

INDEX FOR ROAD PROCEDURES
ACCESS MANAGEMENT

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<u>REFERENCED DOCUMENTS:</u>	
Michigan Department of Transportation, Standard Specifications for Construction, current edition	
American Association of State Highway and Transportation Officials, A Policy on Geometric Design of Highways and Streets, current edition	

Updated 2/18/10

PROCEDURES

LAND DIVISIONS

Public or Private

Requirements:

1. Must submit Township approval for the Land Division.
2. Must submit a scaleable plan showing lots, roadway, section lines, dimensions from nearest roadways, and anything else pertaining to the Land Division. This plan must be sealed by a certified Professional Engineer or Professional Surveyor indicating adequate sight distance, down the county roadway, and that it meets standards as stated in the ASSTHO Geometric Design of Highways and Streets, current edition. A letter is also acceptable.
3. Personal Property Liability Insurance or Owners Protection Policy (Minimum of \$300,000). Please Note that if a contractor pulls the permit we need General Liability in the amount of \$500,000.

If the Roadway is to be Public we would also need the following:

1. Mylar Plans indicating Road and Drainage easements, dimensions, typical (if different from Road Commission attached) and any other pertinent information. These plans must be sealed by a Professional Engineer to insure that the roadway was or is going to be constructed to Road Commission Specifications as listed below.
2. We also will need a deposit (check or Cash) to cover any signing necessary. The Road Commission Engineer will provide the amount.
3. Dedicated "Right of Way" conforming to the following conditions:
 - a. The following right-of-ways will be required
 - Alleys-20 Feet (by special permission)
 - Roads and Streets-minimum 66'
 - Turn-around Per Illustration No. (2 or 3)
 - Federal Aid System- minimum 100'
 - b. Dead End Roadways ending with a Cul-De-Sac will require a turn around with a minimum external diameter of 150' or a "T" as shown on attached drawing. If there is ever a remote possibility of the road being extended into adjoining property it shall extend to the Plat Line with an easement given to the Road Commission, and constructed by the proprietor, until the future street has been accepted.
 - c. A minimum 20' Drainage Easement shall also be provided as indicated on the plans if it is required.
4. Construction shall be according to the Specification as stated in the following.

PLATS

The Board of County Road Commissioners discourages the platting of private road and streets, however, all private roads and streets shall meet the requirements of Public Roads and Streets, and it shall be understood that private streets and roads will **NOT** receive maintenance of any kind from the Road Commission.

Public Road and Street Requirements:

1. Approval of the Plat from the Township
2. Plans: Preliminary Blue Prints: 4 Sets to be submitted to Road Commission Indicating the following:
 - a. Name of Roadway or Street: Please note the name must be unique and not a duplicate of any other roadways under the jurisdiction of the Road Commission
 - b. Plat Proprietor
 - c. Engineer or Survey Firms Involved
 - d. Section Lines, Bench Marks and Datum
 - e. Typical Cross Section (if different from the Road Commission Typical as attached)
 - f. These items shall be shown, but are not limited to; adjoining subdivisions, roadways or streets, rivers, railroads, cemeteries, parks, natural watercourses, county drains. (including drainage arrows), sewers, utilities (gas and electrical facilities).
 - g. Dedicated "Right of Way": conforming to the following conditions:
3. The following Deeded Right-of-Ways will be required as they apply
 - Alleys-20 Feet (by special permission)
 - Roads and Streets-minimum 66'
 - Turn-around Per Illustration No. (2 or 3)
 - Federal Aid System-minimum 100'

Dead End Roadways ending with a Cul-De-Sac will require a turn around with minimum external diameter of 150' or a "T" as shown on attached illustrations. If there is ever a remote possibility of the road being extended into adjoining property it shall extend to the Plat Line with an easement given to the Road Commission, and constructed by the proprietor, until the future street has been accepted.

A minimum 20' Drainage Easement shall also be provided as indicated on the plans if it is required.
4. Final Plan Mylar (18" x 24") to be submitted for Road Commissioner final approval and signatures.
5. Construction of Roadway or Street shall be according to the specifications as stated in the following.

CONDOMINIUM DEVELOPMENT

That all roadway, street and alley rights of way with regard to existing or proposed public rights-of-way shall conform to the requirements as established in this manual, and shall be dedicated to the use of the public through the Tuscola County Road Commission and not be a part of any element controlled by the condominium association.

SPECIFICATIONS FOR CONSTRUCTION For Public Roads and Plats

IMPORTANT INFORMATION: The Proprietor shall bear any cost incurred for certification and testing of new Roadway or Street construction.

APPROVAL: A written statement shall be obtained by the proprietor from the respective Township Board approving to proceed using the county's standards that will develop this roadway for acceptance into their public road system. The Road Commission will supply the proprietor with information to see that the roadway is built to our standards. The Board of Road Commissioners will have to make motion to approve this roadway for submittal to the Michigan Department of Transportation for acceptance as a certified public road.

