2012-13 District Winner

Tool and Equipment Challenge http://wwwi/intranet/cr/SolutionsAtWork/Innovations.htm

April 2013

Prepared by Customer Relations Missouri Department of Transportation

Concrete Slab Puller



Description

This innovation attaches to an excavator and its auxiliary hydraulics. It uses hydraulic driven pins to lock into the concrete slabs being replaced. It is designed to pull and carry up to a 6' x 12' slab and is rated for 10,200 lbs.

Benefit

The Concrete Slab Puller eliminates the need for multiple saw cuts to be made to get slabs free for replacement. It also keeps employees clear of the pulled slab and out of the truck bed. Only one employee is needed to guide the slab with a rope or tag line.

Parts and Labor

1 - 24'x $2^{-3}/_{4}$ steel pipe

 $1 - 12^{4}$ 'x $2^{-1}/_{8}$ steel bar

 $1 - 21'4"x 2" x {}^{1/}{}_{4}"$ square tubing

1 – 27"x 5"x 1" steel plate

1 - 46"x 23" x $\frac{1}{2}$ " steel plate

1 - 8" x 8" x $\frac{1}{2}$ " steel plate

1 - 40" x 10" x $\frac{1}{2}$ " steel plate

1 - 10,000 lb. swivel

2 – Hydraulic cylinders

12 feet – Hydraulic hose

 $1 - 2^{-3}/4$ " Rock drill bit clevis

Total: \$1,500 - \$2,000 Labor: 40 hours

For More Information

Contact Robert Merritt at (573) 885-3823. Additional photos can be seen by accessing the Innovations Showcase homepage at http://wwwi/intranet/cr/SolutionsAtWork/Innovations.htm.



