Instructions for a do-it-yourself sieving station type RAKO for the field

Compilation by Bigna Steiner, photos by Örni Akeret ©IPAS, University of Basel 2017

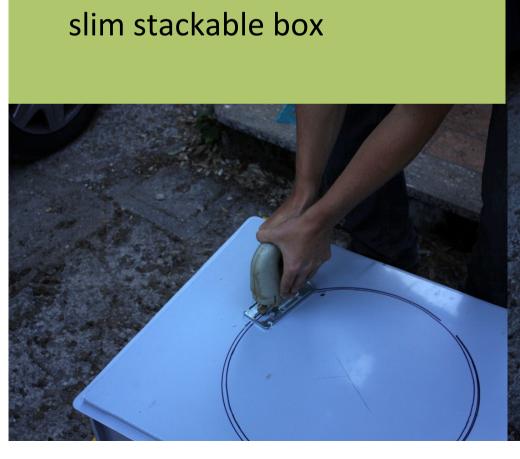


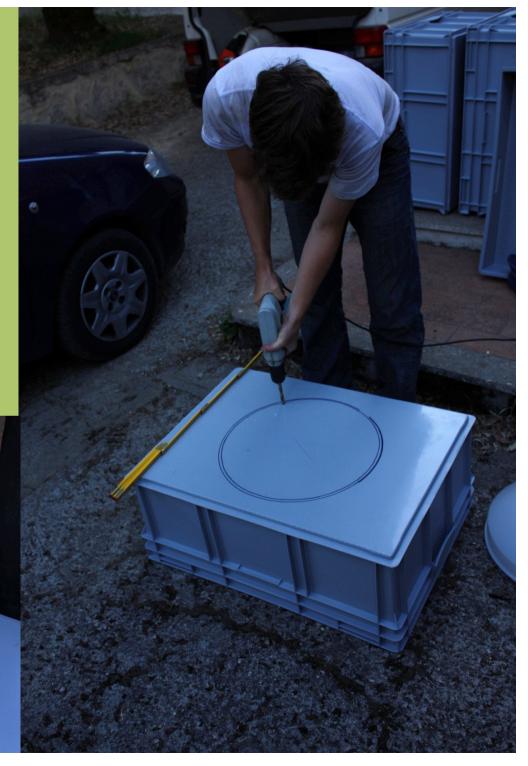
Needed materials

- 4 stackable boxes type RAKO
 - 3 x wide (800 x 600 x 323 mm)
 - 1 x slim (800 x 600 x 117 mm)
- 3 funnels (Ø450 mm or any other size matching the sieves)
- 1 tube for the overflow with a matching seal (to prevent leakage)
- 3 sieves (Ø400 mm or any other size matching the funnels)
 - mesh sizes should be determined according to research question
 - eg. for Neolithic waterlogged sites 4mm, 2mm, 0.35mm
- 1 hose with a sprinkler head (attached to running water)



A hole for the funnel (Ø450mm or any other size matching the funnels and sieves) is cut into two of the wide stackable boxes and the slim stackable box



