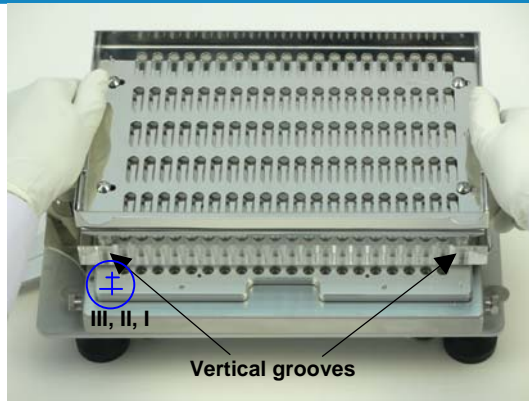
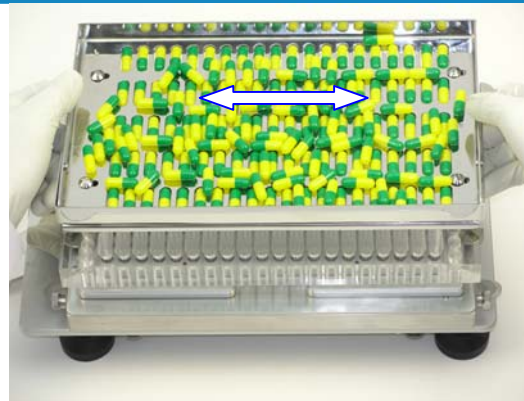


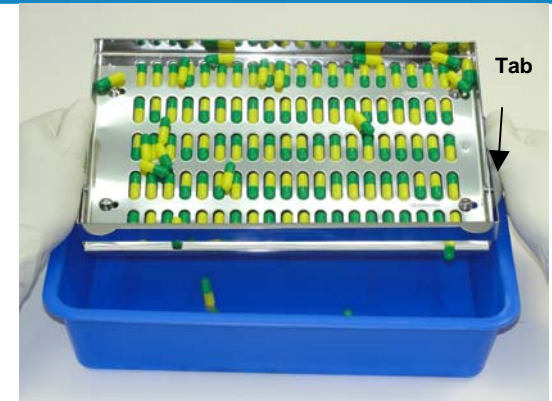
A) Orientation



1. Place Orientor Base onto Caps Tray in Position I. Align vertical grooves on front edge of Orientor Base with vertical lines on Caps Tray. Align Orientor Base front edge with horizontal line "I" on Caps Tray. Place Orientor Tray onto Orientor Base. See Tip #1.



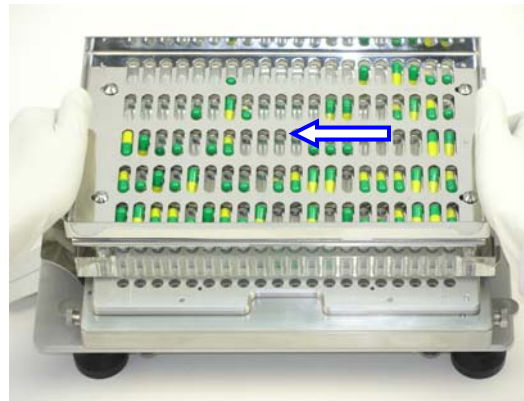
2. Fill Capsule Measuring Bowl for your capsule size and pour capsules on Orientor Tray. Lift Orientor Tray and shake back and forth moving capsules into slots.



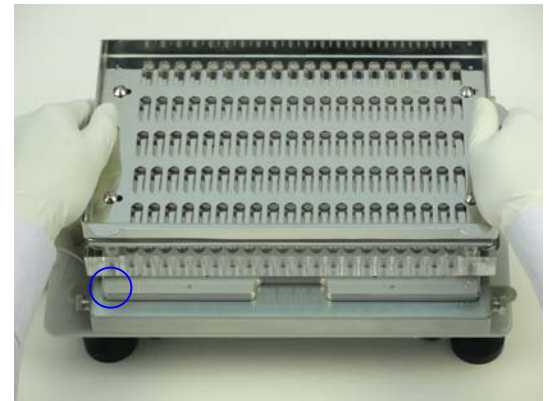
3. Tilt Orientor Tray and press tab down to lift gate and pour off excess capsules. See Tip #2.



