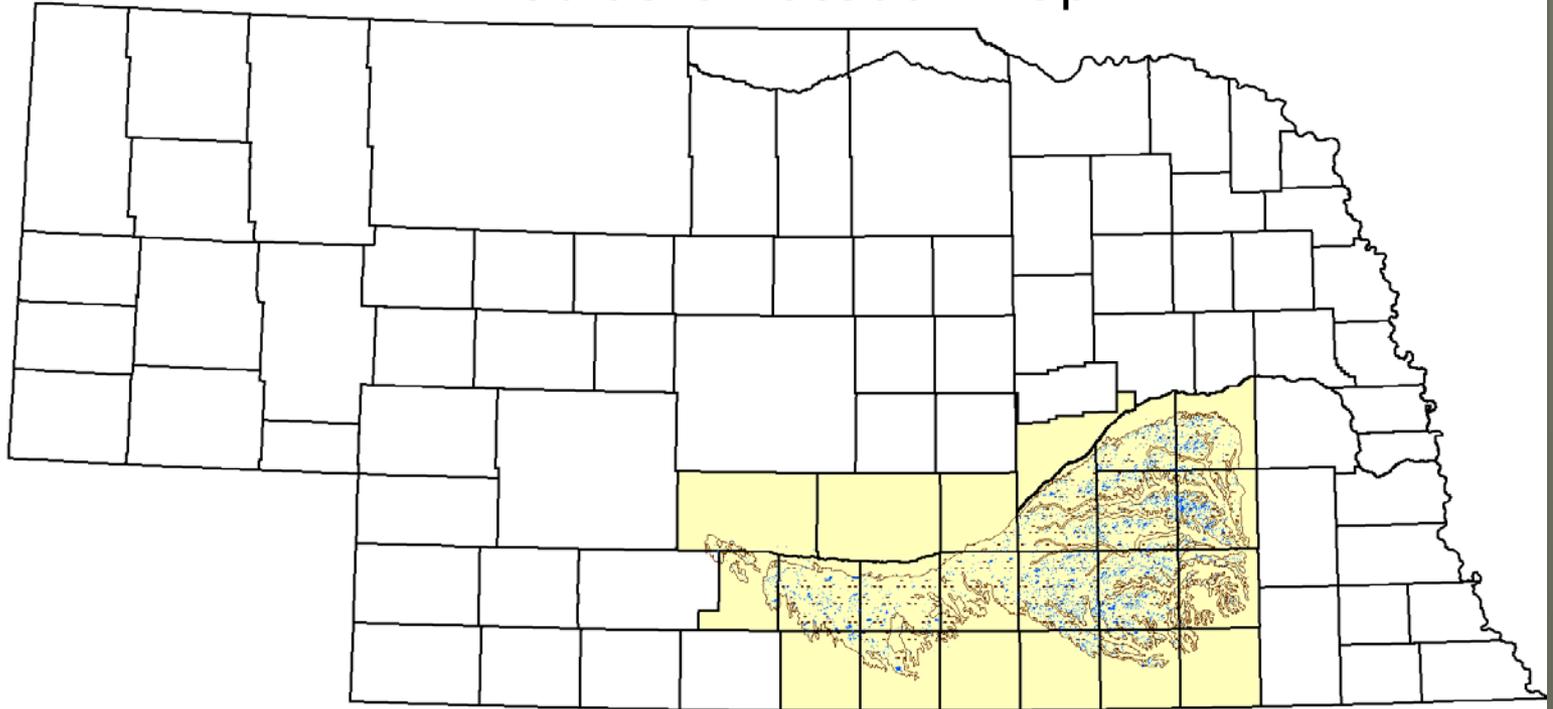


Rainwater Basin Wetland Complex



Rainwater Basin Wetland Complex

Nebraska Location Map



Rainwater Basins Wetlands

- ❖ 6,100 square miles in 21 counties
- ❖ Scattered wind scoured basins
- ❖ Basins are nearly circular depressions
- ❖ Depression areas contain a clay liner
 - ❖ Characteristic of clay soils
permeability slow or non-existent
- ❖ Water ponds for a variable period depending on climatic precipitation events & watershed area
- ❖ Results in ephemeral wetlands
 - ❖ Alternation wet (fall winter spring)
and dry cycle (summer)

Importance



- ❖ Migratory Waterfowl food requirements
 - ❖ Waste grain vs. natural vegetation
 - ❖ Management for optimal vegetation communities

