

THE S-LABS NEWSLETTER, A LOOK AT SUSTAINABILITY IN LABORATORIES AT THE UNIVERSITY OF BRISTOL.

It's nearing that time of year again, some of us dread it and some of us have already started the countdown. Christmas is creeping up on us and in the spirit of our upcoming holiday, we have green tips for the advent period leading up to the 25th.

This month, we also have news about:

- Chilling up in Biomedical Sciences
- S-Labs competition
- Sustainable procurement
- Reminders

CHILLING UP

It may be time to wave goodbye to minus eighties and say hello to ULTs (ultralow temperature). Fifteen years ago the freezers we now call minus eighties were called minus seventies. As I'm sure you've gathered, it's because they were run at -70°C rather than -80°C. So why did we lower the temperature a few years ago?

The short answer. Marketing. As freezer technology improved, lower temperatures were attained. However there is no scientific evidence showing that samples are better off at -80°C. By raising our ULT freezer temperatures back up to -70°C we can reduce energy consumption and emissions by 25-35% per unit. Remember, running one of these freezers is the equivalent of a whole households worth of energy.

Biomedical Sciences have already chilled up some of their freezers and are going to chill up the whole faculty in the New Year. I would like to thank them for their support and they've paved the way for the rest of the University to follow. If you work in a lab that runs a ULT freezer and are either already running your ULT at -70°C, or decide to chill up straight away please let us know so we can commend your greatness (and estimate energy savings).

Get Creative for S-Labs

All staff and students are invited to use their artistic abilities to design some artwork for University of Bristol S-Labs. The creations will be used as the cover for our social media (Facebook and twitter) as well as on the S-Lab webpage which is undergoing an update. It may also be used in future UoB S-Lab communications such as posters etc.

Contest rules:

- It must be based around the four words of S-Labs – Safe, Secure, Sustainable and Laboratories. It must include labs and sustainability, but safety and security are optional.
- Make it about Bristol, either the university or the city so it is specific to us.
- It can be digital, hand drawn or photography.

As well as taking pleasure in having your artwork displayed, the winner will receive a £50 meal voucher to a choice of the restaurants 1847 or Poco.

Contest open to original work by UoB staff and students. Group applications will be accepted. Entries should be emailed to s-labs@bristol.ac.uk by 4pm on the 15th January 2016. Multiple entries are allowed and descriptions/explanations are welcomed but not necessary.

Advent Tips for a Sustainable Countdown

There isn't 24 of them because fortunately most of us don't work seven day weeks. So here are some feasible but very effective ways you can make your laboratory environment more sustainable in the lead up to Christmas. If you accept this advent challenge we're always interested to know how you've gotten on. You can fill in the **Green Impact Labs workbook** as you go!

- 1) **Tues:** Scrape the ice off your ULT freezers.
- 2) **Weds:** Make lab users aware of what they can and should switch off each day. Contact us for 'switch it off' stickers.
- 3) **Thurs:** The lab has effective communications in place to encourage energy efficient use of fume cupboards/safety cabinets. 'Shut the sash'.
- 4) **Fri:** Make sure there are recycling caddies in your lab along with appropriate signage/posters.
- 7) **Mon:** All lab users have been made aware of the opportunities of becoming an S Lab Champion and implementing Green Impact in laboratories.
- 8) **Tues:** Ensure equipment that is often left on 24/7 unnecessarily has timers attached to reduce operating times. E.g. drying cabinets.
- 9) **Weds:** Look at your water usage. Have lab users been made aware of [best practice](#) to reduce water consumption?
- 10) **Thurs:** Check filters in ULT freezers/fume cupboards/biological safety cabinets and replace if required.
- 11) **Fri:** Look through your chemicals to make sure none of them are out-of-date and dispose of chemical waste by 17th December.
- 14) **Mon:** Check that you don't have any unused or unwanted lab equipment or consumables. If you do, or if you have something you could share, advertise it on [RE-STORE](#).
- 15) **Tues:** Ensure that you don't have any expired or unlabelled samples in your cold storage and dispose of unnecessary samples. If the owner is not known, contact your technical team to discuss further action.
- 16) **Weds:** If you have any old or potentially inefficient equipment, contact Anna Lewis for an energy meter.
- 17) **Thurs:** Chill up your ULT freezer to -70°C.
- 18) **Fri:** Check that all relevant staff have received [CIWM waste awareness training](#).

- 21) **Mon:** Start building an equipment database. Contact us to add to our live document.
- 22) **Tues:** Are new staff and students informed about sustainable lab practice? Implement this in local inductions and contact us for advice.
- 23) **Weds:** Design some artwork for the S Labs competition or if that's not your cup of tea, spread the word!

IT's CHIIIIIIISTMAAAAAAAS!!!

Sustainable Procurement

Sustainability and the Procurement team have joined up to ensure that purchasing for laboratories is as efficient, environmental and economic as possible. We are currently tendering:

- ◆ Drying cabinets – save up to 70% energy with an insulated drying cabinet.
- ◆ Sharps, Wiva and bio-bins – avoids confusion with too many purchasing options and reduces both procurement and waste costs.

Coming up:

- ◆ ULTs
- ◆ RO units
- ◆ Biological Safety Cabinets

If you would like to contribute information about your lab's requirements and specifications for the upcoming tenders please contact S-Labs UoB.

REMINDERS

The only remaining chemical waste collections before Christmas are on the **3rd December** (Langford) and **17th December** (precinct) so please dispose of your chemicals accordingly. Collections will resume as normal in the NY.

Become a staff Sustainable Lab Champion to help embed sustainability within your laboratory. Students are also welcome to be involved with the programme, which could include gaining auditing experience.

IF YOU HAVE ANY QUESTIONS RELATING TO
S-LABS OR HAVE ANY IDEAS OF YOUR OWN THEN
PLEASE FEEL FREE TO CONTACT US:

S-LABS@BRISTOL.AC.UK

Telephone: 0117 33 17110