



MINNESOTA HISTORICAL SOCIETY

**EMERGENCY PREPAREDNESS &
RECOVERY PLAN**

for the

**Minnesota Historical Society
(revised and abridged for outside distribution)**

Revised April 2007

ACKNOWLEDGMENTS

This emergency plan reflects the collective experience and knowledge of many staff members of the Minnesota Historical Society, both past and present, who are too numerous to cite individually. Their hard work in producing this plan and their commitment to preserving the collections held by the Society are gratefully acknowledged by their colleagues.

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INTRODUCTION

This plan outlines the steps and procedures to be used in response to an emergency at any of the facilities of the Minnesota Historical Society. Its primary goal is to minimize or eliminate damage to the collections after first ensuring personnel safety. The plan has been developed by the Society's Conservation program in liaison with Society administration and staff. It is reviewed periodically and revised as necessary to keep the contents current. All staff are encouraged to familiarize themselves with the overall plan and to study the parts relevant to their areas.

Causes of disasters are varied but most commonly include water, fire, electrical/power interruptions, biological agents, structural/mechanical failures, or vandalism. Actual damage to the collections will most likely result from water, extreme temperatures, smoke, insects, mold, or from tearing, breaking or crushing. The objective of this plan is to anticipate these situations, plan the response, and thereby reduce or eliminate the resultant damage.

This plan deals with the buildings and their contents at all the facilities owned or operated by the Minnesota Historical Society. Coordination with Capitol Security and Plant Management is specified where appropriate for facilities that are part of the Capitol Mall complex.

SCOPE

1. Locations Planned For

This plan covers all the facilities owned or operated by the Minnesota Historical Society.

2. Relationship of This Plan to Others

This plan outlines the steps and procedures to be used in response to an emergency at any MHS facility. Its primary goal is to minimize or eliminate damage to the collections after first ensuring personnel safety. There is a second plan, an evacuation plan, that addresses how to protect the safety and health of Society personnel and guests in the event of severe weather, a fire, or other emergency that requires relocating staff and guests. A sub-committee of the Health and Safety Committee together with Capitol Security prepared this plan.

3. Events Planned For

- Accidental Damage: Damage to collections caused by accidents such as dropping, bumping, mishandling, or vandalism.
- Biological: Major outbreaks of insects, rodents and mold growth.
- Fire: Fire damage creates a combination of problems. Water damage usually ensues, along with smoke and major structural damage.
- Power/HVAC Failure: Loss of electricity, heating, cooling, and humidification. Loss of water should not affect the collections.
- Vandalism: Defacement of materials, theft, and other acts of vandalism.
- Water: Water damage is the most likely disaster to occur. There are many sources for water damage: leaking roofs or pipes, backed-up plumbing, malfunctioning HVAC equipment, inclement weather, and firemen's hoses.

4. Structure

The plan is organized by the three phases of an emergency: Discovery (1st Notification, 2nd Notification), Assessment, and Recovery. The basic structure of the plan is the same for all types of disaster, although some event types require specialized action.

5. Emergency Plan Personnel

Facilities Manager

The Facilities Manager has the responsibility of seeing that the building is safe, damage to the building is evaluated, and measures are formulated and implemented to remedy or correct problems.

In order to accomplish this, the Facilities Manager works closely with the Assessment Director, Assessment Team Leader(s), Conservation Program, Capitol Security or local police and fire, and building engineers, technicians, and janitorial personnel.

Upon receiving notification of a problem, the Facilities Manager's responsibilities are to:

1. Establish that no threat exists to personnel safety
2. Secure the affected area and/or building
3. Alert Assessment Director

Assessment Director

It is the responsibility of the Assessment Director to organize and manage the process by which damage is evaluated. Since the primary purpose of this plan is to minimize or eliminate damage to the collections, in the case of a major disaster, the Assessment Director will generally be a manager or an administrator from a division or department that holds and manages collections. In instances when collections are not affected, the Assessment Director will be a staff person from the affected area. In the case of a minor disaster, the affected material's Assessment Team Leader may act as the Assessment Director.

The Assessment Director will work in liaison with the Facilities Manager, the Society's Marketing and Communications Officer, and the Finance Department. The Assessment Director will keep the Director's office informed as to the nature and extent of the problem and of progress in the assessment process.

Once the Assessment Team Leader(s) and Facilities Manager have reported their findings and recommendations, the Assessment Director will evaluate them and contact the Recovery Director with recommendations for recovery.

Assessment Team Leader

It is the responsibility of the Assessment Team Leader to select and assemble the team's members and to direct its operation. After a briefing by the Assessment Director, the Team Leader will look over the area of responsibility to determine how many people will be needed. The Team Leader will select and contact team members.

When the assessment begins, the Team Leader will circulate to see that instructions are being followed, make corrections or adjustments, answer questions, and monitor progress. The Team Leader should also monitor the condition of team members, call for periodic breaks, and provide frequent encouragement. The Team Leader should provide the Assessment Director with periodic updates of findings and progress. These tasks will most likely be in addition to doing some assessment of damaged material. Once the assignment has been completed, the Team Leader will report to the Assessment Director with findings.

Assessment Team

Typically, an assessment team will have a Team Leader and one to six additional members. An assessment team will consist of people who are most knowledgeable about the collection or material involved. There should be a person assigned to record what is observed and the decisions made by the team, and someone assigned to photograph the damage. In situations with limited damage, one team member may perform several functions.

It is the task of the assessment team to investigate where damage exists, the type of damage, and the importance of the affected material. The team should also develop an estimate of the quantity of material involved and recommend initial recovery priorities.

The assessment team should describe the scope of the problem in broad terms.

Recovery Director

It is the responsibility of the Recovery Director to organize and manage the recovery process. The Recovery Director will set priorities for recovery and assign duties to Recovery Teams based upon information received from the Assessment Director, Assessment Team Leaders and Conservation staff.

The Recovery Director will decide how many teams are necessary and will assign and contact the leaders of these teams.

The Recovery Director must exercise her/his judgment in the expenditure of funds keeping in mind the primary objective of minimizing destruction or damage to the collections.

The Recovery Director will coordinate with the Society's Administration, the Facilities Manager, and the Marketing and Communications Head to decide issues such as: whether or not the facility will remain open to the public, reassignment of staff to other than normal tasks and coordination of space requirements for the recovery effort. The Recovery Director will coordinate with the Finance Department regarding emergency expenditures and contracts, and to ensure that correct records are kept for insurance claims. The Recovery Director will keep the Society's Director's office, Administration and the Marketing and Communications Manager informed on the progress of the recovery.

Recovery Secretary

The Recovery Secretary will keep a record of all purchases and orders placed. He/She will assist in coordinating requests for materials, information, and other assistance that the recovery teams may require. Records of meetings and decisions made by the Recovery Director will be kept by the Recovery Secretary.

Recovery Team Leader

Recovery Team Leaders whenever possible will be staff members familiar with the affected collections and procedures for salvage of water damaged materials. After being briefed and evaluating the situation, the Recovery Team Leader will appoint team members. Once the team is assembled, the Team Leader will instruct the team on what they will be doing and how to do it. Once the actual work begins, the Team Leader will circulate to see that instructions are being followed, answer questions, monitor progress, and make corrections or adjustments. The Team Leader will also monitor the condition of team members, call for periodic breaks, and provide frequent encouragement. If the recovery is a lengthy process, the team leader will have daily briefings with the team members to keep them informed, discuss problems, etc. The Team Leader will periodically update the Recovery Director on progress. Depending on the size of the problem and the team, these tasks may be in addition to "hands on" work with damaged material.

Recovery Team

Disaster recovery team(s) will be formed by the Recovery Director based on the information and recommendations provided by the Assessment Director. All Society staff members may be called upon to be members of a recovery team. Depending on the extent and nature of the damage, recovery teams will consist of 3-8 people. Recovery teams will be responsible for separating collections and other material to be salvaged, moving material to be recovered from affected areas to work or other storage spaces when necessary, beginning to dry wet materials, and packing materials that will require shipment to another facility.

Conservator

The Conservator(s) will have varying roles depending upon the size and nature of the emergency. In the case of a very small disaster, the Conservator may act as the Recovery Director. For a moderately sized situation, he/she may be a member of one of the recovery teams. In a large disaster the Conservator will most likely assist in a resource/administrative capacity.

Once the assessment teams have made their reports on the extent of damage and recommended priorities based on importance to the collections, intrinsic value and condition, the Conservator will be available to advise on priorities based on the physical properties and requirements of the materials involved. The Conservator will work closely with the Recovery Director to recommend appropriate techniques and procedures.

The Conservator will be in regular contact with the Recovery Teams, including attending the Recovery Director's daily meeting with the Recovery Team Leaders. The Conservator will assist in choosing and locating supplies, equipment, and services necessary for the recovery operation. Depending upon the situation,

the Conservator may pack, clean, or otherwise treat collection items as part of a team. Because the Conservation staff is limited in numbers, its role as a resource must be primary.

ACCIDENTAL DAMAGE TO COLLECTIONS

Discovery This category includes damage to collections items caused by accidents such as dropping, impact, mishandling, or by acts of vandalism. These incidents may occur in exhibit areas, in storage or during transit. **If possible do not move objects until instructions are received (by phone or in person) from a conservator.**

FOLLOW THE STEPS BELOW IN THE ORDER GIVEN

1st Notifications Contact immediate supervisor.

2nd Notification Contact a conservator directly.

		<u>Office</u>	<u>Home</u>
Books	Sherelyn Ogden	3380	
Objects	Paul Storch	3381	
	Tom Braun	3382	
Paper	Sherelyn Ogden	3380	
Textiles	Ann Frisina	3385	
backup:	Bob Herskovitz	3465	

The conservator will notify the curator of the affected collection(s). It is the responsibility of the conservator to organize and manage the recovery process.

COLLAPSE OF SHELVING OR STRUCTURAL FAILURES

Discovery Briefly determine how extensive damage is. If people are injured or are in imminent danger, contact Capitol Security or the local police or fire department immediately. Do not try to halt damage or save collections. Once you have a rough idea of damage, leave until the area can safely be assessed further.

FOLLOW THE STEPS BELOW IN THE ORDER GIVEN

1st Notification Contact:

1. Capitol Security
2. Immediate Supervisor (who will report incident to his/her department and division heads).

Capitol Security will contact the appropriate Facilities Manager. They will make decisions for facilities in the Capital region regarding safety of personnel remaining in the area.

2nd Notification The Facilities Manager will contact the Assessment Director for the affected area.

Building Assessment Once it has been determined that it is safe to remain in or re-enter the area, the Assessment Director and Facilities Manager will inspect the building and determine affected areas and collections.

3rd Notification **If collections have been affected**, the Assessment Director will notify the appropriate Team Leader(s) to form assessment teams. The Conservation Manager will also be notified and will be available to assist.

The assessment teams will continue the response from this point.

Media Inquiries Please direct all requests for information from the news media to Marketing and Communications, Marjorie Nugent: 3145 or Lory Sutton: 3140.

FIRE EMERGENCY - Minor

This category consists of very small, contained fires such as a smoldering cigarette or wastebasket fire.

Discovery If you see a fire that is small enough to be easily and immediately contained, use an appropriate fire extinguisher near your area. See floor plans for locations. Extinguish only if the fire extinguisher is close and you feel confident using it.

If the fire cannot be easily contained, treat it as a Major Fire Emergency by using nearest fire alarm station.

FOLLOW THE STEPS BELOW IN THE ORDER GIVEN

1st Notification All fires must be reported. After a minor fire has been contained, notify both:

1. Immediate Supervisor (who will report incident to his/her department and division heads).
2. Facilities Manager

The Facilities Manager will notify Capitol Security if appropriate.

Building Assessment The Assessment Director and Facilities Manager will inspect the building for damage.

If the fire has been contained, no persons injured or material damaged, and it has been reported, no further action is required.

2nd Notification **If collections have been affected**, the Assessment Director will notify the Assessment Team Leader for the affected collection or elect to serve in that capacity.

The assessment teams will continue the process from this point.

Media Inquiries Please direct all requests for information from the news media to Marketing and Communications, Marjorie Nugent: 3145 or Lory Sutton: 3140.

FIRE EMERGENCY - Major

Discovery A major fire is any fire that cannot be easily contained or an instance when there is no fire extinguisher in the immediate vicinity.

FOLLOW THE STEPS BELOW IN THE ORDER GIVEN

1st Notification Pull fire alarm.

Signal that a fire exists and initiate evacuation by using nearest fire alarm station. See floor plans for locations.

Immediately begin evacuation procedures upon hearing fire alarm.

2nd Notification If safety permits, and it is appropriate, call Capitol Security to provide details on location and nature of fire, or call the Facilities Manager, who will secure the building.

3rd Notification The Facilities Manager will contact the Assessment Director for affected area. See list of Assessment Directors and backups.

Building Once it has been determined by the fire department that it is safe to remain in or re-enter the area,

Assessment the Assessment Director and Facilities Manager will inspect the building and evaluate affected areas and collections.

Media Inquiries Please direct all requests for information from the news media to Marketing and Communications, Marjorie Nugent: 3145 or Lory Sutton: 3140.

FLOOD AND WATER DAMAGE - Minor

This category consists of incidents when water is not near collections or MHS records, or has not yet affected more than ten to twenty items.

Discovery As soon as water is noticed, try to determine its source and if it is actively leaking.

Do not attempt to clean-up water at this point; just try to limit damage. If leak is active and can easily be contained, use a container to catch it. If easily accomplished, move materials that are directly in line with leak. Containers with disaster response supplies are located in various locations depending on the site affected. See Appendix 2.

FOLLOW THE STEPS BELOW IN THE ORDER GIVEN

1st Notification Contact both:

1. Immediate Supervisor (who will report incident to his/her department head).

If water has affected collections, the supervisor will notify the Department Head of the affected collection.

2. Facilities Manager.

The Facilities Manager (with Plant Management as necessary) will determine the source of water and stop it.

If water has not affected collections, no further action is required.

2nd Notification The Department Head for the affected collections will assume responsibilities of Assessment Director. The Department Head will also notify his/her Division Head.

The Department Head will contact appropriate Team Leader(s) to assess damage unless he/she elects to serve in that capacity.

Media Inquiries Please direct all requests for information from the news media to Marketing and Communications, Marjorie Nugent: 3145 or Lory Sutton: 3140.

FLOOD AND WATER DAMAGE - Major

Discovery Determine extent of flooding and, if possible, the water source. Are people in danger? Do not try to halt damage or save items at this time. Once you have a rough idea of damage, leave the area.

If flooding involves substantial parts of the building, initiate evacuation by pulling nearest fire alarm.

FOLLOW THE STEPS BELOW IN THE ORDER GIVEN

1st Notification Contact all:

1. Capitol Security if appropriate.
2. Facilities Manager.
3. Immediate Supervisor (who will report incident to his/her department and division heads).

The Facilities Manager will decide whether evacuation is necessary. The Facilities Manager (with Plant Management) will locate the source of the problem and take steps to correct it. They will secure the building (with Capitol Security) and evaluate its structure and systems.

2nd Notification The Facilities Manager will contact the appropriate Assessment Director for the affected area. See the list of Assessment Directors and backups.

Once it is determined that it is safe to remain in or re-enter the area, the Assessment Director and Facilities Manager will inspect the building and determine which areas and collections have been affected.

3rd Notification **If collections have been affected**, the Assessment Director will notify appropriate Team Leader(s) to assemble teams to assess damage. The Conservation Manager will also be notified and will contact the appropriate conservator. Assessment teams will continue response from this point.

Media Inquiries Please direct all requests for information from the news media to Marketing and Communications, Marjorie Nugent: 3145 or Lory Sutton: 3140.

MOLD AND MILDEW

A major outbreak of mold and mildew may follow flood, fire, or lengthy HVAC malfunction or power failure. If mold growth is observed, the potential exists for many items to be affected.

Discovery If mold is discovered, attempt to locate the source of moisture. Be alert for visible growth and/or musty odor.

FOLLOW THE STEPS BELOW IN THE ORDER GIVEN

1st Notification Contact both:

1. Immediate Supervisor (who will report incident to his/her department and division heads).
If collections have been affected, the supervisor will notify the Department Head of the affected collection.
2. Facilities Manager

The Facilities Manager (with the assistance of Plant Management) will determine the source of moisture or heat that has provided the favorable growing conditions, and take immediate action to eliminate it.

2nd Notification The Facilities Manager will contact the appropriate Assessment Director or the Department Head will serve in that capacity. The Facilities Manager will also notify the Conservation Manager.

The Assessment Director and the Facilities Manager will inspect the building and locate all affected areas and collections. The Conservation Manager and appropriate conservator will assist and be available to advise on stabilization and clean-up procedures and materials. The Facilities Manager will contact Plant Management to clean the building.

3rd Notification If the situation warrants, the Assessment Director will notify appropriate Team Leader(s) to form assessment teams. The assessment teams will continue the response.

POWER OR HVAC SYSTEM FAILURE

Discovery If the power fails or the heating, ventilation, and air conditioning system (HVAC) malfunctions, the result may be significant fluctuations in temperature or relative humidity which can be damaging to collections.

FOLLOW THE STEPS BELOW IN THE ORDER GIVEN

1st Notification Contact both:

1. Immediate Supervisor (who will report incident to his/her department and division heads).
2. Facilities Manager.

If a power failure occurs, also contact if appropriate:

1. Floor staff.
2. Exhibits staff.

2nd Notification The Facilities Manager will notify Plant Management, Capitol Security, and the Conservation Manager.

