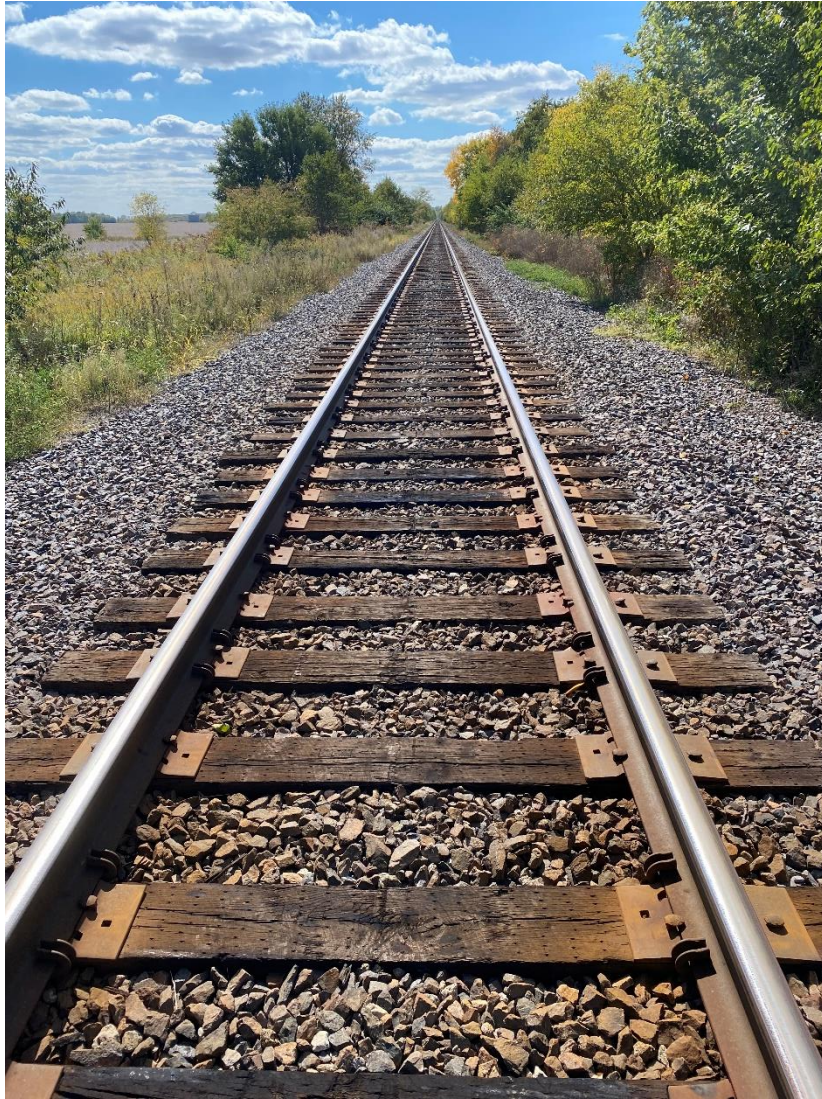


**NATIONAL RAILROAD CONTRACTOR'S ASSOCIATION
WEED CONTROL SEMINAR
January 23 – 26, 2023**



**Horizon Convention Center
401 South High Street
Muncie, IN 47305**

**Sponsored By:
Purdue University & National Railroad
Contractors Association**

2023 NRCA WEED CONTROL SEMINAR

Session I: Initial Certification

All meals held in Interurban Hall

All meetings held in Delaware 2

Monday, January 23

7:00-8:30 am	<u>Breakfast for Session I</u>	(Interurban Hall)
8:00-10:30 am	Registration	(Main lobby)
9:30-10:15	Introduction, Railroads and Weed Management Issues (Reid Smeda)	
10:15-10:45	Right-of-way Herbicides and Application Methods (Reid Smeda)	
10:45-11:00	BREAK	
11:00-11:45	Basic Herbicide Terminology (Reid Smeda)	
11:45-1:00 pm	<u>Lunch: Session I</u>	(Interurban Hall)
1:00-1:30	Application Equipment: Use and Maintenance (Reid Smeda)	
1:30-2:30	Herbicide Applicator Safety (Reid Smeda)	
2:30-2:45	BREAK	
2:45-3:45	Plant Biology and Weed Identification (Reid Smeda)	
3:45-4:00	BREAK	
4:00-5:00	Herbicides in the Environment; Storage, Transportation, & Disposal (Cheri Janssen)	
5:00-5:30	Review and Discussion (Reid Smeda)	
5:30-6:30	<u>Dinner: Session I</u>	(Interurban Hall)
6:30-7:15	Supplemental Exam study session (Reid Smeda)	

Tuesday, January 24

7:00-8:30 am	<u>Breakfast for Session I</u>	(Interurban Hall)
7:30-8:30	Registration	(Main lobby)
8:30-9:00	Review and Discussion (Reid Smeda)	
9:00-9:45	Federal and State Pesticide Laws and Regulations (Cheri Janssen)	
9:45-10:00	BREAK	

