TABLE OF CONTENTS

Introduction

Section 1 Who To Call

A list of those persons and/or emergency numbers to be contacted immediately.

Section 2 What To Do Right Away

Suggestions for immediate response. Includes copy of "floor duty" list.

Section 3 What To Save

A prioritized list of materials to rescue.

Section 4 How To Save

Descriptions of how to handle and pack different types of materials, as well as how to stabilize and restore them.

Section 5 Resources and Supplies

Materials and services, on and off the premises, to use in emergencies.

Section 6 Staff

Copy of the staff phone directory for ZSR Library.

Section 7 Floor Plans/Safety Equipment

Color-coded floor plans designating fire alarms, extinquishers, etc.

Section 8 Insurance

Needed information.

Section 9 <u>How To Prevent Disasters</u>

Surveys to update periodically.

Section 10 <u>Bibliography</u>

INTRODUCTION

The Z. Smith Reynolds Library Disaster Plan has two primary goals: to reduce the likelihood that the library will experience a disaster and to mitigate the impact of disasters that do occur.

The best disaster is one for which we are so well prepared that it never happens. Potential for disaster can be reduced by identifying and correcting hazardous conditions and by encouraging staff alertness in detecting and reporting problems.

Disasters can happen at any moment and may come in many forms. The purpose of this plan is to provide useful guidelines for identifying individuals, services, and materials required in the event of a disaster. Because fast action is often needed and because it is difficult to think clearly under emergency conditions, this plan outlines how to respond.

There will be two versions of the Disaster Plan. The first version includes all of the information required by the Disaster Committee in the event of a disaster. This information includes such things as lists of vendors needed in emergency situations, procedures for dealing with wet and/or damaged materials, etc. Two copies of this version will be available. One will be kept by the chairperson of the Disaster Team and the other will be available at the Circulation Desk.

The second version will be a smaller, condensed copy of the main notebook. It will include basic emergency information about who to call, what to do right away, telephone tree for the disaster team, etc. A copy of this version will be given to each member of the Disaster Committee, as well as to each department head.

The Disaster Plan will be reviewed annually for major changes in procedures. Informational changes, such as names and phone numbers, will be updated as they occur, and will be corrected in all versions of the plan.

WHO TO CALL

When a member of the Library Staff encounters an emergency, the first response should always be to contact the Circulation Supervisor at 758-4931. The Circulation Supervisor will then contact Facilities Management at 758-4255 and/or the University Police at 911. The Circulation Supervisor will then contact the Library Director at 758-5480.

When the Library is closed and a disaster occurs, University Police will notify appropriate Library Staff.

1	CIRCULATION SUPERVISOR	*4931
2	UNIVERSITY POLICE or FACILITIES MNGMNT	911 *4255
3	LIBRARY DIRECTOR	*5480

DISASTER TEAM LEADER

Craig Fansler *5482

DISASTER TELEPHONE TREE

- 1. Circulation Supervisor *4931
- 2. University Police 911
- 3. Physical Facilities *5233
- 4. Rhoda Channing *5090 home - 760-8314
- 5. Debbie Lambert *4146 home - 896-1776
- 6. Kristen Morgan *5480
- 7. Disaster Team

Craig Fansler (chairperson)	5482	725-2005
Carol Joyner	3563	767-2273
Lisa Persinger	4585	744-7542
Patrick Ferrell	5416	896-0226
Erik Mitchell	5797	722-1452
Kristen Morgan	5480	595-1601

NOTIFY AND EVACUATE

RESPONSIBILITY FOR EVACUATION OF LIBRARY BY FLOOR

Monday - Friday 8am - 5pm

REYNOLDS WING

Level 8: Administrative Assistant

Level 7: Special Collections Archivist

Level 6: Special Collections Librarian

Level 5: Special Collections Assistant

Level 4: Head, Current Periodicals / Library Assistant, Gov. Info.

Level 3: Library Technician (Preservation)

Level 2: Circulation Desk Supervisor / Circulation Desk Assistant

Level 1: Reserves Assistant

WILSON WING

Level 6: Science Reference Librarian / Social Sciences Librarian

Level 4: Head, Reference Dept. / Document Delivery Assistant

Level 2: Head, Collection Development / Monographic Unit Coordinator

Atrium: Head, Technical Services / Online Maintenance Coordinator

Level 1: Accountant / Serials Unit Coordinator

Persons assigned to these positions are responsible for designating substitute(s) in the event of their absence.

RESPONSIBILITY FOR EVACUATION OF LIBRARY BY FLOOR

Sunday - Thursday 5pm - Midnight

REYNOLDS WING

All levels: Evening Stacks Assistant

If available: Library Assistant, Government Information

WILSON WING

All levels: Reference Staff assigned to Reference Desk

If available: Evening Supervisor, Circulation

Saturday 9am - 6pm and Sunday 1pm - 5pm

REYNOLDS WING

All levels: Stacks Assistant

WILSON WING

All levels: Reference Staff assigned to Reference Desk

Persons assigned to these positions are responsible for designating substitute(s) in the event of their absence.

FACT SHEET FOR EVACUATION

If you are responsible for a level:

- A. Clear all parts of assigned level
- B. Clear restrooms
- C. Clear study areas, stacks and carrels
- D. Report completion of level clearance to Disaster Team

If you are a Team Leader and/or Department Head:

- A. Clear department area
- B. Close windows and doors (do not lock)

Upon hearing the fire alarm, the Team Leader of Access Services or a member of the Circulation Staff will immediately make an announcement on the public address system: "Your attention please: our fire alarm has been activated. Please remain calm and proceed to the Level 2 fire exits." Repeat the message several times and then exit by the safest route.

After making the evacuation announcement, the Team Leader of Access Services will check the alarm panel behind the Reserve Desk. Report the location of the fire to the Disaster Team.

Report persons left behind, or handicapped persons needing assistance, to the Disaster Team. Disaster Team Members will relay this information to University Police.

Staff will report to Department Heads. Department Heads will report missing staff to Disaster Team.

No one will be allowed to return to the building until authorized by University Police.

Everyone should assemble on Davis Field. Remain 300 feet from the building.

WHAT TO DO RIGHT AWAY

TREAT EVERY ALARM AS A REAL FIRE

Make sure that patrons and staff are not in danger. The library staff should not endanger themselves or others to save library materials. Safety comes first.

FIRE/SMOKE

- **A. If you discover a Fire** (Visible Flames or Smoke)
- Pull the alarm and alert people in the immediate area .
- Call University Police at 911 and give details of fire location.
- Notify the Circulation Supervisor at *4931.

If you hear the fire alarm

- Direct patrons to nearest fire exit. DO NOT USE ELEVATORS.
- Assist handicapped patrons to nearest exit or to nearest stairwell. Notify University Police if they need further assistance.
- Everyone should evacuate to the library assembly area located across the street from the front of the library and remain 300 feet from the building.
- If unable to evacuate due to immediate danger, remain calm, go to nearest window and await assistance.
- Do not re-enter the building until advised by the Fire Department or the University Police.

DO NOT RISK YOUR OWN LIFE. Do not waste time forcing patrons to leave. Report their location to the Disaster Team.

KNOW WHERE THE FIRE EXITS ARE LOCATED. If smoke is heavy, it may be necessary to crawl to the nearest exit.

B. Small Fire (e.g., in a waste basket)

- If fire appears to be small and easily contained, use nearest appropriate type of fire extinguisher. (Fire extinguisher locations are included in *Section 7 Floor Plans/Safety Equipment*)
- Notify the Circulation Supervisor at *4931.
- The Circulation Supervisor will notify the Library Director and the University Police. University Police will notify the Fire Department if necessary.

C. Smoke or Burning Odor (No flames visible)

- Notify the Circulation Supervisor at *4931.
- The Circulation Supervisor will notify the Library Director, the University Police and/or Physical Facilities. University Police will notify the Fire Department if necessary.