Importance

- ❖ 90% mid- continent white fronted geese
- ❖ 50% mid continent mallards
- ❖ 30% mid-continent pintails
- ❖ 200,000-300,000 shorebirds/wading birds
30 different species
- ❖ 5,000,000 snow geese
- ❖ 10-15 million migrants annually
- ❖ Migration from March to May
 - ❖ competition for nutrient resources and space

Problem Statement

- ❖ How to maximize management with limited resources on (vegetation & water) public lands to meet bio-energetic needs of migratory waterfowl.
 - ❖ Lack of comprehensive management goals (site to complex scale & state/federal jurisdiction) to meet waterfowl needs on public areas.
 - ❖ Lack of explicit & standardized performance measures across partners.
 - ❖ Impediments (cross-organizational) to implement management in the field.

Problem Statement cont'd

- ◆ Need for commitment to annual habitat goals necessary to meet "our" contribution towards NAWMP goals.

Threats

- ❖ Originally nearly 12,000 historic wetlands covering 204,000 acres. Presently there are approximately 1,200 functioning wetlands remaining containing 30,000 acres
- ❖ Causes of historic wetland loss
 - ❖ Drainage of wetlands for Agriculture
 - ❖ Land leveling of Ag fields for gravity irrigation
 - ❖ Siltation due to poor conservation tillage practices
- ❖ Current Threats
 - ❖ Concentration pits & drainage ditches
 - ❖ Filling wetlands
 - ❖ Silt accumulation
 - ❖ Irrigation tailwater runoff



Threats

- ❖ Invasive Plant species (lack of disturbance, late succession)
 - ❖ Cattails
 - ❖ River Bullrush
 - ❖ Reed Canary Grass

