

SOP: **SN-01**

Title: **Chemical & Biological Monitoring of Autoclaves &
Rack/Cage Washers**

SOP Last Revision Date:
08JUL09

PURPOSE

The purpose of this Standard Operating Procedure (SOP) is to describe the methods used in evaluating and verifying established practices for the sanitation and sterilization of laboratory animal equipment and facilities at the Laboratory Animal Research Core's animal facilities on the campus of the University of Missouri-Kansas City.

POLICY

It is LARC policy to meet or exceed all federal, state, local regulations and institutional policies/procedures as they apply to the use of animals in research. Personnel must attend any applicable training in animal care and use, occupational health and safety, equipment operation, and Standard Operating Procedures prior to performing activities outlined in this SOP or work under the direct supervision of a trained LARC staff member.

REFERENCES

- A. Laboratory Animal Research Core Personnel
- B. *The Guide for Care and Use of Laboratory Animals "The Guide"*
- C. EQ-01 Operation of Charm FireFly Luminometer
- D. BT Sure Biological Indicator - www.barnsteadthermolyne.com
- E. Charm Sciences Firefly Operator's Manual

PROCEDURES

A. Daily Autoclave/Rack & cage Washer Monitoring

- a. A chemical integrator strip is placed in each load.
 - i. Autoclave - Strips are to be placed inside one of the center items to be sterilized..
 - ii. Washers - a temperature indicator strip is attached to an appropriate piece of equipment or caging.
- b. The Autoclave Record & Washer Records are to be recorded for the unloading side.
- c. At cycle completion, sterilization of contents is verified by either:
 - i. Black lines developed on the autoclave tape.
 - ii. Integrator strip color has entered the ACCEPT point.
 - iii. Temperature strip fails to reach 180° (washers)
- d. The first strip ran each day is to be taped to each Record.
- e. If rejected, materials are to be held and the Area Supervisor notified.

B. Biological Monitoring

- a. In needed, a BT Sure biological indicator is used to test autoclaves by placing an indicator in the first load of the day, incubating it for 24hrs and evaluating results.
- b. Results of the biological indicator testing are recorded on the Autoclave Record. If the test showed to fail, the Area Supervisor is to be notified immediately for process evaluation and possible servicing of equipment by a qualified technician.

C. Additional Periodic Rack & Cage Washer Monitoring

- a. All autoclave and washers will have a professional technician run diagnostic tests to ensure the machines are working properly.

D. Documentation

- a. All test results will be kept and maintained within the LARC.