<u>Water</u>

A. Roof Leaks

- Notify the Circulation Supervisor at *4931.
- Place plastic garbage cans appropriately to collect any falling water.
- Place plastic sheeting over any library materials or files in proximity to the leak.
- Materials on top shelves or in danger of becoming wet should be removed and stored in another location.
- Remove standing water by mopping or wet vacuuming.
- Materials that have water damage should be removed and housed separately
 from dry materials. Depending on the degree of wetness, water-damaged
 materials should be frozen or spread out to air dry. (see Section 4 How To Save)

B. Burst Pipes

- Notify the Circulation Supervisor at *4931.
- If possible, place large plastic garbage cans under falling water.
- Attempt to locate and turn the cutoff valve which controls the water supply to the affected pipe. (see *Section 7 Floor Plans/Safety Equipment*)
- Remove standing water by mopping or wet vacuuming.
- Materials that have water damage should be removed and housed separately from dry materials. Depending on the degree of wetness, water-damaged materials should be frozen or spread out to air dry. (see *Section 4 How To Save*)

C. Flooding From Storms

- Notify the Circulation Supervisor at *4931.
- If possible, create a barrier to prevent additional water from entering the building. Water spreading across uncarpeted floor can be absorbed using cardboard or newspaper.
- If possible, place large plastic garbage cans to catch streams of water.
- Remove standing water by mopping or wet vacuuming
- Materials that have water damage should be removed and housed separately from dry materials. Depending on the degree of wetness, water-damaged materials should be frozen or spread out to air dry. (see *Section 4 How To Save*)

D. Water Damage Caused By Fire Fighting

- Remove standing water by mopping or wet vacuuming.
- Materials that have water damage should be removed and housed separately from dry materials. Depending on the degree of wetness, water-damaged materials should be frozen or spread out to air dry. (see *Section 4 How To Save*)

TORNADO/HURRICANE

Tornado Watch: No sightings, but weather conditions are favorable for a tornado to develop in the immediate vicinity.

When a tornado watch is issued, Circulation will notify the departments in the library following established procedures. No action is necessary except to be prepared to act appropriately if the weather is upgraded to a warning.

Tornado Warning: A warning means that a tornado has been sighted in the immediate vicinity.

University Police will notify the Library Director at *5480. If the Director cannot be reached, they will then contact the Circulation Supervisor at *4931. Circulation will notify each department. If time permits, a sign will be placed at the front entrance notifying patrons of a tornado warning.

- Evacuate the 8th through 3rd and move to the 1st floor (basement level) of the side of the building that you are currently in. (Wilson 6, 4, and 2 move to Wilson 1. Reynolds 8-2 move to Reynolds 1.) If unable to get to 1st floor, head to an interior hallway.
- Move away from open doors and windows .
- Do not use electrical equipment or phones.
- Do not use elevators.
- Do not leave the building until the tornado warning is over.

When the warning has ended, University Police will notify the Director or the Circulation Supervisor. Circulation will then notify all departments that the warning has ended.

POWER FAILURE

Circulation will notify Facilities Management in order to determine the cause of the failure. Circulation will consult with the Library Director regarding evacuation. If the building is to be evacuated, the same evacuation routes established for fire should be used. University Police will prevent anyone from entering the building.

Library staff should assist patrons by directing them with flashlights which are kept on hand in each office area. (see *Section 7 Floor Plans/Safety Equipment*) It is the responsibility of each department to check the flashlights periodically to be sure they are in working order.

The Disaster Prevention Committee recommends that all electrical equipment be turned off before the last staff member leaves the area. This will prevent surges when power is restored.

BOMB THREATS

If a suspicious object is observed, evacuate the immediate area and call 911.

If a phone call bomb threat is received, immediately call 911 (or have someone else call from another line). DO NOT evacuate unless directed to do so by the University Police. (For details on the types of information to get from the caller, please refer to the *Emergency Information Handbook of Wake Forest University*.)

If evacuation is ordered, follow same evacuation routes as those established for fire. Do not re-enter the building until directed to do so by University Police.

EVACUATION PROCEDURES FOR HANDICAPPED PERSONS

When the fire alarm sounds, or an evacuation is ordered, handicapped persons should be instructed to go to the nearest stairwell landing and wait for assistance. Floor clearers should check all stairwell landings as well as stack areas for handicapped individuals and notify University Police of patron location. An evacuation chair is available in the Circulation Department.

It is suggested that people with disabilities prepare for emergencies by learning the locations of eixt corridors and smoke tower stairwells and by informing co-workers, staff members, and/or classmates of best methods of assistance during an emergency.

WHAT TO SAVE

Government Documents

1. Pre-1900 U.S. Congressional Serial Set

call #: Y1.1/2:

2. Pre-1900 Interior Department Publications

call #: I 1.1: Annual Report

I 16.5: History of Education

I 19.1: Annual Report U.S. Geological Survey

I 19.9: USGS Monographs

I 20.1: Report on Indian Affairs

3. Early Smithsonian Institution Publications

call #: SI 1.1: Annual Report

SI 1.6: Smithsonian Contributions to Knowledge

SI 1.7: Smithsonian Miscellaneous Collections

SI 2.1: Publications of the Bureau of Ethnology

SI 2.3: Bulletin of the Bureau of Ethnology

SI 3.3: Bulletin of the National Museum

SI 3.6: Proceedings of the National Museum

SI 4.1: Annual Report of the American Historical Association

4. War of the Rebellion

call #: W45.5:

IF TIME PERMITS, SAVE THESE ITEMS:

1. Congressional Globe/Congressional Record

call #: X:

- 2. Documents catalogs inlcuding Document Catalog, 1909 Checklist, Ames, Monthly Catalog
- 3. House & Senate Journals

call #: XJH, XJS

4. Census

call #: I, C

Information Technology Center

The actual number of collection materials in the ITC is relatively small, but by far the most expensive part of the department is some of their equipment. The following, in order of importance, is what should be recovered if possible. All of the equipment has been marked with orange disaster signs.

1. Media Collection

Laser discs (behind student desk), DVD's (on book truck in room #258 - Florence's office) Sound effects CD's (in audio cabinets in room #258)

2. Hardware in ITC closet off the ITC Lab

2 digital cameras (in cases)

1 Epson Computer Projector (on or in black cart)

3. Hardware in ITC screening room

All units, if possible (4)

4. Software in room #258

Box (hard case) and soft black case of software in room 258 bottom left drawer. Key is in top right drawer of desk.

Reference Department

No specific items to be saved.

Technical Services Department

- 1. Serials Kardex file (behind Gladys Hall's work area)
- 2. Monographs open orders file (behind Kelly Fetty's work area)
- 3. Any books or materials
- 4. Financial files (in file cabinet in Prentice Armstrong's cubicle)
- 5. Serials file cabinet

Special Collections Department

- 1. Babcock Books: glass bookcase in C.L. Smith Reading Room(left hand side of room)
- 2. Maya Angelou Manuscript Collection: Room 600B(closed stack room 6)
- 3. Harold Hayes manuscript collection: Room 600B(closed stack)
- 4. Joseph E. Smith music manuscript collection: Room 600B(closed stack)
- 5. Dolmen Press Archives: Room 600B(closed stack)
- 6. Wayne Oates manuscript collection: Room 600B(closed stack)

HOW TO SAVE

Salvage Procedures for Water Damaged Items

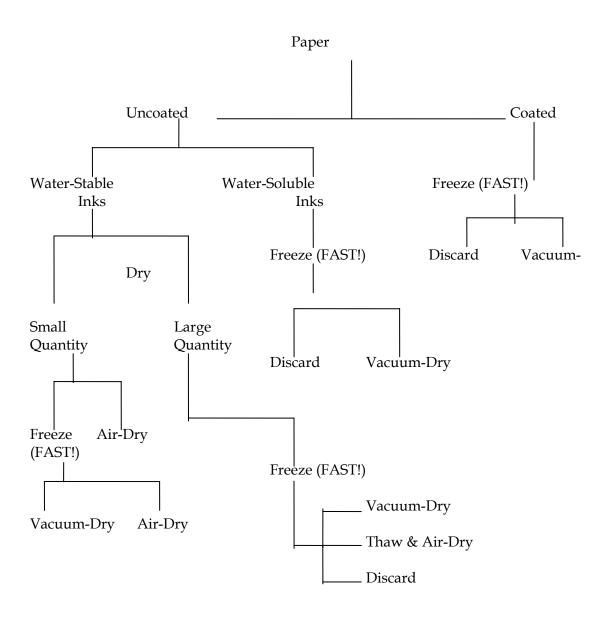
A. General Information

- Make an initial assessment of damage to materials based on the following questions. Begin keeping a detailed visual record (photographs, video), of the damage and the recovery process.
 - What types of materials have been damaged?
 - What is the nature of the damage?
 - How extensive and severe is the damage?
- Based on the initial damage assessment, decide on a salvage strategy. Severe fire
 damage is generally irreversible; salvage is not possible. Water-damaged
 materials can usually be salvaged, but the process is expensive, labor-intensive,
 and time-consuming. Replacement is most appropriate for readily available
 items such as current newspapers and journals, recent monographs, and
 commercially produced microforms.
- Materials that are severely damaged should be set aside rather than discarded immediately. This will allow efforts to be concentrated on materials that can be saved and permit a second evaluation of the worst cases when time allows.
- If water damage is present, take **immediate** action to lower the temperature and humidity in order to inhibit mold growth. Target temperature should be 65° and humidity at 45%. The Administrative Assistant should notify Facilities Management to adjust heat or air conditioning. Set up dehumidifiers and fans. Remove standing water by mopping or wet vacuuming.
- The Library Director will decide whether the building or any part of it should be closed and whether hours and services should be curtailed. Rope off the damage area to keep out patrons.
- Check frequently to make sure that measures taken to stabilize the emergency are still working. For example, is water accumulating on, or dripping around the edges of plastic sheeting covering the shelves? Are ceiling tiles collecting water that will cause them to collapse onto shelves below?
- Salvage of damaged materials is not possible without a substantial contribution of staff time. The following precautions should be observed when recruiting and training salvage volunteers:
 - Salvage work involves moving full book trucks and lifting boxes as well as less strenuous tasks. Wet materials are much heavier than dry ones. Volunteers should be assigned to activities appropriate to their physical capabilities.