Reed canary grass



Hybrid cattail



Causes

- USDA farm program
- Improved earth moving equipment

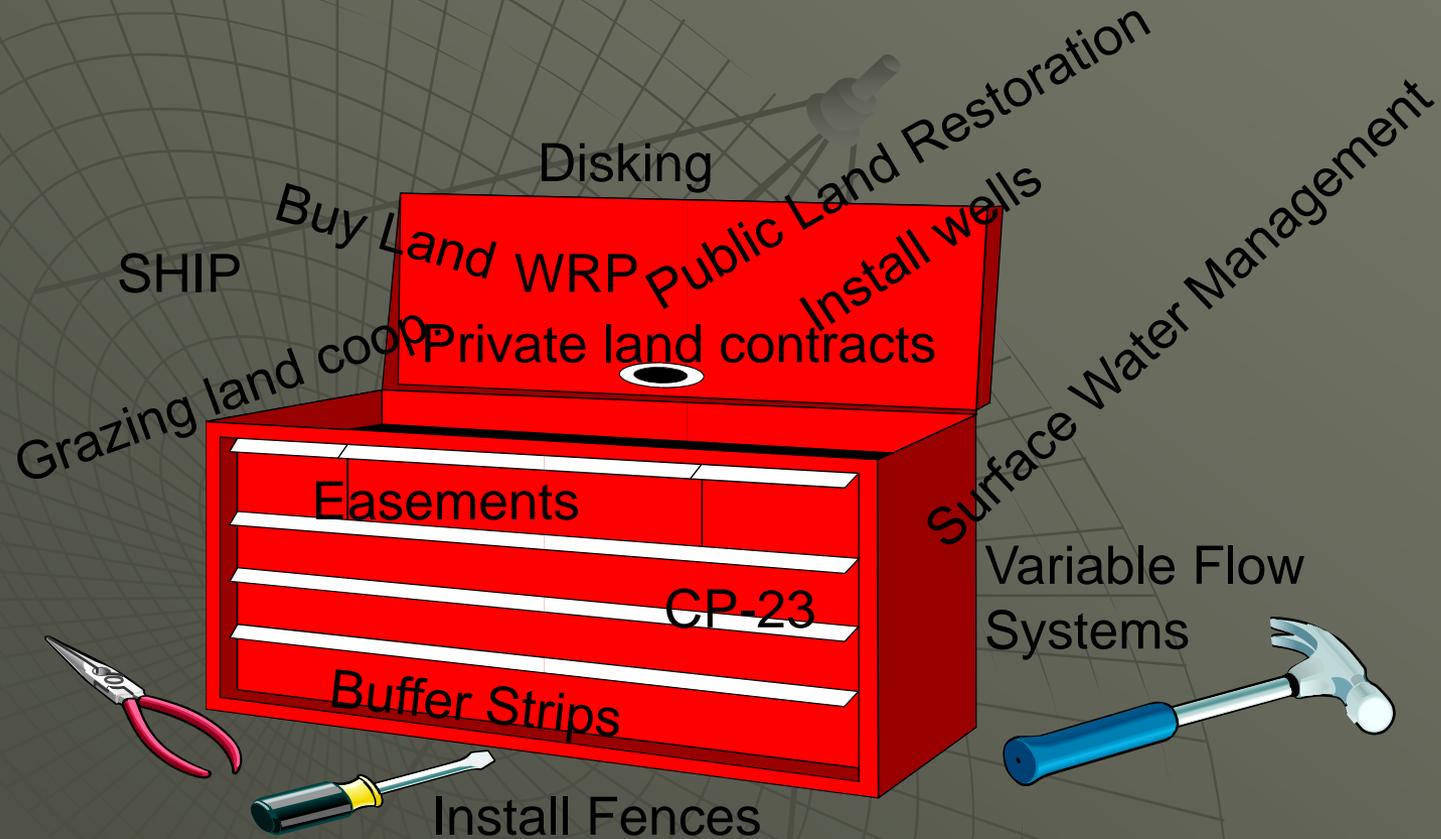
Undesired Wetland



Desired Wetland



