

1 thru 36 107-14



Doc No. A- 1500035
OFFICE OF COUNTY RECORDER
OLMSTED COUNTY, MINNESOTA

I hereby certify that this document was filed in this office
for record on --May 26, 2020 10:47 AM
W. MARK KRUPSKI - Co. Recorder by deputy: ms
Well Certificate: _____ Abstract: _____ Fee: \$46.00

STATE OF MINNESOTA
COUNTY OF OLMSTED
TOWN OF CASCADE

TCPA
4111 - 11TH AVENUE SW, RM 10
ROCHESTER, MN 55902

CASCADE TOWNSHIP

SUBDIVISION ORDINANCE UPDATE

WHEREAS, Olmsted County has adopted changes to its Subdivision Ordinance; and,

WHEREAS, Cascade Township desires to keep its current Subdivision Ordinance from being in conflict with the Olmsted County Zoning Ordinance and State Statutes; and,

WHEREAS, Cascade Township's Planning Commission worked to develop the new ordinance and held a public hearing on Tuesday, January 21, 2020, at the Cascade Town Hall to allow comment on said Subdivision Ordinance update; and,

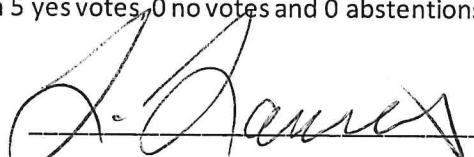
WHEREAS, the Town Board, having considered evidence from the public hearing, staff and the Planning Commission's recommendation.

NOW, THEREFORE BE IT ORDAINED, by the Cascade Town Board that the Cascade Subdivision Ordinance update is hereby approved with an effective date of March 1, 2020.

Motion by Supervisor Michael Black and second by Supervisor Gary Sieck to approve and allow for publication in summary form. Motion carried with 5 yes votes, 0 no votes and 0 abstentions.

Dated this 10th day of February 2020.

Attest:


Chair

Clerk





Distribution:

County Recorder, Township Clerk, County Planning, Zoning Administrator, Law Library

County Property Records – Please return to: TCPA, 4111 11th Ave SW, Room 10, Rochester, MN 55902

Drafted by: TCPA, 4111 11th Ave SW, Room 10, Rochester, MN 55902

TCPA
ms
- 10/20

**SUBDIVISION
ORDINANCE
FOR**

**CASCADE
TOWNSHIP**

OLMSTED COUNTY

MINNESOTA

D A T E:

March 1, 2020

TABLE OF CONTENTS

TABLE OF CONTENTS	2
ARTICLE I GENERAL PROVISIONS	5
Section 1.0. SHORT TITLE	5
Section 1.1. PURPOSE	5
Section 1.2. ADMINISTRATION	5
Section 1.3. COMPLIANCE	5
Section 1.4. REQUIRED APPROVAL OF SUBDIVISION PLATS	5
Section 1.5. ADDITIONAL REQUIREMENTS	6
Section 1.6. GENERAL OR COMPREHENSIVE DEVELOPMENT PLAN	6
ARTICLE II DEFINITIONS	6
Section 2.0. PURPOSE	6
ARTICLE III PROCEDURES FOR SUBMISSION OF PLATS	8
Section 3.0. PRELIMINARY PLAT	8
Section 3.1. FINAL PLAT	8
Section 3.2. RECORDING FINAL PLAT	9
ARTICLE IV SPECIFICATIONS FOR PLATS	9
Section 4.0. PRELIMINARY PLAT	9
Section 4.1. FINAL PLAT	9
Section 4.2. GENERAL INFORMATION	9
ARTICLE V SUBDIVISION DESIGN STANDARDS	13
Section 5.0. STREET AND ROAD DESIGN STANDARDS	13
Section 5.1. MINIMUM STREET DESIGN STANDARDS	13
Section 5.2. GEOMETRIC DESIGN STANDARDS	13
Section 5.3. INTERSECTIONS	14
Section 5.4. PRIVATE ROADS	14
Figure 5.4. PRIVATE ROAD - TURN AROUND AREAS	15
Section 5.5. PRIVATE DRIVE	15
Section 5.6. ALLEYS	15
Section 5.7. GRADING, SUBGRADE, BASE AND SURFACING	16

Figure 5.7.1 COMMERCIAL ENTRANCE	17
Figure 5.7.2 FIELD ENTRANCE.....	18
Figure 5.7.3 LOCAL STREET TYPICAL.....	19
Figure 5.7.4 RESIDENTIAL ENTRANCE	20
Section 5.8. EASEMENTS AND DEDICATIONS.....	21
Section 5.9. LOTS	21
Section 5.10. ENGINEERED PLANS.....	21
Section 5.11. FLOODPLAIN STANDARDS.....	21
ARTICLE VI REQUIRED IMPROVEMENTS	22
Section 6.0. MONUMENTS.....	22
Section 6.1. STREETS.....	22
Section 6.2. SIGNS.....	22
Section 6.3. UTILITIES.....	22
Section 6.4. STORM WATER MANAGEMENT	23
Section 6.5. CONSTRUCTION BONDS	23
Section 6.6. DEVELOPMENT CONTRACT PROVIDING FOR THE INSTALLATION OF IMPROVEMENTS ...	23
ARTICLE VII SINKHOLE DEFINITION & REQUIREMENTS	23
Section 7.0. SINKHOLE DEFINITION	23
Section 7.1. EDGE DEFINITION	24
Section 7.2. SINKHOLE ADVISORY AREAS	24
Section 7.3. REQUIREMENTS.....	24
Section 7.4. SETBACKS	24
Section 7.5. MITIGATION OF SINKHOLES.....	24
Figure 7.6. TYPICAL SINKHOLE CROSS-SECTIONS	25
ARTICLE VIII PLATTING EXCEPTIONS AND CONDITIONS	26
Section 8.0. METES & BOUNDS SUBDIVISION	26
Section 8.01. PORTION OF PLATTED LOT	26
Section 8.02. UNPLATTED LAND	26
Section 8.1. DEDICATION OF STREET, PUBLIC UTILITY, AND ENVIRONMENTAL CORRIDOR EASEMENTS.....	26
Section 8.2. APPLICATIONS	27
Section 8.3. FILING FEE.....	27
Section 8.4. APPEALS.....	27

ARTICLE IX	DEDICATIONS AND RESERVATIONS	27
Section 9.0.	REQUIREMENT FOR OPEN SPACE	27
Section 9.1.	OPEN SPACE	27
ARTICLE X	VARIANCES.....	28
Section 10.0.	HARDSHIP	28
Section 10.1.	CONDITIONS.....	28
Section 10.2.	BOARD OF ADJUSTMENT	28
Section 10.3.	PLATTING VARIANCES	28
ARTICLE XI	ENFORCEMENT	28
ARTICLE XII	AMENDMENTS	29
ARTICLE XIII	VALIDITY, SEPARABILITY AND EFFECTIVE DATE	29
Section 13.0.	VALIDITY	29
Section 13.1.	SEPARABILITY.....	29
Section 13.2.	EFFECTIVE DATE	29
Section 13.3.	FEES.....	29

ARTICLE I GENERAL PROVISIONS

Section 1.0. SHORT TITLE

This ordinance shall be known and may be cited as the "Subdivision Ordinance of Cascade Township," and its provisions shall apply to all lands to be subdivided in Cascade Township, which lie outside the limits of incorporated cities.

Section 1.1. PURPOSE

The Subdivision Ordinance of Cascade Township sets forth the minimum requirements deemed necessary to ensure and protect the health, safety and welfare of the public. More specifically, the provisions of this ordinance are designed to:

- Assure that to the maximum extent possible, any lands developed will be for the best possible use of the entire township with adequate protection against deterioration and obsolescence.
- Assure that effective protection is given to the natural resources of the community, especially ground water and surface waters, air quality, noise, and visual pollutants.
- Use quality design standards for any subdivision allowed.
- Encourage well-planned subdivisions through the establishment of adequate design standards.
- Discourage inferior developments that might adversely affect the local tax base.
- Create neighborhoods that will be of lasting credit to the community.
- Safeguard the interests of the public, the homeowner, the subdivider and units of local government.
- Secure the rights of the township residents with respect to public lands and waters.
- Improve land records by the establishment of standards for surveys and plats.

Section 1.2. ADMINISTRATION

The Cascade Township Board of Supervisors shall administer the Subdivision Ordinance of Cascade Township.