CONSTRUCTION: All phases of construction are to be certified (that they meet the Specifications listed within) by a licensed Professional Engineer. Paperwork must be submitted to the Road Commission Engineer prior to acceptance of the Roadway or Street.

MATERIALS: All material specified within this document shall conform to the current Michigan Department of Transportation Standard Specifications for Construction. The materials must also be certified by a Pre-Qualified Supplier. All Paperwork must be submitted to the Road Commission Engineer prior to acceptance of the Roadway or Street.

ALIGNMENT AND GRADES:

1. Centerline of Road shall coincide with the Section Line, unless approved by the Engineer.
2. Minimum length of roadway shall be 600', unless an extension of an existing road built on section line.
3. Horizontal curves not less than 200' radius will be permitted
4. Vertical curves shall be designed according to AASHTO Geometric Design of Highways and Streets, current edition.
5. Minimum sight distance onto an existing county road shall be based on the Geometric Design of Highways and Streets, for each direction. This shall be certified by a licensed engineer or surveyor on the plans. A sealed letter is also acceptable.

SPECIFICATIONS FOR CONSTRUCTION (CONT'D)
For Public Roads and Plats

CLEARING, REMOVAL OF TREES AND BRUSH:

All trees, brush, shrubs located within the Right-of-Way shall be cleared.

DRAINAGE:

1. All culverts located along existing roadway will be sized by the Road Commission. Proper installation is the Proprietor's responsibility.
2. The Proprietor shall provide adequate means to care for surface drainage in and adjacent to his property. The design shall meet all standards as required by the Michigan Department of Environmental Quality (if regulated), with final approval from the Road Commission.
3. In all such cases, accepting regularly established county drains; an easement (in the name of the Board of County Road Commissioners) shall be given by the proprietor to provide access to such drainage system.
4. Any work or construction involving a County Drain shall be in accordance with the Office of the Drain Commissioner, and as approved by the Road Commission.
5. The plans shall indicate disposition of surface water to the nearest, adequate, functioning outlet.
6. Surface drainage and storm water shall be the only open drainage in the Right-of-Way.

DRAINAGE STRUCTURES & GUARDRAIL:

1. All cross road culverts shall be a minimum of 15"x 40' CMP (16 gauge).
2. Minimum driveway culverts shall be 12"x20' CMP (16 gauge), If the proprietor chooses to use corrugated plastic pipe, (up to 36" inch diameter) metal flared end sections will be required with the size and type approved by the Road Commission.
3. No vertical Headwalls will be allowed in the Right-of-Way, length of culvert must be adequate to provide minimum 1 on 2 side slopes.
4. All pipes shall be backfilled with a minimum of 12" sand (or approved equal) and a minimum total cover of 24 inches.
5. Guardrail (with approved endings) may be required by the Road Commission if 1 on 2 slopes exist or there is a grade separation of more than 6 feet.
6. Where ever possible, minimum depth of the roadside ditches shall be 18" or greater.
7. Catch Basins and Man Holes will be approved by the Road Commission on a site-specific need.

SPECIFICATIONS FOR CONSTRUCTION (CONT'D)
For Public Roads and Plats

EARTH GRADE:

Finished earth grade shall be free of stones, stumps, and organic matter.

SUBBASE:

A minimum of 12" or 9000 ton (per mile) of sand (Class II or approved equal) material will be required, constructed according to the attached Illustration 1.

BASE:

Crushed material shall meet the current MDOT specification for 21A, 22A, or 23A or an approved equal. It shall be a minimum of 6" deep or 4500 ton (per mile) placed according to the attached Illustration 1.

HARD-SURFACE TREATMENT:

1. Option #1-Prime and Double Seal Coat with a Final Seal Coat the following year. (Per TCRC Specification)
2. Option #2-Prime and Double Seal Coat with 1.5" Bituminous Mix 13A, including 23A shoulder gravel the following year.
3. Option #3-3" Bituminous Mix 13A, including 23A Shoulder Gravel

APPROACHES:

All approaches onto the roadway shall be graded so that a minimum of 10' is level with the roadway and cross-sloped to drain into roadside ditches. Curbed radii may be required on a site-specific basis as determined by the Road Commission Engineer.

SOIL EROSION, SEDIMENT CONTROL AND SEEDING REQUIRMENTS:

1. All Soil Erosion and Sediment Control measures shall be according to the TCRC manual (copies available upon request).
2. The Seed shall be a Roadside Seed Mix or better. Topsoil 3" – 4", seed, mulch, or mulch blanket shall be required on all exposed areas in the road right of way. No roads will be accepted where ditch or slope erosion is evident. Riprap and geo-textile fabric may be required on a site-specific need as determined by the Road Commission Engineer.

