Slasher's current design uses a 60-in. circle saw on a Strickland DT40 undercarriage powered by a Cat C3, 4B 12hp. engine. It is 8 1/4 ft. wide by 18 1/2 ft. long and weighs 11,750 lbs.



Slasher Cuts Up Logs Fast

The self-powered, Tracked Slasher from Spruce Creek Mechanical and Four Men Manufacturing gets the job done for a fraction of the cost of conventional log slashers. It was designed by a second-generation logger who needed a better, less expensive alternative to new equipment on the market.

"You don't have to buy a \$600,000 slasher and crawler log loader if you already have an excavator or any log loader," says John Steciak, Spruce Creek Mechanical. "Our Tracked Slasher is just under \$200,000."

Designed for maneuverability, the selfpropelled machine can be driven on a trailer and pulled behind a full-size or larger pickup or driven on a straight truck.

"You don't need a tractor-trailer to haul it," says Steciak. "You can get into tight areas, unload it, and go to work."

The slasher is self-contained with a 5-ft. circle saw, its own engine, and its own hydraulic system. It doesn't require a computer-controlled processing head, hydraulic hoses, and a conglomerate of wires waiting for mice to nip. Unlike conventional slashers that require another piece of equipment to power them and to readjust placement, Steciak's is self-powered



Harvest Vision is the first of a series of AI-supported systems Farmwave plans to introduce. Ganssle describes planting, spraying, crop scouting, and livestock management as areas that are currently on the shelf.

Vision System Helps Cut Grain Loss

A combination of cameras and artificial need to fine-tune settings. intelligence is putting an extra 3 to 8 bushels "Our cameras take pic

"Our cameras take pictures every 3 to 5 seconds, 140 times per acre," says Craig Ganssle, Farmwave. "Artificial intelligence (AI) analyzes each picture to measure the loss. Pictures are displayed in real-time in the

Rugged Tooth Rips Roots And Rocks

Nuisance buried rocks and tree roots in pastures and tillable land don't stand a chance when Noah Sprouse sinks his rugged ripper tooth into the ground around them. As one observer told him, "That's a tooth that looks mean and definitely means business."

per acre of grain into combine hoppers.

Farmwave Harvest Vision captures grain

loss at the header and the combine's rear.

Operators can see for themselves if they

Sprouse built the 27-in. long root and rock ripper out of 1-in. thick plate steel from an old road grader blade. He outlined the shape and teeth on the steel, did all the cutting with a torch, and then welded it to a 1-in. thick backing plate with multiple passes. It's reinforced with 8-in. triangular gussets on each side. Mounting brackets made of the same material connect the shank via a quick coupler to his Yanmar SV40 mini excavator. He used 1 1/2-in. hardened steel pins spaced about 8 1/2 in. apart with a dipper gap of 5 7/8 in. to allow easy attaching.

Sprouse says, "So far, I've used the tooth without any problems to rip out stumps more than 30 in. in diameter that weigh about 3,000 lbs. I think it could handle even bigger ones. It works great on rocks, too."

Sprouse added a hardened and replaceable point to the tip of the tooth and cut four menacing curved teeth into its arched backside. "Those teeth work great to rip through roots about 10 to 12 in. in diameter and make it easier to dig out stumps if I'm close to a fence line," Sprouse says.

It took Sprouse about 8 hrs. to build the tool from scrap material he got at a reasonable price. "Building this myself was a whole and mounted on tracks.

When Steciak came up with the idea, he built a prototype and headed into the woods. The concept was similar to the old tractor-mounted buzz saw. It consisted of a tracked trailer with a circle saw slasher mounted on it, all powered by a 3-71 Detroit diesel. He used both a Barco 80 log loader and a Cat 336 Excavator to set trees into position for the saw.

"I wanted it on tracks so it was easy to reposition or turn and get out of the way to clean up the scraps underneath," says Steciak. "Our goal is to provide an economical slasher that can be used with any loader or excavator, old or new."

His then 97-year-old father looked at the prototype and advised him to get it patented. With the collaboration of engineer Tom Johnson of Four Men Manufacturing, the tracked slasher was patented and refined.

Initially, the two hoped to find an existing manufacturer to build and market the unit. The problem was it would compete with and likely cannibalize sales of existing and higher-priced machinery. They started building the machines for sale and working with interested dealers.

