GENOA CHARTER TOWNSHIP PLANNING COMMISSION PUBLIC HEARING November 25, 2013 6:30 P.M. AGENDA

CALL TO ORDER:

PLEDGE OF ALLEGIANCE:

APPROVAL OF AGENDA:

CALL TO THE PUBLIC:

OPEN PUBLIC HEARING #1... Review of site plan, special use, and environmental impact assessment to construct a new 2,837 square foot Qdoba drive through restaurant located at the Meijer outlot at 3883 E. Grand River, Howell, petitioned by Kevin Egnatuk of Southwind Restaurants, LLC.

Planning Commission disposition of petition

- A. Recommendation of Environmental Impact Assessment (10-28-13).
- B. Disposition of Site Plan (10-28-13).

OPEN PUBLIC HEARING #2... Review of proposed Master Plan Update (10-22-13).

Planning Commission disposition of petition

A. Request for Approval of Resolution Adopting Updates to the Master Plan and Future Land Use Map.

Administrative Business:

- Staff report
- Approval of September 9, 2013 Planning Commission meeting minutes
- Member discussion
- Adjournment



GENOA CHARTER TOWNSHIP APPLICATION Site Plan Review

GENDA TOWNSHIP
AUG 0 8 2213

TO THE GENOA TOWNSHIP PLANNING COMMISSION AND TOWNSHIP BOARD APPLICANT NAME & ADDRESS: KEVIN EGNATUR SOUTHWIND KESTANGANTS, LIC If applicant is not the owner, a letter of Authorization from Property Owner is needed. 109 E. Brown wh OWNER'S NAME & ADDRESS: Meyer INC 2929 WALKER SITE ADDRESS: Meyer OUT ON GRAND KINERARCEL #(s): ROGER DEHOEK APPLICANT PHONE: (989) ZOS-1136 OWNER PHONE: (616-791-3909)
Meyer - ROGER, DEHOEK CMEYER, COM Kegnatuk@Comcast.net LOCATION AND BRIEF DESCRIPTION OF SITE: MEYER OUTLOT ON GRAND RIVER APPRILE. BRIEF STATEMENT OF PROPOSED USE: enter consisting of A 4 2ND 1200 SF WYOSE USER IS STILL TO ろど THE FOLLOWING BUILDINGS ARE PROPOSED:

I HEREBY CERTIFY THAT ALL INFORMATION AND DATA ATTACHED TO AND MADE PART OF THIS APPLICATION IS TRUE AND ACCURATE TO THE BEST OF MY KNOWLEDGE AND BELIEF.

BY: KEVIN EGNANK, SOUTHWINS FAV.
ADDRESS: 109 E. BROADWAY, MT. PLEASANT, MIT.
48858

Contact Information - Review Letters and Correspondence shall be forwarded to the following:

1.) KEVIN ECHANIK of Southward Thy, LLC at Kegnatyke (or Castine)

Name Business Affiliation E-mail Address

FEE EXCEEDANCE AGREEMENT

As stated on the site plan review fee schedule, all site plans are allocated two (2) consultant reviews and one (1) Planning Commission meeting. If additional reviews or meetings are necessary, the applicant will be required to pay the actual incurred costs for the additional reviews. If applicable, additional review fee payment will be required concurrent with submittal to the Township Board. By signing below, applicant indicates agreement and full understanding of this policy.

De ive Three Application. Attored within PVIS

GENOA TOWNSHIP

AUG 0 8 2013

APPLICATION FOR SPECIAL LAND USE GENOA TOWNSHIP

APPLICANT NAME* & ADDRESS: KOVIN GENATIK, SOLITHWIND PRESTAMANT, LCC 109 E. BRUMSWAY, MT. PLOTS ANT, MI OWNER NAME* & ADDRESS: Meyer, INC. 2929 WALKER AVE. N.W. 48858 SITE ADDRESS: Meyer Outlot on GRAND RIVER PARCEL #(s):
OWNER NAME * & ADDRESS: Weiger, INC. 2929 WALKER AVE. N.W. 4886
SITE ADDRESS: Meyer OUTLOT ON GRAND RIVER PARCEL #(s):
APPLICANTPHONE: 989-205-1136 OWNER PHONE: 20602 DEITHERE OWNER PHONE: 1 616-791-3909
Location and brief description of site and surroundings: Meyer OVTE OT ON GRAND LIVER, Ave.
Proposed Use: Construct A 3912 th Retail BUILDING TO BE Construct A 200 Retail Restaurant A 200 Retail Describe how your request meets the Zoning Ordinance General Review Standards (section 19.03):
Describe how your request meets the Zoning Ordinance General Review Standards (section 19.03):
a. Describe how the use will be compatible and in accordance with the goals, objectives, and policies of the Genoa Township Comprehensive Plan and subarea plans, and will promote the Statement of Purpose of the zoning district in which the use is proposed.
PORCET IS FOLK DRIVE THRU WINDOW DERNITED WITHIN THE PVD BUT REDUIRED TO OBTHIN A SPECIAL USE. THE USE IS LOUISITED WITH OTHER PAST FOOD LETTAVRANTS PANCE WITHIN THE SAME LOCAL VICINITY OF THE SITE. b. Describe how the use will be designed, constructed, operated, and maintained to be compatible with, and not significantly alter, the existing or intended character of the general vicinity.
Bldg stan BE consonword of Marculing Consister with
TUSP ZOWING ORDINANET 'S CONSISTENT WITH OTHER PLEATER SITE.
How will the use be served adequately by essential public facilities and services such as highways, streets, police and fire protection, drainage structures, water and sewage facilities, refuse disposal and schools?
ALL UTILITIES ARE PUBLIC ! CURRENTLY LOCATED AT THE
THAT WOULD IMPACT CIRIVER AVENUE.
d. Will the use involve any uses, activities, processes, or materials potentially detrimental to the natural environment, public health, safety, or welfare by reason of excessive production of traffic, noise, vibration, smoke, fumes, odors, glare, or other such nuisance? If so, how will the impacts be mitigated?
NOT THE POTENTIFE ISSUE IS COOKING ODOR FRAM
BENIERANS)

If so	describe how th	ecific criteria as listed in eciteria are met.	_	•	•		
	Te pois	· VEILLE ENCE		100			
APPLICATION AGREE TO I BUILDINGS ACCORDAN ORDINANC THIS PERMITTHE UNDER OWNER* OF THIS SPECIARY. ADDRESS: *Submit a le	ON ARE TRUE ADESIGN, CONS., STRUCTURES, CE WITH THE E, AND SUCH ATT. RSIGNED THE PROPERTAL LAND USE IN THE PROPERTAL LAND	ALL INFORMATION AND ACCURATE TO FRUCT AND OPERA AND FACILITIES W STATED REQUIREM DDITIONAL LIMITS OF PROPERTIES IN PERMIT.	THE BEST OF MY TE, AND MAINTA THICH ARE GOVE ENTS OF THE GE AND SAFEGUAR ST DESCRIBED ABO WHEN THE GE THE G THE GE THE G THE GE THE G THE G	Y KNOWL IN THESI ERNED BY NOA TOV RDS AS M ATES TH. VE AND N	EDGE AND BELIE PREMISES AND THIS PERMIT IN VNSHIP ZONING AY BE MADE A FAT THEY ARE THAKES APPLICATED TO THE THAKES AND TH	EF. I THE N PART OF HE FREE TION FOR	
Contact Inf	ormation - Revi	w Letters and Correspond	ondence shall be for			-1136 -(PH
Note: This		at be accompanied by	Business Affiliation a site plan review	applicatio	Fax No 9 8		; 0 9
review subm in use.)	ittal requiremen	ts. (The Zoning Admi	nistrator may allo	w a less de	tailed sketch plan	for a change	
							a
anning Commi tual incurred c	ssion meeting. It is a signification is a signification is seen a signification in the signification is signification. It is signification in the signification is signification in the signification is signification in the signification is signification. It is signification is signification in the signification in the signification is signification in the signification is signification in the signification is signification in the signification in the signification is signification in	FEE EXCEEDA ee schedule, all site pla additional reviews or a onal reviews. If applic pard. By signing below	neetings are necess able, additional revi	(2) consu ary, the ap iew fee pay	plicant will be requirent will be required	ired to pay the	
-	<u>.</u>	<u>.</u>	DATE			_	
INT NAME			PHONE			_	

ADDRESS_



LSL Planning, Inc.

Community Planning Consultants

November 19, 2013

Planning Commission Genoa Township 2911 Dorr Road Brighton, Michigan 48116

Attention:	Kelly Van Marter, AICP
	Assistant Township Manager and Planning Director
Subject:	Qdoba Restaurant – Special Land Use and Site Plan Review #2
Location:	Outlot of Meijer property – north side of Grand River Avenue, west of Latson Road
Zoning:	MU-PUD Mixed Use Planned Unit Development District

Dear Commissioners:

At the Township's request, we have reviewed the revised site plan (dated 7/31/13), as well as the supplemental information provided regarding the proposed development of a 2,837 square foot commercial building on an outlot in the southwest corner of the Meijer property. The building is intended for use as a Qdoba restaurant with a drive through window and outdoor seating.

As a side note, although Sheets 1 and 2 have been revised, no revision date is included in the title block. The applicant should provide a set of plans to the Township with an updated revision date so as to avoid any future confusion.

The site and adjacent properties are part of a Mixed Use PUD project, although the McDonald's restaurant to the west and the gas station to the east are zoned RCD. We have reviewed the proposal in accordance with the applicable provisions of the Genoa Township Zoning Ordinance and Master Plan.

A. Summary

- 1. The applicant should update the revision date on the site plan drawings (Sheets 1 and 2).
- 2. In our opinion, the general special land use standards of Article 19 are met; however, any issues raised by the Fire Department or Township Engineer must be addressed.
- 3. An amendment to the Lorentzen PUD is needed to accommodate the dimensional deviations proposed. In our opinion, the deviations requested do not significantly alter the intended character of the PUD.
- 4. The Planning Commission has approval authority over the building elevations.
- 5. The project does not provide the 2 required parking spaces for recreational vehicles. We suggest the applicant include this modification as part of their request to amend the PUD.
- 6. The landscape plan references an agreement with TCF Bank regarding the east side buffer zone; however, we were unable to locate the agreement in the submittal.
- 7. There is a minor discrepancy between the landscape plan and table that needs to be corrected.
- 8. The project could benefit from a pedestrian connection between the perimeter sidewalk and building entrance.
- 9. The submittal proposes 3 wall signs, while only 1 is permitted; however, a second wall sign may be allowed by the Planning Commission.
- 10. The proposed ground sign does not provide the 10-foot setback required by the Zoning Ordinance.
- 11. A trash container needs to be added to the outdoor seating area.



Aerial view of site and surroundings (looking north)

B. Proposal/Process

The Lorentzen PUD allows restaurants with drive throughs and outdoor seating as special land uses. In addition, because the development includes dimensional deviations, an amendment to the approved PUD is needed.

Following a public hearing, the Planning Commission may forward its recommendation on the special use, PUD amendment and site plan to the Township Board for their consideration.

C. Special Land Use Review

Section 19.03 of the Zoning Ordinance identifies the review criteria for Special Land Use applications as follows:

- 1. Master Plan. The Master Plan and Future Land Use Map identify the site and adjacent properties along Grand River as Regional Commercial. This classification is intended for "higher intensity commercial uses that serve the comparison shopping needs of the entire community and the regional market." Restaurants, including fast-food (drive through), are specifically identified as uses expected in Regional Commercial areas.
- **2. Compatibility.** The site is located on the north side of Grand River Avenue in an area developed with a broad range of commercial uses, including other drive through restaurants. Given the established land use pattern in the area, the proposed project is generally expected to be compatible with surrounding land uses.
- 3. Public Facilities and Services. As a property fronting Grand River Avenue and surrounded by commercial development, we are under the impression that necessary facilities and services are in place for the petitioner to access. Furthermore, the Impact Assessment notes that "all systems that being utilized were designed to handle usage in excess of this development's needs." With that being said, the applicant must address any comments provided by the Fire Department or Township Engineer with respect to this criterion.

Genoa Township Planning Commission **Qdoba** Special Land Use and Site Plan Review #2 Page 3

- **4. Impacts.** The site is located amongst other high-traffic commercial developments along the Township's primary commercial corridor and we are unaware of any sensitive environmental features that could be impacted by the proposal.
- **5. Mitigation.** If any additional concerns arise as part of this review process, the Township may require mitigation necessary to limit or alleviate any potential adverse impacts as a result of the proposed project.

D. PUD Amendment

As previously noted, a change in the dimensional requirements of a PUD requires an amendment, as opposed to variances via the ZBA. Per Section 10.11.04, such amendments are to be presented to the Planning Commission for their review and recommendation to the Township Board. The review essentially entails whether or not the proposed modifications "significantly alter the intent of the Conceptual PUD Plan."

In this instance, the applicant seeks the following modifications:

- A reduction in the rear building setback from 50' to 40';
- A reduction in the rear parking setback from 10' to 5.8'; and
- A reduction in the side parking setbacks from 10' to approximately 7'.

Generally speaking, we do not believe the proposed modifications "significantly alter" what was originally envisioned for this site. This is due to the relatively small size of the site when compared to the other outlots fronting Grand Avenue in this area, as well as the curvilinear rear lot line, which compacts the building envelope.

E. Site Plan Review

1. Dimensional Requirements. The project has been reviewed for compliance with the dimensional requirements of this PUD, as follows:

		Minimum Set	Max.			
District	Front Yard	Side Yard	Rear Yard	Parking	Height	Lot Coverage
MU-PUD	70	15	50	20 (front) 10 (side/rear)	35'	35% building 75% impervious
Proposal	74	70 (E) 62 (W)	40	20 (front) 7 (E side) 7.5 (W side) 5.8 (rear)	26'-3"	6% building 60% impervious

As noted above, the applicant seeks to amend the PUD for the rear yard building and side/rear yard parking setback deficiencies.

2. Building Materials and Design. Proposed elevations, including colors and materials, are subject to review and approval by the Planning Commission. The submittal includes revised elevation drawings for the Commission's consideration.

The predominant building material is brick, while accents include a stone base and stone columns, as well as horizontal brick accent bands. The project architect has provided material calculations demonstrating compliance with the provisions of Section 12.01 and a material and color sample board has been provided to the Township for the Commission's consideration.

Genoa Township Planning Commission **Qdoba** Special Land Use and Site Plan Review #2 Page 4

3. **Parking.** Based upon the proposed seating, the proposed restaurant requires 41 parking spaces, plus 3 short term waiting spaces for the drive through and 2 longer spaces designated for recreational vehicles. The revised site plan provides 44 parking spaces, although the 2 longer spaces are not provided. We suggest the applicant include this modification as part of their request to amend the PUD.

The parking spaces, drive aisles and number of barrier free spaces all meet the standards of Article 14, although parking spaces must be double striped or "looped."

4. Vehicular Circulation. The site will be accessed via a shared drive off of Grand River with a one-way circulation patter around the building with one ingress and two egress points.

With respect to the drive through, the revised plan provides the required number of stacking spaces, as well as a bypass lane – both of which are significant improvements over the original proposal in terms of vehicular circulation.

- **5. Loading.** Section 14.08.08 requires 1 loading space, which is to be located in a rear or side yard not directly visible to a public street. Per this standard, the revised plan identifies a 10' x 50' space at the rear of the building identified as an "after hours" loading/unloading zone.
- **6.** Landscaping. The table below is a summary of the landscaping required by Section 12.02:

Location	Requirements	Proposed	Comments
Front yard	6 canopy trees	6 canopy trees	Requirement met
greenbelt	20' width	20' width	
Parking lot	5 canopy trees	5 canopy trees	Requirement met
	2' tall hedgerow	2' tall hedgerow	
	440 s.f. of landscaped	2,261 s.f. of landscaped	
	area	area	
Buffer Zone	10 trees OR 40 shrubs	No plantings	The landscape plan references
"C"	10' width	7' width	an agreement with the adjacent
			owner (TCF), although we did
			not find one in the submittal.

There is a minor discrepancy between the landscape plan and table of plantings that needs to be corrected: the plan shows 8 Fastigate European Hornbeam trees, while the table notes 7.

- **7. Waste Receptacle and Enclosure.** The project includes a waste receptacle and enclosure northeast of the proposed building. The site plan identifies the required concrete base pad, while Sheet A301 identifies a 3-sided brick enclosure with a gate across the 4th side. Landscape screening is also provided around the enclosure.
- **8. Pedestrian Circulation.** The site plan identifies a concrete sidewalk within the Grand River right-of-way, as well as sidewalks around the perimeter of the building and an asphalt pathway along the north and west sides of the property. We suggest the applicant consider a pedestrian connection between the perimeter sidewalk and building entrance. There appears to be the potential to utilize the crosswalk striped between the barrier free spaces on the west side as a connecting point.
- **9. Exterior Lighting.** The lighting plan identifies 11 light fixtures 7 parking lot light poles, 2 decorative light poles along Grand River and 2 wall mounted fixtures near the drive through window. The lighting plan notes the use of 4 different fixture types, details of which are provided as a supplemental package.

Genoa Township Planning Commission **Qdoba** Special Land Use and Site Plan Review #2 Page 5

The photometric plan shows one reading of 10.2 footcandles near the drive through, which is just above the 10-footcandle maximum allowed. However, all other readings are well within the 10-footcandle maximum.

10. Signs. The sign package provides details for 3 wall signs and 1 ground sign. The PUD Agreement notes that 1 ground sign of up to 60 square feet and wall signs with channel cut letters are permitted.

Current sign regulations allow 1 wall sign, although a second may be permitted by the Planning Commission in accordance with Footnote 2 under Table 16.1. The third wall sign is not permitted.

The size and height of the ground sign comply with the PUD Agreement; however, it does not provide the 10-foot setback required by Article 16.

- **11. Outdoor Seating.** The project proposes 3 tables for outdoor seating with a total of 12 seats. Furniture and fencing details are included with the submittal. Our only comment is that some form of trash container needs to be included with the outdoor seating. The applicant must ensure that employees will keep the area free of debris.
- **12. Impact Assessment.** The submittal includes a revised Impact Assessment (dated 10/7/13). In summary, the Assessment notes that the project is not anticipated to adversely impact natural features, public services/utilities, surrounding land uses or traffic.

Should you have any questions concerning this matter, please do not hesitate to contact our office. I can be reached by phone at (248) 586-0505, or via e-mail at borden@lslplanning.com.

Sincerely,

Brian V. Borden, AICP

LSL PLANNING, INC.

Senior Planner

MANCUSO & CAMERON, P.C.

ATTORNEYS AND COUNSELORS

FRANK J. MANCUSO, JR.

DOUGLAS D. CAMERON

VICTORIA L. LESNER

November 21, 2013

Ms. Kelly VanMarter Assistant Manager Genoa Charter Township 2911 Dorr Road Brighton, Michigan 48116

Re:

Proposed Qdoba PUD Amendment

Lorentzen PUD

Dear Ms. VanMarter:

I have had an opportunity to review the proposed Qdoba PUD Amendment to the April 16, 1996 Lorentzen PUD Agreement. My comments are as follows:

- 1. Recitals. The Recitals of the Agreement should be modified to read as follows:
 - A. The Township and Birgit Lorentzen entered into a Planned Unit Development Agreement on April 12, 1996 (the "PUD Agreement") which was recorded on May 9. 1996, in Liber 2038, Page 0039, Livingston County Records.
 - B. The PUD Agreement was amended to redesignate industrial use to residential use consistent with MDR zoning and limiting the density to 264 units for property east of Latson Road. Said Amendment was approved by the Township Board on September 4, 2002.
 - C. The PUD Agreement was further amended on May 27, 2004 to permit a change in the PUD Concept Plan to redesign the commercial use to be compatible with the residential use east of Latson Road.
 - D. Article IX of the PUD Agreement provides that the PUD Agreement may be amended in writing by the parties to the Agreement and further provides that any reference in the PUD Agreement to the "owner" includes Birgit Lorentzen's transferees and assigns.
 - E. Owner purchased from Meijer, Inc., a transferee of Birgit Lorentzen, the parcel of land described in Exhibit A (the "Property") formerly designated in the PUD Agreement as parcel GC-2 which is contained within the property designated in the PUD Agreement as Lorentzen property west of Latson Road.
 - F. Owner and the Township desire to further amend the PUD Agreement only as it pertains to the Property to permit certain exceptions to the required setback provisions.

- 2. Under Section 1 of the proposed Amendment, all setbacks should be specified as "no less than" rather than "approximately."
- 3. I have also reviewed LSL Planning, Inc. and Tetra Tech's letters concerning their reviews of this project. I concur with all of the comments of both LSL and Tetra Tech, however, I should have the opportunity to review and comment on the Agreement between TCF Bank and the applicant regarding the east side buffer zone before the applicant receives Board approval.
- 4. Pursuant to Article I, Section 1.4 D, of the PUD Agreement, if the Planning commission approves the request, the Planning Commission is required to find that the proposed changes "will not have a material adverse impact upon surrounding land uses, services, transportation systems and/or facilities." The Planning Commission minutes should support this finding if in fact the Planning Commission approves the request.

If you should have any questions, please let me know.

Sincerely,

MANCUSO & CAMERON, PC

FJM/kdi



November 1, 2013

Ms. Kelly Van Marter Genoa Township 2911 Dorr Road Brighton, MI 48116

Re: Qdoba Site Plan Review #2

Dear Ms. Van Marter:

We have reviewed the resubmitted impact assessment, site plan documents and the letter from Southwind Restaurants and Excel Engineering dated October 10, 2013. The proposed 0.85 acre development now includes an approximate 2,837 sft building housing a Qdoba restaurant. Tetra Tech offers the following additional comments:

IMPACT ASSESSMENT

1. G. The petitioner provided records for water usage from a typical Qdoba restaurant with an average of 10,000-11,000 cft per quarter. Calculating an average of 10,500 cft/quarter * 4 quarters/year/365 days/year * 7.48 gallons/cft/260 GPD/REU = 3.3 REU's for sewer and water connection assessment. This figure is to be considered by the Township.

SITE PLAN

Sheet 1 of 2

- 1. A 167-foot-long stretch of 12" sewer is labeled as 12" storm U.D. with sock; this should be standard storm sewer.
- 2. Note included to construct bituminous ramp; need to include detail with construction plans indicating compliance with ADA accessibility requirements.
- 3. Sanitary sewer and water service lead will apparently need to go under the proposed 12" storm sewer beneath the curb line. A note should be included for the construction plans to maintain 18" clearance between these utilities.

LANDSCAPING PLAN

1. Review the location of the landscaping, as there is currently a 2.5" tree indicated almost directly above the sanitary sewer lead, with the cleanout approximately 2 feet away from the trunk of the tree. Recommend moving the sanitary service lateral to the west while in the

Ms. Kelly Van Marter Qdoba Site Plan Review #2 November 1, 2013 Page 2

parking lot. A second cleanout may be warranted at the second bend in the line as well, depending on final routing.

The petitioner has successfully addressed the primary initial concerns in recommending the site plan for approval. The above comments should be addressed prior to submitting the plan for approval to the Township Board.

Please call if you have any questions.

Sincerely,

Gary J. Markstrom, P.E. Unit Vice President

Joseph C. Siwek, P.E.

Project Engineer

copy: Kevin Egnatuk, Southwind Restaurants, LLC

Don DeGroot, Excel Engineering Inc.



Brighton Area Fire Department

615 W. Grand River Brighton, Michigan 48116 810-229-6640 Fax: 810-229-1619

November 7, 2013

Kelly VanMarter Genoa Township 2911 Dorr Road Brighton, MI 48116

RE: Qdoba Restaurant

3883 E. Grand River

Meijer Outlot

Dear Kelly:

The Brighton Area Fire Department has reviewed the above mentioned site plan. The plans were received for review on October 30, 2013 and the drawings are dated July 31, 2013 with no revision date on the site or utility plans. The project is based on a new 2,837 square foot restaurant building. The plan review is based on the requirements of the International Fire Code (IFC) 2012 edition. Previous comments appear to be addressed by the applicant in the revised submittal.

1. The building shall include the building address on the building. The address shall be a <u>minimum of 6"</u> high letters of contrasting colors and be clearly visible from the street. The location and size shall be verified prior to installation.

IFC 505.1

2. The location of a key box (Knox Box) shall be indicated on future submittals. The Knox box will be located adjacent to the front door of the structure.

IFC 506.1

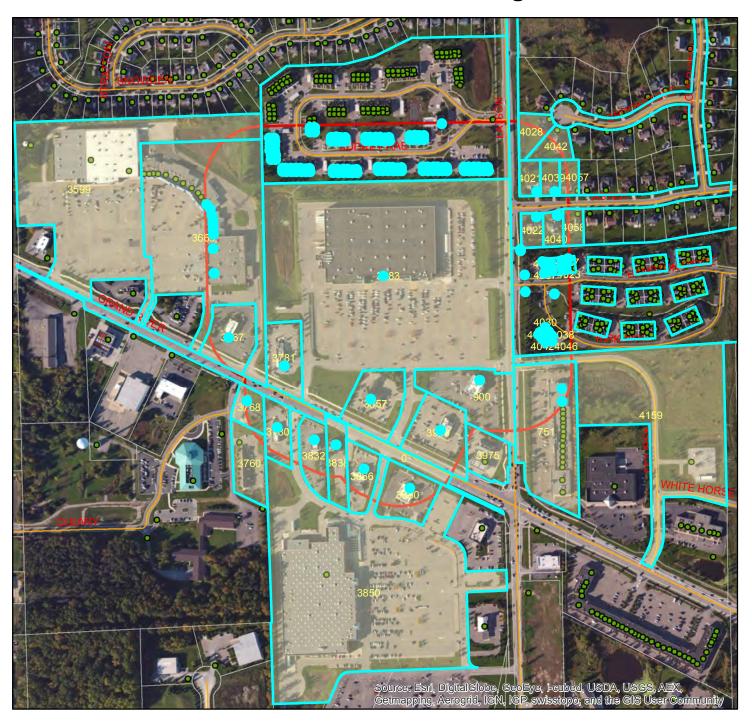
Additional comments will be given during the building plan review process (specific to the building plans and occupancy). If you have any questions about the comments on this plan review please contact me at 810-229-6640.

Respectfully yours,

Michael W. Evans, CFPS

Deputy Chief

300 Ft Buffer for Noticing









Qdoba Restaurant and Retail Building

Applicant: Kevin Egnatuk Parcel: 11-05-400-060

Meeting Date: September 9, 2013



2911 Dorr Road Brighton, MI 48116 810.227.5225 810.227.3420 fax genoa.org

November 4, 2013

To Whom It May Concern:

There will be a hearing for a Special Land Use Permit in your general vicinity on Monday, November 25 at 6:30 p.m. at Genoa Township Hall, located at 2911 Dorr Road, Brighton, Michigan.

The property in question is located at the Meijer outlot at 3883 E. Grand River, Howell. The Special Land Use has been requested for a drive through associated with a new 2,837 square foot Qdoba restaurant and retail building. The request is petitioned by Kevin Egnatuk of Southwind Restaurants, LLC.

Materials relating to this request are available for public inspection at the Genoa Township Hall during regular business hours. If you have any questions or objections in this regard, please be present at the public hearing noted above. Written comments may be addressed to the Planning Commission.

Sincerely,

Kelly VanMarter

 $Assistant\ Township\ Manager\ /\ Community\ Development\ Director\ KKV/kp$

SUPERVISOR Gary T. McCririe

CLERK

Paulette A. Skolarus

TREASURER

Robin L. Hunt

MANAGER

Michael C. Archinal

TRUSTEES

H. James Mortensen Jean W. Ledford Todd W. Smith Linda Rowell



A Franchisee of Qdoba Restaurant Corporation 109 East Broadway St.- Mt. Pleasant, MI 48858

> August 8, 2013 Revised October 10, 2013

Genoa Township Planning Commission Genoa Township 2911 Dorr Road Brighton, MI 48116

RE: Impact Statement for proposed Qdoba,

East Grand River Avenue, Howell, MI

A. Names and addresses of persons responsible for preparation

Kevin Egnatuk Don DeGroot

Southwind Restaurants, LLC Exxel Engineering, Inc.

109 East Broadway 5252 Clyde Park Avenue SW Mt. Pleasant, MI 48858 Grand Rapids, MI 49509

B. Maps & written description /analysis of the project site

This site is presently part of the overall Meijer parcel and is presently vacant. The site fronts on Grand River Avenue to the South with the Meijer entrance and parking on the West and North and a developed site to the East (Bank). The property in question would be created through the Township's land division process and would be 1.06 acres in size including Grand River R.O.W. Please refer to submitted site plan for details of site.

C. Impact on natural features

The site is presently part of what Meijer maintains as part of their lawns. Features on the site are limited to a few scattered trees 6" or less in diameter. The elevations of the site drop approximately 6 feet from Southwest to Northeast. No sensitive or regulated features exist on the site. Based on the Soil Resource report for Livingston County the soils consist of Miami Loam (MoB).

D. Impact on storm water management

As part of the original PUD, the existing stormwater management pond located to the Northwest of subject site and due West of the Meijer store was designed to accommodate the development of this parcel. A 21" storm sewer was stubbed into this parcel for the developed storm water runoff.

E. Impact on surrounding land used

The proposed use of this site consists of a 2,840 s.f. Qdoba restaurant. Impact to the surrounding area will be minimal as all infrastructures have been put in place in anticipation of development of the parcel. All activities associated with the site (noise, lighting) will be designed to conform to the Township's ordinance.

Genoa Township Planning Commission August 8, 2013 Revised October 7, 2013 Page 2

F. Impact on public facilities and services

A typical Qdoba restaurant has 3-5 employees per shift, and yearly guest counts between 100,000 and 125,000. No significant impact is expected on public schools, or fire and police protection.

G. Impact on public utilities

This development will be utilizing the existing utilities as shown on our plan submittals. We will be tapping into existing 12" watermain off Grand River Avenue, the existing 6" lateral line off of Grand River Avenue, and the existing 21" storm sewer stub which drains into the existing detention basin. An average Qdoba uses the following:

Water usage – Average quarterly use is a range of 10,000-11,000 Cubit Ft.

Natural gas - Average monthly usage is a range of 650-950 CCF

Electricity – Average monthly usage is a range of 7,000-13,000 KW/h

All systems that are being utilized were designed to handle usage in excess of this development's needs.

H. Storage and handling of any hazardous materials

There will be no hazardous material used or stored at this facility.

I. Impact on traffic and pedestrians

This development will be accessed from the current Meijer access drives and will not have any curb cuts onto Grand River Avenue. Overall traffic volumes will be minimally impacted.

Based on the attached data supplied for 3 other Qdoba restaurants, the total peak hour sales orders range from 46-62, with an average of 54. Even though a Qdoba restaurant is considered to be a fast "casual" food restaurant (no category matches this in the ITE manual), for conservative comparison, we compare the trips generated in the P.M. peak, based on the ITE Land Use Code 934-Fast Food Restaurant with drive-through window category, which is 32.65 trips/1,000 s.f. of gross floor area. Of those trips, 50% of those visits would be the average pass-by trips (Tables 5.23 & 5.24 on pages 68 & 69 of the ITE Trip Generation Manual's User's Guide and Handbook, 9th Edition).

Applying this factor to the trip generation rate reduces new trips to $16.33/1,000 \, \text{s.f.}$ in the P.M. peak. Based on the above information, the 2,840 s.f. Qdoba would generate new trips in the P.M. peak of $16.33 \, \text{x} \, 2.8 = 46$ new trips. It should be noted that this figure is certainly conservative when comparing to the actual total sales referenced above for the P.M. peak.

Genoa Township Planning Commission August 8, 2013 Revised October 7, 2013 Page 3

Parking requirements and a 10 car stack for the drive-through have been provided on the site. A waiver for the additional requirement of 2 RV spaces is requested. Ample parking spaces are available for RV patrons in close proximity. All deliveries requiring loading and unloading will be made when the restaurant is closed. A key drop is provided for this purpose.

The current walk along Grand River and blacktop walkway along the west and north property lines will be maintained for pedestrian traffic during and after construction is completed.

J. Special provisions

The site is subject to the following:

Planned Unit Development Agreement dated April 12, 1996 Genoa Township Zoning Ordinance Real Estate Option Contract between applicant and Meijer, Inc.

If you have any questions or require more information on any of the above information, please give myself, Kevin Egnatuk a call at 989-205-1136 or Don DeGroot, P.E. at Exxel Engineering, Inc. at 616-531-3660 or by email at ddegroot@exxelengineering.com

Very truly yours,
Kennlynatuk

Kevin Egnatuk

Southwind Restaurants, LLC

QMG 764 - Gaylord Sales and Guests by Hour

Fiscal 201

Period: 9 Week

		-						
Time	8/19/2013 Monday	8/20/2013 Tuesday	8/21/2013 Wednesday	8/22/2013 Thursday	8/23/2013 Friday	8/24/2013 Saturday	8/25/2013 Sunday	Total
Lunch 10:30 am - 2:	00 pm							
10:00 am - 11:00 am	3	6	1	5	0	2	2	19
11:00 am - 12:00 pm	22	17	14	34	24	16	17	144
12:00 pm - 1:00 pm	31	32	26	46	46	24	41	246
1:00 pm - 2:00 pm	41	39	36	31	36	33	25	241
Shift Total	97	94	77	116	106	75	85	650
Afternoon 2:00 pm -	5:00 pm							
2:00 pm - 3:00 pm	18	18	12	17	18	18	35	136
3:00 pm - 4:00 pm	11	17	8	17	16	11	15	95
4:00 pm - 5:00 pm	13	10	14	6	18	14	24	99
Shift Total	42	45	34	40	52	43	74	330
Dinner 5:00 pm - 8:0	0 pm							
5:00 pm - 6:00 pm	19	22	17	16	24	14	32	144
6:00 pm - 7:00 pm	19	14	30	25	21	21	26	156
7:00 pm - 8:00 pm	5	12	23	25	25	26	8	124
Shift Total	43	48	70	66	70	61	66	424
Late Night 8:00 pm -	5:00 am							
8:00 pm - 9:00 pm	7	10	13	12	9	18	14	83
9:00 pm - 10:00 pm	8	1	2	6	15	7	3	42
10:00 pm - 11:00 pm	0	0	0	0	0	4	0	4
11:00 pm - 12:00 am	0	0	0	0	0	0	0	0

QMG 725 - Airport Sales and Guests by Hour

Fiscal 201

Period: 9 Week

Time	8/19/2013 Monday	8/20/2013 Tuesday	8/21/2013 Wednesday	8/22/2013 Thursday	8/23/2013 Friday	8/24/2013 Saturday	8/25/2013 Sunday	Total
Lunch 10:30 am - 2:0	00 pm							
10:00 am - 11:00 am	3	1	3	2	4	1	0	14
11:00 am - 12:00 pm	23	24	25	24	25	9	11	141
12:00 pm - 1:00 pm	58	62	34	44	49	18	15	280
1:00 pm - 2:00 pm	38	26	19	30	35	23	22	193
Shift Total	122	113	81	100	113	51	48	628
Afternoon 2:00 pm -	5:00 pm							
2:00 pm - 3:00 pm	22	17	10	16	14	16	10	105
3:00 pm - 4:00 pm	12	11	6	17	9	7	8	70
4:00 pm - 5:00 pm	9	5	29	10	13	12	8	86
Shift Total	43	33	45	43	36	35	26	261
Dinner 5:00 pm - 8:00	0 pm							
5:00 pm - 6:00 pm	12	16	37	18	16	7	13	119
6:00 pm - 7:00 pm	13	23	61	30	11	10	14	162
7:00 pm - 8:00 pm	18	15	47	17	17	7	15	136
Shift Total	43	54	145	65	44	24	42	417
Late Night 8:00 pm -	5:00 am							
8:00 pm - 9:00 pm	11	9	26	10	11	10	5	82
9:00 pm - 10:00 pm	5	2	3	5	3	3	1	22
10:00 pm - 11:00 pm	0	0	0	0	0	0	0	0
11:00 pm - 12:00 am	0	0	0	0	0	0	0	0

QMG 685 - Okemos Sales and Guests by Hour Period: 9 Week #: 4

Fiscal Year: 2013

		- u.	oo ama o				i dilida. d ii	OOK #1. 4
Time	8/19/2013 Monday	8/20/2013 Tuesday	8/21/2013 Wednesday	8/22/2013 Thursday	8/23/2013 Friday	8/24/2013 Saturday	8/25/2013 Sunday	Total
Lunch 10:30 am - 2:0	00 pm							
10:00 am - 11:00 am	1	1	1	1	0	1	2	7
11:00 am - 12:00 pm	14	22	38	24	19	16	13	146
12:00 pm - 1:00 pm	46	37	40	54	47	19	21	264
1:00 pm - 2:00 pm	39	24	21	21	33	26	29	193
Shift Total	100	84	100	100	99	62	65	610
Afternoon 2:00 pm -	5:00 pm							
2:00 pm - 3:00 pm	12	20	14	9	23	20	14	112
3:00 pm - 4:00 pm	5	14	11	13	7	17	13	80
4:00 pm - 5:00 pm	3	10	27	10	8	16	18	92
Shift Total	20	44	52	32	38	53	45	284
Dinner 5:00 pm - 8:0	0 pm							
5:00 pm - 6:00 pm	12	20	70	13	12	17	13	157
6:00 pm - 7:00 pm	24	20	68	29	29	18	21	209
7:00 pm - 8:00 pm	18	15	41	22	23	17	23	159
Shift Total	54	55	179	64	64	52	57	525
Late Night 8:00 pm -	5:00 am							
8:00 pm - 9:00 pm	13	16	29	26	19	17	20	140
9:00 pm - 10:00 pm	7	9	16	6	15	8	0	61
10:00 pm - 11:00 pm	0	0	3	0	0	0	0	3
11:00 pm - 12:00 am	0	0	0	0	0	0	0	0

WATER DEMAND WATER GALLONS

742000 11/18/2012

754000 12/20/2012

12000

\$30.50 \$29.09

5% late fee charged if not paid by DUE DATE.

The City of Mt Pleasant's new electronic newsletters and announcements will keep you informed on what's happening in and around the City.

Sign up today at www.mt-pleasant.org Questions call 779-5322

DUE DATE 02/15/2013 TOTAL DUE \$115.73 **AFTER DUE DATE:** \$121.52

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date - postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - BLDG

Reminder:If you were sent a past due notice, payment is due February 1st

Account Number: 231-46300-00

5% late fee charged if not paid by DUE DATE.

The City of Mt Pleasant's new electronic newsletters and announcements will keep you informed on what's happening in and around the City.

Sign up today at www.mt-pleasant.org Questions call 779-5322

DUE DATE	02/15/2013
TOTAL DUE	\$15.25
AFTER DUE DATE:	\$16.01

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - LAWN

Reminder:If you were sent a past due notice, payment is due February 1st

Account Number: 231-46305-00

WATER DEMAND WATER GALLONS

754000 12/20/2012

763000 1/16/2013

9000

\$30.50 \$21.82

5% late fee charged if not paid by DUE DATE.

The City of Mt. Pleasant's new electronic newsletters and announcements will keep you informed on what's happening in and around the City.

Sign up today at www.mt-pleasant.org Questions call 779-5322

DUE DATE 03/15/2013 **TOTAL DUE** \$100.90 **AFTER DUE DATE:** \$105.95

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date - postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - BLDG

Reminder: If you were sent a past due notice, payment is due March 1st

Account Number: 231-46300-00

5% late fee charged if not paid by DUE DATE.

The City of Mt. Pleasant's new electronic newsletters and announcements will keep you informed on what's happening in and around the City.

Sign up today at www.mt-pleasant.org
Questions call 779-5322

Payments May Be Made:

* By Mail - P.O. Box 503, Mt. Pleasant, Mt. 48804-0503 (Must be received by due date - postmarks not accepted)

* At City Hall, 320 West Broadway, 8-4:30 M-F

* At City Hall Dropbox east end of parking lot behind building

* On-line at www.mt-pleasant.org

* Auto payment form available on-line

Service Address: 1529 S MISSION - LAWN

 DUE DATE
 03/15/2013

 TOTAL DUE
 \$15.25

 AFTER DUE DATE:
 \$16.01

Reminder:If you were sent a past due notice, payment is due March 1st

Account Number: 231-46305-00

WATER DEMAND WATER GALLONS

763000 1/16/2013

775000 2/15/2013

12000

\$30.50 \$29.09

5% late fee charged if not paid by DUE DATE.

The City of Mt Pleasant's new electronic newsletters and announcements will keep you informed on what's happening in and around the City.

Sign up today at www.mt-pleasant.org
Questions call 779-5322

 DUE DATE
 04/15/2013

 TOTAL DUE
 \$115.73

 AFTER DUE DATE:
 \$121.52

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - BLDG

Reminder:If you were sent a past due notice, payment is due April 4th

Account Number: 231-46300-00

5% late fee charged if not paid by DUE DATE.

The City of Mt Pleasant's new electronic newsletters and announcements will keep you informed on what's happening in and around the City.

Sign up today at www.mt-pleasant.org Questions call 779-5322

DUE DATE	04/15/2013
TOTAL DUE	\$15.25
AFTER DUE DATE:	\$16.01

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - LAWN

Reminder:If you were sent a past due notice, payment is due April 4th

Account Number: 231-46305-00

WATER DEMAND WATER GALLONS

775000 2/15/2013

790000 3/22/2013

15000

\$30.50 \$36.36

5% late fee charged if not paid by DUE DATE.

Get the most recent news and information from the City right in your inbox!
Visit www.mt-pleasant.org/news to subscribe to City eNews today.

 DUE DATE
 05/15/2013

 TOTAL DUE
 \$130.56

 AFTER DUE DATE:
 \$137.10

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - BLDG

Reminder:If you were sent a past due notice, payment is due May 2nd

Account Number: 231-46300-00

5% late fee charged if not paid by DUE DATE.

Get the most recent news and information from the City right in your inbox!

Visit www.mt-pleasant.org/news to subscribe to City eNews today.

DUE DATE	05/15/2013
TOTAL DUE	\$15.25
AFTER DUE DATE:	\$16.01

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - LAWN

Reminder:If you were sent a past due notice, payment is due May 2nd

Account Number: 231-46305-00

WATER DEMAND WATER GALLONS

790000 3/22/2013

799000 4/15/2013

9000

\$30.50 \$21.82

5% late fee charged if not paid by DUE DATE.