Conservation Toolbox



Solutions



Solutions

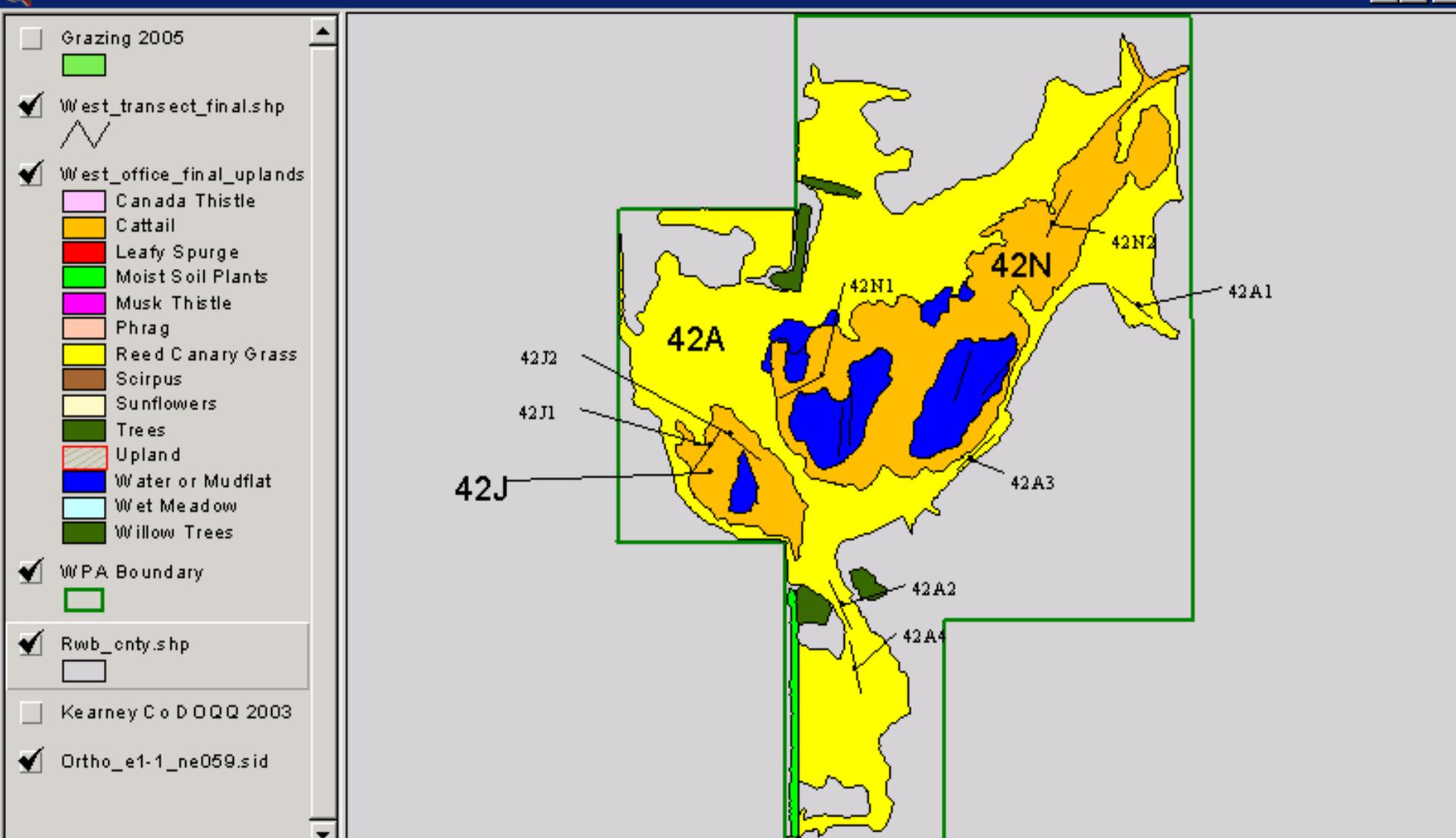


Solutions



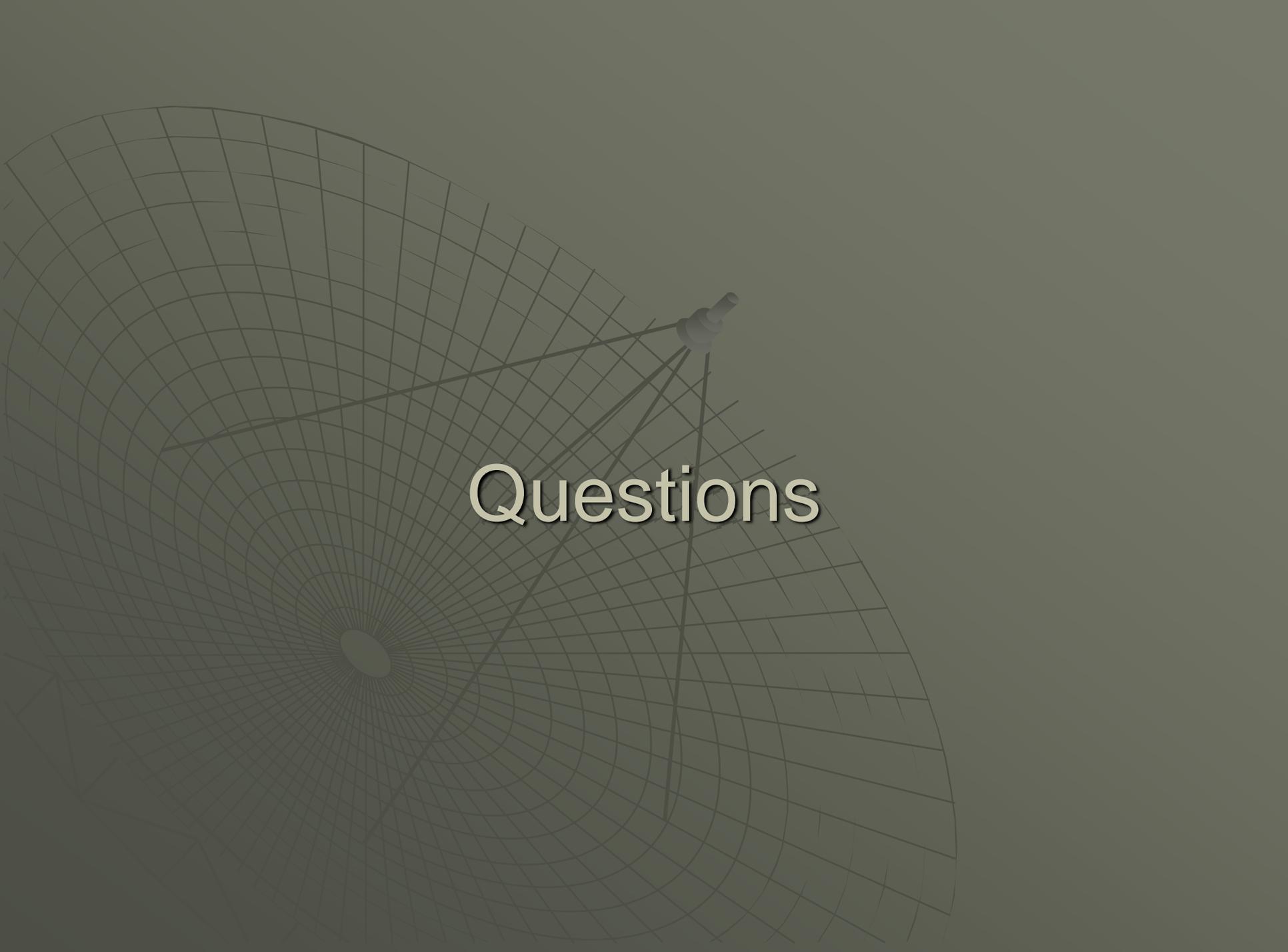


View1









Questions