



Photo: Bob Kirst, PHLCVB



2018 ANNUAL MEETING

Sept. 23 - 26
Philadelphia, PA



Photo: Robin Miller, PHLCVB



Photo: Paul Loftland, PHLCVB

Join Us for the 2018 Annual Meeting

Hello!

Thank you for your interest in attending the Perlite Institute's 2018 Annual Meeting! Industry experts from across the globe meet at this event each year to discuss industry progress and innovations, present their research findings and plan for the future of the perlite industry. This year, we're headed to Philadelphia, Pa. to discover all that this historic city has to offer our members. We will be touring the Pennsylvania Perlite Company in Bethlehem, Pa., and hearing from industry experts from around the world. The opportunity to navigate a beautiful city immersed in history and culture while gaining valuable industry knowledge is just an added benefit!

We hope to see you in Philadelphia this September!

Travel Information

Philadelphia International Airport (PHL)

800 Essington Avenue, Philadelphia, PA 19153

(215) 937-6937

www.phl.org

The airport is located approximately 7.9 miles from the host hotel. Car rentals, public transportation and taxi services are available at the airport. The airport is a 16 minute drive to the Warwick Hotel Rittenhouse Square.

Rental Cars and Taxis

Rental car companies may be contacted through the Ground Transportation Information desks located in Baggage Claims A-East, B/C and D/E.

Taxi, limousine and shuttle services are available at Terminals A-East, B-C, D/E baggage claim areas. Terminal F ground transportation is accessible outside Terminal E baggage claim. For additional ground transportation information, call (215) 937-6958.

Avis
(215) 492-0900

www.avis.com

Budget
(800) 527-0700

www.budget.com

Enterprise
(610) 521-3700

www.enterprise.com

Hertz
(215) 492-7200

www.hertz.com



Uber and Lyft operate across the greater Philadelphia area.



Hotel Information

Host Hotel: Warwick Hotel Rittenhouse Square (*lodging and meeting location*)

220 S 17th Street, Philadelphia, PA 19103

www.warwickrittenhouse.com

Ideally situated in prestigious Rittenhouse Square and listed on the National Registry of Historic Places, the Warwick combines rich history, tradition, and original architecture with modern, edgy design. Warwick Rittenhouse is a Philadelphia hotel with a story.

The Perlite Institute is able to offer Annual Meeting attendees a single room rate of \$219 per night plus applicable taxes and fees. Room block rates are guaranteed through August 23, 2018 unless the room block is filled before the date. This rate is applicable from September 23, 2018 through September 28, 2018.

Standard King - \$219 per night plus applicable taxes and fees

To ensure you have a room for the Annual Meeting, please make your reservations now. Reservations can be made by calling the Warwick Hotel Rittenhouse Square and mentioning “**Perlite Institute Annual Meeting**” or by using the [online reservation link](#). Please select the dates you will be staying and then click on “Book Now.” Should you need assistance making your reservation, please call the hotel at 215-735-6000.

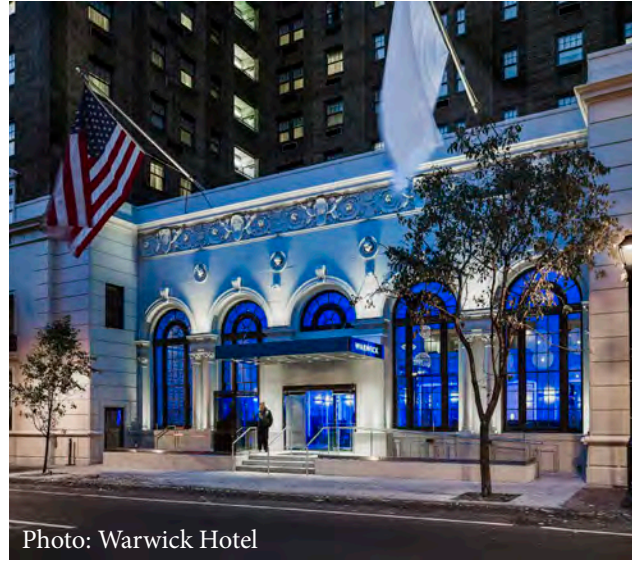


Photo: Warwick Hotel



Photo: Edward Savaria, Jr.; PHLCVB



Photo: PHLCVB



Photo: Paul Loftland; PHLCVB



Photo: Jeff Fusco; PHLCVB



Photo: Edward Savaria, Jr.; PHLCVB

2018 Annual Meeting Schedule

Sunday, September 23, 2018

0830 | 8:30 a.m.

