

Weed Control Update

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ROCKY MOUNTAIN REGIONAL TURFGRASS ASSOCIATION

Grassy Weeds

- Crabgrass
- Foxtail
- Goosegrass
- Quackgrass
- Bromegrass
- Nimblewill
- Bentgrass*



Broadleaf Weeds

- Dandelion
- Plantain
- Prostrate spurge
- Henbit
- Ground Ivy
- Knotweed

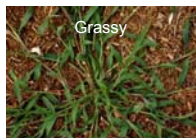


Sedges

- Parallel veins
- Triangular stems, solid, without nodes
- Three ranked leaves – arising from each side of the stem



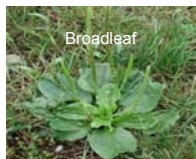
Examples: Yellow nutsedge



Grassy

Weeds

- Plant out of Place (Undesired)
- Three Types



Broadleaf



Sedge (Grass-like)

Weeds: Life Cycle

- Important to know for management strategy

Weeds are classified as:

1. Annuals
 - Summer annuals
 - Winter annuals
2. Perennials
3. Biennials

“Indicators”

- Knotweed, goosegrass, and crabgrass may indicate compacted soil
- Ground ivy and violet may indicate excessive shade



Use Weeds as “Indicators”

- Legumes (white clover, black medic, birdsfoot trefoil), sandbur, and ground ivy may indicate low nitrogen levels



Reasons for Weed Problems in Turf



- Fundamentals(cultural)
- Species selection
- Neglect
- Expectations
- Budget
- Utilize turf where it can be competitive

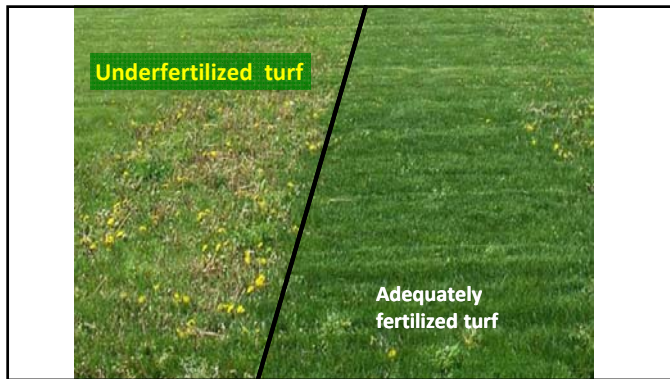
“Indicators”

- Algae and moss may indicate excess moisture
- Crabgrass and annual bluegrass may indicate low mowing heights



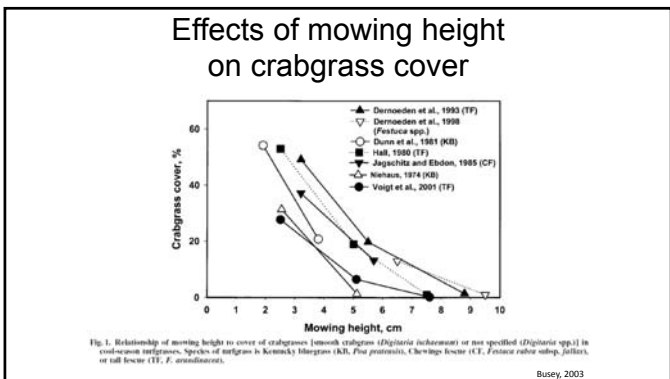
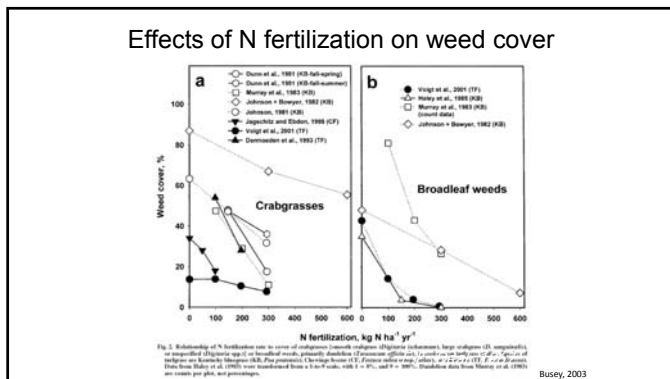
Cultural Practices for Healthy Turf

