Key Feature Identification

A: Precision Mode Switch

B: ECO Mode Switch

C: Ride Control Switch

D: Automatic Transmission Switch

E: Lift Mode Switch

A: Precision Mode (Standard 320-710*) *Not available on 310 models due to hydraulic system*

Function State by Number of Lights

i. No LED Lights – Backhoe Precision Mode OFF
ii. 1 LED Light – Backhoe Precision Mode ON

Recommendation

Precision Mode is best suited for new operators as both the acceleration and top speed of the hydraulic functions are slowed down (Hydraulic flow is 55% of max). A more experienced operator may choose to use this function in urban areas with a high amount of potential site obstacles. With Precision Mode off, there are no speed/acceleration limits on the hydraulic system making it best suited for a veteran operator in a high production environment. There is likely not a significant difference in fuel consumption between the two modes.

B: ECO Mode (Standard):

***If LOCKED ON is selected within the monitor settings, the machine will always run in economy mode regardless of ECO mode switch input.**

Function State by Number of Lights

i. No LED Lights – ECO Mode OFF
ii. 1 LED Light – ECO Mode ON

Recommendation

ECO mode sees its biggest benefit for operations that have significant roading time as the max engine RPM is capped. Since engine RPM are reduced in ECO mode, the bystander noise will be slightly lower than when ECO mode is off. For nearly all backhoe digging/craning operations operators will likely want ECO mode turned off, as this allows the engine to be set to max RPM, and the hydraulic system will achieve maximum flow for both speed and performance.

C: Ride Control (Manual ride control on the 310G/310P, Optional Auto Ride control on the 320P/410P, Standard Auto Ride control on the 710P):

***** Automatic Ride Control can be set in the monitor in 1 MPH increments between 1-15 MPH. Factory default speed is 3.5 MPH.**

Function State by Number of Lights

i. LED Lights Off – Ride Control OFF
ii. 1 LED Light – Ride Control ON
iii. 2 LED Lights – Automatic Ride Control

Recommendation

Applications that utilize a bucket on the front of the backhoe will benefit from the AUTO setting (2 LED Lights), as this feature was designed to optimize the point that ride control turns on and off. By having AUTO mode enabled, the operator can expect to get max bucket fill in the pile and minimum material spill during the carry. This feature may improve fuel economy of the loader since ride control will be turned off when engaging the pile, increasing efficiency. It can also improve the life of the ride control components. If the machine is outfitted with forks, an operator may experience a more consistent operation by turning ride control ON (1 LED Light), especially in very low speed, poor underfoot applications.

D: Automatic Transmission (Standard: 310 P – 710 P)

Function State by Number of Lights

i. No LED Lights – AUTOSHIFT OFF
ii. 1 LED Light - AUTOSHIFT ON

Recommendation

Autoshift is recommended to be turned on nearly all the time since this will give the operator the best powertrain performance for the operation to be completed. Autoshift can also extend the life of the powertrain as the shifting is optimized through the machine software to change at the optimal points. An operator can set the MAX Gear Limit, but there is not an option to set a MIN Gear Limit.

E: Lift Mode (Standard on 320 P – 710 P)

*** Only active in backhoe mode and increases hydraulic system pressure.**

Function State by Number of Lights

i. No LED Lights – Lift Mode OFF
ii. 1 LED Light – Lift Mode ON

Recommendation

When Lift Mode is ON, the hydraulic system automatically provides a 15 second burst of hydraulic pressure when using the craning function to enhance the lifting capability of the machine. This feature is especially useful for operations that are moving jersey barriers, manholes, plates, etc. Fuel consumption is negligible between the two modes and therefore the recommendation is to have this feature turned on for any operations that have craning as a key job.