

CLEAN WATER - HEALTHY VILLAGE designs a HAND WASHING CISTERN for Africa.

CONSTRUCTION GUIDELINES BABY CALABASH OF 90 LITERS, Paul Akkerman.

In many African villages there is a strong demand for a **simple water tap**, so that hands can be washed easily. In the present procedure, people wash their hands by pouring water out of a bowl over somebody's hands, which is complicated. In 2018, the Dutch drinking water project CLEAN WATER – HEALTHY VILLAGE had already designed a small water cistern: **40 kg of cement provides a 90 L cistern**. Because of Corona, the demand has increased enormously and local masons have already installed over 100 hand-washing points in 6 African countries, at hospitals, pharmacies, shops, markets, schools or at home. **local cost: € 46 each. construction time: 4 h. during 3 days.** In the pictures below, Eerhard Mensink, of 'Ghana over the IJssel' and Paul Akkerman show how a hand wash cistern is built.

Materials: 40 kg of cement, construction sand, a tap with socket, 5 m. of steel wire. The cement blocks are reusable.

Method: build Calabash mould of blocks and sand. Plaster the inside with two layers of cement, the outside 1 layer.

Volume: the internal height is 60 cm and the internal diameter 45 cm. This provides a volume of **90 L**.

More information? On www.cleanwaterhealthyvillage.com you will find the MANUAL of the big Calabash Cistern.



1. left: sand mould for the roof



2 sand mould for the foot and the bottom



* a result in Kenya



3. cement for the foot



4 the foot has been poured



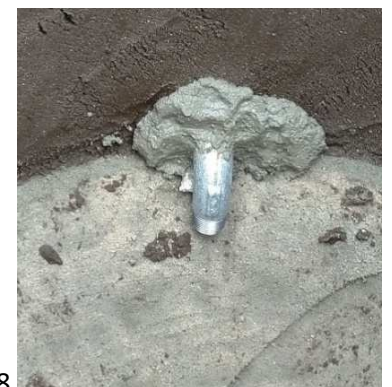
5 foot and shell-shaped bottom



6. mould for the wall of blocks and damp sand. dark sand sticks better.



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install the sock for the tap, - pierce the sealed sock from the inside through the sand of the mould just above the cement layer of the bottom.



10



11



9. The first thin layer of cement; plaster carefully and then stay off! As soon as the first layer of cement is firm, apply the second layer on the inside and finish nicely. 10. Remove blocks when the cement has hardened. The light-coloured sand is found at the bottom, above the dark-coloured, better sticking sand is found. Advice: try and find good quality of moulding sand. 11. Brush away moulding sand.



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14



15



12. Install the lid in the wet cement. The hole should be wide enough for a man's arm to finish the inside and clean up later. 13. Finishing of the lid after cutting away the excess rim. 14 putting tap on sock with teflon tape. Bending a bow of steel wire and attaching it as reinforcement for the nose. 15. modelling of the nose.



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16. Finishing.
NB, the nose is our trademark

transport, pay attention to shelf with handle.
The empty weight is about 150 kg



.Baby Calabash in the garden.