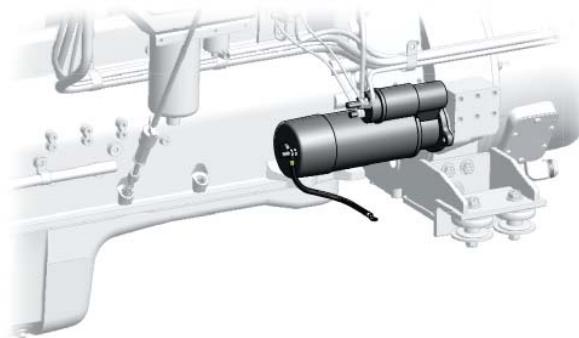


Figure 3-4-2 Starter Motor

Batteries

Your Wagner's electrical system is powered by two 12 volt lead acid batteries connected in series. At 0°F, these batteries supply 1300 cranking amps. They are 20.75" x 11" x 9.63" and weigh approximately 130 lbs. These batteries are continuously charged by the alternator when the engine is running.

Fuses

Two 400 Amp fuses in parallel provide protection from over-current conditions that might arise.

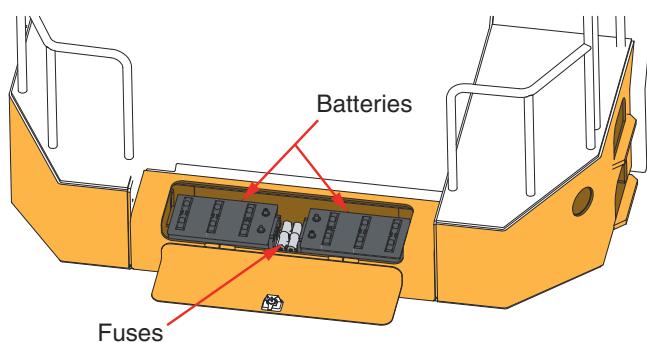


Figure 3-4-3 Batteries and Fuses

Seat Mounted Joysticks

The two seat-mounted electronic joysticks control the implements, the transmission, and can be used for steering.

Electronic Throttle Pedal

The throttle is controlled by an electronic foot pedal.

Smart Screen Operator Interface

The smart screen operator interface provides vital feedback to the operator, including but not limited to transmission direction and gear, speed, engine and fuel status, and any warnings. The operator will be alerted when filter elements must be replaced.

