



# The MMS Scope

## Minnesota Microscopy Society

Local affiliate of the **Microscopy Society of America**  
and the **Microanalysis Society**

sept 2019

### In this Issue:

#### Fall program:

Learn about the preservation and conservation of art and artifacts at a tour of the Midwest Art Conservation Center inside the Minneapolis Institute of Art.

#### Coming up in 2020:

MinnTS in March, Spring Symposium on May 1, 2020.

#### Also:

Meet your new MMS president for 2019-2020, Doug Stauffer.

MMS FALL MEETING

Thursday, October 10

### Tour of the Midwest Art Conservation Center (MACC) at the **Minneapolis Institute of Art**



MACC is an independent, non-profit regional center for the preservation and conservation of art and artifacts providing treatment, education, and training for museums, historical societies, libraries, other cultural institutions as well as public and private clients.



#### LOCATION

Minneapolis Institute of Art  
2400 3rd Ave S  
Minneapolis, MN 55404  
(See p. 3 for map and directions.)



MACC is located inside the Minneapolis Institute of Art.



#### RESERVATIONS

There is no cost for this event, but registration is required. The registration deadline is **Monday, October 7th**. Reserve your spot by sending an email to [reservations@mnmicroscopy.org](mailto:reservations@mnmicroscopy.org). Please include the first and last name of everyone you are RSVPing for. Registration information can also be found at the [MMS events page](#).

*\*MMS plans to make a donation to the MACC in support of their work.*



#### SCHEDULE

The tour will go from **3:30 to 5:00 pm**, with dinner to follow at Black Sheep Pizza (2550 Nicollet Ave, Minneapolis, MN 55404) for those who are interested.

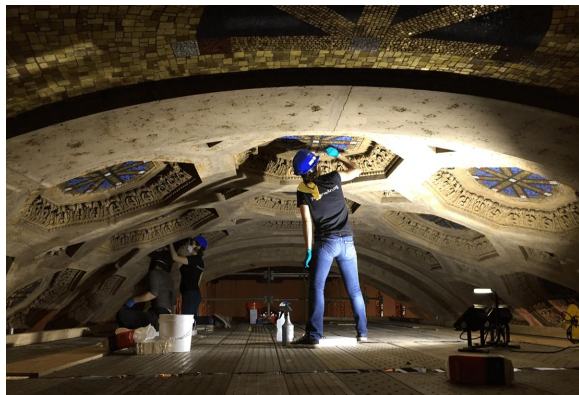
*\*Each guest will be paying for a meal and/or beverages of his or her choice.*

## MMS Fall Kickoff | continued



### ABOUT MACC

MACC is a resource for non-profit institutions, government entities, artists, corporations and individuals. Their staff of Senior Conservators, Conservators, and Associate Conservators has renowned expertise in the treatment of works of art and historic artifacts. Committed to continuing professional education, they bring the most current standards, materials, and techniques to their daily practice. Art and objects of extraordinary value are entrusted to the center each day.



Designed specifically to their specifications, MACC's advanced facilities have spaces unique and specially equipped for each of their specialties: Paintings, Paper, Objects, Textiles, and Preventive Conservation. Aside from standard work spaces, microscopes, tools and equipment, the center has UV, IR, and XRF spectral imaging capabilities, suction tables, deionized water systems, aerosol generator, a large -30°C laboratory freezer, an industrial spray booth, a photography suite, and various lifts, hoists and other safe material handling units.

For more information about MACC, visit [preserveart.org](http://preserveart.org).



### AFTER THE TOUR

*Dinner will be at 5:30 pm at Black Sheep Pizza, 2550 Nicollet Avenue, for those who would like to join us. We hope you can come!*

