

## GOOD LABORATORY PRACTICE AND SAFETY RULES

1. Before starting the laboratory exercise, put on a laboratory coat, properly fastened, and change your shoes. Your coats, shoes and bags should be in the locker.
2. Do not leave the laboratory without your supervisor's approval.
3. It is allowed only to perform experiments that are scheduled.
4. Do not sit on the laboratory bench, do not smoke, eat, drink and chew gum in the laboratory. Long hair must be tied back to prevent exposure to flames when handling the burner.
5. It is compulsory wear protective glasses (always) and to use rubber gloves, when you are handling toxic or biological materials. Dispose of the gloves into a special container provided.
6. Handle biological samples with great care. Special rules are announced if human blood samples are used.
7. Avoid inhalation of any vapours of solvents, handle volatile liquids and irritants in a fume hood.
8. Be sure there are no open flames in the laboratory if using flammable liquids.
9. Dispose of waste containing toxic or biological materials into the special container after finishing the experiment.
10. Never pipette concentrated acids and bases or solutions of toxic substances by mouth. Use adjustable pipettes, a dispenser or a graduated cylinder. To dilute an acid or base pour slowly the acid or base into water with constant stirring.
11. Use a water bath for warming up or boiling aqueous samples.
12. Dispose of all broken glass into a special container.
13. It is not allowed to take out any chemicals or glass out of the laboratory.
14. Read carefully the instructions for the use of any electric device before handling it and follow the directives of your supervisor. It is not allowed to manipulate any electric device without instruction.
15. Handling of the gas burner: Close the air vent. Strike a match first and then turn on the gas to light the burner. Avoid the hot parts of the apparatus. If the flame starts burning inside the metal part (not properly on the top), close the gas supply immediately.
16. Keep your bench clean and organized. Mop up spills at once. Use proper stoppers in provided bottles, the switching of stoppers can cross-contaminate solutions.
17. Before leaving the laboratory, wash up lab glass, clean your bench, switch off all appliances and wash your hands. Contact you supervisor and he/she will assess your results and protocol.
18. The basic rules of fire prevention, position of fire extinguishers and first-aid kit will be discussed during the first lab session.
19. **Be conscious of hazard**, report any accident however slight to your supervisor. He/she will decide what to do next and notify the Department of Study of the accident in. Basic principles of first aid should be followed. The most typical accidents in the chemical laboratory are as follows:
  - acid/base burns - if acid/base accidentally comes into contact with your eye, skin or clothing, rinse the affected parts **immediately** with a large amount of running water, then notify your supervisor who decides what to do
  - heat burns – cool with running cold water
  - cut on the skin (broken glass) – clean and bandage the wound.
20. Everyone must take care of his/her safety, his/her health, life, health and safety of all other person present. Everyone must follow all legal and other directives concerning safety and respect instructions of the supervisors.
21. Everyone must act to prevent fire origin, especially when using heat, electric, gas or other appliances, when manipulating with flammable or hazardous chemicals or during manipulation with an open fire.
22. Everyone must be familiar with safety rules for usage of provided chemicals. Hazard statements and Precautionary statements of used chemicals are available on every workbench.

**Warning:** It is necessary to keep these rules and instructions of your supervisor, otherwise you could be expelled from the laboratory class.

**Simple calculators (with logarithm) are allowed in seminars - no mobiles, smartphones or tablets.**