Section 1.3. COMPLIANCE

After the adoption of this ordinance, no lot in a subdivision shall be sold, no permit shall be issued to alter or erect any building upon land in a subdivision, and no building shall be erected in a subdivision unless a subdivision plat or metes and bounds subdivision has been approved and recorded and until any reasonable improvements required by the Cascade Township Board of Supervisors relative to the subdivision have been constructed or guaranteed as provided herein. No land shall be subdivided which is held unsuitable by the Cascade Township Board of Supervisors for reason of flooding, inadequate drainage, water supply or sewage treatment facilities or incompatibility with the Cascade Township Land Use Plan or the Cascade Township Zoning Ordinance. All lots within the floodway and flood fringe (FFA and FFB) districts shall contain a building site at or above the Regulatory Flood Protection Elevation. Land within a flood plain may be conveyed and joined on the same deed with an adjoining lot. All subdivisions shall have water facilities that comply with the Olmsted County Board of Health regulations, sewage disposal facilities that comply with the Cascade Township Septic Ordinance, and have road access both to the subdivision and to the individual building sites no lower than two (2) feet below the Regulatory Flood Protection Elevation.

Section 1.4. REQUIRED APPROVAL OF SUBDIVISION PLATS

- Any subdivision of land containing more than two non-farm lots requires a General Development Plan. A General Development Plan shall be acted on by the Cascade Township Board, which at its discretion may refer the matter to the Cascade Township Planning and Zoning Commission.
- A Preliminary Plat shall be reviewed by the Cascade Township Planning and Zoning Commission with their recommendations going to the Cascade Township Board of Supervisors for approval.

- Before any Final Plat is valid, it must be reviewed by the Cascade Township Planning and Zoning Commission, the Olmsted County Planning Commission, Olmsted County Board of Health, Olmsted County Board of Commissioners, Olmsted County Surveyor, Olmsted County Engineer if subdivision connects to an Olmsted County road, and Cascade Township Engineer. The Cascade Township Board of Supervisors shall approve as provided herein and then record in the office of the Olmsted County Property and Vital Records Division.

Section 1.5. ADDITIONAL REQUIREMENTS

The Planning Commission may establish additional requirements for a particular subdivision as deemed necessary in order to achieve the overall goals and purposes of this ordinance and to secure the interests of the public.

Section 1.6. GENERAL or COMPREHENSIVE DEVELOPMENT PLAN

Cascade Township does not have a Comprehensive Planning Document and defers to the Olmsted County Plan for Land Use items.

ARTICLE II DEFINITIONS

Section 2.0. PURPOSE

For clarity of interpreting this ordinance, certain terms and words are defined below in alphabetical order.

A. BOARD OF ADJUSTMENT

The Cascade Township Board of Adjustment

B. CIVIL ENGINEER

A civil engineer registered in the State of Minnesota

C. COMMUNITY BUILDING

A building intended to serve a community's educational, recreational, religious, or service activities, typically used as a place of meeting, recreation or social activity and not operated for profit.

D. GENERAL DEVELOPMENT PLAN (GDP)

A series of maps, documents and publications showing the desirable future development, the appropriate uses of private land, and the general location and extent of all necessary or desirable facilities.

E. DEVELOPER

The owner of land proposed to be subdivided or the developer's representative. Consent shall be required from the legal owner of the premises.

F. LAND USE PLAN

Cascade Township recognizes the Olmsted County Land Use Plan.

G. OFFICIAL MAPS

1. **HIGHWAY** - A map of Olmsted County, Cascade Township and/or any portion thereof lying outside incorporated cities which shows the exact alignments, gradients, dimensions and other pertinent data for highways and major streets and including specific controls for setbacks from the right-of-way of buildings or other physical structures or facilities. The official map is available from Olmsted County.

2. **ZONING** – A map or maps of Cascade Township which are a part of the Zoning Ordinance delineating the boundaries of the zoning districts and representing the approximate boundaries of the overlay zoning districts.

H. PARKS

Any public or private non-commercial, not-for-profit land and associated accessory buildings established and intended for recreational, educational and cultural activities; a scenic or aesthetic natural area or wildlife preservation area intended for leisure time enjoyment. This definition shall not be construed to include entry features of landscape buffers around the perimeter of a subdivision that serve no other active or passive recreational purpose. This definition shall not be construed to include recreational facilities where activity takes place completely indoors.

I. PLANNING COMMISSION

The Cascade Township Planning and Zoning Commission.

J. PLAT

A map or drawing, conforming to state statutes, which graphically delineates the boundaries and dimensions of land parcels for the purpose of identification and record of title.

K. STREETS AND ALLEYS

The term “street” means a way for vehicular traffic, whether designated as a street, highway, parkway, thoroughfare, arterial, road, roadway or however otherwise designated.

For the purposes of this ordinance, eight (8) functional classifications of streets are used and are defined as follows:

1. **HIGHWAYS** - Routes carrying large volumes of relatively fast-moving traffic and are designated as Federal, State or Interstate highways.
2. **MAJOR STREETS/ROADS** - Arterials carrying large volumes of local traffic between widely separated areas of the community and which may be designated as County State Aid Highways.
3. **COLLECTOR STREETS/ROADS** - Streets which carry traffic from minor streets to major streets and highways, including the principal entrance streets of a residential subdivision and streets used for circulation within such developments.
4. **LOCAL STREETS/ROADS** - Streets, which are used principally for access to abutting properties, especially residential properties.
5. **SERVICE ACCESS STREETS** - Trafficways which are adjacent and parallel to highways and major streets providing access to abutting properties.
6. **ALLEYS** - Minor trafficways affording a secondary means of access to abutting properties, which are not intended for general traffic circulation.
7. **PRIVATE ROAD** - A non-public trafficway utilized by more than three private residences having a road name and being able to accommodate emergency vehicles.
8. **PRIVATE DRIVE** - A non-public trafficway utilized by one to three private residences.

L. SUBDIVISION

The division of a lot, parcel or tract of land into two (2) or more lots or parcels by the owner thereof or his agent for the purpose of transfer of ownership or building development, or, if a new street is involved, any division of a parcel of land provided that a division of land into forty (40) acres or more and not involving a new street shall not be deemed a subdivision. This term shall include resubdivision and, when appropriate to the context, shall relate to the process of subdividing or to land subdivided.

M. TOWN BOARD

The Cascade Township Board of Supervisors.

N. TOWNSHIP

Cascade Township.

O. ZONING ADMINISTRATOR

The Township Cooperative Planning Association ("TCPA") or otherwise designated by the Cascade Township Board.

ARTICLE III PROCEDURES FOR SUBMISSION OF PLATS

Section 3.0. PRELIMINARY PLAT

Upon approval of the GDP, the subdivider shall prepare a preliminary plat together with improvement plans and other supplemental material as may be specified by the Town Board, the Planning Commission or the Olmsted County Board of Health or their Designee.

Where sinkholes exhibit linear patterns the area shall be evaluated for soil and/or bedrock stability as part of the preliminary plat submission and prior to any construction activity.

The preliminary plat and supplementary material as specified in Article IV, Section 4.2. of this document along with a completed application form shall be submitted to the Zoning Administrator electronically. Two (2) copies of the preliminary plat and supplementary material shall be submitted to the Olmsted County Board of Health with written application for conditional approval.

Upon determining the application is complete, the Zoning Administrator shall schedule a public hearing before the Planning Commission as determined by Statute. The Planning Commission shall hold the public hearing, review the preliminary plat and make recommendations as to conditions of approval to the Town Board. The Town Board, at their next regularly scheduled meeting, shall act upon the Planning Commission's recommendation, determining approval, approval with conditions or disapproval with its reasons for disapproval. If the plat is approved with conditions, applicant shall submit to the Zoning Administrator a copy of a revised preliminary plat along with all supporting documents within one (1) year of approval or the preliminary plat approval is considered null and void.

Conditional approval of a preliminary plat shall not constitute approval of the final plat. Conditional approval of a preliminary plat is hereby limited to a period of one (1) year from the date of approval, after which time the subdivider is required to ask for an extension.

A grading permit may be issued for and grading may begin on the proposed development once the preliminary plat has been approved and all conditions, which may include a surety bond, have been met. An erosion control plan is required for grading permit approval.

Section 3.1. FINAL PLAT

Prior to filing a final plat, applicant shall submit electronically to the Zoning Administrator a preliminary plat as approved by the Town Board along with any other supporting documents required as a condition of approval.

The final plat shall conform substantially to the preliminary plat as approved, and if desired by the subdivider, it may constitute only that portion of the approved preliminary plat which is proposed to be recorded and developed at the time, provided however, that such portion conforms to all requirements of this ordinance and is done within the allotted time frame. Any portion of an approved preliminary plat that has not been approved as a final plat must go through the preliminary platting process again.

The final plat and supplementary material as specified in Article IV, Section 4.2. along with a completed application

form shall be submitted electronically to the Zoning Administrator within twelve (12) months. The applicant shall provide proof of application to the Olmsted County Board of Health or their designee with the application for final plat approval.