- Highest mowing height
- Frequent mowing
- Reduced Irrigation (~~overwatering~~)
- Fertilize primarily in the fall
- Manage traffic and compaction



Mowing Height and Rooting Depth

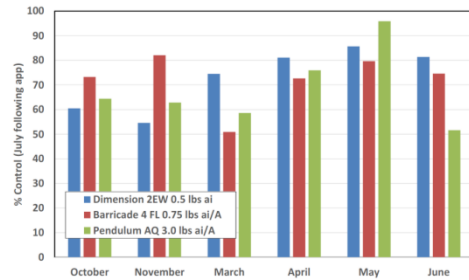
- Shorter mowing heights result in:
 - Decreased rooting
 - Higher maintenance
 - Increased pest problems



Chemical Control

- Preemergence
 - Apply before weeds germinate
 - Very effective on annual weeds
- Postemergence
 - Apply to actively growing weeds
 - Contact
 - Systemic

Crabgrass control on July 15 from PRE's applied on 6 different dates in fall/spring. (Averaged over three years, UNL 2013)

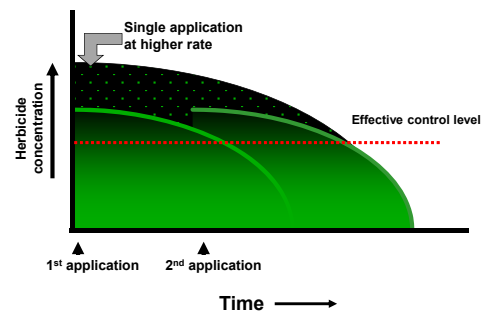


When to apply preemergence herbicides

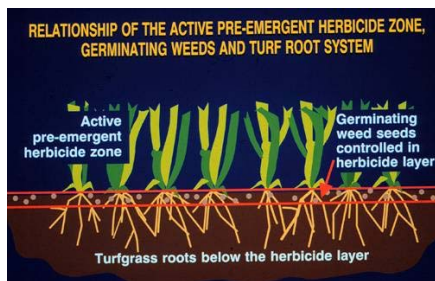


- Soil temperatures exceed 50°F
- Occurs first:
 - In landscape beds
 - Thinned turfgrass
 - Near sidewalks
 - Better to apply early than late

Split preemergence herbicide applications



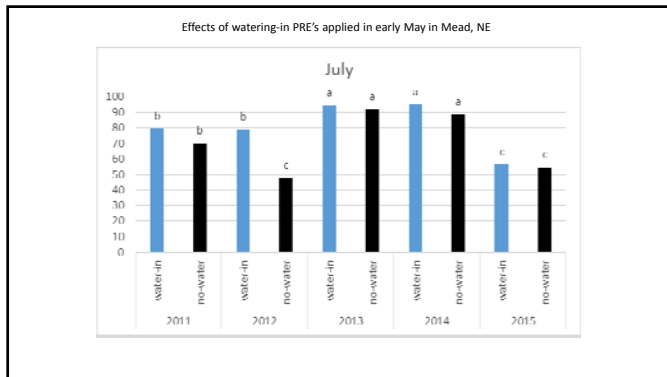
Managing Annual Weeds



Preemergence Herbicide "efficacy"



- Less than adequate control
- Timing and application rates are correct, so...?
- Reasons for "failure"
 - Poor turf conditions
 - Tough weeds/lots of them
 - High rainfall/irrigation
 - Non-Uniform application
 - Insufficient early irrigation/rainfall



When to control broadleaf weeds

- Fall is BEST
 - Controls most life cycles
 - Herbicides are more readily translocated to roots
 - Less risk for ornamental damage
 - Turf is in ideal growing conditions to allow it to fill voids
- Spring Control
 - Ester Formulations work better in cool weather but can cause damage to nearby ornamentals
 - Combination products with multiple AI's
 - Best to time a few weeks before or after flowering
 - New herbicide controls seedheads (Florasulam)
 - Late fall or early spring applications

Effective Use of Preemergence Herbicides

- Start with healthy turf
- Better to apply too early
- App timing is flexible within reason (earlier/split apps)
- Water in
- Uniform application is essential
- Label rates
- Split applications can provide extended season control