0830 – 1130 | 8:30 a.m. – 11:30 a.m.

1130 – 1230 | 11:30 a.m. – 12:30 p.m.

1245 | 12:45 p.m.

1300 – 1700 | 1:00 p.m. – 5:00 p.m.

1830 – 2000 | 6:30 p.m. – 8:00 p.m.

Registration

Board Meeting

Lunch on Your Own

Meet in Lobby for Tour

Tour of Philadelphia

Reception



Monday, September 24, 2018

0830 | 8:30 a.m.

0900 – 0915 | 9:00 a.m. – 9:15 a.m.

0915 – 1000 | 9:15 a.m. – 10:00 a.m.



1000 – 1045 | 10:00 a.m. – 10:45 a.m.



1045 – 1100 | 10:45 a.m. – 11:00 a.m.

1100 – 1145 | 11:00 a.m. – 11:45 a.m.



Registration

Welcome and Introductions

Perlite Use for Phytoremediation PhARG® - Phyto Attached Growth Reactor

Dr. Louis Licht, President, CEO, Ecolotree Inc.

This presentation will give perspective to a potential large market with inventions that use perlite to cleanup various pollutants by plant roots.

20 Years of U.S. Perlite End Uses and Analysis of Contributing Factors to Market Fluctuations

Shawwna Bennett, Mineral Commodity Specialist, U.S. Geological Survey,

This presentation will provide a broad look at U.S. perlite end uses over 20 years, and analyze contributing factors to market fluctuations.

Break

ASTM Standards and Thermal Performance of Perlite

Dr. David Yarbrough, R&D Services, Inc., Emeritus Professor of Chemical Engineering, Tennessee Tech

The current ASTM Standards applicable to perlite will be reviewed in this presentation along with suggested improvements for the next renewal of the product specification. The thermal data that are available in the open literature and the use of the data for the calculation of heat transfer rates will be discussed. A summary of heat transfer through particulates will provide insight in the relationships between particle size, density, temperature, and thermal performance will be part of the presentation.

2018 Annual Meeting Schedule

Monday, September 24, 2018 (*continued*)

1145 – 1230 | 11:45 a.m. – 12:30 p.m.

Communications Committee - Michael Dunlavey
Brochure Task Force - Alan Kiraly

1230 – 1330 | 12:30 p.m. – 1:30 p.m.

Lunch

1330 – 1415 | 1:30 p.m. – 2:15 p.m.

Specialty Soil Mixes/Green Roofs
Chris Siciliano, Stancills, Inc.

1415 – 1500 | 2:15 p.m. – 3:00 p.m.



**Perlite in Horticultural Substrates:
What's Changing and Why?**

*Dr. Brian Jackson, Associate Professor, Dept. of Horticultural Science,
North Carolina State University*

For nearly half a century the horticultural world in the United States has used and relied on perlite in its soil-less growing mixes (substrates). Recent trends have turned to other materials instead of perlite (primarily wood chips and wood fiber) which have had significant negative impacts on many perlite manufacturers and distributors. This presentation will take an in-depth look at the past, present and future of perlite's use, threats, and potentials in horticultural production systems.

1500 – 1515 | 3:00 p.m. – 3:15 p.m.

Break

1515 – 1600 | 3:15 p.m. – 4:00 p.m.

Perlite Use in Growing Cannabis

Richard Kwesell, Co-Founder, Co-Owner, Strawberry Fields

This presentation will review the use of perlite in the production of cannabis and hemp as well as the direction of the industry and needs of its perlite input.

1600 – 1715 | 4:00 p.m. – 5:15 p.m.

Break Out Session: Ideas, Threats and Opportunities

1800 – 1930 | 6:00 p.m. – 7:30 p.m.

Reception

Tuesday, September 25, 2018

0830 | 8:30 a.m.

Meet in Lobby

0845 | 8:45 a.m.

Bus Departs for Tour of Pennsylvania Perlite Company

1030 – 1200 | 10:30 a.m. – 12:00 p.m.