- **2.** Salvage work may take place in wet, dirty, and cold surroundings. Volunteers should be instructed to dress accordingly.
- **3.** Food and drink should be provided for volunteers, if possible. Volunteers should also be encouraged to take breaks as needed rather than working to the point of exhaustion.
- **4.** Volunteers should be kept informed about the progress of the salvage effort so that they will feel assured that their efforts are meaningful.
- If salvage of water-damaged materials is to be undertaken, decide what method(s) to use and begin making appropriate outside contacts. (See Decision-Making Tree in the next section.)
 - 1. <u>Air-drying</u> is the simplest and least expensive option, and it can be conducted entirely in-house if sufficient space and staff can be made available. It is also extremely labor-intensive. Treatment of all items must <u>begin within 48 hours</u> in order for air-drying to succeed and may result in badly distorted bindings and textblocks. It is seldom successful for drying bound, coated paper. Designate a work area with plenty of space and work tables. Arrange for staff to be contacted and trained.
 - 2. Freezing (< 32°F) Should be done within 24 hours of being damaged. It is not primarily a treatment method itself, but a way of arresting damage until treatment can proceed. Freezing halts mold growth, prevents ink from running and pages from sticking together, reduces smoke odor, and initiates the drying process. Books may be frozen indefinitely with no further damage, and all further treatment options still remain possible. Books will dry best if their bindings are supported firmly to inhibit initial swelling.
 - 3. <u>Vacuum-freeze drying</u> is a commercially available service in which frozen materials are placed in a vacuum chamber so that ice crystals vaporize without melting. This process is especially appropriate for large numbers of very wet books as well as for materials made with coated paper.
 - **4.** Other commercial drying processes include dehumidification and thermal-vacuum-drying and may by appropriate in some situations. Consult vendor(s) for more information.

Decision-Making Tree For Disaster Recovery

Produced by the SOLINET Preservation Program staff based on a diagram by Richard Baker July 1991



B. Organizing Salvage Teams

1. Team Leader Guidelines

- **a.** Familiarize yourself with the causes and effects of damage associated with the disaster, as well as the techniques available for salvage of materials.
- **b.** Define the tasks to be accomplished and delegate individual areas of responsibility to team members. (e.g. Assign Sorters, Packers, a Recorder, and a Supply Person)
- **c.** Review the shelving areas assigned to your team and direct members to begin with items designated as top priority.
- **d.** Indicate potential problem areas such as leather bound volumes, swollen items, materials on the floor, etc., and give instructions as appropriate.
- **e.** Remain visible and accessible at all times and attempt to anticipate any difficulties the team might encounter.

2. Sorter Guidelines

- **a.** Sorters must be able to remove wet books from shelving without damaging the volumes. This can be difficult at times since books become quite swollen when wet and may become wedged on the shelves.
- **b.** The amount of water damage to an item will determine the type and urgency of treatment needed for salvage. It is therefore important to sort materials by the degree of wetness whenever possible.
- **c.** Using a book truck for sorting, group materials into **DRY**, **DAMP**, and **WET**. Assign separate trucks or shelves for each category. If using separate shelves, put dry material on the top shelf, and wet ones on the bottom. Attempt to keep books in call number order whenever possible.
- **d.** Items bound in leather or coated paper will often stick together and should be handled and packed as a unit. Any attempt to pull these items apart will likely result in further damage.
- **e.** Water-soaked volumes should not be squeezed to wring out excess water, as this can damage the binding structure.
- **f.** When the book truck is full, take it to the packing area where items will be boxed.

• If book trucks cannot be maneuvered in the damaged area, or if the elevators are disabled, a human chain may be needed to move items to the packing area. If conditions prevent a packing area from being established, books should be packed directly from shelves. While this minimizes the number of times a book is handled, a safeguard for items in fragile condition, it usually eliminates the possibility of wrapping the volumes in freezer paper. Even so, an attempt should be made to separate wet books from dry ones.

3. Packer Guidelines

- **a.** Wet books are very susceptible to further damage when improperly handled, but securely packed materials have a much better chance of being salvaged.
- **b.** Packers must properly sort, wrap and pack all items, marking boxes clearly with labels and instructions determined by the Recorder.
- c. After being sorted by the degree of wetness, books should be packed <u>spine</u> <u>down</u> in a single row until the box is comfortably full (not loose or tight). Oversized volumes are best packed flat, while business file folders should be packed vertically. (See diagram on the next page.)
- **d.** Each volume should be wrapped or interleaved with clean newsprint, freezer paper, or waxed paper to prevent books from sticking together. If time or supplies are limited, wrapping every other book will suffice. If packing directly from the shelves, it may be impossible to wrap individual volumes.
- **e.** When wrapping with freezer paper, place the shiny side toward the book. When using waxed paper, keep the waxed side away from the book.
- **f.** Boxes of one cubic foot (12" x 15" x 10") are recommended, as anything larger may be too heavy to move when full. Hollinger boxes or records center boxes are ideal.
- **g.** All boxes should be clearly marked on several sides using permanent ink, indicating the condition of the contents (Dry, Damp, or Wet), and any other instructions determined by the Recorder.
- **h.** Boxes may weigh up to 50 lbs. when filled with wet materials. Be careful in lifting and don't hesitate to get help when boxes are too heavy for one person to move safely.

4. Recorder Guidelines

- **a.** It is not unusual for several sites to be used in a major disaster. The goal of an effective record keeping process is to be able to retrieve any particular box of material from any location as needed to dry and/or reshelve.
- **b.** The Recorder's major responsibilities are to completely document everything that happens during the response and recovery operation, and to keep track of ALL materials as they are packed and shipped off-site.
- **c.** The Recorder will need to devise a scheme to keep track of material (call number, location, etc.) and use it consistently throughout the recovery operation.
- **d.** The Recorder should assign some identification to be marked on each box, and upon completion of packing, should transfer this information to a master list.
- **e.** When documented effectively, items should be able to be retrieved on demand and processed according to established priorities for salvage.

5. Supply Distribution Guidelines

- **a.** The Supply Person reports directly, and is an advisor to, the Disaster Team Leader.
- **b.** The Supply Person is responsible for obtaining, maintaining, allocating and distributing all recovery supplies.
- **c.** During disaster response and recovery, the Supply Person coordinates the supply effort by seeing that supplies are available and distributed to team members as needed.
- **d.** The Supply Person should make of list of supply items used so that they can be replaced.

Team Leader Guidelines

- 1. Familiarize yourself with the causes and effects of damage associated with the disaster, as well as the techniques available for salvage of materials.
- Define the tasks to be accomplished and delegate individual areas of responsibility to team members. (e.g. Assign Sorters, Packers, a Recorder, and a Supply Person)
- Review the shelving areas assigned to your team and direct members to begin with items designated as top priority.
- 4 Indicate potential problem areas such as leather bound volumes, swollen items, materials on the floor, etc., and give instructions as appropriate.
- 5. Remain visible and accessible at all times and attempt to anticipate any difficulties the team might encounter.