DUE DATE

06/17/2013

TOTAL DUE

\$100.90

AFTER DUE DATE:

\$105.95

Get the most recent news and information from the City right in your inbox! Visit www.mt-pleasant.org/news to subscribe to City eNews today.

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date - postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - BLDG

Reminder:If you were sent a past due notice, payment is due June 6th

Account Number: 231-46300-00

5% late fee charged if not paid by DUE DATE.

Get the most recent news and information from the City right in your inbox!

Visit www.mt-pleasant.org/news to subscribe to City eNews today.

DUE DATE	06/17/2013
TOTAL DUE	\$15.25
AFTER DUE DATE:	\$16.01

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - LAWN

Reminder:If you were sent a past due notice, payment is due June 6th

Account Number: 231-46305-00

75-XXXX

5% late fee charged if not paid by DUE DATE.

Starting July 1, 2013 you will be able to view the Mt Pleasant annual water quality report on-line at http://www.mt-pleasant.org/docs/dept/water/reports/2012waterreport.pdf. This report contains important information about the source and quality of your drinking water.

Please call (989) 779-5387 if you would like a paper report sent to you

 DUE DATE
 07/15/2013

 TOTAL DUE
 \$90.40

 AFTER DUE DATE:
 \$94.92

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - LAWN

Reminder:If you were sent a past due notice, payment is due July 5th.

Account Number: 231-46305-00

WATER DEMAND WATER GALLONS

799000 4/15/2013

812000 5/19/2013

13000

\$30.50 \$31.51

75-XXXX

5% late fee charged if not paid by DUE DATE.

Starting July 1, 2013 you will be able to view the Mt Pleasant annual water quality report on-line at http://www.mt-pleasant.org/docs/dept/water/reports/2012waterreport.pdf. This report contains important information about the source and quality of your drinking water.

Please call (989) 779-5387 if you would like a paper report sent to you

DUE DATE 07/15/2013 TOTAL DUE \$120.67 AFTER DUE DATE: \$126.72

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - BLDG

Reminder:If you were sent a past due notice, payment is due July 5th.

Account Number: 231-46300-00

WATER DEMAND WATER GALLONS

812000 5/19/2013

823000 6/18/2013

11000

\$30.50 \$26.67

75-6691

5% late fee charged if not paid by DUE DATE.

Automatic Payment (ACH) and Paperless Bills (Email) are available. Authorization forms may be printed from the City's website, www.mt-pleasant.org or picked up at City Hall, 320 W Broadway.
 DUE DATE
 08/15/2013

 TOTAL DUE
 \$104.74

 AFTER DUE DATE:
 \$109.99

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - BLDG

Reminder:If you were sent a past due notice, payment is due Aug 2nd.

Account Number: 231-46300-00

75-6691

5% late fee charged if not paid by DUE DATE.

Automatic Payment (ACH) and Paperless Bills (Email) are available. Authorization forms may be printed from the City's website, www.mt-pleasant.org or picked up at City Hall, 320 W Broadway.

DUE DATE	08/15/2013
TOTAL DUE	\$161.03
AFTER DUE DATE:	\$169.08

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, Mi 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - LAWN

Reminder:If you were sent a past due notice, payment is due Aug 2nd.

Account Number: 231-46305-00

WATER DEMAND WATER GALLONS

823000 6/18/2013

834000 7/22/2013

11000

\$30.50 \$26.67

5% late fee charged if not paid by DUE DATE.

Automatic Payment (ACH) and Paperless Bills (Email) are available. Authorization forms may be printed from the City's website, www.mt-pleasant.org or picked up at City Hall, 320 W Broadway.
 DUE DATE
 09/16/2013

 TOTAL DUE
 \$110.79

 AFTER DUE DATE:
 \$116.34

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - BLDG

Reminder:If you were sent a past due notice, payment is due Sept 5th

Account Number: 231-46300-00

5% late fee charged if not paid by DUE DATE.

Automatic Payment (ACH) and Paperless Bills (Email) are available. Authorization forms may be printed from the City's website, www.mt-pleasant.org or picked up at City Hall, 320 W Broadway.

DUE DATE	09/16/2013
TOTAL DUE	\$131.61
AFTER DUE DATE:	\$138.19

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - LAWN

Reminder:If you were sent a past due notice, payment is due Sept 5th

Account Number: 231-46305-00

00110110110	007000 112212010	UTUUUU UH 1812U 19	11000	461.12
WATER DEMAND				\$30.50
WATER GALLONS	834000 7/22/2013	845000 8/19/2013	11000	\$26.67
				+

5% late fee charged if not paid by DUE DATE.

Automatic Payment (ACH) and Paperless Bills (Email) are available.
Authorization forms may be printed from the City's website,
www.mt-pleasant.org or picked up at City Hall, 320 W Broadway.

 DUE DATE
 10/15/2013

 TOTAL DUE
 \$110.79

 AFTER DUE DATE:
 \$116.34

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - BLDG

Reminder:If you were sent a past due notice, payment is due Oct. 3rd

Account Number: 231-46300-00

Automatic Payment (ACH) and Paperless Bills (Email) are available.
Authorization forms may be printed from the City's website,
www.mt-pleasant.org or picked up at City Hall, 320 W Broadway.

 DUE DATE
 10/15/2013

 TOTAL DUE
 \$66.16

 AFTER DUE DATE:
 \$69.47

Payments May Be Made:

- * By Mail P.O. Box 503, Mt. Pleasant, MI 48804-0503 (Must be received by due date postmarks not accepted)
- * At City Hall, 320 West Broadway, 8-4:30 M-F
- * At City Hall Dropbox east end of parking lot behind building
- * On-line at www.mt-pleasant.org
- * Auto payment form available on-line

Service Address: 1529 S MISSION - LAWN

Reminder:If you were sent a past due notice, payment is due Oct. 3rd

Account Number: 231-46305-00



PLEASE DO NOT SEND THIS PAGE WITH YOUR PAYMENT. THANK YOU



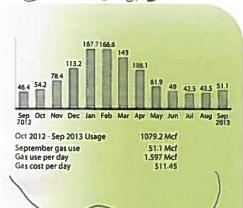
SOUTHWIND RESTAURANT LLC 109 E BROADWAY ST MOUNT PLEASANT MI 48858-2312

LANSING, MI 48937-0001

Account Number: 1000 5559 7650

Due: 10/10/13 Enclosed: Total: \$2,715.48

OKEMOS GAS



Lighting Efficiency Pays Every Day: Lighting accounts for 30 to 60 percent of annual electric costs for most businesses. Consumers Energy offers incentives that make It easy to switch to energy efficient lighting. Visit www.ConsumersEnergy.com/mybusiness and choose "Lighting."

AVE MO USAGE =

890 CCF (CONVERTED FROM MCF)



Visit: www.ConsumersEnergy.com Call us: (800) 477-5050

14 EBILL DW13

GAYLORD GAS



Usage History

Account Number: 5403 739 0005

Service Address: 826 W MAIN ST STE Q'DOBA GAYLORD, MI 49735-1902

Usage History As of: 10/18/2013 8:40

Billing Period	Description	Meter Reading	Days Billed	Usage	Amount Billed
Aug 27, 2013 - Sep 26, 2013	Gas Commercial Heating	13626 Actual - 13076 Actual	30	550_	\$458.74
Jul 29, 2013 - Aug 27, 2013	Gas Commercial Heating	13076 Actual - 12557 Actual	29	519	\$434.21
Jun 25, 2013 - Jul 29, 2013	Gas Commercial Heating	12557 Actual - 12003 Actual	34	554	\$475.20
May 28, 2013 - Jun 25, 2013	Gas Commercial Heating	12003 Actual - 11520 Actual	28	483	\$417.94
Apr 29, 2013 - May 28, 2013	Gas Commercial Heating	11520 Actual - 10875 Actual	29	645	\$548.50
Mar 27, 2013 - Apr 29, 2013	Gas Commercial Heating	10875 Actual - 9895 Actual	33	980	\$813.71
Feb 27, 2013 - Mar 27, 2013	Gas Commercial Heating	9895 Actual - 8774 Estimated	28	1121	\$916.58

AVE MO USEAGE =



TRAVERSE CITY-AIRBORT RD. GAS

Usage History

Account Number:

5403 739 0003

Service Address: Usage History As of: 1288 W SOUTH AIRPORT RD STE B TRAVERSE CITY, MI 49686-4717

10/18/2013 8:28

sage History	Decembration	M-A		The second second
illing Period	Description	Meter Reading	Days Billed	Usage
ug 20, 2013 - Sep 19, 2013	Gas Choice Commercial	20026 Actual - 19465 Actual	30	561 —
ul 22, 2013 - Aug 20, 2013	Gas Choice Commercial	19465 Actual - 18903 Actual	29	562
un 19, 2013 - Jul 22, 2013	Gas Choice Commercial	18903 Actual - 18265 Actual	33	638
lay 21, 2013 - Jun 19, 2013	Gas Choice Commercial	18265 Actual - 17680 Actual	29	585
pr 22, 2013 - May 21, 2013	Gas Choice Commercial	17680 Actual - 17038 Actual	29	642
ar 26, 2013 - Apr 22, 2013	Gas Choice Commercial	17038 Actual - 16280 Actual	27	758
ar 21, 2013 - Mar 26, 2013	Gas Choice Commercial	16280 Actual - 16155 Actual	5	125
eb 22, 2013 - Mar 21, 2013	Gas Choice Commercial	16155 Actual - 15238 Actual	27	917
n 22, 2013 - Feb 22, 2013	Gas Choice Commercial	15238 Actual - 14118 Actual	31	1120
ec 18, 2012 - Jan 22, 2013	Gas Choice Commercial	14118 Actual - 13069 Actual	35	1049
ov 19, 2012 - Dec 18, 2012	Gas Choice Commercial	13069 Actual - 12254 Actual	29	815
ct 18, 2012 - Nov 19, 2012	Gas Choice Commercial	12254 Actual - 11468 Actual	32	786
ep 19, 2012 - Oct 18, 2012	Gas Choice Commercial	11468 Actual - 10870 Actual	29	598
ıg 17, 2012 - Sep 19, 2012	Gas Choice Commercial	10870 Actual - 10170 Actual	33	700
ul 20, 2012 - Aug 17, 2012	Gas Choice Commercial	10170 Actual - 9483 Actual	28	687
ın 20, 2012 - Jul 20, 2012	Gas Choice Commercial	9483 Actual - 8868 Actual	30	615
ay 21, 2012 - Jun 20, 2012	Gas Choice Commercial	8868 Actual - 8187 Actual	30	681
or 19, 2012 - May 21, 2012	Gas Choice Commercial	8187 Actual - 7465 Actual	32	722
ar 22, 2012 - Apr 19, 2012	Gas Choice Commercial	7465 Actual - 6639 Actual	28	826

Choose from a variety of ways to pay your bill. See the back for payment options, which include Auto-pay with checking/savings, online, at an authorized pay agent, by phone and more. Auto-pay with Visa or MasterCard is a residential payment option.

Learn more at www.ConsumersEnergy.com/waystopay

In case of an emergency, call us immediately day or night at 1-800-477-5050.



LANSING, MI 48937-0001

SOUTHWIND RESTAURANT LLC 109 E BROADWAY ST MOUNT PLEASANT MI 48858-2312

Account Number: 1000 5559 7650

Due: 10/10/13 Enclosed:

Total: \$2,715.48

include Corrections/Comments on Back

OKEMOS ELECTRIC

Detail of Current Charges

Elec Gen Sec Rate GS Com

Rate: 1100

Meter Number: \$310555 POD: 0000000609956
Meter Begin Read: 52523 Meter End Read: 67958
Read Type: estimate

Total Metered Energy Use: 15435 kWh

 Electric Power Supply Charges
 15435 © 0.099744
 51,539.55

 Energy
 15435 © 0.001570 524,23

 Renewable Energy
 57,20

Total Electric \$2,195.47



Oct 2012 - Sep 2013 Usage 149837 kWh
September electric use 15435 kWh
Electric use per day 482 kWh
Electric cost per day 568.61

Gas Gen Serv Rate GS-1 - Com Cust Choice

Rate: 277

Meter Number: 35100799 POD: 0000000609957
Meter Begin Read: 29205 Meter End Read: 29716
Read Type: estimate
Differential: 511 Constant: 0.1
Correction factor: 1,00000

Total Metered Energy Use: 51.1 Mcf

Gas Charges	-	-	
Customer Charge			\$11.65
Gas Distribution	51.10	2.178400	5111.32
Energy Efficiency	51.1 0	0.221900	\$11,34
Lakeshore Energy Services	88/200	-3788	
Supplier Charge CPA	51.10	4.540000	\$231.99
Total Gas			\$366.30

Summary of Charges

Account Number: 1000 5559 7650

Service:

SOUTHWIND RESTAURANT LLC 1941 W GRAND RIVER AVE #B OKEMOS MI 48864-1701

Last Month's Account Balance \$2,340.39
Payment 09/10/13 - Thank You \$2,340.39Balance Forward \$0.00

Payments applied after Sep 18, 2013 are not included.

 Total Electric
 \$2,195.47

 Total Gas
 \$366.30

 Sales Tax
 \$153.71

 Total Energy Charges
 \$2,715.48

Total Amount Due \$2,715.48

Total amount due will be deducted from your designated account on the due date.

Applicable Programs Direct Pay

 Billing Period
 08/17/13 - 09/17/13

 Bill Month
 September

 Days Billed
 32

 Invoice
 2028/1595475

Your next scheduled meterread date is on or around 10/16/2013.

Your payment is due October 10, 2013. After the due date, the unpaid balance is subject to a 2% late payment charge.

News You Can Use

Your bill Includes a monthly per meter charge per MPSC order U-17377 on July 29, 2013, to support the Low-Income Energy Assistance Fund (LIEAF).

Consumers Energy is committed to protecting customer Information and data privacy. To review or comment on our proposed Customer Data Privacy tariff, please see Case U-17102 at http://efie.mpsc.state.mi.us/efile/viewcase.php?casenum=17102.

Questions about your bill? Get an explanation of all charges and learn more about the sections of your bill at www.ConsumersEnergy.com/business.

Sign up for our valuable eNewsletter: Learn smart ways other businesses are saving every month. The eNewsletter covers energy saving tips, rebate incentive updates and much more. Visit www.ConsumersEnergy.com/mybusiness and choose "Evaluation Tools."

FREE facility energy assessment online. Spend a few minutes with our Online Facility Assessment Wizard and uncover a wealth of information that can lower your energy costs, increase efficiency and improve your bottom line. Visit www.ConsumersEnergy.com/mybusiness and choose "Evaluation Tools."



Visit: www.ConsumersEnergy.com Call us: (800) 477-5050

AVE MO USAGE = 12,750 KWh



KING FOODS INC 109 E BROADWAY ST **MOUNT PLEASANT MI 48858-2312**

Account Number: 1000 6535 1502

GAYLORD

Due: 10/02/13 Enclosed:

Total: \$1,810.86

Include Corrections/Comments on Back

FLECTRIC **Summary of Charges**

Account Number: 1000 6535 1502

Service:

KING FOODS INC 826 W Main St

Gaylord MI 49735-1902

Last Month's Account Balance \$1,727.90 Payment 09/03/13 - Thank You \$1,727.90-**Balance Forward** \$0.00

Payments applied after Sep 10, 2013 are not included.

Sales Tax	\$102.50
Total Energy Charges	\$1,810.86

Total Amount Due \$1.810.86

Total amount due will be deducted from your designated account on the due date.

Applicable Programs Direct Pay

Billing Period 08/09/13 - 09/09/13 Bill Month September **Days Billed** 32 Invoice 206253427568

Your next scheduled meter read date is on or around 10/08/2013.

Your payment is due October 02, 2013. After the due date, the unpaid balance is subject to a 2% late payment charge.

News You Can Use

If Consumers Energy is your natural gas provider, call us immediately at (800) 477-5050 in a gas emergency. To report an electric outage or if you have questions about Consumers Energy billing, rates or services call: (800) 805-0490 or visit us at www.ConsumersEnergy.com.

Your bill includes a monthly per meter charge per MPSC order U-17377 on July 29, 2013, to support the Low-Income Energy Assistance Fund (LIEAF).

Consumers Energy is committed to protecting customer information and data privacy. To review or comment on our proposed Customer Data Privacy tariff, please see Case U-17102 at http://efile.mpsc.state.mi.us/efile/viewcase. php?casenum=17102.

Questions about your bill? Get an explanation of all charges and learn more about the sections of your bill at www.ConsumersEnergy.com/business.

Sign up for our valuable eNewsletter: Learn smart ways other businesses are saving every month. The eNewsletter covers energy saving tips, rebate incentive updates and much more. Visit www.ConsumersEnergy.com/mybusiness and choose "Evaluation Tools."

Detail of Current Charges

Elec Gen Sec Rate GS Com

Rate: 1100

Meter Number: 73337544 POD: 0000004129087 Meter Begin Read: 51361 Meter End Read: 63247

Read Type: actual

Total Metered Energy Use: 11886 kWh

Electric Power Supply Charges

Lifergy	11000 @ 0.033/44	91,103.30
PSCR	11886@ 0.001570-	\$18.66-
Renewable Energy		\$7.20
Electric Delivery Charges		
System Access		\$20.00
Distribution	11886@ 0.037011	\$439.91
Energy Efficiency		\$48.76
Securitization	11886@ 0.001387	\$16.49
Securitization Tax	11886@ 0.000682	\$8.11

Total Electric

Low-Income Assist Fund

\$1,708.36

\$0.99



Oct 2012 - Sep 2013 Usage 114101 kWh September electric use 11886 kWh Electric use per day 371 kWh Electric cost per day \$53.39

AVE. MONTHLY
USAGE

9,764 KWA)

TRAVERSE CITY

CHERRYLAND ELECTRIC COOPERATIVE ATRPORT RD

Office: 5930 U.S. 31 South, Grawn, MI

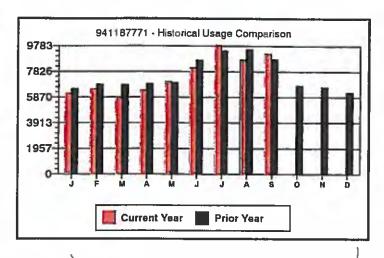
ELECTRIC	
----------	--

MONTHLY COMPARISONS				
941187771 Current Same Period Month Last Year				
Days of Service	31	31		
Total kWh	9149	8728		
Avg kWh Day	295	281		

Availability Charge helps cover the fixed costs incurred by the cooperative to serve a member regardless of the amount of electricity used by that member.

Power Supply Cost Recovery (PSCR) is used to equalize the difference between the cooperative's fixed retail energy rate and the actual cost paid for wholesale power. As a nonprofit organization Cherryland cannot over or under collect more than its actual cost of energy.

Current rate schedules and billing practices are available online at www.cherrylandelectric.com or will be mailed upon request.



AVERAGE MO USAGE =

HOURS:

7:30 AM - 4:00 PM MONDAY - FRIDAY

PHONE:

231-486-9200 LOCAL or 1-800-442-8616 TOLL FREE

WEBSITE:

WWW.CHERRYLANDELECTRIC.COM

Cherryland Electric Cooperative is a member regulated utility



Cherryland Electric Cooperative

Cherryland Electric Coop

A Touchstone Energy Partner 5930 US 31 South PO Box 500 Grawn MI 49637-0500

Office Hours: Monday - Friday 7:30 to 4:00
Questions, Concerns and To Report an Outage call
231-486-9200 Local Traverse City Exchange
1-800-442-8616 Toll Free
Fax: 231-486-9404 Web address http://www.cherrylandelectric.com

7999 1 MB 0.405 SOUTHWIND RESTAURANT LLC GREG JOHNROE 109 E BROADWAY ST MT PLEASANT MI 48858-2312

4 7999 C-26 P-35

Billing Date	09/25/2013	5025300 10/20/2013	
REGU	REGULAR		
Amount Due After Due Date	1186.78	Amount Due	1133.32
Service Addres		AIRPORT RD/EAS	Т

** COOPERATIVE NEWS **

DEADLINE TO APPLY FOR 2013 MICHIGAN HOME HEATING CREDIT IS 9/30/13, CHECK MICHIGAN.GOV/TAXES (FORM MI1040CR-7) OR CALL 517-636-4486 FOR MORE INFORMATION.

Historical Usage Comparison Provided on Back of Bill

revious Meter Reading	Reading	Ending Meter Reading	Silver and residence from	Monthly Name Access to the	AND SAME AND
Date Reading	Type	Date Reading	Reading Type	Energy Used	Totals
· · · · · · · · · · · · · · · · · · ·					1079.06 -1079.06 0.00
/20/13 82592 ERGY CHARGE CR ADJUSTMENT GE	ACTUAL 9149 © C	09/20/13 91741 X 0.104030).00775/KWH	ACTUAL	91 4 9 KWH	951.77 70.90 34.50 12.00 64.15 1133.33
֡	YMENT 09/13/13 MENT PHASE	YMENT 09/13/13 MENT PHASE /20/13 82592 ACTUAL ERGY CHARGE 9149 CR ADJUSTMENT @ C	VMENT 09/13/13 MENT PHASE /20/13 82592 ACTUAL 09/20/13 91741 ERGY CHARGE 9149 X 0.104030 CR ADJUSTMENT @ 0.00775/KWH	VMENT 09/13/13 MENT PHASE /20/13 82592 ACTUAL 09/20/13 91741 ACTUAL ERGY CHARGE 9149 X 0.104030 CR ADJUSTMENT @ 0.00775/KWH	VMENT 09/13/13 MENT PHASE /20/13 82592 ACTUAL 09/20/13 91741 ACTUAL 9149 KWH ERGY CHARGE 9149 X 0.104030 CR ADJUSTMENT @ 0.00775/KWH

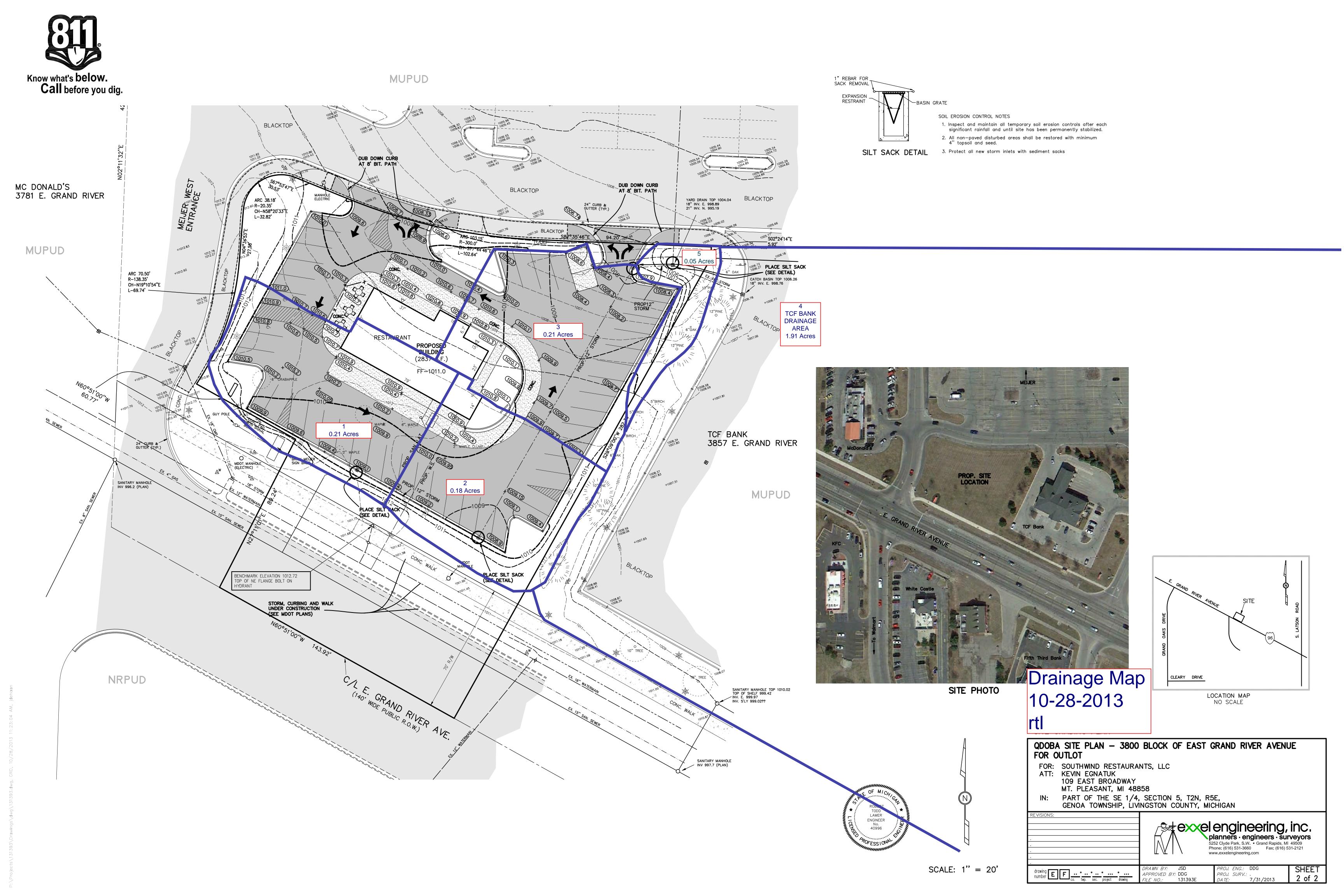
OFF BACK COP ABBITORIA MARCHANIA

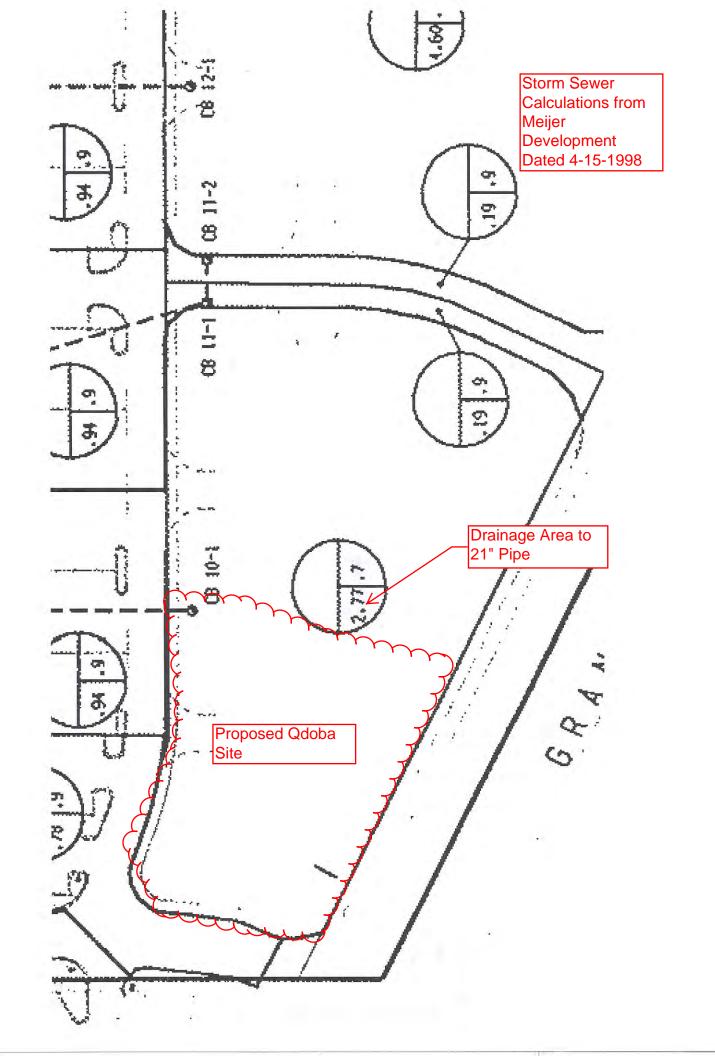


Project: Qdoba File #: 131393E

Date: October 28, 2013

Design Criteria: Based		convention ds for a		year stor	m even
Runoff Coefficients, C					
Grass	0.15				
Pavement	0.9				
From CB#	1	2	3	4	5
To CB#	2	3	5	5 2	21" Stm
Acres of:					
Grass	0.04	0.06	0.04	0.03	0.05
Pavement	0.17	0.12	0.17	0	0
Total	0.21	0.18	0.21	1.94	0.05
C-Adjust Total DA	0.76	0.71	0.73	0.69	0.69
Total Drainage					
Area, A	0.21	0.39	0.60	1.94	2.59
Time, t (min.)	15	15	15	15	15
Intensity, i	4.38	4.38	4.38	4.38	4.38
Flow, Q=CiA (CFS)	0.70	1.21	1.91	5.88	7.81
Slopes for:					
Concrete Pipe					
12 inch	0.3	0.3	0.3		
18 inch				0.31	
21 inch					0.24
Proposed Slope	0.6	0.6	12.6	0.0	0.3





င္ပ	21"
nec	Sto
ction	3
_	Sew
	Ф

FROM	то	AREA	c	A*C INDIV.	TOTAL A*C	TIME ACCUM. min.	RAIN INTENSITY in/hr 175/T + 25	CAPACITY REQUIRED cfs	PIPE SIZE IN	PIPE SLOPE %	FULL FLOW CAPACITY cfs	The second second	SEWER LENGTH ft.	FLOW TIME min.
		1.00	0.00	0.90	0.90	15.00	4.38	3.938	15.00	0.37	3.940	3.20	163	0.85
OB 16	OB 12	1.00	0.90	0.90	0.90	15.00	4,30	5,950	10.00	1	0.040	0.20	1,00	
OB 12-1	GB 12	4.60	0.70	3.22	3.22	15.00	4.38	14.088	24.00	0.4	14.346	4.55	161	0.59
(615)	CIE TO	0.94	0.90	0.85	4.97	15.85	4.28	21.275	27/00	0.48	21.514	5.40	227	0.70
						in the second						0.55	- 10	0.00
CB 114.2	CB 11-1	0.19	0.90	0,17	0.17	15.00	4.38	0.748	12.00	- 0.32	2.021	2.57	43	0.28
CB/11_II	OB/HI	0.19	0.90	0.17	0.34	15.28	4.34	1.486	12:00	0.32	2.021	2.57	182	1.18
OB 11	CB 10	0.94	0.90	0.85	6.15	16.55	4.21	25,920	30:00	0.4	26.011	5.28	195	0.62
		0.77	0.70	1.94	1,94	15.00	4.38	8,483	21.00	0.74	8.702	3.61	161	0.74
(CE 10) ii		2.77	0.70	1.94	1.94	15.00	4,30	1000			0.102			
ØE 10	CB 9	0.94	0.90	0.85	8.94	17.16	4.15	37,100	36,00	0.31	37.235	5.25	172	0.55
OB-9	CB 2	0.78	0.90	0.70	9.64	17.71	4.10	39.503	-36 00	0.85	39.565	5.58	152	0.45
(CIE/ 8	CB 7	1.00	0.90	0.90	0.90	15.00	4.38		J 18 00.	0.2	4.710	2.66	210	1.32
70B 7-1	087	0.97	0.20	0.19	0.19	15.00	4.38	Maria de la companya della companya	PS 12 00	0.32	2.021	2.57	57	0.37
		0.01							5					
OB 7	GB 6	0.95	0.90	0.86	1.95	16.32	4.24	0.200	C) 21 00	0.27	8.255	3.42	201	0.98
CB16-1	CB.6	0.36	0.20	0.07	0.07	15.00	4.38	0.315	12.00	0.512	2.021	2.57	112	0.73
	OB 5	1.05	0.90	0.95	2.97	17.30	4.14	12.272	Ž _{27.00} -	0.16	12.421	3.12	163	0.87
(C) 3 (5)		1.77	0.90	1.59	4.56	18.17	4.05	18.482	30.00 €	0.21	18.847	3.83	227	0.99
OB 4	O Second	1.97	0.90	1.77	6.33	19.16	3.96	25.095	∨ 30.00	0.38	25.352	5.15	195	0.63
CE S		1.85	0.90	1.67	8.00	19.79	3.91	31.248	= 36.00	0.22	31,368	4.43	162	0.61
OB 2	GB 1	0.81	0.90	0.73	18,37	20.40	3.85	70,803	42.00	9.5	71.332	7.39	85	0.19
*0B%	OUTLET	0.60	0.80	0.48	18.85	20.59	3.84	72.348	42.00	0.52	72.744	7.54	60	0.13

STATE OF MICHIGAN

COUNTY OF LIVINGSTON

TOWNSHIP OF GENOA

AMENDMENT TO PLANNED UNIT DEVELOPMENT AGREEMENT RELATIVE TO MEIJER OUTLOT

PMENT AGREEMENT is made
, 2013, by SOUTHWIND
aving its principal office at 109
the TOWNSHIP OF GENOA, a
oad, Brighton, Michigan 48116

RECITALS:

- A. The Township and Birgit Lorenzen entered into a Planned Unit Development Agreement (the "PUD Agreement") on April 12, 1996, which was recorded on May 9, 1996, in Liber 2038, Page 0039 of Livingston County Records.
- B. The Owner has purchased from Meijer, Inc. a parcel of land situated in the Township of Genoa, Livingston County, Michigan, as more fully described in Exhibit "A" (the "Property").
- C. The Owner and Township desire to amend the PUD Agreement to permit certain exceptions to the required setback provisions.

NOW, THEREFORE, OWNER AND TOWNSHIP, in consideration of the mutual promises contained in this amendment and in the PUD Agreement, HEREBY AGREE AS FOLLOWS:

- 1. The Property shall be developed in accordance with the PUD Agreement and all amendments to the PUD Agreement, if any, except for the following:
 - a. The rear yard setback at the northwest corner of the building located on the Property shall be approximately 40' as depicted on the drawing attached as Exhibit B.
 - b. Along the north property line, the four parking spaces shall be setback 5.8' and the dumpster enclosure shall be approximately 2.5' from the property line as shown on Exhibit B.
 - c. The parking setback for the southerly two parking spaces along the western edge of the Property shall be approximately 7.5' as depicted on Exhibit B.
 - d. The parking setback on the east side of the Property shall be approximately 7' as shown on Exhibit B.
 - e. The building shall have three (3) exterior signs affixed to the south, west and north walls as depicted on Exhibit C.

	d Unit Development Agreement was approved by the, 2013, at a meeting duly called and
IN WITNESS WHEREOF, the und Unit Development Agreement as of the day	dersigned have executed this Amendment to Planned y and year first above written.
	OWNER: Southwind Restaurants, LLC
	By:
	Its:
	TOWNSHIP: Township of Genoa
	Ву:

STATE OF MICHIGAN)			
COUNTY OF) SS)			
		acknowledged before me this		
of Southwind Restaurants, LLC, company.	a Mic	the chigan limited liability company, on behal	lf of	the
		Notary Public, State of, County of My Commission Expires:		
STATE OF MICHIGAN)) SS			
COUNTY OF)			
		acknowledged before me this, the	•	
of the Township of Genoa, a Michi	gan mu	nicipal corporation, on behalf of the company	· .	
		Notary Public, State of, County of My Commission Expires:		
Drafted by, and when				

Drafted by, and when Recorded return to:

Steven J. Morren Varnum LLP Bridgewater Place P.O. Box 352 Grand Rapids, MI 49501-0352 6499392_2.DOCX

EXHIBIT A

(the Property)

Part of the SE 1/4, Section 5, T2N, R5E, Genoa Township, Livingston County, Michigan, described as: Commencing at the SE corner of said Section 5; thence N02°11'26″E 548.49 feet along the East line of said SE 1/4 to the centerline of Grand River Avenue; thence N60°51'00″W 1027.33 feet along said centerline to the PLACE OF BEGINNING of this description; thence N60°51'00″W 143.92 feet along said centerline; thence N27°11'01″E 89.24 feet; thence N60°51'00″W 60.77 feet; thence Northeasterly 70.50 feet along a 138.35 foot radius curve to the left, the chord of which bears N19°10'54″E 69.74 feet; thence N04°34'53″E 27.58 feet; thence Northeasterly 38.18 feet along a 20.35 foot radius curve to the right, the chord of which bears N58°20'33″E 32.82 feet; thence S67°53'47″E 30.53 feet; thence Southeasterly 103.15 feet along a 300.00 foot radius curve to the left, the chord of which bears S77°44'46″E 102.64 feet; thence S87°35'46″E 94.20 feet; thence S02°24'14″W 5.92 feet; thence S29°09'00″W 282.30 feet to the place of beginning.

EXHIBIT B

(Drawing depicting location of revised setback requirements)

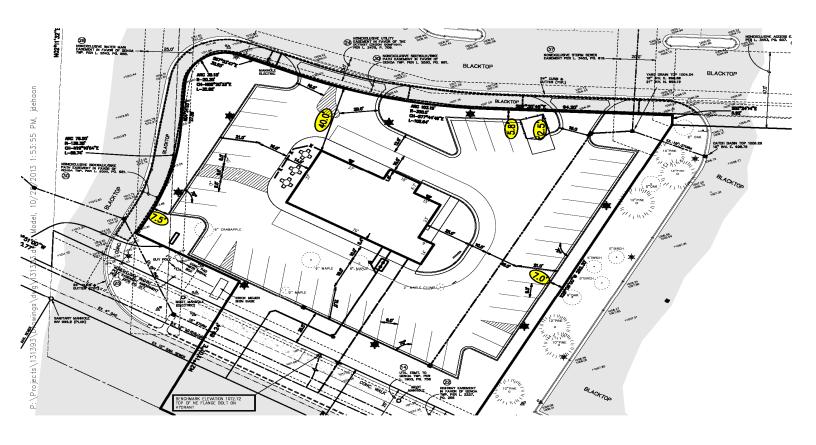
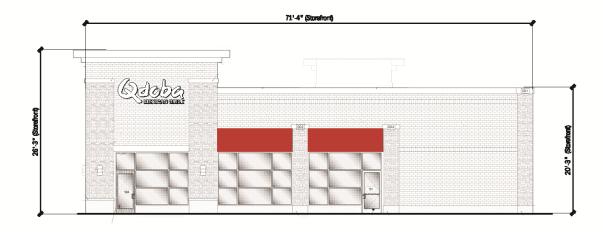


EXHIBIT C

(Depiction of Three Exterior Building Signs)



Building Elevation - South - Facing Grand River

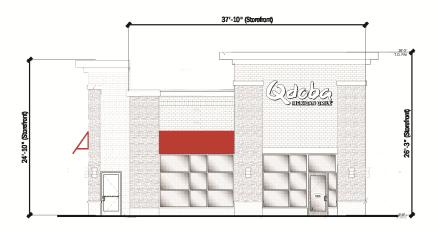
Scale: 1/8"=1'-0"



 Salesman:
 Todd Hefner

 Designer:
 Trent Schultz

 PB17.625.4323
 FB17.625.2123
 P817.625.4323 F817.625.2123 Printing Note: Illustration to be www.awningandsign.com printed on 8 ½ x 14" Legal paper.



Building Elevation - West - Facing Meijer Entry way

Scale: 1/8"=1'-0"

cay anows;

Monument: 72 sq. ft. max, 6' tall max, 10' setback

1 wall sign allowed at 10% of facade or 100 sq. ft. max

2nd sign allowed if located on a corner facing a street

3rd A variance would be required, city stated there may not be too much resistance as there have been other variances granted in this comidor



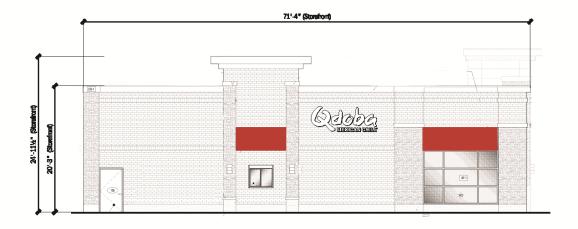
Design No.:	13-0127r10
Date:	October 25, 2013
Sheet:	I of 6
Location:	3883 E. Grand River Ave
City/State:	Howell, MI

Contact Information:Salesman: Todd Hefner Trent Schultz P817.625.4323 F817.625.2123 www.awningandsign.com

Final electrical connection note: Customer is responsible for retaining a licensed electrician to complete final connection. Printing Note: Illustration to be printed on 8 ½ x 14* Legal paper.

The information contained in this Document and the Design work are the sole Property of National Awning & Sign, LLC and may not be copied distributed or made available to others without expressed written consent of National Awning & Sign, LLC.

Final Approvals Customer: Salesman: Project Manager:



Building Elevation - North - Facing Meijer Building

Scale: 1/8"=1'-0"

Cay arows; Monument: 72 sq. ft. max, 6' tall max, 10' setback 1 wall sign allowed at 10% of facade or 100 sq. ft. max 2nd sign allowed if located on a corner facing a street 3rd A variance would be required, city stated there may

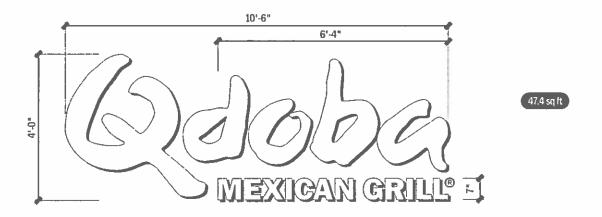


Design No.: Date: Sheet: |3-0127r10 | | October 25, 2013 | 3 of 6 Location: City/State: 3883 E Grand River Ave Howell, MI

Contact Information: Salesman: Todd Hefner Designer: Trent Schultz
P817.625.4323 F817.625.2123 www.awningandsign.com Final electrical connection note:
Customer is responsible for retaining a licensed electrician to complete final connection.
Printing Note: Illustration to be printed on 8 ½ x 14* Legal paper.

The Information contained in this Document and the Design work are the sole Property National Awaning & Sign, LLC and may not be copied distributed or made available to others without expressed written consent of National Awaning & Sign, LLC.

