



**6190-2**

**3090**

# DEEPER SOIL FRACTURE

## BELOW PLOW LEVEL

**Maximum 20" depth**

**50 PTO-HP rating per shank**



Optional  
Coulters

**6290-3**

Sub-soilers are built heavier than Rippers for deeper penetration and soil fracture below plow level. Our Sub-Soiler shanks are rated at 50 PTO-HP per shank and/or maximum 20" depth and feature shear-bolt protection.

Pull two shanks with 100 HP. Fracture furrows between raised beds. Three shanks are for general field fracture. Use coulters in high-residue conditions. Four and five-shank models are available with Category-3 hitch.

### Models 6190 and 6290

- 6" square toolbar(s) x 3/8" wall
- Category-2 hitch - quick-hitch compatible

### Model 3090

- 4" square crossbar
- Category-1/2 hitch - quick-hitch compatible

## Sizing Deep Tillage Equipment with Tractor Horsepower

Choose primary tillage equipment like Sub-Soilers and Rippers that's rated to match tractor power. Then how deep the tractor pulls it is what the tractor can do. "Sub-Soilers" and "Rippers" may be interchangeable labels in the industry but what matters is rating each shank for Horsepower and depth. What's tricky to chart is a universal Horsepower requirement at a certain depth. Soil type, moisture content and compaction hardness can vary widely. Local practices or what previous operators have done with your soil means more than what a salesman says. Question claims too good to be true. Don't buy under-rated equipment or you'll probably break it. The value of curved shanks is debatable but they look good. Take or leave what we offer.

We believe Horsepower ratings of our Ripper and Sub-Soiler shanks are typical of the power needed for the depth. Soil should have a little moisture for best penetration but dry enough for best fracture - timing matters. Accurately measure penetration depth - many over-estimate. On bigger multi-shank models, removal of one or two shanks can provide best results. Of course, that's not pointless on the models above so use a tractor big enough. 50 HP per shank.