Sorter Guidelines

- 1. Sorters must be able to remove wet books from shelving without damaging the volumes. This can be difficult at times since books become quite swollen when wet and may become wedged on the shelves.
- 2. The amount of water damage to an item will determine the type and urgency of treatment needed for salvage. It is therefore important to sort materials by the degree of wetness whenever possible.
- 3. Using a book truck for sorting, group materials into **DRY**, **DAMP**, and **WET**. Assign separate trucks or shelves for each category. If using separate shelves, put dry material on the top shelf, and wet ones on the bottom. Attempt to keep books in call number order whenever possible.
- 4. Items bound in leather or coated paper will often stick together and should be handled and packed as a unit. Any attempt to pull these items apart will likely result in further damage.
- 5. Water-soaked volumes should not be squeezed to wring out excess water, as this can damage the binding structure.
- 6. When the book truck is full, take it to the packing area where items will be boxed.
- 7. If book trucks cannot be maneuvered in the damaged area, or if the elevators are disabled, a human chain may be needed to move items to the packing area. If conditions prevent a packing area from being established, books should be packed directly from shelves. While this minimizes the number of times a book is handled, a safeguard for items in fragile condition, it usually eliminates the possibility of wrapping the volumes in freezer paper. Even so, an attempt should be made to separate wet books from dry ones.

Packer Guidelines

- 1. Wet books are very susceptible to further damage when improperly handled, but securely packed materials have a much better chance of being salvaged.
- 2. Packers must properly sort, wrap and pack all items, marking boxes clearly with labels and instructions determined by the Recorder.
- 3. After being sorted by the degree of wetness, books should be packed <u>spine down</u> in a single row until the box is comfortably full (not loose or tight). Oversized volumes are best packed flat, while business file folders should be packed vertically. (*See attached sheet*.)
- 4. Each volume should be wrapped or interleaved with clean newsprint, freezer paper, or waxed paper to prevent books from sticking together. If time or supplies are limited, wrapping every other book will suffice. If packing directly from the shelves, it may be impossible to wrap individual volumes.
- 5. When wrapping with freezer paper, place the shiny side toward the book. When using waxed paper, keep the waxed side away from the book.
- 6. Boxes of one cubic foot (12" x 15" x 10") are recommended, as anything larger may be too heavy to move when full. Hollinger boxes or records center boxes are ideal.
- 7. All boxes should be clearly marked on several sides using permanent ink, indicating the condition of the contents (Dry, Damp, or Wet), and any other instructions determined by the Recorder.
- 8. Boxes may weigh up to 50 lbs. when filled with wet materials. Be careful in lifting and don't hesitate to get help when boxes are too heavy for one person to move safely.

Recorder Guidelines

- 1. It is not unusual for several sites to be used in a major disaster. The goal of an effective record keeping process is to be able to retrieve any particular box of material from any location as needed to dry and/or reshelve.
- 2. The Recorder's major responsibilities are to completely document everything that happens during the response and recovery operation, and to keep track of ALL materials as they are packed and shipped off-site.
- 3. The Recorder will need to devise a scheme to keep track of material (call number, location, etc.) and use it consistently throughout the recovery operation.
- 4. The Recorder should assign some identification to be marked on each box, and upon completion of packing, should transfer this information to a master list.
- 5. When documented effectively, items should be able to be retrieved on demand and processed according to established priorities for salvage.

Supply Distribution Guidelines

- 1. The Supply Person reports directly, and is an advisor to, the Disaster Team Leader.
- 2. The Supply Person is responsible for obtaining, maintaining, allocating and distributing all recovery supplies.
- 3. During disaster response and recovery, the Supply Person coordinates the supply effort by seeing that supplies are available and distributed to team members as needed.
- 4. The Supply Person should make of list of supply items used so that they can be replaced.

SALVAGE OPERATIONS FOR WATER DAMAGED COLLECTIONS

by Betty Walsh, Conservator, Provincial Archives of British Columbia Western Association for Art Conservation Newsletter, May 1988, vol. 10, no. 2.

A. General

- 1. Designate (preferably before the disaster) a Recovery Director. Know how to find a recovery specialist or use a conservator or other staff member trained in dealing with emergency salvage.
- **2.** Do not enter the building until it has been designated as safe. Confer with the maintenance director, fire and police departments.
- **3.** Recovery Director assembles the Disaster Team.
- **4.** The Recovery Director and Recovery Specialist, accompanied by the Recorder and a photographer, will assess the scene of the disaster. The latter three will survey and photograph the damage.
- **5.** Decide whether the building will stay open, or closed so staff can participate in salvage operations.
- **6.** The Recovery Director ensures that he or she has an office or desk near the site and is accessible by phone or walkie-talkie.
- 7. The logistics manager arranges for emergency facilities and supplies. Arrangements should be made for team members—coffee, portable toilets, etc.
- **8.** The Recovery Director will coordinate with the maintenance director to:
 - **a.** Reduce the temperature to less then 18°C (65°F) by turning down the heat.
 - **b.** Lower relative humidity by adjusting the humidification system or installing dehumidifiers. Monitor.
 - **c.** Circulate air with fans. Open doors if security is available.
- **9.** Obtain generators if the electricity is off. Use safely grounded, waterproof cords.
- **10.** The Recovery Director will delegate teams for salvage. Team members will be briefed and assigned to:
 - **a.** Prepare packing materials (cutting freezer paper, assembling cardboard boxes) and move to packers.

- **b.** Pack the damaged collections. Begin with the wettest objects and items on the floor. See packing instructions below for the materials being handled.
- **c.** Move crates and boxes by hand trucks and pallet movers if possible.
- 11. The Recorder numbers the crates and records their contents. If catalogue numbers aren't evident, note the location where the object was found. Record the condition of the contents as wet, partially wet, or damp. Label crates with Tyvek tags; mark cardboard boxes directly.
- **12.** If the damage is substantial and salvage will take more than 10 hours, loosen tightly packed document boxes, books and pamphlets so they do not jam into the shelves.
- **13.** Do not separate the remaining dry books and documents when the relative humidity is high. If the RH remains high during cleaning and repairing of the storage areas, remove to an air conditioned room. However, evacuate undamaged diskettes because they are sensitive to a high relative humidity.
- **14.** Meetings will be held at the beginning and end of each day to review strategy and to keep up morale.
- **15.** The shelves will be repaired and cleaned after the books and documents are removed.

B. Guidelines for Packing

Be extremely careful when handling wet materials. All of them are very fragile, including their paper boxes. If the boxes have disintegrated, replace them with new containers. Don't unpack structurally sound containers (although they may be reinforced by packing inside plastic crates). Fill cartons and crates three-quarters full. Keep identification labels with objects (Don't mark wet paper, but picture frames and reels can be marked with grease pencil). To avoid mechanical damage, do not stack materials in piles or on the floor.

Paper

Single sheets of paper

Do not try to separate but interleave the folders every two inches with freezer paper and pack.

Watercolors, maps, and manuscripts with soluble media

Do not blot the surface. Quickly freeze or dry.

Coated papers

Keep wet by packing in boxes lined with garbage bags, then freeze.

Framed prints and drawings

If time and space permit, unframe and pack as for single sheets.

Maps, plans, oversize prints, and manuscripts

Sponge standing water out of map drawers. Remove the drawers from the cabinet, ship and freeze them stacked up with 1" x 2" strips of wood between each drawer. Pack loose, flat maps in bread trays, flat boxes, or plywood sheets covered in polyethylene. Bundle rolled maps very loosely to go in small numbers to the freezer, unless facilities are available for conservators to unroll them.

Books

Don't open or close wet books or remove wet book covers. If the water is dirty, wash the books before freezing. Do not wash open books and those with water soluble media. Wash closed books in tubs of cold running water and dab away (do not rub) mud with a sponge. Time and facilities may limit this treatment.

Lay a sheet of freezer paper around the cover, and pack spine down in a milk crate or cardboard carton.

Leather, parchment and vellum bindings are an immediate priority because they distort and disintegrate in water. Books with coated papers should be kept wet by packing inside boxes lined with garbage bags, then frozen.

Paintings

Drain off excess water and take to a work area for immediate drying. Transport horizontally if you can. If not, carry the painting facing toward you, holding the side of the frame with the palms of your hands. Larger paintings should be carried by two people. The order of removal and treatment is: First, the most highly valued; second, the least damaged; third, slightly damaged and fourth, severely damaged.

Floppy Diskettes

If the diskettes are wet, pack them upright in containers of cold distilled water. Make arrangements to air dry.

Sound and Video Recordings

Phonodiscs

If storage boxes are badly damaged, transfer the discs, up to five at a time, to milk crates. Pad the bottoms of the crates with ethafoam and interleave with ethafoam every 25 records to absorb shocks. Always support the discs vertically and hold the discs by their edges. Avoid shocks and jolts during transport.