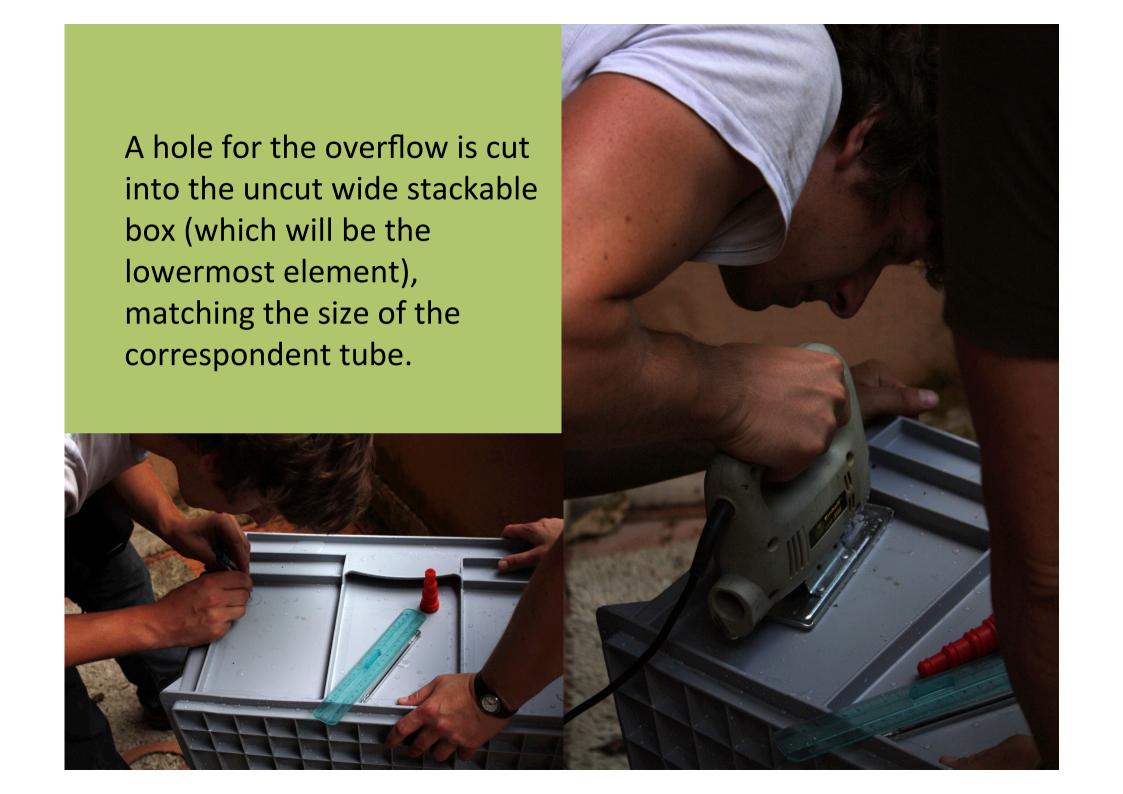


The narrow ends of all 3 funnels are cut off (not too much should be cut – notice the remnants on the floor). They serve to guide the material passing from one sieve to the next.



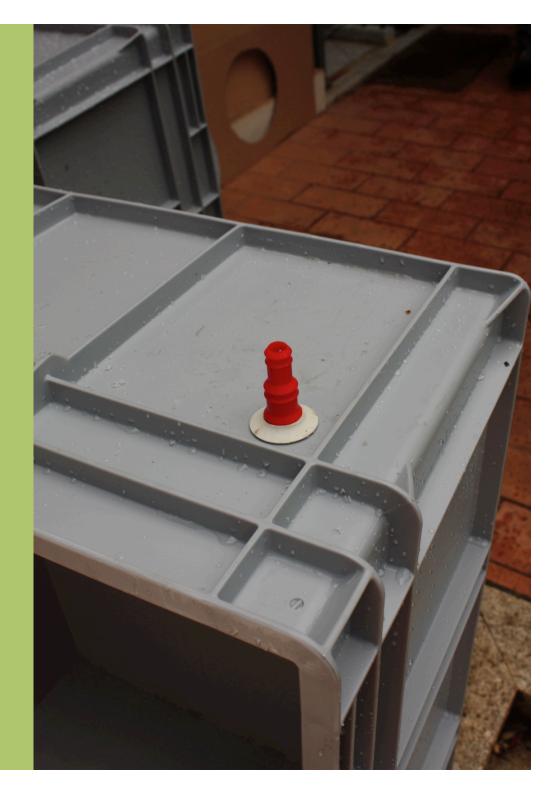
A "window" is cut into the two wide stackable boxes which already contain a hole for the funnel and sieve so that the content of the sieves can be controlled at all times.





The tube for the overflow is inserted into the wide stackable box (lowermost element), with a seal to prevent leakage





Assembling the sieving station

The stackable boxes are put on top of each other on the following order:

- The wide box with the tube is the lowermost element.
- The two wide boxes with windows and holes for the funnels and sieves are the intermediate elements.
- The slim box with a hole for the funnel is placed on top.

For use, the sieves are inserted and the hose with sprinkler head is attached to water and the sieving station is ready.

The overflowing water needs to be collected or be allowed to run off properly.



- See for video instruction about the use of wash-over sieving:
 - English

www.youtube.com/watch?v=UCa5oKgA0PM

German

www.youtube.com/watch?v=D91wZiieeOg

- See also for more photos of sieving stations in use:
 - Waterlogged site:

https://duw.unibas.ch/fileadmin/user_upload/duw/IPNA/PDF_s/PDF_s_in_use/ChaineOperatoire_Feuchtboden.pdf

– Dry site:

https://duw.unibas.ch/fileadmin/user_upload/duw/IPNA/PDF_s/PDF_s_in_use/ChaineOperatoire_Mineralboden.pdf

Product information

Examples in German (status: 30th May 2017), of course other materials can be used as well.

stackable boxes type RAKO

- wide: 3 Stapelbehälter RAKO, Doppelboden geschlossen (800 x 600 x 323 mm), Bestellnr. 3-220Z-72-V.7000.0101,
 www.utzgroup.ch/stapelbehaelter-rako-800-600-323-mm-4298/
- <u>slim</u>: 1 Stapelbehälter RAKO, Doppelboden geschlossen (800 x 600 x 117 mm), Bestellnr. 3-222U-72-V.7000.0101, <u>www.utzgroup.ch/stapelbehaelter-rako-800-600-117-mm-4393/</u>

funnels

• 3 Trichter PE-HD Ø 450 mm, Bestellnr. 203, eshop.semadeni.com/trichter-pe-hd-o-450-mm.html

sieves

• 3 Analysensiebe mit 400 mm ∅ und Randhöhe 60 mm, <u>www.retsch.de/de/produkte/sieben/analysensiebe/funktion-merkmale/</u>