## **Registration:** \$180/person

Includes reference materials; hand lens; cap; lunch on both days; supper on Aug. 18; and break refreshments.

To register, complete the attached form. Enclose check made to University of Nebraska-Lincoln. Completed registration forms and fees must be received by Aug. 5. Mail to:

**UNL Panhandle Research** and Extension Center 4502 Avenue I, Scottsbluff, NE 69361 Attn: Penny

After Aug. 5. registration is accepted if space is still available. The fee is \$220 per person.

The fee is refundable due to cancellation up to Aug. 6. No refunds issued after this date; however, substitutions are allowed.



Extension is a Division of the Institute of Agriculture and Natural Resources at the University of Nebraska-Lincoln cooperating with the Counties and the United States Department of Agriculture.

University of Nebraska-Lincoln Extension educational programs abide with the nondiscrimination policies of the University of Nebraska-Lincoln and the United States Department of Agriculture.

## **How to Get Here:**



#### Motels:

Attendees are responsible for making their own hotel reservations as early as possible. These motels are located along Highway 26:

Davs Inn 1901 21st Avenue Scottsbluff NE 308-635-3111

Super 8 Motel 2202 Delta Drive Scottsbluff NE 308-635-1600

Comfort Inn 1902 21st Avenue Scottsbluff NE 308-632-7510

**Holiday Inn Express** 1810 Frontage Road Scottsbluff NE 308-632-1000

**Hampton Inn & Suites** 301 W Hwy 26 Scottsbluff NE 308-635-5200

**Monument Inn & Suites** 1130 M St. Gering, NE 308-436-1950

PAID SCOTTSBLUFF, PERMIT No. 16

RETURN SERVICE REQUESTED

69361

Scottsbluff, NE

4502

Panhandle Research And Extension Center



Know How, Know now,



# **Topics and Presenters**

The 2012 Panhandle Advanced Cropping School for Sunflowers has been designed especially for individuals working in the sunflower crop production industry. This school is an in-depth, field-oriented, hands-on workshop designed to teach the management of sunflower production, including the diagnosis of production problems in the western Great Plains and the sunflower production regions of the Rocky Mountains.

A special emphasis will be placed on stress related problems that can cause yield reduction. Nebraska CCA (Certified Crop Advisor) credits will be applied for and can be earned upon completion of the workshop. Check with your state for reciprocity with the Nebraska certified crop advisor program.

#### **SCHEDULE:**

#### Thursday:

8:30......Registration 12:45 .....Lunch 5:30.....Steak Dinner

#### Friday:

9:00.....Sessions begin Noon.....Lunch, adjourn

#### **TOPICS:**

**KEYNOTE: Sunflower markets and Quality** (Larry Kleingartner, past executive director, National Sunflower Association)

#### Sunflower Hybrids and Growth Stages in the High Plains

(Dipak Santra, alternative crops breeding specialist, and Drew Lyon, dryland cropping systems specialist)

- Types of sunflower cultivars oil vs. confection
- Characteristics and performance of common cultivars in the area
- Emerging future traits for future improvement of hybrids
- Stages of sunflower development
- Impact of planting dates on sunflower development and yield

### Herbicide Injury to Sunflowers (Robert Wilson, Weed Specialist)

- Effect of herbicide carryover to sunflowers
- Symptoms of herbicide drift on sunflowers
- Differences between herbicide injury and other causes
- Performance of herbicides labeled for weed control in sunflowers

# **Sunflower Insects in the High Plains** (Jeff Bradshaw, Entomologist)

- Impact of planting dates and varieties on insect infestation
- Tools for monitoring sunflower insects
- Identifying common sunflower insect pests
- Recognizing the difference between insect damage and other causes

# Identifying Sunflower Diseases and Distinguishing Between Them (Bob Harveson, Plant Pathologist)

- Differences between abiotic and biotic diseases
- Methods for field scouting, and which diseases to look for at different times during the season
- Pathogen cycles and their roles in disease development and progress
- Methods for disease management

#### Irrigation and Nutrient Management in Sunflowers (Jim Schild, Extension Educator; C. Dean Yonts, Irrigation Specialist; and Gary Hergert, Soil and Nutrient Management Specialist)

- Water requirements for sunflowers
- Nitrogen requirements for sunflowers

**Sunflower Planting and Harvest Yield Loss Assessment** (John Nowatski, agricultural machine systems specialist, North Dakota State University)

Name (first and last):		
Phone:	E-mail:	_ Company name:
Address (mailing address for k	address for kits to be sent via U.S. Postal Service):	
City, State, Zip:		
Special Needs:		