Building Assessment Together, they will determine the cause and estimated duration of the problem, assess the situation and determine appropriate course of action. If necessary, they will arrange for securing the building while allowing entry of essential personnel to monitor the situation.

Collections Assessment **If collections have been affected** or are in imminent danger of being adversely affected, the Facilities Manager will notify the Assessment Director for the affected area(s).

The Conservation Program will help monitor temperature and humidity during a HVAC or power failure.

The Facilities Manager, Assessment Director, and Conservation Manager will evaluate the situation. Depending upon cause and estimated duration, actions may include obtaining temporary environmental control equipment, restricting access, or relocating endangered collections.

Media Inquiries Please direct all requests for information from the news media to Marketing and Communications, Marjorie Nugent: 3145 or Lory Sutton: 3140.

RODENTS AND INSECTS

Discovery Mice, rats, bats, and insects can all be harmful to collections. If insects or rodents are sighted, promptly report evidence found (e.g., animals, nests, excrement, signs of damage).

FOLLOW THE STEPS BELOW IN THE ORDER GIVEN

- 1st Notification** Contact both:
1. Immediate Supervisor (who will report incident to his/her department and division heads).
 2. Facilities Manager.
- 2nd Notification** The Facilities Manager will contact the Objects Conservator. If deemed necessary, the Facilities Manager will contact the pest control officer on contract and act as liaison.
- Building Assessment** The Facilities Manager will see that the building is searched for evidence of infestation and all possible points of entry checked. If it will not endanger personal safety, attempts should be made to capture a live insect or find a well preserved dead sample. Give the sample to the Objects Conservator for identification.
- The Objects Conservator will consult with the pest control company about materials and methods before treatment is begun.
- 3rd Notification** **If collections are involved**, the Department Head will appoint appropriate Assessment Team Leaders or serve in that capacity him/herself.
- Collections Assessment** Assessment Team Leaders will assemble teams to evaluate extent of damage and importance of the material involved. The assessment teams will continue the response from this point. The Conservator will be available to advise and assist, and to keep records of the event and treatment. The Assessment Director will initiate recovery procedures as warranted.

VANDALISM

Discovery If vandalism is in progress, DO NOT confront the vandal.
Find another staff member who can act as a support and witness. Keep vandal in sight. Without confronting the individual or using force, try to delay their departure until security or police arrive. Security or police will handle the individual.

FOLLOW THE STEPS BELOW IN THE ORDER GIVEN

- 1st Notification** Contact both:
1. Capitol Security or local police. Discretely use nearest phone or intercom.
 2. Immediate Supervisor (who will report incident to his/her department and division heads).
 3. Facilities Manager.
- Building Assessment** Capitol Security/police will notify the Facilities Manager. Together they will inspect the building and determine the location of all damage.
- 2nd Notification** The Facilities Manager will contact division and department heads of the affected area(s).
- Collections Assessment** **If collections are affected**, the Department Head will notify appropriate Conservator and Assessment Team Leader or serve in that capacity him/herself. The assessment team will continue the process from this point.
- Media Inquiries** Please direct all requests for information from the news media to Marketing and Communications, Marjorie Nugent: 3145 or Lory Sutton: 3140.

ASSESSMENT DIRECTOR RESPONSIBILITIES

It is the responsibility of the Assessment Director to organize and manage the process by which damage is evaluated. Since the primary purpose of this plan is to minimize or eliminate damage to the collections, in the case of a major disaster, the Assessment Director will generally be a manager or an administrator from a division or department which holds and manages collections. In instances when collections are not affected, the Assessment Director will be a staff person from the affected area. In the case of a minor disaster, the affected material's Assessment Team Leader may act as the Assessment Director.

The Assessment Director will notify Assessment Team Leaders that a problem exists and instruct them to assemble a team. The Assistant Director will also enlist the assistance of MHS personnel and outside experts/resource people as required.

The Assessment Director will work in liaison with the Facilities Manager, the Society's Marketing and Communications Officer, and the Finance Department. The Assessment Director will keep the Director's office informed as to the nature and extent of the problem and of progress in the assessment process.

Once the Assessment Team Leader(s) and Facilities Manager have reported their findings and recommendations, the Assessment Director will evaluate them and contact the Recovery Director with recommendations for recovery.

FACILITIES MANAGER RESPONSIBILITIES

The Facilities Manager has the responsibility of seeing that the building is safe, damage to the building is evaluated, and measures are formulated and implemented to remedy or correct problems.

In order to accomplish this, the Facilities Manager works closely with the Assessment Director, Assessment Team Leader(s), Conservation Program, Capitol Security or local police and fire, and Plant Management building engineers and janitorial personnel.

Upon receiving notification of a problem, the Facilities Manager's responsibilities are to:

1. Establish that no threat exists to personnel safety
2. Secure the affected area and/or building
3. Alert Assessment Director

Once it is safe to do so, the Facilities Manager will notify the appropriate Assessment Director and accompany her/him in an initial inspection of the facility. They will determine what parts of the building are affected, whether or not collections are involved, and who needs to be notified for the next step in response.

The Facilities Manager is responsible for seeing that priorities are established for facility repairs. Assessing the physical condition of the building and establishing priorities for repairs may be simple or may be very involved and require the assistance of outside experts or resource people. The Facilities Manager will ensure that any outside expertise required is brought in or made available for facility inspection and repair prioritization.

Once priorities for repairs are established, the Facilities Manager will work with Plant Management and contact vendors to see that the necessary repairs are begun as soon as practical. The progress of repairs will be monitored to ensure personnel and collection safety, and to prevent further damage.

In cases of minor damage due to fire, water, mold and mildew, or rodent infestation the Facilities Manager may be the first person contacted by an individual discovering a problem. An initial inspection of the facility will be conducted by the Facilities Manager and appropriate staff will be notified. When collections are involved, an appropriate Department Head, Assessment Team Leader and/or Conservation Program personnel will be contacted.

ASSESSMENT TEAM LEADER RESPONSIBILITIES

It is the responsibility of the Assessment Team Leader to select and assemble the team's members and to direct its operation. After a briefing by the Assessment Director, the Team Leader will look over the area of responsibility to determine how many people will be needed. The Team Leader will select and contact team members. If necessary, lists containing home phone numbers will be provided by the Assessment Director. When calling, the Team Leader will briefly explain the situation, instruct when and where to assemble, suggest appropriate clothing and estimate how long the assessment may take.

Once the team is assembled, the Team Leader will instruct the team on what they will be doing and how to do it. For example, if distinctions are to be made between damp and wet items the team should be shown examples. The method of inspection and sampling will be explained; e.g., check several items on every shelf, paying particular attention to the tops and bottoms of boxes, and the top and fore edge of shelved books. Team members will be told what kind of records or statistics to keep and how they are to be recorded. Specific assignments for where and with whom people are to work will be made at this time.

Once the assessment begins, the Team Leader will circulate to see that instructions are being followed, make corrections or adjustments, answer questions, and monitor progress. The Team Leader should also monitor the condition of team members, call for periodic breaks, and provide frequent encouragement. The Team Leader should provide the Assessment Director with periodic updates of findings and progress. These tasks will most likely be in addition to doing some assessment of damaged material.

Once the assignment has been completed, the Team Leader will report to the Assessment Director with findings. The Team Leader will be prepared to provide specific information as to nature of damage, the quantity of items affected, recommendations as to which material should be salvaged and which need not, and recommended priorities for recovery.

ASSESSMENT TEAM STRUCTURE

Typically, an assessment team will have a Team Leader and one to six additional members. In some facilities, it is common that several different types of collections are in close proximity. Rather than assembling multiple teams, co-leaders for one team may be the most efficient way to bring expertise to bear. This will be determined by the Assessment Director when Assessment Team Leaders are selected and assigned. It is the responsibility of the Team Leader to select and assemble the team's members and to direct its operation.

In addition to the Team Leader, an assessment team will consist of people who are most knowledgeable about the collection or material involved. There should be a person assigned to record what is observed and the decisions made by the team, and someone assigned to photograph the damage. In situations with limited damage, one team member may perform several functions.

ASSESSMENT TEAM RESPONSIBILITIES

It is the task of the assessment team to investigate where damage exists, the type of damage, and the importance of the affected material. The team should also develop an estimate of the quantity of material involved and recommend initial recovery priorities. Damage should be documented as it is discovered since this may be important later for insurance and legal reasons. The following steps need to be followed:

1. Estimate extent of damage to the collection (see facts and figures at the end of this section for a method to assist in developing a quick estimate).
2. Identify type(s) of collections and other materials affected.
3. Establish initial priorities for recovery of damaged items.

The assessment team should describe the scope of the problem in broad terms. It should distinguish between affected collection and non-collection materials (i.e. operating records). Unless the problem is quite small, an item by item count is not necessary at this time. Quantity should be expressed in terms of linear feet or other relevant units.

"The immediate external appearance of the collections may be indicative of the degree of damage, as in the case of water soaked materials in aisles, or deceptive where storage containers are damaged and the contents relatively unharmed. Shelves and cabinets will contain materials damaged to different and varying degrees depending on the nature of the disaster: soaked, partially wet, damp, charred, smoke-damaged, debris-covered, etc. The damage to collection materials should be appraised without handling whenever possible, as further irreparable damage may result. A realistic and thorough assessment must be made as quickly, efficiently, and safely as possible."² Museum collections, particularly boxed material, may need to be handled, but this must be only to the extent necessary to assess damage.

In addition to locating, categorizing and quantifying the damage to the collection, a major responsibility of the team is to determine the significance of the affected material. It must be determined whether or not the material has artifactual value, what its significance is to the collections and what its salvage priority should be.

Time is a crucial element in the assessment, and decisions will need to be made quickly.

The following questions may be helpful in determining significance of library material:

1. How important is the item to the collection?
2. Does this item represent a value beyond its intellectual content; i.e., fine binding, illustrations, fine printing, important edition, autographed, etc.?
3. Does the Society have a legal obligation to preserve this material?
4. Is the item available elsewhere?
5. Can the item be replaced (e.g., with a same or later edition for reference materials)?
6. Is the total cost of replacement (include ordering, cataloging, etc.) more or less than restoration of the item?
7. How soon does the item need to be treated for optimum recovery?

If museum collections are involved, a different set of questions should be asked to assess and prioritize the damaged material:

1. What material(s) is the item made of? Is it affected by continued wetness?
2. Is an item a collection icon (e.g., the butter carton dress)?
3. Does the Society have title to the object? Is it an incoming loan, not yet accessioned or surveyed?
4. Does the object have strong, well documented associational value (i.e., to a person or event)?
5. Was the item made in Minnesota?
6. Is it part of a strong and well known collection?
7. What is the ease or difficulty of replacement?
8. Are there duplicates in the collection?
9. Is the object part of primary or secondary collections? Does it have value for educational use?
10. Is the item part of a set or part of a larger item?
11. Was the item in good condition prior to the current situation? Is the item complete?
12. Does the object have immediate use planned (e.g., scheduled to go on exhibit or loan)?
13. Does the item have certain accession numbers (e.g., numbers assigned after 1982 or the Densmore Collection)?
14. Is the object slated for de-accession, or will it be transferred to education for use?

Once these tasks have been accomplished, the Assessment Team Leader will report to the Assessment Director and provide recommendations for recovery. The Team Leader will also be prepared to provide specific information as to the nature and extent of damage and priorities for recovery.

² John P. Barton and Johanna G. Wellheiser, eds. An Ounce of Prevention: A Handbook on Disaster Contingency Planning for Archives, Libraries and Record Centers. Toronto: Toronto Area Archivists Group Education Foundation, 1985.

INSURANCE

The Minnesota Historical Society carries insurance on its collections through its agent Willis Fine Art, Jewelry & Specie (Eric Fischer, Senior Vice President, 301-581-4275) with St. Paul Travelers carrying the policy. The Society's liaison with Willis is Nicole Delfino. The Central Registrar is responsible for making contact when notification or assistance is necessary.

Through its representative, Willis has made its position clear that in the event of a disaster, MHS' first priority is to minimize damage. Specific authorization need not be given if expenses need to be incurred that will reduce or eliminate damage.

The following is section 7. Protection of Property from the Society's museum collections insurance policy:

In case of loss or damage, it is the duty of the insured, its staff, representatives and agents to take measures as may be reasonable for the purpose of averting or minimizing such loss. In addition to any loss recoverable under this policy, the Company will reimburse the Insured for any charges properly and reasonably incurred in pursuance of these duties.

Measures taken by the Insured and the Company with the object of saving, protecting or recovering the insured objects shall not be considered a waiver or acceptance of abandonment or otherwise prejudice the rights of either party.

MEDIA INQUIRIES

Please direct all requests for information from the news media to the MHS Marketing and Communications Office.

	<u>Office #</u>	<u>Home #</u>
Marjorie Nugent	3145	
Lory Sutton	3140	

PURCHASING AUTHORITY

Though it is best to follow established contracting and purchasing procedures, this may not always be possible in an emergency.

The Society Policy and Procedures Manual is "not intended to restrict employees when an emergency occurs which endangers life or property. Employees should act promptly in an emergency."¹

Expenditures for emergency repairs, supplies, equipment rental, or other purchases should be made when essential by Assessment Director, Assessment Team Leader, Facilities Manager, or a Conservator.

Emergency Purchases

A. Policy

Emergency purchases are allowed only for unexpected situations, which if not corrected immediately, would endanger life or property, or adversely affect essential operations. The urgency must be of a nature that normal purchasing and contracting procedures cannot be followed.

B. Procedures

1. Before making an emergency purchase, the program manager should contact the Finance Department for an emergency purchase order number. If the emergency occurs during non-business hours, the manager should make the purchase, and then contact the Finance Department as soon as possible during regular business hours.
2. When requesting an emergency purchase order, the manager should provide the following information:
 - Description of the emergency.
 - Name of vendor.
 - Cost—estimated or actual.
 - Funding source, by account.
3. As soon as possible after the purchase, the program manager should complete and submit a documenting 503, using the emergency purchase order number. The 503 should include a description of the emergency and an explanation of why normal purchasing procedures could not be followed.

How to Determine if Competitive Quotes or Bids are Required

- A. Purchases of goods and services (other than professional, technical, construction and restoration services).
 - Less than \$1,000 per line item, up to \$5,000 total purchase—No bids or quotes are required.
 - \$1,000 to \$4,999—Three verbal quotes per line item are required.
 - \$5,000 to \$19,999—Three written bids, solicited by written specifications or a statement of work developed and published in consultation with the Contracting and Purchasing Office, are required.
 - \$20,000 and greater—Competitive bidding, including public advertisement conducted by the Contracting and Purchasing Office, is required.
- B. Purchases of professional, technical, construction, and restoration services.
 - Less than \$7,500—No bids or quotes are required.
 - \$7,500 to \$19,999—Three written bids, solicited by written specification or a statement of work developed and published in consultation with the Contracting and Purchasing Office, are required.
 - \$20,000 or greater—Formal sealed bid process, including public advertisement conducted by the Contracting and Purchasing Office, is required.
- C. Exceptions to requirement for competitive bidding include the following:
 - The goods or services are available from only one source.
 - Public exigency or emergency does not allow sufficient time for bidding.
 - Solicitation does not garner competitive bids.
 - Merchandise is for resale.

- Funds are grant awards, which are subject to policies established by the Grants Review Committee.
- The acquisition is for the Society's collections.

RECOVERY DIRECTOR RESPONSIBILITIES

It is the responsibility of the Recovery Director to organize and manage the recovery process. The Recovery Director will set priorities for recovery and assign duties to Recovery Teams based upon information received from the Assessment Director, Assessment Team Leaders and Conservation staff.

The Recovery Director will decide how many teams are necessary and will assign and contact the leaders of these teams. Daily meetings will be held with the Recovery Team Leaders and the Conservation staff. Reports will be given on progress, actions taken, problems encountered and future tasks. Priorities will be discussed and plans adjusted as required.

The information contained above concerning purchasing authority and insurance for the assessment phase, remains applicable to recovery. The Recovery Director must exercise her/his judgment in the expenditure of funds keeping in mind the primary objective to minimize destruction or damage to the collections.

The Recovery Director will coordinate with the MHS Administration, MHS Facilities Manager, and MHS Marketing and Communications Manager to decide issues such as: whether or not the facility will remain open to the public, reassignment of staff to other than normal tasks and coordination of space requirements for the recovery effort. The Recovery Director will coordinate with the Finance Department regarding emergency expenditures and contracts, and to ensure that correct records are kept for insurance claims.

The Recovery Director will keep the MHS Director's office, Administration and the Marketing and Communications Manager informed on the progress of the recovery. The administrative officers will keep staff and public informed about the disaster and recovery. Staff members in particular will be concerned and efforts should be made to keep them informed.

Assignment of Recovery Director and backups will follow the list below. Generally, the Recovery Director will be the Assistant Director of the affected collection. If collections are not affected, then the Assistant Director for the affected area will take charge. The Head of Conservation will work with the Recovery Director in organizing and implementing the recovery process. In the case of a small disaster, the Head of Conservation may be assigned to serve as Recovery Director.

RECOVERY SECRETARY

The Disaster Recovery Director will require clerical assistance. A Recovery Secretary will be appointed by the Recovery Director as deemed appropriate for the situation.

The Recovery Secretary will keep a record of all purchases and orders placed. He/She will assist in coordinating requests for materials, information, and other assistance that the recovery teams may require. The secretary should have immediate access to a telephone in order to communicate easily with the team leaders, the Recovery Director and vendors.