PERMITS

There is no fee for any one wishing to apply for driveway permits in Tuscola County. You may apply at the Road Commission's main office located at 1733 Mertz (M-24), Caro, MI 48723, Phone: 989.673.2128.

RESIDENTIAL DRIVES:

You will need to provide the Road Commission with the following information:

1. Location, including road name, township, and nearest crossroad
2. Personal Property Liability Insurance
3. Signature
4. You will be provided with white flags to be placed at the desired location of your new drive

Road Commission Staff will review the site for the need of a culvert and size it if necessary. The permit will be returned via mail or it can be picked up in person.

COMMERCIAL DRIVEWAY PERMITS:

You will need to provide us with the following information:

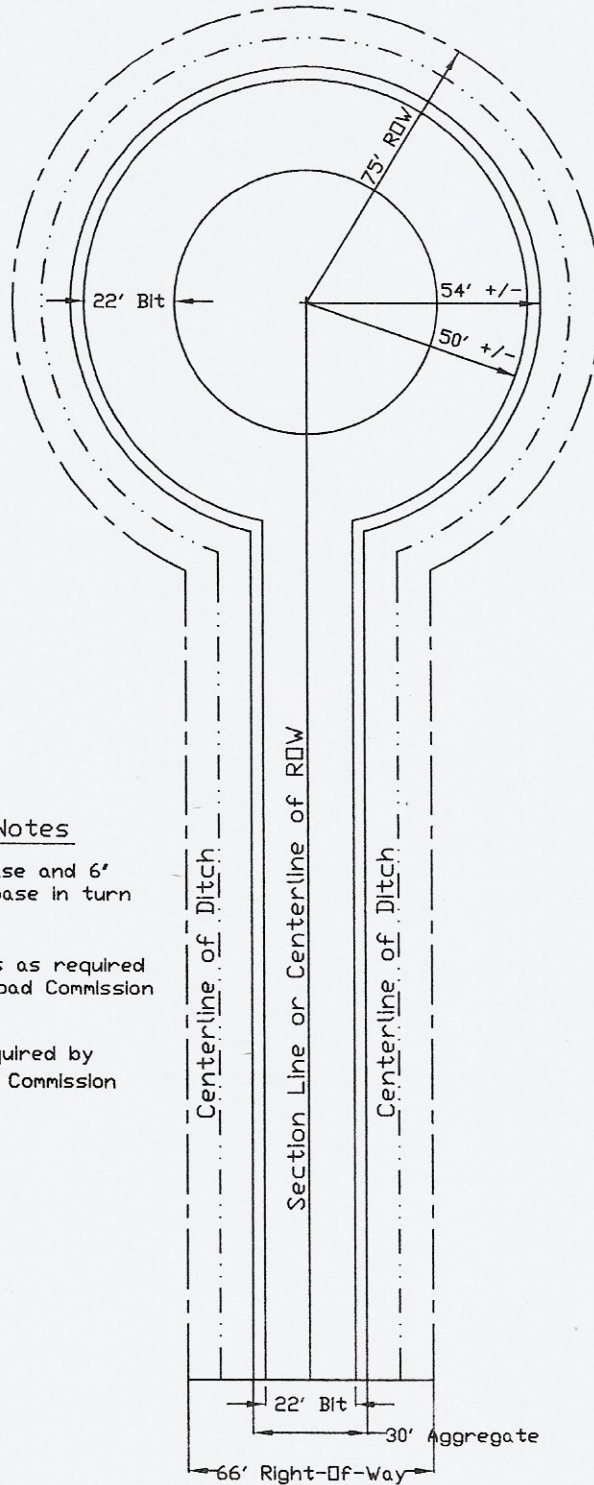
1. Location: Site map or drawing needs to be provided showing the driveway.
2. Property Liability Insurance
3. Signature
4. Owner and /or Developer Information
5. Multiple trip generating drives must also meet sight distance requirements as based on the AASHTO Geometric Design of Highways and Streets. A Professional Engineer or Professional Surveyor must certify that the location meets this sight distance requirement either by written statement or on the plan, prior to placement of the driveway.
6. The Road Commission reserves the right to require curb and gutter on a site-specific basis.
7. Construction and taper shall be according to Illustration No (4) GEO-680 Series for County Highway Approach.

Notes: If roadway is hard surfaced: Asphalt can be paved to the roadway edge.

Concrete driveway approach shall stop 20' from center of roadway.

If roadway is gravel: All hard surfaced driveway approaches shall stop 20' from center of roadway.

TUSCOLA COUNTY ROAD COMMISSION



Contractor's Notes

1. Place 12' sand subbase and 6' crushed aggregate base in turn around.
2. Ditching and culverts as required by Tuscola County Road Commission Engineer.
3. Hard surface as required by Tuscola County Road Commission Engineer.