Final Approvals Customer: Project Manager:



Channel Letter Elevation

Scale: 1/2"=1'-0"

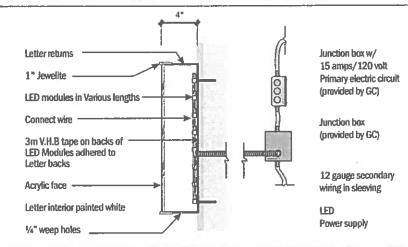
Fabricated .063 aluminum backs with .040 pre-finished black returns

White Plexiglas faces retained with 1" Black Jewelite retainers

Internally illuminated with White LED's

UL labels required

Registration mark: '4' Clear Lexan w/ 1st surface applied black viryl Backed W/ White viryl behind register only Mounted to back of letter



Scale: N/A



Design No.: 13-0127r10 Date: October 25, 2013
Sheet: 4 of 6
Location: 3883 E. Grand River Ave
City/State: Howell, MI

Contact Information:
Salesman: Todd Hefner
Designer: Trent Schultz

R817.625.4323 E817.625.2123 www.awningandsign.com

Final electrical connection note: Customer is responsible for retaining a licensed electrician to complete final connection.

Printing Note: Illustration to be printed on 8 1/2 14" Legal paper.

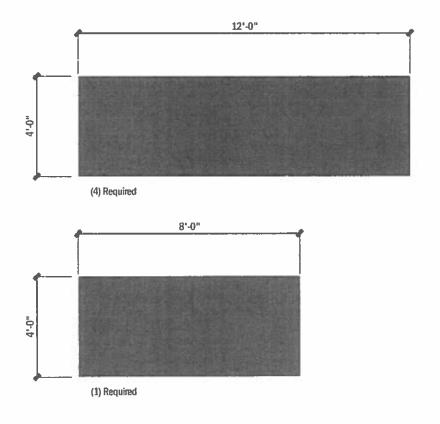
The information contained in this Document and the Design work are the sole Property of National Awning & Sign, LLC and may not be copied distributed or made available to others without expressed written consent of National Awning & Sign, LLC.

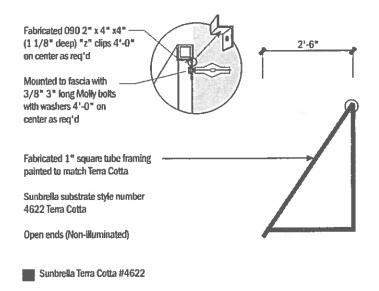
Final Approvals

Customer:

Salesman:

Project Manager:





Awning Elevations

Scale: 3/8"=1'-0" End View - Details

Scale: 1/2"=1'-0"



13-0127r10¶ Design No.: Date October 25, 2013 Sheet 5 of 6 3883 E. Grand River Ave Location: City/State:

Contact Information: Todd Hefner Salesman: Trent Schultz Designer: P817.625.4323 F.817.625.2123 Howell Mi www.awningandsign.com Final electrical connection note: Customer is responsible for retaining a licensed electrician to complete final connection.

Printing Note: Illustration to be printed on 8 1/2"x 14" Legal paper.

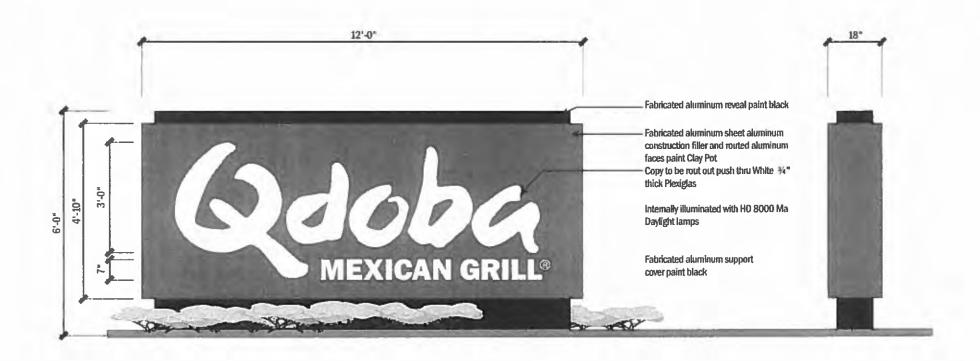
The information contained in this Document and the Design work are the sole Property of National Awning & Sign, LLC and may not be copied distributed or made available to others without expressed written consent of National Awning & Sign, LLC.

Final Approvals

Customer:

Salesman

Project Manager:



Pylon Sign Elevation

Scale: 1/2"=1'-0"

End View



 Design No.:
 13-0127r10

 Date:
 October 25, 2013

 Sheet:
 6 of 6

 Location.
 3883 E. Grand River Ave

 City/State:
 Howell, MI

Contact Information:
Salesman: Todd Hefner
Designer: Trent Schultz

P817.625.4323 F.817.625.2123 www.awningandsign.com

Final electrical connection note: Customer is responsible for retaining a licensed electrician to complete final connection.

Printing Note: Illustration to be printed on 8 1/2"x 14" Legal paper

The information contained in this Document and the Design work are the sole Property of National Awning & Sign, LLC and may not be copied distributed or made available to others without expressed written consent of National Awning & Sign, LLC.

Final Approvals

Customer

Salesman:

Project Manager:

ESMT. FOR INGRESS & EGRESS PER L. 1903, PG. 751 & L. 2632, PG. 638

NONEXCLUSIVE WATER MAIN EASEMENT IN FAVOR OF GENOA — TWP. PER L. 2543, PG. 956.

MUPUD

NONEXCLUSIVE UTILITY

EASEMENT IN FAVOR OF THE DETROIT EDISON COMPANY, PER L. 2475, P. 709.

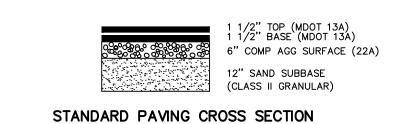
BLACKTOP

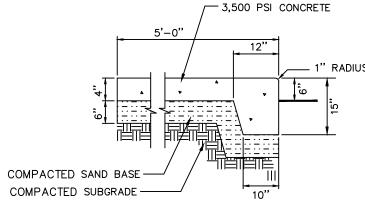
1006.13

SAWCUT AND REMOVE CURB.

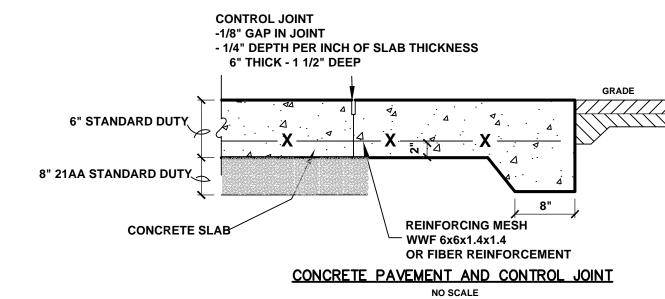
PLACE 36" GUTTER PAN

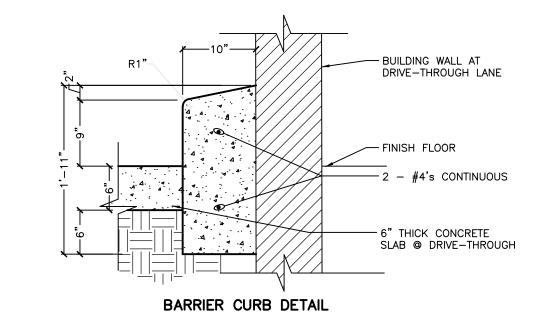
NONEXCLUSIVE STORM SEWER
EASEMENT PER L. 3453, PG. 619.





INTEGRAL WALK/CURB





feet; thence S02°24'14"W 5.92 feet; thence S29°09'00"W 282.30 feet to the place of beginning. This property contains approximately 1.058 acres.

GENERAL NOTES:

Legal Description:

Existing Zoning - MUPUD Mixed Use PUD Use: A restaurant is proposed. Neighboring properties includes -Retail, Banking and Restaurant Building Setback & Height Requirements: 70' or 35' if no parking in front yard

Part of the SE 1/4, Section 5, T2N, R5E, Genoa Township, Livingston

long a 20.35 foot radius curve to the right, the chord of which bears

N58°20'33"E 32.82 feet; thence S67°53'47"E 30.53 feet; thence

County, Michigan, described as: Commencing at the SE corner of said

Section 5; thence N02°11'26"E 548.49 feet along the East line of said SE 1/4

to the centerline of Grand River Avenue; thence N60°51'00"W 1027.33 feet a long said centerline to the PLACE OF BEGINNING of this description; thence

N60°51'00"W 143.92 feet along said centerline; thence N27°11'01"E 89.24 feet; thence N60°51'00"W 60.77 feet; thence Northeasterly 70.50 feet along a 138.35 foot radius curve to the left, the chord of which bears N19°10'54"E 69.74 feet; thence N04°34'53"E 27.58 feet; thence Northeasterly 38.18 feet a

Southeasterly 103.15 feet along a 300.00 foot radius curve to the left, the

chord of which bears S77°44'46"E 102.64 feet; thence S87°35'46"E 94.20

Side: Rear: 50 feet Max. 35 feet and 2 stories Height: Lot Coverage Building

75% Impervious Building & Lot Coverage 2,837 sq. ft. 6% Building 27,733 s.f. 60% Impervious Area Lot Area 1.058 Acre

According to Soil Resource Report for Livingston County, the soils consist of Miami Loam (MoB).

Parking Requirements: Restaurant: 0.5 parking spaces per dining seat, 3 designated short term drive-thru,

2 RV/Semi spaces Indoor Seating 70 seats 35 parking spaces

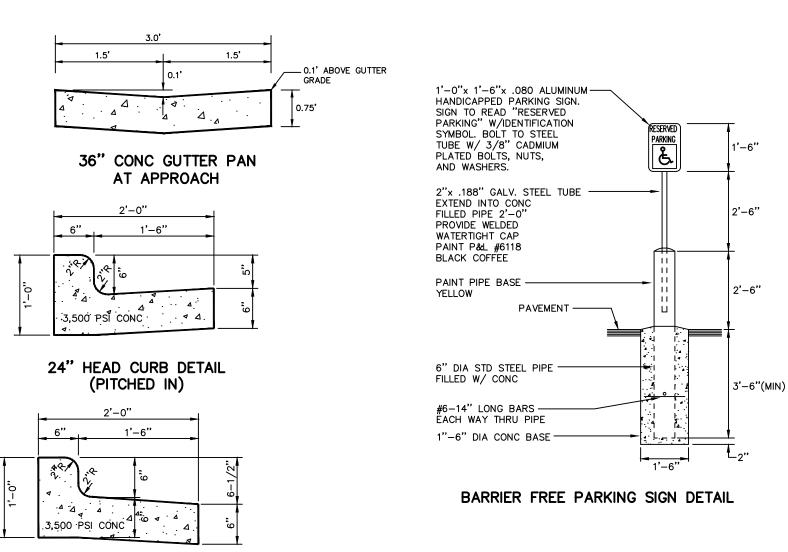
6 parking spaces Outdoor Seating 12 seats Drive-thru 3 parking spaces RV/Semi 2 parking spaces Total: 46 parking spaces

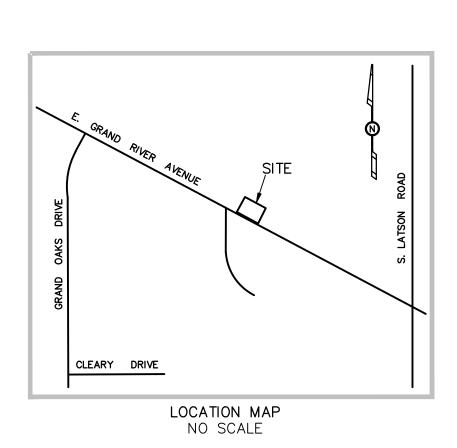
Parking Provided: On-site 44 parking spaces

Drive-thru Stacking Spaces

10 stacking spaces 10 stacking spaces

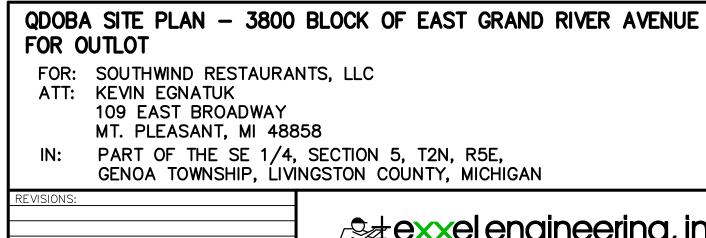
The storm sewer and detention basin for the PUD includes this as being developed. A 21" storm sewer pipe has been brought to the NE corner of the site for the Qdoba storm water.





7/31/2013

SITE DIMENSION AND UTILITY PLAN



exelengineering, inc.

planners · engineers · surveyors 5252 Clyde Park, S.W. • Grand Rapids, MI 49509 Phone: (616) 531-3660 Fax: (616) 531-2121 www.exxelengineering.com SHEET PPROVED BY: DDG 1 of 2

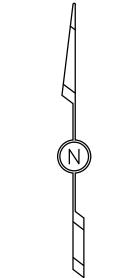
" F NO.: 131393E

of (SEE DETAIL) MC DONALD'S 3781 E. GRAND RIVER SAWCUT AND REMOVE PLACE 21 L.F. OF 12" STORM @ 12.6% RAISE RIM TO, 1005.0
YARD DRAIN TOP 1004.04
18" NV. E. 998.89
21" NV. N. 995.19
CUT, IN W 12" INV 1000.99 BLACKTOP BIT. CONSTRUCT BIT 60 R−20.35' CH-N58°20'33"E L-32.82' 100 SHORT TERM DRIVE—THRU S87°35'46"E 94.20' 1006.95 1005 S02°24'14"E INTEGRAL CH-S77°44'46"E ₹ MUPUD ARC 70.50' R-138.35' CATCH BASIN TOP 1006.26 CH-N19°10'54"E L-69.74' -NONEXCLUSIVE SIDEWALK/BIKE PATH EASEMENT IN FAVOR OF GENOA TWP. PER L. 2550, PG. COORDINATE PHONE, GAS, AND ELEC. SERVICES TO BUILDING PROP. KNOX BOX WITH UTILITY COMPANIES RESTAURANT PROPOSED PLACE: 1-4' DIA C.B. W/ EJ 7045-M1 W/ BUILDING 2' SUMP RIM 1007.8 (2837 S.F.) 12" E INV. 1003.64 12" SW INV 1003.64. FF-1011.0 MUPUD INTEGRAL WALK/CURB 3857 E. GRAND RIVER SANITARY MANHOLE STORM, CURBING AND WALK UNDER CONSTRUCTION PROP. C.O. (SEE MDOT PLANS) NOTE: 1. ALL DIMENSIONS TO FACE OF CURB PLACE: 1-4' DIA C.B. W/ EJ 7045 W/ 2' SUMP RIM 1009.10 12" E INV. 1005.10 HIGHWAY EASEMENT IN FAVOR OF GENOA TWP. PER L. 2257, PLACE: 1-4' DIA C.B. W/ EJ 7045-M1 W/ 2' SUMP RIM 1008.70 BENCHMARK ELEVATION 1012.72 TOP OF NE FLANGE BOLT ON 12" NW INV. 1004.65 12" NE INV. 1004.65 CA E. GRAND RIVER AVE. NRPUD SANITARY MANHOLE TOP 1010.02 TOP OF SHELF 999.42 INV. E. 999.97 INV. S'LY 999.02?? 7) ESMT. FOR R.O.W. PER L. 153, PG. 57 SANITARY MANHOLE INV 997.7 (PLAN) > .

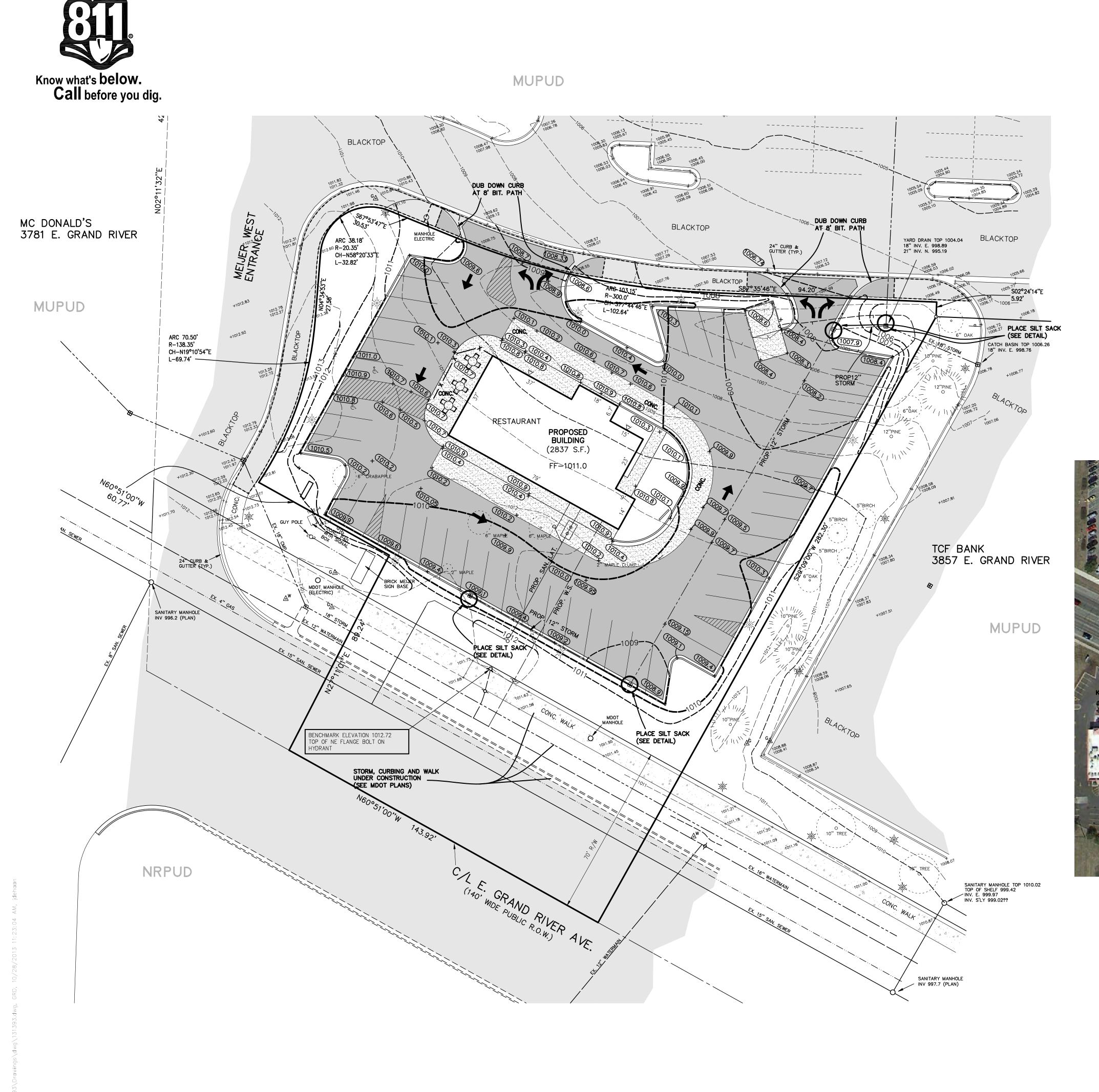
ROBERT TODD LAMER ENGINEER No.

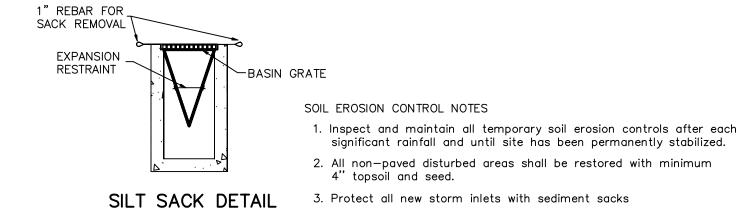
24" HEAD CURB DETAIL

(PITCHED OUT)



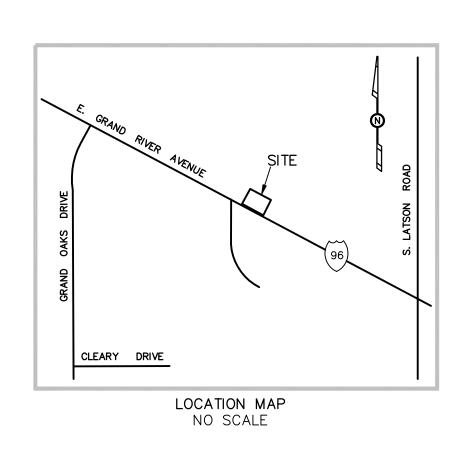
SCALE: 1" = 20'





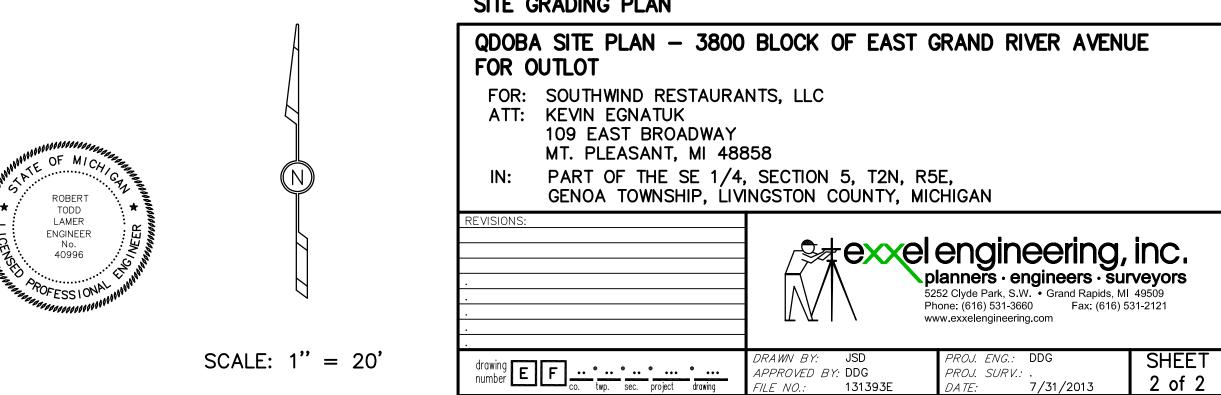


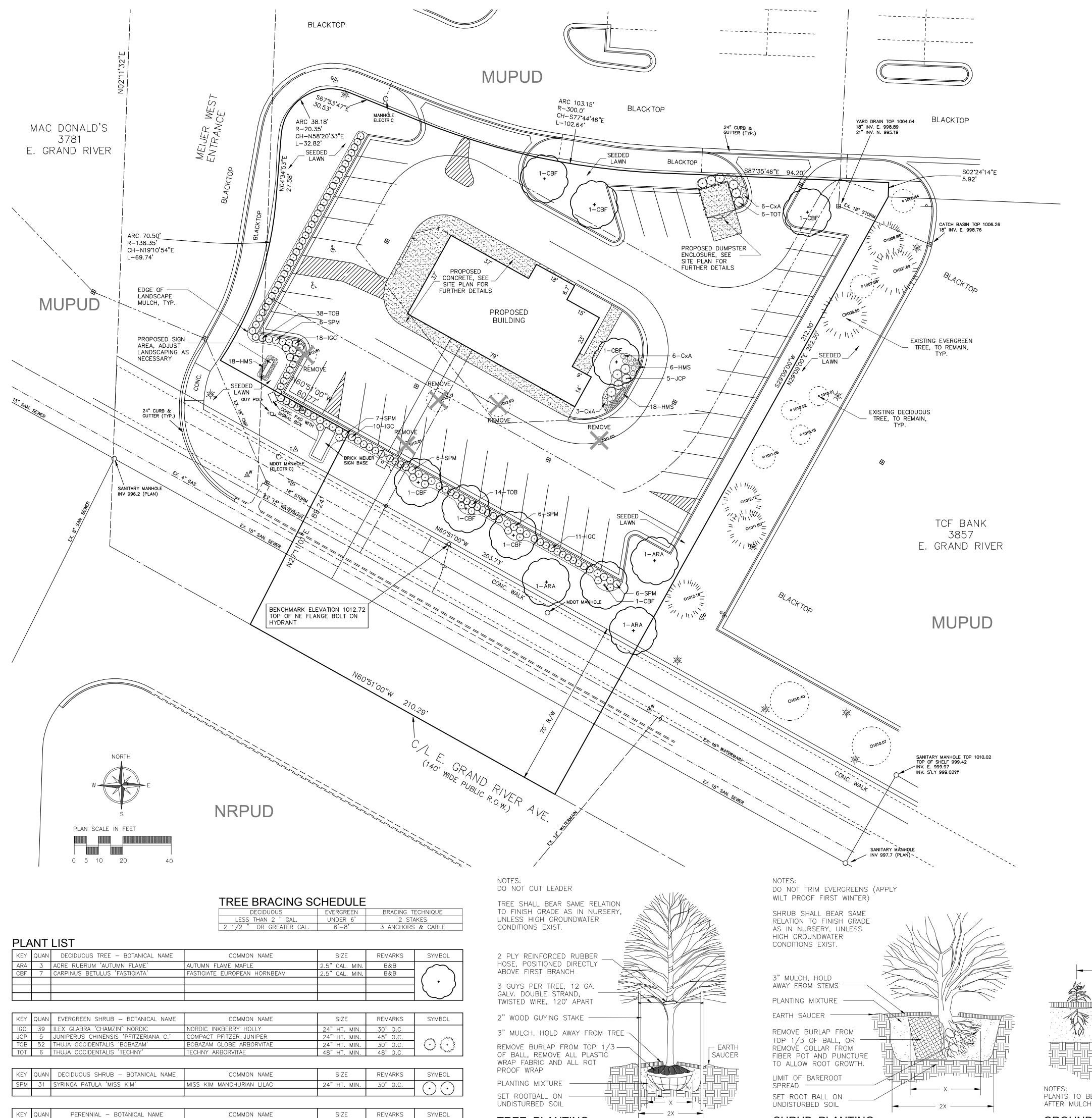
SITE PHOTO



7/31/2013

SITE GRADING PLAN





TREE PLANTING

CALAMAGROSTIS X ACUTIFLORA 'OVERDAM' VARIEGATED FEATHER REED GRASS

SHRUB PLANTING

NOT TO SCALE

NOT TO SCALE

LANDSCAPE CALCULATIONS

GRAND RIVER AVENUE ($\pm 213'$ = BACK OF MEIJER ENTRANCE CURB TO EAST PL) REQUIRED GREENBELT WIDTH 20' WIDE, MINIMUM REQUIRED CANOPY TREES REQUIRED EVERGREEN SHRUBS 72 (1 PER 2.5' OF PARKING) PROPOSED WIDTH

PROPOSED CANOPY TREES PROPOSED EVERGREEN SHRUBS 53 (ADD 31 DECIDUOUS = 84) EAST PROPERTY LINE (±192'= GREENBELT TO NE PROPERTY CORNER) REQUIRED TYPE C BUFFER WIDTH 10' WIDE, MINIMUM

REQUIRED CANOPY TREES REQUIRED EVERGREEN SHRUBS 40 (4 PER 20') EXISTING WIDTH 25' (SEE AGREEMENT WITH TCF BANK) EXISTING CANOPY TREES EXISTING EVERGREEN SHRUBS

NORTH PROPERTY LINE NONE REQUIRED ALONG PRIVATE ACCESS DRIVES

WEST PROPERTY LINE NONE REQUIRED ALONG PRIVATE ACCESS DRIVES PROPOSED WIDTH PROPOSED CANOPY TREES

INTERIOR PARKING PARKING PROVIDED REQUIRED CANOPY TREES REQUIRED LANDSCAPE AREA PROPOSED CANOPY TREES

PROPOSED EVERGREEN SHRUBS

44 SPACES 4 (1 PER 10 SPACES) 400 (100 SFT PER 10 SPACES)

PROPOSED LANDSCAPE AREA 2261 (CORNERS AND DUMPSTER ISLAND)

LANDSCAPE NOTES

ALL UTILITIES.

PLAN SHALL GOVERN.

1.) LANDSCAPE PLAN PREPARED BY:



Corey J. Broersma, LLA icensed Landscape Architect

LA Solutions, LLC

161 Cambridge Ave, Holland, MI 49423 Ph: 616.393.6481 2.) CONTRACTOR SHALL OBTAIN ALL NECESSARY STATE AND LOCAL PERMITS

RÉQUIRED. ALL CONSTRUCTION SHALL CONFORM TO APPLICABLE CITY, STATE, AND LOCAL STANDARDS AND CODES. 3.) CALL "MISS DIG", 1-800-482-7171, 72 HOURS PRIOR TO THE START OF

4.) EXISTING UNDERGROUND UTILITIES ARE PLOTTED FROM ORIGINAL SITE DRAWINGS AND SITE TOPOGRAPHIC SURVEY PROVIDED BY EXXEL ENGINEERING, INC. EVERY ATTEMPT HAS BEEN MADE TO SHOW ALL UTILITY LINES WHERE THEY EXIST. CONTRACTOR SHALL USE EVERY PRECAUTION IN DIGGING SINCE ACTUAL UNDERGROUND UTILITIES MAY NOT BE AS SHOWN. CONTRACTOR SHALL MAKE HIMSELF THOROUGHLY FAMILIAR WITH ALL UNDERGROUND UTILITY LOCATIONS PRIOR TO ANY TRENCHING AND VERIFY LOCATIONS AND DEPTHS OF

5.) ALL GRADING, UTILITY, AND ANY IRRIGATION WORK SHALL BE COMPLETED PRIOR TO INSTALLATION OF PLANT MATERIAL, LANDSCAPE MULCH, OR SEED. THE LANDSCAPE CONTRACTOR SHALL COORDINATE WORK WITH ALL CONTRACTORS ON SITE TO MINIMIZE REDO OF COMPLETED LANDSCAPE WORK, AND DAMAGE TO

6.) THE LANDSCAPE CONTRACTOR SHALL BE RESPONSIBLE FOR HIS OWN LÁYOUT WORK. IF ANY DISCREPANCY EXISTS BETWEEN THE QUANTITIES, SIZES OR MATERIALS INDICATED ON THE PLAN AND SHOWN IN THE PLANT LIST, THE

7.) IT IS THE LANDSCAPE CONTRACTORS RESPONSIBILITY TO VISIT THE SITE PRIOR TO BID SUBMITTAL, TO BECOME FAMILIAR WITH EXISTING CONDITIONS AT

8.) THE EARTHWORK CONTRACTOR IS RESPONSIBLE FOR ROUGH GRADING IN ALL

TURF AND LANDSCAPE AREAS. 9.) PRIOR TO BEGINNING WORK THE LANDSCAPE CONTRACTOR SHALL INSPECT

AND ACCEPT ALL BASE GRADES. ANY DEVIATION FROM LINE AND GRADE INDICATED ON THE PLANS SHALL BE CORRECTED BEFORE PLACING ANY PLANTS

10.) CONTRACTOR SHALL NOTIFY ENGINEER IF AREAS OF POOR DRAINAGE OR OTHER UNUSUAL SUBSURFACE CONDITIONS ARE ENCOUNTERED DURING EXCAVATION FOR PLANTING PITS.

11.) CONTRACTOR SHALL PROVIDE AND INSTALL ALL SPECIFIED PLANT MATERIAL IN ACCORDANCE WITH ALL RECOMMENDATIONS AND REQUIREMENTS OF ANSI 760.1 "AMERICAN STANDARD FOR NURSERY STOCK" AS WELL AS THE METHODS ESTABLISHED BY THE AMERICAN ASSOCIATION OF NURSERYMEN.

12.) ALL TREE AND LANDSCAPE BEDS SHALL HAVE A MINIMUM 3" LAYER OF DOUBLE SHREDDED HARDWOOD BARK MULCH FREE OF DELETERIOUS MATERIAL AND SUITABLE FOR TOP DRESSING TREES, SHRUBS, AND PERENNIALS.

PRÉPARATION OF ALL LAWN AND LANDSCAPE AREAS. 14.) AREAS TO RECEIVE SEED SHALL BE RIPPED AND SPREAD WITH TOPSOIL,

13.) THE LANDSCAPE CONTRACTOR IS RESPONSIBLE FOR FINE GRADING AND

4" DEEP, TO PROVIDE A REASONABLY SMOOTH AND UNIFORM SURFACE. 15.) FERTILIZER AND/OR LIME SHALL BE APPLIED UNIFORMLY AND MIXED WITH

THÉ SOIL DURING SÉEDBED PREPARATION. IF A SOIL TEST IS NOT REQUIRED, FERTILIZER AND/OR LIME SHALL BE APPLIED ACCORDING TO THE SEED MANUFACTURERS RECOMMENDATIONS. IF A SOIL TEST IS REQUIRED, APPLY FERTILIZER AND/OR LIME IN ACCORDANCE TO THE SOIL REPORT.

16.) LOOSE ROCKS, ROOTS, AND OTHER OBSTRUCTIONS SHALL BE REMOVED FROM THE SURFACE SO THAT THEY WILL NOT INTERFERE WITH THE ESTABLISHMENT AND MAINTENANCE OF THE LAWN.

17.) LANDSCAPE CONTRACTOR SHALL SEED ALL EXISTING LAWNS AREAS DISTURBED BY CONSTRUCTION REPAIR LAWN AREAS THAT HAVE REMAINED PARTIALLY INTACT, TOP DRESSING WITH SOIL. SCARIFYING, AND SEEDING TO FORM A SMOOTH EVEN LAWN, FREE OF BARE SPOTS, INDENTATIONS, & WEEDS.

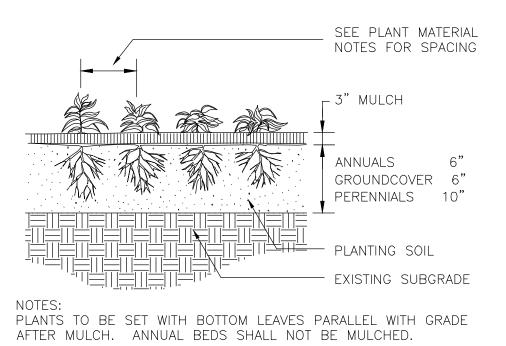
18.) HYDRO-SEED REPAIRED LAWN AREAS WITH THE FOLLOWING GRASS SEED MIX AT A RATE OF 5 LB. PER 1,000 SFT., OR APPROVED EQUAL:

20% AWARD KENTUCKY BLUEGRASS (85 PERCENT MINIMUM GERMINATION) 20% BARON KENTUCKY BLUEGRASS (85 PERCENT MINIMUM GERMINATION) 20% RAMBO KENTUCKY BLUEGRASS (85 PERCENT MINIMUM GERMINATION) 15% NASSAU KENTUCKY BLUEGRASS (85 PERCENT MINIMUM GERMINATION) 15% NIGHTHAWK PERENNIAL RYE (90 PERCENT MINIMUM GERMINATION) 10% CREEPING RED FESCUE (85 PERCENT MINIMUM GERMINATION)

19.) LANDSCAPE CONTRACTOR SHALL ENSURE PROPER WATERING OF PLANTED AND SEEDED AREAS BEFORE, DURING, AND AFTER INSTALLATION INCLUDING THE

20.) THE LANDSCAPE CONTRACTOR SHALL WARRANT ALL PROVIDED AND INSTALLED PLANT MATERIAL FROM DEATH AND UNSATISFACTORY GROWTH FOR A PERIOD OF ONE YEAR FROM SUBSTANTIAL COMPLETION. THE CONTRACTOR SHALL REPLACE ALL DEAD PLANT MATERIAL IMMEDIATELY DURING THE PROPER PLANTING SEASON. PLANT MATERIAL MORE THAN 25% DEAD AT THE END OF THE WARRANTY PERIOD SHALL BE REPLACED. REPLACEMENTS SHALL BE LIMITED TO ONE PER PROVIDED AND INSTALLED PLANT UNLESS THE LANDSCAPE CONTRACTOR FAILS TO COMPLY WITH ANY OR ALL REQUIREMENTS.





GROUND COVER & PERENNIAL PLANTING

FOR OUTLOT FOR: SOUTHWIND RESTAURANTS, LLC ATT: KEVIN EGNATUK 109 EAST BROADWAY MT. PLEASANT, MI 48858 IN: PART OF THE SE 1/4, SECTION 5, T2N, R5E, GENOA TOWNSHIP, LIVINGSTON COUNTY, MICHIGAN

QDOBA LANDSCAPE PLAN

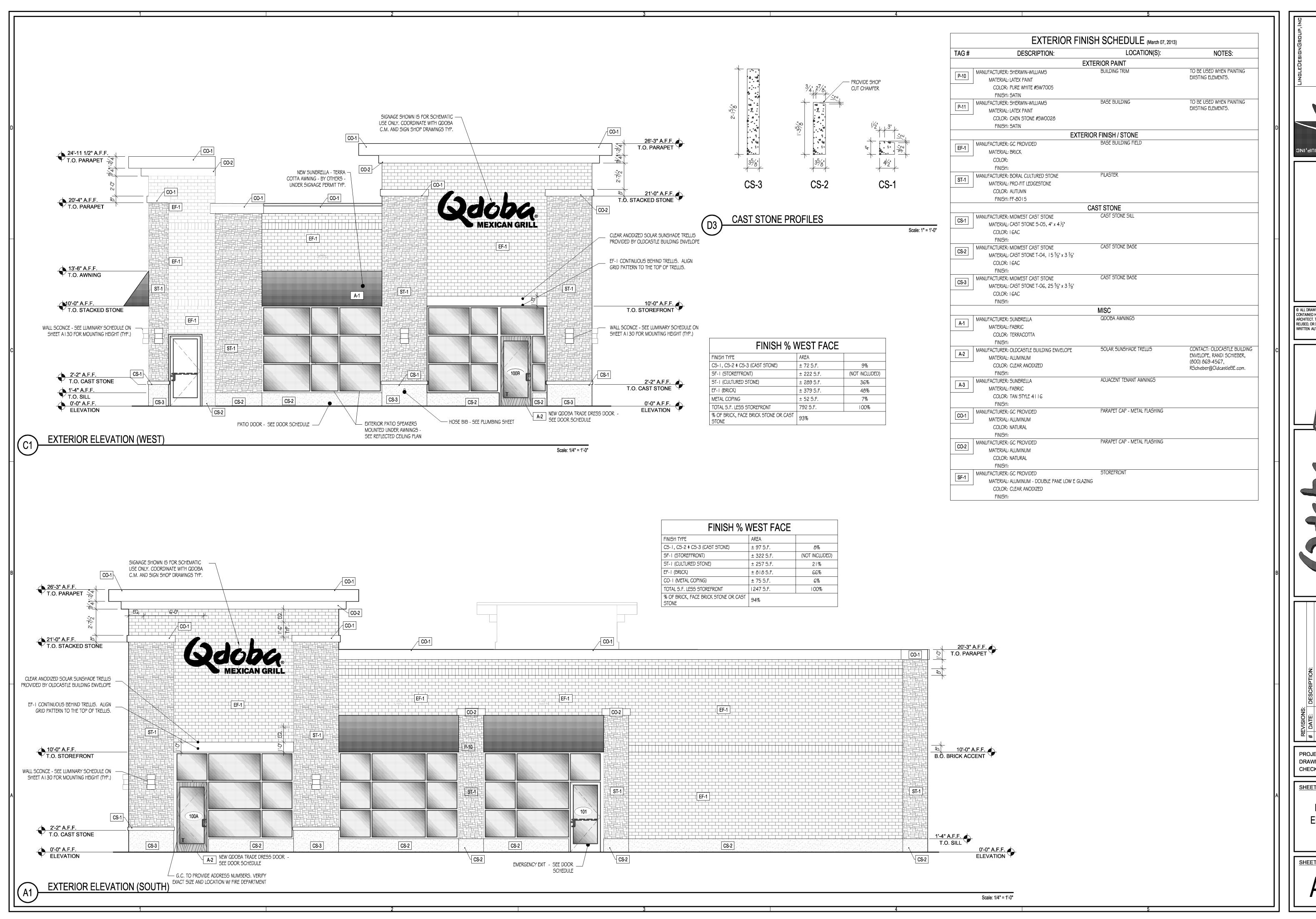
REVISIONS: planners · engineers · surveyors

5252 Clyde Park, S.W. • Grand Rapids, MI 49509 Phone: (616) 531-3660 Fax: (616) 531-2121 www.exxelengineering.com /24/13 REVISED PER PC REVIEW 8/07/13 FOR SITE PLAN SUBMITTTAL

APPROVED BY: *FILE NO.:* 131393E DA TE:

PROJ. ENG.: DDG SHEET PROJ. SURV.: 7/31/2013

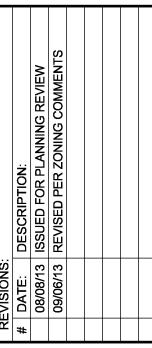
1 of 1



© ALL DRAWINGS AND WRITTEN MATERIAL CONTAINED HEREIN ARE THE PROPERTY OF THE ARCHITECT. THEY MAY NOT BE REVISED, COPIED, REUSED, OR DISCLOSED IN ANY MANNER WITHOUT WRITTEN AUTHORIZATION FROM THE ARCHITECT.

