Safety fillers for pipettes

Mouth pipetting is very strongly discouraged these days, not only because of the risks of getting a mouthful of hazardous chemical, but also because of the hygiene problems associated with shared mouth pieces. However, the safety fillers used instead are not without their hazards.

There are a number of reported cases of cut hands, sometimes requiring stitches, when the pipette has snapped as it was being pushed into the filler. This is particularly likely to occur if the student holds the pipette at some distance from the end, so that leverage is greater. Broken glass seems much less common if the pipette is held just a centimetre or two from the end being inserted. Students need to be trained in how to insert pipettes safely, but however good the training some students will forget.

Has any reader come across strategies to overcome the problem? Do some types of filler give greater problems than others? Please write to John Lawrence at ASE Headquarters.*

There are also ways of damaging the pipette filler, if not the student. For example, the pipette may be pushed too far, displacing the ball valve: this seems particularly likely as the filler ‘gets older, more worn on the inside, and thus the pipette needs to be inserted further to get a good seal. Another problem occurs when solvent is allowed to be sucked all the way into the bulb.

Again, we would be interested to hear of any successful strategies for avoiding such problems, including less vulnerable types of filler.

*Please email ASE’s Health and Safety Group at rwhitcher@btinternet.com