4. Place Orientor Tray onto Orientor Base by sliding into 2 grooves on sides of Orientor Base.



5. Push sliding portion of Orientor Tray to the left to drop capsules into Caps Tray, filling every third row. See Tips #3, 4, 5.



6. Move Orientor Base with Orientor Tray to Position II on Caps Tray.



7. Repeat steps 2-5. Move Orientor Base with Orientor Tray to Position III on Caps Tray.



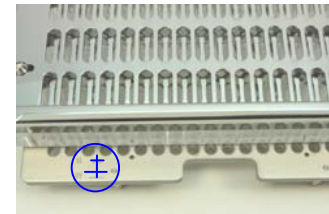
8. Repeat steps 2-5 one last time.



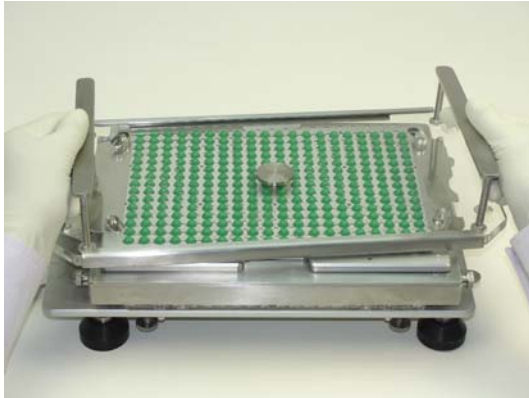
9. Remove Orientor Base with Orientor Tray from Caps Tray and set aside.

Tips

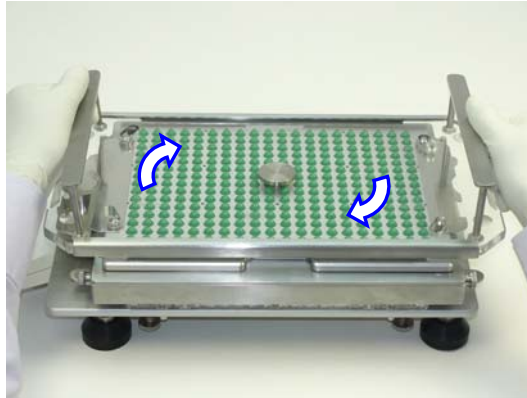
1. There is a set of 3 locating holes at each corner on underside of acrylic Orientor Base. Positioning the front holes onto Caps Tray locating pins will align Orientor to position I, the middle holes to position II, and the back holes to position III. To identify front of Orientor Base, look for the grooves and size range marking.
2. Visually check filled Orientor after step 3. Look for 2 capsules in a slot, missing capsules, capsules with a double cap, or capsules of incorrect size mixed into the lot. Manually replace problem capsules.
3. Slide Orientor top tray gently in step 5 to avoid misorientation of capsules.
4. If a capsule is sitting in the Caps Tray with the cap down, use tweezers push the capsule up from underneath to avoid getting the cap stuck in the Caps Tray hole. Turn the capsule cap up and manually place it into the Caps Tray.
5. If there are capsules lying on Caps Tray, the Orientor was likely not aligned properly on Caps Tray. Be sure Orientor sits properly in locating pins and lines up with position marking I, II, or III. Manually place misoriented capsules, or remove all capsules from Caps Tray and begin Orientation process again.



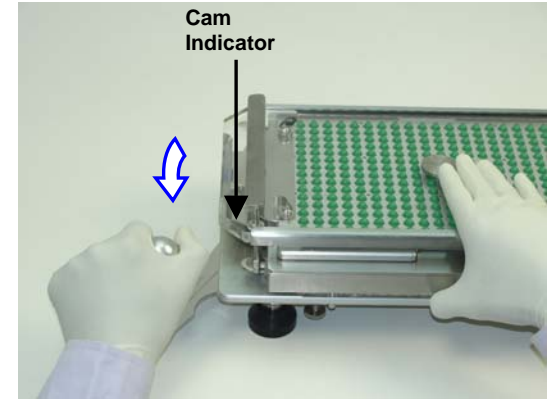
B) Separation of Capsule Caps and Bodies



10. Hold Locking Plate by its 2 handles and place onto Caps Tray. The 4 posts of the Caps Tray should enter 4 larger holes in Locking Plate.



