Oechsner Farm -Attempts at Cultural Weed Control

Newfield, New York



Cash crops



- Corn feed, distilling and food grade
 - Wheat SWW, HRW, HRSW
- Rye milling, distilling and seed
- Buckwheat mill and seed
- Red clover seed, baleage and soil building
- Grass mixed hay horse and cattle markets
- Triticale –feed and malt

Cover crops Red clover Annual ryegrass Forage rape/Forage turnip **Buckwheat** Cereal rye Winter pea

Some thoughts about crop rotation and weed control

- Diversity of crop species
 - Key to disease and weed control
 - Nutrient demands try to vary fertility needs of crops
 - Vary tillage and planting dates to keep weeds off balance
- Bare fallow period w/smother crop to control perennial weeds
- Know thy enemy study up on weed ecology
- Plant cover crops whenever possible to compete with weeds, build and protect soil
- Mow/till weeds to prevent seed shed (keep soil weed seed bank low)
- Many little hammers approach to weed management

Year	Crop	J	F	М	Α	М	J	J	Α	S	0	N	D
1	Corn/Annual rye					Co	rn	Annual rye					
2	Buckwheat						Buo				inter rain		
3	Winter grain			ed ver									
4	Red clover												
5	Red clover								Cover c brassi				
6	Spring wheat				Spring wheat				<mark>Buc</mark> k- vheat	W gi	inter rain		
7	Winter grain		Re clo	ed ver									



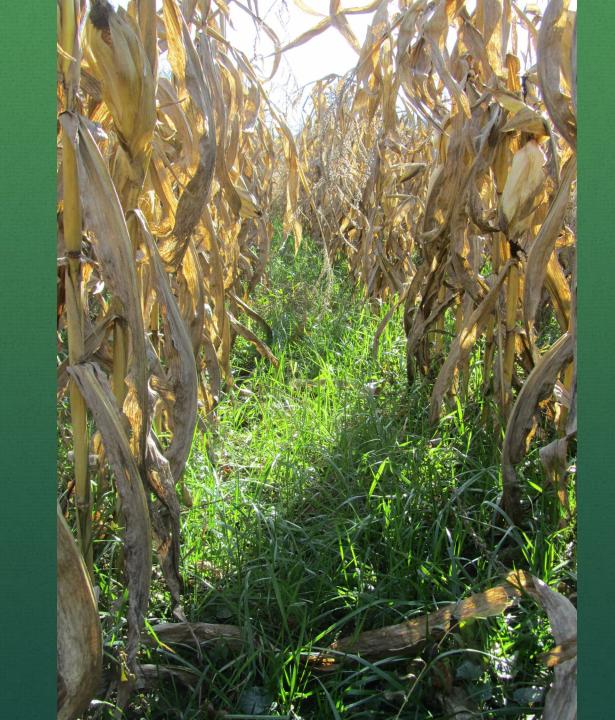
Year 1: Corn

- Heavy feeder
- Plant mid to late May
- Seed annual rye grass after last cultivation
- Provides good clover for seed predators

Second cultivation @ around canopy over – speed up and throw dirt (rocks)



Over seed annual ryegrass @ 15 lbs/acre



Year 2: Buckwheat

- Bare fallow until planting in mid-June to early July
- Very light feeder
- Lines up possible no-till
- Acts as a smother crop
- Control of tough perennial weeds
 - Quackgrass
 - Bindweed
 - Canadian thistle



No-till rye in clean fields @ 2.5-3.0 bu/acre

DEUTZ-ALLIS

Vermeer







Year 3: Winter grain

- Rye (No-till) on clean fields
- Medium feeder
- HRW/SWW on weedy fields
- Heavy feeder
- Seed early October
- Frost seed red clover

Frost seed red clover @ 18 lbs/acre





Year 4-5: Red clover

- Established by frost seeding in March into winter grain from the previous year
- Break-up plow pan
- Lets soil rest
- Fixes nitrogen
- Can stay in one to two years
- Harvest year one
- Mow and leave on field to build soil year two

First cutting baled and wrapped @ 10-20% bloom



Second growth baled or swathed and combined for seed in early fall



Yields about 100-250 lbs/acre

Year 6: Spring wheat

- Seed in late March/early April
- Clover plow down
- Heavy feeder
- Also allows time for summer tillage and/or cover crop seeding after harvest in July
- Buckwheat or cover crop cocktails
- Allows for timely planting of winter grain







Chisel plow with 22 inch ridge-till sweeps For late summer CC planting and weed control

5 inch overlap

15 inches on center







Year 7: Winter grain

- HRW, SWW or Rye
- Medium or heavy feeder
- Seed mid-late September
- Frost seed red clover

Back to corn