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THE  
RULES  
OF BIO-  
LOGICAL  
AGRICUL-  
TURE

RULE #1 Test and bal-  
ance soil

RULE #2 Use non-  
toxic, life-  
promoting fertiliz-  
ers

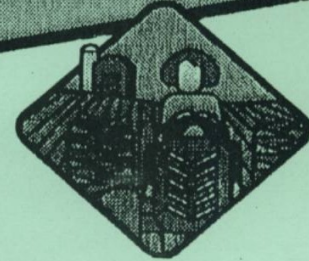
RULE #3 Use herb-  
icides and pesti-  
cides only when  
necessary

RULE #4 Use short  
rotation

RULE #5 Use tillage  
to control decay of  
organic matter and  
to control soil air  
and water

RULE #6 Feed soil  
life

# MIDWESTERN BIO-AG



## The Model Biological Farm

A SYSTEM OF FARMING WHERE THE FARMER THINKS DIFFERENTLY

- Soils:** the biological farmer's objective is to get the soil alive with earthworms and other soil life and balanced with minerals.
- Crops:** the objective is to produce a quality crop which is a complete livestock nutrient source and which results in high yields.
- Livestock:** the objective is to keep livestock comfortable, healthy, and fed high-quality feeds with health-promoting "extras".
- Biological Farming:** the objective is to work with the systems of nature to develop a farm which is environmentally sound and leaves the land, plants, and animals in a healthy, productive state for all future generations.

### SOILS

- **(The biological farmer)** understands the soil is living - alive with many organisms and balanced minerals. Wants the soil in the best possible health - knows that managing decay of organic matter, crop residues, livestock and green manures, are essential to his success - these are the feeds for soil life.
- Considers the effects on soil life - positive and negative - of all inputs and practices.
- Applies suitable products to correct soil nutrient imbalances.
- Knows that money invested to get and keep his soils in a healthy shape is money well spent.
- Questions herbicides, really questions insecticides; knows he can farm using less or none with proper crop rotations and soil health.
- Finds cultural practices that fit his land; uses tillage to manage decay and control air and water.
- Knows less tillage is best but some may be necessary.
- Knows shallow incorporation of residues is good for the soil life and speeds up decay.

### CROPS

- **(The biological farmer)** knows that the quality of crops as complete nutrient sources is as important as yield. Does not sacrifice quality for a big pile.
- Doesn't plant on dates - plants on conditions. Knows that early planting is not always the best. Any condition less than ideal at planting is unacceptable.
- Evaluates crops and equipment making sure plant stands are there and uniform.
- Studies and understands nutrients. Knows when the plants need them. Would not add more fertilizer than is needed but certainly wouldn't starve the plant.
- Fertilizes the crop for maximum health with a balance of nutrients in a form the plant can use on a continual basis.
- Uses sources of nutrients that are non-harmful to plant roots and soil life.

## CROPS, cont.

- Knows that weeds, insects, soil conditions, plant growth (roots, tops, colors) are all tools and clues to evaluate his program.
- Knows the impact of crop rotation on reducing weed and insect pressure and improving soil, soil life, and future crops.
- Does everything in his power to harvest at the correct time to maximize quality and yield.
- Provides proper storage to maintain crops as quality feeds. Includes inoculants on all fermented feeds to reduce spoilage.

## LIVESTOCK

- **(The biological farmer)** provides clean, comfortable environment to keep livestock content and promote maximum health and production.
- Feeds livestock a palatable, balanced, steady diet featuring quality home-grown feeds, fresh clean water and access to free-choice minerals.
- Knows feeds from the biological farming system are the best you can get. They are grown on healthy, alive soils with balanced, good levels of minerals.
- Knows that these feeds do not always follow the "traditional" balance numbers. The rules may change!
- Frequently checks to be sure the feeds are in balance.
- Uses the best quality additions to balance nutrient deficiencies, including protein, energy, and mineral supplements when necessary.
- Animals are not continuously fed antibiotics. Antibiotics are used as a treatment only when absolutely necessary to save the health/life of the animal.
- Animals are not injected with synthetic hormones in order to promote enhanced growth/production beyond their natural genetic ability.
- Understands and works with natural beneficial organisms within every animal.
- Feeds the extras - kelp, yeast, probiotics, digestive aids, extra vitamins - from day one.
- For cattle, feeds a ration of high-quality forages (mineral-balanced from healthy soils), fed at high rates with lower levels of grain.
- For hogs and poultry, uses a ration of high-quality grains (mineral-balanced from healthy soils) with low levels of forages.
- For breeding animals, knows that longevity is important.
- Evaluates his livestock program based on cattle appearance, health, comfort, manure, breeding efficiency, and production.
- Knows livestock must meet **all** the above characteristics to be profitable.
- Treats the livestock manure to maintain nutrients and control odors (natural phosphates, gypsum, and beneficial organisms.)
- Uses livestock manure as an important source of soil nutrients. Spreads the manure in thin, even and timely applications.

## RESULTS

- The farming system is driven by profit not just production.
- The farmer knows that to get all this working takes time. Every soil, farm, and farmer are different.
- Profit is generated more from the farmer's knowledge and management than from monetary inputs to the system.
- The farmer works on the cause of the problem - does not want to always put out brush fires (dealing with symptoms.) Knows that with biological farming the problems will continue to decrease over time.
- The farmer understands nature and works with it rather than against it - maximizes natural interactions of pests, predators, and environmental conditions to his advantage on soils, crops, and livestock.
- The farmer knows that healthy crops are not plagued by insects or diseases, and can compete with weeds under proper management - can spend less and worry less.
- The farmer knows that healthy livestock don't always get sick. They breed and produce when fed balanced diets from healthy, balanced soils - can spend less and worry less.
- Biological farmers know this is their best shot at being profitable, sustainable farmers. They can be proud of how they take care of the land, livestock, environment, and the food they produce.
- Biological farmers know that farming can be fun and profitable - and perhaps their children will even *want* to farm!