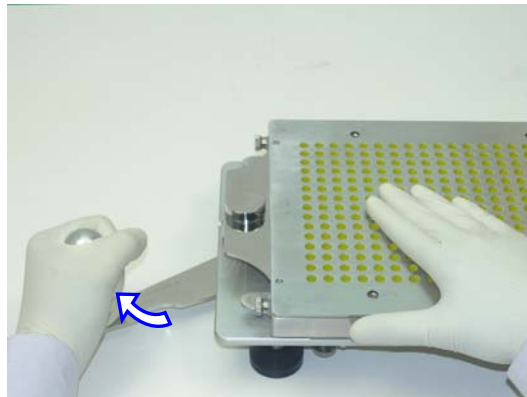
11. Hold Locking Plate by handles and twist clockwise to lock into place.



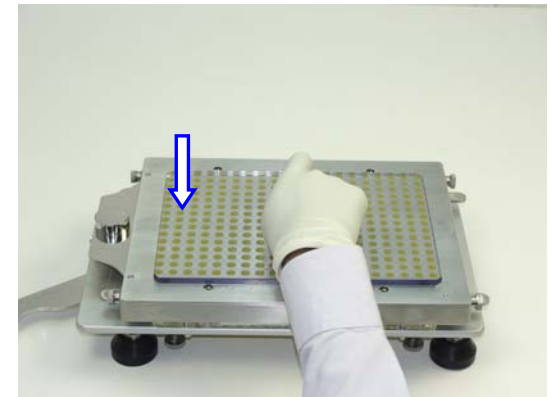
12. Pull Cam Handle toward you to secure capsule bodies in Filler.



13. Push down on Locking Plate handles while pulling up on Locking Plate to separate capsule caps and bodies. Set aside Caps Tray with Locking Plate. See *Tips #1 and 2.*



14. Release Cam Handle back to 0° position, allowing capsule bodies to drop into Filler.

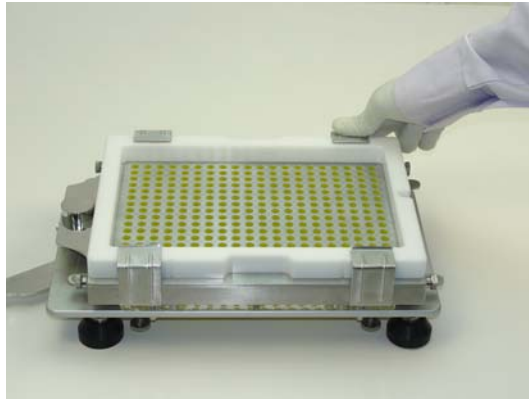


15. Use Push Plate to press capsule bodies level with Filler top sheet. Slide Push Plate off to avoid static. See *Tip #3.*

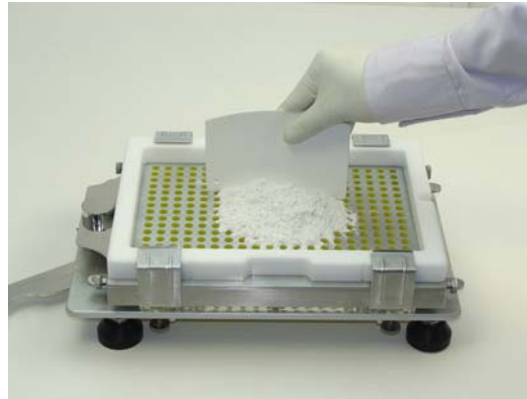
Tips

1. If the caps fail to separate from the bodies in step 13, the Cam Handle should be rotated to a higher degree on the Cam Indicator in step 12. When rotating the Cam Handle, there should be enough pressure on the capsule bodies to hold them inside the Filler, but not so much that the capsules are squeezed to an oval shape. If you get non-separation of capsules, pull the Cam Handle another few degrees.
2. If some capsules fail to separate, check those capsules to make sure they were not already locked.
3. Some capsule bodies may sit lower in the Body Sheets. This will not affect fill weight variation as once you tamp, tap or vibrate the powder, the bodies will all sit at the same level.