Upon determining the application is complete, the Zoning Administrator shall schedule a public hearing before the Planning Commission as determined by Statute. The Planning Commission shall hold the public hearing, review the final plat and make recommendations as to conditions of approval to the Town Board. The Town Board, at their next regularly scheduled meeting shall act upon the Planning Commission's recommendation, determining approval, approval with conditions or disapproval with its reasons for disapproval. In the event that the plat has not been approved by the Olmsted County Planning Commission, conditional approval may be given by the Town Board pending Olmsted County Planning Commission approval.

Section 3.2. RECORDING FINAL PLAT

The final plat of record, prepared in accordance with this ordinance shall be filed by the subdivider with the Olmsted County Property and Vital Records Division. The subdivider shall furnish signed copies to this office as required. There shall be a filing fee assessed against the owner or developer whose name and address shall be recorded with the Olmsted County Property and Vital Records Division at the time the record plat is submitted for acceptance by the County Board of Commissioners. The applicant shall furnish an original signed Mylar and one paper copy of the signed and recorded plat to the Zoning Administrator.

ARTICLE IV SPECIFICATIONS FOR PLATS

Section 4.0. PRELIMINARY PLAT

The preliminary plat shall be drawn on suitable tracing paper or other material of suitable quality with black waterproof ink or pencil at a scale not greater than one hundred (100) feet equals one (1) inch. Original prints or legible reproductions of said drawing may be submitted to the Town Board for the purposes of receiving conditional approval.

Section 4.1. FINAL PLAT

The final plat shall be drawn on muslin-backed white paper, photographic Mylar or other suitable material with black waterproof ink. The final plat shall measure thirty (30) inches in length and twenty (20) inches in width with a border line of one and one-half (1 1/2) inches provided on the left side of the thirty (30) inch length and a border of one-half (1/2) inch provided on the other three (3) sides. When more than one (1) sheet is required for any plat, each sheet shall be numbered consecutively and shall contain a notation of the total number of sheets, i.e., 2 of 3. The final plat shall be drawn to a scale not greater than one (1) inch to one hundred (100) feet. Where there is a difference in requirements between this subdivision ordinance and the State platting and surveying standards then the State standards will prevail.

Section 4.2. GENERAL INFORMATION

The information to be included on the preliminary and final plats is as follows:

PRELIMINARY PLAT

Date, scale, north point.

Proposed subdivision name and all intended street names.

Name of the owner, subdivider and surveyor or engineer preparing plat.

Location of the plat by the quarter, quarter section, section, town and range.

Topographic map of the area showing two-foot contours and delineating areas with the following changes in slope: minimum contours of two feet as follows: seven (7) percent or less; eight (8) to fifteen (15) percent; sixteen (16) to twenty-five (25) percent; greater than twenty-five (25) percent.

Location and names of adjacent subdivisions and the owners of adjoining parcels of unsubdivided land.

Zoning classification of lands to be subdivided and all adjacent lands.

Location, widths and names of all existing, platted or dedicated streets, easements, railroad and utility rights-of-way, parks, water courses, drainage ditches, permanent buildings and structures and such other data as may be required by the Planning Commission within the area being subdivided and within three hundred (300) feet of the exterior boundaries of the area being subdivided.

Water elevations of adjoining lakes, rivers and streams at date of survey and their approximate high and low water elevations. All elevations shall refer to the established United States Coast and Geodetic Survey and/or United States Geodetic Survey Datum.

When the subdivision borders a lake, river or stream, a meander line shall be established at an elevation four (4) feet above the recorded high water elevation of the lake, river or stream.

FINAL PLAT

Date, scale, north point.

Subdivision name and all street names.

Name and address of the owner of record, the subdivider, and surveyor or engineer preparing the plat.

Location of the plat by quarter, quarter section, section, town and range.

Location and names of adjacent subdivisions and the owners of adjoining parcels of unsubdivided land.

Exact location, widths and names of all existing platted or dedicated streets, easements, railroad and utility rights-of-way, parks, water courses and drainage ditches all of which are within the boundaries of the land to be subdivided.

Water elevations of adjoining lakes, rivers and streams at date of the survey and their approximate high and low water elevations. All elevations shall refer to the established United States Coast and Geodetic Survey and/or United States Geodetic Survey Datum.

When the subdivision borders a lake, river or stream, a meander line shall be established at an elevation of four (4) feet above the recorded high water elevation of the lake, river or stream.

Exact location and width of all streets, their bearings, dimensions, angle of intersection, length of arcs, radii, points of curvature, tangent bearings, easements, private roads and storm drainage.

Exact length and bearings of the exterior boundaries of the land being subdivided.

Exact dimensions of all lots.

Exact radii of all curves and lengths of all tangents.

PRELIMINARY PLAT

- Location and boundaries of all floodplain, floodway and wetland areas. Location and edge boundaries of all sinkholes must be clearly indicated. (Ref. Article VII.)
- The layout and width of all proposed new streets and rights-of-way, private roads, storm drainage and easements, whether public or private, for public and private utilities.
- Length and bearings of the exterior boundaries of the land being subdivided.
- Dimensions of all lots.
- Radii of all curves and lengths of all tangents.
- Location and area of all property to be dedicated for public use or reserved by deed covenant for use by all property owners in the development with a statement of the conditions of such dedication or reservation.
- Location of all proposed or existing wells (active, abandoned or capped) and any distribution systems to point of service connection.
- Locations of well site and distribution system to point of service connection, if a community water supply is being proposed.
- Percolation test results, minimum of two (2) per lot, together with soil borings, every acre to indicate depth to water table and rock formations.
- Location of proposed septic support or field areas including the location or percolation test sites and boring holes, per current Cascade Township Septic Rules and the Cascade Township Zoning Ordinance.
- An engineering feasibility report for the installation and operation of community-type sewage disposal system and water distribution system where such facilities are to be incorporated in the final plat.
- Drainage design, storm water management including storm water ponds both temporary and permanent, and erosion control including ditch checks, silt fencing and seeding types.

FINAL PLAT

- Exact location an area of all land to be dedicated for public use or reserved by deed covenant for common use of all property owners with the purpose indicated thereon. All lands dedicated for public use, other than streets, shall be marked, "Dedicated to the Public."
- Deed restrictions, if any, including the boundaries of each type of restriction.
- Exact location and width of all known or recorded easements, whether public or private and a statement of easement rights.
- Accurate location and material of all permanent reference monuments.
- Certificate of the registered land surveyor preparing the plat certifying that the plat, as presented, fully complies with the requirements of this ordinance and the platting laws of the State of Minnesota relative to the surveying, dividing and mapping of the land; that the plat is a correct representation of all exterior boundaries of the land surveyed; that the plat represents a survey made by him and that all monuments indicated thereon exist and their location, size and material are correctly shown.
- Certificate from the Minnesota Department of Health that plans for the water supply system and sewerage system have been approved whenever applicable. In the event that the necessary disposal system(s) is not available at time of approval of the final plat, conditional approval may be given pending the issuance of said certificate(s) by the Minnesota Department of Health.
- A Certificate issued by the authorized county official stating that there are no unpaid taxes or special assessments on any of the lands included in the plat.
- A certificate by the owner(s) dedicating to the public for full public use all streets and street rights-of-way and other lands designated as "Dedicated for the Public's Use" and the granting of utility easements as shown on the plat.

PRELIMINARY PLAT

Roadway designs including cross sections and finished grade and ditch slopes. Reports shall include present grades and contours and finished grades and contours.

A soil analysis delineating types per the Soils Survey of Olmsted County, Minnesota, and obtainable from the United States Department of Agriculture, Soil Conservation Service.

FINAL PLAT

Certificate of approval by the Olmsted County Planning Commission, the County Engineer, County Board of Health and the Town Board.

Exact location and area of all land to be dedicated for public use; this use or purpose must be defined on the plat.

Signature line for Olmsted County Engineer I.

Signature line for Olmsted County Board of Health.

Signature line for the Cascade Town Board.

ARTICLE V SUBDIVISION DESIGN STANDARDS

Section 5.0. STREET AND ROAD DESIGN STANDARDS

Street and road design standards shall conform to the “Subdivision Roadway Design Standards” adopted by Cascade Township.

Section 5.1. MINIMUM STREET DESIGN STANDARDS

	MAJOR THOROUGHFARE	COLLECTOR STREET	LOCAL STREET	SERVICE ACCESS STREET	ALLEY	PRIVATE ROAD	PRIVATE DRIVE
Rights of Way	100'	80'	66'	40'	30'	33'^(2)	33'
Driving Surface Width (including shoulder)	(¹)	36'	30'	24'	20'	18'w/2' CL5 shoulders	16'
Base Specification	(¹)	(¹)	(³)	(¹)	(¹)	same as service access street	(⁴)
Minimum Horizontal Curve Radii	850'	400'	200'	200'	200'	Minimum inside radius 28'	(⁴)
Minimum Tangent Between Curves	200'	150'	100'	100'	100'	0'	(⁴)
Minimum Grade	0.4%	0.4%	0.4%	0.4%	0.4%	0.4%	(⁴)
Maximum Grade	5%	8%	10%	10%	10%	14%	(⁴)
Pavement Specifications	(¹)	(¹)	(¹)	(¹)	(¹)	same as service access street	(⁴)

⁽¹⁾ As specified by the County Engineer

⁽²⁾ May be easement

⁽³⁾ As specified by the Cascade Township Engineer (refer to “Local Street Typical” drawing)

⁽⁴⁾ Not specified.