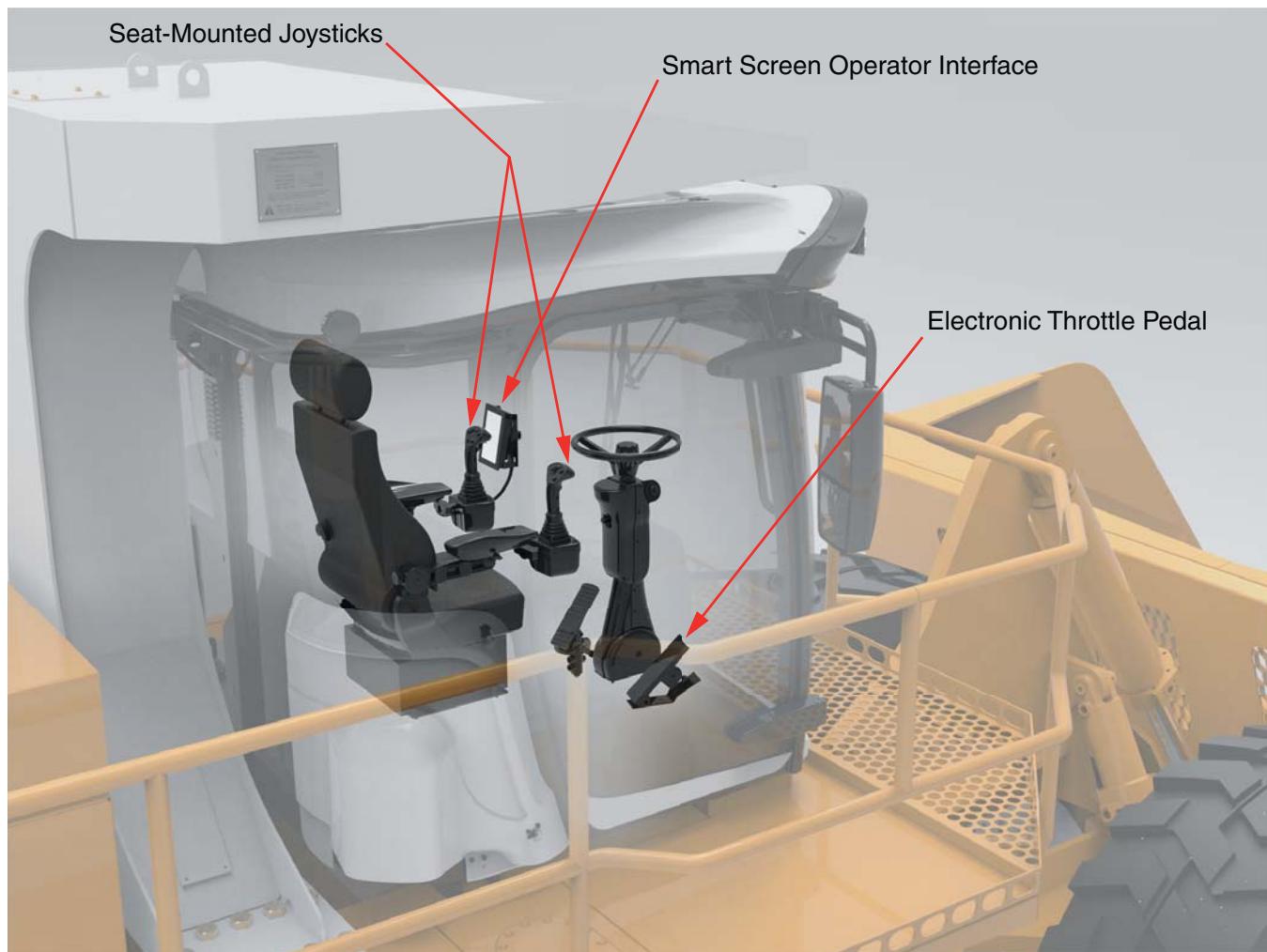


Figure 3-4-4 Operator Controls

Lights

Standard and optional external lighting groups enhance safety by providing illumination of surroundings during night time and adverse weather conditions. LED lights are standard, with HID lights optional.



Figure 3-4-5 Lights

Automatic Fire Suppression System (Optional)

The electric detection and actuation system is designed for use with the ANSUL fire suppression system. This system automatically actuates the fire suppression system when a fire is detected. Of course, the operator can always actuate the system manually if necessary. See Section 4-5 for manual activation procedures.

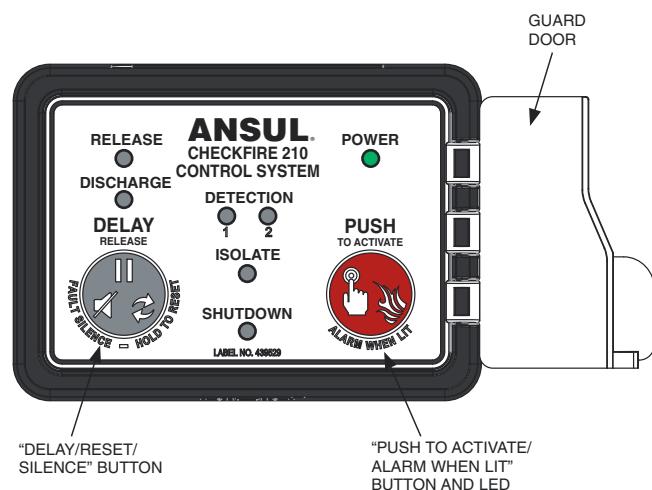


Figure 3-4-6 Checkfire 210 Detection and Actuation

Environmental

The environmental system in the operator's cab maintains a comfortable working environment. A/C and Heater units maintain a comfortable working temperature inside the cab, and an optional AM/FM/CD player is available for the operator.