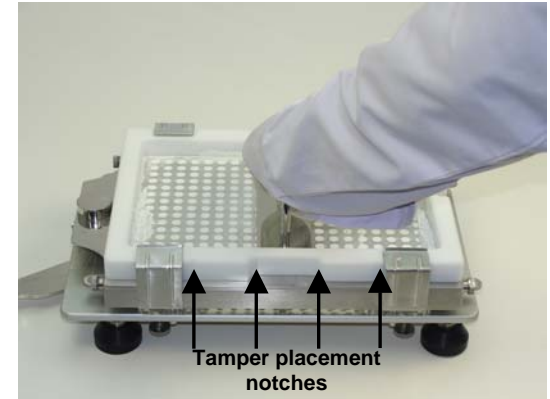
C) Filling and Powder Compression



16. Place Powder Tray onto Filler. Optionally, attach Powder Tray Clamps.



17. Pour pre-measured powder onto Filler. (For overfilling capsules, see *Tip #1*). Use Powder Spreader to move powder from center towards all 4 edges of Powder Tray frame.



18. Use 60-pin Tamber to pack powder. Notches on Powder Tray help guide Tamber placement. Spread remaining powder. Repeat as necessary. See *Tip #2*.

Optional Tapping



18a. Instead of tamping, hold Filler and gently tap against table a few times to settle powder. Powder Tray Clamps are recommended when tapping. Squeeze Cam Handle gently to hold bodies in Filler.



18b. Spread remaining powder and tap again.

Optional Vibrator



18c. Use optional Vibrator as an alternative to tamping or tapping (see pages 16 & 32). Powder Tray Clamps are recommended.

Tips

1. **Overfilling:** To overfill capsules, lower capsule bodies in Filler by turning 4 Spacer Plate Adjustment Knobs clockwise (viewed from top of Filler), lowering the Spacer Plate. This creates space above capsule body for additional powder. If you lower capsule 1 mm, you can fill up to 5-8% more powder. The amount filled depends on type of powder and number of tamps or taps. For coarse or granulated powders that do not compress, an extra 1 mm of depth will fill an extra 1-2% powder. Spacer Plate can be lowered up to 2 mm for 10-15% more powder, or 2-4% for coarse powders.

Additional Overfilling

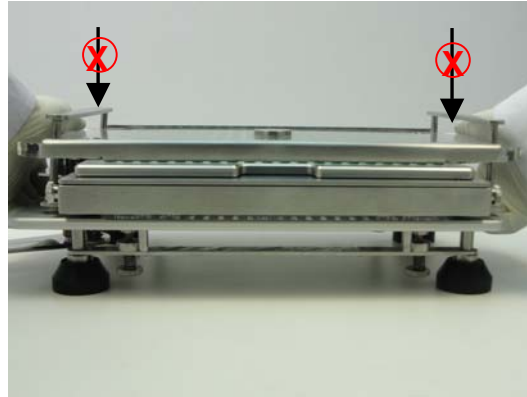
Standard Change Parts have a Top Sheet of the Body Sheet Set that is 3mm thick, which allows the capsule bodies to be lowered about 2 mm. To further overfill capsules, a special OverFill (OF) Kit can be ordered for sizes 000-1 (see Accessories in this manual). The OF Top Sheet is 5 mm thick, allowing the capsules to be lowered a total of 4 mm for twice the overfill capacity of the standard Top Sheet.

2. **Special Fill Materials:** For filling sticky powders or liquids, see section on Special Fill Materials following these Operating Instructions.