Tour of Pennsylvania Perlite Company

1215 – 1315 | 12:15 p.m. – 1:15 p.m.

Lunch at Hotel Bethlehem

1315 – 1415 | 1:15 p.m. – 2:15 p.m.

Time to Explore Historic Bethlehem

1415 | 2:15 p.m.

Meet at Bus to Depart to Hotel

1600 | 4:00 p.m.

Approximate Arrival at Hotel

1730 – 1900 | 5:30 p.m. – 7:00 p.m.

Reception



2018 Annual Meeting Schedule

Wednesday, September 26, 2018

0830 | 8:30 a.m.

Registration

0900 – 0915 | 9:00 a.m. – 9:15 a.m.

Welcome and Introductions

0915 – 1000 | 9:15 a.m. – 10:00 a.m.

Baghouse Basics

*Chuck Vogelsang,
Perlite Institute Technical Adviser*

This session will provide essential information on the design and operation of baghouses.



1000 – 1045 | 10:00 a.m. – 10:45 a.m.



Screening Expanded Perlite and Ore

*Jason Bailey, Sales and Service Consultant
Midwestern Industries, Inc.*

This presentation will discuss how to improve your screening process and efficiency.

1045 – 1100 | 10:45 a.m. – 11:00 a.m.

Break

1100 – 1145 | 11:00 a.m. – 11:45 a.m.



Combating Wear and Abrasion

*James Huey, Sales Manager - Wear Specialist,
Wear Concepts, Inc.*

This presentation will discuss wear and abrasion from various material handling systems and many solutions for the different pieces of equipment ranging from airlocks, bucket elevators, transfer points and hammer mills. This presentation will also cover wear in cyclones, fans and other pneumatic conveying systems.

1145 – 1230 | 11:45 a.m. – 12:30 p.m.

Research Committee Task Groups

Horticultural/Microspheres/Wine and Filtration

1230 – 1330 | 12:30 p.m. – 1:30 p.m.

Lunch and Annual Business Meeting

1330 – 1400 | 1:30 p.m. – 2:00 p.m.

HER Update

Ken Wiener, HER Consultant, Perlite Institute

1400 – 1445 | 2:00 p.m. – 2:45 p.m.

Innovative and Sustainable Uses of Perlite in Industrial Applications

Konstantinos Mitsiou, Managing Director, Gulf Perlite, LLC

This session will provide information on insulating pre-molded pipes and slabs, sludge treatment, and oil absorbents. Topics discussed in this presentation will mainly focus on the use of perlite in the oil and gas industry.



2018 Annual Meeting Schedule

Wednesday, September 26, 2018 (*continued*)

1445 – 1530 | 2:45 p.m. – 3:30 p.m.



Looking Back and Looking Ahead

Bruce Schundler, Emeritus Perlite Industry

This presentation will give a brief review of the perlite industry—its early history, its early relationship to vermiculite markets, its many challenges and changes, and some possibilities for the future. From its earliest years producing just plaster and concrete aggregates, to the growth of the loose-fill, filter aid, and the horticultural markets, and now the growth of every thing from micro-balloons and hydroponics to kitty litter and green roofs, the industry and its markets have changed again and again. New challenges emerge, competitive products are developed, and new regulations are created. The question then is... what's next? After living and working in its past, what does an “old retired perliter” envision for the industry? What should the Perlite Institute and its members be doing that they aren't?

1530 – 1545 | 3:30 p.m. – 3:45 p.m.

Break

1545 – 1630 | 3:45 p.m. – 4:30 p.m.

Standards and Test Procedures

Anita Mulqueeny, Vice President, Infagro Natural Technologies
Chuck Vogelsang, Perlite Institute Technical Adviser

1630 – 1715 | 4:30 p.m. – 5:15 p.m.

RXN Versus Conventional Perlite Expansion

Bob Abele, General Manager, Reaction Jets, LLC.

This presentation contrasts the stark differences between the RXN process and decades old expansion. The only thing in common between the two approaches is the ore – every other aspect is different. Automatic adjustments to changes in ore flow, fine tuning of expanded ore, modular sizing to exactly fit production requirements, and a more than 50 percent reduction in energy consumption are a few of the RXN's highlights that will be presented.

1800 – 2200 | 6:00 p.m. – 10:00 p.m.