Records of the daily meeting and decisions made by the Recovery Director will be kept by the Recovery Secretary.

CONSERVATOR

The Conservator(s) will have varying roles depending upon the size and nature of the disaster. In the case of a very small disaster, the Conservator may act as the Recovery Director. For a moderately sized situation he/she may be a member of one of the recovery teams. In a large disaster the Conservator will most likely assist in a resource/administrative capacity.

Once the assessment teams have made their reports on the extent of damage and recommended priorities based on importance to the collections, intrinsic value and condition, the Conservator will be available to advise on priorities based on the physical properties and requirements of the materials involved. The Conservator will work closely with

the Recovery Director to recommend appropriate techniques and procedures.

The Conservator will be in regular contact with the Recovery Teams, including attending the Recovery Director's daily meeting with the Recovery Team Leaders. The Conservator will assist in choosing and locating supplies, equipment, and services necessary for the recovery operation. Depending upon the situation, the Conservator may pack, clean, or otherwise treat collection items as part of a team. Because the Conservation staff is limited in numbers its role as a resource must be primary.

RECOVERY TEAM RESPONSIBILITIES

Disaster recovery team(s) will be formed by the Recovery Director based on the information and recommendations from the Assessment Director. Recovery Team Leaders will be chosen by the Recovery Director and whenever possible will be staff members familiar with the affected collections and procedures for salvage of water damaged materials. All Society staff members may be called upon to be members of a recovery team. Depending on the extent and nature of the damage, recovery teams will consist of 3-8 people. Recovery teams will be responsible for separating collections and other material to be salvaged, moving material to be recovered from affected areas to work or other storage spaces when necessary, beginning to dry wet materials, and packing material that will require shipment to another facility.

TEAM LEADER RESPONSIBILITIES

After being briefed and evaluating the situation, the Recovery Team Leader will appoint team members. In the event that the team is assembled during non-work hours, lists containing home phone numbers will be provided by the Recovery Director. When contacting people, the Team Leader will briefly explain the situation, give guidance about how to dress, and instruct when and where to assemble. At this time, team members should also be given whatever estimate is possible as to how long they might be engaged in the recovery.

Once the team is assembled, the Team Leader will instruct the team on what they will be doing and how to do it. Once the actual work begins, the Team Leader will circulate to see that instructions are being followed, answer questions, monitor progress, and make corrections or adjustments. The Team Leader should also monitor the condition of team members, call for periodic breaks, and provide frequent encouragement. If the recovery is a lengthy process, the team leader will have daily briefings with their team members to keep them informed, discuss problems, etc. The Team Leader will periodically update the Recovery Director on progress. Depending on the size of the problem and the team, these tasks may be in addition to "hands on" work with damaged material.

RECORD KEEPING

The recovery team leader will assign at least one team member to maintain records of the recovery. Collections disposition Record Keeping should include: inventories and dates when items are sent out of the building to off-site storage, commercial cold-storage or freeze-drying facilities, or private or regional conservation centers, and inventories of withdrawn or discarded material. Other essential information includes: items frozen, treated or dried in-house; items relocated within the facility and where they have been moved to; and items in need of additional attention.

Depending upon work load, an additional person may be assigned to label individual items that have lost call or catalog numbers, to label or relabel boxes with location information, or label boxes ready for shipment.

GUIDELINES FOR RECOVERY TEAM LEADERS

Breaks for rest and refreshment should be frequent.

Team members who show signs of shock, who are mishandling items or are unable to follow instructions must be relieved of their duties.

Periodically remind team members:

1. Personal safety is the top priority.
2. Use care before speed. (Repeat this at each briefing.)
3. Use both hands and lift one item at a time. Remember the guidelines from training on back injury prevention and handling training.
4. Watch for signs of mold; notify Conservator if mold is evident.
5. Be patient and tactful with each other.
6. Avoid any action that may damage or remove call number tags or other identifiers.

Additional Guidelines for Library Collections

1. Do not open wet books; do not close books which have become distorted and are lying open; do not remove covers.
2. Do not disturb contents of wet file boxes, or prints, drawings or photographic materials.
3. Do not separate single sheets.

Guidelines for Catalogers of Library Materials

1. Use only soft pencils, indelible markers, or ball point pens.
2. Labels and slips must be clean, neutral-colored acid-free paper or card (no colored paper).
3. Do not mark directly on items, only on labels.
4. "Priority" labeling must be given to all items which need immediate attention (e.g. coated paper stock, feathering inks) which are identified by removal teams. Flag these items for immediate attention.
5. Work closely with team leaders for removal and packing to avoid confusion and bottlenecks.

SALVAGE OF WATER DAMAGED COLLECTIONS

ARCHAEOLOGICAL: GENERAL CONSIDERATIONS

Priority: The actual priority of drying treatment will vary according to the nature of the material and the specific object. In general, organic materials should be moved and treated first (within 24 hours). The order of priority should be: botanical and plant materials; leather and skin; textiles; bone, antler, horn, teeth, shell; non-glazed ceramics; reconstructed glass and ceramics; glazed ceramics and glass; untreated metal; conserved metal and lithics.

An essential general priority is the retention of provenance information from the objects or packaging materials associated with the objects.

Handling Precautions: Refer to the sheets for specific object materials for actual handling precautions. Many archaeological objects, such as lithic collections, have multiple objects that may be stored in the same box or bag belonging to one provenance. Wrap fragile and/or fragmented artifacts individually to keep the parts together and to help prevent further fragmentation. Each individual artifact may or may not be labeled. When the bags and boxes become wet or damaged in some way, the labeling information on the object or package may become lost during the recovery process. Keep each lot/catalog number of artifacts together if the original packaging container is damaged beyond use. Create a duplicate label with the provenance information on it and place it with the objects. Noting the shelf location would also be helpful before the materials are moved for drying.

Packing Method: Varies with the fragility of the material; see individual sheets for specific requirements. In general, pack in such a manner so that provenance lots will not get intermixed during unpacking and drying.

Supplies Needed

soft bristle brushes	clean water	sponges, clean towels, paper
portable dehumidifier	labels	towels or unused newsprint
	fans	

Preparation For Drying: Varies with the specific material, however, in most for cases, archaeological materials will tolerate sponging with clean water or a slightly damp soft bristle brush to remove surface mud.

Drying Procedure: Again, make certain that provenance information is kept intact and with the artifacts throughout the drying process. Most artifacts and materials can be dried using fans that are set up so as not to blow directly upon the objects. Excess moisture can be absorbed by sponges, clean towels, paper towels or unused newsprint. Check daily to make certain that mold growth has not occurred. A portable dehumidifier should be set up to slowly bring the relative humidity in the room down to 50%.

CONSERVATOR TO CALL:	Paul Storch Objects Conservator W: 651-259-3381 H:	backup:	Tom Braun Objects Conservator W: 651-259-3382 H:
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SALVAGE OF WATER DAMAGED COLLECTIONS

ARCHAEOLOGICAL: BONE AND SHELL

- Priority:** These materials are susceptible to water damage if allowed to be wet for extended periods of time. Treat within 48 hours, if possible. Mold growth will occur in packages that contain excess moisture.
- Handling Precautions:** Shells with powdery surfaces will be readily affected by water, whereas mammalian long bones will be relatively unaffected. Move items only after a place has been prepared to receive them. Empty bags and boxes of excess water and extraneous debris before moving.
- Packing Methods:** Varies with the fragility of the objects. Wet bone and shells should be kept wet until controlled drying procedures are begun. Pack each object separately on damp absorbent materials such as paper towels, acid-free tissue, etc. Label decorated and objects with fragile surfaces to go to the Objects Conservator for drying and treatment.

Supplies Needed

clear water fans	plastic for wrapping labeling supplies	sponges, clean towels, paper towels or unused newsprint dry blotting materials
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- Preparation For Drying:** Rinse or sponge stable objects with clear water to remove mud and extraneous dirt. Be careful to preserve provenance information, especially where the labels on the objects have been abraded or dissolved off. Keep these objects moist by wrapping in plastic until they can be treated.
- Drying Procedure:** Sponges, clean towels, or unused newsprint may be used to absorb excess moisture. Exchange wet for dry blotting material at least daily until items are dry. Check daily for mold growth.
- Air dry, using fans to keep air moving without blowing directly on the pieces. Place items on propped up window screens if drying racks are not available. This will allow air to circulate on all sides of the objects. Use portable dehumidifiers to slowly remove moisture from the area and objects. Bring relative humidity down to 50%.

CONSERVATOR TO CALL:	Paul Storch Objects Conservator W: 651-259-3381 H:	backup:	Tom Braun Objects Conservator W: 651-259-3382 H:
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SALVAGE OF WATER DAMAGED COLLECTIONS

ARCHAEOLOGICAL: CERAMICS

(earthenware, terra cotta, unglazed stoneware, and sunbaked earth)

- Priority:** Sunbaked earth and terra cotta objects should be dried within 24 hours to prevent loss of surface detail and disintegration. Begin drying within 48 hours to prevent mold growth and softening if objects have been saturated.
- Handling Precautions:** Reconstructed vessels may become unstable at the joins, especially if water permeable adhesives were used (e.g., Elmer's Glueall). Keep pieces together in a plastic bag or box. Be careful to retain provenance information.
- Packing Methods:** Some low-fired ceramic objects may contain soluble salts that will migrate to the surface when the object dries, causing loss of surface detail due to recrystallization and subsequent spalling. Separate those objects and very low-fired ceramics. Keep moist by packing in damp toweling and plastic bags.

Supplies Needed

**plastic bags or boxes
blotting material**

**damp toweling
soft bristle brushes
fans**

**distilled water
portable dehumidifier**

- Preparation For Drying:** Have a place set up where pieces can be laid out for maximum air flow to allow for even drying. Place objects on raised screening to distribute air flow. Salt containing objects may have to be soaked to remove the salts by diffusion into distilled water; consult a Conservator.
- Drying Procedure:** Blotting material can be used to absorb excess moisture. Gently brush off excess mud and dirt if it can easily be distinguished from the object (e.g., in the case of low fired prehistoric material and sunbaked earth). Dry slowly with fans blowing above the surface of the objects. A portable dehumidifier should be set up to slowly bring the relative humidity in the room down to 50%.

CONSERVATOR TO CALL:

Paul S. Storch
Objects Conservator
W: 651-259-3381
H:

backup: Tom Braun
Objects Conservator
W: 651-259-3382
H:

SALVAGE OF WATER DAMAGED COLLECTIONS

ARCHAEOLOGICAL: METALS

Priority: Unstable (i.e. actively corroding, heavily mineralized, and copper chloride involved objects) should be treated with 48 hours since they can suffer damage from long term exposure to water. Stable and treated artifacts can be dealt with last.

Handling Precautions: Move items only after a place has been prepared to receive them.

Packing Methods: Water sensitive artifacts, such as copper alloys should be packed with silica gel in individual containers. Metal artifacts with textile or leather remnants and pseudomorphs must be wrapped quickly to retain the moisture. Letting these objects dry out without proper treatment may cause the loss of the pseudomorphic evidence. Previously treated objects (e.g., tannic acid and wax may exhibit "flash" rusting under the wax coating. These objects should be packed with silica gel to stabilize the rust until the wax can be removed and the tannin treatment reapplied. The same is true for artifacts that have been treated and coated with an acrylic resin.

Supplies Needed

silica gel	plastic wrapping materials or bags	soft bristle brushes
clear water	blotting material	portable humidifier
fans	heat gun	

Preparation For Drying: On most metal artifacts that have become wet, the mud or dirt can be gently removed with clear water and a soft brush. If previously dry, composite objects such as a jackknife with bone handles should be kept moist and taken to a Conservator for treatment or advice.

Drying Procedure: Blotting material can be used to absorb excess moisture. Exchange wet for dry blotting material at least once daily until artifacts are dry. Check daily for increased corrosion, shrinkage and fragmentation.

Air dry, using fans to keep air moving without blowing directly on the artifacts. Raise items off the floor or work surface on trestles, pallets, or lumber to allow air to circulate underneath the items. Smaller artifacts such as nails can be placed on drying screens.

Metal pieces that have not previously been coated with a thermoplastic resin can be dried with moderate heat (90-100 degrees F) in an oven or with a hand held heat gun. Use portable dehumidifiers to slowly remove moisture from the objects and area. Bring the relative humidity down to 50%, although the optimal range for completely metal objects is 30%-35%.

CONSERVATOR TO CALL:	Paul Storch Objects Conservator W: 651-259-3381 H:	backup:	Tom Braun Objects Conservator W: 651-259-3382 H:
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BOOKS: CLOTH OR PAPER COVERS

Priority: Freeze or dry within 48 hours. **Coated paper** must not be allowed to air dry in a clump or it will permanently block together. If slightly damp and the pages are separable, air dry interleaved pages before items have an opportunity to dry. If saturated, coated paper must be frozen as soon as possible for subsequent vacuum freeze-drying.

Handling: Do not move items until a place has been prepared to receive them. Do not open
Precautions: or close books or separate covers. Oversized books need to be fully supported, it may only be possible to move one at a time.

Preparation: Closed books that are muddy should be rinsed before freezing. If air drying is not
For Drying: possible, books should be frozen within 48 hours. Separate with freezer paper, pack spine down in milk crates, plastic boxes or cardboard boxes lined with plastic sheeting.

Coated Paper requires that each and every page be interleaved with a non-stick material such as silicone release paper, Hollytex or wax paper. If the leaves cannot be separated without further damage, the book cannot be air dried successfully and must be prepared for vacuum freeze drying.

Supplies Needed

bread trays	blotter paper	bookends/bricks
dehumidifier	extension cords	freezer or waxed paper
fans	masking tape	Hollytex (polyester spunbond fabric)
plywood sheets	scissors	newsprint (sheets or rolls)
polyethylene film	plexiglass sheets	pliers, screw driver, tin snips
sponges	polyester film	milk crates or Rescubes
	silicon release paper	

Drying: Air Drying is suitable for small quantities of books (less than 100 volumes) that
Methods: are not thoroughly soaked. Requires space in an area away from the disaster to spread the books out. Books are stood upright and gently fanned open to dry. Keep the air moving at all times using fans directed away from the drying volumes. Use dehumidifiers as needed to maintain humidity at or below 50% RH.

Oversize volumes must lay flat and should be turned when the blotter is changed. Pages should be interleaved with sheets of uninked newsprint or blotting paper that is slightly larger than the book leaf and changed as it becomes saturated.

Freeze Drying (not vacuum thermal drying) is suitable for large quantities of books and books that are very wet. Pack as described above and ship to drying facility (Appendix 4).

Vacuum Freeze Drying is suitable for large quantities of books. Wet coated paper can only be successfully dried by this method. Pack as described above and ship to drying facility (Appendix 4). Pack carefully, as volumes packed with distortions will retain that distortion permanently after vacuum freeze drying.

CONSERVATOR TO CALL:	Shereilyn Ogden	backup: Bryan Johnson
	Conservation Manager	Book Conservation Assistant
	W: 651-259-3380	W: 651-259-3383
	H:	H:

BOOKS: LEATHER OR VELLUM COVERS

- Priority: Freeze as soon as possible; vellum will distort and disintegrate in water.
- Handling: Do not move items until a place has been prepared to receive them. Do not open
- Precautions: or close books or separate covers. Oversized books need to be fully supported; it may only be possible to move one at a time.
- Preparation: Closed books that are muddy should be rinsed before freezing. If air drying is not
- For Drying: possible, books should be frozen, preferably blast frozen, as soon as possible. Separate with freezer paper, pack spine down in milk crates, plastic boxes or cardboard boxes lined with plastic sheeting.

Supplies Needed

- | | | |
|--------------------------|------------------------------|---|
| bread trays | blotter paper | bookends/bricks |
| dehumidifier | extension cords | freezer or waxed paper |
| fans | masking tape | Hollytex (polyester spunbond fabric) |
| plywood sheets | scissors | newsprint (sheets or rolls) |
| polyethylene film | plexiglass sheets | pliers, screw driver, tin snips |
| sponges | polyester film | milk crates or Rescubes |
| | silicon release paper | |

Drying Procedure: Thermaline or cryogenic drying is a new technique that promises to be the best for leather and vellum bindings. Books should be separated with freezer paper and packed spine down in milk crates or plastic boxes.

Air drying may be used for items that are not very wet. This requires space in an area away from the disaster to spread the books out. Books are stood upright and gently fanned open to dry.

Coated Paper requires that each and every page be interleaved with a non-stick material such as silicone release paper, Hollytex or wax paper.

Oversize volumes must lay flat and should be turned when the blotter is changed. Pages should be interleaved with sheets of uninked newsprint or blotting paper that is changed as it becomes saturated.

Keep the air moving at all times using fans. Direct fans into the air and away from the drying records. Use dehumidifiers as needed to maintain humidity at or below 50% RH.

CONSERVATOR TO CALL:	Sherelyn Ogden	backup:	Bryan Johnson
	Conservation Manager		Book Conservation Assistant
	W: 651-259-3380		W: 651-259-3383
	H:		H:

INORGANICS: CERAMICS, GLASS, METALS, STONE

(Decorative/Historic)

Priority: These materials can be dealt with last since they generally will suffer little damage from short term exposure to water.

Handling Precautions: Move items only after a place has been prepared to receive them.

Packing Method: Varies with the fragility of the material; water/wetness has no bearing.

