Bell expands Finlay offering with mobile conveyors

Bell Equipment has expanded its Finlay mobile crushing and screening range to include two conveyors – the TC-80 Tracked Conveyor and the TR-75 Radial Stacker. Bell believes that in certain applications, these conveyors offer operational cost reduction and site efficiency while improving material quality through reduced handling.

After an extensive market research campaign, the conveyors were introduced to customers during Bell Equipment's 2020 Vision customer open days at the Bell Farm in Empangeni, KwaZulu-Natal towards the end of 2019. Finlay's Regional Business Manager, Paul Chappel, was in attendance to give a product demonstration followed by a detailed machine walk around and said it was clear that there is "strong customer interest".

According to Paul conveyors offer significant benefits in terms of improving site efficiency. He says: "For example, the stockpile of a Finlay I-140 Impactor needs to be cleared after 17 minutes of crushing whereas the addition of a TC-80 Tracked Conveyor extends the clearing time to 7 hours and 13 minutes."

Improved plant layout contributes further to efficiency by enabling material to be recirculated from the screen back to the crusher to reduce the wear rate on wear parts and improve the material specification. "This saves operator time because the wheeled loader can be reallocated to the loading of trucks, increasing the feed rate to the crushing and screening plant or other value-added tasks.

"Studies have shown that by replacing a wheeled loader with a conveyor an operator can save up to 90% of his labour and fuel costs. Of course, less wheeled loader activity also has positive environmental spin-offs in terms of dust, noise and emissions as well as on site health and safety due to reduced traffic," says Paul. "Quality also benefits because the conveyor reduces the degradation found when product thunders down onto a stockpile or is damaged during handling by a wheeled loader."

Bell Equipment's Finlay Product Manager, Tyron Ravenscroft, says that Bell chose the TC-80 and TR-75 from Finlay's extensive range of mobile conveyors after conducting thorough market research in conjunction with Finlay's conveyor specialists.

"Both these units feature pinless deployment, meaning that the conveyor is held in place using hydraulic power rather than pins. Heavy duty hydraulic cylinders lift and hold the conveyor while a hydraulic lever controls the raising and lifting. The advantages are that set-up is quicker and the operating height and angle are adjustable. Only one person is needed and safety is increased due to less nip risk.

"These conveyors both have external conveyor belt adjustment as well as a hydraulic rear fold for a smaller footprint when transporting. In addition, the TC-80 has low level greasing and the TR-75 has a discharge head drum bearing automatic greasing cartridge," he adds.

The TC-80 has heavy duty 4m tracks with 400mm shoes as standard for good mobility on site and stability when operating. With a conveyor length of 23,5m and a belt width of 1,05m, this unit has a discharge height of 9,95m at 24° and a stockpile capacity of 1 806m, also at 24°. The TC-80 has a capacity of up to 500+ tonnes per hour (TPH).

The TR-75 discharges in a kidney bean shape and features a fully automated system that automatically raises and lowers to minimize the fall height of the discharge with an automated radial left to right drive to stop points selected on the control panel. This unit has a conveyor length of 22,9m, a belt width of 1,05m and a capacity of up to 600+ TPH.

Tyron concludes: "Our new conveyors have common parts with our existing Finlay range so our Bell Global Logistics Centre is well covered to support these new products. They have also been specced to a high standard to meet Africa's tough site requirements. We have a top-quality product and are excited about the mainstream and niche application possibilities that we can present to existing and potential customers."