Annual Dinner and Entertainment



Places to Eat

In the hotel:

The Prime Rib

Renowned Steak, Seafood and Cocktails

For an upscale gourmet dinner, nothing beats The Prime Rib. Inspired by the iconic supper clubs straight out of 1940s Manhattan, The Prime Rib is a Philadelphia icon offering classic steaks, seafood and cocktails. Voted one of the top five romantic restaurants in the US by *Food and Wine Magazine*, The Prime Rib is imbued in elegant retro charm and is like no other steakhouse in Philadelphia. Featuring nightly live music and tuxedoed servers, The Prime Rib's elevated atmosphere is a popular draw for prominent politicians, government officials and sports icons.

Live pianist Sunday-Thursday, Pianist and Bassist Friday and Saturday, from approximately 6:30 p.m. until 10:00 p.m.

Bluestone Lane

A Different Kind of Cuisine

Inspired by the contemporary café culture of Melbourne, Australia, Bluestone Lane is known for premium coffee, healthy breakfast items like avocado toast and delectable lunch dishes in a refreshing atmosphere. Add some style to your daily routine at Bluestone Lane and experience table service in our clean, light, and minimalist setting or enjoy sidewalk alfresco dining.

A Short Distance:

Parc Restaurant Bistro & Cafe *(2 minute walk, .1 mile from the hotel)*

(215) 545-2262

www.parc-restaurant.com

Traditional bistro fare is served in a bustling setting that reminds of belle époque Paris.

Monk's Cafe *(4 minute walk, .2 mile from the hotel)*

(215) 545-7005

www.monkscafe.com

Named *Top Five Places in the World to Have a Beer* and dozens of *Best of Philly*, *Philly's Best* awards speak for Monk's Cafe's food and beer selection. Mussels, fries, craft ales and other Belgian-accented offerings dispensed in a brewpub setting.

Lacroix Restaurant at The Rittenhouse Square *(5 minute walk, .2 mile from the hotel)*

(215) 790-2533

www.lacroixrestaurant.com

Savor creative international cuisine made from fresh, seasonal ingredients at the exquisite Philadelphia restaurant at The Rittenhouse. Stately refuge with a global menu, plus famed chef's table and a tasting menu with kitchen seating.

Ristorante Pesto *(14 minute drive, 2.2 miles from the hotel)*

(215) 336-8380

www.ristorantepesto.com

Rated the number one restaurant in Philadelphia on Trip Advisor. Small family-run trattoria known for southern Italian classics and neighborhood atmosphere. BYOB.

Things to Do

Rittenhouse Square *(About 1 minute walk from hotel)*

(215) 683-0200

www.friendsofrittenhouse.org

Unplug from your life for a while and wander through beautiful Rittenhouse Park, which is directly adjacent to our hotel. The crisp air, beautiful trees and bubbling fountains provide a delightful refuge from your hectic schedule. One of Philadelphia's oldest public areas, Rittenhouse Square, was originally laid out as a public park by Philadelphia founder, William Penn, in the late 1700s and has long been the heart of the city.



Photo:
bklphoto.com; PHLCVBB

Shop Walnut Street

Less than one block from The Warwick's front door, Walnut Street is world famous for attracting shoppers from around the globe. This premiere shopping experience accommodates all budgets and styles!

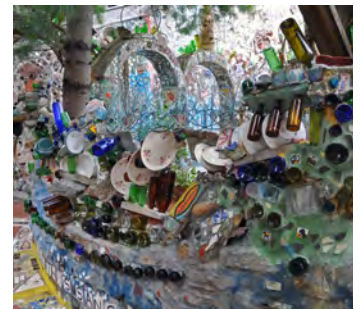


Philadelphia's Magic Gardens *(7 minute drive, 0.9 mile from hotel)*

(215) 733-0390

www.phillymagicgardens.org

Philadelphia's Magic Gardens (PMG) is a mosaicked visionary art environment, gallery and community arts center that preserves, interprets, and provides access to Isaiah Zagar's unique mosaic art environment and his public murals.



National Constitution Center *(15 minute drive, 1.9 miles from hotel)*

(215) 409-6600

www.constitutioncenter.org

The National Constitution Center in historic Philadelphia is America's most hands on history museum. Located just two blocks from the Liberty Bell and Independence Hall, it is the only museum devoted to the U.S. Constitution and the story of we, the people.



