

DLW protocol for Eat Smart Study

Stock dose

1. Measure out based on 375kg person and assume 225kg Total Body Water (TBW)
2. 2.083g ¹⁸O per kg TBW at 10% = 468.65g
3. 0.083g deuterium per kg TBW = 18.68g
4. Label with date, study (ESP) and number (of dose)
5. Autoclave total stock dose
6. **Take sample dose prior to using and freeze. Label as per point 4 above**
7. Refrigerate stock dose

Dosing a subject with DLW

- Provide instructions for collection of urine at home
 - Provide 11 urine pots labelled with the day for collection, study, dose and time
1. Obtain TBW from BIA
 2. Calculate dose of DLW required on following 2.167g DLW/kg TBW
 3. Weigh cup and leave on scales, do not tare scales (refer to assessment day checklist)
 4. Calculate cup and dose DLW to give total weight
 5. Measure DLW into cup on scales until reach value above and record value
 6. Subjects to drink dose-**record time**
 7. Weigh cup after dose drunk and calculate dose drunk –**record dose drunk**
 8. **Record which dose as per point 4 in above section**
 9. Urine sample 5 hours post dose collected
 10. Sample urine to be provided day 1 to 10 consecutively
 11. Phone parents day 9 to remind them to collect final urine sample
 12. Arrange for urine samples to be collected by hospital cars or patient bring in ASAP