Sound and Video Tapes

Pack vertically into egg crates or cardboard cartons. Do not put excessive weight on the sides of the reels or cassettes.

Photographic Materials

Salvage without delay these historic photographs:

Wet collodion photographs (ambrotypes, tintypes, pannotypes and wet collodion glass negatives)

Salvage first and air dry immediately. Both immersion and freezing will destroy the emulsion.

Daguerreotypes

Salvage and air dry.

Nitrates with softening emulsions

Freeze immediately and make arrangements to freeze dry. Emulsions are water soluble and cold be lost.

Other photographs should be kept wet in containers of fresh cold water until they are either air dried or frozen. If allowed to partially dry, they will stick together. Pack inside plastic garbage pails or garbage bags inside boxes. Keep to a minimum the immersion time to treatment or freezing.

Prints, negatives, and transparencies

Salvage color photographs first, then prints, then black and white negatives and transparencies. If facilities and personnel are available, air dry. Pack and freeze if not.

Motion pictures

Open the film can, fill it with water, and replace lid. Pack into plastic pails or cardboard cartons lined with garbage bags. Ship to a film processor for rewashing and drying.

Microforms

Microforms in rolls

Do not remove the films from their boxes. Hold cardboard boxes (and their labels) together with rubber bands. Fill boxes with water, then wrap 5 cartons of film into a block with plastic wrap. Pack the blocks into a heavy duty cardboard box lined with 3 garbage bags. Label as wet film and ship to a microfilm processor.

Aperture cards

Pack and freeze.

Microfilm strips in jackets

Pack and freeze.

Diazo microfiche

Pack, freeze, and make arrangements to air dry.

Parchment and vellum

Separate from other documents, pack in crates or flat boxes, and freeze.

C. Recovery Methods for Materials Requiring Immediate Attention or Unusual Treatments

Paintings

Ideally, this treatment should be done by a conservator.

Initially, set up tabletops padded with blotters and covered with plastic.

Separate the merely wet paintings from those showing structural damage. Signs of structural damage are tears in the canvas, flaking, lifting, and dissolving of paint and ground layers. Let the structurally damaged paintings dry, face up in a horizontal position, on the tables.

Structurally sound paintings on canvas are dried in the following way: Set up several more layers of blotter on the table, followed by a layer of tissue paper. Unframe the painting, but don't remove it from its stretcher. Lay it face down on this surface, making sure the tissue is not wrinkled. Cut blotters to the inside dimensions of the stretcher frame. Cut a sheet of plywood or thick masonite to the same dimensions, or smaller to fit inside the stretcher keys. Cover the back of the canvas with a blotter (if the canvas is large and more than one blotter is necessary, butt the blotters end-to-end), then the board, and finally weights. Change the blotter until the canvas is dry. If the tissue on the front has any tendency to stick to the paint layer, leave it in place.

Floppy Diskettes

The diskettes should be removed from their jackets, washed, and dried. Cut the edge of the jacket with non-magnetic scissors and remove the diskette with gloved hands. Wash in several water baths (photo trays) or distilled water, and dry with lint free towels. When the crisis is over, insert the diskettes into a new jacket (cannibalize from a new diskette; this can be reused) and copy with a disk drive. The drive heads should be cleaned frequently.

Sound and Video Recordings

Phonodiscs

Remove the discs from their sleeves and jackets. If labels have separated, mark the center of disc with a grease pencil and keep track of the label. Jackets, sleeves, and labels may be dried like other paper materials. If dirt has been deposited on the discs, they may be washed in a 10% solution of KodaK Photo Flo in distilled water. Air dry the discs on supports that permit free circulation of air.

Reel to Reel Tapes

If the exterior of the tap is dirty, wash the tape (still wound on its reel) with lukewarm water. Support the tape vertically and air dry it, or air dry by laying it on sheets of newsprint spread over plastic covered tables. The box can be air dried as well. If the reels are still dirty, remove the tape and wash the reel with detergent and water. An alternative is to replace the reel. Return the tape to its original box, after the box has dried. Replace the box if badly damaged.

Videocassettes

Dismantle the cassette and dry as for reel to reel tapes.

Audio Cassettes

If there are no master copies, dismantle the cassette and air dry the tape as above. Rerecord the tape after drying. It is difficult to determine the condition of sealed cassettes. Copy them in any case.

Photographic Materials

The first priority is to dry wet collodion photographs and daguerreotypes. The recovery rate may not be very high.

Case Photographs

Remove the assembly from the case. Carefully fold back the preserver frame, cut the sealing tape (if present) and take the assembly apart. Place daguerreotypes face up on blotters with the case components beside them. Wet collodion photographs should be dried in a similar way emulsion side up.

Wet Collodion Glass Negatives and Unmounted Case Photographs Dry emulsion side up on blotters.

Prints, Negatives and Transparencies

In order of preference, the drying methods are: air dry, freeze, thaw and air dry, and freeze dry. Vacuum drying will make the photographs stick together into a lump. If the photographs have been immersed in dirty water, clean them before air drying or freezing. Time and facilities may modify the following:

Black and white prints and negatives

Wash for half an hour in changes of cold water. Gently swab off stubborn dirt from the surface. Rinse with Kodak Photo Flo solution.

Color prints

Wash as above, but for a shorter time.

Color negatives and transparencies

Wash as black and white negatives. A few varieties require bathing in a stabilizer prior to drying.

Color negatives. Rinse for 1 minute using Kodak C41 stabilizer.

Ektachrome Transparencies. Rinse 10-15 seconds in Kodak E6 stabilizer.

Kodachrome. No stabilizer required.

Eastman Color Film. Send to a Kodak Laboratory.

Air drying. Remember to keep the photographs wet until they are separated from each other and their enclosures. If the photographs have been previously frozen, thaw them. If it appears that the photographs could dry and stick together during thawing, immerse again in cold water. Dry the photographs emulsion side up on blotters, paper or nylon screen.

Microforms

Aperture Cards

At present, the only treatment is a time-consuming one. Remove the film chips from their mounts. Wash the chips and remount them.

Microfilm Strips in Jackets

Cut the strips from the jackets with sleeve cutters. Wash and dry the film and insert into new jackets.

Diazo Microfiche and Rolls

Check for readability. If the photograph has blistered, discard and replace with a print from the security copy. If it has not delaminated, wash in cool water and dry on blotters or a lint-free cloth.

SALVAGE OF WATER-DAMAGED ARCHIVAL COLLECTIONS SALVAGE AT A GLANCE

Material	Priority	Handling Precautions	Packing Method	Drying Method
Paper				
Manuscripts, documents and small drawings	Freeze or dry within 48 hours	Don't separate single sheets	Interleave between folders and pack in milk crates or cartons	Air, vacuum, or freeze dry
Watercolors, and other soluble media	Immediately freeze or dry	Do not blot	Interleave between folders and pack in milk crates or cartons	Air or freeze dry
Maps; oversize prints and manuscripts	Freeze or dry within 48 hours	Don't separate single sheets	Pack in map drawers, bread trays, flat boxes or poly-covered plywood	Air vacuum, or freeze dry
Coated papers	Immediately pack, then freeze or dry within 48 hours		Keep wet in containers lined with garbage bags	Freeze dry only
Framed prints and drawings	Freeze or dry within 48 hours		Unframe if possible, then pack as for manuscripts or maps above	Once unframed and unmatted, air or freeze dry
Books			_	
Books and pamphlets	Freeze or dry within 48 hours	Do not open or close, do not separate covers	Separate with freexer paper, pack spine down in milk crate or cardboard box	Air, vacuum, or freeze dry
Leather and vellum bindings	Immediately freeze	Do not open or close, do not separate covers	Separate with freexer paper, pack spine down in milk crate or cardboard box	Air or freeze dry
Keep wet inside a container lined	Immediately pack, freeze or dry within 48	Do not open or close, do not separate covers	Keep wet; pack spine down in milk crate or	Freeze dry only