Section 5.2. GEOMETRIC DESIGN STANDARDS

- The centerline of all roadways shall be the center of the platted right-of-way.
- Where new roads will be an extension of an existing road, their projections shall be at the same or greater width but in no instance less than the minimum required width.

- When connecting street lines deflect from each other by more than fifteen (15) degrees, they shall be connected by a curve with a radius appropriate to the intended functional use of said street as specified in Section 5.1 of this ordinance.
- All roadways shall be designed for a minimum of 30 miles per hour or the design speed determined by the Town Board.
- Stopping sight distance will be the minimum sight distance allowed.
- Local roads and streets shall be so aligned that their use by through traffic will be discouraged.
- Road and street jogs with centerline offsets of less than 150 feet shall be avoided.
- Streets designed and laid out so as to have one end permanently closed shall not exceed one thousand five hundred (1,500) feet in length, except where the Town Board has approved additional length due to property limitations. A cul-de-sac shall be provided at the closed end with a turn-around having a minimum outside roadway diameter of 90 feet and minimum right of way diameter of 120 feet.
- All subdivisions abutting a public lake, river or stream shall provide public access at least eighty (80) feet wide to the low water elevation so that there will be public access at not more than one-half (1/2) mile intervals as measured along the lake, river or stream shoreline.

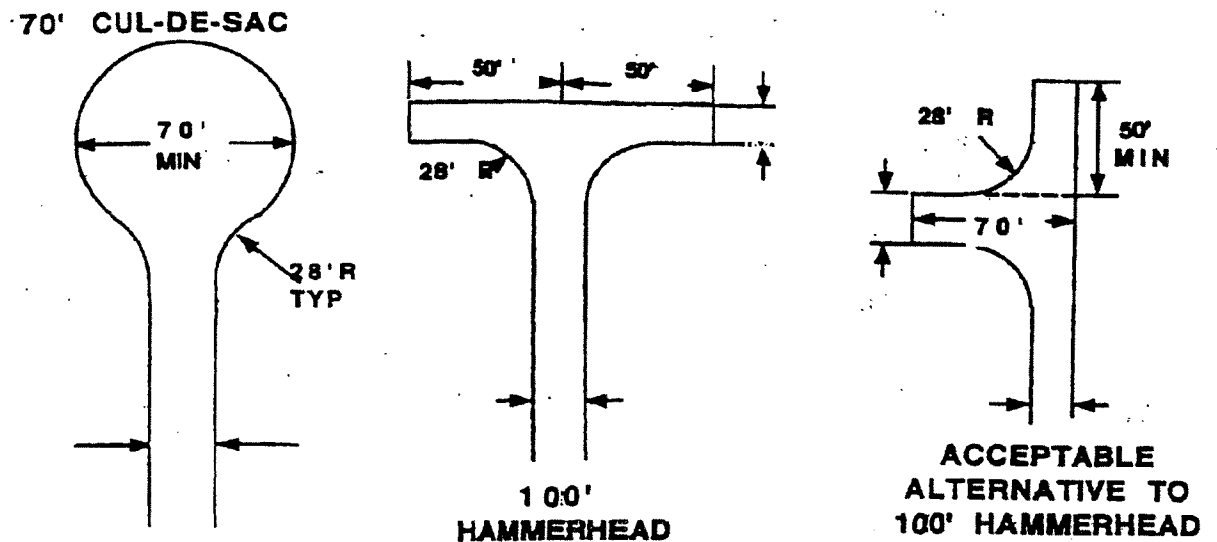
Section 5.3. INTERSECTIONS

- In so far as practical, all streets and roads shall intersect at right angles or as close thereto as possible. No street shall intersect another at an angle of less than 70 degrees. All roads and streets that do not intersect at right angles shall have the intersection angle approved by the Olmsted county highway engineer to insure sufficient sight distance and traffic safety. More than two (2) streets intersecting at the same location shall be prohibited.
- Street jogs with centerline offsets of less than one hundred fifty (150) feet shall be avoided.
- When the Town Board finds it necessary for reasons of safety and the protection of property, property lines at street intersections shall be rounded with a radius of fifteen (15) feet. The Town Board may permit comparable cords in lieu of the rounded corners.

Section 5.4. PRIVATE ROADS

- A trafficway serving four (4) to ten (10) private residences shall be deemed a private road.
- Private roads are required to have an approved and recorded road name.
- Private roads are required to have street signs. The initial signs are to be paid for by the developer / owner and subsequently maintained by all property owners owning property that utilizes the private road.
- Private roads shall be able to accommodate emergency vehicles.
- Private roads shall have the following design minimums:
 1. Minimum trafficway of 18 feet with 2-foot shoulders of class five road rock.
 2. Curves shall have a minimum inside radius of 28 feet.
 3. A private road exceeding 700 ft in length will be provided with either a circular or hammerhead style turn around area (Ref. Figure 5.4.)

Figure 5.4. PRIVATE ROAD -- TURN AROUND AREAS



4. The Township will not maintain private roads. If a private road is to be eligible for Township maintenance it must be upgraded to township road standards and accepted by the Township.

Section 5.5 PRIVATE DRIVE

- A trafficway serving one (1) to three (3) private residences shall be deemed a private drive.
- Private drives are not required to have an approved and recorded road name.
- Private drives shall be able to accommodate emergency vehicles.
- Private drives shall have the following design minimums:
 1. Minimum traffic way of 16 feet.
 2. A private drive must provide adequate space for emergency vehicles to turn around.
 3. The Township will not maintain private drives. If a private drive is to be eligible for Township maintenance it must be upgraded to township road standards and accepted by the Township.

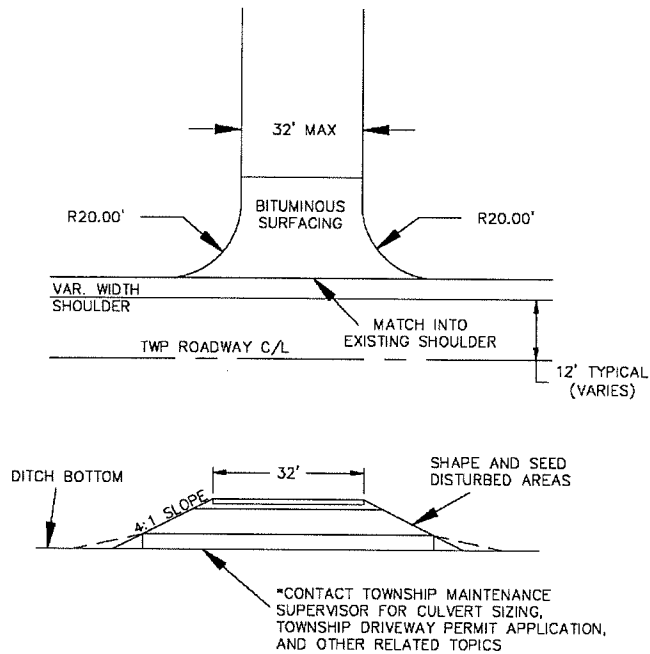
Section 5.6 ALLEYS

- Alleys shall be required in all commercial and industrial districts, except that the Planning Commission may waive this requirement where the commercial or industrial district is designed as a comprehensive unit and adequate provisions for service access, off-street loading and unloading areas and parking space is a part of the overall development plan.
- Dead-end alleys are prohibited except where natural or other features make it impossible to continue them. Where dead end alleys are unavoidable, they shall be provided with adequate turnaround facilities at the dead-end as determined by the Planning Commission.
- Alleys shall not be provided in residential areas unless a secondary means of access to certain property is necessary due to topography or other exceptional circumstances.
- Design standards for alleys are contained in Section 5.1. of this ordinance.