NOT FOR CONSTRUCTION





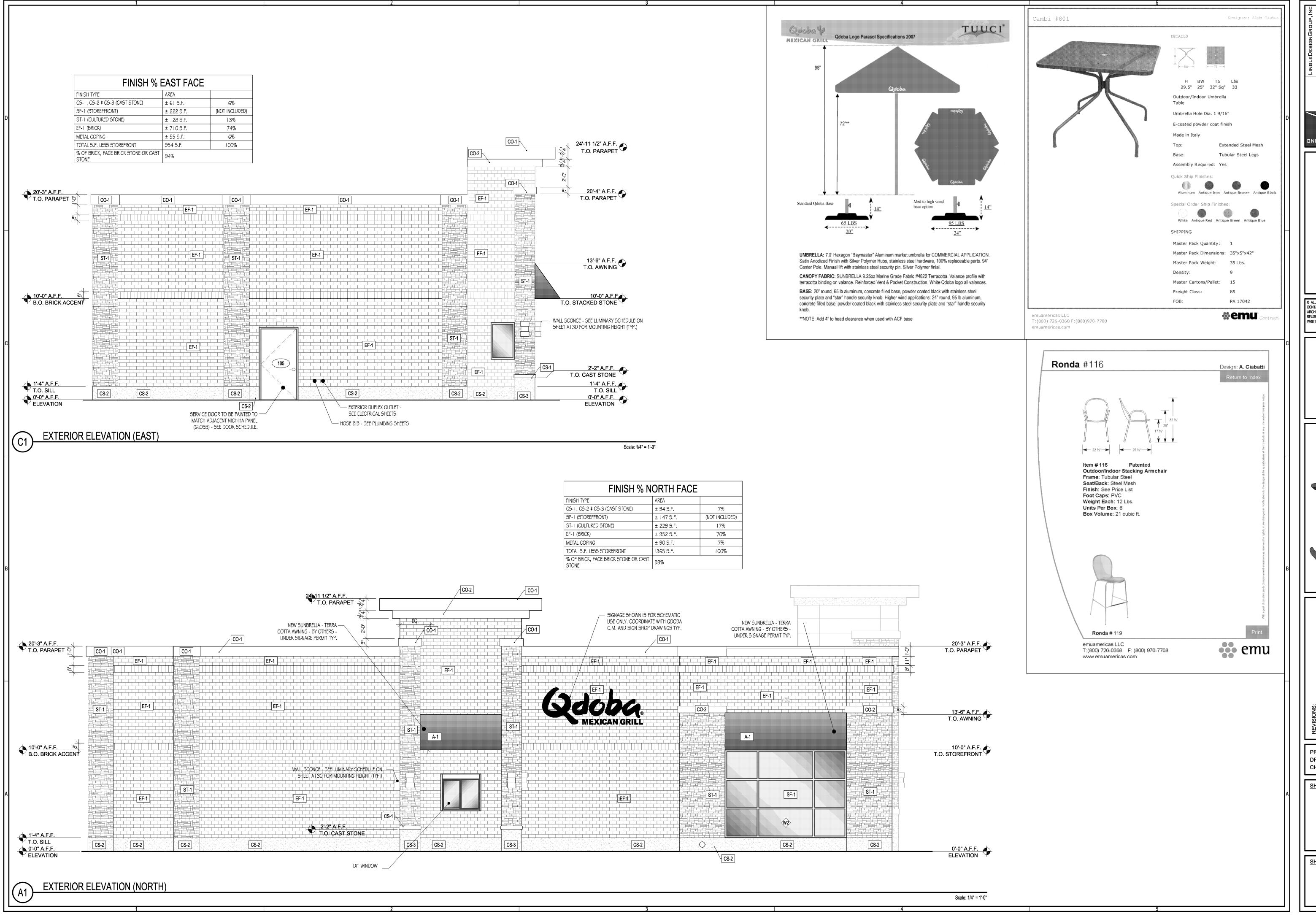
PROJECT NUMBER: 13-0449
DRAWN BY: JTC
CHECKED BY:

SHEET TITLE:

EXTERIOR ELEVATIONS

SHEET NUMBER:

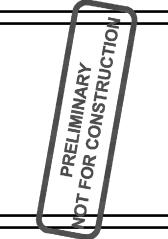
A200



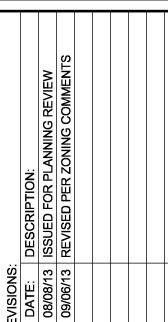
WEST MAIN STREET
LENA, IL 6104B 15B
PHONE: 815-369-9155
FAX: 815-369-4495
www.LINGLEDESIGN.GOM



© ALL DRAWINGS AND WRITTEN MATERIAL CONTAINED HEREIN ARE THE PROPERTY OF THE ARCHITECT. THEY MAY NOT BE REVISED, COPIED, REUSED, OR DISCLOSED IN ANY MANNER WITHOUT WRITTEN AUTHORIZATION FROM THE ARCHITECT.







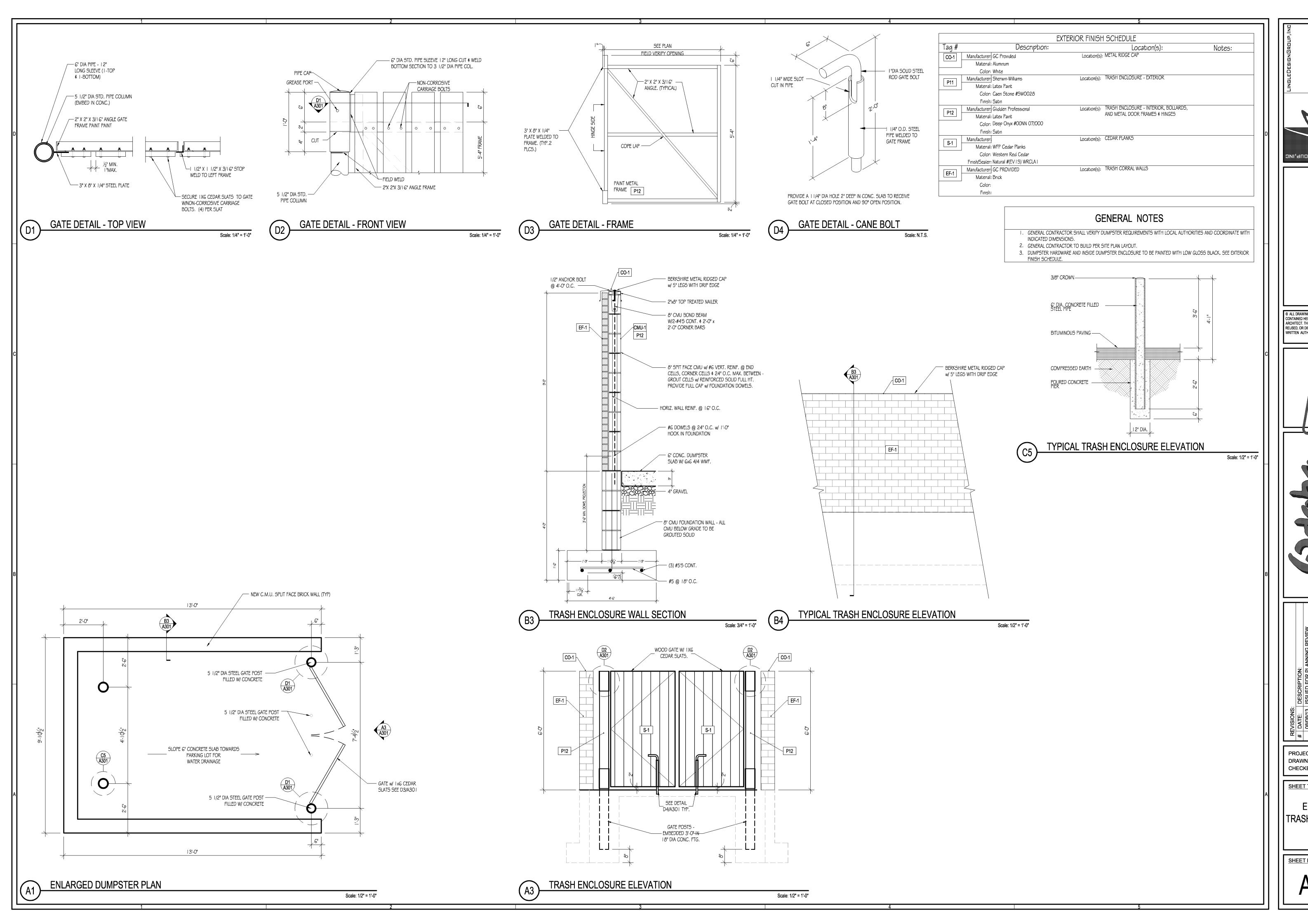
PROJECT NUMBER: 13-0449
DRAWN BY: JTC
CHECKED BY:

SHEET TITLE:

EXTERIOR ELEVATIONS

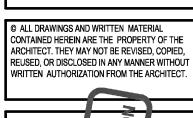
SHEET NUMBER:

A201



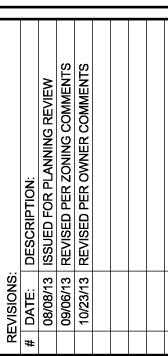










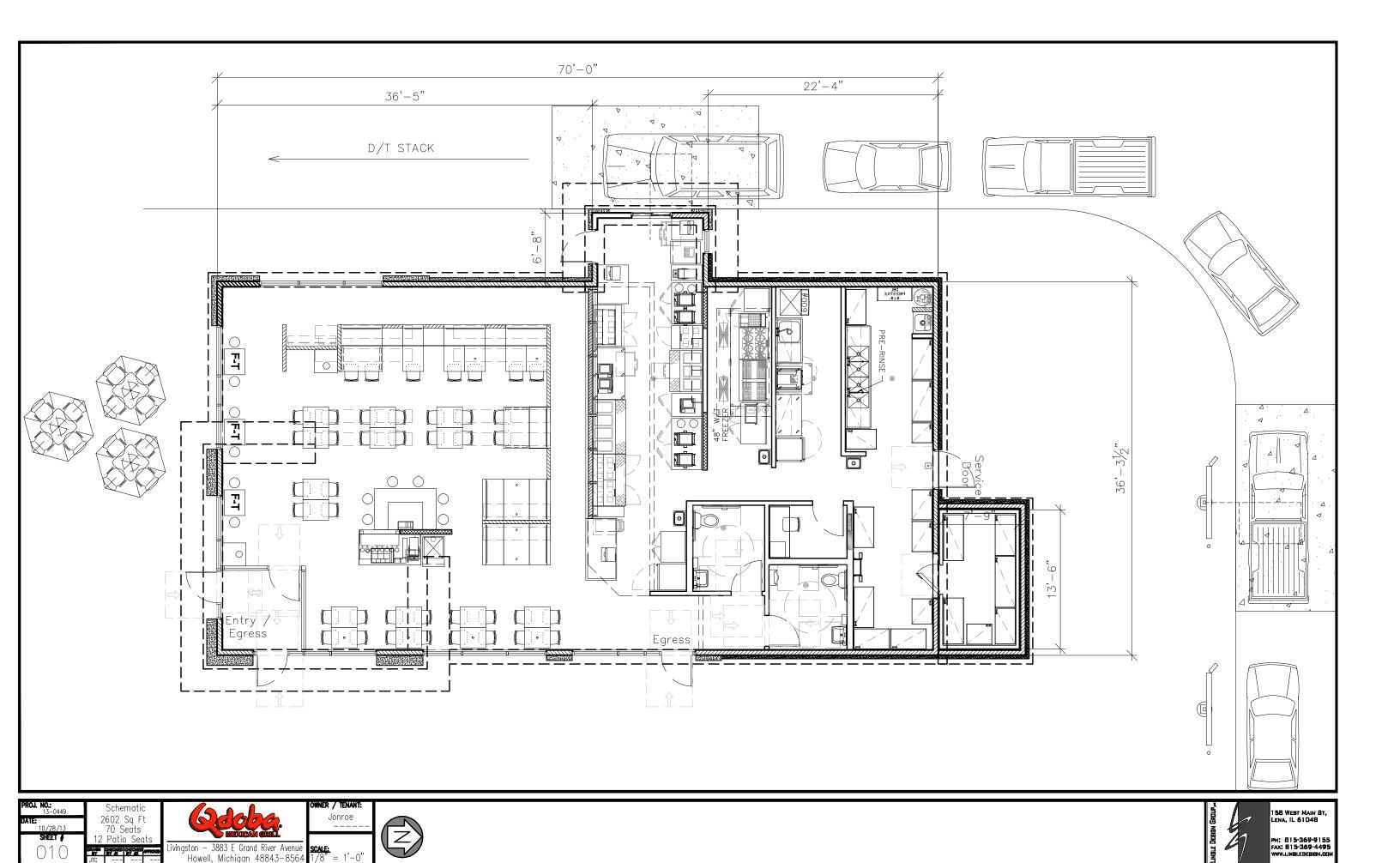


PROJECT NUMBER: 13-0449 DRAWN BY: CHECKED BY:

SHEET TITLE:

ENLARGED TRASH ENCLOSURE

SHEET NUMBER:





Example of V DO NOT THE S

LATERT Le souther while reministration in the contract of the second of the sec BI TYPICAL SELF CLOSING (EXIT ONLY) PATTO GATE DETAIL PEEL DRE 4 PATIO Party Michael & Colle To the Professional State And Profession To the Party of the HAMORETHUR STORY TYPICAL PATIO FENCE DETAIL COPE DOLL FOR the OF F GENOA TOWNSHIP A310

OCT 2 8 2013

Qudoba Howell Distributor: Graybar Electric/GR (Walker)

Catalog Number:

D136/A028/150MH/120/BLK/SLL-**FDR**

Notes:

Type:

SA

A028 Series

MLS13-42715

amerlux exterior

Description

The AO28 Series consists of an efficient Type III (T3) or Type V (T5) refractive acorn combined with one of several styles of cast aluminum fitters.

Installation

The luminaire will mount to a 3" OD post or tenon with 5/16" black oxide coated stainless steel square head set screws to ensure a solid connection. The diffuser will be held to the fitter by (4) 5/16" black oxide coated stainless steel captive square head set screws.

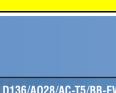
Electrical

- · High power factor ballast (HPF), core and coil type, pre-wired and tested
- · Easy ballast pod access
- · 4KV pulse rated porcelain socket
- · Suitable for wet location

Diffuser choices

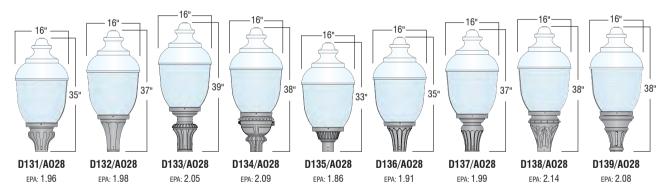
- Acrylic Type III (AC-T3)
- Acrylic Type V (AC-T5)
- Polycarbonate Type III (PC-T3)
- Polycarbonate Type V (PC-T5)

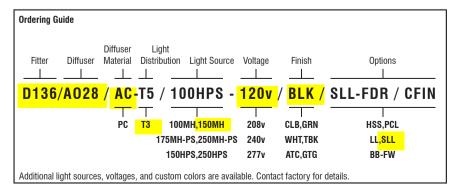
Premium quality thermoset polyester powdercoat (see Finish Selection)











Light Sources	
Wattage	Socket Type
50MH,70MH,100MH,150MH	Medium
175MH-PS,250MH-PS	Mogul
50HPS,70HPS,100HPS	Medium
150HPS,250HPS	Mogul
PL-13	2-pin
CFL 26,32,or 42	4-pin



Qudoba Howell Distributor: Graybar Electric/GR (Walker)

Catalog Number:

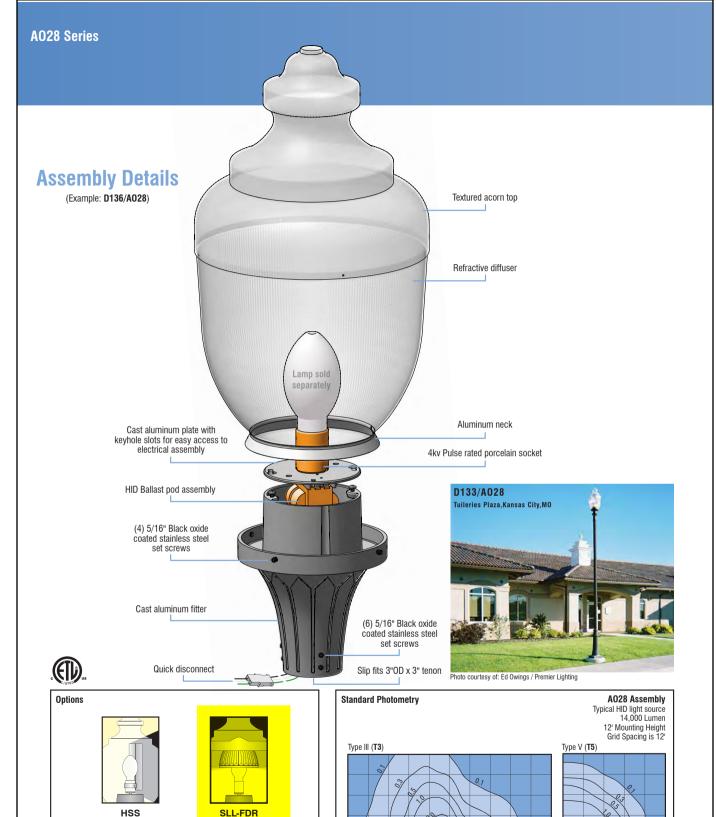
D136/A028/150MH/120/BLK/SLL-**FDR**

Notes:

Type:

SA

MLS13-42715



House

Side Shield Faceted Downlight

Reflector

Qudoba Howell Distributor: Graybar Electric/GR (Walker)

Catalog Number:

D136/A028/150MH/120/BLK/SLL-FDR Notes: Type:

SA

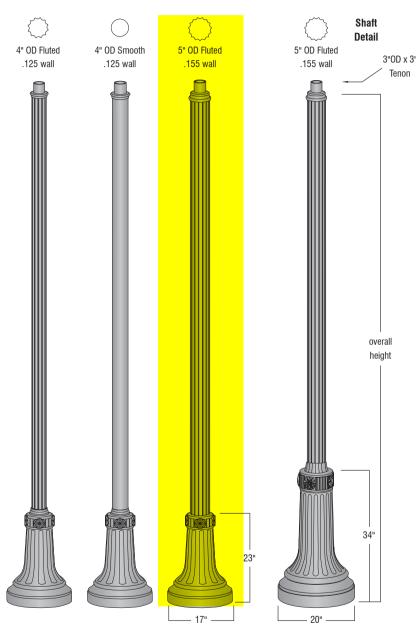
MLS13-42715



800.364.0098

Fax: 281.997.544

www.amerluxexterior.com



DS	D1703-xx	DSD1704-xx	DSD1705-xx		DSD2005-xx	overall height
DS DS	D1703-08 D1703-10 D1703-12 D1703-14	DSD1704-08 DSD1704-10 DSD1704-12 DSD1704-14	DSD1705-08 DSD1705-10 DSD1705-12 DSD1705-14	7'-8" 9'-8" 11'-8" 13'-8"	DSD2005-10 DSD2005-12 DSD2005-14 DSD2005-15	9'-8" 11'-8" 13'-8" 14'-8"
			DSD1705-15	14'-8"	DSD2005-16	15'-8"

San Diego Series

Features

17" or 20" diameter tapered and fluted cast aluminum base

Choice of extruded shafts

4" OD smooth round (.125 wall)

4" OD fluted (12 flat flutes .125 wall)

5" OD fluted (15 flat flutes .155 wall)

Extruded shaft is circumferentially welded to the base

3" tenon for luminaire mounting

Strong yet lightweight for ease of installation

Galvanized anchor bolts included

Access door for anchor bolts and wiring is secured with tamper resistant stainless steel screws

Ground lug provided inside base

Capable of supporting multiple light brackets

Materials

Base - Cast aluminum (A319)

Shaft - Extruded Aluminum (6005-T5)

Tenon - Cast aluminum (A319)

Anchor Bolts - Hot dipped galvanized steel





Qudoba Howell

Distributor: Graybar Electric/GR (Walker)

Catalog Number:

D136/A028/150MH/120/BLK/SLL-FDR

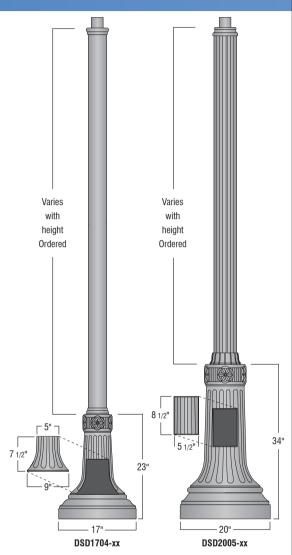
Notes:

Type:

SA

MLS13-42715

San Diego Series



Finish

The post will be finished with an electrostatically applied thermoset polyester powder coat. Prior to finishing, the parts are thoroughly cleaned using both abrasive and chemical methods. Our powder coat finish is durable, long lasting, attractive and scratch resistant as well as environmentally friendly. We offer 7 stock finishes or hundreds of special order colors including custom matching for existing projects (stock colors shown below).

Standard solid colors are:

GRN - Green

CLB - Classic Bronze

TBK - Textured Black

BLK - Satin Black

Premium finishes are: **GTG** - Granite Green

ATC - Antique Copper

WHT - White

Accessories See "Accessories" section for more information



DOL

Dusk to dawn photocell Available for 120v (PCL) or 208-277v (PCL multi).



Banner Arms

Field rotatable or fixed location banner arms



GFCI

Ground fault circuit protected duplex outlet. Available Recess mounted (GFCI-RM) as shown or surface mount (GFCI-SM).



Street Signage

Several mounting options and custom signs available. See guide in accessories section.



LR

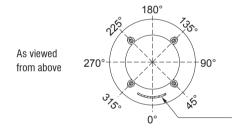
Cast aluminum decorative ladder rest. Slip fits 3"o.d. pole or tenon (not designed to support ladder).



FPH-4 or FPH-5

Extruded aluminum holder for 1" OD flag poles. Available for 4" OD and 5" OD non-tapered pole.

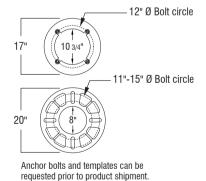
Accessory Orientation Guide



Must specify orientation of accessories when ordering.

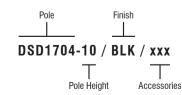
Access Door

Anchor Details



1/2" Ø Hot Dipped galvanized L-Type Anchor Bolts. (4) Bolts at 90°

Ordering Guide





Qudoba Howell Distributor: Graybar Electric/GR (Walker)

Catalog Number:

ARE-EHO-3M-AA-12-D-UL-BZ-700MA Notes:

Type:

C127

THE EDGE® ARE-EHO-3M-AA

High Output Area Luminaire - Type III Medium - Adjustable Arm Mount

Product Description

THE EDGE high output (HO) area luminaire is designed to deliver high lumen packages with precise optical control. Upgrade friendly unit features a slim, low profile design that minimizes wind load requirements and rugged die cast aluminum adjustable arm that mounts to a vertical 2" (51 mm) IP (2.375-3" [60-76mm] O.D.) tenon.

Performance Summary

Utilizes BetaLED® Technology

Patented NanoOptic® Product Technology

Made in the U.S.A. of U.S. and imported parts

CRI: Minimum 70 CRI

CCT: 5700K (+/- 500K) Standard, 4000K (+/- 300K)

Warranty: 5 years on luminaire/10 years on Colorfast DeltaGuard® finish

Accessories

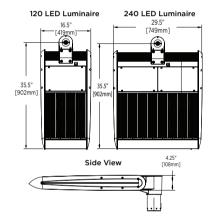
XA-BRDSPKXAK12

Bird Spikes for 120 LED luminaires

XA-BRDSPKXAK24

Bird Spikes for 240 LED luminaires





Ordering Information Example: ARE-EHO-3M-AA-12-D-UL-SV-700-OPTIONS

ARE-EHO	3M	AA		D				
Product	Optic	Mounting	LED Count (x10)	Version	Voltage	Color Options	Drive Current	Options
	3M Type III Medium	AA Adjustable Arm	12 24	D	UL Universal 120-277V UH Universal 347- 480V	SV Silver (Standard) BK Black BZ Bronze PB Platinum Bronze WH White	700 700mA 1000* 1000mA	40K 400K Color Temperature - Color temperature per fixture DIM 0-10V Dimming - Control by others - Refer to dimming spec sheet for details - Can't exceed specified drive current F Fuse - When code dictates fusing, use time delay fuse R NEMA Photocell Receptacle - Photocell by others ML Multi-Level - Refer to ML spec sheet for details - Not available with 240 LEDs @ 1 Amp - Not available with UH voltage - Intended for horizontal mounting only UP Uplight Configuration - Product will be shipped orientated for uplight

^{*} Not available with UH voltage











Qudoba Howell Distributor: Graybar Electric/GR (Walker)

Catalog Number:

ARE-EHO-3M-AA-12-D-UL-BZ-700MA

Notes:

Type:

C127

MLS13-42715

High Output Area Luminaire - Type III Medium - Adjustable Arm Mount

Product Specifications

BETALED® TECHNOLOGY

Cree* THE EDGE* high output area luminaires are powered by BetaLED Technology delivering outstanding illumination, lasting performance and optimum energy efficiency. Patented NanoOptic* product technology optimizes target illumination, performance and offers flexibility with over 20 optic choices.

CONSTRUCTION & MATERIALS

- · Slim, low profile, minimizing wind load requirements
- Luminaire sides are rugged die cast aluminum with integral, weather-tight LED driver compartments and high performance heat sinks
- Adjustable mounting arm is rugged die cast aluminum and mounts to 2" (51mm) IP (2.375-3" [60-76mm] O.D.) vertical tenon
- · Extruded aluminum adjustable mounting shaft
- $\bullet~$ Luminaire is adjustable 45° towards fitter and 180° away from fitter
- Exclusive Colorfast DeltaGuard* finish features an E-Coat epoxy primer with an ultradurable powder topcoat, providing excellent resistance to corrosion, ultraviolet deardation and abrasion. Standard is silver. Bronze, black, white, and platinum bronze are also available

ELECTRICAL SYSTEM

- Input Voltage: 120-277V or 347-480V, 50/60Hz, Class 1 drivers
- · Power Factor: > 0.9 at full load
- Total Harmonic Distortion: < 20% at full load
- Integral 10kV surge suppression protection standard
- When code dictates a slow blow fuse or type C/D breaker should be used to address inrush current

REGULATORY & VOLUNTARY QUALIFICATIONS

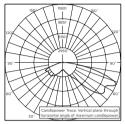
- · cULus Listed
- Suitable for wet locations
- Consult factory for CE Certified products
- Pending ANSI C136.31-2001 3G bridge and overpass vibration standards
- 10kV surge suppression protection tested in accordance with IEEE/ANSI C62.41.2.
- Luminaire and finish endurance tested to withstand 5,000 hours of elevated ambient salt fog conditions as defined in ASTM Standard B 117
- RoHS Compliant
- Meets Buy American requirements within ARRA

PATENTS

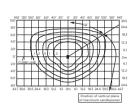
 Visit website for patents that cover these products: Patents http://www.cree.com/patents

Photometry

All published luminaire photometric testing performed to IESNA LM-79-08 standards by Independent Testing Laboratories, a NVLAP certified laboratory.







ARE-EHO-3M-**-12-D-UL-1000-40K Mounting Height: 25' (7.6m) Initial Delivered Lumens: 24,061 Initial FC at grade

IES Files

To obtain an IES file specific to your project consult: http://www.cree.com/lighting/tools-and-support/exterior-ies-configuration-tool

Lumen Output, Electrical, and Lumen Maintenance Data

	Type III Medium Distribution													
	570	ок	4000K TOTAL CURRENT											
Count (x10)	Initial Delivered Lumens	BUG Ratings* Per TM-15-11	Initial Delivered Lumens	BUG Ratings* Per TM-15-11	System Watts 120-480V	120V	208V	240V	277V	347V	480V	50K Hours Projected Lumen Maintenance Factor @ 15°C (59°F)**		
				700	0mA @ 25°C (77	°F)								
12	19,997	B3 U0 G3	18,430	B3 U0 G3	279	2.32	1.34	1.16	1.01	0.80	0.58	91%		
24	39,994	B4 U0 G4	36,860	B4 U0 G4	557	4.64	2.68	232	2.01	1.61	1.16			
				100	0mA @ 25°C (77	°F)								
12	26,107	B4 U0 G4	24,061	B4 U0 G4	426	3.55	2.05	1.77	1.54	N/A	N/A	86%		
24	52,214	B5 U0 G5	48,123	B5 U0 G5	851	7.09	4.09	3.55	3.07	N/A	N/A			

^{*} For more information on the IES BUG (Backlight-Uplight-Glare) Rating visit www.iesna.org/PDF/Erratas/TM-15-11BugRatingsAddendum.pdf. Valid with no tilt.
** Projected L... (10K) Hours: >60.000. For recommended lumen maintenance factor data see TD-13

Weight and EPA

LED		EPA (Mounting Angle)										
Count (x10)	Weight	o°	10°	20°	30°	45°	60°	70°	80°	90°		
12	45 lbs (20.4kg)	1.42	1.40	1.89	2.49	3.32	3.96	4.26	4.44	4.51		
24	80 lbs (36.3kg)	1.42	2.09	3.23	4.32	5.82	6.99	7.53	7.86	7.97		

^{© 2012} Cree, Inc. and/or one of its subsidiaries. All rights reserved. For informational purposes only. See www.cree.com/lighting for warranty terms. Cree*, the Cree logo, THE EDGE*, BetaLED*, NanoOptic*, and Colorfast DeltaGuard* are registered trademarks and the BetaLED Technology logo is a trademark of Cree, Inc. or one of its subsidiaries.



Qudoba Howell Distributor: Graybar Electric/GR (Walker)

Catalog Number:

ARE-EĤO-3M-AA-12-D-UL-BZ-700MA Notes: Type:

Notes:

C127

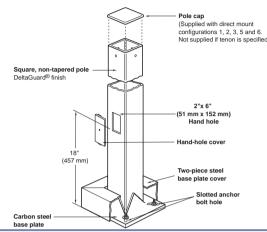
/II S13-42715

PS

Crown-Weld® Square Straight Steel Poles

Beta Catalog Number:





Not supplied if tenon is specifie	:d.)		
2"x 6"			
−(51 mm x 152 mm) Hand hole			
- Hand-hole cover			
Two-piece steel			
base plate cover			
Slotted anchor bolt hole			
2011 11010			
"EPA" RatingsPole			
ase Wind Velocity			Moun
700 770 700	7.00	7 40	~ ~

				~						
Height (feet) x	Bolt Circle/	Bolt			Pole	"EPA'	' Ratin	gsPol	e	
Width (inches) x	Range	Size			Ba	se Win	d Velo	city		
Wall (inches)	(inches)	(inches)	<i>70</i>	<i>80</i>	90	100	110	<i>120</i>	<i>130</i>	<i>140</i>
10 x 3 x 0.125	10/9.3-11	3/4	31.4	23.6	18.2	14.3	11.5	9.3	7.0	6.3
15 x 3 x 0.125	10/9.3-11	3/4	18.5	13.4	9.9	7.4	5.5	4.1	3.0	2.2
20 x 3 x 0.125	10/9.3-11	3/4	11.5	7.8	5.2	3.3	2.0	0.9	0.1	0.0
10 x 4 x 0.125	10/9.3-11	3/4	59.9	45.2	35.1	27.9	22.6	18.5	15.4	12.9
12 x 4 x 0.125	10/9.3-11	3/4	48.4	36.2	27.9	21.9	17.5	14.2	11.6	9.5
15 x 4 x 0.125	10/9.3-11	3/4	36.5	26.9	20.3	15.6	12.1	9.5	7.4	5.8
17 x 4 x 0.125	10/9.3-11	3/4	30.7	22.3	16.6	12.5	9.41	7.1	5.3	3.9
20 x 4 x 0.125	10/9.3-11	3/4	24.0	16.9	12.1	8.7	6.1	4.2	2.7	1.5
22 x 4 x 0.125	10/9.3-11	3/4	20.4	14.0	9.7	6.6	4.3	2.5	1.2	0.1
25 x 4 x 0.125	10/9.3-11	3/4	15.9	10.4	6.6	3.9	1.9	0.4	0.0	0.0
25 x 4 x 0.188	10/9.3-11	3/4	25.3	17.6	12.3	8.5	5.7	3.6	1.9	0.6
27 x 4 x 0.125	10/9.3-11	3/4	22.0	14.9	10.0	6.6	4.0	2.0	0.0	0.0
30 x 4 x 0.125	10/9.3-11	3/4	17.7	11.4	7.1	4.0	1.7	0.0	0.0	0.0
30 x 4 x 0.188	10/9.3-11	3/4	19.5	12.5	7.8	4.4	1.9	0.0	0.0	0.0
25 x 5 x 0.188	10/9.7-11.3	1	43.9	31.4	22.8	16.6	12.1	8.7	6.0	3.8
30 x 5 x 0.188	10/9.7-11.3	1	32.2	21.9	14.9	9.9	6.2	3.4	1.2	0.0
30 x 6 x 0.188	11.5/11.3-12.8	1	50.8	35.7	25.3	17.9	12.4	8.2	4.9	2.4
d Accessories										
	Width (inches) x Wall (inches) 10 x 3 x 0.125 15 x 3 x 0.125 20 x 3 x 0.125 10 x 4 x 0.125 12 x 4 x 0.125 12 x 4 x 0.125 20 x 4 x 0.125 20 x 4 x 0.125 20 x 4 x 0.125 25 x 5 x 0.125 25 x 4 x 0.125 25 x 5 x 0.125 30 x 4 x 0.125	Width (inches) x Range (inches) 10 x 3 x 0.125 10/9.3-11 15 x 3 x 0.125 10/9.3-11 20 x 3 x 0.125 10/9.3-11 10 x 4 x 0.125 10/9.3-11 12 x 4 x 0.125 10/9.3-11 17 x 4 x 0.125 10/9.3-11 17 x 4 x 0.125 10/9.3-11 20 x 4 x 0.125 10/9.3-11 20 x 4 x 0.125 10/9.3-11 22 x 4 x 0.125 10/9.3-11 25 x 4 x 0.125 10/9.3-11 27 x 4 x 0.125 10/9.3-11 30 x 5 x 0.188 10/9.7-11.3 30 x 5 x 0.188 10/9.7-11.3 30 x 6 x 0.188 10/9.7-11.3	Width (inches) x Range (inches) Size (inches) Wall (inches) (inches) (inches) 10 x 3 x 0.125 10/9.3-11 3/4 15 x 3 x 0.125 10/9.3-11 3/4 20 x 3 x 0.125 10/9.3-11 3/4 10 x 4 x 0.125 10/9.3-11 3/4 12 x 4 x 0.125 10/9.3-11 3/4 15 x 4 x 0.125 10/9.3-11 3/4 20 x 4 x 0.125 10/9.3-11 3/4 20 x 4 x 0.125 10/9.3-11 3/4 22 x 4 x 0.125 10/9.3-11 3/4 25 x 4 x 0.125 10/9.3-11 3/4 27 x 4 x 0.125 10/9.3-11 3/4 27 x 4 x 0.125 10/9.3-11 3/4 30 x 4 x 0.125 10/9.3-11 3/4 25 x 5 x 0.188 10/9.3-11 3/4 25 x 5 x 0.188 10/9.7-11.3 1 30 x 6 x 0.188 11.5/11.3-12.8 1	Width (inches) x Range (inches) Size (inches) 70 10 x 3 x 0.125 10/9.3-11 3/4 31.4 15 x 3 x 0.125 10/9.3-11 3/4 18.5 20 x 3 x 0.125 10/9.3-11 3/4 11.5 10 x 4 x 0.125 10/9.3-11 3/4 59.9 12 x 4 x 0.125 10/9.3-11 3/4 48.4 15 x 4 x 0.125 10/9.3-11 3/4 36.5 17 x 4 x 0.125 10/9.3-11 3/4 30.7 20 x 4 x 0.125 10/9.3-11 3/4 24.0 22 x 4 x 0.125 10/9.3-11 3/4 20.4 25 x 4 x 0.125 10/9.3-11 3/4 25.3 27 x 4 x 0.125 10/9.3-11 3/4 25.3 27 x 4 x 0.125 10/9.3-11 3/4 25.3 30 x 4 x 0.125 10/9.3-11 3/4 25.3 30 x 4 x 0.125 10/9.3-11 3/4 25.3 25 x 5 x 0.188 10/9.3-11 3/4 19.5 25 x 5 x 0.188 10/9.7-11.3 1	Width (inches) x Range (inches) Size (inches) 70 80 10 x 3 x 0.125 10/9.3-11 3/4 31.4 23.6 15 x 3 x 0.125 10/9.3-11 3/4 18.5 13.4 20 x 3 x 0.125 10/9.3-11 3/4 11.5 7.8 10 x 4 x 0.125 10/9.3-11 3/4 59.9 45.2 12 x 4 x 0.125 10/9.3-11 3/4 48.4 36.2 15 x 4 x 0.125 10/9.3-11 3/4 36.5 26.9 17 x 4 x 0.125 10/9.3-11 3/4 30.7 22.3 20 x 4 x 0.125 10/9.3-11 3/4 24.0 16.9 22 x 4 x 0.125 10/9.3-11 3/4 20.4 14.0 25 x 4 x 0.125 10/9.3-11 3/4 20.4 14.0 25 x 4 x 0.125 10/9.3-11 3/4 25.3 17.6 27 x 4 x 0.125 10/9.3-11 3/4 22.0 14.9 30 x 4 x 0.125 10/9.3-11 3/4 22.0 14.9 30 x 4 x	Width (inches) x Range (inches) Size (inches) Range (inches) Ba 0 x 3 x 0.125 10/9.3-11 3/4 31.4 23.6 18.2 15 x 3 x 0.125 10/9.3-11 3/4 18.5 13.4 9.9 20 x 3 x 0.125 10/9.3-11 3/4 11.5 7.8 5.2 10 x 4 x 0.125 10/9.3-11 3/4 59.9 45.2 35.1 12 x 4 x 0.125 10/9.3-11 3/4 48.4 36.2 27.9 15 x 4 x 0.125 10/9.3-11 3/4 36.5 26.9 20.3 17 x 4 x 0.125 10/9.3-11 3/4 30.7 22.3 16.6 20 x 4 x 0.125 10/9.3-11 3/4 24.0 16.9 12.1 22 x 4 x 0.125 10/9.3-11 3/4 20.4 14.0 9.7 25 x 4 x 0.125 10/9.3-11 3/4 20.4 14.0 9.7 25 x 4 x 0.125 10/9.3-11 3/4 25.3 17.6 12.3 27 x 4 x 0.125 10/9.3-11	Width (inches) x Range (inches) Size (inches) Range (inches) Base Win (inches) Wall (inches) Base Win (inches) Base Win (inches) Wall (inches) Base Win (inches) Base Win (inches) Base Win (inches) Wall (inches) Base Win (inches) Base Win (inches) Base Win (inches) Wall (inches) Base Win (inches) Base Win (inches) Base Win (inches) Mase Win (inches) Base Win (inches) Base Win (inches) Mase Win (inches) Aso (inches) 90 100 15 x 3 x 0.125 10/9.3-11 3/4 11.5 7.8 5.2 3.3 10 x 4 x 0.125 10/9.3-11 3/4 48.4 36.2 27.9 21.9 15 x 4 x 0.125 10/9.3-11 3/4 36.5 26.9 20.3 15.6 17 x 4 x 0.125 10/9.3-11 3/4 30.7 22.3 16.6 12.5 20 x 4 x 0.125 10/9.3-11 3/4 24.0 16.9 12.1 8.7 22 x 4 x 0.125 10/9.3-11 3/4 20.4 14.0 9.7 6.6 25	Width (inches) x Range (inches) Size (inches) Range (inches) Size (inches) Base Wind Velo (inches) Velo (inches) 70 80 90 100 110 110 10 x 3 x 0.125 10/9.3-11 3/4 31.4 23.6 18.2 14.3 11.5 15 x 3 x 0.125 10/9.3-11 3/4 18.5 13.4 9.9 7.4 5.5 20 x 3 x 0.125 10/9.3-11 3/4 11.5 7.8 5.2 3.3 2.0 10 x 4 x 0.125 10/9.3-11 3/4 59.9 45.2 35.1 27.9 22.6 12 x 4 x 0.125 10/9.3-11 3/4 36.5 26.9 20.3 15.6 12.1 17 x 4 x 0.125 10/9.3-11 3/4 36.5 26.9 20.3 15.6 12.5 9.41 20 x 4 x 0.125 10/9.3-11 3/4 24.0 16.9 12.1 8.7 6.1 22 x 4 x 0.125 10/9.3-11 3/4 20.4 14.0 9.7 6.6 4.3 <td>Width (inches) x Range (inches) Size (inches) Range (inches) Size (inches) Base Wind Velocity 10 x 3 x 0.125 10/9.3-11 3/4 31.4 23.6 18.2 14.3 11.5 9.3 15 x 3 x 0.125 10/9.3-11 3/4 18.5 13.4 9.9 7.4 5.5 4.1 20 x 3 x 0.125 10/9.3-11 3/4 11.5 7.8 5.2 3.3 2.0 0.9 10 x 4 x 0.125 10/9.3-11 3/4 59.9 45.2 35.1 27.9 22.6 18.5 12 x 4 x 0.125 10/9.3-11 3/4 36.5 26.9 20.3 15.6 12.1 9.5 17 x 4 x 0.125 10/9.3-11 3/4 36.5 26.9 20.3 15.6 12.1 9.5 17 x 4 x 0.125 10/9.3-11 3/4 30.7 22.3 16.6 12.5 9.41 7.1 20 x 4 x 0.125 10/9.3-11 3/4 24.0 16.9 12.1 8.7 6.1 4.2 <!--</td--><td>Width (inches) x Range (inches) Size (inches) Base Wind Velocity $10 \times 3 \times 0.125$ $10/9.3-11$ $3/4$ 31.4 23.6 18.2 14.3 11.5 9.3 7.0 $15 \times 3 \times 0.125$ $10/9.3-11$ $3/4$ 18.5 13.4 9.9 7.4 5.5 4.1 3.0 $20 \times 3 \times 0.125$ $10/9.3-11$ $3/4$ 11.5 7.8 5.2 3.3 2.0 0.9 0.1 $10 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 59.9 45.2 35.1 27.9 22.6 18.5 15.4 $12 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 48.4 36.5 26.9 20.3 15.6 12.1 9.5 7.4 $17 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 36.5 26.9 20.3 15.6 12.1 9.5 7.4 $17 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 24.0 16.9 12.1 8.7 6.1 42.2 <</td></td>	Width (inches) x Range (inches) Size (inches) Range (inches) Size (inches) Base Wind Velocity 10 x 3 x 0.125 10/9.3-11 3/4 31.4 23.6 18.2 14.3 11.5 9.3 15 x 3 x 0.125 10/9.3-11 3/4 18.5 13.4 9.9 7.4 5.5 4.1 20 x 3 x 0.125 10/9.3-11 3/4 11.5 7.8 5.2 3.3 2.0 0.9 10 x 4 x 0.125 10/9.3-11 3/4 59.9 45.2 35.1 27.9 22.6 18.5 12 x 4 x 0.125 10/9.3-11 3/4 36.5 26.9 20.3 15.6 12.1 9.5 17 x 4 x 0.125 10/9.3-11 3/4 36.5 26.9 20.3 15.6 12.1 9.5 17 x 4 x 0.125 10/9.3-11 3/4 30.7 22.3 16.6 12.5 9.41 7.1 20 x 4 x 0.125 10/9.3-11 3/4 24.0 16.9 12.1 8.7 6.1 4.2 </td <td>Width (inches) x Range (inches) Size (inches) Base Wind Velocity $10 \times 3 \times 0.125$ $10/9.3-11$ $3/4$ 31.4 23.6 18.2 14.3 11.5 9.3 7.0 $15 \times 3 \times 0.125$ $10/9.3-11$ $3/4$ 18.5 13.4 9.9 7.4 5.5 4.1 3.0 $20 \times 3 \times 0.125$ $10/9.3-11$ $3/4$ 11.5 7.8 5.2 3.3 2.0 0.9 0.1 $10 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 59.9 45.2 35.1 27.9 22.6 18.5 15.4 $12 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 48.4 36.5 26.9 20.3 15.6 12.1 9.5 7.4 $17 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 36.5 26.9 20.3 15.6 12.1 9.5 7.4 $17 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 24.0 16.9 12.1 8.7 6.1 42.2 <</td>	Width (inches) x Range (inches) Size (inches) Base Wind Velocity $10 \times 3 \times 0.125$ $10/9.3-11$ $3/4$ 31.4 23.6 18.2 14.3 11.5 9.3 7.0 $15 \times 3 \times 0.125$ $10/9.3-11$ $3/4$ 18.5 13.4 9.9 7.4 5.5 4.1 3.0 $20 \times 3 \times 0.125$ $10/9.3-11$ $3/4$ 11.5 7.8 5.2 3.3 2.0 0.9 0.1 $10 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 59.9 45.2 35.1 27.9 22.6 18.5 15.4 $12 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 48.4 36.5 26.9 20.3 15.6 12.1 9.5 7.4 $17 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 36.5 26.9 20.3 15.6 12.1 9.5 7.4 $17 \times 4 \times 0.125$ $10/9.3-11$ $3/4$ 24.0 16.9 12.1 8.7 6.1 42.2 <

0 0	t guration* Single ¹	Color Options† BZ BK
2	Twin @ 180°¹	WH PB SV
3	Twin @ 90°1	
5	Triple ¹	
6	Quad ¹	
T	Tenon ²	

P

GFI Outlet Accessory - 120V

REC-GF1BZ REC-GF1PB REC-GF1BK REC-GF1SV REC-GF1WH

1-Direct mount pole configuration; add prefix "2" to conguration numbers for fixtures with Fixed 20° mount (i.e. "21", "22", "23", "25", "26") Example PS6S30S21BZ

2-Order tenon separately

General Description

Non-tapered square steel poles are supplied with welded base with cover, four galvanized anchor bolts, masonite mounting template and a pole cap (except tenon mount). Each anchor bolt is provided with two washers and two nuts. Steel pole base has slotted holes. Per National Electrical Code requirements, pole is standard with a 2" x 6" (51 x 152 mm) hand hole, located 18" (457 mm) above bottom of pole base. A #10-32 stainless-steel weld stud with grounding lug is located inside pole, opposite hand hole; a hand hole cover is supplied but shipped separately. In addition, 4" x 27' and 4" x 30' poles include an internal 5/16" steel reinforced sleeve welded inside the bottom 24" of the pole, as well as a reinforcement welded around the hand hole for added strength.