with garbage bags	hours		cardboard box	
Paintings Paintings	Immediately dry	Drain and carry horizontally	Face up without touching paint layer	Air dry. See detailed instructions
Floppy Diskettes				
Floppy diskettes	Immediately pack	Do not touch diskette surface with bare hands	Contact supplier for best method	Contact supplier for best drying method
Sound & Video Recordings				
Discs	Dry with 48 hours. Freezing is untested; if it is necessary, freeze at above 0°F (-18°C)	Hold discs by their edges. Avoid shocks	Pack vertically in ethafoam- padded plastic crates	Air Dry
Sound and videotapes	Freezing is untested; if it is necessary, freeze at above -10°C		Pack vertically into plastic crates or cardboard cartons. Don't put any heavy weight on the sides of reels or cassettes	Air dry
Photographs				
Wet Collodion photographs (ambrotypes, pannotypes, wet collodion negatives)	Recovery rate is low. Immediately dry	Handle with care – glass supports or glazing	Horizontally in padded container	Air dry face up. Never freeze.
Daguerreotype s	Immediately dry	Handle with care—usually cased behind glass	Horizontally in padded container	Air dry face up
Nitrates with soluble emulsions	Immediately freeze	Do not blot		Air dry; test freeze drying
Prints, negatives, and	Freeze or dry within 72	Do not touch emulsions with	Keep in cold water. Pack in	Order of preference: 1)

transparencies	hours. Salvage order: 1) color photographs, 2) prints, 3) negatives and transparencies	bare hands	containers lined with garbage bags	air dry, 2) thaw and air dry, 3) freeze dry. Do not vacuum dry
Motion pictures	Rewash and dry within 72 hours		Fill film cans with cold water and pack in plastic pails or cardboard cartons lined with garbage bags	Arrange for film processor to rewash and dry
Microfilm rolls	Rewash and dry within 72 hours	Do not remove from boxes; hold cartons together with rubber bands	Fill boxes with water and pack (blocks of 5) in a cardboard box lined with garbage bags	Arrange for a microfilm processor to rewash and dry
Aperture cards	Freeze or dry within 48 hours		Keep wet inside a container lined with garbage bags	Air dry
Jacketed Microfilm	Freeze or dry within 48 hours		Keep wet inside a container lined with garbage bags	Air dry
Diazo fiche	Last		In drawers or cartons	Air dry

Betty Walsh, Conservator, Provincial Archives of British ColumbiaWAAC Western Association for Art Conservation

TECHNI QUE	PROCED URE	SPEED	DIRECT COST	STAFF & LABOR	AVAIL.	RESULTS
Air- drying	Items dried by circulating air in a low- temperatu re, low humidity space	days or weeks	negligible	high	very good	swelling, cockling, blocking, inks run, mold threat
Dehumidi fica-tion	Large, commerci al dehumidif iers installed to dry buildings, furnishing s, and collections in situ	varies		low	good	limited cockling, if used only on damp items
Freezer drying	Items placed in self- defrosting freezer (under - 10°	weeks or months	negligible (if done at home)			
Vacuum thermal drying	Items placed in chamber; vacuum drawn; heat introduce d to melt and/or "boil out" water	4-6 weeks per load	\$3-5 per volume	low	good	Potential swelling, cockling, ink runs, blocking, damage to film media
Vacuum freeze- drying	Frozen items placed in chamber; vacuum	1-2 weeks per load	\$5-7 per volume	low	good	leather and vellum may warp;

drawn	;	photos
small		may lose
amoun	t of	gloss
heat		
introdu	ace	
d (belo	w	
32°F); i	ce	
crystal		
drawn		
by		
sublim	atio	
n		

SOLINET Preservation Program. Atlanta, GA: Southeastern Library Network, Inc., February 1989.

Salvage Procedures for Fire Damaged Items

- **A.** Evaluate extent of fire, smoke, and water damage to collections, equipment, and facilities.
 - 1. Note the types of materials damaged, the kinds of damage, and the extent of the damage
 - 2. Give priority treatment to water-damaged materials. Most damage even in a fire will be water damage. Water-damaged materials require immediate attention to prevent further deterioration and the growth of mold.
 - **3.** Books exposed to the heat of a fire may become brittle and may require conservation treatment or replacement.

B. Smoke or soot-damaged materials

- 1. Carefully vacuum away any loose soot or dirt.
- 2. Smudges on bindings, dust jackets, and pages may be removed by carefully wiping with a Staedtler Mars-Plastic eraser. Hold book or paper firmly with free hand and move eraser from center of surface toward the edge. NEVER erase from the edge in as this will wrinkle or tear the paper.
- **3.** An alternative cleaning technique is the use of dry chemical sponges (Chem-Clene, Chem-Glide).
- **4.** Smoke odor may be removed by vacuum-drying items in a chamber filled with another scent or with ozone.

C. Charred materials

The damage caused by charring is irreversible. However, if the charred materials are valuable archival documents or rare books, it may be possible to preserve or photocopy them. DO NOT DISTURB SUCH MATERIALS until specialists have time to examine them and determine appropriate procedures.

DISASTER SUPPLIES

Reynolds 229 - Gifts Storage Room

Main roll of wrapping paper Large rolling platform

Reynolds 329 - Preservation Room

- 1 Stack of wrapping paper
- 1 Instruction packet
- 4 Rolls of packing tape
- 8 Legal pads
- 2 Markers
- 6 Pencils
- 25 Packing boxes
- 1 First Aid Kit

Reynolds 408 - Gov. Docs Closet

- 1 Stack of wrapping paper
- 2 Instruction packet
- 6 Rolls of packing tape
- 6 Legal pads
- 2 Markers
- 12 Pencils
- 368 Packing boxes
 - 1 First Aid Kit

Reynolds 6 - Closed Stacks in Rare

- 2 Stacks of wrapping paper
- 1 Rolls of packing tape
- 2 Markers
- 5 Legal pads
- 4 Pencils
- 136 Packing boxes
 - 2 Boxes of plastic sheeting (10' x 100')
 - 1 Step ladder (missing as of 10/7/98)
 - 1 Box of floor-only plastic
 - 1 First Aid Kit

Reynolds 230 - ILL/Exhibit Room

- 50 Packing boxes
- 3 Boxes of plastic sheeting

INVENTORY OF USEFUL ITEMS

ARRANGED BY ROOM

Reynolds 102 mop, bucket, wet floor sign

Reynolds 328 mop, bucket, wet floor sign, 2 boxes of plastic bags,

(men's restroom) paper towels

Reynolds 4 West (J9) 3 plastic roll out mats

Reynolds 525 mop, brooms

(women's restroom)

Reynolds 501 2 wet floor signs, mop, bucket

Reynolds 6 East (J13) mop, bucket, box of small plastic bags

Reynolds 701 mop, bucket, wet floor sign

Wilson West 679 8 ft. ladder, 2 plastic rollout mats

Wilson East 650 mop, bucket, paper towels, plastic rollout mat

Wilson East 450 paper towels, mop, bucket, wet floor sign, plastic bags

Wilson 4 West 12 ft. ladder

Wilson 2 West 8 ft. ladder – above staircase near emergency exit

Wilson 267 3 wet floor signs, fan

Wilson 250 2 wet floor signs, empty boxes

Wilson 251 mop, bucket

Wilson East 150 paper towels, 8 ft. ladder Wilson West 178 plastic bags, paper towel

ARRANGED BY ITEM

R=Reynolds Building W=Wilson Wing

Brooms R525

Buckets R102, R328, R501, R-J13, R701, W650, W450, W251

Fans W267, W602

Ladders 8 ft. W679, W2 west above staircase near emergency

exit, W150

12 ft. W4 west

Mops R102, R328, R525, R501, R6-J13, R701, W650, W450,

W251

Paper towels R328, W650, W450, W150, W178

Plastic rollout mats R4-J9, W679, W650

Plastic trash bags R328, R-J13, W450, W178

Wet Floor signs R102, R328, R501, R701, W450, W267, W250

DISASTER PREVENTION COMMITTEE (DPC)

Craig Fansler (chairperson)	5482	725-2005
Carol Joyner	3563	767-2273
Lisa Persinger	4585	744-7542
Patrick Ferrell	5416	896-0226
Erik Mitchell	5797	722-1452
Kristen Morgan	5480	595-1601

LIBRARY TELEPHONE NUMBERS

Administrative Offices			
Library Director	Rhoda Channing	5090	760-8314
Assistant Director	Debbie Lambert	4146	896-1776
Admin. Asst.	Kristen Morgan	5480	998-4607

Department/Division Heads

_			
Circulation	Scott Adair	6140	816-3742
Collection Development	Jill Carraway	5095	759-9290
Gov Docs/Microtext	Mary Horton	5829	659-4961
ITC	Rosalind Tedford	5910	761-0629
Periodicals	Laura Spear	5477	724-6647
Preservation	Craig Fansler	5482	725-2005
Special Collections	Sharon Snow	5755	759-9227
Reference	Elen Knott	5473	723-6152
Systems	Erik Mitchell	5797	722-1452
Tech Services	Wanda Brown	5094	785-9819

SAFETY EQUIPMENT

SHUT-OFF VALVES

WATER

Reynolds Building – Located on Reynolds 1, East, inside the Tunnel area. Walk straight ahead into the second area, walk down steps, walk straight ahead, then turn left. Walk towards doorway, turn right. Against the far wall there are colored pipes running up and along the wall. The turn-off valve is a yellow wheel, labeled with a card, on the back wall. The wheel is 6-8 feet up. To turn water off, turn wheel to the right. NOTE: A pipe wrench will be needed to turn wheel.