Section 5.7. GRADING, SUBGRADE, BASE AND SURFACING

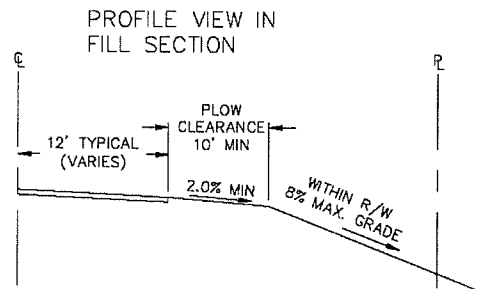
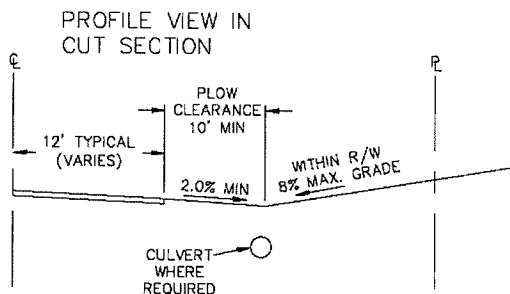
- The upper one-foot of topsoil shall be removed from the traveled portion of the roadway and placed on the inslopes and backslopes.
- Roadway design shall be as illustrated in the included engineering drawing.
- All streets shall be graded to their full right-of-way, and the roadway compacted to ninety-five (95) percent of proctor density.
- Where staged roadway construction is employed including the early application of a bituminous (bit) base pavement layer or bit base and bit wear pavement layers, the Town Board may require the application of a final bit wear layer prior to acceptance of the road by the Township.

COMMERCIAL ENTRANCE



GENERAL NOTES:

- 1) IF MODIFICATIONS ARE MADE TO AN EXISTING ENTRANCE BY A PROPERTY OWNER, THE ENTRANCE SHALL BE BROUGHT UP TO ALL CURRENT ROCHESTER/CASCADE TOWNSHIP STANDARDS AT THE PROPERTY OWNERS EXPENSE.
- 2) MATCH INPLACE SECTION WHERE SURFACING EXISTS. TYPICAL SURFACING IS 8" AGGREGATE SURFACING TO THE R/W FOR NEW ENTRANCES.
- 3) FOR RECONSTRUCTION PROJECTS, CONCRETE AND BITUMINOUS ENTRANCES SHALL BE REPLACED WITH BITUMINOUS TO THE LIMIT REMOVED.
- 4) WHERE REQUIRED THE BITUMINOUS SURFACING SHALL BE A MINIMUM 3-1/2" BITUMINOUS WEARING COURSE PLACED IN TWO LIFTS OVER A MINIMUM 8" AGGREGATE BASE.



I HEREBY CERTIFY THAT THIS PLAN, SPECIFICATION OR REPORT WAS PREPARED BY ME OR UNDER MY DIRECT SUPERVISION AND THAT I AM A DULY LICENSED PROFESSIONAL ENGINEER UNDER THE LAWS OF THE STATE OF MINNESOTA

MARK R. WELCH

DATE _____ REG. NO. 42736

G³

G-Cubed

14070 Hwy 52 S.E.
Chatfield, MN 55923

ENGINEERING
SURVEYING
PLANNING

Ph. 507-867-1666
Fax 507-867-1665
www.ggg.to

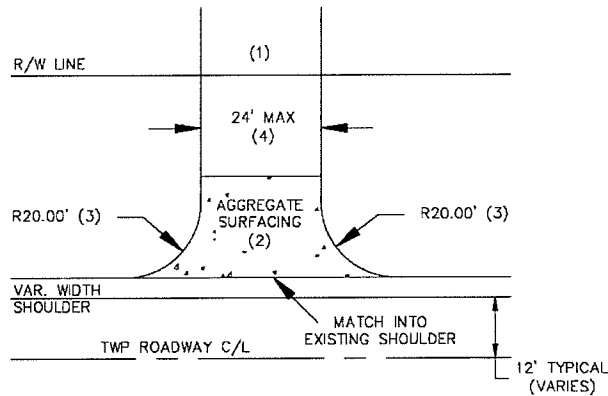
LAST REVISED: 1-29-19

Prepared For:
ROCHESTER/CASCADE
TOWNSHIP

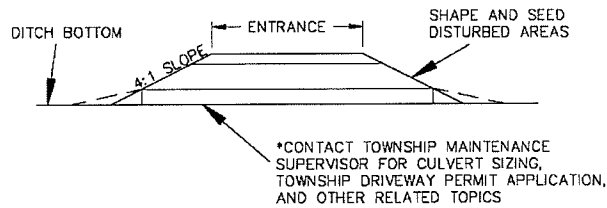
SHEET 1 OF 1 FILE NO.: 04-140

FIELD ENTRANCE

PLAN VIEW



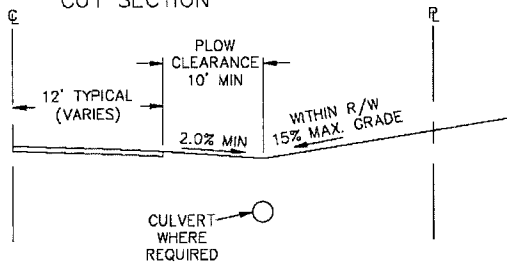
SECTIONAL VIEW



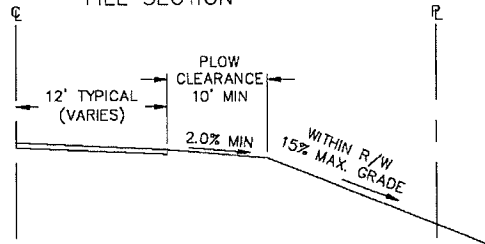
GENERAL NOTES:

- 1) IF MODIFICATIONS ARE MADE TO AN EXISTING ENTRANCE BY A PROPERTY OWNER, THE ENTRANCE SHALL BE BROUGHT UP TO ALL CURRENT TOWNSHIP STANDARDS AT THE PROPERTY OWNERS EXPENSE.
- 2) TYPICAL SURFACING IS 12" AGGREGATE SURFACING TO THE R/W.
- 3) THE RADIUS MAY BE EXPANDED 30 FEET IF THE TOWNSHIP ROAD WIDTH INCLUDING SHOULDER IS LESS THAN 24 FEET.
- 4) 36 FOOT MAXIMUM WIDTH FOR SHARED ENTRANCES.

PROFILE VIEW IN CUT SECTION



PROFILE VIEW IN FILL SECTION



I HEREBY CERTIFY THAT THIS PLAN, SPECIFICATION OR REPORT WAS PREPARED BY ME OR UNDER MY DIRECT SUPERVISION AND THAT I AM A DULY LICENSED PROFESSIONAL ENGINEER UNDER THE LAWS OF THE STATE OF MINNESOTA

MARK R. WELCH

DATE _____ REG. NO. 42736

G³

G-Cubed

14070 Hwy 52 S.E.
Chatfield, MN 55923

ENGINEERING
SURVEYING
PLANNING

Ph. 507-867-1666
Fax 507-867-1665
www.gcg.to

LAST REVISED: 1-29-19

Prepared For:
ROCHESTER/CASCADE

TOWNSHIP

...

SHEET 1 OF 1 FILE NO.: 04-140

Plan view of a 66' wide roadway. The diagram shows a centerline (C/L) and right-of-way (R/W) lines. Key dimensions and features include:

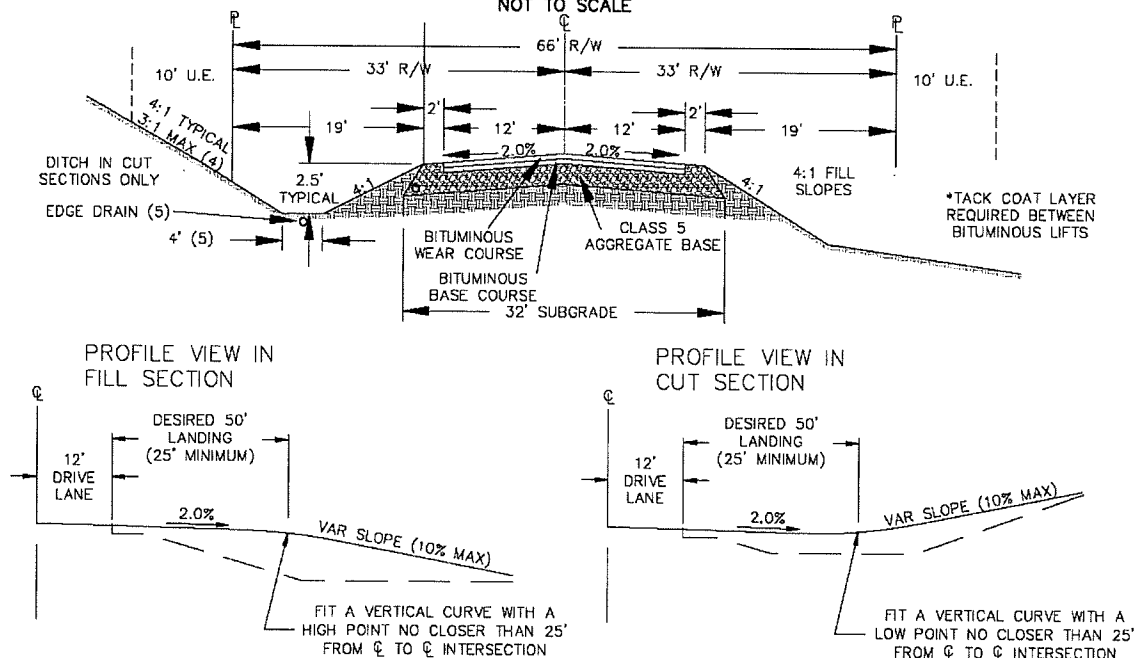
- 24' DRIVE SURFACE
- 66' R/W
- 10' U.E. (Utility Easement)
- 33' R/W
- 15.00' offset
- R/W LINE
- 15.00' offset
- R40.00' (Radius)
- 30' offset
- 2' SHOULDER
- R15.00' MIN. (Radius)
- LIMITS OF PAVING (TYP)
- BITUMINOUS SURFACING (4)
- MATCH INTO BITUMINOUS EDGE
- 12' TYPICAL (VARIES)
- VAR. WIDTH SHOULDER
- 6' MIN WIDTH SHOULDER
- ROADWAY C/L

