

Field bindweed

Convolvulus arvensis

Persistent, perennial vine of the morning glory family

Ranked among the top ten world's worst weeds

Distinguished from other bindweeds and morning glories by:

- Leaf shape, rounded arrowhead
- Flower size, small (1")
- Two small bracts located 1-2" below the flower

Habitat

- Orchards and vineyards
- Roadsides and ditchbanks
- Streambanks and lakeshores
- Croplands and wastelands

Flowers

- June through September
- Blooms last only one day

Seeds

- Hard, impermeable coats
- Viable 30 days after pollination
- Majority of seeds fall near the plant, however seeds can be dispersed over longer distances by water and birds

Roots

- Rhizomes and attached lateral roots can survive independently of the primary root, most in the top 12" of soil, plants can regenerate from root sections as deep as 5 ft.
- Buds may arise at any point along a lateral root
- Vertical roots comprise 1/3 of total root system extend 2-30 ft. deep

Shoots

- Shoot growth: 1st year, 18-51"
- Majority of shoots do not overwinter, however those that do can grow 70-114" during their second year

Growth and reproduction

- Lateral root growth: 15-22 ft. per year
- Reproduction primarily from rhizomes

Management

- Deplete carbohydrate reserves by continuous cultivation etc.
- Prevent vegetative spread
- Herbicides: dicamba, glyphosate, picloram, 2,4-D ester
- * apply 2,4-D when soil is wet, dicamba when dry
- * apply herbicides at or during first bloom when carb. reserves are lowest
- * applications made to mature leaves are more effective, cuticular wax is worn from abrasion and more easily penetrated than seedling cuticle

Threats

- Aggressively competes for light, nutrients and water
- Can reduce crop yields by 50-60%
- Mildly allelopathic
- Toxic to some livestock

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