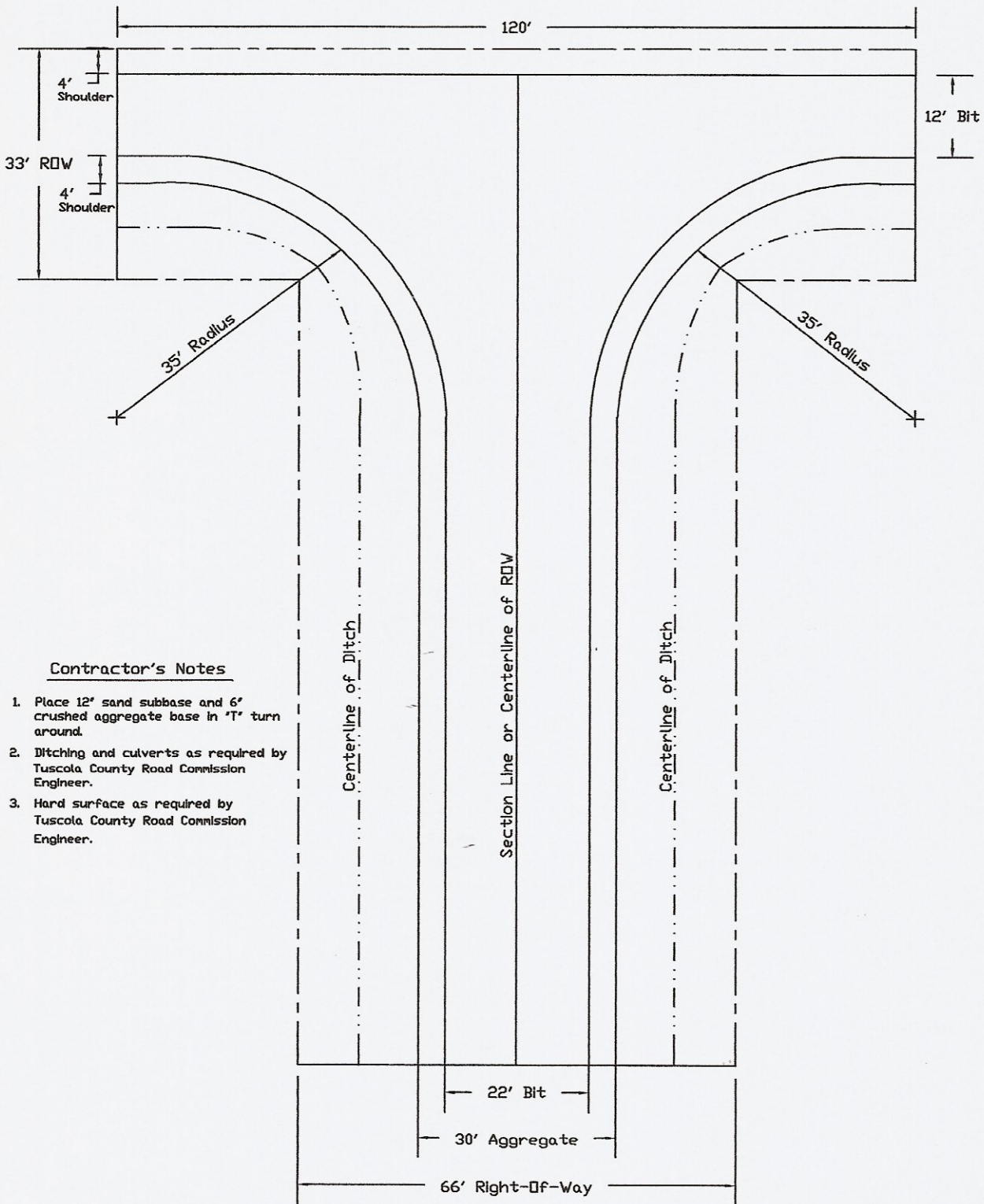
TUSCOLA COUNTY ROAD COMMISSION
ENGINEERING

1733 S MERTZ RD
CARD, MI 48723
P: (989) 673-2128
F: (989) 673-3294
tuscolaroad.org

TYPICAL - CUL-DE-SAC
TURN AROUND

REVISION DATE	2-11-10
DRAWN BY	J PARKER JR
SCALE	NO SCALE

TUSCOLA COUNTY ROAD COMMISSION



Contractor's Notes

1. Place 12' sand subbase and 6' crushed aggregate base in 'T' turn around.
2. Ditching and culverts as required by Tuscola County Road Commission Engineer.
3. Hard surface as required by Tuscola County Road Commission Engineer.



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ENGINEERING

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TYPICAL - 'T' OR 'HAMMERHEAD'
TURN AROUND

REVISION DATE	2-11-10
DRAWN BY	J PARKER JR
SCALE	NO SCALE