

## BENEFITS OF DRAINAGE:

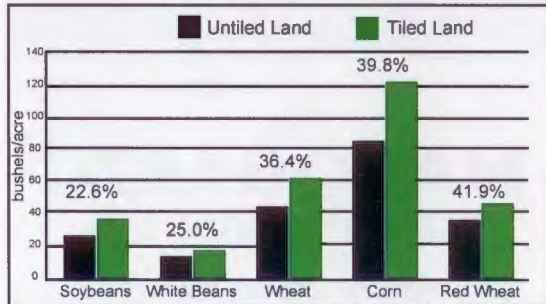
### Drainage benefits the soil by:

- Lowering the water table by removing excess water
- Aerating the soil
- Increasing fertilizer efficiency
- Speeding up soil warming - heat is not used to evaporate excess water
- Allowing faster soil warm up which speeds germination of seeds
- Promoting bacterial and microbial activity, giving more nutrient availability to plants
- Reducing erosion by creating a bigger soil reservoir which can absorb rains
- Helping to create a better soil structure
- Preventing soil structure damage created by working wet fields
- Reducing compaction from heavy machinery

### Drainage benefits the crop by:

- Improving soil conditions - more water, air and fertilizer can reach the roots
- Encouraging deep root development in early growth. These deeper roots can reach water more easily in droughty periods
- Discouraging disease development which occurs in poorly drained soils
- Increasing crop variety and rotation choice
- Working the soil and planting earlier
- Lengthening the harvesting season
- Creating a consistent crop yield year after year

All of these inputs go together to increase yields by approximately 22 - 40%.



Statistics gathered from Ontario's crop insurance program.



### Drainage lowers overheads by:

- Requiring less horsepower to work the fields and harvest the crop, using less fuel working drier land
- Increasing working speeds of field equipment
- Eliminating the need to rework or replant
- Eliminating the need to work around wet spots
- Allowing less machines or smaller machines to harvest the crop over more days
- Preventing downtime and maintenance costs from being stuck in wet fields

### Drainage:

Drainage provides an outlet for excess soil moisture. This is done through a systematic system of 4" to 12" tile installed under ground. This system then drains into a main outlet either a tile, ditch or water course.

There are many factors that determine a proper drainage design. There are too many to outline here. Therefore give us a call and we can personally explain all these factors to you.

### Loans:

The provincial government provides farm drainage loans through the local municipality. In most cases 75% of the job cost can be covered, up to a loan of \$50,000.00/yr to a maximum of \$150,000.00 at one time. This loan is repaid over 10 years at a set interest rate. Over the years the interest rate has been 6%. The payments are set at equal instalments paid on your tax bills. Farmers should inquire to the

local municipality they are tiling in, to make sure their policy is as above. Farmers should also make sure their application is taken to the municipality as soon as possible.

### The Company:

- Started by three brothers, Earl, Bruce & Jack Marquardt in the 1950's, they started draining their own farmland. Subsequently neighbours wanted them to drain their farms, thus the business grew into a full time venture.
- The company was then bought by Steven Cronsberry and Ken Connell in 1988, two experienced and dedicated employees to the industry.
- The business since "1990" is solely owned by Steven Cronsberry, who continues to serve customers in Wellington County and within a 100 mile radius of Palmerston, ON.
- The company is based on the philosophy of its owner
  - To endeavour to provide the best possible job for the customer. This using the knowledge, experience and state of the art equipment, it has obtained over the past years.
  - Also to achieve the respect of the client by providing a quality job, at a competitive cost, and to do our best to service the customer afterwards.





### The Men:

A good company with state of the art equipment can only do good work with first class operators. Marquardt Farm Drainage employs such people, all of whom can draw on years of experience in the drainage industry. All machine operators are well qualified to perform their work, this allows the company to stand behind all workmanship.

### The Equipment:

Today we install drainage tile with both a Wolfe self-propelled trenchless machine and a HD 21B c/w Link 250 trenchless machine. Each machine can install from 4" to 16" plastic tile. We also have a Buckeye Super 7 wheel machine which is an open trench machine. This machine can install from 8" to 27" concrete, clay or plastic tile.

Backhoes are also available to do auxiliary work. Drain repairs of old tile, drainage related jobs. Backhoe work can be done using laser to control grade.

### Estimates:

We will do a site visit to measure the area to be drained, and lengths of mains needed. During this visit a preliminary layout will be done. Using the layout measurements an estimate is produced. Rest assured all estimates are as accurate as possible using the information provided.

### Design and Layout:

A qualified technologist will work with the customer to design a drainage system which will provide the most effective and economical benefit to the farmer. This is done by creating a topographical survey of the area to be drained. A design is then done, based on the survey, using the required criteria needed to come up with the most professional system. In some cases, the area is designed in different ways, to be able to determine the most cost efficient and effective design. This also allows the farmers to see the system on paper before the system is installed.



### End Result:

Marquardt Farm Drainage, the company, its people, its equipment and workmanship, all go together to produce what the farmer wants, a first class drainage system. This is proven by our client numbers and tile volume installed.

Marquardt Farm Drainage and its crews are dedicated to achieving the best for its customers.

### For More Information:

- Most importantly the real facts about a drainage system and installation
- Background on drainage benefits
- Estimates for your drainage project
- Updating an existing drainage system

### CALL THE SPECIALISTS

Steven Cronsberry,  
designer - estimator - owner  
Marquardt Farm Drainage Ltd.  
R.R. #3  
PALMERSTON, Ontario N0G 2P0  
Business: 1-888-534-0393 or 1-519-343-3233  
Residence: 1-519-338-2373

# Farm Drainage

the ins and outs

*We can turn a wet field*



*into a profitable field*



*with our designed drainage systems*



*continue inside for more drainage benefits*

*by*

**MARQUARDT  
FARM DRAINAGE LTD.**

P.O. Box 398, R.R. #3

Palmerston, Ontario N0G 2P0

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