



Department of  
Primary Industries and  
Regional Development

## Journal of the Department of Agriculture, Western Australia, Series 3

---

Volume 3  
Number 6 *November-December, 1954*

Article 12

---

11-1954

### A handy drum-tipping cradle

W M. O'Donnell  
*Department of Agriculture*

Follow this and additional works at: [https://library.dpird.wa.gov.au/journal\\_agriculture3](https://library.dpird.wa.gov.au/journal_agriculture3)

---

#### Recommended Citation

O'Donnell, W M. (1954) "A handy drum-tipping cradle," *Journal of the Department of Agriculture, Western Australia, Series 3*: Vol. 3: No. 6, Article 12.

Available at: [https://library.dpird.wa.gov.au/journal\\_agriculture3/vol3/iss6/12](https://library.dpird.wa.gov.au/journal_agriculture3/vol3/iss6/12)

This article is brought to you for free and open access by the Agriculture at Digital Library. It has been accepted for inclusion in Journal of the Department of Agriculture, Western Australia, Series 3 by an authorized administrator of Digital Library. For more information, please contact [library@dpird.wa.gov.au](mailto:library@dpird.wa.gov.au).

# A HANDY DRUM-TIPPING CRADLE

By W. M. O'DONNELL, Laboratory Assistant, Entomological Branch

**T**HE tipping cradle described in this article provides a useful method of handling and emptying 44-gallon drums used as containers for petrol, oil, kerosene, water or other liquids. It was designed during the 1953-54 Argentine ant campaign when large numbers of drums were used to supply water to the spraying teams and it was necessary to evolve a method of filling the spraying outfits from the drums without loss of time and without waste of labour and materials.

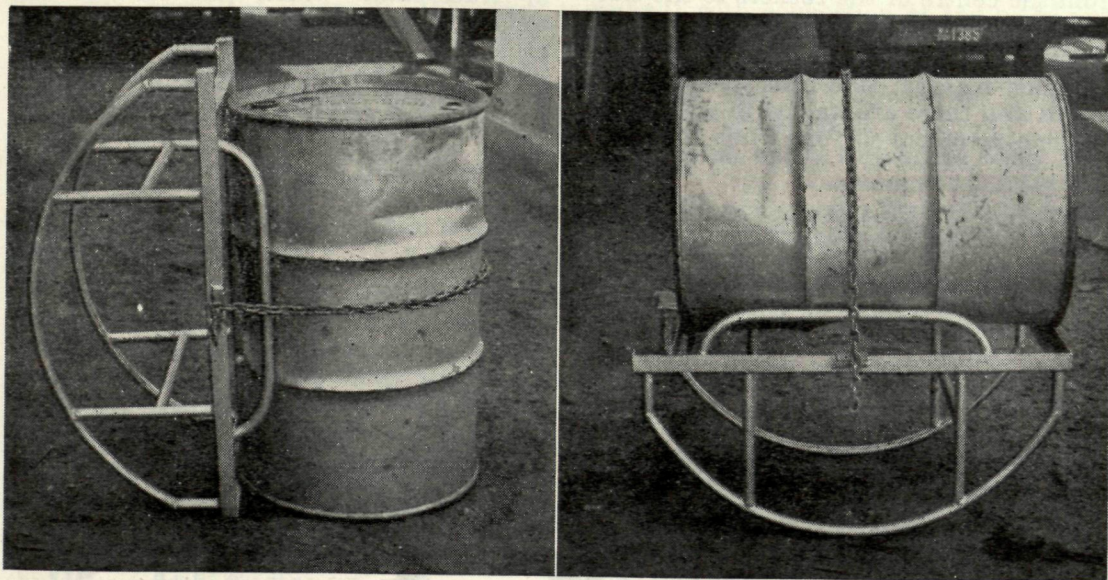
The semi-rotary and other types of pumps commonly used for drawing off small quantities of liquid from the drums were too slow in operation but the cradle, when used in conjunction with large-sized taps screwed into the bungholes of the drums, proved most effective. It enabled filled drums to be handled easily by one man.