10:00-11:00	Herbicide Formulations (Cheri Janssen)	
11:00-11:30	Accurate Application of Herbicides – Off-target Movement (Reid Smeda)	
11:30-12:45 pm	<u>Lunch: Session I</u>	(Interurban Hall)
12:45-1:30	Understanding Herbicide Labels (worksheets) (Cheri Janssen)	
1:30-2:00	Weed ID Review (Reid Smeda)	
2:00-2:15	BREAK	
2:15-3:00	Application Equipment: Calibration (<u>bring calculators</u>) (worksheet) (Reid Smeda)	
3:00-3:45	Study Hall and Pre-test (bring calculators) (Reid Smeda)	
3:45-4:00	BREAK	
4:00-4:15	Review and Discussion (Reid Smeda)	
4:15-5:45	Supplemental Exams (Reid Smeda, Rita McKenzie, Mindy Shoults)	
5:45-6:45	<u>Dinner: Session I</u>	(Interurban Hall)

Wednesday, January 25

6:30-8:00 am	<u>Breakfast for Session I and II</u>	(Interurban Hall)
7:30-7:45	Meet in lobby for walk to Ivy Tech (all IN Core and ROW exam takers)	
8:00-2:00	Indiana Certification Exams at Ivy Tech (Reid Smeda to accompany)	
11:30 am-2:00 pm	<u>Lunch for Session I and II</u>	(Interurban Hall)

2023 NRCA WEED CONTROL SEMINAR

Session II: Continuing Certification

All meetings held in Delaware 2

Tuesday, January 24

4:00-5:00 pm **Certification and Recertification Status (Mindy Shoults)** (TBD)

Wednesday, January 25

6:30-8:00 am Breakfast for Session I and II (Interurban Hall)

10:00 am-1:00 pm Registration (Main lobby)

11:30 am-2:00 Lunch for Session I and II (Interurban Hall)

Moderator: (Delaware 2)

2:15-2:30 **Opening Address.** NRCA President, Mr. Don Weimann

2:30-3:20 **Johnsongrass biology and improving control.**

Joe Omielan, University of Kentucky, Lexington

Johnsongrass is a widespread, invasive species that readily spreads on roadsides and industrial areas. Understanding johnsongrass growth and reproduction of this perennial is important to develop integrated and effective, long-term control strategies.

3:20-3:30 **BREAK**

3:30-4:20 **Off-Target Herbicide Movement and Its Impact on High-Value Specialty Crops.**

Dr. Steven Meyers, Purdue University, W. Lafayette, IN.

Development of crop varieties exhibiting resistance to commonly used postemergence herbicides has increased the frequency of off-target damage to adjacent crops. Factors influencing off-target movement and methods to reduce the impact on specialty crops will be discussed.

4:20-5:10 **Invasive risk and control of Sericea lespedeza and musk thistle.**

Dr. Walt Fick, Kansas State University, Manhattan

Sericea lespedeza and musk thistle widely infest pastures and unmanaged natural areas across much of the central U.S. These species also pose formidable problems

for industrial vegetation managers. Variable methods to attack these species at a weak point in their life cycle are part of integrated weed management practices.

5:10-5:20

BREAK

5:20-6:10

Herbicide mode of action and symptomology.

Dr. Reid Smeda, University of Missouri, Columbia

Herbicides attack plants by targeting very specific pathways that generate toxins or prevent plants from making specific compounds critical for plant survival.

Understanding herbicide mode of action helps explain the symptoms expected on treated plants but also provides guidance to preclude selection of resistant weeds.

6:10

Buffet dinner and evening activities

(Interurban Hall)

Thursday, January 26

7:00-8:00 am

Breakfast

(Interurban Hall)

Moderator:

(Delaware 2)

8:00-8:50 am

Understanding the importance of pesticide registration.

Dr. Jason Ferrell, University of Florida, Gainesville

Pesticide registration is regulated through FIFRA by the EPA. This is an involved process that is both expensive and time-consuming. Understanding this process will improve pesticide user knowledge about safe mixing, use, and disposal of pesticides.

8:50-9:40

Challenges with identifying and managing invasive perennials.

Chris Evans, University of IL Urbana-Champaign

Invasive perennials increasingly replace native vegetation. These species also encroach in agricultural areas as well as transportation corridors. Proper identification is the key first step in developing management plans, but understanding the benefits and challenges of using different control techniques is critical.

9:40-9:55

BREAK

9:55-10:45

Improving safety by understanding organization of a pesticide label.

Dr. Brett Bultemeier, University of Florida, Gainesville

Pesticide labels provide crucial information for safely using pesticides while achieving intended pest management with minimal impact on other organisms or the environment. A review of the content of pesticide labels and where to find instructional information is the responsibility of all pesticide users.

10:45-11:35 am **Update on pesticide laws and regulations.**

David Scott, Office of the Indiana State Chemist, West Lafayette, IN

Updates on Federal Regulations regarding pesticide use will be provided with implications for applicators in IVM. Label changes, glyphosate re-registration and herbicide impact on surface waters and endangered species are among the topics covered. Safe use of herbicides must consider changes to the label and interpretation of those changes.

11:35-12:00 pm CCH paperwork; adjourn

12:00-1:00 pm Lunch (Interurban Hall)

12:45-2:15 pm NRCA Board of Directors business meeting (TBD)

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