Rearview Camera Monitor

A rearview camera monitor in the cab allows the operator to see the area behind the machine.

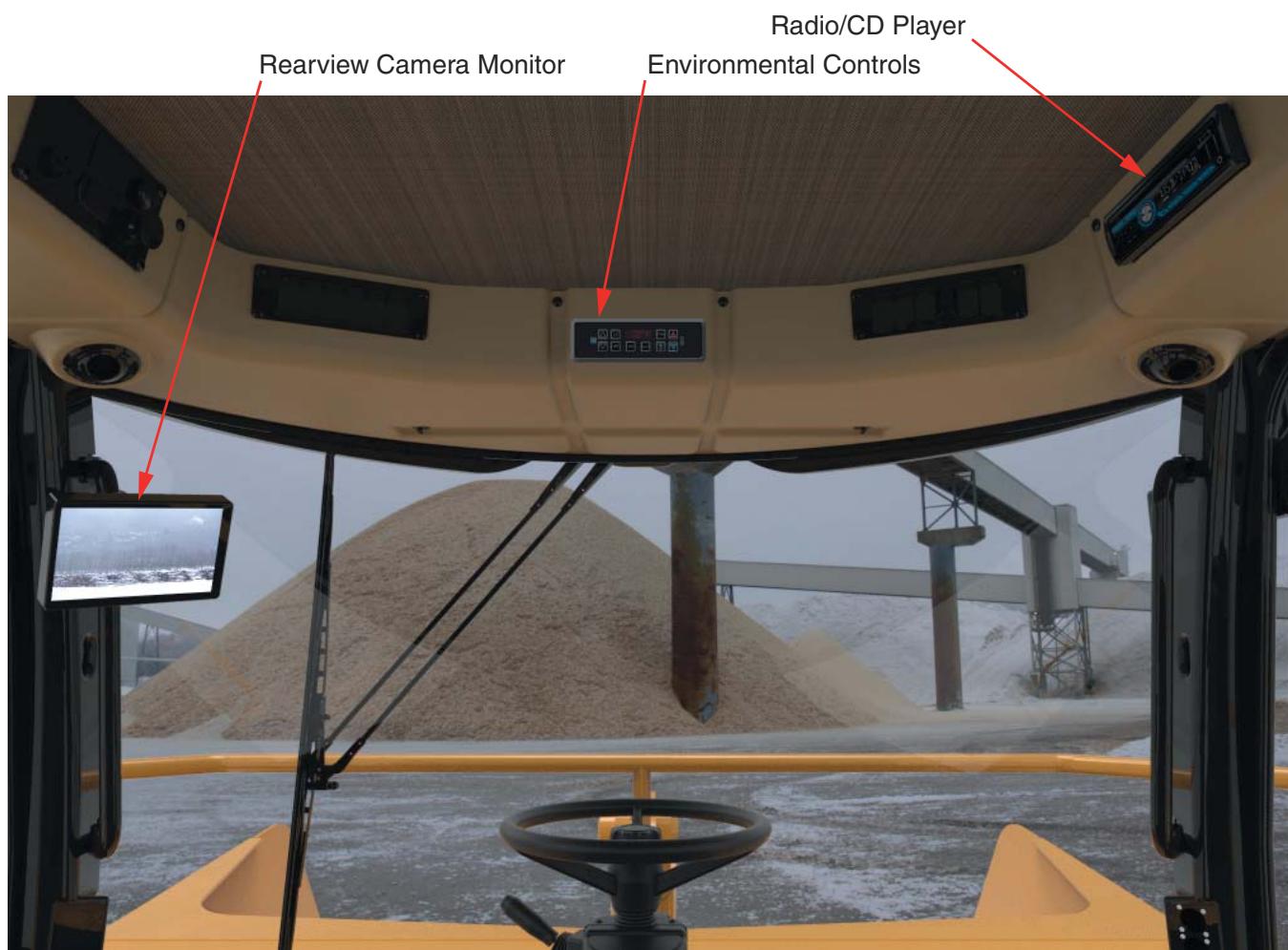


Figure 3-4-7 Environmental Controls and Rearview Camera Monitor