*Sincerely,  
MMS Board*

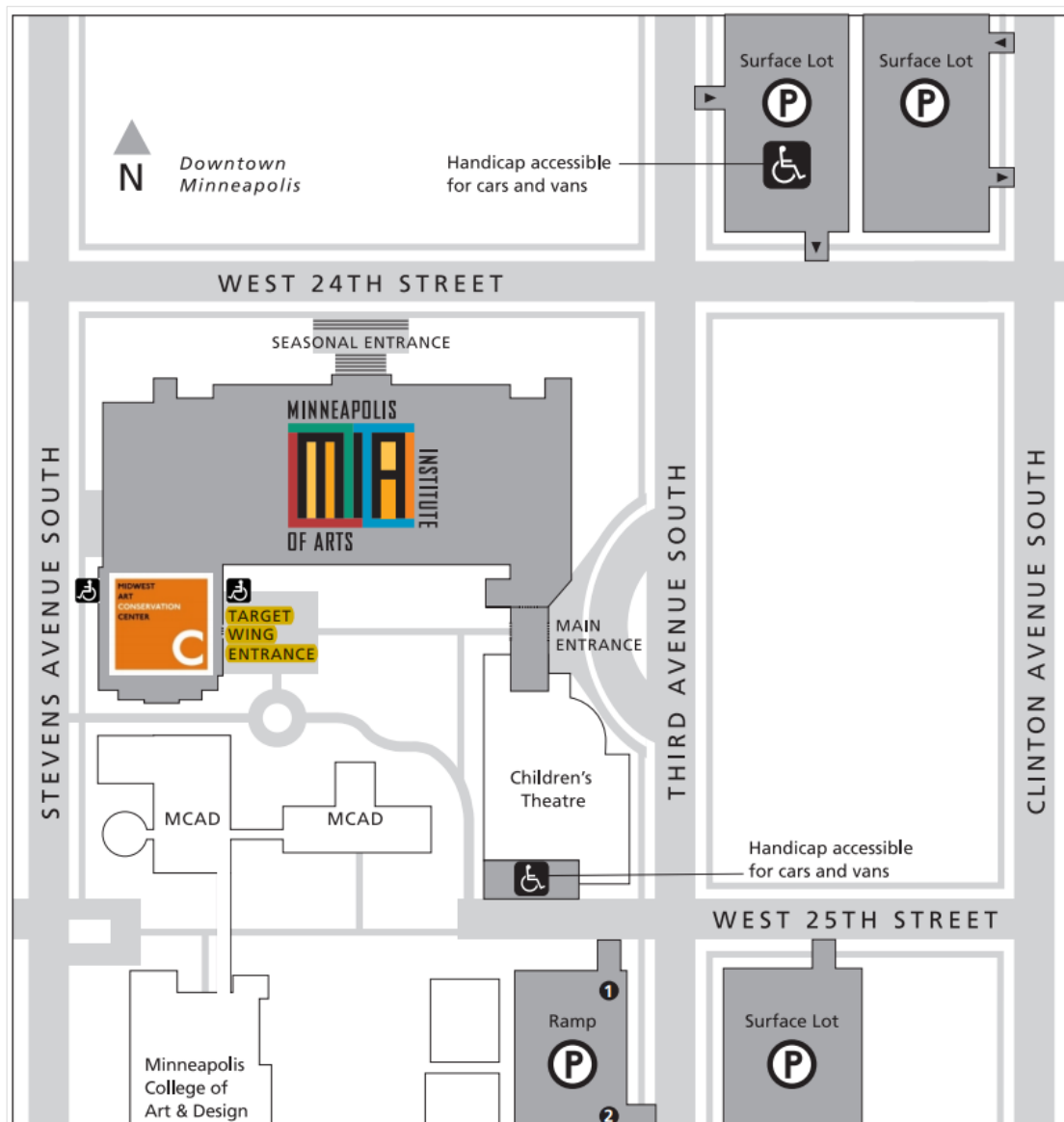
## MMS Fall Kickoff | continued



### DIRECTIONS

MACC is located inside The Minneapolis Institute of Arts (MIA) at 2400 Third Avenue South. Please enter through the Target Wing Entrance (highlighted on map below). Find a full pdf of the map [here](#).

Please gather and check-in with the Security Guard Desk there and MACC personnel will come and meet the group. Free, on-street parking is often available on Stevens Avenue. You can walk from there between MIA and MCAD to get to the 'Target Wing Entrance.' If you have any questions/problems/needs, call the MACC main phone at 612-870-3120.





## CALENDAR of EVENTS

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**10 OCT 2019**

**Fall Kickoff Event**

Midwest Art Conservation Center  
Minneapolis, Minn.  
3:30 – 7:00 p.m.



**02 NOV 2019**

**Project MICRO Microscope Day**

Minnesota Science Museum  
St. Paul, Minn.  
12:00 – 4:00 p.m.