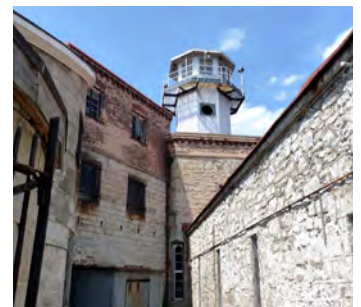
Photo: PHLCVB

Eastern State Penitentiary *(15 minute drive, 1.8 miles from hotel)*

(215) 236-3300

www.easternstate.org

Eastern State Penitentiary was once the most famous and expensive prisons in the world, but stands today in ruin, a haunting world of crumbling cellblocks and empty guard towers. Its vaulted, sky-lit cells once held many of America's most notorious criminals, including "Slick Willie" Sutton and "Scarface" Al Capone. The 2018 Perlite Institute Meeting happens to overlap one of America's scariest Halloween attractions "Terror Behind the Walls" at Eastern State Penitentiary. Visit their website for more details on this horrifying walk-through attraction.

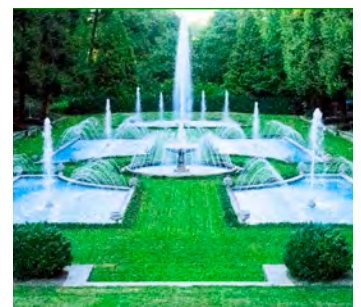


Longwood Gardens *(1 hour drive, 36 miles from hotel)*

(610) 388-1000

www.longwoodgardens.org

In 1906, industrialist Pierre du Pont purchased a small farm near Kennett Square, Pa., to save a collection of historic trees from being sold for lumber. Today, Longwood Gardens is one of the world's great horticultural displays, encompassing 1,077 acres of dazzling gardens, woodlands, meadows, fountains, 10,010-pipe Aeolian organ and 4.5-acre conservatory.



The Perlite Institute Annual Meeting

September 23-26, 2018 | Philadelphia, Pa.



Registration Form - Registration and Cancellation Deadline is September 14, 2018

Cancellations must be received in writing on or before the cancellation deadline to receive a full refund (less a \$25 service fee).

Please complete one form per attendee (duplicate as needed).

Attendee Information

Attendee Name (as it should appear on badge): _____

Business Name: _____

Street Address: _____

City: _____ State: _____ Zip: _____ Country: _____

Phone: _____ Cell: _____

Email: _____

Registration Rate

☐ Member (\$1500) ☐ Non-Member (\$1500 plus dues*) ☐ Companion (\$750**)

*Dues must be remitted only for the first registrant from a company and are based on your category of membership. Please contact the Perlite Institute to obtain a membership application, or visit perlite.org.

** Includes all meals, receptions and tours.

Meal Preference: ☐ Standard ☐ Vegetarian ☐ Gluten-free

Please check the events you plan to attend:

☐ Sunday, Sept. 23 - Tour of Philadelphia

☐ Monday, Sept. 24 - Lunch

☐ Monday, Sept. 24 - Evening Reception

☐ Tuesday, Sept. 25 - Tour of Pennsylvania Perlite Co.

☐ Tuesday, Sept. 25 - Evening Reception

☐ Wednesday, Sept. 26 - Lunch and Business Meeting

☐ Wednesday, Sept. 26 - Annual Dinner and Entertainment

Emergency Contact and Special Needs

Name of non-attending contact: _____

Phone: _____ Cell: _____

Please indicate if you have any special dietary needs or require special accommodations to fully participate:

Payment Information

AMOUNT DUE: US \$ _____

☐ Check (made payable to "The Perlite Institute" in USD) ☐ Visa ☐ Mastercard ☐ Discover ☐ Wire Transfer**

Card Number: _____ Exp. Date: ____/____ 3-Digit Security Code: _____

Cardholder Name (please print): _____

Cardholder Signature: _____

Billing Address (if different from above): _____

City: _____ State: _____ Zip: _____ Country: _____

**Please contact finance@perlite.org for wire transfer details

Return form to: The Perlite Institute, 2207 Forest Hills Drive, Harrisburg, PA 17112, (717) 238-9985 (fax) or admin@perlite.org.