NOTES:

GENERAL NOTES:

- 1.) CONTACT THE ROADWAY JURISDICTION OF THE EXISTING ROADWAY FOR PERMIT. PROVIDE SIGHT AND STOPPING DISTANCE CRITERIA FOR APPROVAL
- 2.) NEW STREET CONSTRUCTION REQUIRES BITUMINOUS SURFACING THAT SHALL BE A MINIMUM OF 3.5 INCHES IN DEPTH PLACED IN TWO LIFTS. DEPTH OF AGGREGATE SHALL BE A MINIMUM OF 8 INCHES. ROAD DESIGN SHALL BE A 7 TON MINIMUM BASED ON A GEOTECHNICAL REPORT AND R-VALUES. RECONSTRUCTION SURFACING REQUIREMENTS SHALL BE DETERMINED BY THE TOWNSHIP AUTHORITY RECOMMENDING THE PROJECT.
- 3.) INSLOPES SHALL BE 4:1. A SLOPE INCREASE TO 3:1 IS ACCEPTABLE IN MAJOR FILL SECTIONS WHERE NO DRIVEWAYS OR OTHER OBSTRUCTIONS WILL BE CONSTRUCTED. SLOPES STEEPER THAN 3:1 SHALL REQUIRE A GEOTECHNICAL REPORT ADDRESSING SLOPE STABILITY AND ANALYSIS OF THE NEED FOR GUARDRAILS.
- 4.) BACKSLOPES SHALL BE 4:1. A SLOPE INCREASE TO 3:1 IS ACCEPTABLE TO TIE OUT TO EXISTING GROUND IN CUT SECTIONS. DRIVEWAYS IN NEW STREET CONSTRUCTION WHICH CROSS A CUT SLOPE IN EXCESS OF 4:1 SHALL BE CONSTRUCTED AS PART OF THE STREET GRADING. DRIVEWAY GRADING SHALL BE TO A POINT DEPICTED AS THE BUILDING PAD OR TO NATURAL GROUND WITH A SLOPE OF LESS THAN 12%.
- 5.) SUBDRAIN SHALL BE INSTALLED AT THE SURFACING EDGE AND/OR IN DITCH BOTTOMS TO ENSURE A DRY SUBGRADE AND TO ALLOW FOR MAINTENANCE OF THE RIGHT OF WAY. LOCATIONS FOR SUBDRAINS SHALL BE BASED ON SOILS, TOPOGRAPHY AND STREET GEOMETRICS.
- 6.) PROPERTY LINES AND EASEMENTS AT STREET INTERSECTIONS SHALL BE ROUNDED WITH A RADIUS OF 15 FEET OR A COMPARABLE CORD.

NOT TO SCALE



SHEET 1 OF 1	FILE NO.: 04-140
--------------	------------------

Section 5.8. EASEMENTS AND DEDICATIONS

- The Town Board may require easements for public utilities. Where such easements are determined to be necessary, they shall be provided along the rear and/or side lot lines and shall be ten (10) feet in width.
- Easements for public or private utilities will be provided along all road rights-of-way. The easements shall be a minimum of ten (10) feet in width. The easements may be interior to and abutting the exterior boundaries of the road right of ways. All above ground utility components must be exterior of the obstacle free area, which extends a distance of twenty (20) feet from the traveled portion of the roadway. Only underground utilities may be within the road right-of-way. All underground utilities must be buried a minimum of thirty two (32) inches below the finished grade.
- Where a water course, drainage way channel or stream traverse a subdivision, there shall be provided a storm water easement for drainage right-of-way conforming substantially with the lines of such water course. If it is deemed advisable by the Planning Commission, such water course or drainage way may be re-established to conform with the proposed street pattern, in which case suitable storm drainage facilities shall be designed by a licensed engineer and the design reviewed by the County Engineer.
- Any storm water control or impoundment features will have easements to allow maintenance and access for maintenance.
- Upon consideration of the particular type of development proposed in the subdivision, and especially in large-scale neighborhood unit developments, the Planning Commission may require the dedication or reservation of areas or sites suitable to the needs created by such development for schools, parks and other neighborhood purposes.

Section 5.9 LOTS

The size, width, shape and orientation of lots and buildings set-back line shall be appropriate for the type of development and use contemplated. The Cascade Township Zoning Ordinance governs lot sizes. Every lot shall have adequate access through easement of at least thirty-three feet, a private road or public street, thus providing access for fire protection, utilities and other necessary services.

Section 5.10. ENGINEERED PLANS

Street plans must conform to Cascade Township and Olmsted County standards and be designed by a civil engineer.

Section 5.11. FLOODPLAIN STANDARDS

Suitability: No land may be subdivided which is unsuitable for reasons of flooding or inadequate drainage, water supply or sewage treatment facilities. Manufactured home parks and recreational vehicle parks or campgrounds are considered subdivisions under this ordinance.

1. All lots within the floodplain districts must be able to contain a building site outside of the Floodway District and at or above the regulatory flood protection elevation.
2. All subdivisions must have road access both to the subdivision and to the individual building sites no lower than two feet below the regulatory flood protection elevation. The road or driveway plan, including a regional flood elevation determination, must be prepared by a registered engineer or other qualified individual.
3. For all subdivisions in the floodplain, the Floodway and the Flood Fringe A and B Districts' boundaries, the regulatory flood protection elevation and the required elevation of all access roads must be clearly labeled on all required subdivision drawings and platting documents.
4. In the Flood Prone District, applicants must provide the information required in Section 9.01E of the Olmsted County Zoning Ordinance to determine the regional flood elevation, the floodway boundary and the regulatory flood protection elevation for the subdivision site. (Data available at TCPA office.)

5. If a subdivision proposal or other proposed new development is in a flood prone area, any such proposal must be reviewed to assure that:
 - a. All such proposals are consistent with the need to minimize flood damage within the flood prone area;
 - b. All public utilities and facilities, such as sewer, gas, electrical and water systems are located and constructed to minimize or eliminate flood damage; and
 - c. Adequate drainage is provided to reduce exposure of flood hazard.
6. Subsurface Sewage Treatment Systems (SSTS) shall not be located in a Floodplain as defined in the Olmsted County Zoning Ordinance for development within a platted subdivision after the date of adoption of this ordinance. Existing parcels developed or subdivided prior to the date of this ordinance must avoid placement of an SSTS in the floodplain unless no option exists to locate the SSTS outside of the floodplain. The SSTS shall not be located in the Floodway and may only be located in the FFA and FFB Flood Fringe District or Flood Prone District if no other option exists. The SSTS must comply with all elements of Minnesota Rules, Chapter 7080.2270.

ARTICLE VI REQUIRED IMPROVEMENTS

Section 6.0. MONUMENTS

Durable iron monuments shall be placed at all block corners, all intermediate points on blocks where there is a change in the direction of the block line, at points of curves in streets, at each angle and curve point on the exterior boundary lines of the plat, and at such other points as may be required by the Olmsted County Engineer.

Section 6.1. STREETS

All streets/roads/roadways/drives shall be constructed in accordance with the design standards of Article V. Official acceptance of any street being public or private is required. A Township representative shall inspect the street and determine acceptance including all drainage and stormwater retention. The Township may withhold building permit applications within a development until the street has received preliminary approval by the Town Board. Preliminary street approval does not mean final approval or acceptance by the Township. Maintenance of a street by the Township shall not begin without final acceptance of the street. Partial maintenance of a street may be provided by the Township at the Town Board's discretion and shall not be considered final acceptance.

Section 6.2. SIGNS

All signs, posts and their installation shall require approval of the Olmsted County Engineer, and conform to Olmsted County standards. A fee will be charged to the developer for the first sign(s) on public roads or streets.

