



Department of National Archives
DNA/11 Conservation Division

Protecting Your Library Material

Topic	Guidelines to Protect Library Material
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1. Environmental challenges

1.1 Paper-based archival and library material could be either a manuscript, a newspaper, a book or a painting. In tropical regions, paper-based documentation is faced with many challengers. Paper materials deteriorate due to the following reasons:

Biological causes: Insects; fungus/ mould

Chemical causes: Temperature; relative humidity; acidity; light; polluted air / dust

Physical causes: Improper handling and usage; improper storage; exposure fire and flood

2. Recommended environmental conditions:-

2.1 The life expectancy of the collection could be increased by maintaining proper environmental conditions in the library. Fungus and insects are common when conditions inside the building are damp and warm. At the least, ventilation should be provided by using exhaust fans for the control of relative humidity. A suitable lighting system with florescent tube lights or CFL bulbs with diffusers should be installed.

2.2 If air conditioners are installed, dehumidifiers should also be installed. The recommended temperature and relative humidity should be maintained with no fluctuation. The best environmental conditions for papers materials is as follows:-

Temperature	-	15.5C ^o -20C ^o (but 18 ^o C is suitable for libraries)
Relative humidity	-	30%-50%
Light	-	Min 10 Lux – Max 50Lux

2.3 The use of monitoring equipment to measure the levels of temperature and relative humidity is necessary to keep track of the environmental conditions in the library. Reading should be consistently collected and stored for interpretation and action.

3. Storage

3.1 The recommended size of a shelf in the Library for storing books is 8'x3'x2'. However, depending on the space, the height of a shelf can be increased or decreased. Shelves should be installed so that the top layer of the shelf is two feet below the ceiling and the bottom layer should be installed six inches from the floor. The spacing between rows of shelves should be three feet and shelves should be installed six inches from the wall.

3.2 Rack should be made of wood such as jack fruit, satin, teak and kohomba or stainless steel. Books should not be stacked too tightly, some space among the books should be left for ventilation.

3.3 To protect against any accidental fires, all electric wiring should go through conduits. Ideally, the main control switches of lights and other fittings should be located outside the library. Smoking should be prohibited in the premises. Installing a fire detection systems is highly recommended. Emergency exits should be identified.

4. Cleaning and fumigation

4.1 All books covered with dust should be cleaned properly, using dry cleaning methods such as suitable vacuum cleaners or soft brushes. If some books are badly damaged do not use vacuum cleaners for cleaning, because that could be lead to more damage.

4.2 Your library collection should be cleaned daily according to a roster and monitored regularly. Regular inspection of books/ documents, at least once in two weeks, would reveal any damage that has occurred due to fungus, insects or other causes of deterioration. If insects / fungus are found, such material can be isolated in order that the spreading can be controlled.

4.3 In the case of a fungus attacks in the library, thymol could be used as a fumigant. 100g of thymol can be used for one cubic meter. The books should be fumigated for seven days and every day a 40W bulb should be lit up for 4 hours.

5. Further action

5.1 If necessary, conversation treatment such as restoration, strengthening and rebinding of damaged books should be carried out. Preventive measures as outline in paragraphs 2,3 and 4 above should be implemented first before proceeding to the adoption of more interventional procedures such as restoration in order to minimize the likelihood of continued deterioration of the collection.

5.2 Furthermore, as per Section 12 of the National Archives Law No. 48 of 1973, as amended by the National Archives (Amendment) Act No. 30 of 1981, the Director General National Archives has the authority to accue important records is private collections. A private individual or the chief executive officer of any institution in possession of any manuscript or document over fifty years old, being a manuscript or document of historical, cultural or literary value should notify the National Archives of the existence of such document or manuscript and may contact the Director General National Archives with a description of the records to be considered for permanent preservation at the National Archives.