Supplies Needed

clear water fans heater or hair dryer	portable dehumidifier pallets or lumber	sponges, clean towels, paper towels or unused newsprint
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Preparation For Drying: Rinse or sponge with clear water to remove mud or dirt before drying.

Drying Procedure: Sponges, clean towels, paper towels, or unused newsprint may be used to absorb excess moisture. Exchange wet for dry blotting material at least daily until items are dry. Check daily for mold growth.

Air dry, using fans to keep air moving without blowing directly on the pieces. Raise items off the floor on trestles, pallets, or lumber to allow air to circulate underneath the items.

Metal objects can be dried with moderate heat (90-100°F in an oven or using a heater or hair dryer).

Use portable dehumidifiers to slowly remove moisture from the area/objects. Bring relative humidity down to 50%.

CONSERVATOR TO CALL:	Paul Storch Objects Conservator W: 651-259-3381 H:	backup:	Tom Braun Objects Conservator W: 651-259-3382 H:
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LEATHER AND RAWHIDE

- Priority: Begin drying within 48 hours to prevent mold growth. Leather with the condition known as "red rot", will be irreversibly stiffened and darkened by exposure to water if not treated quickly.
- Handling Precautions: Wet leather may be fragile; leather with red rot or which is torn will require support to transport safely. Move items only after a place has been prepared to receive them.
- Packing Method: Wrap items with freezer paper or plastic sheeting to prevent red-rotted leather from coming in contact with and soiling adjacent items and to keep it from drying before it can be treated. Support complex shaped objects with uninked newsprint or other absorbent material.

Supplies Needed

**portable dehumidifier
pallets or lumber
clear water
fans**

**freezer paper or plastic sheeting
sponges, clean towels, paper towels,
or unused newsprint**

Preparation For Drying: Rinse or sponge with clear water to remove mud or dirt before drying. Be careful in rinsing red rotted or painted/gilded surfaces. Keep red rotted leather damp, if it is still in that condition, until proper consolidation can be done.

Drying Procedure: Some leather was intended to be flexible (e.g. much native tanned 'buckskin', harness leather, and some rawhide) and will need to be manipulated during drying in order to retain its flexibility. Other leather was either not intended to flex (e.g. shields, fire buckets) or no longer needs to be flexible and may be padded out and allowed to dry slowly.

Sponges, clean towels, paper towels, or uninked newsprint may be used to absorb excess moisture. Pad out to correct shape using uninked newsprint or other absorbent material. Change padding material as it becomes saturated.

Air dry, using fans to keep air moving without blowing directly on the pieces. Raise items off the floor on trestles, pallets, lumber, or screens to allow air to circulate on all sides.

Use portable dehumidifiers to slowly remove moisture from the area and objects. Bring the relative humidity down to as close to 50% as is practical. Check daily for mold.

CONSERVATOR TO CALL:

Paul Storch
Objects Conservator
W: 651-259-3381
H:

backup: Tom Braun
Objects Conservator
W: 651-259-3382
H:

MAGNETIC MEDIA: COMPUTER DISKETTES

Priority: Prolonged storage in water causes leaching of chemicals from the support. If a back-up copy is available, it is better to discard the water-soaked original.

Handling Precautions: Store diskettes upright without crowding, in cool distilled water until you are ready to attempt data recovery. Exposure to water should not extend beyond 72 hrs. If discs cannot be dried and copied within three days, the discs should be placed wet in plastic bags and frozen until drying and data recovery is possible.

Supplies Needed

**blotter paper
cheese cloth
distilled water
fans
plastic trays
scissors**

**bubble pack
clothes line
Falcon squeegee
plastic bags
rust-proof clips
sponges**

**brushes (soft bristle)
dehumidifier
drying racks for RC prints
Kodak Photo Flo solution
Salthill dryer**

Preparation For Drying: 5¼" disks - remove the disk by cutting with scissors along the edge of jacket. Carefully remove the diskette and agitate the exposed disks in multiple baths of cool deionized water from the Objects Conservation Lab or distilled water to remove all visible dirt.

3½" disks - pack wet disks in plastic bags and ship overnight to a computer media recovery service vendor for data recovery (Appendix 4). Do not dry discs first: dried impurities can etch magnetic coating.

Drying Methods: 5¼" disks - dry with lint-free toweling or cheese cloth. 3½" disks - Send disks to a professional data recovery vendor. Do not attempt to copy. Damage to your hardware could result.

Data Recovery: In order to ensure the preservation of data on disks that have been wet, it is prudent to copy it to a new disk. Insert the disk which has been dried into an empty jacket made by removing a new disk. The water damaged disk which has been placed in the new jacket is inserted into a disk drive. Copy and verify that the information has transferred, then discard the damaged disk. You need only prepare one new jacket for each five to ten disks since the same jacket can be reused several times. Most diskettes can be salvaged unless the diskette itself is magnetically damaged or warped. If copying is not successful, consult computer recovery services in Appendix 4.

CONSERVATOR TO CALL:

Sherelyn Ogden
Conservation Manager
W: 651-259-3380
H:

backup: Bob Herskovitz
Outreach Conservator
W: 651-259-3465
H:

backup: Tom Braun
Objects Conservator
W: 651-259-3382
H:

MAGNETIC MEDIA: REEL TO REEL TAPES

Priority: Air dry within 72 hours.

Handling Precautions: Pack vertically into plastic crates or cardboard cartons. Don't put heavy weight or pressure on the sides of the reels.

Supplies Needed

- | | | |
|------------------------|-------------------------|-----------------------------------|
| blotter paper | bubble pack | brushes (soft bristle) |
| cheese cloth | clothes line | dehumidifier |
| distilled water | Falcon squeegee | drying racks for RC prints |
| fans | plastic bags | Kodak Photo Flo solution |
| plastic trays | rust-proof clips | Salthill dryer |
| scissors | sponges | |

Preparation For Drying: Often contamination by water and other substances is mainly confined to the outermost layers of tape. Do not unwind tapes or remove from the reel. In these cases, wash the exposed edges with deionized water from the Objects Conservation or Photo Labs or with distilled water.

Drying Methods: Air dry by supporting the reels vertically or by laying the reels on sheets of clean blotter. Leave the tapes to dry next to their original boxes. Use fans to keep air moving without blowing directly on the items.

Use portable dehumidifiers to slowly remove moisture from the area/objects. Bring relative humidity down to 50%.

Additional Steps: Once dry, the tapes can be assessed for further cleaning and duplication. This procedure is done by specialized professional vendors; consult Appendix 4 for names and numbers.

CONSERVATOR TO CALL:	Sherelyn Ogden Conservation Manager W: 651-259-3380 H:	backup: Bob Herskovitz Outreach Conservator W: 651-259-3465 H:
		backup: Steve Cunat Microfilm Project Director W:651-259-3395 H:

MICROFICHE

Priority: Freeze or dry within 72 hours

Handling: Do not move items until a place has been prepared to receive them and you have
Precautions: been instructed to do so. If the fiche cannot be air dried immediately keep them wet inside a container lined with garbage bags until they can be frozen.

Supplies Needed

**blotter paper
cheese cloth
distilled water
fans
plastic trays
scissors**

**bubble pack
clothes line
Falcon squeegee
plastic bags
rust-proof clips
sponges**

**brushes (soft bristle)
dehumidifier
drying racks for RC prints
Kodak Photo Flo solution
Salthill dryer**

Drying: Freeze if arrangements cannot be made to air dry the fiche quickly. Fiche should
Methods: be removed from the paper jackets to dry. Jackets should be retained to preserve any information printed on them, but this information should be transferred to new jackets once the fiche is dry and ready to be stored again. The best air drying method is to clip the fiche to clothes lines with rust-proof clips.

Fiche has been successfully vacuum freeze dried, though freeze-drying of photographic materials is not widely recommended. If dealing with large quantities of fiche this option should be investigated.

CONSERVATOR TO CALL:

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Outreach Conservator
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backup: Steve Cunat
Microfilm Project Director
W: 651-259-3395
H:

MICROFILM AND MOTION PICTURE FILM

- Priority: Rewash and dry within 72 hours. Wet film must be kept wet until it can be reprocessed.
- Handling Precautions: Wipe outside of film cans or boxes before opening. Cans that are wet on the outside may contain dry film that should be separated from wet material. Do not remove wet microfilm from boxes; hold cartons together with rubber bands. Dry film in damp or wet boxes should be removed and kept together with the box. Do not move items until a place has been prepared to receive them.
- Packing Methods: Wet microfilm in plastic trays in the microfilm vault should be filled with water until reprocessed. Pack wet motion picture film in a container lined with plastic garbage bags.

Supplies Needed

- | | | |
|------------------------|-------------------------|-----------------------------------|
| blotter paper | bubble pack | brushes (soft bristle) |
| cheese cloth | clothes line | dehumidifier |
| distilled water | Falcon squeegee | drying racks for RC prints |
| fans | plastic bags | Kodak Photo Flo solution |
| plastic trays | rust-proof clips | Salthill dryer |
| scissors | sponges | |

- Preparation For Drying: Microfilm Lab or film processor to rewash film prior to drying.
- Drying Methods: MHS Microfilm Lab to rewash and dry microfilm. A professional processor should be contacted to rewash and dry motion picture film.

CONTACTS:

- | | | |
|---------------------|---|--|
| Microfilm | Sherelyn Ogden
Conservation Manager
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H: | backup: Bob Herskovitz
W:651-259-3465
H: |
| | | backup: Steve Cumat
Microfilm Project Director
W: 651-259-3395
H: |
| Motion Picture Film | Sherelyn Ogden
Conservation Manager
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H: | backup: Bob Herskovitz
W: 651-259-3465
H: |
| | | backup: Jennifer Jones
W: 651-259-3246
H: |

SALVAGE OF WATER DAMAGED COLLECTIONS

ORGANICS: BONE, HAIR, HORN, IVORY, SHELL

Priority: Begin drying within 48 hours to prevent mold growth.

Handling: Move items only after a place has been prepared to receive them.

Precautions:

Packing Method: Individually wrap or plastic bag objects since these materials tend to split and fragment into small pieces when wet or damp.

Supplies Needed

plastic sheeting or bags	clear water	sponges, clean towels, paper towels,
portable dehumidifier	fans	or unused newsprint
pallets or lumber		

Preparation For Drying: Rinse or sponge with clear water to remove mud or dirt before drying.

Drying Procedure: Sponges, clean towels, paper towels, or unused newsprint may be used to absorb excess moisture.

Air dry slowly, using fans to keep air moving without blowing directly on the pieces. Raise items off the floor on trestles, pallets, or lumber to allow air to circulate underneath the items.

Use portable dehumidifiers to slowly remove moisture from the area/objects. Bring relative humidity down to 50%.

CONSERVATOR TO CALL:	Paul Storch Objects Conservator W: 651-259-3381 H:	backup:	Tom Braun Objects Conservator W: 651-259-3382 H:
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PAINTINGS: ON CANVAS

- Priority: Begin drying within 48 hours to prevent mold growth.
- Handling: Move items only after a place has been prepared to receive them. If the frame is unstable, remove from painting, pad corners with corrugated cardboard, bubble wrap, or unused newsprint and transport to area dealing with wood objects.
- Precautions:
- Packing: Pad corners of frame or painting with corrugated cardboard, bubble wrap, or newsprint. Transport paintings vertically; stand upright with corrugated cardboard between paintings so that painted surfaces do not touch a rough surface.
- Method:

Supplies Needed

- blotter paper**
- stretch/strainer**
- fans**
- portable dehumidifier**
- corrugated cardboard, bubble wrap, or unused newsprint**

Preparation For Drying: Remove painting from frame: See **PAPER: FRAMED OR MATTED, PREPARATION FOR DRYING.**

Drying Procedure: Prepare a horizontal bed of blotter paper and unused newsprint, equal in thickness to the paint layer, with top-most layer of strong clean tissue. Lay painting, still on stretcher/strainer, face down on this surface. Remove any remaining backing or labels from the painting, to expose wet canvas. Retain and tag all associated labels, parts and/or components that are removed or detached from the painting or frame.

Place cut-to-fit blotters or unused newsprint against this back, and apply a slight amount of pressure so that the blotter makes good contact with the entire exposed canvas surface. Repeatedly change backing blotter, being careful not to create impressions in the canvas. **DO NOT CHANGE FACING MATERIALS.**

When dry to the touch, remove backing blotter and pick up painting. If front facing tissue is still attached to painting front, do not attempt to remove it, since it will hold the painting surface together until it can be consolidated by a conservator.

Consult with an MHS conservator for any questions or problems and all circumstances not adequately covered by the above instructions.

Use fans to keep air moving in the room without blowing directly on the paintings. Use portable dehumidifiers to slowly remove moisture from the area/objects. Bring relative humidity down to 50%.

- CONSERVATOR TO CALL: Paul Storch
Objects Conservator
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- backup: Sherelyn Ogden
Conservation Manager
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- backup: Tom Braun
Objects Conservator
W: 651-259-3382
H:

PAPER: COATED (page 1 of 2)

[Including linen drawings (drafting cloth) and paper with sensitized coatings such as thermo fax and FAX copies.]

Priority: **Coated paper must not be allowed to air dry in a clump or it will permanently block together.** If saturated, freeze within six hours for subsequent vacuum freeze-drying. If damp, separate and air dry before items have an opportunity to dry.

Handling Precautions: Physical manipulation should be kept to a minimum to avoid disruption of the water soluble coating and media which can result in loss of information.

Preparation For Drying: Air Drying - Secure a clean, dry environment where the temperature and humidity are as low as possible. Equipment needed: flat surfaces for drying; fans and extension cords; dehumidifier; moisture meter; sheets of polyester film, non-stick interleaving material such as freezer, waxed or silicone release paper or polyester non-woven fabric.

Freezing - Equipment needed: milk crates; cardboard boxes for large items; large flat supports such as bread trays or pieces of plywood; freezer, waxed or silicone release paper or polyester non-woven fabric.

Remove drawers from flat files; ship and freeze stacked with 1" x 2" strips of wood between each drawer. Framed or matted items must be removed from frames and mats prior to drying. See **PAPER: FRAMED OR MATTED, PREPARATION FOR DRYING.**

Supplies Needed

- | | | |
|--------------------------|------------------------------|---|
| bread trays | blotter paper | bookends/bricks |
| dehumidifier | extension cords | freezer or waxed paper |
| fans | masking tape | Hollytex (polyester spunbond fabric) |
| plywood sheets | scissors | newsprint (sheets or rolls) |
| polyethylene film | plexiglass sheets | pliers, screw driver, tin snips |
| sponges | polyester film | milk crates or Rescubes |
| | silicon release paper | |

Drying Methods: Air Drying - This technique is most suitable for small numbers of records which are damp or water-damaged around the edges. Coated Paper requires that each and every page be interleaved with a non-stick material such as silicone release paper, Hollytex or wax paper.

Damp material - Lay single sheets or small groups of interleaved records on paper covered flat surfaces. If small clumps of records are fanned out to dry, they should be turned at regular intervals to encourage evaporation from both sides.

If an item exhibits water-soluble media, allow it to dry face up. Do not attempt to blot the item since blotting may result in offsetting water-soluble components. Wet blotter or uninked newsprint should be changed and removed from the drying area.

PAPER: COATED (page 2 of 2)

Wet material - When separating saturated paper, use extra caution to support large sheets. If sheets are contained in flat files, standing water should be sponged out first. If items are in L-sleeves the polyester must be removed to allow drying. Cut the two sealed edges of the film between the item and the seal. Roll back the top piece of polyester in a diagonal direction. If there are any apparent problems with the paper support or media, stop and seek the assistance of a Conservator. Support can be given to single sheets by placing a piece of polyester film on the top of the document. Rub the film gently and then slowly lift the film while at the same time peeling off the top sheet in a diagonal direction. Lay the sheet flat; as it dries, it will separate from the surface of the film.

Keep the air moving at all times using fans. Direct fans into the air and away from the drying records. Use dehumidifiers as needed to maintain humidity at or below 50% RH.

Freezing - Freezing is best if there are large quantities of damp materials or if the water damage is extensive. Place manuscript boxes in milk crates or cardboard boxes. If time permits, interleave each manuscript box with freezer or waxed paper. If the boxes have been discarded, interleave every two inches of foldered material with freezer or waxed paper.

Specify vacuum freeze drying for coated paper and linen drawings; do not use vacuum thermal drying.

Pack flat sheets in bread trays, flat boxes, or on plywood sheets covered with polyethylene. Bundle rolled items loosely and place horizontally in boxes lined with a release layer.

Do not freeze framed items. Remove frame assemblage before freezing. See **PAPER: FRAMED OR MATTER, PREPARATION FOR DRYING.**

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backup: Bob Herskovitz
Outreach Conservator
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backup: Tim Herstein
Paper Assistant
W: 651-259-3384
H:

PAPER: FRAMED OR MATTED, PREPARATION FOR DRYING

Priority: Wet paper must be frozen or air dried within 48 hours. Framed and matted items must be disassembled prior to air drying or freezing.

Handling Precautions: Caution must be exercised so as to not puncture or tear the wet paper artifact in the process of removing the frame, glazing and mounting materials.