**MAR 2020**

**18th Annual MinnTS (Minnesota Technical Symposium)**

Ecolab Schuman Campus  
Eagan, Minn.  
5:00 – 9:00 p.m.



**01 MAY 2020**

**MMS Spring Symposium**

Minnesota Science Museum  
St. Paul, Minn.  
7:30 a.m. – 4:00 p.m.





## FROM THE PRESIDENT

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*A message from MMS President Douglas Stauffer of Bruker Corp.:*

I manage the applications group for the Hysitron product line at Bruker Nano Surfaces, which is part of Bruker Corporation. My current research is focused on developing instrumentation coupled with new techniques for understanding structure and processing relationships with regards to nanomechanical performance. This often involves correlative microscopy, to determine grain size, orientation, composition, and how these affect performance. These techniques can be combined for *in situ* studies in the SEM and TEM, and currently involve the development of operando type experiments to gain insight into the role that plasticity and fracture play in the varying failure regimes under operating conditions. I joined Bruker in 2011, after receiving my Ph.D. in materials science from the University of Minnesota.



I'm looking forward to our fall meeting and the coming events that are planned for the Minnesota Microscopy Society, and appreciate this opportunity to serve as president of MMS!

Regards,  
Douglas



## FISCAL REVIEW

## MMS Cash Flow Summary 01/01/2019 through 09/08/19

**INCOME****Dues**

Corporate	2,800.00
Patron	510.00
Regular	265.00
Student	0.00
Sustaining	300.00

**Total Dues** **3,875.00**

**Interest Income** **0.69**

**MinnTS Meeting Registration** **2,010.00**

**Miscellaneous Income** **0.00**

**Spring Symposium Income** **4,455.00**

**TOTAL INCOME** **10,340.69**

**EXPENSES**

**Interest** **2.00**

**PayPal Credit Card Fees** **316.10**

**Insurance** **327.55**

**Meeting Expenses:**

MMS Regular Meeting Expenses 0.00

MinnTS Meeting Expenses 2,434.74

**Total Meeting Expenses** **2,434.74**

**Miscellaneous** **0.00**

**Newsletter** **180.00**

**Website** **467.03**

**Project Micro** **90.66**

**Spring Symposium Expense** **5,137.69**

**TOTAL EXPENSES** **8,955.77**

**OVERALL TOTAL** **1,384.92**



## MMS CORPORATE SPONSORS

Corporate Sponsors are the backbone of financial support for the Society. These members make it possible for the Society to support Project Micro and to cover many expenses of the regular meetings and the Spring Symposium. MMS gratefully acknowledges the corporate sponsorships provided by the following companies. To become a Corporate Sponsor, complete and return the MMS membership form at the end of the newsletter.

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Peter Yurek	<b>Medtronic</b>	763-514-1250

If any sponsors are missing from this list, please contact Jason Heffelfinger (763-514-1021, [jason.r.heffelfinger@medtronic.com](mailto:jason.r.heffelfinger@medtronic.com)).



## MMS SUSTAINING & PATRON MEMBERS

The Minnesota Microscopy Society would like to express sincere thanks to our Sustaining and Patron Members. These members provide financial support to the organization above the standard membership fee. This additional support makes it possible for MMS to maintain its financial well being. To become a Patron or Sustaining Member, complete and return the MMS membership form at the end of the newsletter.

### MMS Sustaining Members

Michael Coscio	Medtronic (retired)	Bill Theilacker	Medtronic, Fridley
Jeffrey Salisbury	Mayo Clinic, Rochester	Bede Willenbring	retired, New Hope
Steven Skorich	Medtronic, Brooklyn Center		

### MMS Patron Members

David Aastuen	3M Company, St. Paul	Ann Palmer	University of Minnesota, Mpls
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Mary Buckett	3M Company, St. Paul	Oanh Pham	3M Company, St. Paul
Andrew Carlson	3M Company, St. Paul	Nathaniel Rehm	3M Company, St. Paul
Madeleine Fleming	3M Company, St. Paul	Craig Smith	Honeywell, Plymouth
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### MMS Board & Officers 2019-2020

**President:** Doug Stauffer, Bruker Corp., 9625 W 76th St, Eden Prairie, MN 55344; (952) 835-6366; [douglas.stauffer@bruker.com](mailto:douglas.stauffer@bruker.com)

