

Central Proteomics Facility Sample Preparation Guidelines

This document provides a brief description of problems commonly encountered in proteomics experiments and general advice.

- 1) Keratin: Keratin contamination from skin and hair is a common problem. Always wear gloves, especially when handling gels, and avoid working too closely over the gel. Excise gel bands on a clean surface with a clean scalpel.**
- 2) Gel Staining: use an appropriate container for gel staining that is used solely for gel staining (not western blotting etc). Use a plastic container for Sypro fluorescent stains. If using silver stain make sure it is mass spec compatible protocol.**
- 3) Reagents: Always use the highest grade reagents available. Use HPLC grade solvents and Milli-Q water. Fluka is good for high grade ammonium bicarbonate, DTT and iodoacetamide etc. Do not store buffers, always make fresh. This is particularly important for trypsin, DTT and iodoacetamide.**
- 4) Plasticware and glassware: Do not store organic solvents in plastic containers for any length of time, store them in glass. Buy high quality microcentrifuge tubes (eg. Eppendorf) that will not leach.**
- 5) Safety: Be aware of properties of solvents and reagents and dispose of them correctly. Acetonitrile is toxic and flammable and should be disposed of correctly.**