The cradle illustrated here weighs 45 lb. and is constructed from  $\frac{1}{4}$  in. x  $1\frac{1}{2}$  in. angle-iron and  $\frac{3}{4}$  in. pipe or steel tubing. It could be constructed easily by any farmer who can operate a welding plant.

## CONSTRUCTION

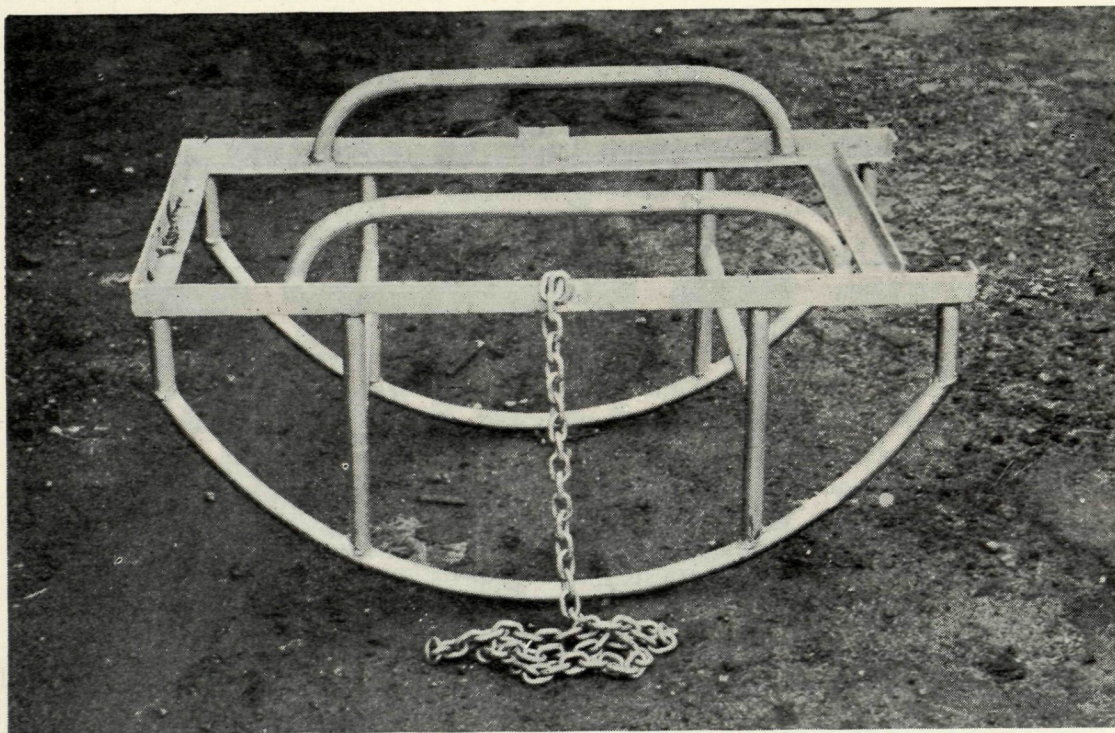
The two angle-iron side-members are 3ft. 6in. in length and the two angle-iron cross-members which complete the top frame are 1ft. 9in. long. The first cross-member is welded into position across the ends of the side-members. The other is placed in position the length of the drum (about 2ft. 11in.) from it.

Four 4in. lengths of piping are welded to the ends of the side-members and curved lengths of piping to serve as rockers are welded to these short uprights.



Left.—Placing the drum on the cradle. The flange of the angle-iron cross-member is slipped under the rim of the drum and the holding-chain is looped round the centre. Right.—Cradle and drum are pulled forward and balance on the rockers for easy emptying





Cradle, showing details of construction

Six lengths of piping are then welded to form two H-shaped stays which are welded into position between the rockers to ensure rigidity. The vertical distance from the centre of the rockers to the side-members should be 16in.

Two more lengths of piping are bent at the ends to form side-rails about 2ft. in length and these are welded in position on the side-members so that when the drum

is on the cradle it rests on the side-rails and on the inner flanges of the angle-iron cross-members.

The drum is held in position by a length of trace-chain which has its end link welded to one of the side-members. The other end of the chain is secured by slipping one of the links through a slot cut in a short piece of angle-iron welded to the side-member.