D) Re-Assembly of Capsules



19. Remove Powder Tray. Place Caps Tray with Locking Plate onto Filler.



20. With palms of your hands, press down on clear Locking Plate while pulling up Lifting Plate to re-assemble capsules.

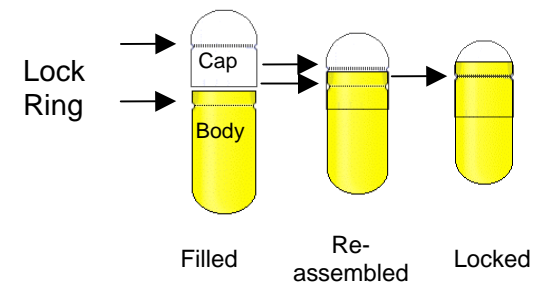


21. Repeat step 20 with hands positioned in opposite corners as shown. Repeat for the other 2 corners. **Caps and bodies are now re-assembled. They are not fully locked. See Tip below.**

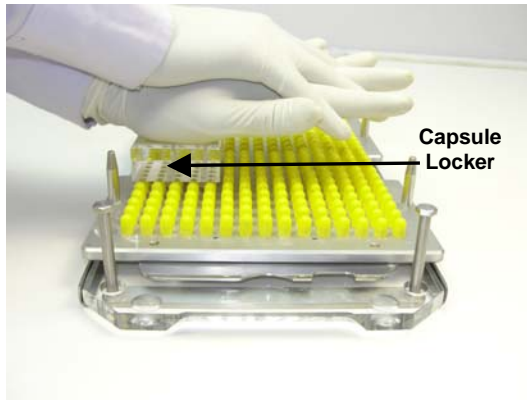
Tip

There are three stages of capsules in the locking process:

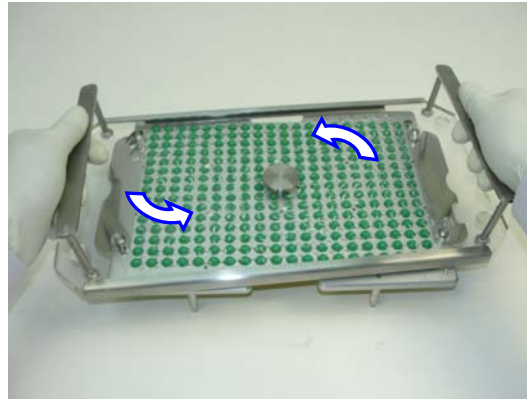
- **Filled:** the capsule bodies have not entered the caps.
- **Re-assembled:** the capsule bodies have pushed to the lock ring of the cap.
- **Locked:** The lock ring on the body enters the matching lock ring on the cap.



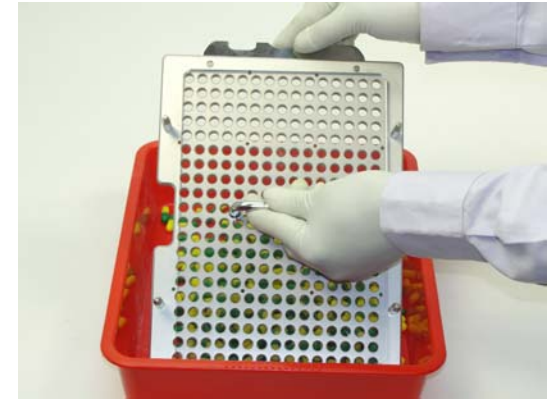
E) Locking of Capsules



22. Remove Caps Tray with Locking Plate and turn them over onto table. Use 25-hole Capsule Locker to lock capsules. Apply pressure with both hands until you feel the capsules snap and lock. Holes in Caps Tray help guide Capsule Locker position.



23. Flip Caps Tray over. Rotate Locking Plate counterclockwise and remove it. You have 300 filled, locked capsules!



24. Turn over Caps Tray into capsule bin and use Push Plate to eject capsules. Capsules are now ready for packaging. See *Tip below*.

Tip

To check that capsules are properly locked, use locked capsule indicator on Caps Tray. Please note that this indicator does not apply to el sizes.