**Past-President:** Tony Anderson, Medtronic, 710 Medtronic Parkway, Fridley, MN 55432; (753) 505-3085; [tony.m.anderson@medtronic.com](mailto:tony.m.anderson@medtronic.com)

**President-Elect:** Anette von der Handt, University of Minnesota, 116 Church Street SE, Minneapolis, MN 55455; (612) 624-7370; [avdhandt@umn.edu](mailto:avdhandt@umn.edu)

**Secretary:** Patricia Sanft, Uponsor, 5925 148th St. West, Apple Valley, MN 55124; [patricia.sanft@uponor.com](mailto:patricia.sanft@uponor.com)

**Treasurer:** David Burleson, Ecolab, 655 Lone Oak Dr., ESC F64, Eagan, MN 55121; (651) 795-5887; [david.burleson@ecolab.com](mailto:david.burleson@ecolab.com)

**Student Representative:** Jacob Held, University of Minnesota, Minneapolis, MN 55455; [heldx123@umn.edu](mailto:heldx123@umn.edu)

**MSA Representative:** Stuart McKernan, retired, St. Paul, MN; [stuart.mckernan@gmail.com](mailto:stuart.mckernan@gmail.com)

**Project MICRO Director:** Jeff Payne, 3M Center, Bldg. 201-BS-03, St. Paul, MN 55144-1000; (651) 733-2352; [jjpayne@mmm.com](mailto:jjpayne@mmm.com)

**Corporate Liaison:** Jason Heffelfinger, Medtronic, 6700 Shingle Creek Pkwy, Brooklyn Ctr, MN 55350; (763) 514-1021; [jason.r.heffelfinger@medtronic.com](mailto:jason.r.heffelfinger@medtronic.com)

**Webmaster:** David Burleson, Ecolab, 655 Lone Oak Dr., ESC F64, Eagan, MN 55121; (651) 795-5887; [david.burleson@ecolab.com](mailto:david.burleson@ecolab.com)

**Newsletter Editor:** Maria Graff, Minneapolis, MN; [mariagraff@me.com](mailto:mariagraff@me.com)



## Other Board Members

Sam Fotsch  
Minneapolis, MN; [swfotsch@yahoo.com](mailto:swfotsch@yahoo.com)

Jeff Haggerty, Abbott Laboratories  
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Larry Hanke, Materials Evaluation and Engineering  
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Peter Yurek, Medtronic plc  
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Please visit the MMS website @ [mnmicroscopy.org/membership](http://mnmicroscopy.org/membership) and scroll down to the 'Membership Application/Information' section for an online or PDF membership form. If using the PDF form, [email](#) or snail mail the form to the Treasurer at the address below. To pay dues via credit card, please go to [mnmicroscopy.org/membership](http://mnmicroscopy.org/membership) and use the PayPal link at the bottom.

## MINNESOTA MICROSCOPY SOCIETY | MEMBER INFORMATION FORM

All microscopists are urged to support their Society at one of the membership levels offered below. Often, supervisors will support MMS memberships out of their project budget because they recognize that it is a very inexpensive way to maintain and increase the skills of their microscopists. If you have been a member over the years and recognize the value of MMS to the community of microscopists it serves, consider upgrading your membership this year to the Patron or Sustaining level. Thank you.

Dr  Mr  Mrs  Ms  First Name \_\_\_\_\_ Last Name \_\_\_\_\_

Affiliation \_\_\_\_\_ Phone (\_\_\_\_) \_\_\_\_\_

Street Address \_\_\_\_\_

City \_\_\_\_\_ State \_\_\_\_\_ ZIP \_\_\_\_\_

E-mail address \_\_\_\_\_

(Newsletter notifications will be e-mailed to the address above.)

Are you an MSA member?  MAS Member?

Student (\$5-\$9)  Basic (\$10-\$24)  Patron (\$25-\$99)  Corporate/Sustaining ( $\geq$  \$100)

Payment: Check  PayPal

(Please go to [mnmicroscopy.org/membership](http://mnmicroscopy.org/membership) to make your payment via PayPal.)

### Make checks payable to MMS and mail to our Treasurer:

David Burleson, MMS Treasurer  
846 Arlington Ave. W, Saint Paul, MN 55117  
E-mail: [treasurer@mnmicroscopy.org](mailto:treasurer@mnmicroscopy.org)