Supplies Needed

- | | | |
|--------------------------|------------------------------|---|
| bread trays | blotter paper | bookends/bricks |
| dehumidifier | extension cords | freezer or waxed paper |
| fans | masking tape | Hollytex (polyester spunbond fabric) |
| plywood sheets | scissors | newsprint (sheets or rolls) |
| polyethylene film | plexiglass sheets | pliers, screw driver, tin snips |
| sponges | polyester film | milk crates or Rescubes |
| | silicon release paper | |

Preparation For Drying: Place frame face down on a smooth, flat surface covered with blotter paper or plastic bubble pack. Carefully remove dust seal and hardware (place these metal pieces in a container so that they do not come in contact with the wet paper and inadvertently cause damage). Check if the paper object is adhered to rabbet of frame by gently pushing up on the glazing to see that the assemblage will release without resistance. Place a piece of board (mat board, masonite or plexiglass) over the back of the frame with all contents still in place. Using two hands, invert frame assemblage so that the glass and image are facing up. Lift off the frame then lift off the glass.

When the paper is in direct contact with the glass, carefully remove them together and lay face down on a flat surface. Consult a Conservator if the paper is sticking to the glazing.

If the glass is broken, the pieces may be held together with masking tape applied lightly over the breaks. The frame may then be laid face down and the paper removed from the back. If pieces of glass have dropped behind the remaining glass, hold the frame in a vertical position to remove the mat and/or paper.

To remove the item from its mat, place the image facing up. Lift window mat board carefully and detach paper object from back mat by carefully cutting hinges. If the object is attached firmly and directly to mat or backing board, do not attempt to remove. Proceed to air dry paper object as recommended in **PAPER: UNCOATED** or **PAPER: COATED**, as appropriate.

If difficulty is encountered at any point, consult a Conservator for assistance.

CONSERVATOR TO CALL:	Sherelyn Ogden	backup:	Tim Herstein
	Conservation Manager		Paper Assistant
	W: 651-259-3380		W: 651-259-3384
	H:		H:

PAPER: UNCOATED

Priority: Air dry or freeze within 48 hours. Records with water soluble inks should be frozen immediately to arrest the migration of moisture that will feather and blur inks. Records that show signs of previous bacterial growth should also be frozen immediately if they cannot be air dried.

Handling: Paper is very weak when wet and can easily tear if unsupported while handling.
Precautions:

Supplies Needed

- | | | |
|--------------------------|------------------------------|---|
| bread trays | blotter paper | bookends/bricks |
| dehumidifier | extension cords | freezer or waxed paper |
| fans | masking tape | Hollytex (polyester spunbond fabric) |
| plywood sheets | scissors | newsprint (sheets or rolls) |
| polyethylene film | plexiglass sheets | pliers, screw driver, tin snips |
| sponges | polyester film | milk crates or Rescubes |
| | silicon release paper | |

Preparations For Drying: Pack flat sheets in bread trays, flat boxes, or on plywood sheets covered with polyethylene. Bundle rolled items loosely and place horizontally in boxes lined with a release layer. Remove drawers from flat files; ship and freeze stacked with 1" x 2" strips of wood between each drawer. Framed or matted items must be removed from frames and mats prior to air or freeze drying. See **PAPER: FRAMED OR MATTED, PREPARATION FOR DRYING**.

Air Drying - secure a clean, dry environment where the temperature and humidity are as low as possible. Cover tables, floors or other flat surfaces with sheets of blotter or uninked newsprint.

Freezing - Work space and work surfaces and the following equipment: milk crates and/or cardboard boxes, bread trays, sheets of plywood and rolls/sheets of freezer or waxed paper.

Drying Methods: Air Drying - This technique is most suitable for small numbers of records which are damp or water-damaged around the edges. Keep the air moving at all times using fans. Direct fans into the air and away from the drying records. Use dehumidifiers as needed to maintain 50% RH.

Damp material - Single sheets or small groups of records are to be laid out on paper covered flat surfaces. If small clumps of records are fanned out to dry, they should be turned at regular intervals to encourage evaporation from both sides.

If an item exhibits water-soluble media, allow it to dry face up. Do not attempt to blot the item since blotting may result in offsetting water-soluble components. Wet blotter or newsprint should be changed and removed from the drying area.

Wet material - When separating saturated paper, use extra caution to support large sheets. If sheets are contained in flat files, standing water should be sponged out first. If items are in L-sleeves the polyester must be removed to allow drying. Cut the two sealed edges of the film in the border between the item and the seal. Roll back the top piece of polyester in a diagonal direction. If there are any apparent problems with the paper support or media, stop and seek the assistance of a Conservator. Support can be given to single sheets by placing a piece of polyester film on the top of the document. Rub the film gently and then slowly lift the film while at the same time peeling off the top sheet in a diagonal direction. Lay the sheet flat; as it dries, it will separate from the surface of the film.

Freezing - This option is best if there are large quantities or if the water damage is extensive. Place

PAPER: UNCOATED (continued)

manuscript boxes in milk crates or cardboard boxes. If time permits, interleave each manuscript box with freezer or waxed paper. If the boxes have been discarded, interleave every two inches of foldered material with freezer or waxed paper.

Do not freeze framed items. Remove frame assemblage before freezing. See **PAPER: FRAMED OR MATTED, PREPARATION FOR DRYING.**

CONSERVATOR TO CALL:

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backup:

Tim Herstein
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PHOTOGRAPHS AND TRANSPARENCIES

Priority: Salvage priorities. Within 24 hours: 1) ambrotypes, daguerreotypes, tintypes, silver gelatin glass plate negatives, wet collodion glass plate negatives; Within 48 hours: 2) color prints and film, silver gelatin prints and negatives; 3) albumen prints and salted paper prints. Cyanotypes in alkaline flood water must be dried as soon as possible; in acidic water they drop to priority 3. Consult a conservator to determine the ph of the water.

Handling: Do not touch emulsion, hold by the edges or margins. Always lay with emulsion side up.
Precautions:

Supplies Needed

blotter paper	bubble pack	brushes (soft bristle)
cheese cloth	clothes line	dehumidifier
distilled water	Falcon squeegee	drying racks for RC prints
fans	plastic bags	Kodak Photo Flo solution
plastic trays	rust-proof clips	Salthill dryer
scissors	sponges	

Preparations For Drying: Secure a clean area to work, free from particulates. Keep the photos and/or negatives in containers of fresh cold water until they are either air dried or frozen. If allowed to partially dry in contact with each other, they will stick together. To maintain wetness until the drying process can take place, pack photos inside plastic garbage pails or boxes lined with garbage bags.

Equipment and materials needed: plastic trays, cold water, clothesline, clothespins and/or photo clips, soft bristle brushes, Kodak Photo Flo Solution, Hollytex and clean photographic blotter paper, Falcon squeegee and drying racks for RC prints; Salthill dryer for recent fiber based prints.

Carefully remove prints and film positives and negatives from their enclosures. Keep the enclosure or the file number with each film item as it contains vital information to maintain intellectual control.

Cased photographs - Carefully open the case and place the photograph face up on blotters. **Do not** attempt to disassemble the components, remove debris or wash the photograph. If the affected photo has water or debris trapped within the assemblage, contact the Conservator for proper disassembly.

Uncased images - Air dry emulsion side up on clean absorbent blotters. Remove and retain cover slips from glass lantern slides if present. Do not attempt to clean debris or wash these images. These procedures will be performed by a Conservator.

Black and White Prints - Place the prints in a tray and fill with cool water (60 to 70 degrees). Agitate the tray and change the water several times. After 15 minutes, drain the water and air dry. Reduce washing time for deteriorated and card mounted prints. The water temperature should not change radically from hot or cold because of reticulation.

PHOTOGRAPHS AND TRANSPARENCIES (continued)

Color Prints - Use the same procedures as for black and white prints but with decreased washing time: 10 minutes. Reduce washing time further for deteriorated prints.

Negatives (glass and film)- silver gelatin - Soak the films in clean, cool water (60 to 70 degrees) for 30 minutes. Use caution to avoid reticulation. If there are particulates on the film, rinse for 10-15 minutes while gently brushing surfaces under water with a soft bristle brush, then continue washing for an additional 15 minutes. Rinse with Kodak Photo Flo solution (1/2 ounce per one gallon of water).

Glass Plate Negatives - collodion - Do not wash or expose plates to further moisture; if any image remains, air dry immediately, emulsion side up, reverse of read right viewing.

Kodachrome Transparencies - Wash as described above for negatives - silver gelatin.

Ektachrome Transparencies - Wash as described above for negatives - silver gelatin, omitting the Photo Flo, then dry. Consult a photo conservator after transparencies have dried, as some may require stabilization.

Color Negatives - Wash as described above for negatives - silver gelatin, omitting Photo Flo, then dry. Consult a photo conservator after transparencies have dried, as some may require stabilization.

Drying
Method:

Order of preference: 1) air dry, 2) freeze/thaw and air dry, 3) vacuum freeze dry.
Do not vacuum thermal dry or freeze dry.

Prints and Films - Dry film by hanging on a clothesline at room temperature in a dust free area. Lay glass plates and prints emulsion side up on a clean absorbent blotter.

Photo Albums - To air dry, place sheets of blotter covered with Hollytex between each leaf. Change the blotter paper as it becomes damp or wet. If the binding structure is no longer intact or the album can be dismantled, separate the leaves and air dry on clean blotters covered with Hollytex; periodically turn from recto to verso to promote even drying. If drying cannot proceed immediately, wrap the volume in plastic and freeze. The volume can then be thawed and air dried at a later date.

Keep the air moving at all times using fans. Direct fans into the air and away from the drying records. Use dehumidifiers as needed to maintain humidity at or below 50% RH.

If air drying is not possible due to media solubility or unacceptable disruption to the structural integrity of the volume, vacuum freeze drying is recommended.

If difficulty is encountered, consult a Conservator for assistance.

CONSERVATOR TO CALL:

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Conservation Manager
W: 651-259-3380
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backup: Eric Mortenson
Photo Lab Manager
W: 651-259-3321
H:

SALVAGE OF WATER DAMAGED COLLECTIONS

RECORD ALBUMS

(Vinyl, Shellac and Acetate Discs)

Priority: Dry within 48 hours. Freezing is untested; if there are no options, freeze at above 0° F (-18° C).

Handling Precautions: Hold discs by their edges. Avoid shocks.

Packing Method: Pack vertically in padded plastic crates.

Supplies Needed

padded plastic crates
distilled water

grease pencil
blotting materials

Kodak Photo Flo Solution

Preparation For Drying: Remove the discs from their sleeves and jackets. If labels have separated, mark the center of the disc with a grease pencil and keep track of the label.

Separate shellac, acetate and vinyl discs. If dirt has been deposited on the discs, they may be washed in a 1% solution of Kodak Photo Flo in distilled water. Each disc media should be washed in its own container (ie. do not wash shellac discs with vinyl discs). Rinse each disc thoroughly with distilled water.

Drying Methods: Jackets, sleeves, and labels may be air dried like other paper materials. See **PAPER: COATED** and **PAPER: UNCOATED**.

Air dry discs vertically in a rack that allows for the free circulation of air. Dry slowly at ambient temperature away from direct heat and sources of dust.

CONSERVATOR TO CALL:

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backup: Sherelyn Ogden
Conservation Manager
W: 651-259-3380
H:

SCRAPBOOKS

Priority: Freeze immediately.
Handling Do not move items until a place has been prepared to receive them. Large
Precautions: scrapbooks should be supported with boards.

Supplies Needed

bread trays	blotter paper	bookends/bricks
dehumidifier	extension cords	freezer or waxed paper
fans	masking tape	Hollytex (polyesterspunbond fabric)
plywood sheets	scissors	newsprint (sheets or rolls)
polyethylene film	plexiglass sheets	pliers, screw driver, tin snips
sponges	polyester film	milk crates or Rescubes
silicon release paper		

Preparation If the scrapbook is not boxed and the binding is no longer intact, wrap in freezer paper.
For Drying: Freeze as quickly as possible, using a blast freezer if available.

Freezing - Equipment needed: milk crates; cardboard boxes for large items; large flat supports such as bread trays or pieces of plywood; freezer, waxed or silicone release paper or polyester non-woven fabric.

Air Drying - Secure a clean, dry environment where the for temperature and humidity are as low as possible. Equipment needed: flat surfaces for drying; fans and extension cords; dehumidifier; moisture meter; sheets of polyester film, non-stick interleaving material such as freezer, waxed or silicone release paper or polyester non-woven fabric.

Drying Methods: Vacuum freeze drying is the preferred method, although this should not be used for photographs. See **PHOTOGRAPHS AND TRANSPARENCIES**. If the book is to be vacuum freeze dried, the photographs should first be removed. Wrapped scrapbooks should be packed laying flat in shallow boxes or trays lined with freezer paper.

Air drying may be used for small quantities which are only damp or water-damaged around the edges. The books should not have large amounts of coated paper or soluble adhesives.

Pages should be interleaved with uninked newsprint or blotter and the books placed on tables. The interleaving and page opening should be changed regularly and often to speed the drying. If the binding has failed, it may be advisable to separate the pages and lay them out individually to dry. Care must be taken to maintain page order.

Keep the air moving at all times using fans. Direct fans into the air and away from the items. Use dehumidifiers as needed to maintain humidity at or below 50% RH.

CONSERVATOR TO CALL:	Sherelyn Ogden Conservation Manager W: 651-259-3380 H:	backup:	Bryan Johnson Book Conservation Assistant W: 651-259-3383 H:
		backup:	Tim Herstein Paper Assistant W: 651-259-3384 H:

TEXTILES AND CLOTHING:

Priority: Dry archaeological textiles and textiles with bleeding dyes as quickly as possible, all other textiles within 48 hours to prevent mold growth.

Handling Precautions: Move textiles only after a place has been prepared to receive them. Handle wet textile objects only when necessary and as little as possible because textile materials are weaker when wet and can be easily damaged or torn. Be particularly careful with wet archaeological textiles, which can be extremely weakened by contact with water. It is important to support wet textile objects thoroughly when moving them, either on a solid support or in a sling made from a length of fabric, because the added weight of the water increases the possibility of damage. Wet hanging costumes should be carried on a sling and not re-hung. Be sure that all identifying information, such as accession number tags, is retained with the objects, and label any parts that become detached. If it is possible to do so without excessive handling, remove all wet packing materials such as cardboard and tissue from contact with the textiles. Do not unfold or spread out wet textiles at this time, and do not stack wet textiles on top of each other.

Textile objects often have associated non-textile materials such as metal and leather. See the salvage instruction sheets for these materials, keeping in mind that the textile component will probably be the most vulnerable.

Preparation for Drying: A large area is needed to dry wet textiles, as they cannot be placed on top of each other. Floor space can be used; if possible, clean floors before using the space. Table and floor surfaces should be covered with clean polyethylene sheeting, and then with clean blotters or other absorbent material. Fans can be used to increase air circulation and speed drying; place them so that air flow goes across the surface of the textiles for optimal drying.

Supplies Needed

polyethylene sheeting	blotters	cheesecloth
terry cloth toweling	sponges	muslin or boards for carrying

Drying Procedures: Quick drying is essential for best recovery of wet textile objects. Excess water can be removed from very wet textiles in good condition by gentle blotting with sponges. Absorbent materials such as blotters or terry cloth toweling should then be placed on top of the objects, removed when saturated, and replaced with dry ones. When the textiles have dried to an appreciable level, they can be gently handled to open out folds and expose new areas to the air. Costumes can be padded out slightly with acid-free tissue, polyester batting, or nylon tulle to speed drying and prevent creasing.

Textiles with bleeding dyes should be dried first and as quickly as possible; use absorbent materials to remove as much water as possible. Concentrate drying activity on the areas that are bleeding so that they will dry before the surrounding areas; hair driers on low heat can be used. Cover the textile with cheesecloth and be sure the cheesecloth is in close contact with the textile; leave the cheesecloth undisturbed until the textile is completely dry.

CONSERVATOR TO CALL:	Ann Frisina Textile Conservator W: 651-259-3385 H:	backup:	Tom Braun Objects Conservator W: 651-259-3382 H:
		backup:	Sherelyn Ogden Conservation Manager W: 651-259-3380 H:

SALVAGE OF WATER DAMAGED COLLECTIONS

TEXTILES: COSTUME ACCESSORIES

- Priority: Begin drying within 48 hours to prevent mold growth.
- Handling: Support all accessories when moving them; use a solid support. Keep handling to minimum as these complex objects can be greatly weakened by water.
- Precautions:
- Preparation for Drying: Prepare the room and surfaces for drying as for textiles and clothing.

Supplies Needed

polyethylene sheeting
terry cloth toweling
cheesecloth

blotters
sponges
muslin or boards for carrying

- Drying Procedures: Do not attempt to open fans or parasols, and do not reshape hats while wet. Gently blot water from the objects with sponges, blotter, terry cloth toweling, or paper towels. As hats dry, they can be gently reshaped and padded with acid-free tissue or polyester batting for drying. Shoes and gloves should be treated as for leather historical objects; in general gloves do not need to be padded out for drying. Fans and parasols should be dried as is; do not attempt to open or reshape them. If any of the objects have bleeding dyes, follow the procedure outlined under Textiles and Clothing.

CONSERVATOR TO CALL:

Ann Frisina
Textile Conservator
W: 651-259-3385
H:

backup: Tom Braun
Objects Conservator
W: 651-259-3382
H:

backup: Sherelyn Ogden
Conservation Manager
W: 651-259-3380
H:

SALVAGE OF WATER DAMAGED COLLECTIONS

VELLUM AND PARCHMENT: BINDINGS AND DOCUMENTS

Priority: If the textblock of the book is wet, priority should be placed on getting it dry over saving the binding, unless the binding has been assigned the higher priority by a curator.