Materials

Square, non-tapered pole of structural steel tubing (ASTM A 500); with a minimum yield strength of 46,000 p.s.i. Welded to a formed carbon steel base plate with a minimum yield strength of 36,000 p.s.i.

Finish

Exclusive Colorfast DeltaGuard™ finish features an E-Coat epoxy primer with an ultra-durable powder topcoat, providing excellent resistance to corrosion, ultraviolet degradation and abrasion. The finish is covered by our 7 year limited warranty.

Labels

Beta Lighting square steel poles meet or exceed National Electrical Code Requirements. In the US, Beta square poles are classified by Underwriters Laboratories Inc. for electrical ground bonding; in Canada, they are CSA certified for electrical ground bonding and structural strength.

Patents

US 5,820,255; 6,640,517; Patent pending



Qudoba Howell Distributor: Graybar Electric/GR (Walker)

Catalog Number: SEC-EDG-3M-WM-06-D-UL-BZ-700MA Notes:

Type:

WM2

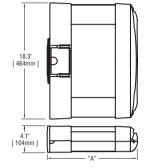
SEC-EDG-3M-WM

THE EDGE® LED Wall Pack





Notes:



# of LEDs	Dim. "A'
20	11.91"
40	11.91"
60	13.91"
80	15.91"
100	17.91"
120	19.91"

Product	Family	Optic	Mounting	# of LEDs (x 10)	LED Series	Voltage	Color Options	Drive Current Not Field Adjustable		Installed Options e additional options in manually on the lines provided above.
SEC	EDG	3M ¹ 3MB ²	WM3	02 04 06 08 10 12	D	UL Universal 120–277V UH Universal 347–480V 12 120V 24 240V 27 277V 34 347V	SV Silver BK Black BZ Bronze PB Platinum Bronze WH White	350mA 350mA 525 ⁴ 525mA 700 ⁵ 700mA	43K F P ML	4300K Color Temperature ⁶ Fuse ^{7,8,9} Photocell ^{9,10} Multi-Level (75/525) ¹¹

Footnotes

- 1. IESNA Type III Medium distribution
- IESNA Type III Medium distribution w/ backlight control
- 3. Wall mount
- Available on fixtures with 20-80 LEDs
- Available on fixtures with 20-60 LEDs
- 6. Color temperature per fixture; 6000K standard; minimum 70 CRI
- 7. Not available when UH voltage is selected
- When code dictates fusing use time delay fuse Not available with all multi-level options. Refer to multi-level spec sheet for availability and additional information
- 10. Must specify voltage other than UL or UH
- 11. Refer to multi-level spec sheet for availability and additional information

						LE	:D PEKFOKM	ANC	JE SI	PECS							
# of LEDs	Initial Delivered Lumens – Type III Medium @ 6000K	B U G	Initial Delivered Lumens – Type III Medium w/ backlight control @ 6000K	B U G	III Medium @	B U G Rating	Type III Medium w/ backlight control @ 4300K	B Rat		System Watts 120–480V	Total Current @ 120V	Total Current @ 240V	Total Current @ 277V	Total Current @ 347V	Total Current @ 480V	L ₇₀ Hours [*] @ 25° C (77° F)	50K Hours Lumen Maintenance Factor [*] @ 15° C (59° F)
						<u>350m</u>	A Fixture Operat		at 25°								
20	1,814 (02)	1 1 1	1,342 (02)	0 1 1	1,672 (02)	1 1 1	1,237 (02)	0	1 1	26	0.20	0.11	0.10	0.09	0.07	>150,000	
40	3,628 (04)	1 1 1	2,683 (04)	1 1 1	3,343 (04)	1 1 1	2,473 (04)	0	1 1	47	0.40	0.21	0.19	0.15	0.12	>150,000	ļ
60	5,371 (06)	2 2 2	3,973 (06)	1 2 1	4,950 (06)	2 2 2	3,662 (06)		2 1	68	0.58	0.30	0.26	0.20	0.16	>150,000	93%
80	7,161 (08)	2 2 2	5,298 (08)	1 2 2	6,600 (08)	2 2 2	4,882 (08)		2 1	90	0.77	0.38	0.34	0.26	0.20	>150,000	35 /6
100	8,929 (10)	3 3 3	6,605 (10)	1 3 2	8,230 (10)	2 2 2	6,088 (10)	1	2 2	111	0.95	0.47	0.42	0.32	0.24	>150,000	
120	10,715 (12)	3 3 3	7,926 (12)	1 3 2	9,876 (12)	3 3 3	7,305 (12)	1	3 2	132	1.15	0.56	0.50	0.38	0.28	>150,000	
						<u>525m</u>	A Fixture Operat	ing a	at 25°								
20	2,539 (02)	1 1 1	1,878 (02)	0 1 1	2,340 (02)	1 1 1	1,731 (02)	0	1 1	37	0.31	0.17	0.16	0.12	0.10	136,000	
40	5,079 (04)	2 2 2	3,757 (04)	1 2 1	4,681 (04)	2 2 2	3,462 (04)		2 1	70	0.57	0.29	0.26	0.21	0.16	136,000	92%
60	7,520 (06)	2 2 2	5,562 (06)	1 2 2	6,930 (06)	2 2 2	5,127 (06)	1 :	2 1	102	0.87	0.44	0.39	0.30	0.22	129,000	32 /0
80	10,026 (08)	3 3 3	7,417 (08)	1 3 2	9,240 (08)	3 3 3	6,835 (08)	1	3 2	133	1.14	0.56	0.49	0.39	0.29	129,000	
						700m <i>F</i>	A Fixture Operat	ing :	at 25°								
20	3,102 (02)	1 1 1	2,281 (02)	0 1 1	2,858 (02)	1 1 1	2,102 (02)	0	1 1	50	0.42	0.22	0.20	0.15	0.12	111,000	
40		2 2 2	4,562 (04)	1 2 1	5,717 (04)	2 2 2	4,204 (04)		2 1	93	0.79	0.40	0.35	0.27	0.20	111,000	90%
60	9,185 (06)	3 3 3	6,754 (06)	1 3 2	8,465 (06)	2 3 2	6,225 (06)	1 :	2 2	137	1.18	0.59	0.51	0.39	0.29	111,000	
* For re	commended lumer	n maintena	nce factor data see	TD-13	** For more	informatio	on on the IES BUG	(Bacl	klight-	Uplight-Glare) Ratin visit	www.iesn	a.org/PDF/	Erratas/TM	-15-07Bug	RatingsAdden	dum.pdf

 ${\it NOTE: All \ data \ subject \ to \ change \ without \ notice.}$





Qudoba Howell Distributor: Graybar Electric/GR (Walker)

Catalog Number:

SEC-EDG-3M-WM-06-D-UL-BZ-700MA

Notes:

Type:

WM2

MLS13-42715

SEC-EDG-3M-WM

THE EDGE® LED Wall Pack

Rev. Date: 8/30/11

General Description

Slim, low profile design. Fixture sides are rugged cast aluminum with integral, weathertight LED driver compartments and high performance aluminum heatsinks specifically designed for LED applications. Housing is rugged aluminum. Furnished with low copper, lightweight mounting box designed for installation over standard and mud ring single gang J boxes. Secures to wall with four (4) 3/16" (4.8mm) screws (by others). Conduit entry from top, bottom, sides and rear. Allows mounting for uplight or downlight. Designed and approved for easy through-wiring. Includes leaf/debris guard. Five year limited warranty on

Modular design accommodates varied lighting output from high power, white, 6000K (+/- 500K per full fixture), minimum 70 CRI, long life LED sources. Optional 4300K (+/- 300K per full fixture) also available. 120-277V 50/60 Hz, Class 1 LED drivers are standard, 347-480V 50/60 Hz driver is optional, LED drivers have power factor >90% and THD <20% at full load. Integral weather-tight J-box with leads (wire nuts) for easy power hook-up. Units provided with integral 10kV surge suppression protection standard. Surge protection tested in accordance with IEEE/ANSI C62.41.2.

Testing & Compliance

UL listed in the U.S. and Canada for wet locations and enclosure rsted IP66 per IEC 60529. Consult factory for CE Certified products. Dark Sky Friendly. IDA Approved. RoHS







Finish

Exclusive Colorfast DeltaGuard® finish features an E-Coat epoxy primer with an ultradurable silver powder topcoat, providing excellent resistance to corrosion, ultraviolet degradation and abrasion. Bronze, black, white and platinum bronze powder topcoats are also available. The finish is covered by our 10 year limited warranty.

Fixture and finish are endurance tested to withstand 5,000 hours of elevated ambient salt fog conditions as defined in ASTM Standard B 117.

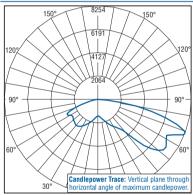
U.S. and international patents granted and pending. BetaLED is a division of Ruud Lighting, Inc. For a listing of Ruud Lighting, Inc. patents, visit www.uspto.gov.

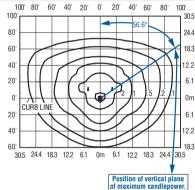
Field-Installed Accessories



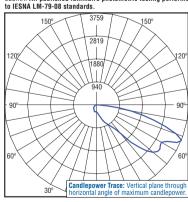
Rird Snikes XA-BRDSPK

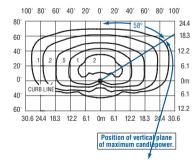
Photometrics





Independent Testing Laboratories certified test. Report No. Isofootcandle plot of 4300K, 120 LED Type III Medium security ITL67871. Candlepower trace of 4300K, 160 LED Type III Medium luminaire at 25' (7.6m) A.F.G. Luminaire with 13,826 initial area luminaire with 18,862 initial delivered lumens operating at delivered lumens operating at 525mA. Initial FC at grade. 525mA. All published luminaire photometric testing performed





Independent Testing Laboratories certified test, Report No. ITL68539. Candlepower trace of 4300K, 40 LED Type III Medium w/ backlight control area luminaire with 5,084 initial delivered lumens operating at 525mA. All published luminaire photometric testing performed to IESNA LM-79-08 standards.

Isofootcandle plot of 4300K, 120 LED Type III Medium area luminaire at 25' (7.6m) A.F.G. Luminaire with 10,227 initial delivered lumens operating at 525mA. Initial FC at grade.

NOTE: All data subject to change without notice.

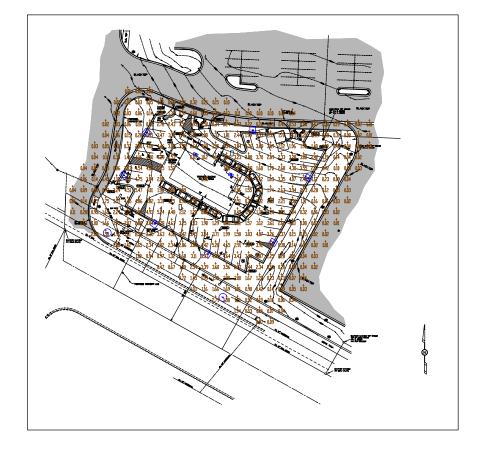


© 2011 BetaLED®, a division of Ruud Lighting • 1200 92nd Street • Sturtevant, WI 53177 • 800-236-6800 • www.betaLED.com



Qdoba- Howell, Mi

Qdoba		well, Mi (0805) LUMINAIRE SCHEDULE				
TYP	SYMBOL		LAMP	MOUNTING/BALLAST	LLF	QTY
C127	•	CREE ARE-EHO-3M-AA-12-E-UL-700-50 CREE EDGE HIGH DUTPUT, TYPE III	(20) 17,687 Lumens	269 Watts	0.94	5
C12B		CREE ARE-EHO-3MB-AA-12-E-UL-700-50K	(20) 13,472 Lumens	270 Watts	0.94	5
SA	•	CAST METAL POST-TOP FITTER AND	(1) MSPS150 13,000 Lumens	HID	0.72	5
WM2		Cree SEC-EDG-3M-WM-06-D-UL-700-57k 60 LED TYPE III MEDIUM 700mA 4	(60) 9059 Lunens	133 Vatts	0.94	2





RESOLUTION OF THE PLANNING COMMISSION ADOPTING UPDATES TO THE MASTER PLAN AND FUTURE LAND USE MAP

Genoa Charter Township Livingston County, Michigan

At a regular meeting of the Planning Commission of Genoa Charter Township, Livingston County, Michigan, held on November 25, 2013, at 6:30 p.m. prevailing local time.

PRESENT:
ABSENT:
The following Preamble and Resolution were offered by Commissionerand supported by Commissioner:
WHEREAS, Genoa Charter Township initiated a process to update the Master Plan for Land Use which was adopted in 2006; and
WHEREAS, the Genoa Charter Township Planning Commission, pursuant to the Michigan Planning Enabling Act (Public Act 33 of 2008, as amended), has studied and prepared recommendations for the use, development and preservation of all lands in the Township; and
WHEREAS, the Planning Commission has developed an update to the Master Plan consisting of research and analyses dealing with land use, demographics, S. Latson Road corridor development, transportation, community facilities, recreation, and other pertinent topics; and
WHEREAS, the Planning Commission has used the Master Plan analyses to prepare an update to the Future Land Use Map that allocates land in appropriate amounts for the future development of residential uses, commercial and office uses, industrial uses, public and institutional uses; and
WHEREAS, on June 10, 2013, the Planning Commission submitted the plan to the Township Board of

WHEREAS, on July 15, 2013 the Genoa Charter Township Board of Trustees authorized distribution of the Master Plan as provided by the Michigan Planning Enabling Act (MPEA); and

Trustees for distribution; and

WHEREAS, the Township complied with required plan development steps of notifying and involving the Livingston County Planning Commission, surrounding communities and outside agencies; and

WHEREAS, the Planning Commission held a public hearing on November 25, 2013, and considered all comments and concerns of the public; and

WHEREAS, the Planning Commission recognizes that the Master Plan and Future Land Use Map are guides for public and private decision-making that will keep the Township in motion toward its vision to maintain outstanding quality of life for all residents; and

WHEREAS, the Township Board as authorized by the MPEA has asserted its right to approve or reject the proposed updated Master Plan.

NOW, THEREFORE, BE IT RESOLVED that the Planning Commission of Genoa Charter Township hereby adopts the updated Master Plan and Future Land Use Map, its narrative, maps, tables, and other descriptive data, and resolves to use the Plan and Map together as a guide for the overall development of the Township;

IT IS FURTHER RESOLVED that the Planning Commission wishes to present the updated Master Plan and Future Land Use Map as adopted herein to the Township Board for approval or rejection as set forth in Resolution #120402.

AYES:
NAYS:
ABSENT:
ABSTENTIONS:
RESOLUTION DECLARED ADOPTED
I hereby certify that the foregoing is a true and complete copy of a resolution adopted by the Planning Commission of Genoa Charter Township, Livingston County, Michigan, at a regular meeting held on November 25, 2013.
Douglas Brown

Chairman, Genoa Charter Township Planning Commission

RESOLUTION 120402

GENOA CHARTER TOWNSHIP

MASTER PLAN ADOPTION AUTHORITY

The following resolution was

OFFERED BY: Smith

And

SUPPORTED BY: Skolarus

And unanimously passes a roll call vote having been taken; at a duly called public meeting of the Board of Trustees of Genoa Charter Township and held at the Genoa Township Hall located at 2911 Dorr Road, Brighton, Michigan 48116.

WHEREAS, Michigan Public Act 33 of 2008, the Michigan Planning Enabling Act, requires a community to adopt a master plan and sets forth the procedures for such plan, and;

WHEREAS, Section 43(3) of Michigan Public Act 33 of 2008 states the legislative body may assert the right to approve or reject a plan prepared by the Planning Commission in the form of a resolution, and;

WHEREAS, the Genoa Township Planning Commission is currently developing an update to the Township Master Plan, and;

WHEREAS, the Genoa Township Board of Trustees believes such plan is an important tool in furthering the development and success of the Township, provides a sound basis for zoning and other requirements, and desires the opportunity to be involved in the planning process and development of the document.

IT IS HEREBY RESOLVED, that the Genoa Township Board of Trustees shall assert its authority to approve or reject the Genoa Township Master Plan update for the Township once it is presented to them by the Planning Commission, in accordance with plan preparation and adoption procedures set forth in Michigan Public Act 33 of 2008, as amended.

CERTIFICATION

Paulette A. Skolarus being the duly elected Clerk of Genoa Charter Township does hereby certify that this Resolution was duly passed at a public meeting of the Genoa Charter Township Board of Trustees held on April 2, 2012.

Paulette A. Skolarus

April 2, 2012

GENOA CHARTER TOWNSHIP BOARD

Regular Meeting July 15, 2013

MINUTES

Supervisor McCririe called the regular meeting of the Genoa Charter Township Board to order at 6:30 p.m. The Pledge of Allegiance was then said. The following persons were present constituting a quorum for the transaction of business: Gary McCririe, Paulette Skolarus, Robin Hunt, Linda Rowell, Jim Mortensen, Todd Smith and Jean Ledford. Also present were Township Manager Michael Archinal and approximately 40 persons in the audience.

A Call to the Public was made with the following response: Julie Stachecki-Johanningsmeier – I am a certified arborist and there is a lethal tree disease in Livingston County. It is called Oak Wilt and will destroy century old oak trees within a week. The disease is spread above and below ground by beetles. The township offered to place a notice on its web page to advise residents of the damage that can occur while pruning.

Norma Nichols – I live near Lake Chemung and am concerned with the fireworks that is being used almost on a daily basis and all hours of the night. McCririe – Fireworks are regulated by the Michigan Fireworks Safety Act. Your concerns need to be raised in Lansing. Since the Township does not have a police department we would not be able to enforce that issue.

Approval of Consent Agenda:

Moved by Ledford and supported by Smith to approve all items under the consent agenda with the moving of the request related to the personnel policy to the regular agenda for action. The motion carried unanimously.

- 1. Payment of Bills.
- 2. Request to approve minutes: June 17, 2013 and June 24, 2013
- 3. Consider proposal from Tetra Tech for Township Hall parking lot design phase services.

Approval of Regular Agenda:

Moved by Skolarus and supported by Hunt to approve the Regular Agenda with the addition of the personnel policy amendment and the deletion of Resolution 2 for Timberview Road Improvement Project. The amended agenda was voted and carried unanimously.

4. Request for an amendment of the Personnel Policy related to funeral leave as recommended by the administrative committee.

Moved by Smith and supported by Ledford to approve the amendment with changing C-1 to include step-mother, step-father and step-children. The motion carried unanimously.

5. Review of the draft Master Plan and request for approval to distribute the draft plan pursuant to the Michigan Planning Enabling Act (MCL 125.3481).

Brad Strader of L.S.L. and Kelly VanMarter addressed the board asking for approval to distribute the draft of the Master Plan. The board was encouraged to move forward however there was concern that property along Nixon to Crooked Lake needed further review. The board directed that the plan specify an area along Nixon Road to Crooked Lake for further consideration and that an overlay plan be developed identifying access points and potential building configurations. Strader and VanMarter were congratulated on the scope of work and results that were presented to the board.

A call to the public was made with the following response: Mike Boss – The Campus Interchange is undefined as yet but he felt the board was moving in the right direction with the overlay addition to the plan.

Mancuso advised the board that the Planning Commission had final approval of the Plan unless the board stipulated that right in their motion. Moved by Smith and supported by Ledford to approve the distribution of the Draft Master Plan with a conceptual overlay plan for future development and reserve the right to a further review of the Master Plan before final approval. The motion carried unanimously.

6. Discussion and possible action related to the wind turbines at the Township Hall.

Archinal – One of the Windspire Turbines self-destructed sending shards of metal around the park area. After further inspection by The Green Panel Firm of Brighton similar conditions in a second windspire were found. The State of Michigan and the Federal Department of Energy were notified and permission was received to have the turbines removed because of health and safety issues.

Moved by Mortensen and supported by Smith to authorize the expenditure of \$9,625.00 to remove the turbines with preservation of the solar panels. The motion carried unanimously.

7. Consider request to enter into closed session for discussion pending litigation pursuant to Section 8(e) of the 1976 Open Meetings Act.

Moved by Skolarus and supported by Ledford to move to closed session at 7:37 to discuss pending litigation. The motion carried by roll call vote as follows: Ayes – Ledford, Smith, Hunt, Rowell, Mortensen, Skolarus and McCririe. Nays – None.

The regular meeting of the board was re-opened at 8:13 p.m.

Moved by Smith and supported by Skolarus to authorize Attorney Mancuso to file an appeal of the court's 06/25/2013 decision in Chestnut Development vs. Genoa Township and Mike

GENOA CHARTER TOWNSHIP PLANNING COMMISSION PUBLIC HEARING JUNE 10, 2013 6:30 PM

MINUTES

<u>CALL TO ORDER:</u> The meeting of the Genoa Charter Township Planning Commission was called to order at 6:32 pm. Present were Barbara Figurski, James Mortensen, Chairman Doug Brown, Diana Lowe and Dean Tengle. Also present were Assistant Township Manager, Kelly VanMarter, Brian Borden of LSL, and Gary Markstrom of TTMPS.

<u>PLEDGE OF ALLEGIANCE:</u> The Pledge of Allegiance was recited.

INTRODUCTIONS: Chairman Brown introduced all of the Commissioners, and noted that two were absent this evening. He also introduced staff and the planner and engineer. He gave a review of how the Master Plan update process works, including the Township gathering input from residents and business owners. The Master Plan is a guide used to make requested changes to the zoning ordinance. Per State law, the Master Plan must be reviewed every five years. While the Master Plan includes the entire Township, this revision has special interest in the development of the new I-96 interchange at Latson Road. He added that changes to the Master Plan do not change the existing zone and zoning changes do not necessarily follow the Master Plan. The proposed Master Plan includes two new zoning districts, Interchange Commercial and Interchange Campus, which will need to be defined and developed at a later date.

Tonight, the Planning Commission will review the proposed Master Plan and then make a recommendation to the Township Board. There is no public hearing associated with this step of the process; however, the Planning Commission will take comments from the public after the presentation.

<u>APPROVAL OF THE AGENDA:</u> The agenda was approved pursuant to a **Motion** by Barbara Figurski and supported by James Mortensen. **Motion carried unanimously**.

<u>CALL TO THE PUBLIC:</u> Chairman Brown opened the call to the public at 6:40 p.m. with no response.

AGENDA ITEM #1*... Review of the draft Master Plan and request for submittal of the draft plan to the Township Board for distribution and public review pursuant to the Michigan Planning Enabling Act.

(*Please note that this agenda item is not a public hearing and as such will not be open to public comment unless otherwise determined by the Chairman. An official public hearing on the Master Plan is required after the public review period.)

Ms. VanMarter referenced her memo in tonight's packet. She gave a review of the Master Plan update process. The plan was developed by a steering committee that consisted of members of Township staff as well as the planner. Then an open house was held in February and feedback was received from residents. There was also a survey sent to the residents. This feedback was considered when developing the plan that is being presented this evening. She feels this plan is ready to share with the public and again gather their feedback as well as feedback from adjacent communities and organizations. Then it will be back before the Planning Commission for an official public hearing.

Brian Borden reviewed the changes that were made to the plan. They updated the demographics, the future land use plan/map, goals and objectives as well as removed recommendations from the old plan that were already completed. They also updated the transportation section; including motorized and non-motorized transportation, and updated the maps.

He noted that tonight is only one step in the process. There will be other opportunities for members of the public to provide their input.

A map of the Latson Road Interchange area of the Township was put up on the screen for the audience to view.

Mr. Borden stated they are proposing Interchange Commercial around the immediate area of the exits and entrances to I-96, which will consist of higher-intensity commercial uses. As you move south and east, it will be Interchange Campus, which would be for larger / institutional uses, such as educational or medical facilities. The debate has been where these two zoning areas should begin and end. He noted that the Township will monitor the development closely and the plan can be amended. The amendment process would be similar to what is being done now; however, it would only focus on this area and the process would not be as lengthy.

Chairman Brown questioned why the interchange campus zoning ended at the proposed location and was not brought down to Crooked Lake and over to Fishbeck. Mr. Borden stated they were limited by the lack of infrastructure and also, they do not want businesses currently on Grand River to move to this location, simply because it is new. Mr. Markstrom stated that when the water and sewer were put in this area originally, I-96 was the southern boundary. His office is currently studying what needs to be done to meet the needs of the proposed Master Plan as well as how much these improvements will cost.

Phil Santer of SPARK, stated they are economic developers and not professional planners. They provided suggestions to the Township on what they felt opportunities the new interchange could offer with regard to development. Dean Tengle asked how the suggested development would benefit not only the residents in that area, but the

Township as a whole. Mr. Santer stated they are suggesting attracting large users to support the existing commerce as well as attract employment.

Mike Boss of Boss Engineering has heard comments from his clients that the input provided to the Township by the public was mostly to continue the more dense zoning further south; however, these comments were not incorporated into the plan that is shown this evening. There is no transitional zoning being proposed. He does not feel that waiting to see what will be developed and then amending the Master Plan is good planning. The infrastructure should be planned at this time and not based on what is developed there. Dean Tengle asked how the suggested development would benefit not only the residents in that area, but the Township as a whole. Mr. Boss stated there will be 16,000 vehicles that travel that road every day. All of this traffic will affect the people who live there, but they are not able to develop their property.

Chairman Brown noted that most of the residents who submitted letters suggested letting the market dictate what will be developed in this area. He feels that is what they are doing by leaving the area south of Sweet Road as five-acre parcels. He reiterated Mr. Markstrom's comments that the Township is not sure if the infrastructure is able to be developed to support this higher density in the area.

Mr. Boss feels the Master Plan should be put on hold and wait and see what the demand will be after the interchange is complete and then the plan can be made based on the interest.

Chairman Brown asked Ms. VanMarter if this could be done. She stated that yes, this area can be left as it is currently, but the Master Plan needs to be reviewed at this time. She has been working on ways to advise the public that this land is becoming available from an economic development perspective. She would be open to making an amendment to the Master Plan once the exchange is open.

James Mortensen asked Ms. VanMarter what is the advantage of waiting. She stated there would be more knowledge of what the traffic amount will be. Mr. Mortensen stated that he feels Mr. Boss has valid points, one being the transitional zoning; however, until the funding is available to develop the road, water, and sewer, nothing will be able to be developed. Once land is zoned to a higher density, it cannot be zoned back to a lower one. He is in favor of the campus zoning in the locations that are proposed. It can always be revised to a more intense use in the future. He would like to move the plan along.

Ms. VanMarter stated that while the interchange campus zoning is not a traditional transitional zoning, it is intended to serve as such. They intend to write the ordinance to include landscaping, buffers, special architectural features, etc. The campus zoning will transition from the high intensity commercial at the ramps to the residential area to the south.

Chairman Brown asked if anyone in the public would like to speak.

Ed Bishop, who lives on Nixon Road, feels that Nixon Road being two lanes is going to increase traffic. He also wants to know if his wife is going to be able to run a business from her home.

Brenda Nicholas, who lives on Nixon Road, feels that if the zoning is changed, it would attract more businesses into the area.

Leo Nicholas, of Nixon Road, suggested that the new sewer pipe that is being put in for Oak Point should be run down Nixon instead of Chilson to help with any new development in this area. Also, 22 residents in this area sent letters to the Township. He would like the Commissioners to read them.

Paul Deluca, of Nixon Road, does not want any special assessments. He does not want to sell his property and move; he wants to live there. He did not want the interchange. He is concerned about crime.

Steve Vitous, of 2592 Nixon Road, asked about the speed limit at the school. Ms. VanMarter suggested he contact the Livingston County Road Commission.

Planning Commission Disposition

A. Authorize submittal of the Master Plan to the Township Board. Motion by James Mortensen and supported by Barbara Figurski to authorize the submitted Master Plan to the Township as presented. **Motion carried unanimously**.

Administrative Business:

- Staff Report. Kelly VanMarter stated the next Planning Commission Meeting will be on July 22nd. She has received a submittal from the Church of the Nazarene.
- Approval of May 13, 2013 Planning Commission meeting minutes. Motion by Barbara Figurski and supported by Diana Lowe to adopt the minutes with recommendations made this evening. Motion carried unanimously.
- Member Discussion
- Adjournment. Motion by Diana Lowe and supported by Barbara Figurski to adjourn. Motion carried unanimously. Meeting adjourned at 8:30 p.m.



Livingston County Department of Planning

November 21, 2013

Genoa Charter Township Board of Trustees c/o Polly Skolarus, Township Clerk Genoa Charter Township Hall 2911 Door Road Brighton, MI 48116

Kathleen J. Kline-Hudson AICP, PEM Director

Robert A. Stanford

AICP, PEM Principal Planner

Scott Barb PEM Principal Planner Re: Planning Commission Review of Master Plan Amendment MP-3-13

Dear Board Members:

The Livingston County Planning Commission met on Wednesday, November 20, 2013 and reviewed the master plan amendment referenced above. The Livingston County Planning Commissioners made the following recommendation:

MP-3-13 Approval.

The addition of design guidelines and illustrative maps for the Interchange Commercial and Interchange Campus land area, adds much greater understanding to the intended future of this I-96 Interchange area. The Township Planning Commission and staff should be commended for these enhancements that complete the Genoa Charter Township Master Plan.

Copies of the staff review and draft Livingston County Planning Commission meeting minutes are enclosed. Do not hesitate to contact our office should you have any questions regarding these county actions.

Sincerely,

Department Information

Administration Building 304 E. Grand River Avenue Suite 206 Howell, MI 48843-2323

> (517) 546-7555 Fax (517) 552-2347

Web Site co.livingston.mi.us

Kathleen J. Kline-Hudson

Director

Enclosures

c: Doug Brown, Chair, Genoa Township Planning Commission
Kelly VanMarter, Assistant Township Manager/Community Development

Director

Meeting minutes and agendas are available at: http://www.livgov.com/plan/Pages/agendas.aspx

LIVINGSTON COUNTY PLANNING COMMISSION MEETING MINUTES

DRAFT - November 20, 2013

7:30 p.m.

304 E. Grand River Ave., Howell, Michigan

PLANNING COMMISSION			
COMMISSIONERS PRESENT:	REID KRINOCK, CHAIR JEANNE CLUM, VICE-CHAIR BILL ANDERSON JAMES SPARKS	SYLVIA KENNEDY-CARRASCO MIKE HUBERT	
COMMISSIONERS ABSENT:	BRIAN PROKUDA		
STAFF PRESENT:	KATHLEEN KLINE-HUDSON ROB STANFORD SCOTT BARB		
OTHERS PRESENT:	KELLY VAN MARTER – GENOA TOWNSHIP PLANNER, ASST TOWNSHIP SUPERVISOR	DOUG BROWN – GENOA TOWNSHIP PLANNING COMMISSION CHAIR	

- 1. CALL TO ORDER Meeting was called to order by Commissioner Krinock at 7:30 P.M.
- 2. PLEDGE OF ALLEGIANCE
- 3. ROLL AND INTRODUCTION OF GUESTS
- 4. APPROVAL OF AGENDA

IT WAS MOVED BY COMMISSIONER KENNEDY-CARRASCO, SECONDED BY COMMISSIONER ANDERSON TO **APPROVE THE AGENDA** DATED **NOVEMBER 20, 2013**. **All in favor, motion passed.**

5. APPROVAL OF MINUTES

IT WAS MOVED BY COMMISSIONER ANDERSON, SECONDED BY COMMISSIONER KENNEDY-CARRASCO TO APPROVE THE OCTOBER 16, 2013 MINUTES, AS PRESENTED. All in favor, motion passed.

- 6. CALL TO THE PUBLIC There were no comments from the public.
- 7. ZONING REVIEWS

A. MP-03-13 GENOA TOWNSHIP AMENDMENTS TO MASTER PLAN AMENDMENT

The Genoa Charter Township Planning Commission proposes a 2013 Master Plan Update to the 2006 Genoa Charter Township Master Plan. A first draft of the master plan update was reviewed by the Livingston County Planning Commission on August 21, 2013 at which time the Planning Commission recommended "No Action – Encourage Further Review" because the draft of the master plan did not include language regarding the Interchange Campus Design Guidelines for the future I-96 Interchange. County Planning Commissioners felt they should review the entire sub area plan prior to making any final recommendations on the proposed amendments to the Genoa Charter Township Master Plan. The Township has now drafted additional language that enhances the Future Land Use chapter of the plan, specifically E. I-96/Latson Road Subarea Plan.

Township Planning Commission Recommendation: APPROVAL. At their July 15, 2013 meeting, the Genoa Charter Township Board recommended approval of distributing the draft Genoa Charter Township Master Plan to all surrounding municipalities in accordance with Section 41 of the Michigan Planning Enabling Act.

Staff Recommendation: APPROVAL. The addition of design guidelines and illustrative maps for the Interchange Commercial and Interchange Campus land area, adds much greater understanding to the intended future of this I-96 Interchange area. The Township Planning Commission and staff should be commended for these enhancements that complete the Genoa Charter Township Master Plan.

Commission Discussion: Commissioner Krinock asked that the Township remain flexible regarding future development in this area and be mindful of "who will come". Kelly Van Marter, Genoa Township Planning Director and Assistant Township Manager stated that they appreciate all the suggestions and comments from County Planning regarding this planning process. The Township has been very mindful of being flexible to furture development in this unique area. They look forward to this area becoming a viable economic area. The Township has worked closely with Ann Arbor SPARK with regard to how this area should be developed and SPARK is on board with the Township's planning concept for this area. Commissioner Sparks asked about the current small residential lots located in Area B (from the map). Mrs. Van Marter stated that most of these are small residential lots and will most likely remain as such until the owners are ready to sell and move on. There are no immediate plans for commercial uses in these areas. Commissioner Clum asked if there was any consideration for existing residential owners through this planning process. Mrs. Van Marter stated that the Township most definitely considered these areas very carefully in this process and they will continue to be considered carefully as development plans move forward in this area in the future. Commissioner Sparks stated that it was smart planning to not make this entire area commercial. Mrs. Van Marter stated that a lot of things were learned, both positive and negative, from the development along Grand River Avenue and mistakes that were made in the past, they do not want repeat.

Public Comment: None.

Commissioner Action: IT WAS MOVED BY COMMISSIONER CLUM TO RECOMMEND **APPROVAL**, SECONDED BY COMMISSIONER SPARKS.

All in favor, motion passed. 5-1 (Krinock voting nay)



Livingston County Department of Planning

HAZARD MITIGATION • PLANNING & MANAGEMENT RESEARCH • MAPPING SERVICES

MEMORANDUM

Kathleen J. Kline-Hudson AICP, PEM Director

Nancy Vorhoff Administrative Specialist TO: Livingston County Planning Commissioners and the

Genoa Charter Township Board of Trustees

FROM: Kathleen Kline-Hudson, Director

DATE: October 28, 2013

SUBJECT: MP-03-13 Amendments to June 2006 Genoa Charter Township

Master Plan

Robert A. Stanford AICP, PEM Principal Planner

Scott Barb Principal Planner The Genoa Charter Township Planning Commission proposes a 2013 Master Plan Update to the 2006 Genoa Charter Township Master Plan. A first draft of the master plan update was reviewed by the Livingston County Planning Commission on August 21, 2013 at which time the Planning Commission recommended "No Action – Encourage Further Review" because the draft of the master plan did not include language regarding the Interchange Campus Design Guidelines for the future I-96 Interchange. County Planning Commissioners felt they should review the entire sub area plan prior to making any final recommendations on the proposed amendments to the Genoa Charter Township Master Plan.

The Township has now drafted additional language that enhances the Future Land Use chapter of the plan, specifically E. I-96/Latson Road Subarea Plan. Following is a summary of the proposed update. Staff comments are noted in **bold, italic underline**.

V. <u>Future Land Use</u>

You may recall that the following two new future land use categories have been added to define the I-96/Latson subarea: Interchange Commercial and Interchange Campus. Descriptions of these future land use categories are as follows:

Interchange Commercial: Rather than typical interchanges where gas stations and fast food establishments are built piecemeal with little consideration for aesthetics, the intent of this designation is to promote planned development of these interchange commercial uses with high quality architecture. The new Latson interchange is envisioned to be the premier exit for travelers along I-96: a destination where they can get out of their vehicles to walk around, dine, and shop.

• Appropriate uses include fast food, sit-down restaurants, gas stations, retail, and entertainment.

Department Information

Administration Building 04 E. Grand River Avenue Suite 206 Howell, MI 48843-2323

> (517) 546-7555 Fax (517) 552-2347

> > •

Web Site co.livingston.mi.us



- This area may be subject to design guidelines promoting walkability, increased landscaping standards, pedestrian – scale building siting and massing, and outdoor dining/gathering.
- Very few access points: each development shall provide access connections to adjacent properties so that there may be a shared access connection to a future traffic signal.

Interchange Campus: With the creation of a new interchange at Latson/Nixon in 2013, development pressures may exist for large-scale users seeking large parcels of land with convenient access to I-96. The intent is to create a district that will accommodate large-scale Institutional campuses close to the interchange without leapfrog development further south.

- Possible principal uses alone or in combination: medical center/clinics, higher education satellite, corporate offices, high-tech research & development (with no external impacts), indoor sports center, conference center/hotel, health clubs, office centers, or senior living. Ancillary uses that have a direct connection to the principal use are allowed and should be part of the overall plan, such as limited restaurants and professional services when included as part of an overall development.
- Any large-scale development should be a well-planned, campus-like setting, planned in close coordination with the Township. Upon submittal of the first development proposal for this area, an overall development plan must be provided. This plan shall guide development in the interchange campus area including signs, access/circulation, building design, landscape, and streetscape.
- A well-landscaped entry corridor that includes a median, sidewalks, street trees, and ample
 places for pedestrians to cross S. Latson Road. This may require provision of 40' of right-ofway from the center of the road.

These two future land use categories comprise the I-96/Latson Road subarea which is further defined in Section E. as follows:

E. I-96/Latson Road Subarea Plan

The enhancements to this section include the following design guideline language that applies to both the Interchange Commercial and Interchange Campus master plan designations. Additionally, design guidelines are illustrated with photos examples in the margin, and three new maps have been added entitled: I-96 Interchange Latson/Nixon Road Subarea Plan; I-96/Latson Subarea Schematic Plan; and I-96/Latson Subarea Concept Plan (see attached). These maps provide wonderful visual references to the design guidelines.

South Latson Interchange Design Guidelines

Streetscape

Streetscape improvements, such as street lights, landscaping, wayfinding signage, and pathways, should be integrated into the interchange commercial and campus developments. This will contribute to the unified, high-quality development the Township would like to project at the new interchange.

 As part of the development of the South Latson campus, a landscaped median should be installed south of the railroad. This will not only help beautify the corridor but improve safety by restricting left-turns.



- Ornamental street lighting should be included along South Latson and within the new development itself to contribute toward the site's unified design.
- South Latson should be well landscaped, not only in the median, but along the frontage, with street trees and knee walls or hedgerows screening parking.
- Gateway and wayfinding signs should be installed at the interchange welcoming visitors to the Township and directing them to major landmarks. This signage should be consistent with that proposed along Grand River and for the Town Center. Elements of a gateway entrance sign should include lighting, landscaping, and masonry material.
- Pathways should be installed on both sides of South Latson and connect to the interior of the site. Buildings and parking should all have pedestrian connections to the pathway network.

Access and Circulation

In order to efficiently accommodate new traffic that is likely to result from new development, having a coordinated circulation and access plan is essential.