Section 6.3. UTILITIES

It shall be the responsibility of the subdivider to contact utility companies to determine the availability of services and to make the necessary arrangements for their installation.

Where a community or multiparty-type water supply system and/or waste removal system is to be utilized, the subdivider or developer shall install the wells, water mains and/or waste collection system prior to construction of buildings upon the lots.

The Township encourages all utilities other than water and waste removal to be located in the same trench.

Section 6.4. STORM WATER MANAGEMENT

All storm water management facilities and structures must be constructed prior to acceptance of the road by the township. If no road construction is associated with the development then all storm water management facilities and structures must be constructed prior to construction of buildings upon the lots. All subdivision proposals shall define the care and maintenance of all drainage easements and stormwater facilities.

Section 6.5. CONSTRUCTION BONDS

In the interest of good development and to protect the taxpayers and future purchasers of residential, commercial and industrial properties, it shall be the policy of the Town Board to require that a construction and/or performance bond, letter of credit or certified check be posted to Cascade Township for completion of all work required under the provisions of this ordinance.

- **CONSTRUCTION or PERFORMANCE BOND:** The Town Board may accept a final plat for recording where the owner and/or developer of the platted subdivision posts a certified check, letter of credit or surety bond acceptable to the Town Board in sufficient amount to cover the provisions of this ordinance.

The amount of said certified check or surety bond shall be determined by the Town Board, with input from the County Engineer, and the stipulated period covered by such bond shall in general be for a period of two (2) years, and renewed for one (1) year intervals until the work is completed and accepted by the Town Board. Where a portion of the work covered by the certified check or surety bond has been completed and is acceptable to the Town Board, then the amount of the certified check or surety bond may be reduced in proportion to the amount of work completed.

Section 6.6. DEVELOPMENT CONTRACT PROVIDING FOR THE INSTALLATION OF IMPROVEMENTS

Prior to the installation of any required improvements and prior to final approval of the plat, the developer shall enter into a contract, in writing and in a form acceptable to the Town Board, requiring the developer to furnish and construct said improvements at the developer's sole cost and in accordance with plans and specifications approved by the Town Board (Developer's Agreement). The developer shall include provisions for supervision of details of construction by the township engineer and shall grant the township engineer authority to correlate the work to be done under said contract by any subcontractor authorized to proceed thereunder and with any other work being done or contracted by the local unit of government in the vicinity. The agreement shall require the developer to make a cash escrow deposit or a bank letter of credit in an amount and form approved by the Town Board. In general the surety shall represent no less than 125 percent of the cost of the improvements including all inspections.

The developer shall be responsible to pay all reasonable costs incurred by the Township or its agents in the review and inspection of the project and enforcement of this Ordinance, including but not limited to administrative, planning, engineering and legal fees.

ARTICLE VII SINKHOLE DEFINITION & REQUIREMENTS

Section 7.0. SINKHOLE DEFINITION

Sinkholes exist in Cascade Township and are formed by the movement of water in the ground and bedrock causing the dissolution of soluble rock and the resultant sinking of the surface into these voids. The dissolution of the rock is not uniform and is enhanced along joints and cracks in the rock. The result of this action is karst. Thus a sinkhole is defined as a depression or hole in the landscape surface formed by the dissolution of bedrock or the collapse of an underlying cavity.

Depressions in karst advisory areas where soils are deeper than eight (8) feet that were formed by differential compaction or subsidence are not considered sinkholes for the purposes of this ordinance.

Section 7.1. EDGE DEFINITION

For the purposes of defining offsets, the edge of a singular sinkhole shall be defined as the inner doline formed by the collapse or the dissolution of the carbonate bedrock plus a horizontal distance equal to the average vertical depth of soil in the area, i.e. a slope of forty-five (45) degrees from the inner doline to the point of intersection with the soil at the average soil depth in the area (Ref. Fig. 7.6.)

A cluster or sinkhole group would exist where two (2) or more sinkholes are separated by an edge-to-edge distance of less than two hundred (200) feet.

Section 7.2. SINKHOLE ADVISORY AREAS

Sinkhole prone areas are defined as “karst advisory areas (KAA)” as shown in the Olmsted County Geologic Atlas.

Section 7.3. REQUIREMENTS

Developments in the KAA’s must document any open or closed (mitigated) sinkholes. Preliminary plat documentation must include an evaluation for the intrinsic geologic risk of the site including the risk of catastrophic collapse and potential for ground water contamination. Such documentation and the site topographic drawing shall identify all sinkholes on the subject property and those known or cataloged sinkholes shown in the Olmsted County or Cascade Township sinkhole inventory or registry within a distance of five hundred (500) feet from the property boundaries.

Where sinkholes exhibit linear patterns the area shall be evaluated for soil and/or bedrock stability as part of the Preliminary Plat submission and prior to any construction activity.

Section 7.4. SETBACKS

Where sinkholes are identified the following setbacks from the sinkhole edge as defined in Section 7.1. shall apply:

- | | |
|--|----------|
| • Septic tanks | 50 feet |
| • Septic fields | 50 feet |
| • Structures without evaluation of underlying geology | 500 feet |
| • Structures with design supported by geologic evaluation, an engineered design and with sinkhole mitigation as per the report; “Basis for Sinkhole Designs,” dated February 1993, by Barr Engineering | 0 feet |

Section 7.5. MITIGATION OF SINKHOLES

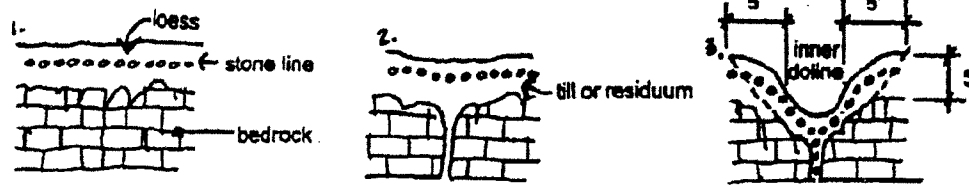
Where sinkholes occur wholly or partially within the right-of-way of public roads, these sinkholes must be mitigated in accordance with the design practices documented in “Basis for Sinkhole Designs,” dated February 1993, by Barr Engineering. The proposed mitigation plan must be designed by a licensed engineer and must be accepted by the Planning Commission as part of the Preliminary plat approval and prior to the start of any construction.

Mitigation of sinkholes in general will follow the practices identified in the document “Basis for Sinkhole Designs,” dated February 1993, by Barr Engineering. The Zoning Administrator must be notified of any proposed mitigation and the mitigation plan prior to start of such mitigation.

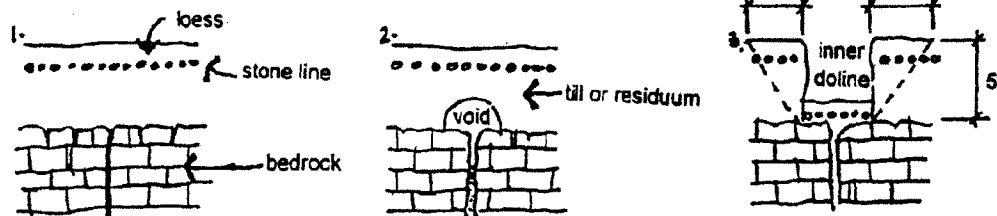
Sinkholes of a cylindrical type or any sinkhole that would potentially form a trap or be a hazard to public safety must be mitigated at the start of any construction in the development.

Figure 7.6. TYPICAL SINKHOLE CROSS-SECTIONS

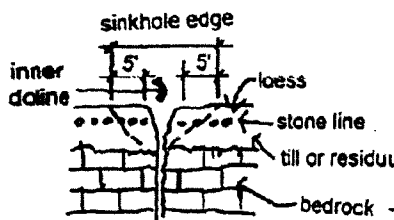
SUBSIDENCE SINKHOLES (Thin glacial drift/ form slowly)



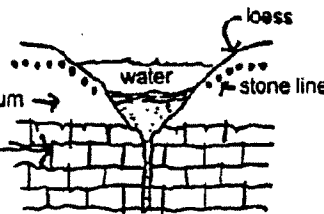
COLLAPSE SINKHOLES (Form beneath thick drift/can form catastrophically)



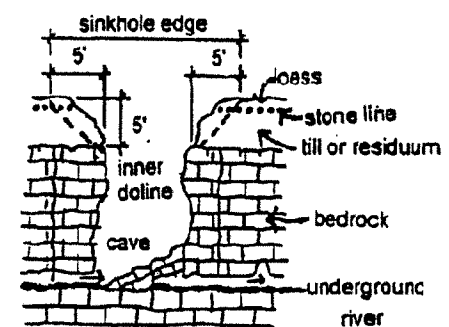
SOIL PIPES



KARST PONDS



KARST WINDOW



SINKHOLE FORMATION

Sinkholes form where surface materials are eroded through the solution channels in the underlying bedrock. If that erosion is slow compared to the rate at which the land surface adjusts, a slow subsidence sinkhole forms. If the subsurface erosion is rapid compared to the rate at which land surface adjusts, a void can form in the unconsolidated materials above the bedrock surface, and when the roof of that void falls, a catastrophic sinkhole can suddenly appear.