Handling: Do not move items until a place has been prepared to receive them.
Precautions:

Supplies Needed

blotters

weights

Hollytex

Drying Procedures: Drying must take place slowly and be carefully controlled. The item needs to be restrained as it dries for it to retain its shape.

Documents that have only been exposed to high humidity should be interleaved with dry blotters and placed under weights. Blotters should be checked after about a half hour to see if they need to be exchanged for drier ones.

For drying of slightly damp documents the edges should be clipped and pinned or, at the least, weighted. As the item dries it should be checked at least every 15 minutes and the tension adjusted as necessary. Once the item is almost dry the clips or weights can be removed and the item should be placed between blotters and weighted overall to complete drying.

Vellum bindings need to be watched carefully. Blotters should be placed between the covers and text and on the outside of the cover. The book should then be weighted or put in a press. As the binding dries it may shrink and cause damage to the text block, in which case it should be carefully removed before more damage is caused.

Thermaline or cryogenic drying is a new technique that shows promise for vellum and parchment. Vacuum freeze drying is to be avoided with vellum/parchment.

CONSERVATOR TO CALL:

Sherelyn Ogden
Conservation Manager
W: 651-259-3380
H:

backup: Paul Storch
Objects Conservator
W: 651-259-3381
H:

SALVAGE OF WATER-DAMAGED COLLECTIONS

WOOD

- Priority:** Begin drying within 48 hours to prevent mold growth. Polychromed objects require immediate attention; notify the Conservator.
- Handling Precautions:** Move items only after a place has been prepared to receive them. Lift from the bottom of an object: tables from the apron; chairs by the seat rails, not by the arms, stretchers, slats, headpiece or crest rails; trunks from the bottom, etc.
- Packing Methods:** Partially wetted objects can be packed with dry blotting materials such as uninked newsprint or acid free blotters to remove as much moisture as possible. Thoroughly wetted, unpainted objects should be wrapped with blotting materials, then wrapped in polyethylene sheeting to retain as much moisture as possible, since fast drying will cause irreversible damage.

Supplies Needed

soft bristle brush	sponges, clean towels, paper towels	fans
wooden spatula	polyethylene sheeting or uninked newsprint	
pallets or lumber	portable dehumidifier	

- Preparation For Drying:** Rinse or sponge with clear water to remove mud or dirt before drying. Be careful not to wipe or scour as grit will damage remaining finish. Use a soft bristle brush to clean carvings and crevices. If mud has dried, dampen with a sponge and remove with a wooden spatula; rinse. Remove wet contents and paper liners from drawers and shelves.
- Drying Procedure:** Absorb excess moisture with sponges, clean towels, paper towels, or uninked newsprint. Blot, do not wipe, to avoid scratching the surface.
- Air dry, using fans to keep air moving without blowing directly on the pieces. Tent the objects with polyethylene sheeting to slow the drying. Raise items off the floor on trestles, pallets, or lumber to allow air to circulate on all sides. Open doors and drawers slightly to allow air to circulate inside the items.
- Use portable dehumidifiers to slowly remove moisture from the area and objects. Drying quickly will cause warping and cracking. Bring relative humidity down to 50-55%.

CONSERVATOR TO CALL:	Paul Storch	backup:	Tom Braun
	Objects Conservator		Objects Conservator
	W: 651-259-3381		W: 651-259-3382
	H:		H:

APPENDIX 1

EMERGENCY KIT #1 (page 1 of 2) Room B-166 CONTENTS

1	Apron, Laboratory
6	Aprons, Vinyl with Ties
1 box	Baggies Freezer Bags, 12"x17 ³ / ₄ "
1 box	Baggies Freezer Bags, 18"x23 ³ / ₄ "
1 carton	Bags, Hefty Steel Sak Drawstring,(30 gal.)
1 roll	Boots, Foot Guard, Plastic, (50/roll)
1	Camera, Disposable
2	C-clamps, 3"
2 boxes	Chalk, Crayola White
1	Crow Bar
1	Electrical, Outdoor Extension Cord, (100')
3	Electrical, Socket Adapters, (3 prong)
1	First Aid Kit
1 pair	Gloves, Playtex Heavy Duty
2 pair	Gloves, Vining Deluxe Latex
1 box	Gloves, Disposable Plastic, (100/roll)
1	Hammer
1	Knife, Swiss Army, (pocket pal)
1	Knife, Utility
2	Light, Flashlight, Duracell
1	Light, Duracell Area Light
1	Light, Flashlight, Ray-O-Vac (lantern)
1	Mallet, Rubber
1 lb.	Nails, 6d, Common 2"
1 lb.	Nails, 10d, Common 3"
1	Pail, Rubbermaid , (11 qt.)
1	Pliers, Diagonal Cutting , 7"
1	Pliers, Slip Joint , 8"
1	Pull Chain Current Tap for Lamp Socket
13	Rescubes
2	Scissors
1	Screwdriver, 4" Slotted
1	Screwdriver, 4" Phillips
1	Sponge, Miracle Hydra Professional, (polyester base)
1	Sponge, Professional Industrial
3	Sponge, Soot Removal
1 roll	Tape, Filament
1 roll	Tape, Masking, (1"x60yds.)
1	Tape Rule, 100'
1 roll	Tape, Scotch #33 Electrical , (1/2"x200")
2 rolls	Tape, 3M Window Film Mounting , (1/2"x500")
2	Thymol, 200 grams
2 rolls	Towels, Hi-Dri Paper
1	Trash Can, Rubbermaid Roughneck, (30 gal.)
1 spool	Twine, Cotton
2 pkgs	Twine, Nylon, (282')

EMERGENCY KIT #1 (page 2 of 2) **Room B-166**

1 tool box Tools to access artifacts in exhibit cases
 screwdriver with assorted tips
 socket wrench
 hex wrenches
 keys for cases with locks

NOTE: Additional recovery supplies are stored in the following rooms:

PAPER CONSERVATION LAB ROOM 108

Batteries, D & 6V for the flashlight and lantern
Moisture meter

CONSERVATION SUPPLIES STORAGE

Newsprint - 1000 sheets - 24"x35"	Room B-113
Blotter - 200 sheets - 19"x24"	Room B-113 & B-166
Polyethylene Sheeting - Rolls	Room B-166
Freezer Paper - Roll - 30"x1100'	Room B-166
Cheesecloth - 2 bolts - 100 yds/bolt	Room B-166

CHEMICAL STORAGE, ROOM 165 (near loading dock)

Chlorox Bleach to be used as disinfectant.

GALLERY A, MECHANICAL POD TOOL ROOM

Suction cups to access artifacts in exhibit cases - 4 each in cases
(located on shelf above wall of tools)

1500 MISSISSIPPI AVENUE

85 Plastic crates; stored on shelves in the Publications area.

EMERGENCY KIT #2 (page 1 of 2) **Gallery A, Room 3-503.1**
CONTENTS

1 Apron, Laboratory
6 Aprons, Vinyl with Ties
1 box Baggies Freezer Bags, 12"x17³/₄"
1 box Baggies Freezer Bags, 18"x23³/₄"
1 cartonBags, Drawstring, Hefty Steel Sak , (30 gal.)
1 cartonBags, Drawstring, Smart Shopper, (13 gal.)
1 Camera, Disposable
2 C-clamps, 3"
1 box Cheesecloth
1 Crow Bar
1 Electrical, Outdoor Extension Cord, (100')
3 Electrical, Socket Adapters, (3 prong)
1 Freezer Wrap, Roll, (18"x250')
1 pair Gloves, Playtex Heavy Duty
2 pair Gloves, Vining Deluxe Latex
1 box Gloves, Disposable Plastic, (100/roll)
1 Hammer
1 Knife, Swiss Army, (pocket pal)
1 Knife, Utility
2 Light, Flashlight, Duracell
1 Light, Duracell Area Light
1 Light, Flashlight, Ray-O-Vac (lantern)
1 Mallet, Rubber
1 lb. Nails, 6d, Common 2"
1 lb. Nails, 10d, Common 3"
1 Pail, Rubbermaid
1 box Paper, Blotting
1 roll Paper, Bond, (to cover work surface)
1 Pliers, Diagonal Cutting , 8"
1 Pliers, Slip Joint , 8"
1 Pull Chain Current Tap for Lamp Socket
10 Rescubes
2 Scissors
1 Screwdriver, 4" Slotted
1 Screwdriver, 4" Phillips
1 Sponge, Miracle Hydra Professional, (polyester base)
1 Sponge, Professional Industrial
3 Sponge, Soot Removal
1 roll Tape, Filament
1 roll Tape, Masking, (1"x60yds.)
1 Tape Rule, 30'
1 roll Tape, Scotch #33 Electrical , (1/2"x200")
2 rolls Tape, 3M Window Film Mounting , (1/2"x500")
2 rolls Towels, Hi-Dri Paper
1 Trash Can, Rubbermaid Roughneck, (30 gal.)
1 spool Twine, Cotton
2 pkgs Twine, Nylon, (282')
3 rolls Plastic Sheeting

EMERGENCY KIT #2 (page 2 of 2) **Gallery A, Room 3-505.3F**

1 tool box Tools to access artifacts in exhibit cases
 screwdriver with assorted tips
 socket wrench
 hex wrenches
 keys for cases with locks

NOTE: Additional recovery supplies are stored in the following rooms

PAPER CONSERVATION LAB ROOM 108

Batteries, D & 6V for the flashlight and lantern
Moisture meter

CONSERVATION SUPPLIES STORAGE

Newsprint - 1000 sheets - 24"x35"	Room B-113
Blotter - 200 sheets - 19"x24"	Room B-113 & B-166
Polyethylene Sheeting - Rolls	Room B-166
Freezer Paper - Roll - 30"x1100'	Room B-166
Cheesecloth - 2 bolts - 100 yds/bolt	Room B-166

CHEMICAL STORAGE, ROOM 165 (near loading dock)

Chlorox Bleach to be used as disinfectant.

GALLERY A, MECHANICAL POD TOOL ROOM

Suction cups to access artifacts in exhibit cases - 4 each in cases
(located on shelf above wall of tools)

1500 MISSISSIPPI AVENUE

85 Plastic crates; stored on shelves in the Publications area.

APPENDIX 2
SUPPLIES/EQUIPMENT - LOCATIONS AND VENDORS

ART SORB

Fuji-Silysia
1000 Park Forty Plaza Suite 290
Durham, NC 27713
(800) 795-9742
(919) 484-4158
(919) 544-5090

BLOTTING PAPER (specify white)

Conservation Lab ext. 3384, 3383, 3381, or 3385

Uni-Source
9001 Wyoming Avenue
Brooklyn Park, MN 55414
(763) 488-7200

University Products
517 Main Street
PO Box 101
Holyoak, MA 01041-0101
(800) 628-1912

BOOK TRUCKS

Processing – 3365
Reference – 3300

Barrett's Moving Company
7100 Washington Avenue S
Eden Prairie, MN 55344
(952) 944-6550
(952) 828-7909
contact: Laura Langer

Bester Brothers
260 Hardman Avenue S
South St. Paul, MN 55075
(651) 451-1018

BOXES (knocked down B-cases)

Dennis Meissner – 3350
Dave Peterson – 3352

University Products
517 Main Street
PO Box 101
Holyoak, MA 01041-0101
(800) 628-1912

Western Container Company
500 North 3rd Street
Minneapolis, MN 55401
(612) 338-2413
(non-archival)

BUBBLE WRAP

UHaul
883 University Avenue W
St. Paul, MN 55104
(651) 227-9509

BUCKETS, SPONGES, MOPS, BROOMS

Emergency Response Kits: Room 113, Level B
Room 3-505, 3F, Gallery A

See: **HARDWARE STORES**

CAMERA, 35mm w/flash

Photo Lab
Contact: Eric Mortenson – 3321
Exhibits Department
Contact: Karen Johnson – 7-3368
Information Office
Contact: 3000
Museum Collections Department
Contact:

CAMERA, Digital

Conservation Department
Contact: Tom Braun – 3382

CHEESE CLOTH

Paper Conservation Lab – 3384
Textile Conservation Lab – 3385
Conservation Supplies Storage, Room 113
Central Supply

Hancock Fabrics
1135 Larpenteur Avenue W
Roseville, MN 55113
(651) 488-6758

Rubenstein & Ziff
1055 E 79th Street
Bloomington, MN 55420
(952) 854-4417

DEHUMIDIFIER, Portable (not available from Plant Management)

Conservation Supplies storage, Room 113

DryTech, Inc.
2500 Cleveland Avenue N
PO Box 120942
St. Paul, MN 55112
(651) 631-8419

Grainger, Inc
4444 Round Lake Rd W
Arden Hills, MN 55112
(763) 536-7761

DETERGENT

Conservation Labs – 3384, 3383, 3381, or 3385

ORVUS Detergent – ½ gallon tubs (Ask for equine department)

PetSmart
8460 Tamarack Village
Woodbury, MN 55125
(651) 702-9779

PetSmart
14290 Plymouth Ave
Burnsville, MN 55337-5785
(952) 898-4400

DISINFECTANT (Lysol, bleach)

Emergency Response Kits: Room 113, Level B
Room 3-505.3F, Gallery A

Target
1300 University Avenue W
St. Paul, MN 55104
(651) 642-1146

ENVIRONMENTAL MONITORING EQUIPMENT

Objects Conservation Lab – 3381
Paper Conservation Lab – 3384
Outreach Office – 3465

Herzog Wheeler & Associates
2183 Summit Avenue
St. Paul, MN 55105
(651) 647-1035

ETHYL ALCOHOL

Conservation Labs - 3384, 3383, 3381, or 3385

BME Lab Store
2459 University Avenue
St. Paul, MN 55114
(651) 646-5339

Baxter (Mallinckrodt Chemical)
Chemicals Division
16305 Swingley Ridge Drive
Chesterfield, MO 63017
(800) 582-2537 ext. 4149
contact: Ken Dybdal

Brenntag Great lake
2130 Energy Park Drive
St Paul, MN 55108
(651) 645-9224
(651) 645-9452—FAX

Fisher Scientific
1600 W Glenlake Avenue
Itaska, IL 60143
(800) 766-7000

EXTENSION CORDS

Emergency Response Kits:Room 113, Level B
Room 3-505.3F, Gallery A
Conservation Labs - 3384, 3383, 3381, or 3385
Plant Management – 6-6800
Microfilm Lab
Contact: Steve Cunat – 3395

See: **HARDWARE STORES**

FANS

Conservation Labs - 3384, 3383, 3381, or 3385
Photo Lab – 3320
Processing – 3365

DryTech, Inc.
2500 Cleveland Avenue N
PO Box 120942
St. Paul, MN 55112
(651) 631-8419

United Rental
1396 Rice Street
St. Paul, MN 55117
(651) 488-7277

United Rentals
1380 County Road C W
Roseville, MN 55113
(651) 633-8171

FIBERGLASS SCREENING

See: **HARDWARE STORES**

FORK-LIFT

History Center Stockroom
Contact: Wayne Weldon – 6-2194
Exhibits Department
Contact: Karen Johnson – 3363
Rich Rummel – 3054
1500 Mississippi Stockroom
Contact: Bill Weldon – 6-6877

FREEZER

Room 164: 23 ft³ chest freezer
Contact: Paul Storch – 3381
Contac: Tom Braun – 3382

FREEZER PAPER

Emergency Response Kits: Room 113, Level B
Room 3-505.3F, Gallery A

Van Paper Supply
2107 Stuart Street
St. Paul, MN 55116
(651) 690-1751
contact: Mark Van, Manager

GENERATORS

Sears
425 Rice Street
St. Paul, MN 55103
(651) 291-4209

Seven Corners Ace Hardware
216 W 7th Street
St. Paul, MN 55102
(651) 224-4859

See: **RENTAL COMPANIES, HARDWARE STORES**

HARDWARE STORES

Seven Corners Ace Hardware
216 W 7th Street
St. Paul, MN 55102
(651) 224-4859

Rice Street - Do It Best Hardware
1110 Rice Street
St. Paul, MN 55117
(651) 488-4064

HOSES

Objects Conservation Lab – 3381
Conservation Supplies Storage – Room 113
Plant Management – 6-6800

MILK CRATES, Plastic

1500 Mississippi
Contact: Bill Weldon – 6-6877
Jay Erickson – 7-8258

Schroeder Milk & Ice Cream Co. (will loan, no fee)
2080 Rice Street
St. Paul, MN 55113
Contact: Bob Banken – 651-855-6472
After hours: 612-336-1519

Menards
1441 Robert Street S
West St Paul, MN 55118
(651) 457-2609

MUSLIN

Textile Conservation Lab – 3385

Hancock Fabrics
1135 Larpenteur Avenue W
Roseville, MN 55113
(651) 488-6758

Jo-Ann Fabrics
1540 University Avenue
St. Paul, MN 55104
(651) 645-6591

Rubenstein & Ziff
1055 E 79th Street
Bloomington, MN 55420
(952) 854-4417

NEWSPRINT, Unprinted

Paper or Book Conservation Labs – 3384, 3383

Uni-Source
9001 Wyoming Avenue
Brooklyn Park, MN 55414
(763) 488-7200

PALLETS

History Center Stockroom
Contact: Wayne Weldon – 6-2194
1500 Mississippi Stockroom
Contact: Bill Weldon – 6-6877
Plant Management – 6-6800

Tilsner Carton Co.
162 York Ave
St Paul, MN 55117
(651) 227-8261

PAPER TOWELS

Stocked at History Center
Emergency Response Kits: Room 113, Level B
Room 3-505.3F, Gallery A