- A signalized intersection should be located approximately ¼ mile south of the railroad at Sweet Road. This should be the primary entrance to campus Area A as identified on the Subarea Map.
- An additional entrance to Area A should be located halfway between the signalized intersection and the railroad tracks and be right-in/right-out.
- Area A's ring road should be sensitive of the wetland/wooded area in its southeast corner and provide stub roads for future connections to the south.
- Area B should be accessed via the newly realigned Beck Road which can be extended and configured into a loop road.
- Area B's loop road should be sensitive to the wetland/natural areas at the south of the site.
- Auxiliary campus uses on the east side of South Latson across from Area A should be
 primarily accessed via the signalized intersection. Additional access points north and south
 of the signalized intersection should be right-in/right-out. A frontage road will help provide
 convenient access for these businesses and should continue south for future connections.
- No access points other than Beck Road should be allowed on South Latson at the interchange north of the railroad tracks. Businesses fronting South Latson at this location should share access off Beck Road.
- Access to the Future Transition Area should be integrated into the overall circulation plan for Areas A and B.
- Further access management standards are included in the Township's zoning ordinance and MDOT's Access Management Manual.

Building and Site Design

In order to establish a cohesive, high-quality campus at the South Latson interchange, it will be important to have consistent building and site design features.

- Entrances should be well defined and easily accessible by pedestrians.
- Buildings should orient toward South Latson where possible with parking given a less dominant presence along the corridor.
- Parking should be buffered with landscaping or decorative fencing.



- Understanding that a user like a hospital may need several stories for its patient wings, this
 plan seeks not to require a maximum building height. More importantly, any new building
 built along South Latson fronting the corridor should be built at a pedestrian scale at its
 Latson frontage.
- Stormwater should be consolidated and treated through low-impact design and retention ponds that contribute to the existing natural character of the site.
- Building orientation should be sensitive to wetlands and existing natural features and be situated to maximize the sight lines and pedestrian access to enjoy them.
- Materials should be of high quality brick, stone, glass, or similar, reflective of a well-designed modern research park or medical campus.
- Loading zones and waste receptacles should be well delineated and appropriately screened (see zoning ordinance).
- Lighting should be directed downward and fully shielded to eliminate an outward or upward glare, providing for adequate public safety without overly illuminating a site or building.
- Site lighting should consist of decorative fixtures, such as goose neck fixtures, and be architecturally integrated with the building style, materials and color. Pole fixtures should be located within landscaped islands or behind the curb or sidewalk.
- Monument signs should be well landscaped and have masonry bases.
- Signs should be comprised of an interesting design that adds interest to the business and the streetscape. Signs that have the appearance of a box sign are discouraged.
- Signs should be architecturally integrated with their surroundings in terms of size, shape, color, texture and lighting and not promote visual competition with other signs in the area.

County Planning Staff Comments:

- Regarding the Streetscape design guidelines, staff is hopeful that the wayfinding signs installed at the interchange welcoming visitors to the Township and directing them to major landmarks, will include directions to the historic downtowns of Howell and Brighton.
- The Access and Circulation design guidelines add a lot of clarity to how the Interchange Commercial and Interchange Campus areas will be developed and function.
- <u>Under Building and Site Design, County Planners recommend that Directory Signage</u> be placed at the entrances to Interchange Campus Area A and Area B so that all uses within the campuses are visually recognizable to the pedestrian and vehicular visitor.
- The next section in the master plan is inadvertently lettered "E" Planned Unit Development, when "E" is already used for this section.

Township Board Recommendation: At their July 15, 2013 meeting, the Genoa Charter Township Board recommended approval of distributing the draft Genoa Charter Township Master Plan to all surrounding municipalities in accordance with Section 41 of the Michigan Planning Enabling Act.

Staff Recommendation: Approval. The addition of design guidelines and illustrative maps for the Interchange Commercial and Interchange Campus land area, adds much greater understanding to the intended future of this I-96 Interchange area. The Township Planning Commission and staff should be commended for these enhancements that complete the Genoa Charter Township Master Plan.



Livingston County Department of Planning

Division of

HAZARD MITIGATION ● PLANNING & MANAGEMENT RESEARCH ● MAPPING SERVICES

August 22, 2012

Kathleen J. Kline-Hudson AICP, PEM Director

Genoa Charter Township Board of Trustees c/o Polly Skolarus, Township Clerk Genoa Charter Township Hall 2911 Door Road Brighton, MI 48116

Nancy Vorhoff Administrative Specialist

Re:

Planning Commission Review of Master Plan

Amendment MP-2-13

Dear Board Members:

Robert A. Stanford AICP, PEM Principal Planner

The Livingston County Planning Commission met on Wednesday, August 21, 2013 and reviewed the master plan amendment referenced above. The Livingston County Planning Commissioners made the following recommendation:

Scott Barb Principal Planner MP-2-13 No Action - Encourage Further Review. The Livingston County Planning Commission commends Genoa Charter Township for all of their hard work on the 2013 Master Plan Update. The proposed master plan language contained in this review represents sound planning guidance. However, because the I-96 Interchange area of Genoa Charter Township is a vitally important gateway to much of central and southeast Livingston County, the County Planning Commission would like the opportunity to review the master plan document in its entirety after new language is drafted addressing the area of further consideration (along S. Latson to Crooked Lake) and an overlay plan for the area is established.

Copies of the staff review and draft Livingston County Planning Commission meeting minutes are enclosed. Do not hesitate to contact our of fice should you have any questions regarding these county actions.

Department Information

Administration Building 304 E. Grand River Avenue Suite 206 Howell, MI 48843-2323

Sincerely,

Kathleen J. Kline-Hudson Director

(517) 546-7555 Fax (517) 552-2347

Enclosures

Web Site co.livingston.mi.us

Doug Brown, Chair, Genoa Township Planning Commission C: Kelly VanMarter, Assistant Township Manager/Community Development Director

Meeting minutes and agendas are available at: http://www.livgov.com/plan/Pages/agendas.aspx

LIVINGSTON COUNTY PLANNING COMMISSION **DRAFT** - MEETING MINUTES

August 21, 2013

7:30 p.m.

304 E. Grand River Ave., Howell, Michigan

PLANNING COMMISSION			
COMMISSIONERS PRESENT:	REID KRINOCK, CHAIR BILL ANDERSON JAMES SPARKS	Sylvia Kennedy-Carrasco Mike Hubert Brian Prokuda	
COMMISSIONERS ABSENT:	JEANNE CLUM, CO-CHAIR		
STAFF PRESENT:	KATHLEEN KLINE-HUDSON ROB STANFORD SCOTT BARB		
OTHERS PRESENT:	BOB HANVEY		

- 1. CALL TO ORDER Meeting was called to order by Commissioner Krinock at 7:31 P.M.
- 2. PLEDGE OF ALLEGIANCE
- 3. ROLL AND INTRODUCTION OF GUESTS
- 4. APPROVAL OF AGENDA

IT WAS MOVED BY COMMISSIONER ANDERSON, SECONDED BY COMMISSIONER HUBERT TO APPROVE THE AGENDA DATED AUGUST 21, 2013.

All in favor, motion passed.

5. APPROVAL OF MINUTES

IT WAS MOVED BY COMMISSIONER ANDERSON, SECONDED BY COMMISSIONER KENNEDY-CARRASCO TO APPROVE THE JULY 17, 2013 MINUTES, AS PRESENTED.

All in favor, motion passed.

- 6. CALL TO THE PUBLIC There were no issues from the public.
- 7. ZONING REVIEWS

A. Z-31-13 MARION TOWNSHIP - PROPOSED AMENDMENT TO ZONING ORDINANCE: Amendments to Article II1 Definitions.

The Marion Township Planning Commission is proposing to amend Article III, Section 3.02: Definitions.

Township Planning Commission Recommendation: APPROVAL. The Marion Township Planning Commission recommended approval of the text amendment at their April 23, 2013 meeting. There were no public comments at the April 23, 2013 public hearing.

Staff Recommendation: APPROVAL. The proposed text amendments are acceptable, reasonable and appropriate.

Commission Discussion: None.

Public Comment: Bob Hanvey, Marion Township Supervisor, explained the rationale behind the amendments for Marion Township.

Commissioner Action: IT WAS MOVED BY COMMISSIONER PROKUDA TO RECOMMEND APPROVAL, SECONDED BY COMMISSIONER KENNEDY-CARRASCO.

All in favor, motion passed. 6-0

B. Z-32-13 MARION TOWNSHIP - PROPOSED AMENDMENT TO ZONING ORDINANCE: Amendments to Article VIII Residential Districts.

The Marion Township Planning Commission is proposing several amendments to Article VIII – Residential Districts.

Township Planning Commission Recommendation: APPROVAL. The Marion Township Planning Commission recommended approval of the text amendment at their April 23, 2013 meeting. There were no public comments at the April 23, 2013 public hearing.

Staff Recommendation: APPROVAL. The proposed text amendments are acceptable, reasonable and appropriate.

Commission Discussion: None.

Public Comment: None.

Commissioner Action: IT WAS MOVED BY COMMISSIONER ANDERSION TO RECOMMEND APPROVAL, SECONDED BY COMMISSIONER PROKUDA.

All in favor, motion passed. 6-0

C. Z-33-13 MARION TOWNSHIP - PROPOSED AMENDMENT TO ZONING ORDINANCE: Amendments to Article XVII Standards for Special Land Uses.

The Marion Township Planning Commission is proposing several amendments to Article XVII Standards for Special Land Uses.

Township Planning Commission Recommendation: APPROVAL. The Marion Township Planning Commission recommended approval of the text amendment at their April 23, 2013 meeting. There were no public comments at the April 23, 2013 public hearing.

Staff Recommendation: APPROVAL. The proposed text amendments are acceptable, reasonable and appropriate.

Commission Discussion: None.

Public Comment: None.

Commissioner Action: IT WAS MOVED BY COMMISSIONER ANDERSON TO RECOMMEND APPROVAL, SECONDED BY COMMISSIONER PROKUDA.

All in favor, motion passed. 6-0

D. Z-34-13 MARION TOWNSHIP - PROPOSED AMENDMENT TO ZONING ORDINANCE: Amendments to Article XVII Standards for Special Land Uses, Section 17.16 Group Day Care Homes.

The Marion Township Planning Commission is proposing several amendments to Article XVII: Standards for Specific Special Land Uses, Section 17.16: Group Day Care Homes.

Township Planning Commission Recommendation: APPROVAL. The Marion Township Planning Commission recommended approval of the text amendment at their April 23, 2013 meeting. There were no public comments at the April 23, 2013 public hearing.

Staff Recommendation: APPROVAL. The proposed text amendments are acceptable, reasonable and appropriate.

Commission Discussion: None.

Public Comment: None.

Commissioner Action: IT WAS MOVED BY COMMISSIONER KENNEDY-CARRASCO TO RECOMMEND APPROVAL, SECONDED BY COMMISSIONER ANDERSON.

All in favor, motion passed. 6-0

MP-02-13 GENOA TOWNSHIP AMENDMENTS TO MASTER PLAN AMENDMENT

The Genoa Charter Township Planning Commission proposes a 2013 Master Plan Update to the 2006 Genoa Township Master Plan. It is anticipated that, if adopted, this Plan update will be incorporated into the Master Plan for Genoa Charter Township.

Township Planning Commission Recommendation: APPROVAL. At their July 15, 2013 meeting, the Genoa Charter Township Board recommended approval of distributing the draft Genoa Charter Township Master Plan to all surrounding municipalities in accordance with Section 41 of the Michigan Planning Enabling Act for a 42 day review period. The Board also directed that the plan specify an area along Nixon Road to Crooked Lake Road for further consideration and that an overlay plan be developed identifying access points and potential building configurations.

At the meeting there was one public comment regarding this proposed master plan amendment. The comment was from a local business owner who stated that the Interchange Campus future land use is undefined as yet, but that he felt the Board was moving in the right direction with the overlay addition to the plan.

Staff Recommendation: APPROVAL WITH CONDITIONS. The review period for this plan feels a little premature without being provided the language regarding the Interchange Campus Design Guidelines. While County Planning Staff feels that the proposed master plan language contained in this review represents sound planning guidance, we would like the opportunity to review the Interchange Campus design guidelines when they are developed, since the I-96 Interchange area of Genoa Charter Township is a vitally important gateway to much of central and southeast Livingston County.

Commission Discussion: Planning Commissioners discussed the need to review the entire sub area plan prior to making any final recommendations on the proposed amendments to the Genoa Township Master Plan and are encouraging further review by the Township.

Public Comment: None.

Commissioner Action: IT WAS MOVED BY COMMISSIONER SPARKS TO RECOMMEND NO ACTION – ENCOURAGE FURTHER REVIEW, SECONDED BY COMMISSIONER KENNEDY-CARRASCO.

All in favor, motion passed. 6-0

8. OLD BUSINESS:

a. Strengths, Weaknesses, Opportunities and Threats (SWOT) exercise for Comprehensive Economic Development Strategy (CEDS).

9. REPORTS:

- a. Distribution of County Planning publications.
- 10. COMMISSIONERS HEARD AND CALL TO THE PUBLIC: None.

11. ADJOURNMENT

Commissioner Action: IT WAS MOVED BY COMMISSIONER SPARKS TO ADJOURN THE MEETING AT 8:15 PM, SECONDED BY COMMISSIONER PROKUDA.

All in favor, motion passed. 6-0.



Livingston County Department of Planning

HAZARD MITIGATION • PLANNING & MANAGEMENT RESEARCH • MAPPING SERVICES

MEMORANDUM

Kathleen J. Kline-Hudson AICP, PEM Director

TO:

Livingston County Planning Commissioners and the

Genoa Charter Township Board of Trustees

FROM:

Kathleen Kline-Hudson, Director

Nancy Vorhoff Administrative Specialist DATE:

August 16, 2013

SUBJECT:

MP-02-13 Amendments to June 2006 Genoa Charter Township

Master Plan

Robert A. Stanford AICP, PEM Principal Planner

The Genoa Charter Township Planning Commission proposes a <u>2013 Master Plan Update</u> to the 2006 Genoa Township Master Plan. It is anticipated that, if adopted, this Plan update will be incorporated into the Master Plan for Genoa Charter Township.

Scott Barb Principal Planner

Following is a summary of proposed Master Plan updates by section. Staff comments are noted in **bold**, **italic** underline.

I. Introduction

Proposed updates to this section are very minimal. Most of the updates are to the master plan community goals. New goals have been added regarding: the provision of a variety of housing styles, types, and densities; the support of "aging in place" by providing housing, recreation and transportation options for seniors; the provision of technology-based development in appropriate areas of the township; the creation of outlots in underutilized parking lots for infill commercial development; working with economic development agencies, such as Ann Arbor Spark, to attract new business and jobs, and encourage entrepreneurship; preserving and encouraging growth and sustainability of existing Grand River commercial after the construction of the Latson interchange; provision of an integrated and phase design with careful consideration for new development at the Latson interchange; consideration of transit-oriented development for future passenger rail train to Ann Arbor; and coordination with MDOT to possibly create a narrow median along Grand River from the Lake Chemung interchange west to the Howell city limits.

Department Information

Administration Building 304 E. Grand River Avenue Suite 206 Howell, MI 48843-2323

> (517) 546-7555 Fax (517) 552-2347

Web Site co.livingston,mi.us

II. <u>Demographics</u>

The framework of this section remains the same however, the text has been minimized from the current plan and growth trends, charts and tables of this section have been updated with 2010 Census figures. Several paragraphs regarding



population projections (linear regression models vs. build-out modified exponential models) were removed.

County Planning Staff Comments:

- The charts and tables in this section do not include the source of the data.
- The Educational Attainment figures listed in this draft are significantly different than the 2010 Census figures that County Planning has included in our community profiles for Genoa Township and Livingston County. See:

 http://www.livgov.com/plan/econdev/Pages/census.aspx

III. Environmental Conditions

There are no significant changes proposed to this section; the text and the maps remain the same. Probably the most valuable portion of this chapter is the approximate 5 pages devoted to <u>Natural Resource Management Strategies</u> such as natural feature setbacks, slope protection, etc.

County Planning Staff Comments:

This section could be updated with mention of newer strategies such as Greenways which are explained in detail in Section VII Bikepaths And Greenways, or Low Impact Development (LID) and the Low Impact Development Manual for Michigan that serves as a valuable resource tool.

IV. Existing Land Use

This section remains largely the same. The most prominent change to this section is an updated Land Use Inventory (2012) that uses parcel based GIS which probably increases the accuracy of this inventory. Additionally, some new categories were added to the inventory such as: vacant; agriculture; and transportation, communication and utilities. Other land uses were re-categorized, for instance, private recreation became parks. New photos were also added to represent each existing land use category. The discussion of trends regarding each land use was greatly minimized.

V. <u>Future Land Use</u>

The majority of master plan updates were made to this section. Following is a summary of these proposed changes:

 The addition of <u>Interchange Commercial</u> and <u>Interchange Campus</u> future land use categories. All other future land use categories remain the same with the exception of a name change from <u>Genoa Town Center</u> to <u>Mixed-Use Town Center</u> and <u>Planned Industrial</u> to <u>Research and Development</u>.

Descriptions of the Interchange Commercial and Interchange Campus future land use categories are as follows:

Interchange Commercial: Rather than typical interchanges where gas stations and fast food establishments are built piecemeal with little consideration for aesthetics, the intent of this designation is to promote planned development of these interchange commercial



uses with high quality architecture. The new Latson interchange is envisioned to be the premier exit for travelers along I-96: a destination where they can get out of their vehicles to walk around, dine, and shop.

- Appropriate uses include fast food, sit-down restaurants, gas stations, retail, and entertainment.
- This area may be subject to design guidelines promoting walkability, increased landscaping standards, pedestrian – scale building siting and massing, and outdoor dining/gathering.
- Very few access points: each development shall provide access connections to adjacent properties so that there may be a shared access connection to a future traffic signal.

County Planning Staff Comments:

The Interchange Commercial future land use is mapped along the south side of the Latson/l96 Interchange. It encompasses 70 acres and it will represent the smallest future land use
area in the Township. It is the opinion of County Planning Staff that this description of
Interchange Commercial should include a statement that suggests that this area will also
serve as a gateway to the cities of Howell and Brighton, creating an environment that draws
visitors to further exploration of the historic downtowns present in Howell and Brighton.

Interchange Campus: With the creation of a new interchange at Latson/Nixon in 2013, development pressures may exist for large-scale users seeking large parcels of land with convenient access to I-96. The intent is to create a district that will accommodate large-scale institutional campuses close to the interchange without leapfrog development further south.

- Possible principal uses alone or in combination: medical center/clinics, higher education satellite, corporate offices, high-tech research & development (with no external impacts), indoor sports center, conference center/hotel, health clubs, office centers, or senior living. Ancillary uses that have a direct connection to the principal use are allowed and should be part of the overall plan, such as limited restaurants and professional services when included as part of an overall development.
- Any large-scale development should be a well-planned, campus-like setting, planned in close coordination with the Township. Upon submittal of the first development proposal for this area, an overall development plan must be provided. This plan shall guide development in the interchange campus area including signs, access/circulation, building design, landscape, and streetscape.
- A well-landscaped entry corridor that includes a median, sidewalks, street trees, and ample
 places for pedestrians to cross S. Latson Road. This may require provision of 40' of right-ofway from the center of the road.

County Planning Staff Comments:

- The Interchange Campus future land use is mapped along the south side of the Latson/l-96 Interchange. It encompasses 520 acres and it will represent the second largest non-residential future land use area (second to Public/Quasi-Public) in the Township.
- The first sentence in the description of this future land use area references the interchange at Latson/Nixon. This should be changed since Nixon Road will be renamed to S. Latson Road.



The list of Future Land Uses in the margin of page 5-3 does not contain the two new FLU categories and it incorrectly lists Planned Industrial (instead of Research & Development) and Planned Unit Development.

The next subsection of Future Land Use text regards the Genoa Charter Township Growth Boundary that marks the separation between rural and urban areas of the community and defines land that can efficiently support urban services such as sewer, water and roads. Land within the growth boundary is separated into a Primary Growth area and a Secondary Growth area. The text of this subsection remains the same as the current master plan language with two additions: a new paragraph that explains that utilities have been extended south of the new I-96 interchange which was a determining factor in the planned land uses for that area (and inclusion in the Primary Growth Area), and a new growth boundary map that depicts how the growth boundary largely follows the Grand River and I-96 corridors, and the land area adjacent to the City of Brighton.

The remainder of the Future Land Use section contains detailed design guidelines for the Mixed-Use Town Center future land use area of the Township (Grand River, Hughes & Dorr roads) and the I-96/Latson Road Subarea. The design guidelines for the Mixed Use Town Center are the same as contained in the current master plan. The design guidelines for the I-96/Latson Road Subarea only address the Interchange Commercial FLU north of I-96 and south of Grand River Avenue, and most of the language is the same as that contained in the current master plan. Following this language is a note that states "Interchange Campus Design Guidelines – In process, to be completed during review process." This note is followed by a very good map of the I-96/Latson Road subarea.

County Planning Staff Comments:

- The first paragraph of the I-96/Latson Road Subarea Plan has many references to Nixon Road, which will soon be incorrect when the road is re-named to S. Latson. The subarea map also references Nixon Road.
- Staff has concerns regarding how the Interchange Campus FLU will be developed in the future. Proposed language on page 5-7 states "Upon submittal of the first development proposal for this area, an overall development plan must be provided. This plan shall guide development in the interchange campus area including signs, access/circulation, building design, landscape, and streetscape."

It remains to be seen how the Township will further define this relationship between the Township and a future developer. As currently stated in the plan update, Staff is conflicted as to whether this approach demonstrates good design flexibility OR whether this approach is giving too much control to the developer and limiting the Township's ability to coordinate development. It seems rather contrary that the Township has provided very thorough design guidelines for the Mixed-Use Town Center area, but may not for the Interchange Campus area. Utilizing a form-based code approach may be a good method for establishing a vision for the Interchange Campus subarea.

Lastly, the master plan concludes subsections about Planned Unit Developments and Residential Design Guidelines. The language of these subsections has not been updated.



Vi. Transportation

The Transportation section of the master plan has been updated in several ways including:

- A new <u>Complete Streets</u> section of text that addresses travel for pedestrians and bicyclists, and how this travel should be safe, and provide a variety of routes. Provision of this text in a master plan is now required by the Michigan Planning Enabling Act.
- Information about the new I-96 interchange under construction, which includes the following improvements:
 - 1. A diamond interchange which can accommodate two loop ramps in the future if the increased traffic volumes along Latson Road require them.
 - 2. A third crossing of I-96 at Latson Road which will increase north-south mobility in the community (currently only Dorr and Chilson Roads cross I-96 in Genoa Township).
 - 3. Nixon road will be renamed S. Latson Road and will be upgraded to an asphalt roadway south of the interchange with 2 lanes and turning pockets at intersections.
 - 4. Relocation of Beck Road and Grand Oaks Drive around the interchange ramp area.
 - 5. Widening of the Latson and Grand River intersection to 7 lanes at each approach with dual left turns in all directions.
 - 6. A large detention pond located north of I-96 at the previous rest area property.
- An updated Trip Generation Rate table (Source: Institute of Transportation Engineers, Trip Generation Manual, 7th Edition).
- An updated Traffic Conditions Map based upon SEMCOG crash rates between 2006-2010.
- A recommendation to reconstruct Grand River Avenue with a narrow median in the existing right-of-way to reduce pedestrian and traffic conflicts thereby improving safety and traffic operations.
- A recommendation that the Township request a traffic signal study by MDOT to determine if a new signal could be installed and timed to coordinate the traffic flow where the Meijer driveway and Hampton Ridge access road intersect with Latson Road (a location of long traffic delays).

County Planning Staff Comments:

- The reference to I-96 being a "limited access" highway on page 6-3 should probably be removed.
- Table 13 Comparison of Trip Generation Rates, has two empty lines in it that may or may not be intentional.
- On page 6-13 the Livingston County Airport should be noted as Livingston County Spencer J. Hardy Airport.
- On page 6-13 under Other Modes of Transportation, a paragraph about the future WALLY computer rail might be included.
- On pages 6-2 and 6-3 under Complete Streets, a paragraph about the future Cross Town Trail might be included.

VII. <u>Bikepaths And Greenways</u>

The Bikepaths And Greenways section of the master plan was formerly titled <u>Greenways and Pathways</u>. Minor updates are proposed to this section including:



- Updated information about the recreational amenities provided on the Township Hall property.
- The <u>C. Pathways</u> text has been updated with information about proposed pathways along Grand River Avenue, Latson/Chilson Roads, and Dorr Road. For instance, the text notes that the new interchange at Latson Road will include a pedestrian pathway that continues south to Crooked Lake and Three Fires school.
- A new Pathway Plan map shows pathways that are: Complete; Programmed; and Planned.

VIII. Implementation

The Implementation section of the master plan has been updated in several ways including:

- A new portion of text entitled A. Tenets of Successful Implementation. This text explains the
 processes involved in implementing a master plan over the course of the next five to ten
 years. Suggestions for implementing the plan include: Township department, board and
 commission decision-making that is consistent with and in support of master plan
 implementation; consideration of the master plan by developers, corporations, and land
 owners when making investment decisions; and collaboration between the Township and
 other community partners.
- New language regarding zoning recommendations with an explanation of how plan
 categories generally correspond to zoning districts, accompanied by a new table that
 indicates this relationship. This table and corresponding notes are intended to guide the
 Planning Commission in determining the appropriate zoning district based upon the context
 of the surrounding area.

Lastly, this section contains an <u>Action Plan</u> and a list of <u>Township Implementation Funding Sources</u> that is nearly identical to the implementation text contained in the current master plan. The only changes to note in the Action Plan is the deletion of the I-96 Interchange as a Plan Recommendation since interchange construction is already underway, and deletion of a reference to the Transportation Efficiency Act since this funding source is no longer available.

County Planning Staff Comments:

• The table on page 8-3 does not contain a heading for the Master Plan Categories of land use.

Township Board Recommendation: At their July 15, 2013 meeting, the Genoa Charter Township Board recommended approval of distributing the draft Genoa Charter Township Master Plan to all surrounding municipalities in accordance with Section 41 of the Michigan Planning Enabling Act for a 42 day review period. The Board also directed that the plan specify an area along Nixon Road to Crooked Lake Road for further consideration and that an overlay plan be developed identifying access points and potential building configurations.

At the meeting there was one public comment regarding this proposed master plan amendment. The comment was from a local business owner who stated that the Interchange Campus future land use is undefined as yet, but that he felt the Board was moving in the right direction with the overlay addition to the plan.



Staff Recommendation: Approval With Conditions. The review period for this plan feels a little premature without being provided the language regarding the Interchange Campus Design Guidelines. While County Planning Staff feels that the proposed master plan language contained in this review represents sound planning guidance, we would like the opportunity to review the Interchange Campus design guidelines when they are developed, since the I-96 Interchange area of Genoa Charter Township is a vitally important gateway to much of central and southeast Livingston County.

Kelly VanMarter

From:

Gary McCririe <garymccririe@gmail.com>

Sent:

Thursday, August 08, 2013 8:06 AM

To: Subject: Kelly VanMarter Fwd: new bridge

FYI for master plan file

Sent from my iPad

Begin forwarded message:

Resent-From: <gary@genoa.org>

From: Mike Horan <<u>redimix01@yahoo.com</u>>
Date: August 7, 2013, 11:20:13 AM EDT
To: "gary@genoa.org" <<u>gary@genoa.org</u>>

Subject: new bridge

Reply-To: Mike Horan < redimix01@yahoo.com>

Mr. McCrieri

I live on Euler Rd in the township. I have been following the Latson Rd bridge development for the last many years and am pleased to see it under construction. This will open up the Latson Rd area for more use than it already has achieved, and that is all a boost to our taxable dollars. I have been reading that some property owners on the south side of I-96 do not want to loose the residential area they have lived in and do not want zoning changes to allow more development on that southern 96 area. I can empathize with them but I do not agree with them. The township invested a large sum of our tax payers dollars to make sure that bridge got built, it was an investment in our future with the idea that we would get repaid in future growth of taxable new businesses. It makes sense. We have come this far and it is the time to maximize our investment. The bridge being built is not a small bridge or small interchange, it is designed to handle a lot of traffic. The Beck Rd area will be an attractive place for a multitude of businesses that will take advantage of a major interchange. I support the zoning of the Beck Rd area for commercial use. I would even support light industrial.

Regards Mike Horan



2911 Dorr Road Brighton, MI 48116 810.227.5225 810.227.3420 fax genoa.org

October 23, 2013

c/o Ms. Amy Cyphert, Planning & Zoning Director City of Brighton Planning Commission 200 N. First St. Brighton, MI 48116

Re: Genoa Charter Township Draft Master Plan

Dear Ms. Cyphert and City of Brighton Planning Commission Members,

Thank you for providing your letter dated September 17, offering input related to the Genoa Township Draft Master Plan. As we guide the future of our communities it will be important to continue to work together and we welcome your comments.

Your recommendation that higher density residential land uses be available "adjacent to the City of Brighton boundaries" will be taken into consideration.

Again, thank you for taking the time to comment.

Singerely,

Kelly VanMarter

Assistant Township Manager / Community Development Director KKV/kp

cc: Livingston County Planning Dept.

SUPERVISOR

Gary T. McCririe

CLERK

Paulette A. Skolarus

TREASURER

Robin L. Hunt

MANAGER

Michael C. Archinal

TRUSTEES

H. James Mortensen Jean W. Ledford Todd W. Smith Linda Rowell



City Hall 200 N. First St. Brighton, MI 48116-1593

(810) 227-1911 Fax# 227-6420

CITY OF BRIGHTON

"Providing quality service"

GENOA TOWNSHIP

SEP 18

September 17, 2013

PERMED

City Manager 225-8022 City Clerk 227-0463 Human Resources Director 225-9251 Cemetery/ Voter Registration 227-0463

TDD Phone: (810) 227-8357

Community Development Building 227-9005 Building Inspection Line 227-0419 Planning / Zoning 225-9257 Community Development

Community Development/ DDA 225-8025 Finance Accounts Payable

Accounts Payable 225-8019 Assessing Assistant 227-9006 City Assessor 225-8024 City Treasurer 225-8023 **Finance Director** 225-9283 **Assistant Finance Director** 227-7738 **Property Taxes** 227-0179 **Utility Billing** 225-8041

Police Department 440 S. Third St. (810) 227-2700 Fax# 227-2063

Department of Public Services 420 S. Third St. (810) 225-8001 |-ax=225-9249 DPS Director 225-9284 Assistant DPS Director 225-9282 Water Plant 227-2968 Wustewater Plant 227-9479 Ms. VanMarter Genoa Charter Township 2911 Dorr Road Brighton, MI 48116

Re: Genoa Charter Township Draft Master Plan Amendment

Dear Ms. VanMarter:

On behalf of the City of Brighton Planning Commission, we want to thank you for the opportunity to review and comment on the Township's Draft Master Plan Amendment dated August 2013. Please take into account the following suggestion prior to the adoption of the Master Plan:

- 1. Higher density residential land uses should be considered adjacent to the City of Brighton boundaries.
 - a. Existing sewer and water extensions may be available which would allow for the reduction in duplicated utility services.
 - b. This would provide an overall cohesive walkable community and reduce time spent in an automobile due to residential land uses located in closer proximity to services (stores, recreation, schools, etc.).
 - c. As page 2-1 of your plan states "growth in Genoa Township has been influenced by development in its two neighboring cities, Howell and Brighton. Since available land is limited in those cities, developers have sought locations in Genoa Township." If that statement is true, then providing higher density residential development adjacent to those cities could spur growth within the Township's boundaries.
 - d. This would increase the population and tax base in Genoa Township since we have witnessed a high demand for new housing within close proximity to services and the demand for people to live in or near the City.

Once again, thank you for the opportunity to review and comment on the draft Master Plan Amendment, and the Planning Commission hopes you consider their comments. If you have any questions, feel free to contact me at 810-225-9257 or cypherta@brightoncity.org.



CITY OF BRIGHTON

"Providing quality service"

City Hall 200 N. First St. Brighton, MI 48116-1593 (810) 227-1911 Fax# 227-6420

TDD Phone: (810) 227-8357

City Manager 225-8022 City Clerk 227-0463 Human Resources Director 225-9251

Cemetery/ Voter Registration 227-0463

Community Pevelopment Building 227-9005

Building Inspection Line 227-0419 Planning / Zoning

225-9257 Community Development/

DDA 225-8025

Finance Accounts Payable 225-8019 Assessing Assistant 227-9006 City Assessor 225-8024 City Treasurer 225-8023 Finance Director 225-9283 **Assistant Finance Director**

227-7738 Property Taxes 227-0179 **Utility Billing** 225-8041

Police Department 440 S. Third St. (810) 227-2700 Fax 227-2063

Department of Public Services 420 S. Third St. (810) 225-8001 1-ax# 225-9249 **DPS** Director 225-9284 Assistant DPS Director 225-9282 Water Plant 227-2968 Wastewater Plant

227-9479

Amy Cypnert

Sincerely,

Planning & Zoning Director

City Planning Commission Members Cc: Livingston County Planning Dept.

CITY OF HOWELL MEMORANDUM

TO: Planning Commission

FROM: Erin Perdu, Interim Planning & Zoning Administrator

RE: Genoa Township Master Plan Update

DATE: September 11, 2013

As required by the Planning Enabling Act of the State of Michigan Genoa Township has submitted their Master Plan update to the City Planning Commission for our review and comment. The complete document can be found at http://www.genoa.org/departments/planningzoning/masterplan and a copy of the Table of Contents and Executive Summary are included in your packet.

The sections that are particularly relevant for the City include the following:

• Future Land Use Plan:

- o Growth Boundary: the proposed growth boundary for the Township includes the Grand River/I-96 corridor between the cities of Brighton and Howell (see attached map). The area adjacent to the City is designated as a "Primary Growth Area", and is characterized by higher density single and multi-family residential development than much of the township and commercial centers along Grand River. This type of development is not a significant departure from the existing land use pattern in the area.
- o Future Land Use: Again, there are no uses planned near the border with the City of Howell that are significantly different than the existing land use pattern.
- Mixed Use Center: The Township has included a Mixed Use Town Center concept in the future land use plan at the intersection of Grand River and Dorr Rd. (east of the Lake Chemung interchange). The area is described in the Plan as "a compact area for housing, shopping, employment, cultural and recreational activities in a pedestrian-friendly, vital and attractive neighborhood". Given the scale of development described, staff does not anticipate any negative effects on the City or our downtown businesses.

• Transportation:

- O The Plan includes a goal of promoting "complete streets" through a non-motorized network. We would welcome the opportunity to work with the Township as they plan these improvements to ensure that they connect with the City's sidewalk network. There is also a notable goal in this section to coordinate with MDOT to pursue the possibility of a narrow median along Grand River from the City boundary to the Lake Chemung interchange.
- o Grand River Access Management Study: The City, along with the Township, participated in the SEMCOG-led Grand River Access Management Study in

2011-2012. We would anticipate that the Township would consult the analysis provided in that plan when contemplating any changes to the corridor.

• Design:

There are several sections of the plan which describe an emphasis on quality design (the Genoa Town Center and the Residential Design Standards in particular). We support this emphasis on urban design principals, with the hope that future development will minimize the negative effects of strip-type development that can impact the region.

Please share any additional comments you have on the Plan at the meeting and I will forward all comments to the Township for their consideration.

OFFICE OF THE PLANNING DIRECTOR David R. Campbell, AICP

2655 Clark Road Hartland, Michigan 48353 (810) 632-7498 Office (810) 632-6950 Fax dcampbell@hartlandtwp.com



Supervisor William J. Fountain

> Clerk Larry Hopkins

Treasurer Kathleen A. Horning

Trustees
Joseph W. Colaianne
Matthew J. Germane
Glenn E. Harper
Joseph M. Petrucci

September 24, 2013

Kelly VanMarter, AICP Assistant Township Manager Genoa Charter Township 2911 Dorr Road Brighton, MI 48116

Dear Ms. VanMarter,

Hartland Township is in receipt of the CD containing the proposed update to the Genoa Township Master Plan. General discussion of the Master Plan update is scheduled for the September 26, 2013 Hartland Township Planning Commission meeting.

Per your request and the provisions of Section 41 of the Michigan Planning Enabling Act, staff has reviewed the update and offers "no comments" regarding the plan.

Please accept our congratulations on the completion of the draft Genoa Township Master Plan amendment and we appreciate the opportunity to review and comment.

Sincerely.

David R. Campbell AICP

Planning Director

NOTICE OF PUBLIC HEARING ON PROPOSED MASTER PLAN UPDATE November 25, 2013 at 6:30 p.m. GENOA CHARTER TOWNSHIP LIVINGSTON COUNTY, MICHIGAN

PLEASE TAKE NOTICE that the Genoa Charter Township Planning Commission will conduct a public hearing to consider the recommendation of the Master Plan update to the Genoa Charter Township Board on Monday, November 25, 2013, commencing at 6:30 p.m. at the Genoa Charter Township Hali, 2911 Dorr Road, Brighton, Michigan 48116, as required under the provisions of the Michigan Planning Enabling Act.

PLEASE TAKE FURTHER NOTICE that the Master Plan update has been submitted for public comment to the interested entities as required under Section 41 of the Michigan Planning Enabling Act, and the Planning Commission hereby welcomes public comment on the updated plan. A copy of the Master Plan is available at the Township Hall, or is available on the Township's website at www.genoa.org. You are also invited to obtain a copy of the Master Plan in a CD PDF format or printed format and may do so by contacting the Planning Department at the address and phone number listed below.

PLEASE TAKE FURTHER NOTICE that such other and further matters as may properly come before the Planning Commission may be considered at the public hearing. You are invited to attend this hearing. If you are unable to attend, please call or submit written comments in lieu of a personal appearance, or if you wish to request a copy of the Master Plan please call or write:

GENOA CHARTER TOWNSHIP ATTN: KELLY VANMARTER, ASSISTANT TOWNSHIP MANAGER 2911 DORR ROAD BRIGHTON, MI 48116 810-227-5225 kelly@genoa.org

All materials relating to these requests may be examined at the Genoa Township Hall during normal business hours.

Genoa Charter Township will provide necessary reasonable auxiliary aids and services, such as signers for the hearing impaired and audio tapes of printed materials being considered at the meeting, to individuals with disabilities at the meeting/hearing upon seven (7) days' notice to Genoa Charter Township. Individuals with disabilities requiring auxiliary aids or services should contact the Township by writing or calling the Township.

11-08-2013 DAILY 165535

GENOA CHARTER TOWNSHIP PLANNING COMMISSION By: Douglas Brown, Chairman

GENOA CHARTER TOWNSHIP

PLANNING COMMISSION NOTICE OF PUBLIC HEARING NOVEMBER 25, 2013 6:30 P.M.

The Genoa Township Planning Commission will hold a public hearing at 6:30 p.m. on November 25, 2013 requesting recommendation of the following:

OPEN PUBLIC HEARING #1... Review of site plan, special use application, and environmental impact assessment to construct a new 2,837 square foot Odoba drive through restaurant located at the Meijer outlot at 3883 E. Grand River, Howell, petitioned by Kevin Egnatuk of Southwind Restaurants, LLC.

OPEN PUBLIC HEARING #2... Review of proposed Master Plan Update

Please address any written comments to the Genoa Township Planning Commission at 2911 Dorr Rd, Brighton, MI 48116 or via email at kathryn@genoa.org. All materials relating to this request are available for public inspection at the Genoa Township Hall prior to the hearing.

Genoa Township will provide necessary reasonable auxiliary aides and services to individuals with disabilities who are planning to attend. Please contact the Genoa Township Hall at (810) 227-5225 in advance of the meeting if you need assistance.

(11-08-2013 DAILY 165512)



NOTICE OF PUBLIC HEARING ON PROPOSED MASTER PLAN UPDATE November 25, 2013 at 6:30 p.m.

GENOA CHARTER TOWNSHIP LIVINGSTON COUNTY, MICHIGAN

2911 Dorr Road 8righton, MI 48116 810.227.5225 810.227.3420 fax genoa.org

PLEASE TAKE NOTICE that the Genoa Charter Township Planning Commission will conduct a public hearing to consider the recommendation of the Master Plan update to the Genoa Charter Township Board on Monday, November 25, 2013, commencing at 6:30 p.m. at the Genoa Charter Township Hall, 2911 Dorr Road, Brighton, Michigan 48116, as required under the provisions of the Michigan Planning Enabling Act.

PLEASE TAKE FURTHER NOTICE that the Master Plan update has been submitted for public comment to the interested entities as required under Section 41 of the Michigan Planning Enabling Act, and the Planning Commission hereby welcomes public comment on the updated plan. A copy of the Master Plan is available at the Township Hall, or is available on the Township's website at www.genoa.org. You are also invited to obtain a copy of the Master Plan in a CD PDF format or printed format and may do so by contacting the Planning Department at the address and phone number listed below.

PLEASE TAKE FURTHER NOTICE that such other and further matters as may properly come before the Planning Commission may be considered at the public hearing.

You are invited to attend this hearing. If you are unable to attend, please call or submit written comments in lieu of a personal appearance, or if you wish to request a copy of the Master Plan please call or write:

GENOA CHARTER TOWNSHIP

ATTN: KELLY VANMARTER, ASSISTANT TOWNSHIP MANAGER

2911 DORR ROAD BRIGHTON, MI 48116

810-227-5225

kelly@genoa.org

SUPERVISOR

Gary T. McCririe

CLERK

Paulette A. Skolarus

TREASURER

Robin L. Hunt

MANAGER

Michael C. Archinal

TRUSTEES

H. James Mortensen Jean W. Ledford Todd W. Smith Linda Rowell All materials relating to these requests may be examined at the Genoa Township Hall during normal business hours.

Genoa Charter Township will provide necessary reasonable auxiliary aids and services, such as signers for the hearing impaired and audio tapes of printed materials being considered at the meeting, to individuals with disabilities at the meeting/hearing upon seven (7) days' notice to Genoa Charter Township. Individuals with disabilities requiring auxiliary aids or services should contact the Township by writing or calling the Township.