The drains in the bottoms of both subsidence and catastrophic sinkholes can be plugged by debris. Water may be temporarily collect in such plugged sinkholes and form ponds. As sinkholes continue to grow, they eventually form karst windows. In Minnesota the erosion process was interrupted by cycles of glacial deposition before the sinkholes evolved into karst windows. A stone line is present beneath the loess in places, but not everywhere:

Definitions:

- Inner doline-** The edge of soil/bedrock collapse in cylindrical depression a point at mid-slope between the bottom and the shoulder of the depression.
- Sinkhole edge-** A line extending from the inner doline at a horizontal distance equal to the average vertical soil depth in the area defining a 1:1 slope (45%) from the top of bedrock at the inner doline to the surface.

ARTICLE VIII PLATTING EXCEPTIONS AND CONDITIONS

Section 8.0. METES & BOUNDS SUBDIVISION

Section 8.01. PORTION OF PLATTED LOT

On application of the owner, the Town Board may approve a metes and bounds subdivision of a portion of a platted lot under the following circumstances if, in each instance, the new and residual parcels of land which would result from the metes and bounds subdivision meet the requirements of the Zoning Ordinance.

- a) When it is desired to relocate a property line separating platted lots or a platted lot and unplatted land which would not result in the creation of any additional lots; or
- b) When it is desired to divide two (2) platted lots into not more than three (3) parcels; or
- c) When it is desired to divide one (1) platted lot into not more than three (3) parcels.

And the following conditions are:

- d) When the parcels are approved for private sewage disposal systems, if needed, by the Cascade Township Septic Inspector.
- e) When such a subdivision will not interfere with the purposes of the Subdivision Ordinance and would be consistent with the Cascade Township Land Use Plan.
- f) All unused wells are sealed.

Section 8.02. UNPLATTED LAND

On application of the owner, the Town Board may approve a metes and bounds subdivision under the following conditions if, in each instance, the new and residual parcels of land which would result from the metes and bounds subdivision meet the requirements of the Zoning Ordinance.

- a) When it is desired to relocate a property line that would not result in the creation of any additional lots; or
- b) When the subdivision involves the creation of no more than a total of three (3) new and residual parcels from a legally recorded parcel.

And the following conditions are both met:

- c) When the parcels are approved for private sewage disposal systems, if needed, by the Cascade Township Septic Inspector.
- d) When such a subdivision will not interfere with the purposes of the Subdivision Ordinance and would be consistent with the Cascade Township Land Use Plan.

Section 8.1. DEDICATION OF STREET, PUBLIC UTILITY, AND DRAINAGE EASEMENTS

When it is determined that additional public street easements are required along existing public roads in order to improve drainage or roadway safety, the owner shall be required to dedicate such necessary street easements as a condition of metes and bounds subdivision approval.

When public utility easements are required as a result of a metes and bounds subdivision, the owner shall dedicate such necessary easements as a condition of metes and bounds subdivision approval. Definition of such easement must be included on the Certificate of Survey.

When drainage easements are required by the Olmsted County Engineer, Olmsted County Soil and Water Conservation District or Town Board as a result of a metes and bounds subdivision, the owner shall dedicate

such necessary drainage easement as a condition of metes and bounds subdivision approval. Definition of such easement must be included on the Certificate of Survey.

Section 8.2. APPLICATIONS

All applications under this Section shall be filed with the Zoning Administrator and shall have attached thereto a legal description and map of the land to be subdivided showing all new and residual parcels, any deed covenants or restrictions that exist or are proposed and written approval of the Olmsted County Health Department for private sewage disposal systems, if needed.

All applications shall be sent to the Town Board for their review and decision at the next scheduled meeting. The Town Board shall act on the application in accordance with State Statute time limits.

Final approval of all applications will require a Certificate of Survey prepared by a registered land surveyor for each new parcel (unless waived by the County Surveyor in total or in part). The County Surveyor may waive the Certificate of Survey for a parcel of land that is forty (40) acres or more in size.

Section 8.3. FILING FEE

A filing fee as established by the Town Board shall accompany all applications for metes and bounds subdivision approval. All fees paid by check shall be made payable as directed by the Zoning Administrator.

Section 8.4. APPEALS

Appeals of the Town Board's decisions regarding this ordinance shall be submitted to the Zoning Administrator within ten (10) working days of the Town Board's decision. Such appeals will be submitted to the Town Board of Adjustment, a public hearing held and determination made as defined by State Statute.

ARTICLE IX DEDICATIONS AND RESERVATIONS

Section 9.0. REQUIREMENT FOR OPEN SPACE

Where deemed appropriate by the Town Board, additional open space suitably located and of adequate size for parks, trails, playgrounds or other recreational activities for local or neighborhood use, shall be provided for in the proposed subdivision.

Section 9.1. OPEN SPACE

All developments exceeding twenty (20) acres in size and meeting the R-1 lot area standards shall provide a minimum (as determined in the table below), of the gross development area in a single contiguous area with permanent dedication for common open space. Any Special District with a lot size of two acres or less shall also meet this requirement.

One-third (1/3) of the open space must be of a buildable quality. Open spaces exceeding two (2) acres may be non-contiguous. Open space shall reflect the site-specific natural characteristics. This space shall not include development septic set-aside area or wetland as defined in the Cascade Township Zoning Ordinance. If homeowner's association agreement is in place, the open space area shall be covered by that homeowner's association agreement. Otherwise, if said parcels are not dedicated to the Township, the Planning Commission may recommend they be reserved by covenant or deed restriction for the common use of all property owners in the subdivision.

Open Space Requirements

<u>Minimum Lot Size in Acres</u>	<u>Set Aside/Common Area Size percentage</u>
2 and greater	1.5%
Greater than and equal to 1.5 and less than 2	3.0%
Greater than and equal to 1 and less than 1.5	5.0%
Less than 1	10.0%

ARTICLE X VARIANCES

Section 10.0. HARDSHIP

Where the Town Board finds that extraordinary hardship may result from strict compliance with the provisions of this ordinance, it may vary the regulations during the platting process to the extent that substantial justice may be done and the public interest secured, provided that such variation may be granted without detriment to the public interest and will not have the effect of nullifying the intent and purpose of this ordinance.

Section 10.1. CONDITIONS

In the granting of variances, the Town Board shall weigh the hardships against the general standards and objectives of this ordinance and the Cascade Township Zoning Ordinance and the Cascade Township Land Use Plan, and may require such conditions that will, in its judgment, secure substantially the objectives of the standards or requirements so varied or modified.

Section 10.2. BOARD OF ADJUSTMENT

The Board of Adjustment shall act upon all questions, excepting the granting of the plat, as they may arise in the administration of this ordinance. The Board of Adjustment shall hear and decide appeals from and review any order, requirement, decision or determination made in the enforcement of this ordinance including appeals to platting variances.

Section 10.3. PLATTING VARIANCES

The Town Board shall have the authority to grant variances to the subdivision's standards during the platting process. The variances shall be reviewed by the Planning Commission and recommendations made to the Town Board. Application for such variances shall be made by the applicant during the preliminary plat and included in any staff review and comments allowed for during the public hearing process.

ARTICLE XI ENFORCEMENT

Any person, agent or corporation found guilty of violating any of the provisions of this ordinance, upon conviction thereof, shall be subject to a fine and the cost of prosecution for each violation; or be imprisoned for a period of not more than ninety (90) days or both. Each day that a violation exists or continues shall constitute a separate offense.

ARTICLE XII AMENDMENTS

The Planning Commission may of its own notion or upon petition, cause to be prepared amendments supplementing or changing the regulations herein established. All proposed amendments, together with the recommendation of the Planning Commission, shall be submitted to the Town Board for adoption in accordance with established procedures.

ARTICLE XIII VALIDITY, SEPARABILITY AND EFFECTIVE DATE

Section 13.0. VALIDITY

Whenever any provision of this ordinance imposes restrictions which are more restrictive than those imposed by provisions of existing laws or ordinances, the provision of this ordinance shall govern.

Section 13.1. SEPARABILITY

Should any section, clause or provision of this ordinance be declared by a court of competent jurisdiction to be invalid, the same shall not affect the validity of the ordinance as a whole or any part thereof, except that part so declared to be invalid.

Section 13.2. EFFECTIVE DATE

This ordinance shall become effective **March 3, 2003**, updated March 1, 2020.

Section 13.3. FEES

There shall be fees established for items in this ordinance as established from time to time by Resolution of the Town Board.