PHOTO DRYERS

SaltHill Forced Air Print Dryer, Room B-137
Ilford 2150 RC Print Processor, Room B-137
King Concept Image Forced Air Film Dryer, Room B-140.5

Photos, Inc.
2639 Minnehaha Avenue
Minneapolis, MN 55406
(612) 721-2601

West Photo
21 University Avenue NE
Minneapolis, MN 55413
(612) 379-2321

PHOTO FLO, WETTING AGENT, KODAK

Photo Lab
Contact: Eric Mortenson – 3321 or 3320

PLASTIC BAGS, Garbage

Stocked at History Center
Emergency Response Kits: Room 113, Level B
Room 3-505.3F, Gallery A

See: **HARDWARE STORES**

PLASTIC SHEETING

Emergency Response Kits: Room 113, Level B
Room 3-505.3F, Gallery A
Conservation Labs - 3384, 3383, 3381, or 3385

See: **HARDWARE STORES; WOOD, Lumber**

POLYESTER FILM, Mylar

Book and Paper Conservation Labs – 3384, 3383

Aeromat Plastics
801 E. Cliff Rd.
Suite 104
P.O. Box 1157
Burnsville, MN 55337
(952) 890-4697
Contact: Wayne Ferris

Light Impressions
PO Box 940
439 Monroe Avenue
Rochester, NY 14603-0940
(800) 828-6216
(800) 828-5539—FAX

University Products
517 Main Street
PO Box 101
Holyoak, MA 01041-0101
(800) 628-1912

PSYCHROMETERS

Conservation Labs - 3384, 3383, 3381, or 3385
Conservation Outreach Kits – 3465, 3388

Cole Parmer
625 E. Bunker Court
Vernon Hills, IL 60061
(800) 323-4340
(847) 549-7600

Herzog Wheeler & Associates
2183 Summit Avenue
St Paul, MN 55105
(651) 647-1035

Weatherama Weather Instruments
7395 162nd Street W
Rosemount, MN 55068
(952) 432-4315

PUMPS, for removing water

Plant Management

Contact: Dave Dahlin – 7-5229 or 649-6077 (beeper)

St. Paul Fire Department
(call 911 and be transferred to chief on duty)

See: **RENTAL COMPANIES**

RAGS, COTTON

Objects Conservation Lab – 3381
Conservation Supplies Storage, Room 113

Home Depot
3220 Denmark Avenue
St Paul, MN 55121
(651) 452-2323

Menards
1441 Robert Street S
West St Paul, MN 55118
(651) 457-2609

RENTAL COMPANIES

Reddy Rents
4411 Hiawatha Avenue
Minneapolis, MN 55406
(612) 722-9516

United Rental
1396 Rice Street
Roseville, MN 55117
(651) 488-7277

United Rentals
1380 County Road C W
Roseville, MN 55113
(651) 633-8171

RUBBER GLOVES

Conservation Labs - 3384, 3383, 3381, 3382, or 3385
Emergency Response Kits: Room 113, Level B
Room 3-505.3F, Gallery A

See: **HARDWARE STORES**

SILICA GEL

Objects Conservation Lab – 3381 or 3382

Baxter (Mallinckrodt Chemical)
Chemicals Division
16305 Swingley Ridge Drive
Chesterfield, MO 63017
(800) 582-2537 ext. 4149
contact: Ken Dybdal

Fisher Scientific (CMI Division)
4500 Turnberry Drive
Hanover Park, DE 60102
(800) 766-7000
(630) 259-1200

Grace Davison
7500 Grace Drive
Columbia, MD 21044
1-800-874-0686 (will automatically be directed to the Minnesota representative)
<http://www.gracedavison.com/products/silgelov.htm>

SOOT REMOVAL SPONGES

Falconer's Restoration Services
1229 E Lake Street
Minneapolis, MN 55407
(612) 721-5151

The Gonzo Corporation
35 North Street
P.O. Box 491
Canton, MA 02021-0491
(781) 828-7779
(800) 221-0061
(781) 828-8076—FAX
www.gonzocorp.com

Twin City Cleaning
2143 Division Street N
North St Paul, MN 55109
(651) 777-1524

TABLES WORK SPACE/PORTABLE

Photo Lab surface workspace – 3320
Collections Department – 3254

TERRY TOWELING

Textile Conservation Lab – 3385

Hancock Fabrics
1135 Larpenteur Avenue W
Roseville, MN 55113
(651) 488-6758

Rubenstein & Ziff
1055 E 79th Street
Bloomington, MN 55420
(952) 854-4417

TRAYS, WET SINKS

Conservation Photo Lab
Contact: Eric Mortenson – 3321 or 3320

West Photo
21 University Avenue NE
Minneapolis, MN 55413
(612) 379-2321

WET-DRY VACUUMS

Objects Conservation Lab – 3381 or 3382
Textile Conservation Lab – 3385
Microfilm Lab – 3391

See: **RENTAL COMPANIES**

WOOD, Lumber

Menards
1441 S Robert Street
West St. Paul, MN 55118
(651) 457-2609

APPENDIX 3
LIST OF SERVICES AND OUTSIDE EXPERTISE

ART MOVERS

Barrett's Moving Company
7100 Washington Avenue S
Eden Prairie, MN 55344
(952) 944-6550
(952) 828-7909
contact: Laura Langer

Schaffer Fine Art Services
550 Vandalia Street
St Paul, MN 55114
(651) 645-0488
contact: Charles Schaffer, Fine Arts Preparator
c.schaffer@black-hole.com

AUDIO-TAPE DUPLICATION

Precision Powerhouse
911 2nd Street S
Minneapolis, MN 55415
(612) 333-9111
(612) 332-9200—FAX
www.powerhouse.com

The Media Workshop, Inc.
1700 Lexington Avenue
Roseville, MN 55113
(651) 487-9877
www.mediaworkshopmn.com

BOARDING-UP SERVICES

Department of Administration, Plan Management
-during working hours contact: Karen Nichols - 3006
-after hours contact: Capitol Security – 6-6741

Giertsen Company
2010 E. Center Circle, Suite 400
Plymouth, MN 55441
763.277.4406
763.546.1300 (24 hour #)
www.giertsenco.com

Harmon Glass
510 University Avenue W
St Paul, MN 55103
(651) 227-8011

BOOK CONSERVATORS

Mary Britton-Clouse
Book & Paper Artifacts
2023 Lowry Avenue
Minneapolis, MN 55411
612-521-9921

Greg Campbell
Campbell-Logan Bindery
212 N. 2nd Street
Minneapolis, MN 55401
612-332-1313

Sheila Hague
1491 West Larpenteur #1
Falcon Heights, MN 55113
(651) 962-5454
smhague@stthomas.edu

Valerie D. Lien
507 Hennepin Avenue East
Minneapolis, MN 55414
612-362-0763

Dennis Ruud
4512 31st Avenue South
Minneapolis, MN 55406
612-729-7165

University Bindery
2818 Como Avenue S.E.
Minneapolis, MN 55414
612-626-0507

CLEANING SERVICES

Department of Administration, Plant Management – 651-201-2300

Giertsens Company
2010 E. Center Circle, Suite 400
Plymouth, MN 55441
763.277.4406
763.546.1300 (24 hour #)
www.giertsenco.com

Marsden Building Maintenance Company
1717 University Avenue W
St. Paul, MN 55104
(651) 641-1717

Master Building Maintenance Co.
80 County Road C W # 802
St. Paul, MN 55117
(651) 776-2340

COMPUTER DATA RECOVERY

Ontrack Data Recovery
9023 Columbine Rd.
Eden Prairie, MN 55347
952-937-1107
1-800-872-2599
www.ontrack.com

COMPUTER HARDWARE RECOVERY

Ontrack Data Recovery
9023 Columbine Rd.
Eden Prairie, MN 55347
952-937-1107
1-800-872-2599
www.ontrack.com

COPY MACHINE REPAIRS

IKON Office Solutions
2740 W 80th Street
Bloomington, MN 55431
(952) 841-4600

DEHUMIDIFICATION SERVICES, On-site

Clean Response, Inc.
480 N. Prior Ave.
St. Paul, MN 55104
(651) 646-3408

DryTech, Inc.
2500 Cleveland Avenue N
PO Box 120942
St. Paul, MN 55112
(651) 631-8419

Giertsens Company
2010 E. Center Circle, Suite 400
Plymouth, MN 55441
763.277.4406
763.546.1300 (24 hour #)
www.giertsenco.com

BMS Catastrophe, Inc.
303 Arthur Street
Fort Worth, TX 76107
(800) 433-2940
(817) 332-2770

Munters
MCS- Minneapolis District Office
1800 E. Cliff Road, Suite 8
Burnsville, MN 55337
(800) 686-8377

ELECTRONIC/ELECTRICAL EQUIPMENT RECOVERY

Restoration Technologies, Inc.
3695 Prairie Lake Court
Aurora, IL 60504
(800) 421-9290
(630) 851-1551

FREEZE DRYING

See: **VACUUM FREEZE DRYING**

FREEZER SPACE

Able Cold Storage
210 Hastings Avenue
St. Paul, MN 55071
(651) 459-6372

Atlas Cold Storage
240 Chester Street
St. Paul, MN 55107
(651) 227-0741 ext. 227
contact: Danelle Lindman, Manager

FUMIGATION

Adam's Pest Control
PO Box 233
Hammel, MN 55340
(763) 478-9810
(651) 647-1221

Guardian Pest Control
701 E. 4th Street
Duluth, MN 55805
1-800-777-4616

Plunketts Pest Control
40 NE 52nd Way
Fridley, MN 55421-1014
(651) 646-7561
www.plunketts.net

FURNITURE CONSERVATORS

Randy Bohn & Associates
PO Box 575
Hastings, MN 55033
(651) 437-1785

Mitchell K. Kohanek
7616 Banning Way
Inver Groves Heights, MN 55077
(651) 451-7829
Mitchell.kohanek@dctc.mnscu.edu

Alan Levitan
PO Box 1012
Sheperdstown, WV 25443
(304) 535-6702
(304) 535-6055—FAX
al_levitan@nps.gov

Furniture Conservation Laboratory
Society for the Preservation of New England Antiquities
185 Lyman Street
Waltham, MA 02154
(781) 891-4882

GILDED SURFACES

Kramer Gallery, Inc.
800 LaSalle Avenue Suite 240
Minneapolis, MN 55402
(612) 338-2911

Master Framers
262 East 4th Street
St. Paul, MN 55101
(651) 291-8820

GLASS SUPPLIERS

Harmon Glass
510 University Avenue W
St Paul, MN 55103
(651) 227-8011

HUMIDIFICATION

Schwab-Vollhaber-Lubratt, Inc.
4600 Churchill Street
Shoreview, MN 55126
(651) 481-8000

INDUSTRIAL HYGIENIST

Braun Intertec
245 Roselawn Ave E. #26
St Paul, MN 55117
(651)487 3245

Bay West
5 Empire Drive
St Paul, MN 55103
(651)291 0456

LIBRARY RECOVERY SPECIALISTS

Don Etherington
Etherington Conservation Center
7609 Business Park Drive
Greensboro, NC 27409
(336) 665-1317
(336) 665-1319—FAX
ecc@icibinding.com

See: **REGIONAL CONSERVATION LABS**

LOCKSMITH

Department of Administration, Plant Management
Contact: Karen Nichols – 3150

Kat-Key's Locksmiths
249 E 7th Street
St Paul, MN 55101
(651) 292-1124

MAPS/OVERSIZED PAPER CONSERVATION

Alan Thenen
2004 Summit Ave
St. Paul, MN 55105
(651) 690-5897

See: **REGIONAL CONSERVATION LABS**

MICROBIOLOGIST

Microbiology Teaching Labs
University of Minnesota Medical School
(612) 624-1980
Contact: Harriet Lievan, Director

MICROFILM READERS & READER/PRINTERS, REPAIR

Rivercity Data
212 Smith Avenue N
St. Paul, MN 55102
(651) 292-0929

MICROFILM REPROCESSING AND RECOVERY

3M - 3M Center
Building 235-2G-40
St. Paul, MN 55144
(651) 733-1110
contact: Bill Tingerthal

MOTION PICTURE FILM REPROCESSING

Delden Film Labs
9530 James Avenue S
Bloomington, MN 55431
(952) 888-8855

MOVERS

Barrett Moving & Storage Company
7100 Washington Avenue S
Eden Prairie, MN 55344
(952) 944-6550
(952) 828-7909
contact: Laura Langer

Beltmann North American
2480 Long Lake Road
Roseville, MN55113
(651) 639-2800

Bester Brothers
260 Hardman Avenue S
South St. Paul, MN 55075
(651) 451-1018

Hirte Transfer & Storage Inc.
2077 Ellis Ave # A
St Paul, MN 55114
(651) 644-5888

MUSICAL INSTRUMENTS CONSERVATION

Dick Sorenson
4123 Pillsbury Avenue S
Minneapolis, MN 55409
(612) 333-3199

MYCOLOGIST

Jim Groth
Plant Pathology Department
University of Minnesota
College of Agriculture
(612) 625-8200

OBJECT CONSERVATORS

Helen Alten
Northern States Conservation Center
2010 E Hennepin Avenue
PO Box 8081
St. Paul, MN 55108
(612) 378-9379
(651) 659-9420
(651) 644-0633—FAX
helen@collectioncare.org

Gretchen Anderson
Science Museum of Minnesota
120 W. Kellogg Blvd.
St. Paul, MN 55102
(651) 221-4764
ganderson@smm.org

Donna Haberman
Upper Midwest Conservation Center
2400 Third Avenue S
Minneapolis, MN 55404
(612) 870-3120
(612) 870-3118—FAX
umca@aol.com
www.preserveart.org

PAINTING CONSERVATORS

Jim Horns
88 Orlin Avenue SE
Minneapolis, MN 55414
(612) 379-7247

Joan Gorman, David Marquis
Upper Midwest Conservation Association
2400 Third Avenue S
Minneapolis, MN 55404
(612) 870-3120
(612) 870-3118—FAX
umca@aol.com
www.preserveart.org

See: **REGIONAL CONSERVATION LABS**

PAPER CONSERVATORS

Mary Britton-Clouse
Book & Paper Artifacts
2023 Lowry Avenue
Minneapolis, MN 55411
612-521-9921

Elizabeth Buschor
Upper Midwest Conservation Center
2400 Third Avenue S
Minneapolis, MN 55404
(612) 870-3120
(612) 870-3118—FAX

Sheila Hague
1491 West Larpenteur #1
Falcon Heights, MN 55113
(651) 962-5454
smhague@stthomas.edu

Dennis Ruud
4512 31st Avenue South
Minneapolis, MN 55406
612-729-7165

Alan Thenen
2004 Summit Avenue
St. Paul, MN 55105
(651) 690-5897

See: **REGIONAL CONSERVATION LABS**

PEST CONTROL

See: **FUMIGATION**

PHOTOGRAPH CONSERVATORS

Thomas Edmondson
Heugh-Edmondson Conservation Services
P.O. Box 10408
Kansas City, MO 64171-0408
(816) 283-0660

Jose Orraca
9 Clark Hill Road
Sharon, CT 06069
(860) 364-6030

Paul Messier
Boston Art Conservation
60 Oak Square Avenue
Boston, MA 02135
(617) 782-7110

Christine Young
P.O. Box 60691
Nashville, TN 37206
(615) 227-0538

See: **REGIONAL CONSERVATION LABS**

PHOTOGRAPHIC PROCESSING, Color, Black & White

Linhoff Photo and Digital Imaging
4400 France Avenue S
Minneapolis, MN 55410
(952) 927-7333

Photos, Inc.
2639 Minnehaha Avenue
Minneapolis, MN 55406
(612) 721-2601

Procolor
909 Hennepin Avenue
Minneapolis, MN 55403
(612) 673-8900

REGIONAL CONSERVATION LABS

Conservation Center for Art & Historic Artifacts
264 S 23rd Street
Philadelphia, PA 19103
(215) 545-0613

Intermuseum Conservation Association
Allen Art Building
83 North Main Street
Oberlin, OH 44074-1192
(440) 775-7331

Northeast Document Conservation Center
100 Brickstone Square
Andover, MA 01810-1494
(978) 470-1010

Rocky Mountain Conservation Center
2420 S University Boulevard
Denver, CO 80208
(303) 733-2712

Midwest Art Conservation Center
Minneapolis Institute of Arts
2400 Third Avenue S
Minneapolis, MN 55404
(612) 870-3120
(612) 870-3118—FAX
umca@aol.com
www.preserveart.org

SECURITY GUARDS

Capitol Security – 651-296-6741

SMOKE-DEODORIZING

Giertsens Company
2010 E. Center Circle, Suite 400
Plymouth, MN 55441
763.277.4406
763.546.1300 (24 hour #)
www.giertsenco.com

TELEPHONES

Line Repairs – US West – 9-611
Equipment Repairs
Contact: Karen Nichols – 3150

TEXTILE CONSERVATORS

Nancy Cyr
262 Wildflower Court
Vadnais Heights, MN 55127-6161
(651) 481-0360
ncyr@che2.che.umn.edu

Rebekah Njaa
315 Morton St. W.
St. Paul, MN 55107
(651) 225-1450

Beth McLaughlin
Upper Midwest Conservation Association
Minneapolis Institute of Arts
2400 3rd Avenue South
Minneapolis, MN 55404
(612) 870-3120

Jane Hutchins
6555 Tideview Road
Sooke, BC, Canada V0S 1N0
(250) 642-3481
we034@freenet.victoria.bc.ca

TOXIC SUBSTANCES INFORMATION

Poison Control Center
(800) 222-1222

Hazardous Materials Information Hotline
(888) 673-7466

TRUCK, Refrigerator

Able Cold Storage
210 Hastings Avenue
St. Paul, MN 55071
(651) 459-6372

Ryder Truck Rental (24 hour service)
(651) 636-6900 (8 - 5 only)
(800) 327-7777 Miami Customer Service (24 Hours)
(800) 328-0085 Local (24 Hours)

VACUUM FREEZE DRYING

Clean Response, Inc.
480 N. Prior Ave.
St. Paul, MN 55104
(651) 646-3408

Giertsen Company
2010 E. Center Circle, Suite 400

Plymouth, MN 55441
763.277.4406
763.546.1300 (24 hour #)
www.giertsenco.com

American Freeze-Dry
39 Lindsay Avenue
Runnenede, NJ 08078-1732
(856) 546-0777

BMS Catastrophe, Inc
303 Arthur Street
Fort Worth, TX 76107
(800) 433-2940
(817) 332-2770

Munters
MCS- Minneapolis District Office
1800 E. Cliff Road, Suite 8
Burnsville, MN 55337
(800) 686-8377

VIDEO-TAPE DUPLICATION

Allied Vaughn, Inc.
7951 Computer Avenue S
Bloomington, MN 55435
(952) 832-3100

The Media Workshop, Inc.
1700 Lexington Avenue
Roseville, MN 55113
(651) 487-9877
www.mediaworkshopmn.com

Precision Powerhouse
911 2nd Street S
Minneapolis, MN 55415
(612) 333-9111
(612) 332-9200—FAX
contact: Dan Piepho
www.powerhouse.com

WAREHOUSES

See: **MOVER**

EMERGENCY CALL LIST FOR HISTORY CENTER

Emergency: An event that poses an *immediate threat* to people, exhibits, artifacts, or facilities.