Wilson Wing – Located on Wilson 1, East. Walk down the East stairwell. Look for room 150, a janitor's closet, to the right. The hot water heater is also in this closet. The turnoff valve is a blue valve, 8-10 feet up. There is a sign in the closet directing you to the valve. To turn water off, turn valve clockwise. NOTE: a ladder will be needed to reach valve.

ELECTRICAL

Reynolds Building – Located on Reynolds 1, East, inside the Tunnel area. Two red-paneled boxes to the right of the entrance contain the main breakers. FACILITIES MANAGEMENT RECOMMENDS THAT THE LIBRARY STAFF NOT TURN OFF BREAKERS ON REYNOLDA 1. TO TURN ELECTRICITY OFF, CONTACT UNIVERSITY POLICE AT x5911.

Wilson Wing – Located on Wilson 1, East, room 152A. FACILITIES MANAGEMENT RECOMMENDS THAT THE LIBRARY STAFF NOT TURN OFF BREAKERS ON WILSON 1. TO TURN ELECTRICITY OFF, CONTACT UNIVERSITY POLICE AT x5911.

SPRINKLERS

Wilson Wing - Located outside the Tech Services windows, near the street. The red valve is locked with a padlock, and the key is on the Disaster Key Ring, located in the Preservation Office, Level 3, in the green closet to the left as you enter the office. Facilities Management and University Police also have a master Sargent key to unlock padlock. If the building sprinklers turn on, unlock padlock, and remove handle. Flip handle upside down to twist

valve. Twist valve counter-clockwise until sign indicator says water is CLOSED.

INSURANCE

Campus Insurance Representative: Julie Groves *4197

Our deductible is \$10,000.

Contact Assistant Library Director - Debbie Lambert (*4146) for more information.

HOW TO PREVENT DISASTERS

The guidelines below cover those areas of good housekeeping that relate to disaster prevention and preparation. A clean, tidy, and orderly environment, if not less prone to disaster, will at least serve to aid its control and containment.

Housekeeping Checklist

- 1. Keep exits, aisles, corridors, and stairwells unobstructed.
- 2. Ensure that internal fire doors are kept closed.
- 3. Ensure that emergency equipment (e.g. fire extinguishers, first-aid kits) is always accessible and in good working order. DO NOT, under any circumstances, place furniture, book trucks, trash receptacles, etc., in front of the fire extinguishers or fire alarm pull boxes.
- 4. Close drawers of storage cabinets when not in use.
- 5. Do not use the stacks as a storage place for empty boxes, supplies, etc.
- 6. Store valuable materials in fire-proof and dust-proof cabinets, preferably made of steel and treated with a non-corrosive, non-staining, and non-combustible paint.
- 7. Ensure that books are not shelved too tightly. This measure not only prevents user damage to the bindings when books are pulled off the shelves, but also ensures that, if flooding occurs, the water will not cause the books to swell to the point where they burst from their shelving units.
- 8. Shelve materials so that they are set back a short distance from the edge. This precaution prevents use wear and the vertical spread of fire from one shelf to another.
- 9. Ensure that appropriate standards (e.g. dust control and supplies storage) are established and met by housekeeping staff.

Fire Prevention Checklist

- 1. Store flammable and combustible materials in a safe, cool place out of sunlight, inside fire-proof cabinets.
- 2. Keep all chemical and solvent containers closed, even when in use, to minimize the escape of flammable and toxic vapors and dusts into the air.
- 3. Ensure that electrical appliances are operated at a safe distance from flammable materials, and that they are turned off when not in use.
- 4. Use only non-flammable paints.
- 5. Use non-flammable carpeting.
- 6. Use waste-paper baskets made from a non-combustible material and have them emptied regularly.
- 7. Ensure that fire extinguishers of the appropriate type for the materials in that location are available.

Water Prevention Checklist

- 1. Avoid basement storage.
- 2. Avoid storage in or below areas through which service pipes pass.
- 3. Monitor areas where there are pipes and windows that may be subject to condensation.
- 4. Have the water sprinkler system checked periodically.
- 5. Never let water run attended.
- 6. Install shelving at least 2" away from inside walls and 12" away from outside walls so as to avoid damage from condensation, burst pipes within walls, water running down walls from sprinkler systems, etc. Install bottom shelves at least 4" above the floor.
- 7. Shelving in susceptible areas should be covered with plastic.
- 8. Store more valuable materials on upper shelves or upper floors.
- 9. Do not install carpet in stack areas. If flooding occurs, the carpeting will retain water and prevent drainage as well as create a problem in stabilizing temperature and relative humidity in the affected area.

BIBLIOGRAPHY

HELD AT ZSR LIBRARY

- A National Preservation program: proceedings of the planning conference. Preservation Office. Washington: Library of Congress: for sale by the Supt. of Docs., U.S. G.P.O., 1980. 125 p. **Z701.N3**
- American Library Association. *Permanent/durable book paper: summary of a conference held in Washington, D.C., September 16, 1960 / sponsored by the American Library Association and the Virginia State Library.* Richmond, VA: Virginia State Library, 1960. 53 p. **TS1109 A547**
- Association of Research Libraries. *Systems and Procedures Exchange Center: Brittle books programs.* Washington, DC: Association of Research Libraries, Office of Management Studies, c[1989] 121 p. (SPEC kit 152) **Z701 B72 1989**
- Baker, John P. *Library conservation: preservation in perspective*. Stroudsburg, PA: Dowden, Hutchinson & Ross. 459 p. **Z701** .**L53**
- Barton, John P., Wellheiser, Johanna G. *An ounce of prevention: a handbook on disaster contingency planning for archives, libraries and record centres.* Toronto: Toronto Area Archivists Group Education Foundation, 1985. 192 p. **Z679.7 O95 1985**
- Baynes-Cope, A. D. *Caring for books and documents*. London: Published for the Trustees of the British Museum by British Museum Publications, c1981. 32 p. **Z701** .**B3**x
- Blades, William. The enemies of books. London: Elliot Stock, 1896. 151 p. Z701.B63 1896e
- Blades, William. The enemies of books. London: Trubner & Co., 1880. 110 p. Z701.B63 1880
- Bohem, Hilda. *Disaster prevention and disaster preparedness*. Berkeley, CA: University of California, Task Group on the Preservation of Library Materials, 1978. 23 p. **Z701**.**B67x**
- Butler, Robert W. *Preservation of library materials*. Beltsville, MD: National Agricultural Library, [1991] 8 p. **Gov Docs A 17.18/6:92-01**
- Carlson, Lage, et al. *Boxes for the protection of books: their design and construction*. Washington, DC: Library of Congress. For sale by the U.S. G.P.O., Supt. of Docs., 1994. **Z275 C22 1994**
- Cockerell, Sydney Morris. *The repairing of books*. London, Sheppard Press [1958] 110 p. **Z701**.**C58**