The current design uses a 60-in. circle saw on a Strickland DT40 undercarriage powered by a Cat C3, 4B 12-hp. engine. It's 8 1/4 ft. wide by 18 1/2 ft. long and weighs 11,750 lbs.

Trees are brought to the slasher and placed on the table, which has marks on it in 2-ft. increments. The circle saw and tracks can be

cab for each side of the header, alerting you if you're exceeding your lost grain threshold."

Ganssle has been working on the system for the past 8 years with 6 years in research and development. Another 2 years were spent prototyping systems and bringing them to market.

This past year, the Harvest Vision system was made available for use in soybeans, corn, peanuts, cotton loss, and wheat. Work is progressing on adding edible beans, canola, and cotton trash to the crop list.

Farmwave set a goal of having 150 units on farms in 2023, but they ran into problems with shipping and defects in the hardware. Ganssle is confident that problem is behind them this year with a change in suppliers.

"We've gone with an all-in-one tablet from Dell computers," he says. "It eliminates the need for a stand-alone computer processing unit. Our in-cab footprint is reduced by about a third."

Ganssle adds that the Farmbook tablet can be moved easily between machines with ready access to captured field data.

"It's a very rugged, industrial-grade tablet with a lot of horsepower inside," says Ganssle. "It has more capability than the most expensive smartphone. We visualize a lot of new opportunities to continue building on our AI with this tablet."

Harvest Vision is the first of a series of

controlled wirelessly by the operator in the excavator or loader.

Steciak and Johnson have recently designed an even simpler and smaller slasher. It's for the part-timer, less for the commercial operator. It has a 74-hp. Cat engine and a 5-ft. bar saw but retains the tracked undercarriage and full wireless remote control. The lighter unit can be transported on a trailer, behind a pickup, or even an SUV. It's priced at less than \$170,000.

"It can still buck trees into shorter lengths just like its big brother, albeit a shade slower because of the bar saw," says Steciak. "However, it has fewer components and less steel and thus a lower price. It can still cut up trees into logs or firewood and is affordable for the weekend logger/lumberman."

Go to www.trackedslasher.com to view videos, photos, and detailed drawings of the units.

FARM SHOW readers may recall a previous Steciak innovation (Vol. 31, No. 2). It was a self-propelled, twin-station log splitter with a conveyer for loading out firewood.

Contact: FARM SHOW Followup, Spruce Creek Mechanical, 2687 State Route 29, Dolgeville, N.Y. 13329 (ph 315-429-3496; sprucecreekmechanical@ibyfax.com; www.trackedslasher.com) or Four Men Manufacturing, 7400 South Clare Ave., Clare, Mich. 48617 (ph 989-627-6258; www. fourmenmfg.com).

Al-supported systems Farmwave plans to introduce. Ganssle describes planting, spraying, crop scouting, and livestock management as areas that are currently on the shelf. One that has already proven its abilities is intelliSCOUT. It can be used with a smartphone or Google glasses and is designed to be intuitive.

"You can take a clear picture of a crop, and it'll identify what the weather was at the time and where the picture was taken," says Ganssle. "It can identify diseases or insects in the picture or count the nodes on the stalk. It's 95 percent accurate on node count, bumps on a raspberry or kernels on a corncob, and 99 percent accurate in pest and pathogen identification."

"We're after value for farmers," he says. "We still have a long road ahead of us, but we're solving one problem really well."

Kits are available with two-camera (header only) and three-camera (full combine) options. A three-camera system with the 10-in. Farmbook tablet and Havis docking station is priced at \$15,285. The 12in. Farmbook system is priced at \$15,2820.

Contact: FARM SHOW Followup, Farmwave, 120 S. Chestatee St., Suite 205D, Dahlonega, Ga. 30533 (ph 706-250-0066; support@farmwave.com; www. farmwave.com).



Sprouse built a ripper claw for his miniexcavator from an old grader blade.

lot cheaper than buying something from a manufacturer, and I think this is made well, so it's going to last a long time," he adds.

Contact: FARM SHOW Followup, Noah Sprouse, 499 Augusta Farms Rd., Waynesboro, Va. 22980.