GENOA CHARTER TOWNSHIP PLANNING COMMISSION

By: Douglas Brown, Chairman



2911 Dorr Road Brighton, MI 48116 810.227.5225 810.227.3420 fax genoa.org August 12, 2013

Livingston County Planning Commission 304 E. Grand River Howell, MI 48843

Re: Draft Master Plan Amendment for Your Review

Honorable Chair and Commission Members:

Please be advised that Genoa Township has prepared a proposed Master Plan update. The Genoa Township Board authorized distribution of the plan on Monday, July 15th, 2013. A disk containing a copy of the document is enclosed herein for your review.

It is anticipated that, if adopted, this Plan will be incorporated into the Master Plan for Genoa Charter Township as a Master Plan amendment. The draft is also being distributed to surrounding municipalities in accordance with Section 41 of the Michigan Planning Enabling Act (Public Act 33 of 2008). According to the Act, before a municipality adopts a new Master Plan or updates thereto, it must first send a draft copy of the Master Plan to all contiguous local governments, as well as the County for their review and comment. If requested, copies of the plan will also be forwarded to public utility companies operating in Genoa Charter Township.

According to the Act, the various municipalities and agencies have 42 days to review and submit comments on this Master Plan amendment to Genoa Township and the County (if they choose to do so). Any comments should be submitted in writing no later than September 25, 2013 to:

Kelly VanMarter, AICP – Assistant Township Manager Genoa Charter Township 2911 Dorr Road Brighton, MI 48116 kelly@genoa.org

Thank you for your participation in this matter.

Regards,

Doug Brown, Chairman

Genoa Township Planning Commission

Cc: Master Plan Update File

Genoa Township Planning Commissioners

SUPERVISOR

Gary T. McCririe

CLERK

Paulette A. Skolarus

TREASURER

Robin L. Hunt

TRUSTEES

H. James Mortensen Jean W. Ledford Todd W. Smith Linda Rowell

MANAGER

Michael C. Archinal

Livingston County Planning Commission 304 E. Grand River Howell, MI 48843

Brighton Township Planning Commission 4363 Buno Road Brighton, MI 48116

Marion Township Planning Commission 2877 W. Coon Lake Road Howell, MI 48843

SEMCOG 535 Griswold Street, Ste. 300 Detroit, MI 48226

SPARK – Livingston County c/o Phil Santer 201 S. Division St., Suite 430 Ann Arbor, MI 48104 City of Brighton Planning Commission 200 N. First Street Brighton, MI 48116

Hamburg Township Planning Commission 10405 Merrill Road Hamburg, MI 48139

Putnam Township Planning Commission 131 S. Howell Pinckney, MI 48169

Howell Township Planning Commission 3525 Byron Road Howell, MI 48843 City of Howell Planning Commission 611 E. Grand River Howell, MI 48843

Hartland Township Planning Commission 3191 Hartland Road Hartland, MI 48353

Oceola Township Planning Commission 1577 W. Latson Road Howell, MI 48843

Green Oak Charter Township Planning Commission 10001 Silver Lake Road Brighton, MI 48116

2013 MASTER PLAN UPDATE

Genoa Charter Township Livingston County, Michigan



Insert adoption page here

Master Plan

Genoa Charter Township Livingston County, Michigan

Adopted by the Genoa Township Planning Commission xxxx, 2013

Adopted by the Genoa Township Board xxx 2013

2911 Dorr Road Brighton, MI 48116 (810) 227-5225

This Master Plan represents over a year of dedicated work by the elected, and appointed officials of Genoa Township, Township staff, Township consultants and the Livingston County Planning Department. In addition, a number of citizens provided input at public workshops. This plan updates the previous plan adopted in 2006.

Township Board

Gary McCririe, Supervisor Paulette Skolarus, Clerk Robin Hunt, Treasurer Jean Ledford Jim Mortensen Linda Rowell Todd Smith

Township Manager Michael Archinal, AICP

Township Asst. Manager/Community
Development Director
Kelly VanMarter, AICP

Township Engineer
Tetra-Tech MPS

Township Attorney
Frank Mancuso

Planning Commission

Doug Brown, Chairman
Dean Tengel, Vice Chairman
Barb Figurski, Secretary
Jim Mortensen, Board Liason
Diana Lowe
John McManus
Eric Rauch



TABLE OF CONTENTS

EXECUTIVE SUMMARY

I.	INTRODUCTION	
	A. Introduction	
II.	DEMOGRAPHICS	
	A. Population Trends B. Economics	
III.	ENVIRONMENTAL CONDITIONS	
	Geology Topography Soils Farmland Key Vistas Woodlands Uetlands Lakes Drainage Groundwater. Potential Environmentally Impacted Sites. Natural Resources Management Strategies.	3-2 3-2 3-8 3-9 .3-11 .3-13
IV.	EXISTING LAND USE	
	A. Growth Trends B. Existing Land Use C. Land Use Patterns	4-2 4-4

V. FUTURE LAND USE

Determining Factors	5-1
Future Land Use Categories	
Growth Management Boundary	
Genoa Town Center	
I-96/Latson Road Subarea Plan	
Planned Unit Development	
Residential Design Standards	
VI. TRANSPORTATION	
Introduction	6-1
Complete Streets	6-2
Existing Traffic Conditions	
Improvements	
Other Modes of Transportation	
VII. BIKEPATHS AND GREENWAYS	71
Greenways Defined	7-1
Greenways	
Pathways	
VIII. IMPLEMENTATION	
Tenets of Successful Implementation	8-1
Zoning Recommendations	
Action Plan	
Township Implementation Funding Sources	

EXECUTIVE SUMMARY

Genoa Township, located in Livingston County between the cities of Howell and Brighton, is a growing community that faces the difficult challenge of accommodating ever increasing development while retaining its unique natural and rural characteristics. Values and goals of the community where developed with input from residents, landowners, the Planning Commission and the Township Board. Ultimately, it is their aspirations for Genoa Township that have become the principal basis for recommendations discussed in this Master Plan. This plan attempts to balance the various demands and interests to ensure each development decision is consistent with the overall vision for the Township.

The analysis and recommendations in this plan provide the foundation for zoning and other Township development ordinances. With this in mind, all sections of the plan will be used as tools to provide a quality community while it protects the natural features that create a sense of identity for Genoa Township.

Population Housing & Economics: Like much of Livingston County, the population of Genoa Township has been steadily increasing since the late 1980's. The population of Genoa Township was 19,821 persons in 2010. By the year 2040, the population is projected to grow to approximately 23,061 persons.

Protection of Natural Features: Genoa Township contains numerous natural features including lakes, creeks, woodlands, and rolling topography. These features make an important contribution to the quality of life in the Township. The plan recommends a number of means to accommodate development while protecting the valuable resources that are critical to Genoa Township's quality of life.

Development densities should be limited in areas that contain fragile natural features and pristine natural conditions. Any negative impact of sanitary drainfields should be minimized through restricting residential densities in areas not served by public sanitary sewer, in particular, areas with poor soil conditions.

Design for development needs to incorporate preservation of natural topography and vegetation. Setbacks and site plan design standards should be established to protect natural features. Steep slopes, streambanks and lakeshore need to be protected during development. Stormwater needs to be managed and natural drainage ways protected.

Existing Land Use: Single family residential and vacant/agricultural land were the most predominant land uses in the Township in 2013. Single family residential is dispersed throughout the Township, but with higher densities in areas with public utilities along Grand River

The Genoa Township Master Plan is divided into a number of sections, including the following fundamental areas:

- Population, Housing & Economics
- Environmental Conditions
- Existing Land Use
- Future Land Use
- Transportation
- Greenways & Bikepaths
- Implementation

Avenue, around the Tri-Lakes area, Lake Chemung, and near the cities of Brighton and Howell. Most of the commercial land uses are located along the Grand River Avenue corridor. There are three distinct industrial areas, all along the Grand River Avenue, north of I-96.

Public Utilities: Portions of the Township are served by public sanitary sewer and water. The northwest and central portion of the Township is served by water and sanitary sewer systems developed in cooperation with adjacent townships. Areas around the City of Brighton are also served by sewer and water. While utilities were built, in part, to protect water quality, the availability of utilities has certainly influenced the pattern and pace of development.

Future Land Use: A future land use pattern is recommended based on existing land use patterns, transportation conditions, availability of public facilities, natural resource protection market trends and community goals. It is important to note that the future land use plan represents a 10-15-year vision for the community, which should be reviewed every at least every 5 years per the Michigan Enabling Act. Prior to any rezonings taking place, the future land use pattern and growth boundary described in this plan should be referenced.

- The plan establishes a growth boundary. Areas within the growth boundary include the Grand River Avenue/I-96 corridor between Brighton and Howell and areas surrounding the City of Brighton. Land within the Township are separated into three areas; the primary growth areas, secondary growth areas and rural reserve areas:
- Primary growth areas are areas that are currently served or available to be served by public sewer and water. These areas include single family on lots between ¼ acre, and ½ acre and multiple family residential at higher densities. This area also includes the commercial centers, industrial parks and mixed-use centers.
- Secondary growth areas do not have sewer and water, but due to their proximity to the cities of Brighton or Howell, are appropriate for infill with low density residential. Typical lot sizes will be around one acre or clustered developments at an overall density of two acres per dwelling.
- Rural reserve areas outside of the growth boundary will be maintained at a relatively low intensity rural character of development, typically more than 2 acres per dwelling unit, and agricultural uses.
- Commercial land uses are located generally along the Grand River Avenue corridor. Neighborhood commercial areas are designated for smaller scale retail and service establishments

intended to serve the needs of nearby residential neighborhoods. General commercial areas are designated for larger scale retail businesses which serve the community at large. An area for regional commercial is designated around the intersection of Grand River Avenue and Laston Road.

- A Genoa Town Center is designated along Grand River Avenue at Dorr Road. This area is planned to become a mixed-use town center with local businesses, neighborhood service establishments and traditional residential neighborhoods. Residential uses will provide a variety of housing types including apartments on upper floors above commercial uses, traditional townhouses and single family homes on smaller lots. This area will be integrated into a pedestrian-friendly, walkable area with sidewalks connecting all uses and community parks and plazas.
- Future land uses are planned south of the new Latson Road interchange to accommodate high quality, walkable commercial and an opportunity for large-scale campus uses. The intent is to retain the existing commercial development north of the interchange and provide a destination south of the interchange while limiting impacts on existing residential areas. Development is this area is intended to be phased, starting with the areas closest to the new interchange, supported by utility extensions and a newly widened S. Latson Road (formerly Nixon Road). The plan recommends this area be assessed within 5 years for potential expansion south, taking into consideration future impacts on utilities and road capacities, while protecting the nearby rural residential character.
- Industrial areas are proposed within the areas most suitable for this type of development with the infrastructure to support these uses and adequate buffers from other land uses.
- Public/Quasi-Public includes land areas occupied by government, civic or utility uses.

Transportation: A number of transportation management strategies are recommended for consideration as the Township grows. Road widening or other major improvements will be limitedAccess management standards need to be applied to the location and spacing of driveways to protect the roadway level of service. With new developments, roads need to provide a safe and efficient vehicular circulation system with a continuous street network that provides connections between neighborhoods.

Greenways and Bike Paths: The maintenance of greenways and the development of bike paths are proposed throughout the Township. Bike paths are proposed along major roads such as Grand River Avenue, Latson, Brighton, Dorr and Crooked Lake Roads.

Conservation greenways should be maintained along drainageways and in natural habitat areas.

Greening Grand River Avenue: Adding a median to Grand River Avenue has long been planned but never implemented. This plan proposes the Township work with MDOT and the Livingston County Road Commission to study the possibility of a narrow median from the interchange at Lake Chemung to Howell city limits.

I. INTRODUCTION





A. Introduction

The master plan presented herein is a document created by Genoa Township to guide the future of this community. The intent of this master plan is to provide growth management strategies that help ensure a logical development pattern while maintaining community character and protecting natural resources. The plan also provides policies and actions for community leaders to consider. Some of the master plan recommendations will be implemented through amendments to the zoning ordinance text and map.

The implementation of the policies and actions in this plan will help ensure that Genoa Township remains a desirable community in which to live, work or visit by allowing residents, business owners and developers to make investments with a reasonable expectation of what will happen in the future. It is of extreme importance to emphasize those qualities of the Township identified by residents, businesses and property owners as highly desired. Recent development and population trends in Genoa Township make it easy to understand the need for a Township master plan update. Among the many reasons for the master plan are the following:

- Present a future land use map that illustrates how the Township should develop logically over time.
- Provide a legal basis for zoning and other regulations for the type, intensity and timing of development.
- Provide that, as development occurs, the most significant natural features are preserved or enhanced.
- Outline specific strategies to address situations where one land use is not compatible with an adjacent land use.
- Recommend traffic management tools to preserve roadway capacity and ensure traffic circulation harmonizes with land uses and neighborhoods.
- Address the changing desires and needs of residents.
- Provide a sustainable community with a land use pattern that translates into a diversified tax base to support the desired facilities and services with reasonable tax rates.
- Provide specific recommendations for access management, road improvements and site design along the Grand River Avenue Corridor and new Latson interchange area.
- Coordinate land use recommendations with anticipated land use changes and infrastructure improvements with the surrounding communities.

The development of this plan involved a process of identification and analysis of physical and socio-economic conditions affecting Genoa



1-1 Introduction and Goals Draft 10/22/2013

Township. The impact of each physical and socio-economic factor on the community in the coming years results in a series of goals and policies for the Township. The master plan goals and future land use plan will assist Township leaders in substantive, thoughtful decisions which consider the long term implications for the community. These community-wide implications may not be immediately apparent to the individual property owner or citizen, but the impacts of each decision are linked and become visible over time. Poor planning decisions are difficult to eliminate, most linger forever. The master plan can be viewed as a community blueprint for the future, a mechanism to help ensure each decision fits as part of the whole.

This master plan represents a continual effort by the Planning Commission and Township Board. A series of joint public meetings were held by the Board and Planning Commission to discuss the recommendations of the plan. Citizens, landowners and interested members of the general public also attended meetings and were involved with the discussion on the plan. A public hearing to present the draft plan was conducted prior to its adoption by the Township Board.

Genoa Township's last comprehensive master plan was completed in 1998, with amendments made in 2000, 2003, 2006, and 2013.

The Township regularly refines its zoning ordinance and subdivision regulations in response to changing conditions, goals, and the law. Thus, this master plan represents the latest in a series of documents and ordinances which will help to ensure that the Township maintains its desired community character.



1-2 Introduction and Goals Draft 10/22/2013

B. Goals

A key element in the preparation of the Master Plan is the development of community goals, which reflect the community's desires to respond to various issues. The goals must all be considered concurrently and within the overall context of the plan, as opposed to individually. The Master Plan provides guidance and direction towards the achievement of Township goals.

Land Use

- Accommodate a variety of land uses that are located in a logical pattern and complement community goals, the surrounding land uses, environment, capacity of roads and the sanitary sewer, and public water system capabilities.
- Provide land owners with reasonable use of their land in a manner that is compatible with adjacent land uses and the overall land use plan for the Township and the capacity of infrastructure.
- Promote harmonious and organized development consistent with adjacent land uses.
- Provide a variety of housing styles, types, and densities to support needs of residents.

- Support "aging in place" by providing housing, recreation, and transportation options for seniors.
- Achieve well-planned, safe, balanced, and pleasant residential neighborhoods.
- Provide employment, shopping and recreational opportunities for current and future residents of the Township.
- Achieve high quality site and building design that contributes to strong neighborhoods, vital shopping districts, and desirable employment centers.
- Encourage quality industrial and technology-based development in appropriate areas of the township to diversify the tax base with room for future expansion, where not in conflict with surrounding land uses.
- Manage development by maintaining a growth boundary to encourage efficient use of land, protect farmland and natural features, and allow the efficient provision of public services, utilities, and infrastructure.
- Promote the development of a mixed-use town center along Grand River Avenue that creates a strong sense of community identity for Genoa.
- Create outlots in underutilized parking lots to provide locations for infill commercial development.

- Work with economic development agencies, such as Ann Arbor Spark, to attract new businesses and jobs, and encourage entrepreneurship.
- Preserve and encourage growth and sustainability of existing Grand River commercial after the construction of the Latson interchange.
- Promote neighborhood commercial nodes, where appropriate.
- Develop and maintain flexible codes and ordinances to meet the needs of current and future residents.
- Provide an integrated and phased design with careful consideration for new development at the Latson interchange.

Preservation of Natural Features

- Preserve the "quality of life" in Genoa Township by retaining significant, sensitive natural amenities such as water bodies, wetlands, slopes, mature trees and natural ecosystems.
- Encourage integration of natural features such as woodlands and wetlands into site development as aesthetic and functional features.
- Protect the quality of the community's lakes and water resources from overcrowding and overuse.
- Preserve the existing landscaping and natural features viewed along Township roads.
- Encourage and utilize best management practices for preservation of sensitive natural features.

Transportation

- Assure a multi-modal transportation network is available to support the current population and support managed growth through future improvements.
- Preserve the capacity and safety of arterial streets through access management.
- Evaluate impacts of traffic generated by development and work toward improvements concurrent with new development.
- Coordinate transportation improvements with county and state agencies.
- Promote "complete streets" through a non-motorized network to provide the opportunity for walking, jogging, and bicycling in a safe and comfortable environment.
- Consider transit-oriented development on former Zeeb/Preserves of Genoa property for future passenger rail train to Ann Arbor.
- Coordinate with MDOT to pursue the possibility of a narrow median along Grand River Avenue from the exit 141 Lake

Chemung interchange west to the Howell city limits to improve pedestrian safety, reduce vehicular conflicts, and to beautify the corridor.

Public Facilities and Services

- Coordinate with the adjacent townships and the cities of Brighton and Howell to provide area residents with high quality community services and facilities.
- Provide utility improvements only in locations best suited for development to support managed growth and provide a growth boundary to ensure development is consistent with infrastructure planning.
- Provide high-quality centralized parks, recreation facilities and open space to meet the needs of Township residents.
- Provide public spaces that meet the needs of Township residents and can expand or adapt to meet the needs of the future population.
- Establish a unique identity for Genoa Township through entry signage and streetscape design that provides a unique sense of place.



1-5 Introduction and Goals

II. DEMOGRAPHICS





A. Population Trends

Genoa Township has historically been a rural community, with development along Lake Chemung, the Tri-Lakes, and the Township's other 15 lakes. The once dominant rural/lake resort character of Genoa Township has been changing since the early 1970's, when suburban migration began to spread into Livingston County. Cities like Brighton and Howell also played a pivotal role in attracting residents, businesses and small industries to the region.

Accompanying residential growth has been supportive commercial and public facilities. Gradually, the area began to establish a healthy employment base. Population growth in Genoa Township, as well as many of the surrounding Townships, has been substantial since 1960. Review of census and building permit information has revealed the following trends:

- The growth rate from 1960-1980 for Genoa Township was consistently greater than the total growth rate for Livingston County. The Township's population doubled every decade between 1950 and 1980.
- In 1990 the Township had 10,820 people and was the fourth largest municipality in Livingston County.
- The 2000 Census indicated Genoa Township had 15,901 people; making it the third largest community in Livingston County.
- In 2010, Genoa Township's population had reached 19,821, growing 24.7% from 2000, and making it the second largest community in Livingston County.
- According to SEMCOG, the population of the Township is projected to reach 23,061 people by 2040.

The most apparent reasons for the Township's growth are its quality of life, availability of sewers, abundance of vacant/agricultural land, accessibility to employment centers in metropolitan areas and the establishment of its own healthy employment base. The importance of convenient access is evidenced by 2000 Census figures which indicated that over 51% of the Township's work force commuted to employment centers outside Livingston County.

Growth in Genoa Township has also been influenced by development in its two neighboring cities, Howell and Brighton. Since available land is limited in those cities, developers have sought locations in Genoa Township.

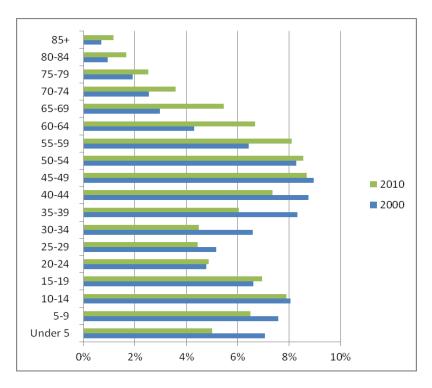
2-1 Demographics Draft 10/22/13

	POPULATION TRENDS								
	1950	1960	1970	1980	1990	2000	2010	% Change 1970- 2010	% Change 2000- 2010
Genoa Twp.	901	1,066	4,800	9,261	10,820	15,901	19,821	313%	24.7%
City of Brighton	1,861	2,282	2,457	4,268	5,686	6,701	7,444	203%	11.1%
Brighton Township	1,645	2,875	5,882	11,222	14,815	17,673	17,791	202%	0.7%
Green Oak Township	1,837	4,631	7,598	10,802	11,604	15,618	17,476	130%	11.9%
Hamburg Township	1,713	3,189	5,481	11,318	13,083	20,627	21,165	286%	2.6%
City of Howell	4,353	4,861	5,224	6,976	8,147	9,232	9,489	82%	2.8%
Oceola Township	1,030	1,453	2,496	4,175	4,866	8,362	11,936	378%	42.7%
Livingston County	26,725	38,233	58,967	100,289	115,645	156,951	180,967	207%	15.3%

Demographics

A review of general population characteristics is important to assist in determining future land use, community facilities and service needs. The distribution of population by age for 2000 to 2010 is shown in the chart below.

Young adult age groups (25-44) decreased as a percentage of the population from 2000 to 2010, while senior age cohorts (while 55+) increased.



2-2 Demographics Draft 10/22/13

Education

The educational attainment for Genoa Township is somewhat mixed when compared to the county and region. Genoa Township has higher percentages of students graduating high school and attending college, but lower percentages of students who complete four-year and advanced degrees, as shown in the table below.

EDUCATIONAL ATTAINMENT					
	Township	County	SE Mich		
Graduate or Professional Degree	8.5%	17.6%	11.5%		
Bachelor's Degree	15.8%	24.6%	17.0%		
Associate Degree	8.8%	7.4%	7.7%		
Some College, No Degree	25.6%	21.3%	23.2%		
Graduated High School	30.9%	21.4%	28.5%		
Did Not Graduate High School	10.4%	7.8%	12.2%		

Household Size

There has been a decrease in the average household size, as shown in the table below. This is similar to the national trend of single young professionals, married couples with fewer children, and the aging of the baby boomer generation.

The average household size in Genoa Township has consistently been smaller than the county and region, and all three locations have seen a similar decline in household size in the last decade.

AVERAGE HOUSEHOLD SIZE					
2000 2010					
Genoa Twp.	2.72	2.54			
Livingston County	2.80	2.67			
SE Michigan	2.58	2.51			

Housing Construction

For the first half of the 2000s, hundreds of new housing units were being built in Genoa Township each year. Due to the financial difficulties of the second half of the 2000s, only a handful of new housing units were being built per year. Even though the rate of construction has slowed considerably, the impacts of the first half of the 2000s has contributed to higher traffic levels on the township's local roads and the shift from a rural to suburban character throughout the township.

BUILDING PERMITS				
Year	New Units			
2000	466			
2001	302			
2002	442			
2003	340			
2004	241			
2005	126			
2006	47			
2007	18			
2008	8			
2009	4			
2010	6			
2011	6			
2012	6			

Income

Household incomes in Genoa Township tend to be slightly lower than most other communities within Livingston County. In 2000, Household incomes in Genoa Township were just over \$90,000, while most of the surrounding communities were closer to \$100,000 with the exception of Brighton and Howell. From 2000-2010, every community in the area saw significant decreases in median income (15% or more in each community). Median income in Genoa Township decreased the most of any community, dropping from \$93,450 to \$67,548, a 27.7% decrease.

MEDIAN INCOME COMPARISONS						
	2000	2010	Change 00-10			
Genoa Twp.	\$93,450	\$67,548	-27.7%			
City of Brighton	\$62,690	\$46,731	-25.5%			
Brighton Township	\$109,866	\$93,327	-15.1%			
Green Oak Township	\$98,391	\$75,881	-22.9%			
Hamburg Township	\$99,421	\$84,648	-14.9%			
City of Howell	\$57,535	\$43,094	-25.1%			
Oceola Township	\$99,655	\$80,996	-18.7%			
Livingston County	\$88,217	\$72,129	-18.2%			

Employment

The largest employer in Genoa Township continues to be the management/business sector, at just under 40% of the total occupation. Service and sales sectors combine to contribute 45% of the total occupation share.

OCCUPATION (what they do)					
	20	00	2010		
	#	%	#	%	
Management, business, science, and arts occupations	3,270	38.0%	3,655	38.1%	
Service occupations	1,032	12.0%	1,875	19.5%	
Sales and office occupations	2,237	26.0%	2,417	25.2%	
Natural resources, construction, and maintenance occupations	860	10.0%	681	7.1%	
Production, transportation, and material moving occupations	1,119	13.0%	973	10.1%	
Civilian employed population 16 years and over	8,604		9,601		

2-4 Demographics Draft 10/22/13

This page intentionally left blank.

2-5 Demographics Draft 10/22/13

III. ENVIRONMENT





Much of Genoa Township retains a rural or natural character. The western and northeastern portions of the Township contain some agricultural uses. There is an abundance of natural features including lakes, woodlands and rolling terrain, which make an important contribution to the quality of life in the Township. Retention of these rural/natural resources is of primary importance to many residents.

In terms of development, these features provide both constraints and opportunities. Natural features have a significant influence on future land use patterns for the Township in conjunction with other factors such as existing land use, infrastructure, market factors, transportation and community regulations.

The natural environment is a critical element of the physical basis upon which the Township develops. The various components of the natural environment function, change and interact as part of an ecosystem. An ecosystem is a biological energy system made up of food chains along which energy is passed from one group of organisms to another. It is important to understand the interaction between these components and that alteration to one element will inevitably affect all others.

Alteration to the fragile natural features needs to be carefully considered to minimize impact and insure mitigation where necessary to maintain the natural balance. Not doing so will alter the system and possibly result in such things as increased erosion and sedimentation, decreased ground water recharge and increased surface runoff to the Township's various lakes and streams. To ensure that community development is compatible with the natural features of the Township, all new developments need to make every effort to maintain the natural functions of the environment.

In Genoa Township, limitations on the type and extent of future development occur in areas that are unsuitable for septic systems, unstable for building foundations, poorly drained and not well suited for road construction. While these factors place restrictions on development, other natural resource factors present opportunities for development. The scenic and recreational attractiveness of the lakes, hills and woodlands offer a unique residential setting. It is helpful to examine these natural resource factors in detail to determine both the opportunities and constraints. Examination involves an inventory of resource factors and a determination of the capability of the natural resource base to support future development.

The following is an overview of some of the major natural features that are prevalent throughout the Township. As development occurs, the following features should be considered in addition to other site specific conditions that may be pertinent to each individual location.

Environmental Conditions:

- Geology
- Topography
- Soils
- Drainage
- Groundwater
- Surface Water
- Wetlands
- Floodplains
- Woodlands
- Fish & Wildlife
- Farmland
- Scenic Features
- Contamination Sites

GEOLOGY

The soils and geology in the township are characteristic of glacially formed landscapes consisting mainly of moraines (hills of glacially deposited sands and gravel) and till plains (mixed soil materials deposited by glacier advance and retreats). The underlying bedrock is a grey shale known as the Coldwater Formation. The surface geology of the Township was formed 10,000 to 12,000 years ago when glacial activity deposited rock, soil and large blocks of ice. The glacial drift is a very thick layer of soil material that has been deposited by the advance and retreat of the Wisconsin glacier during the last ice age. The ice blocks embedded within the soil eventually melted and left depressions, which today are lakes.

Since the last ice age the soils in Genoa Township have formed as a result of a number of soil forming factors. These include water drainage, wind, slopes, climate, biological activity and human activity.

TOPOGRAPHY

Slope is an important development consideration associated with topographic features. There are areas of significant topography in the southern and eastern portions of the Township.

Excessive slope presents constraints to development. Areas with slopes greater than 12% have been mapped to identify constraints to development (Map 1). There are three general problems with steep slopes:

- Mechanical cut and fill and placement of structures on slopes result in a significant change in the natural functions of the hillside. Drainage flow can be altered, diverted and possibly increased. This can alter the function of the hillside and increase erosion and sedimentation.
- The root system of trees and vegetation helps to stabilize the soils on the hillside. Removal of natural vegetation by agricultural operations and development causes a weakening of the slope, increased surface runoff rates and eventually erosion.

Steep slopes require sensitive site planning prior to development and during construction. Care should be taken to insure that grading is minimized and vegetation, and top soil are protected.

Along the edges of many stream courses and wetlands there are steep banks or bluffs which separate field, the lowland and the upland. These will generally have steep slopes and be heavily vegetated. Disruption of the vegetative cover on these bluff areas may cause significant erosion problems and affect stream ecology.

SOILS

Construction costs and risks to the environment can be minimized by developing areas with suitable soils. Poor soils present problems

The suitability of soil for various types of development is influenced by factors such as:

- Drainage
- Foundation Stability
- Septic Suitability

such as poor foundation stability and septic limitations. The three major soil characteristics considered in the analysis of soil conditions are drainage, foundation stability and septic suitability. Each of these factors have been inventoried and mapped by the Livingston County Soil Survey, prepared by the Soil Conservation Service. (See Map 2.)

Drainage: Development on poorly drained soils increases development costs, maintenance costs, and will lead to sanitary problems. Development costs are increased due to additional foundation, road and septic preparation. Maintenance costs and problems will be associated with septic field failures, flooded basements and impact to roads from frost action.

Foundation Stability: Soil areas that do not provide stable foundations may experience shifting building foundations, cracked walls and cracked pavement and roadways. These problems often result in increased development and maintenance costs or, in extreme cases, structural failure.

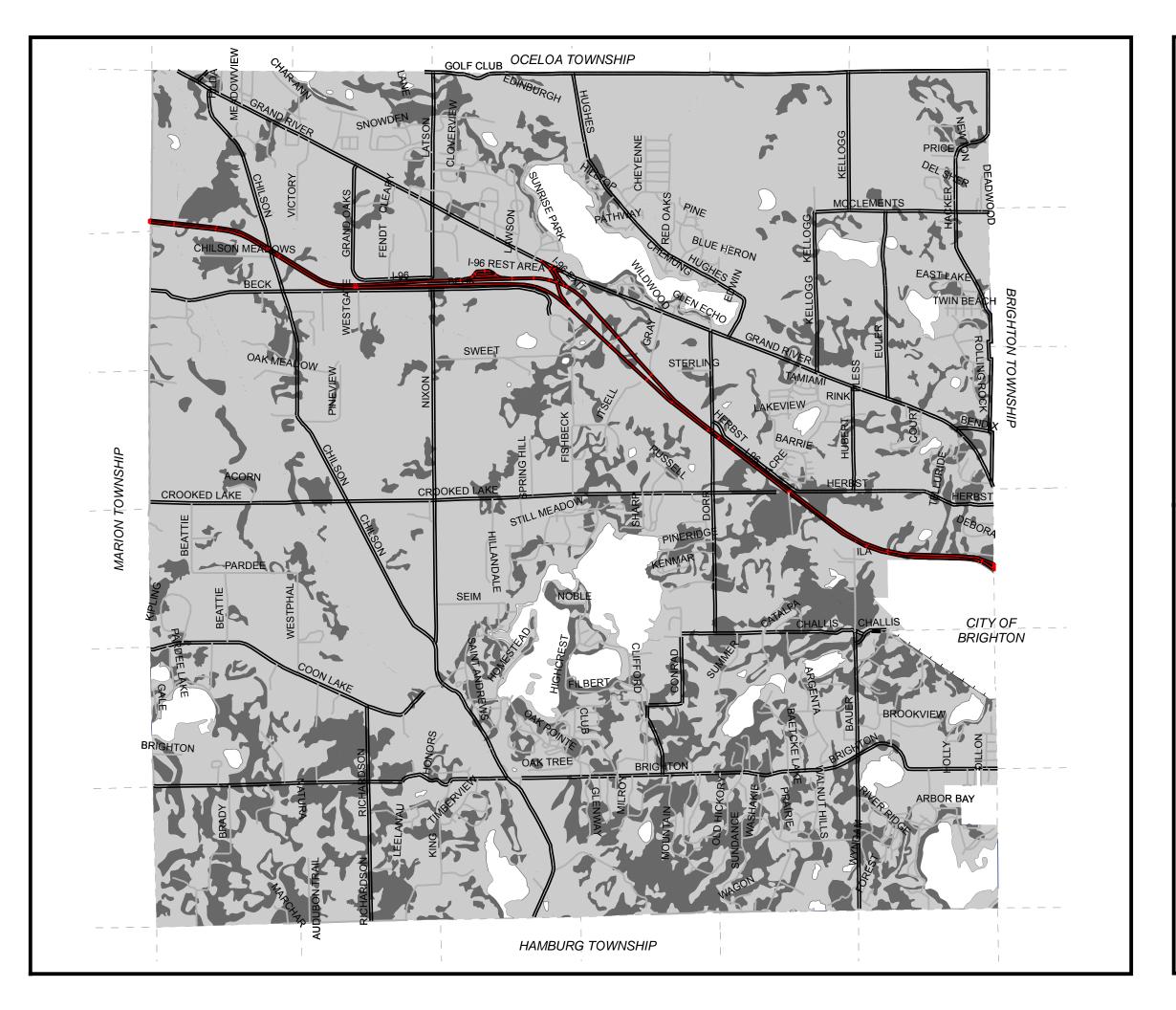
Septic Suitability: Because there are many areas of Genoa Township that rely on individual septic systems, the location of septic systems on proper soils is extremely important. Inspection and approval for use of a septic system is under Livingston County's jurisdiction and ultimately their responsibility to maintain high standards of review to prevent system complications or failures. Septic field failures are often the result of poor soil permeability, high water table or excessive slope. Soils such as compacted clays and silts will not allow wastewater to percolate, a high water table prohibits adequate filtering and excessive slope does not provide adequate percolation.

Soils Poorly Suitable for Development:

- Areas with little topographic relief, which does not allow proper drainage.
- Areas with excessive slopes which are susceptible to erosion.
- Mucks or soils with high organic materials.
- Silts and clays.
- Areas with high water tables.
- Generally along lakes, creeks and wetlands.

Soils Well Suited for Development:

- Topographic relief that provides for drainage but not excessively steep.
- Loamy and sandy soils.
- Areas sufficiently above groundwater table.



Map 1 Steep Slopes Based on Soils

Genoa Township Livingston County, MI

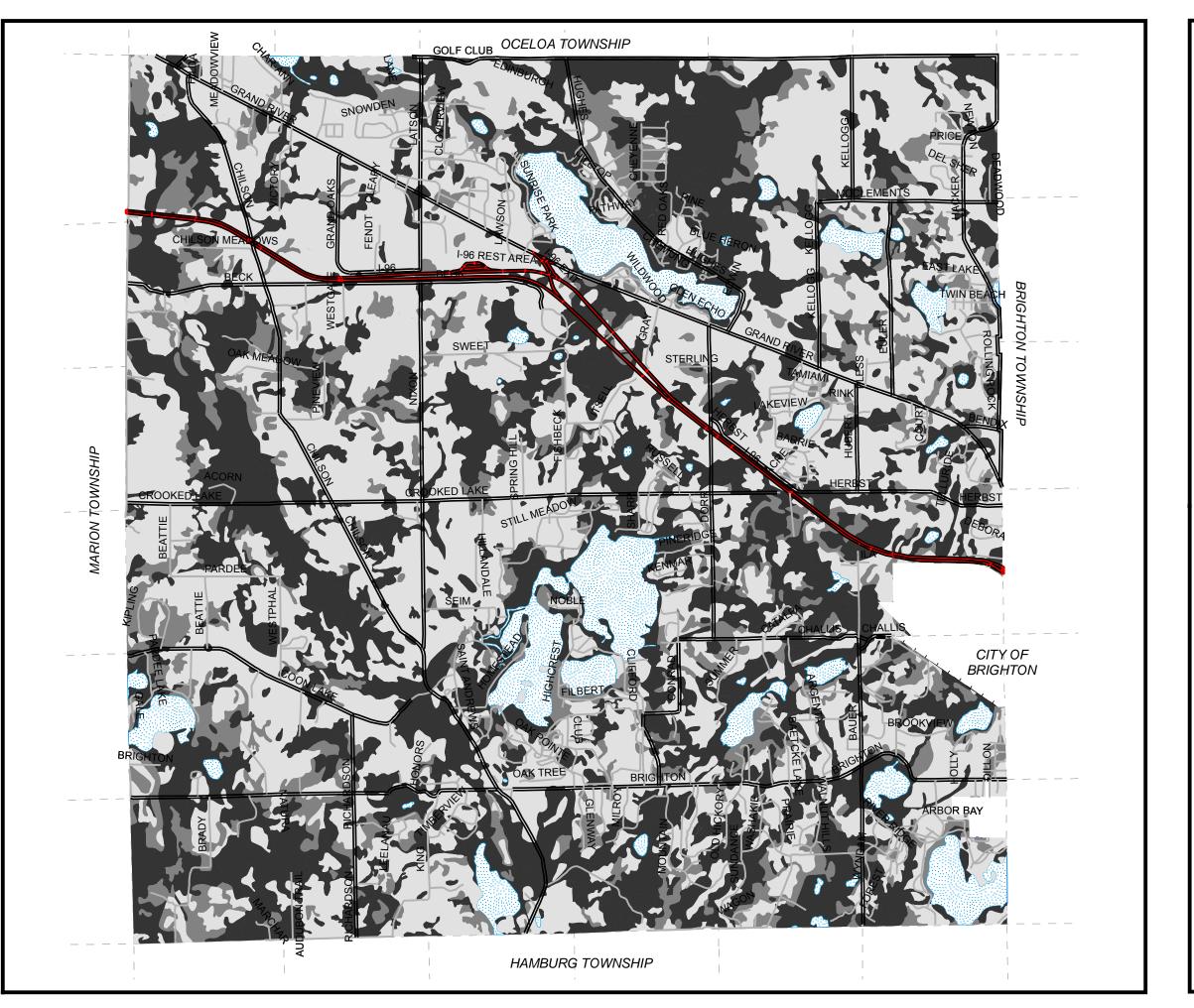
- Slopes 12% and Greater
- Slopes Less Than 12%
 - Water

May 2006



0.5 0

This page intentionally left blank.



Map 2 Septic Limitations Based on Soils

Genoa Township Livingston County, MI

- Slight Limitations
- Moderate Limitations
- Severe Limitations
- Water

May 2006



0.5 0

This page intentionally left blank.

FARMLAND

Genoa Township was historically a resort and farming community. Over the years, much of the farmland has been converted to residential, commercial and industrial uses. There is still active farmland in the northeast corner of the Township and in the western portion of the Township. The prime farmland is in the northern portion of the Township.

KEY VISTAS

The lakes, topography, vegetation and cultural resources are components in the overall scenic attractiveness of the Township. Scenic vistas are places which afford expansive views of Township visual resources. These are located on top of hills and high elevations or along roadways. Roadways are important visual corridors because they unfold a rapid sequence of vistas. Lakes, fields, homes, buildings and signs are common sites which are presented to the roadside viewer. The combination of curves in the roadway and sections of densely vegetated areas along the roadway provide departures and entrances to a sequence of changing view sheds along the road.

There are a number of areas of the Township, particularly in the west along Chilson Road, which have views characteristic of a rural/open space community. These are topographically high or open agricultural areas. These areas provide a wide panoramic view of the surrounding hills and are characteristic of an open, rural agricultural area.

Other areas of the Township have characteristic views due to topography and natural features. Many of the roadways in the Township pass through rolling topography and are lined by dense woodlands. Woodlands along roadways contribute to a natural/rural atmosphere in a number of ways. The impact of vegetation on the person within the public right-of-way will be greater because of the close proximity. A greater mass of vegetation will be within the forward view of the person within the public right-of-way. Other features outside of the public right-of-way, such as buildings, will have a less dominant impact on the streetscape because they fall behind the vegetative foreground. Taller trees provide a sense of enclosure, providing a well defined public space bounded by vegetation.

Landmarks are important visual resources. There are a number of historic farm homes which lend an important character and identity to the Township. The cultural or man built landmarks should be preserved and managed in a sensitive manner. New development should compliment unique landmarks and should not detract from the scenic vistas of Genoa Township's lakes, hills and open areas.