Always Call:	Name	Office#	Home#	Pager (p) / Cell (c)#
	Capitol Security <i>AND</i>	651-296-2100		
	Karen Nichols <i>OR</i>	651-259-3150		
	Richard Miller <i>OR</i>	651-259-3152		
	David Dahlin <i>OR</i>	651-201-2325		
	Joe Bicha <i>OR</i>	651-201-2300		
	Tom Hill	651-201-2300		

If No Answer, Call For The Following Emergencies:

See Listing of Department Representatives on following page.

Event	Name	Office#	Home#	Pager (p) / Cell (c)#
Fire Pull Alarm!	<i>AND</i> call Appropriate Department Representative			<i>AND</i>
	Sherelyn Ogden	<i>OR</i> 3380		
	Paul Storch	<i>OR</i> 3381		
	Bob Herskovitz	3465		
Water	Appropriate Department Representative <i>AND</i>			
	Sherelyn Ogden	<i>OR</i> 3380		
	Paul Storch	<i>OR</i> 3381		
	Bob Herskovitz	3465		
HVAC Failure	Paul Storch	<i>OR</i> 3381		
	Sherelyn Ogden	<i>OR</i> 3380		
	Bob Herskovitz	3465		
Power Failure	Exhibits Media Representative (See Page 2) <i>AND</i> ET Representative (See Page 2)			
Vandalism in Progress	Appropriate Department Representative (See Page 2)			
Structural Accident	Appropriate Department Representative (See Page 2)			

DEPARTMENT OR WORK UNIT REPRESENTATIVES MUST ALWAYS INFORM MARKETING AND COMMUNICATIONS OF THE EVENT!

Department, Function or Work Unit	Name	Office#	Home#	Pager (p) / Cell (c)#
Cafe MN	Michelle Merkel <i>OR</i>	651-259-3030		
	Phil McNally	651-259-3034		
Collections	Marcia Anderson <i>OR</i>	651-259-3254		
	Linda McShannock <i>OR</i>	651-259-3255		
	Patrick Coleman <i>OR</i>	651-259-3245		
	Jennifer Jones	651-259-3246		
Conservation	Sherelyn Ogden <i>OR</i>	651-259-3380		
	Paul Storch <i>OR</i>	651-259-3381		
	Bob Herskovitz	651-259-3465		
ET Technical Services	Robert Garcia <i>OR</i>	651-259-3040		
	Dave Sagstetter <i>OR</i>	651-259-3049		
	Pam Videen	651-259-3045		
Exhibits: Artifacts	Frank Paraday <i>OR</i>	651-259-3053		
	Jay Erickson <i>OR</i>	651-297-8258		
	Karen Johnson	651-259-3051		
Exhibits: Media	Mike Mouw	651-259-3055		
Exhibits: Lighting	Rich Rummel	651-259-3054		
Facility Services	Karen Nichols <i>OR</i>	651-259-3150		
	Richard Miller	651-259-3152		
Finance & Administration	Michael Fox <i>OR</i>	651-259-3110		
	Chuck Irrgang	651-259-3160		
Marketing & Communications	Lory Sutton <i>OR</i>	651-259-3140		
	Marjorie Nugent <i>OR</i>	651-259-3145		
	Kathryn Grimes	651-259-3142		
MHS Press	Greg Britton <i>OR</i>	651-259-3210		
	Ann Regan	651-259-3206		
Museum & Education	Wendy Jones <i>OR</i>	651-259-3411		
	Annie Johnson <i>OR</i>	651-259-3421		
	Bill Dinon	651-259-3422		
Historic Preservation Office	Britta Bloomberg <i>OR</i>	651-259-3466		
	Thomas Cinadr <i>OR</i>	651-259-3453		
	Dennis Gimmestad	651-259-3456		
Processing	Dennis Meissner <i>OR</i>	651-259-3350		
	Monica Ralston <i>OR</i>	651-259-3360		
	Sheila Hatchell	651-259-3370		
Reference	Kathryn Otto <i>OR</i>	651-259-3310		
	Tracey Baker <i>OR</i>	651-259-3317		
	Nick Duncan	651-259-3309		
Sites Offices	Bill Keyes <i>OR</i>	651-259-3472		
	Natascha Wiener <i>OR</i>	651-259-3477		
	Jim Mattson	651-259-3473		
State Archives	Bob Horton <i>OR</i>	651-259-3240		
	Charlie Rodgers <i>OR</i>	651-259-3266		
	Shawn Rounds	651-259-3265		

1500 Mississippi	Bill Weldon	<i>OR</i>	651-296-6877		
	Jay Erickson	<i>OR</i>	651-297-8258		
	Dan Cagley		651-259-3253		

FACILITIES MANAGER AND BACK-UP

Name	Position	Office #	Home #
Karen Nichols	Facilities Manager	<u>Office #</u> 3150	<u>Home #</u>
back-up: Richard Miller	Building Services Assistant	3152	

ASSESSMENT DIRECTORS AND BACK-UPS

Name	Position	Office #	Home #
Bob Horton	Director for Library, Publications & Collections	3240	
<i>backups:</i> Dennis Meissner	Head of Collections Management	3350	
Sherelyn Ogden	Conservation Manager	3380	
Kathryn Otto	Head of Reference	3310	
Jennifer Jones	Head of Collections	3246	
<hr/>			
Chuck Irrgang	Chief Financial Officer	3160	
<i>backups:</i> Pat Gaarder	Head of Human Resources	3183	
Karen Nichols	Facilities Manager	3150	
<hr/>			
Gregory Britton	Director of the Minnesota Historical Society Press	3210	
<i>backups:</i> Ann Regan	Editor in Chief	3206	
<hr/>			
Bill Keyes	Director, Historic Sites and Museums	3472	
<i>backups:</i> Britta Bloomberg	Head of Historic Preservation	3466	
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Cassie Cramer	Director of Development	3116	
<i>backups:</i> Tricia Archbold	Program Secretary - Development	3120	
<hr/>			

ASSESSMENT TEAM LEADERS AND BACK-UPS — LEVEL B

Locations	Name	Office #	Home #
Conservation Labs, Offices and Storage Rooms 107, 111	Ann Frisina	3385	
	Sherelyn Ogden	3380	
108, 113	Bryan Johnson	3383	
	Tim Herstein	3384	
109, 112, 165 110	Paul Storch	3381	
	Tom Braun	3382	
	Ann Frisina	3383	
Conference Room 117	Karen Nichols	3150	
	Richard Miller	3152	
Information Technology Offices 118	Robert Garcia	3040	
	Dave Sagstetter	3049	
Art Storage & Work Rooms 105.5, 105.6 & 120	Brian Szott	3244	
	Sherelyn Ogden	3380	
Central Registrar 121	Nicole Delfino	3272	
	Rose Kubiatoiwicz	3271	
Artifact Collections 105.1, 105.2, 105.3, 105.4, 122.1, 123.2, 127.2, Artifact Collections Offices	Marcia Anderson	3254	
	Dan Cagley	3253	
Conservation Program Offices 131, 133, 134	Sherelyn Ogden	3380	
	Jean Moberg	3388	
Photo Labs B.143.1	Eric Mortenson	3321	
	Bill Johnson	3324	

ASSESSMENT TEAM LEADERS AND BACK-UPS — LEVEL B (continued)

Locations	Name	Office #	Home #
Photo Negative Storage B.107.1	Eric Mortenson	3321	
	Bridget White	3320	
Photo Holding 144.2	Eric Mortenson	3321	
	Diane Adams-Graf	3251	
Microfilm Labs & Storage Vault	Steve Cunat	3395	
	Eric Mortenson	3321	
A/V Collections 105.7	Diane Adams-Graf	3251	
	Tracey Baker	3317	
Mount Shop 153, 154	Frank Paraday	3053	
	Karen Johnson	3051	
Stock Room, Garage, Docks 172, 166, 162, 163	Richard Miller	3152	
	Wayne Weldon	6-2194	
Information Technology 157	Robert Garcia	3040	
	Dave Sagstetter	3049	
Collections Holding 158, 164, 169	Marcia Anderson	3254	
	Dan Cagley	3253	
Mold Treatment 167	Paul Storch	3381	
	Sherelyn Ogden	33801	
Chemical Storage 165	Tom Braun	3382	
	Paul Storch	3381	
Plant Management/Facilities Office 170	Dave Dahlin	651-201-2325	
	Richard Miller	3152	

ASSESSMENT TEAM LEADERS AND BACK-UPS — LEVEL B (continued)

Locations	Name	Office #	Home #
Plant Management Janitorial Office 121, 103.4	Richard Miller Karen Nichols	3152 3150	
Mechanical Rooms	David Dahlin beeper: Joe Bicha beeper:	651-201-2325 651-201-2300	

ASSESSMENT TEAM LEADERS AND BACK-UPS — LEVEL A

Locations	Name	Office #	Home #
Manuscripts & Archives Storage 205.1, 205.2, 205.3 Manuscripts:	Jim Fogerty Monica Ralston Dennis Meissner	3243 3360 3350	
State Archives:	Robert Horton Charlie Rodgers Cheri Thies	3240 3266 3359	
<hr/>			
Historic Preservation Office	Britta Bloomberg Tom Cinadr	6-5471 5-4197	
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Conference and Allyn K. Ford Rooms 117, 230, 232, Conf. A	Karen Nichols Richard Miller	3150 3152	
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Processing Area 240, 243, 244, & 245	Dennis Meissner Monica Ralston Sheila Hatchell	3350 3360 3370	
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Library Serials 242	Anna Haase Sheila Hatchell	3366 3370	
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Newspaper Holding 242	Brigid Shields Sue Sutliff	3316 3365	
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State Archives Offices	Shawn Rounds Charlie Rodgers	3265 3266	
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Museum Collections Stack Level A-1	Marcia Anderson Dan Cagley	3254 3253	
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Bulk Processing, 246 Manuscripts Collections:	Monica Ralston Jim Fogerty	3360 3243	
State Archives:	Robert Horton Charlie Rodgers	3240 3266	

ASSESSMENT TEAM LEADERS AND BACK-UPS — LEVEL A (continued)

Locations	Name	Office #	Home #
Records Center, 247 State Archives:	Charlie Rodgers	3266	
	Shawn Rounds	3265	
Library:	Patrick Coleman	3245	
	Bryan Johnson	3383	
Expansion Space 206	Richard Miller	3152	
	Karen Nichols	3150	

ASSESSMENT TEAM LEADERS AND BACK-UPS — LEVEL 1

Locations	Name	Office #	Home #
Auditorium & Projection Booth	Richard Miller	3152	
	Karen Nichols	3150	
<hr/>			
Gift Stores, Offices, & Storage	Meta Devine	3011	
	Mary Lofgren	3012	
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Information Desk	Merry Prose	6-6126	
	Lory Sutton	3140	
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Irvine Room, Coat Room, Public Restrooms & Staff Room	Karen Nichols	3150	
	Richard Miller	3152	
<hr/>			
Restaurant, Kitchen & Offices	Michelle Merkel	3030	
	Phil McNally	3034	

ASSESSMENT TEAM LEADERS AND BACK-UPS — LEVEL 2

Locations	Name	Office #	Home #
Education	Wendy Jones Anna Anderhagen	3411 284-4177	
Security Center 409	Pat Gaarder Karen Nichols Richard Miller	3183 3150 3152	
MHS Press	Greg Britton Ann Regan	3210 3206	
2 nd Floor Collections Department Offices, Conference Rooms & Secure Holding	Jim Fogerty Lori Williamson	3243 3253	
Library & Archives Offices, Copy Room, Reception Area	Robert Horton Lori Williamson	3240 3253	
Hubbs Microform Room & Offices	Steve Nielsen Ruth Anderson	3314 3311	
Weyerhauser Reading Room Special Use Room	Hamp Smith Tracey Baker	3319 3317	
Copy Center, Secure Holding & Overflow Holding	Nick Duncan Toni Anderson	3309 3312	
Map Storage 484	Ruth Anderson Pat Coleman	3311 3245	
Sound & Visual Collections 485, 486	Diane Adams-Graf Tracey Baker	3251 3317	
O'Brien Screening Room 481	Diane Adams-Graf Nick Duncan	3251 3309	

ASSESSMENT TEAM LEADERS AND BACK-UPS — LEVEL 2 (continued)

Locations	Name	Office #	Home #
Reference Department Offices, Information Desk, Fraternal Classroom	Kathryn Otto Toni Anderson	3310 3312	
<hr/>			
Library Stacks	Ruth Anderson	3311	
Level A-3	Nick Duncan	3309	
Others available for assignments that might consist of being an Assessment Team Leader for part of Stack Level A-3:			
Tracey Baker	3317	Steve Nielsen	3314
Patrick Coleman	3245	Brigid Shields	3316
Sheila Hatchell	3370	Hamp Smith	3319
Steve Krause	3357		
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Level A-2			
Curator's Newspaper Collection	Brigid Shields Toni Anderson	3316 3312	
Government Documents, 19 rows in NW quadrant	Sheila Hatchell Dave Ehasz	3370 3356	
Legislative Tapes, SE quadrant	Robert Horton Diane Adams-Graf Nick Duncan	3240 3251 3309	
Library Books, 11 rows in SE quadrant	Ruth Anderson Nick Duncan	3311 3309	
Manuscripts, 20 rows in NE quadrant	Monica Ralston Hamp Smith	3360 3319	
Reserve Collection	Patrick Coleman Tracey Baker	3245 3317	

ASSESSMENT TEAM LEADERS AND BACK-UPS — LEVEL 3

Locations	Name	Office #	Home #
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Exhibit Galleries:

Collections	Diane Adams-Graf	3251	
	Jim Fogerty	3243	
	Marcia Anderson	3254	
	Dan Cagley	3253	
Exhibits	Aaron Novodvorsky	3052	
	Karen Johnson	3051	
Archives	Dan Cagley	3253	
	Charlie Rodgers	3266	
	Cheri Thies	3359	

ASSESSMENT TEAM LEADERS AND BACK-UPS — LEVEL 4

Locations	Name	Office #	Home #
Director's Offices	Patti Nordquist	3106	
Development Offices	Cassie Cramer	3116	
Finance Department	Chuck Irrgang Tom Krolak	3160 3162	
Human Resources Department	Pat Gaarder Karen Marano	3183 3182	
Facilities Program	Karen Nichols Richard Miller	3150 3152	
Marketing and Communications Office	Marjorie Nugent Lory Sutton	3145 3140	
Volunteer Services	Jean Nierenhausen Pat Gaarder	3186 3183	
Historic Sites and Museums	Michael Fox Bill Keyes Dan Spock	3110 3472 3050	
Exhibits Offices, Studios & Conference Room	Dan Spock Rachel Gorka	3050 3114	
Historic Sites Division	Bill Keyes Jim Mattson	3472 3473	

RECOVERY DIRECTOR AND BACK-UPS
(contingent on affected collection or area)

Name	Position	Office #	Home #
Bob Horton	Director, Library, Publications & Collections	3240	
Bill Keyes	Director, Historic Sites and Museums	3472	
Chuck Irrgang	Chief Financial Officer.	3160	
backup:			
Sherelyn Ogden	Conservation Manager	3380	

CONSERVATORS

Name	Position	Office #	Home #
Sherelyn Ogden	Conservation Manager (Paper & Books)	3380	
<i>backups:</i>			
Bob Herskovitz	Outreach Conservator	3465	
Paul Storch	Objects Conservator	3381	
Tom Braun	Objects Conservator	3382	
Ann Frisina	Textile Conservator	3385	
Tim Herstein	Paper Assistant	3384	
Bryan Johnson	Book Assistant	3383	