Spring application to perennial weeds



Postemergence Weed Control

- Perennials are hardy and difficult to control
- Herbicide uptake and translocation vary
- Death of the weed may be slow
- Mature weeds may not be controlled completely
- Control annuals when young
 - Hit them hard early



Fall application to perennial weeds

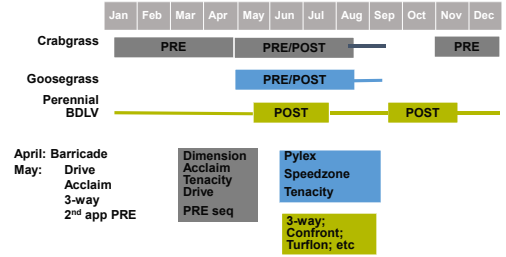


Postemergence Herbicide "Failure"

- Weeds wilt and die back but regrow
- Why?
 - Application timing
 - Weed species
 - Weed health
 - Weed age
 - Post-application management of lawn
 - Weather
 - Adjuvants



Typical cool-season grass weeds

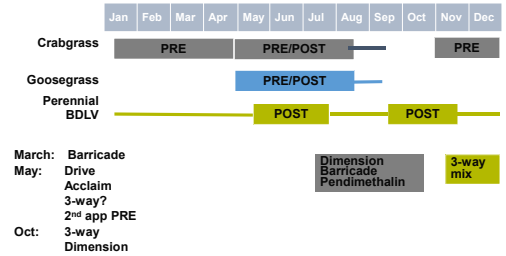


Effective Use of Postemergence Herbicides

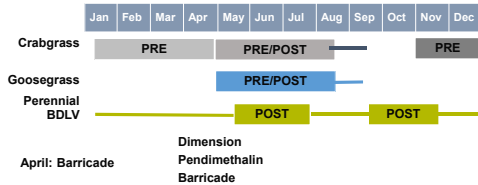
- Start with healthy turf
- Apply to actively growing weeds
- Multiple ai products (we have many options)
- Fall applications



Typical cool-season grass weeds



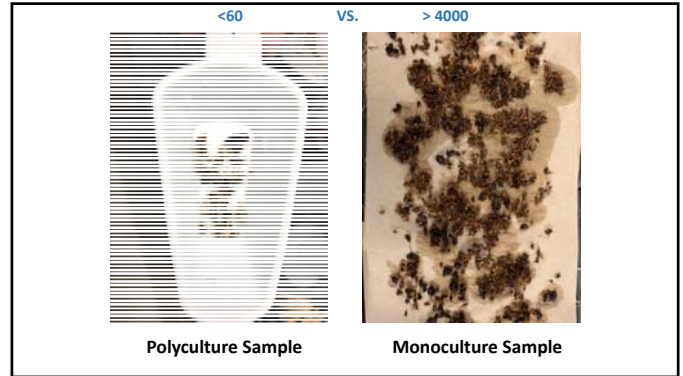
Typical cool-season grass weeds



Yellow nutsedge

- A perennial weed found in both cool- and warm-season turfgrasses
- Tolerates close mowing and competes for water and nutrients

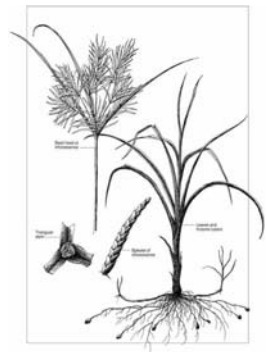




Tubers

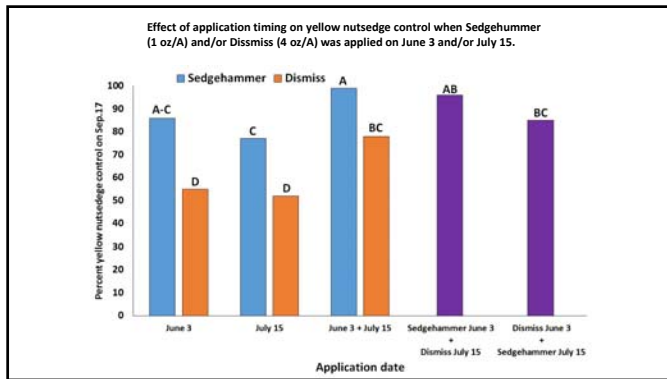
- Difficulty to control it is a result of its intensive system of underground tubers, and its tolerance to most herbicides
- Tuber production in yellow nutsedge is highly prolific