- Columbia University Libraries Preservation Committee. *Murder in the stacks*. New York: Center for Biomedical Communications, College of Physicians & Surgeons, Columbia University, c1987. 1 videocassette (14 min., 30 sec) **ITC 133**
- Cunha, George Daniel Martin and Cunha, Dorothy Grant. *Conservation of library materials: a manual and bibliography on the care, repair, and restoration of library materials.* Metuchen, NJ: Scarecrow Press, 1971-72. 2nd ed. 2 vol. **Z701** .**C782**
- Cunha, George Daniel Martin, Lowell, Howard P. and Schnare, Robert E. Conservation survey manual.
 Ballston Lake, NY: Section on the Management of Information Resources and Technology (SMART) of the New York Library Association, 1982.
 E701 C79 1982
- Cunha, George Daniel Martin. *Conservation of library materials: a manual and bibliography on the care, repair, and restoration of library materials*. Metuchen, NJ: Scarecrow Press, 1967. 405 p. **Z701**.**C78**
- Environmental controls: resource packet. Albany, NY: University of the State of New York, State Education Dept., New York State Library, Division of Library Development, [1990] 1 packet **Z701 E58 1990**
- Flin, Rhona H. *Sitting in the hot seat: leaders and teams for critical incident.* Chichester [England]; New York: J. Wiley, c1996. 258 p. **HV551.2 .F58 1996**
- Fortson, Judith. *Disaster planning and recovery: a how-to-do-it manual for librarians and archivists*. New York: Neal-Schuman Publishers, c1992. 181 p. **Z679.7**.**F67 1992**
- Fox, Lisa L. *A core collection in preservation*. Chicago: Association for Library Collections & Technical Services; Atlanta: Southeastern Library Network, 1993. 2nd ed. **Z701**.F69 1993
- George, Susan C. *Emergency planning and management in college libraries*. Chicago, IL: College Library Information Packet Committee, College Libraries Section, Association of College and Research Libraries, c1994. 142 p. **Z679.7 E46 1994**
- Harrison, Alice W. *The conservation of library materials*. Halifax, Nova Scotia: Dalhousie University, University Libraries, School of Library Services, 1981. 207 p. **Z701 H29 1981**
- Harvey, Douglas Ross. *Preservation in libraries: a reader*. London: Bowker-Saur in association with the Centre for Information Studies, Charles Sturt University, c1993. 483 p. **Z701 H35 1993**
- Haslam, W. The library handbook of genuine trade secrets and instructions for cleaning, repairing and restoring old manuscripts, engravings and books, as practised by the experts. London: W. & G. Foyle, Ltd. [1923] 51 p. **Z700** .**H35** 1923

- Hickin, Norman E. *Bookworms: the insect pests of books*. London: Sheppard Press, 1985. 1st ed. 176 p. **Z701** .**H53** 1985x
- Horton, Carolyn. *Cleaning and preserving bindings and related materials*. Chicago: Library Technology Program, American Library Association [1967] 76 p. **Z701** .**H79**
- Kyle, Hedi. Library materials preservation manual: practical methods for preserving books, pamphlets, and other printed materials. Bronxville, NY: N.T. Smith, c1983. 160 p. **Z701 K94 1983**
- Lehmann-Haupt, Hellmut. *Bookbinding in America: three essays*. New York: R.R. Bowker, 1967. 293 p. **Z270.U5 L4 1967**
- Lesk, Michael. *Preservation of new technology: a report of the Technology Assessment Advisory Committee to the Commission on Preservation and Access.* Washington, DC: Commission on Preservation and Access, 1992. **Z701 L48 1992**
- Library Technology Project (American Library Association) and Gage-Babcock & Associates. *Protecting the library and its resources : a guide to physical protection and insurance: report on a study conducted by Gage-Babcock & Associates, Inc.* Chicago : Library Technology Project, American Library Association. c1963. 322 p. **Z701 .A55**
- Lydenberg, Harry Miller and Archer, John. *The care and repair of books*. New York, Bowker, 1931. 127 p. **Z701** .L98
- Mehtha, S. P. *Art and science of book preservation*. Pune, India: Swaraj Publications, 1976. 179 p. **Z701** .**M457**
- Merrill-Oldham and Smith, Merrily A. Library preservation program: models, priorities, possibilities the administrative challenge. Proceedings of a conference, April 29, 1983, Washington, DC. Sponsored by Resources and Technical Services Division, American Library Association with the cooperation of the Library of Congress, National Preservation Program. Chicago: ALA, 1985. 117 p. **Z701**.L55 1985
- Morrow, Carolyn Clark with Gay Walker, introduction by Pamela W. Darling. *The preservation challenge: a guide to conserving library materials.* White Plains, NY: Knowledge Industry Publications, c1983. 231 p. **Z701 M547 1983**
- Morrow, Carolyn Clark. *Conservation treatment procedures: a manual of step-by-step procedures for the maintenance and repair of library materials*. Photographs by Bernie Weithorn. Littleton, CO: Libraries Unlimited, 1982. 191 p. **Z701 M545 1982**
- Morrow, Carolyn Clark. *Library binding a shared responsibility, a collaborative process*. Washington, DC: Production funded by the Andrew W. Mellon Foundation and the Library of Congress, National Preservation Program, [1990?]. 1 videocassette (26 min., sd., col.) **ITC 156**

- National Archives and Records Administration. *Your guide-- what to do in an emergency or disaster*. College Park, MD: National Archives and Records Administration, [1996] 15 p. **Gov Docs AE 1.108:EM 3**
- New York State Program for the Conservation and Preservation of Library Research Materials. *Preserving archival material through digital technology: final report.* Ithaca, NY: Cornell University Library, Dept. of Preservation and Conservation, 1993 **Z701 N49** 1993
- Potts, David L. *A guide to emergency action planning*. Raleigh, NC: Division of Occupational Safety and Health, N.C. Dept. of Labor, [1993], 25 p. **NC Docs L6 3:082 40**
- Potts, David L. *A guide to emergency action planning*. Raleigh, NC: Division of Occupational Safety and Health, N.C. Dept. of Labor, [1996] 28 p. NC Docs L6 3:I42 40
- Ritzenthaler, Mary Lynn. *Archives and manuscripts: conservation*. Chicago: Society of American Archivists, c1983. 144 p. **Baptist 025.7 R51**
- Sharpe, John L. *Disaster preparedness : a guide for developing a plan to cope with disaster for the public and private library.* Durham, NC: Duke University Library, 1982. 23 p. **Z701 .S4 1982x** (held in Preservation Dept.)
- Silverman, Randy and Grandinette, Maria. *The changing role of book repair in ARL*. Washington, DC: Association of Research Libraries, Office of Management Services, c1993. 127 p. (SPEC kit 190) **Z701** C53 1993
- State Library of Ohio and Ohio Preservation Council. *Managing preservation: a guidebook.* Columbus, OH: State Library of Ohio and Ohio Preservation Council, 1995. 176 p. **Z701 M25 1995 (2 copies)**
- Trinkley, Michael. *Can you stand the heat?: a fire safety primer for libraries, archives, and museums*. Atlanta, GA: Southeastern Library Network, 1993. 70 p. **Rare Z701 T77 1993**
- Trinkley, Michael. *Hurricane!: surviving the big one. A primer for libraries, museums, and archives.* Columbia, SC: Chicora Foundation; Atlanta, GA: Southeastern Library Network, c1993. 76 p. **Rare Z701 T78 1993**

- Wagner, Patricia Jean. *The Bloomsbury Review booklover's guide: a collection of tips, techniques, anecdotes, controversies & suggestions for the home library*. Denver, CO: Bloomsbury Review, c1996. 312 p. **Z987 .W35 1996**
- Waters, Peter. *Procedures for salvage of water-damaged library materials*. Washington, DC: Library of Congress. For sale by the Supt. of Docs., U.S. Govt. Print. Off., 1979. 2nd ed. 30 p. **Z701** .**W37** 1979 and **Gov Docs LC** 1.2:Sa 3
- Young, Laura S. *Bookbinding & conservation by hand: a working guide*. New Castle, DE: Oak Knoll Press, 1995. 273 p. **Z271** .**Y68** 1995

OTHER SOURCES OF INFORMATION

- Conservation on Line (CoOL) (http://palimpsest.stanford.edu/) excellent web site dealing with preservation. By following the links on the topic "Disaster Preparedness and Response" you can get access to some of the best literature in the field on the subject. There are documents on recovery of all types of media, links to vendors, bibliographies, etc.
- North Carolina Preservation Consortium a non-profit group affiliated with the School of Library and Information Sciences of NC Central University. The Consortium offers workshops, consultations, and free advice on preservation and disaster subjects. Contact Harlan Greene at 804 Old Fayetteville Street, Durham, NC 27701, 919-683-1709.
- Southeastern Library Network (SOLINET) (http://www.solinet.net/presvtn/preshome.htm) good source for information and help in a number of formats. Web page has several preservation leaflets that can be downloaded. These include topics such as Disaster Planning, Contents of a Disaster Plan, Invasion of the Giant Mold Spore, Resources (vendors, etc.) on Disaster Preparedness, and other related topics. SOLINET has also developed blank checklists on what parts of your building you should check regularly for vulnerabilities, and what supplies you should keep on hand to respond to disasters. Free copies can be requested from SOLINET at 1-800-999-8558. SOLINET also sponsors periodic workshops on disaster preparedness and response and preservation subjects.