- Viable tubers may remain dormant in the soil for multiple years and may sprout repeatedly
- Results of herbicide control of yellow nutsedge are inconsistent



When to control yellow nutsedge

- As early as it was first identifiable – early June
 - Tubers are immature
 - Control tubers that start forming
 - Herbicides are more readily translocated to roots, rhizomes and tubers
- Sequential application
 - Make a second application 3 or 6 weeks after the initial application
 - Sequential application works better than single app



Yellow nutsedge control

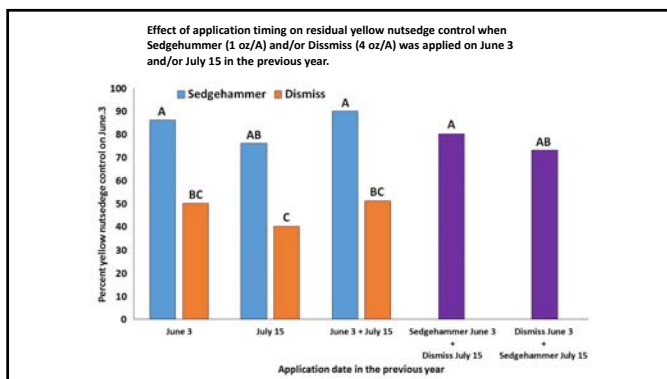
- Treat as early as it was first identifiable – early June
- Sequential application with 3 to 6 weeks interval
- Sedgehammer may work better when controlling yellow nutsedge within turf
- Herbicide Rotation
 - Prevent potential herbicide resistance
 - Apply Sedgehammer first when rotating with Dismiss



Set ourselves up to be successful

- Proper Management
 - Reduces weeds
- Reduce the number of negative factors
 - Research (study)
 - Follow labels
 - Take advantage of new chemistry
- Proper Planning and Training

Finally!! Make Educated Decisions



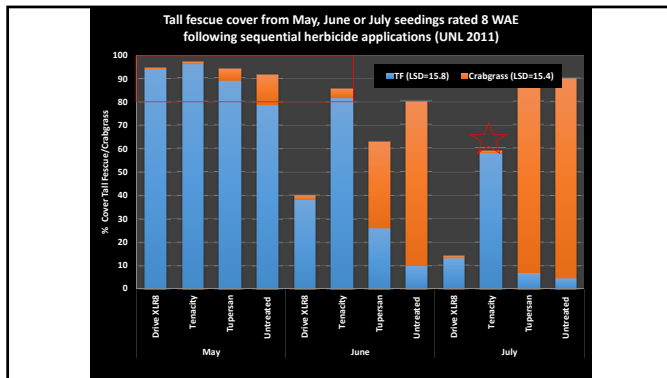
Weed Control Options in New Seedings

Start Early Be Aggressive

- Tenacity (Mesotrione)
 - PRE on bare soil
 - Post over turfed areas
 - Crab + Broadleaves + Nutsedge
- Drive (Quinclorac)
 - Anytime on TF
 - 7 days prior and Post 28 days after emergence on KBG
 - Crab + broadleaves
- SquareOne (Quinclorac+Carfentrazone)
 - Post 7 DAE
 - Crab + Broadleaves

Weed Control Options in Seedings

- Pylex (Topramezone)
 - Anytime before seeding
 - Grassy and broadleaf weeds
 - Goosegrass
- Tupersan (Siduron)
 - Before seeding
- Quicksilver (Carfentrazone)
 - Post
 - Broadleaves



Perennial Weedy Grass Control



- Tall fescue
- Quackgrass
- Windmillgrass
- Bromegrass
- Bentgrass
- Zoysiagrass
- Bermudagrass
- *Poa trivialis*

Managing Perennial Grassy Weeds

- Difficult to selectively control
- Glyphosate, followed by reseeding or sodding
- Some herbicides can selectively perennial grasses (mesotrione, topramezone)
- Learn to tolerate the different grass species



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Thank you.....