WOODLANDS

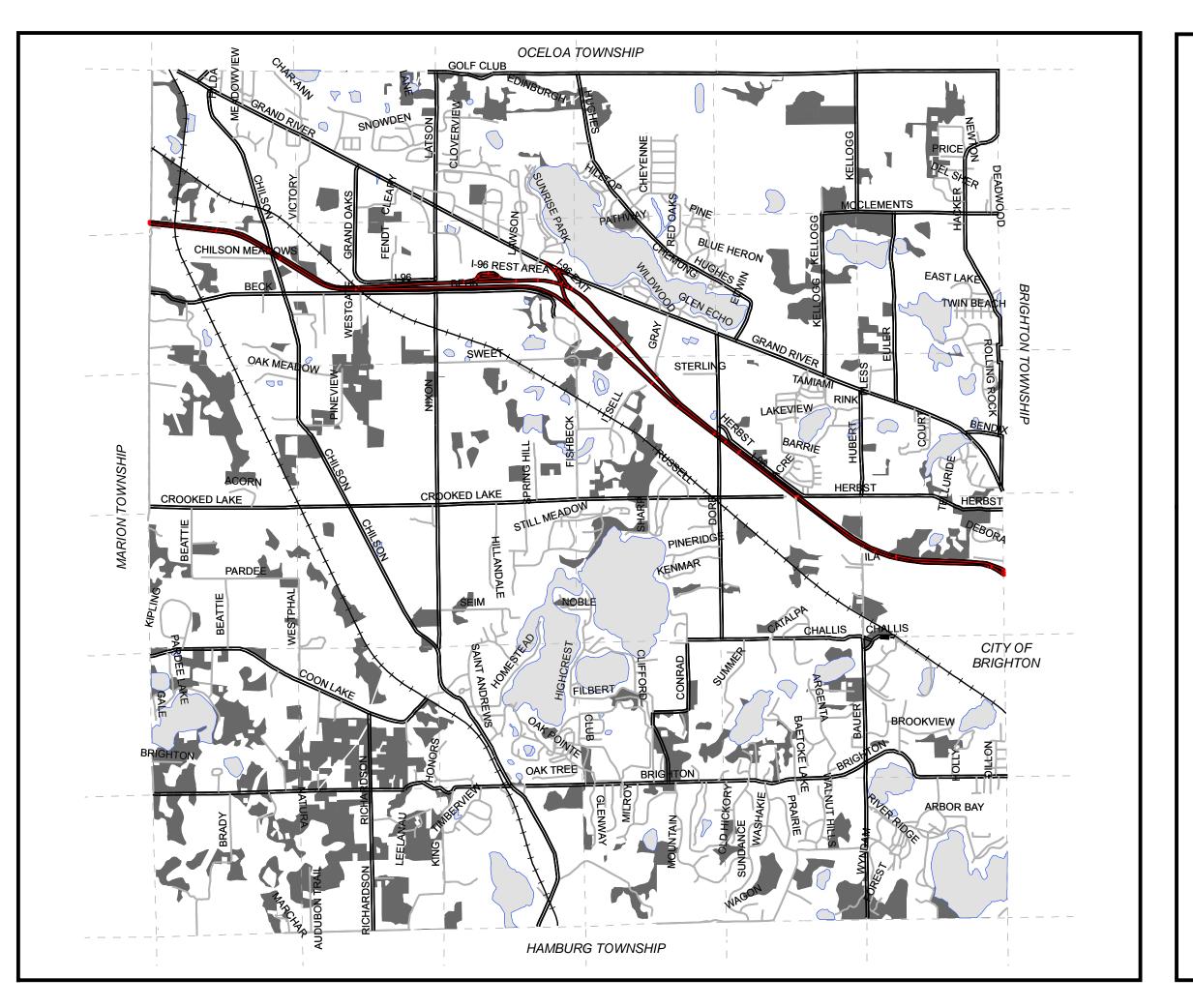
While the Township has been experiencing rapid development, there are still significant areas of natural woodlands. The most significant woodland areas are found in the southwestern corner of the Township. This area is the most isolated portion of the Township. The rolling topography and large forested wetlands limit development in this area and contribute to the natural character. (See Map 3)

The Township currently protects woodlands through provisions in the Zoning Ordinance that restrict clearing of woodlands on a site prior to site plan approval. During site plan review, woodlands are required to be inventoried and the design is required to demonstrate preservation of natural features. As a condition of site plan approval, trees are required to be protected during construction with root-zone fencing. The Township also has landscaping regulations that require the planting of greenbelts and street trees for any new development. Landscape materials used should be native to Michigan and a variety of species should be used for street trees to minimize the impact of disease.

Woodlands provide the following community benefits, which serves as a basis for these regulations:

- Quality of life: The woodlands of Genoa Township contribute to the quality of life for Township residents. The abundant woodlands and trees help create the peaceful, rural atmosphere. Trees provide a visual barrier between individual properties and neighboring properties, an essential factor for preserving the rural atmosphere and property values.
- Influence on micro-climate: Woodlands play an important role in moderating ground-level temperatures. Tree canopies buffer the ground surface from the sun's heat and wind. Temperature extremes during winter months can also be moderated with the help of trees.
- Reduction in air pollution: Woodlands absorb carbon dioxide and return oxygen to the air. Tree leaves filter pollutants from the air, removing ozone, chlorine, hydrogen fluoride, sulfur dioxide and other pollutants. Large and dense stands of trees serve as a noise buffer as well.
- Reduction in soil erosion: Woodlands and other vegetation stabilize soils and help prevent soil erosion. The vegetation absorbs the energy of falling rain and the web of roots of all types help hold soil particles in place. Tree leaves reduce the impact of raindrops on the soil surface and give soil a chance to absorb water. Fallen leaves minimize the loss of soil moisture, help prevent erosion and enrich the soil to support later plant growth. Wooded wetlands provide the additional benefit of trapping and holding storm water runoff. Dense vegetation can help slow flood surges and flows.





Map 3 Woodlands

Genoa Township Livingston County, MI



Waterways



Woodlands

May 2006





LSL Planning, Inc.



Data Sources: Base Map: Genoa Township; Livingston County GIS; M-DEQ

0.5

____N

- Wildlife habitat: Woodlands provide essential shelter and food for deer, raccoon, rabbits, pheasants and other birds and animals. The opportunity to observe wildlife in a natural setting has educational benefits for Township residents.
- Township's natural character: There is a significant amount of mature vegetation along many of the road corridors that pass through the Township. Woodlands located near the roadway contribute to a natural/rural atmosphere in a number of ways. The impact of vegetation on the motorist will be greater because of the close proximity to the roadway. A greater mass of vegetation will be within the forward view of the motorist. Other features such as buildings will have a less dominant impact on the streetscape because they fall behind the vegetative foreground. Taller trees will provide a sense of enclosure, providing a defined space bounded by vegetation. There is also a significant amount of vegetation along most lakes and streams throughout the area.

WETLANDS

Wetlands are transitional areas between the aquatic ecosystems and the surrounding upland areas. They are low areas which are intermittently covered with shallow water and underlined by saturated soils. Vegetation which is adapted to wet soil conditions, fluctuation in water levels and periodic flooding can be found in wetlands. Wetlands are linked with the hydrologic system, and as a result, these wetland systems are vital to the environmental quality of Genoa Township.

Wetlands serve a variety of important functions which not only benefit the natural environment but also the community. Some of the primary values which wetlands contribute are as follows:

- Mitigate flooding by detaining surface runoff.
- Control soil erosion and sedimentation loading in rivers and lakes.
- Provide links with groundwater.
- Improve water quality which is degradated by such things as:
 - o nutrients and chemicals from fertilizers and pesticides used in agriculture and landscaping/lawn care;
 - polluted urban run off from roads, parking lots, industrial and other commercial activities;
 - o treated effluent from waste water treatment facilities:
 - erosion and sedimentation resulting from agricultural and construction activities.
- Function as highly productive ecosystems in terms of wildlife habitat and vegetation.
- Serve a variety of aesthetic and recreational functions.

The largest interconnected series of wetlands are located along the Chilson Creek corridor in the western portion of the Township.

Wetlands play a very important part in the hydrological and ecological systems. In addition to providing fish and wildlife habitat, wetlands maintain and stabilize groundwater supplies, reduce the dangers of flooding and improve water quality.

There are also numerous kettle depressions scattered throughout the Township. (See Map 4)

There are four types of wetlands predominate within the boundaries of Genoa Township: (1) emergent wetlands with rooted cattails, bulrushes and sedge grasses; (2) Scrub/shrub wetlands, (3) bogs; and (4) forested wetlands with an over-story of trees and an understory of shrubs. As water levels rise and fall from year to year, some ecological succession may be occurring as the wetlands shift from emergent marsh to forested wetlands.

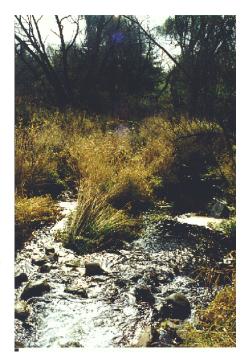
Future development in areas surrounding these wetlands could significantly impact wetland resources. Therefore, developers and Township officials should evaluate alternative designs to minimize any potential for impact. This is best done by initially considering wetland resources as constraints to development. The relative weight of these constraints must also account for other environmental and socio-economic constraints. Minimization of impacts to these resources should take into account the cost of avoidance and the property rights of the individual. If impact is unavoidable, then mitigation should include an analysis of retaining or enhancing the wetland values to be lost.

Wetland areas are valuable as natural buffers between residential and commercial land uses. They contribute significantly to the aesthetic character of the community. By incorporating wetlands as part of the future development, they will continue to maintain open and green space as well as contribute to retaining the rural setting.

Any wetlands greater than five acres in size or contiguous with a waterway are regulated by the Michigan Department of Environmental Quality (MDEQ) through the Goemaere-Anderson Wetland Protection Act, Public Act 203, as amended. Any activity which requires these regulated wetlands be filled or drained requires a permit from the MDEQ. Permits will generally not be granted unless the issuance is in the public interest and necessary to realize the benefits derived from the activity. If a wetland fill permit is granted, mitigation should be required such as creating new wetlands within the same drainage way or enhancement of existing wetlands. In addition to this, Genoa Township Zoning Ordinance contains wetlands standards that provide local reinforcement of State regulated wetlands.

LAKES

Lakes are among the Township's most valuable natural resources of the community. The largest and most significant lakes in the Township are Lake Chemung, East Crooked Lake and West Crooked Lake. The numerous lakes provide recreational opportunities such as boating, fishing and swimming. The quality of these water features enhances the value of adjacent property for residential opportunities. Areas surrounding many of the larger lakes in the



Township have been developed for smaller lot resort and residential uses. These areas were initially developed with resort cottages on small lots with individual septic drain fields. Over time these areas have been converted to year-round homes. Areas surrounding the lakes have soil conditions that are not well suited for drain fields due to poor soil texture and a high water table. The combination of the natural soil characteristics and increased residential use of the lake areas led to significant problems with septic tank systems. The septic tank leakage began affecting the quality of wells and the lakes. In response to these problems, Genoa Township has provided sanitary sewer to serve the most intensely developed areas around Lake Chemung and the Tri-Lakes.

DRAINAGE

Upland areas drain to the low lying wetlands, lakes and streams that pass through the Township. Soil permeability of most upland areas is moderate to moderately rapid. As these areas become developed, the amount of water infiltrating the surface will decrease and the surface runoff will increase. This will be caused by clearing of natural vegetation, addition of impervious material to the land (buildings and pavement) and installation of storm drains. These will have the cumulative effect of increasing the peak discharge to the area's drains, streams and lakes while reducing the amount of water infiltrating to ground water. Minimization of these impacts may involve protecting native vegetation, on-site storm water retention and clustered development.

While many of the lakes and wetlands within the Township are located within isolated potholes, there are some significant creeks, drains and streams that interconnect some of the wetlands and lakes. Chilson Creek is the major stream in the Township that flows from the north down to the Huron River in Hamburg Township in the south. Ore Creek in the southeastern corner of the Township, near the city of Brighton also drains to the Huron River in the south. Associated with the creeks are corridors of adjacent wetlands. The creeks and wetlands are important for surface drainage, groundwater recharge and wildlife habitat. Alteration of the creeks and wetlands can contribute to flooding, poor water quality, insufficient water supply and loss of valuable wildlife habitat.

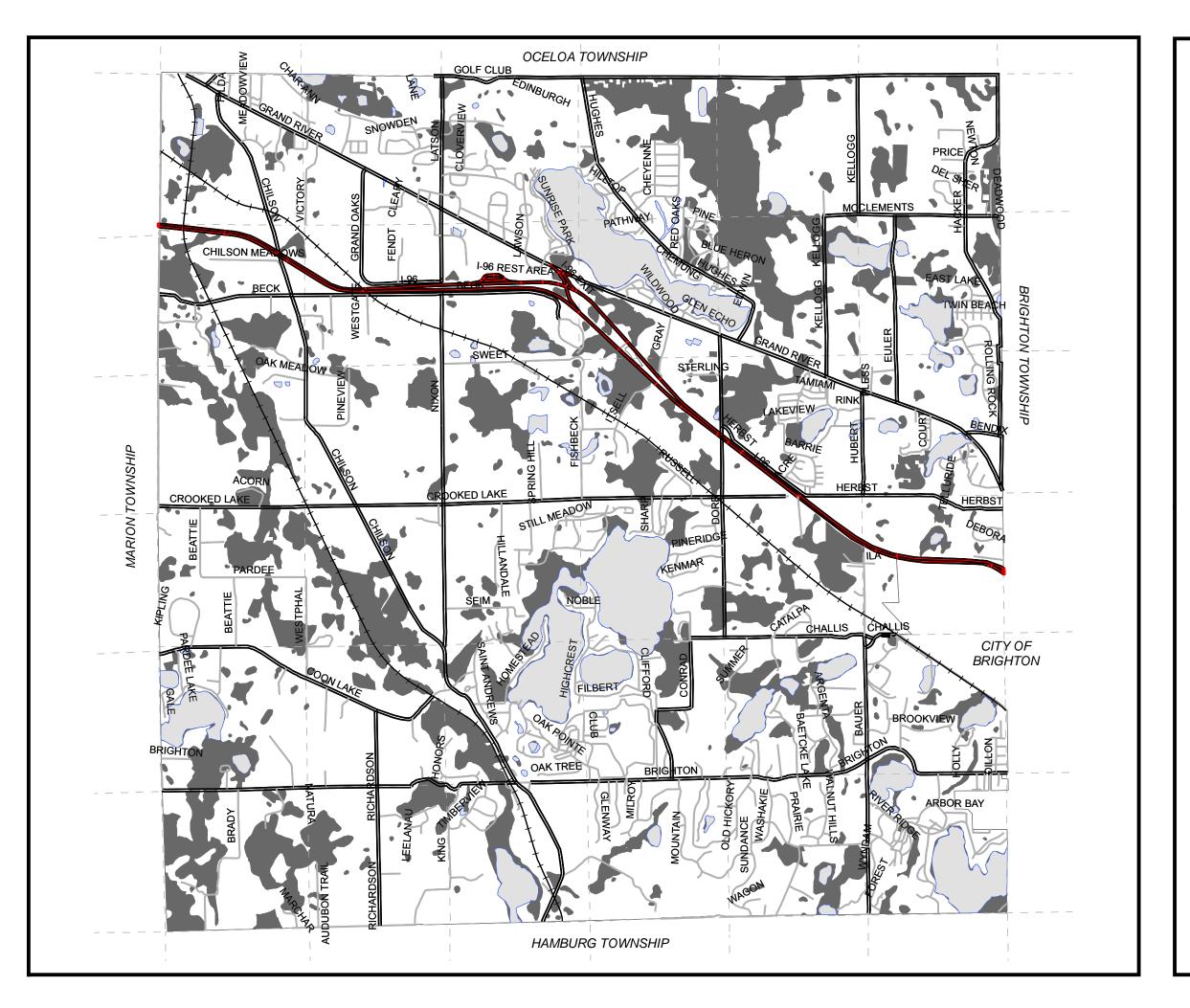
GROUNDWATER

Important factors in the evaluation of groundwater are the quantity and quality of the water. Quantity or yield standards for a typical residential or commercial use range from 7 gallons per minute to 20 gallons per minute. Water is generally available in sufficient quantity and will not likely be a factor in limiting growth.

Water quality is a more important factor than water availability. Water hardness, iron content, salinity and septic field contamination are hazards encountered in Genoa Township. Potential sources of groundwater contamination can result from all of the various land

Sources of groundwater contamination:

- · Landfills
- · Agricultural fertilizers and pesticides
- · Urban storm water runoff
- · Septic drainfields
- · Spill of hazardous materials
- Leaking underground storage tanks



Map 4 Wetlands

Genoa Township Livingston County, MI



Waterways



Wetlands

May 2006





LSL Planning, Inc.



Data Sources: Base Map: Genoa Township; Livingston County GIS; M-DEQ

0.5

1

This page intentionally left blank.

uses within Genoa Township. The level of threat of groundwater contamination will vary based on 1) the susceptibility of groundwater to contamination due to geologic features, 2) contamination loading rates based upon land use and hazardous materials management and 3) the amount and type of hazardous materials utilized within the Township.

Major sources of groundwater contamination are as follows:

- Buried wastes in landfills discharge liquids referred to as leachate which can enter groundwater.
- Agricultural fertilizers and pesticides often infiltrate the soil surface and enter groundwater.
- Urban storm water run-off from buildings, streets and parking lots contains contaminants that infiltrate the soil and enter waterways.
- Septic drainfields release sewage effluent into the soil through seepage beds.
- Spills and leakage of hazardous materials such as underground storage tanks and spills of hazardous materials will infiltrate the soil surface and enter groundwater if not properly contained.

State and county requirements will need to be adhered to for any facility within the Township that involves the use, storage or disposal of hazardous materials. Facilities for storing hazardous materials should have secondary containment and a pollution incident prevention plan.

POTENTIAL ENVIRONMENTALLY IMPACTED SITES

According to Livingston County Health Department records, there are a few contaminated sites within the Township which pose environmental problems. Michigan Public Act 307 provides for identification, risk assessment, evaluation and cleanup of sites of environmental contamination in the State. Sites are identified through information from concerned citizens, environmental groups, industry, local health departments, MDEQ staff and others. From this process a priority list was and will continually be, updated. This list is used in part to develop funding recommendations to undertake response activities utilizing state funds when the parties responsible for the contamination are unwilling or unable.

Six Act 307 Sites have been identified in Genoa Township. These are located in industrial and commercial areas, with the majority in the northwest corner of the Township near the city of Howell. These locations are planned to remain in industrial, commercial or public land uses.

A closed landfill is located on the south side of Brighton Road, east of Chilson Road.

Natural features to be preserved:

Wetlands:

- Regulated Wetlands
- Non-regulated Wetlands
- Wetland Buffers
- Restoration of Wetlands

Slopes Greater than 12%

Bluffs/Setbacks along Waterways

Soils That Are Not Well Suited for Development

Woodlands:

- Along Public Thoroughfares
- Along Greenways
- High Quality Woodlands
- Individual Mature Trees

Fish & Wildlife Habitat

Scenic Views and Open Space Along Roads

Connections to Adjacent Open Space

NATURAL RESOURCE MANAGEMENT STRATEGIES

This Plan consistently emphasizes the importance of the natural resource base. The correlation of land use density in the Future Land Use Plan to natural resource capability described in this chapter will help promote preservation of natural amenities.

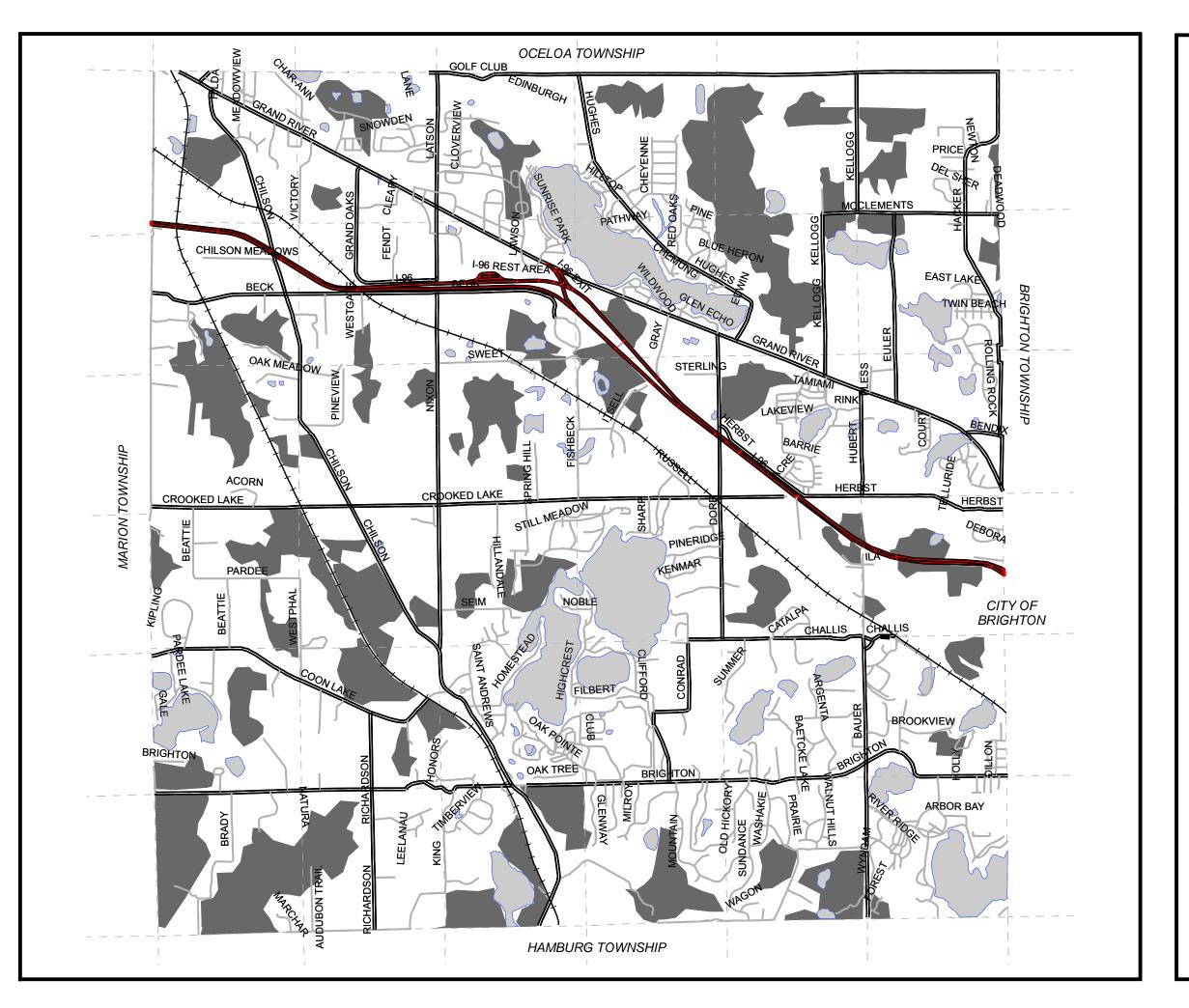
The Master Plan must address both the quality and the quantity of land use within the Township. Protection of Township resources requires the adoption of policies directed toward the specific resource problem including drainage, and groundwater quality, natural topography and vegetation. Resource protection regulations can be incorporated in subdivision, zoning and other special purpose regulations. High-quality natural areas have been mapped by the Livingston County Planning Department and are shown on Map 5.

Lower Density Zoning Districts: The interrelation of the environmental component of the Master Plan with the land use component is most visible with the establishment of land use categories. Within areas identified as having significant and fragile natural resources, lower impact/density development is recommended. This is based upon the natural capability analysis.

Certain portions of the Township are characterized by significant natural features such as extreme topography, large wetland complexes and extensive wildlife habitat. These, in combination with other factors such as existing land use patterns and transportation areas with critical natural features, are identified in the future land use map for Country Estate and Rural Residential Districts.

Natural Feature Setback Standards: The Township has enacted general zoning standards for setbacks from wetlands, lakes and ponds that apply to all zoning districts. There is a strong basis for this type of requirement. Development surrounding water features, particularly wetlands, affects the function of the water feature. Development immediately adjacent to a water feature may have the effect of increasing the disturbance to this natural ecosystem and reducing the water feature's ability to perform its natural function.

For example, wetlands are dependent on an interaction between the wetland and the surrounding upland. In terms of hydrology, water enters a wetland from the surrounding upland area in a number of ways- overland flow, through the upper layers of the soil and through groundwater. The upland soil and vegetation surrounding the wetland affect the amount, the means and the rate at which water enters the wetland following a storm or snow melt. Development of the surrounding upland will alter the relative balance between the overland (surface) flow and infiltration, resulting in a greater peak discharge to the wetland. In other instances, physical improvements such as structures, roads and



Map 5 High Quality Natural Areas

Genoa Township Livingston County, MI



Waterways



Natural Areas

May 2006

LSL Planning, Inc.

Livingston County GIS



This page intentionally left blank.

storm sewer systems can intercept surface flow to the wetlands. These alterations to hydrology can result in much greater fluctuations in water levels between wet and dry seasons. The undisturbed soil between the site improvements and the wetlands acts as a buffer to try to maintain the natural upland/wetland interaction that existed prior to development.

In addition to the hydrologic function, waterways are natural open space corridors which serve as wildlife habitat. Animals move through suburban areas along remaining undeveloped natural corridors, such as the numerous drainage ways that cross the Township. Development immediately adjacent to these natural features has a detrimental impact on wildlife habitat by moving structures and disturbance further into natural corridors and increasing constriction of development on these habitats. Protection of areas that line natural features is important to wildlife because this is the interface between the aquatic and terrestrial (upland) ecosystems system. This interface is important to animals such as land mammals that need water or birds which perch on trees to hunt for fish.

Streambank & Slope Protection: Steep slopes require sensitive site planning prior to development. Above many drainage ways of the Township there are steep banks or bluffs separating the lowlands and the uplands. These generally have steep slopes and are heavily vegetated. Disruption of the vegetative cover on these bluff areas may cause significant erosion problems and adversely affect stream ecology. Care should be taken to insure extensive grading is minimized and natural features such as vegetation and top soil are protected. This applies not only to bluffs that line waterways, but also other areas of the Township where there is significant topography.

There are a number of means for the Township to protect steeply sloped areas:

- Maintain setback requirements for all waterways. The current requirement could be revised to be variable based on the extent of the slope.
- Use flexibility offered by the Planned Unit Development regulations to cluster the development away from steep slopes.
 The Planned Unit Development regulations could be amended to require areas with steep slopes be preserved as natural open space.
- Adopt slope-related regulations where the density of development would be reduced on sites that contain steep slopes. Lots that are located in areas with severe topography would have to be larger. While this may add complexity to conventional development, it may also serve as an incentive for clustered development under the Planned Unit Development regulations.

Storm water Management: Increase in development activity will place additional burden on existing natural drainage systems unless preventive measures are adopted. The overtaxing of drainage systems could lead to localized flooding, environmental damage and costly storm drainage improvements to be borne by taxpayers.

By prompting preservation of natural drainage ways and providing storm water retention basins, the impact of development on drainage systems can be minimized. The Township should take a comprehensive approach to storm water management by encouraging the preservation of existing natural features that perform storm water management functions, minimization of impervious surface, direction of storm water discharge to open grassed areas and careful design of erosion control mechanisms. Wet ponds and storm water marsh systems should be required for detention in new developments. Storm water basins, wet ponds and storm water marsh systems need to be landscaped. Plantings should be adapted to hydric conditions and installed to create a system that emulates the functions of natural wetlands and drainage ways both in terms of hydrology and natural habitat.

Septic Disposal: Ground water and surface water contamination from septic drain fields is a serious concern in the Township. This issue was particularly a concern in areas surrounding the lakes that developed prior to current zoning and health regulations. Many of these neighborhoods developed as cottage communities at higher densities than currently allowed and within areas where the soils are not suitable for septic disposal. The continued growth of the community and the conversion of many of these cottages into yearround homes lead to contamination problems. In response, the Township has established public sanitary sewer districts to serve these areas, which has been effective in improving water quality in the Tri-Lakes and Lake Chemung. Through working with the Livingston County Health Department, the Township can continue to manage the problem of ground water and surface water contamination from septic drain fields.

- Continue providing public sanitary sewer to higher density areas, including high density areas around the lakes that are currently within the utility districts.
- Restrict the density of future development in areas where the threat to ground water and surface water contamination is highest. This would include areas along waterways and areas with poor soil suitability for septic drain fields.

Restoration of Wetlands: Prior to current wetland regulations, many wetlands within the Township have been filled, drained and/or otherwise altered. Wetlands along the various lakes have been filled for the purpose of development. In other areas, drains and

agricultural tiles may have been installed to drain surface water from wetlands so the land could be farmed.

The location of these altered wetlands can be identified. Although the hydrology of the site has been altered, the native soils will still exhibit coloration and textures associated with hydric conditions. Also, the Michigan Department of Natural Resources has mapped pre-settlement land cover (vegetation) based on historic survey records. Maps are available for Genoa Township that show the historic natural land cover.

Where development of agricultural lands is proposed, these wetlands can be restored as part of the drainage and open space design of the development. Hydrologic restoration may involve the removal of fill material and/or closing (or slowing) man-made drainage ways. Restoration may also involve covering the soil surface with peat and re-establishing hydrophytes (wetland vegetation). Within Planned Unit Developments where there are damaged or filled wetlands, a condition of approval may be the restoration of the natural system.

Lake Access & Use Regulations: Increased population in Genoa Township and lake front development have continued to place pressures on the many lakes of the Township for recreational use. The Township has regulations that govern the creation of "keyhole" development. A keyhole, also referred to as a common use access site, is a waterfront lot that is used to provide lake access for non-riparians (non lake front lot owners). There are many existing subdivisions that contain these keyhole lots and predate the ordinance. These keyholes are generally waterfront parks owned in common by all lot owners within the subdivision.

When used for access and dockage for numerous boats, these can increase the density of boat usage on the lakes and contribute to the following problems, particularly from power boats:

- Shore erosion.
- Damage to lake bottom and stirring-up sediment.
- Oil and gas spillage.
- Noise.
- Conflicts and safety problems between users (power boats, sail boats, personal water crafts, canoes and swimmers).

As the Township continues to grow, problems associated with lake overcrowding could worsen. It is important to point out that keyholes are only one part of the problem. Impacts to the safety and quality of the Township's waterways is impacted by recreational use by riparian and waterfront lot owners, as well as through public access sites. While the current keyhole ordinance can help manage the problem, the Township should consider a more comprehensive approach to managing lake usage. Any policy needs to balance the rights of riparian owners with the right of the general public to have



access to public navigable waters, and with the need to protect the quality of the state's natural resources.

The Township may adopt a lake access ordinance that restricts the number of boats that can access each lake based on water frontage. This ordinance would apply both to keyhole access and lake front lot owners. Under this ordinance, each lake front lot (keyhole or private) would be allowed one power boat plus one additional boat for each specified amount of shore length. The specified amount of shore length would need to be established for each lake based on the carrying capacity of the lakes determined by the following:

- Lake characteristics including lake size, shoreline perimeter, amount of shallow vs. deep lake area, water quality, bank and soil characteristics and turnover rate.
- Land use characteristics including the number of platted lots along waterfront, ownership patterns, zoning minimum lot sizes/widths and common use/keyhole/public access sites.
- An inventory of the number of power boats stored on the lake, the number of boats gaining access through common use/keyhole/public access sites and the total number of boats using the lake on peak days.

Preservation of Natural Topography and Vegetation: Due to the scarcity of large tracts with woods or rolling topography, those that still exist are highly valuable. The land use densities proposed by the Land Use Plan will promote the preservation of existing vegetation and topography. Specific standards can be applied to subdivision plat regulations and site plan review to require preservation of tree cover, the provision of landscaping and buffer strips and the minimization of site grading. The Planned Unit Development regulations should continue to be utilized to encourage preservation of open space, vegetative cover and natural topography.



IV. EXISTING LAND USE





A. Growth Trends

Historical Perspective

Historically Genoa Township was characterized by rural agricultural land uses, with resort-type development around Lake Chemung and the other 15 lakes in the region. In the early 1970's the rural character began to change. Suburbanites from the Detroit and Ann Arbor areas began looking at Livingston County as a convenient commute between this quiet lifestyle and metro area employment. Following the residential growth have been supportive commercial and public facilities. The small town atmosphere associated with the cities of Brighton and Howell attracted residents, businesses and small industries to this area. Gradually the area began to establish its own healthy employment base. Providing sanitary sewer service in parts of Genoa Township has contributed to the rapid pace and intensity of its growth. According to Livingston County and Genoa Township figures, most of the recent development in Genoa Township has been residential.

Regional Context

Genoa Township lies within Livingston County, Michigan. The urbanization of Livingston County is part of the trend of outward migration from the Detroit Metropolitan area. Situated between Brighton and Howell, with easy access to Detroit, Ann Arbor, Lansing and Flint via freeways, Genoa Township falls in a crossroads of growth.

Genoa has experienced a large amount of residential development and has developed a stable, self-sustaining employment base comprised of a variety of industries. The element that sets Genoa apart from many communities in the County is the opportunity to appreciate a rural lifestyle without the long commute.

The outward growth of Brighton and Howell has directly affected the development of Genoa Township, which is apparent along the Grand River Avenue corridor, accentuated by interchange facilities with I-96. Grand River Avenue is the major roadway that links the cities of Howell and Brighton and generally parallels I-96. This corridor gradually has been developed with a variety of uses, particularly during the past decade. Some regional scale commercial establishments began to develop in part due to sanitary sewer service becoming available in 1991. The installation of public utilities has resulted in the substantial growth of industrial uses in the Grand River corridor area.

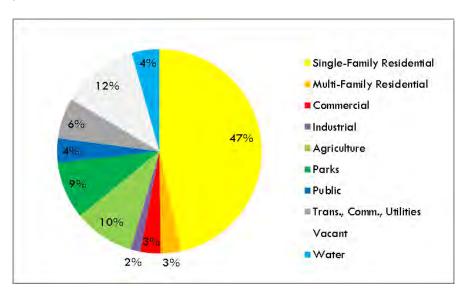
A number of factors can be cited for growth in the southeastern Livingston County area:

- Interstate 96 and U.S. 23 increasing accessibility from Genoa Township to the major places of employment in the metropolitan region.
- The availability of relatively inexpensive large tracts of land suitable for subdivision development.
- People's desire to live in a community with a rural atmosphere.
- The attractiveness of lake front or rural estate home sites.
- Public sanitary sewer becoming available.

4-1 Existing Land Use Draft 10/22/13

B. Existing Land Use

An inventory of existing land use was conducted using current aerial photographs and verified by field observation. Existing land uses were classified and the extent of their acreage determined as depicted below. The following pages describe the existing land use characteristics of the Township when the land use update for the plan was done in 2012.



EXISTING LAND USE (2012)		
	Acres	%
Single-Family Residential	10,738	47%
Multi-Family Residential	744	3%
Commercial	742	3%
Industrial	351	2%
Agriculture	2,213	10%
Parks	2,097	9%
Public	886	4%
Trans., Comm., Utilities	1,483	6%
Vacant	2,797	12%
Water	1,008	4%
Total:	23,058	

Agricultural

Agricultural includes lands actively used for agricultural purposes totaling 2,213 acres.

Single-Family Residential

Single-Family residential is the most prevalent land use in the Township. This type of residential development is dispersed throughout the area. Some of this single-family development has





4-2 Existing Land Use Draft 10/22/13

resulted from gradual divisions of agricultural land. This land use is comprised 10,738 acres in 2012.

Multiple-Family Residential

Although multiple-family housing, historically has been limited to the cities of Howell and Brighton, there has been significant multiple family development in Genoa Township since public water and sanitary sewer were introduced. This category includes attached town homes, multiple family condominiums and apartments, and manufactured housing parks. There are 744 acres of multiple-family residential development in the Township in 2012.



Commercial

Commercial uses in the Township are located primarily along the Grand River Avenue frontage. Grand River Avenue is the most heavily traveled roadway in Genoa Township. As a result, small regional shopping centers, individual business establishments and small offices have developed along this segment. Commercial/office use comprises 742 acres.



Industrial

Existing industrial uses are located on the south side of Grand River Avenue between Chilson and Latson. There are a number of small to medium sized industrial uses dispersed along the Grand River Avenue corridor. The largest industrial area is the partially developed 200 acre Grand Oaks Industrial Park just west of Latson Road between I-96 and Grand River Avenue. In total, 351 developed acres of industrial land exist in the Township.



Public/Quasi-Public

Areas designated as Public/Quasi-Public include public uses such as Township Hall, governmental buildings, churches and schools. These are dispersed throughout the Township with a high concentration of government facilities in the northwest corner towards the City of Howell. There is a total of 886 acres of public land in the Township.



Parks

This classification includes areas such as golf courses, miniature golf centers, recreational vehicle campgrounds, parks, ski areas, MDNR lake access sites, playgrounds, trails, athletic fields, and the Brighton Recreation Area which total 2,097 acres.

4-3 Existing Land Use Draft 10/22/13

CITY OF HOWELL MARION TOWNSHIP CITY OF BRIGHTON

HAMBURG TOWNSHIP

MAP 6

Existing Land Use

Master Plan Update Genoa Township Livingston County, MI





Waterways

This page intentionally left blank.

4-5 Existing Land Use Draft 10/22/13

C. LAND USE PATTERNS

The pattern of development reflects the urban influences of the cities of Brighton and Howell, combined with easy access to Detroit, Ann Arbor, Lansing and Flint via freeways. As illustrated on the Existing Land Use Map, the more intensive development is along the Grand River Avenue corridor, which is contrasted by residential development and agricultural activities away from this axis of development.

Grand River Avenue is the major roadway linking the cities of Howell and Brighton and generally parallels I-96. The installation of public utilities and accessibility has resulted in substantial growth of commercial and industrial uses southeast of the City of Howell. This area has been developing toward serving as a principal regional commercial center for Genoa Township and surrounding communities.

Residential areas north and south of the corridor historically were large lot development. In the last 20 years some of these lands have evolved to large planned residential communities. Some of these developments have utilized innovative design techniques to capitalize on precious environmental resources in the Township while preserving their natural condition. As a result smaller, more clustered subdivisions have emerged.

Much of the land along Grand River Avenue is less rolling and contains more buildable soils. It is the area most readily accessible and, therefore, feasible to sewer. Away from this corridor lands are characterized by more rolling topography, some areas with steep slopes, wetlands, problem soils, wooded areas and less intensive suburban rural-agricultural development.



4-6 Existing Land Use Draft 10/22/13

D. UTILITY SERVICE AREAS

The availability of utilities has made a significant impact on development patterns. Most older developments use individual septic systems. A high density of septic systems in areas with unsuitable soils, high groundwater or near bodies of water can have significant impact on the quality of the Township's water resources. The septic tank leakage from older systems has affected the quality of the Township's wells, lakes, wetlands, and groundwater and limits development potential. In response to these problems, Genoa Township developed several public sanitary sewer systems for certain areas. The provision of sanitary sewer has helped to overcome some of the problems associated with septic tank systems.

Northwest portion of Township

Genoa and Oceola Townships jointly developed a sanitary sewer system with the assistance of the engineering firm of Tetra-Tech MPS back in the early 1990's. This system, the Genoa-Oceola sanitary sewer system, serves much of the Township from the area around Lake Chemung to the City of Howell, north of I-96. The treatment plant is located on Chilson Road, just north of the railroad.

The plant was designed to accommodate future development of vacant land within the presently defined service district. The system is designed to accommodate the land uses indicated in the Master Plan. Only sanitary wastewater is accepted at the waste water treatment plant. No industrial process flows are permitted.

The Township also has a public water supply system for the northwestern portion of the Township. The system serves areas north of I-96 between Lake Edgewood and the western Township border. The water system was developed as part of MHOG Water Authority, a four Township system that includes Marion, Howell, Oceola and Genoa Township. There is a 500,000 gallon water tower located by Cleary University in Genoa Township.

Oak Pointe/Tri-Lakes

Sanitary sewer service was provided in the central portion of the Township around the Tri-Lakes area as a part of the Oak Pointe PUD. The treatment plant was constructed by the developer and dedicated to the Township. This system is being combined with the Genoa-Oceola system with the Oak Pointe treatment plant being taken off-line and wastewater routed to the treatment plant on Chilson Road. The system serves the ultimate build-out of Oak Pointe, Northshore and the existing residential areas surrounding the Tri-Lakes. This system provided a benefit by not only serving the future development within the Oak Pointe PUD, but by also providing sanitary sewer service to the older lakefront subdivisions in the area.



4-7 Existing Land Use Draft 10/22/13

This has had a significant benefit for the water quality within the Tri-Lakes.

As part of the Oak Pointe PUD, a public water system was also developed. The system serves the Oak Pointe development and has been extended around to the north end of Crooked Lake to serve the Northshore PUD. The system has an Iron removal facility and a 150,000 gallon elevated storage tank in the Oak Pointe Golf Course.

Brighton

The Pine Creek PUD, adjacent to the City of Brighton, has public water and sanitary sewer service through a P.A. 425 agreement with the City. Water has also been extended to serve existing homes on Dillon Street that had contamination problems with individual wells. There are currently no plans to extend Brighton water and sanitary sewer service to other areas of the Township.

There is also a public water supply system at the eastern edge of the Township. This system was originally developed to serve the Lake Edgewood condominium development and the Brighton Village Mobile home park. This system has been extended southward along Grand River Avenue to the City of Brighton. This extension serves commercial development along Grand River Avenue near the Brighton I-96 interchange. There is a 500,000 gallon water tower on Conference Center Drive, adjacent to I-96. This water system is owned and operated by the City of Brighton.

Lake Edgewood

Sanitary sewers are provided in the eastern section of the Township, through a system known as the Lake Edgewood sanitary sewer system. The system serves the greater area along the eastern portion of the Grand River Avenue corridor, west to Sylvan Glen. The Sylvan Glen manufactured housing park is served by a private on-site package treatment plant, which ultimately will be connected to the Lake Edgewood system.

4-8 Existing Land Use Draft 10/22/13

This page intentionally left blank.

4-9 Existing Land Use Draft 10/22/13

V. FUTURE LAND USE





A. Determining Factors

There are a number of factors attracting residents and developers to Livingston County in general, and Genoa Township in particular:

- Accessibility to rapid growth areas in Ann Arbor and western Oakland County, provided by the I-96 interchangesVacant, available property with lower land and development costs than in "competing" areas.
- Visibility to high and increasing traffic volumes along Grand River Avenue, especially between Howell and the I-96 exit 141 interchange.
- Availability of sanitary sewer service in select areas.
- An increasing population base to serve and/or employ.
- Relative affluence of residents.
- High quality of life offered in the area due to the natural features such as rolling hills, lakes, woodlots.

In addition to those general development attractors, there are some specific factors that influenced the proposed future land use pattern in Genoa Township. These factors include:

- Existing land use Wholesale changes to the existing land use pattern would be difficult. The locations of most existing commercial and industrial developments are appropriate, and the community land use patterns have evolved around these existing land uses.
- Relationship of incompatible uses The future land use plan strives to diminish incompatible land use relationships by providing a transition of land uses, such multiple-family between light industrial and single family residential areas.
- Natural features The natural rolling topography, woodlots and scattered lakes provide highly marketable property for residential development. The types of development and allowable density shown on the future land use map were determined by the location and extent of natural features. For example, lower overall development densities are proposed for properties containing significant wetland areas to encourage clustering in buildable areas.
- Existing Township Master Plan The original Township Master Plan, adopted by Genoa Township in 1976, and the Grand River Area Corridor Plan, adopted in 1995, were the principal basis for this current version of the Township Master Plan, first adopted in 2006. The future land use plan contained in the plan has been re-evaluated based on current trends and conditions for this update.
- Infrastructure The density of residential uses and the location of land uses such as industrial and commercial are dependent on the availability and the capacity of the infrastructure system. Portions of the Township are currently

Future land use determining factors:

- Consistency with existing land use patterns.
- Diminishing incompatible land use relationships.
- Preservation of natural features and consideration of the carrying capacity of the environment.
- Positive incorporation of natural amenities.
- Existing land use planning and zoning policies such as the previous Master Plan and the Grand River Avenue Corridor Plan.
- Availability of infrastructure including utilities, transportation and community facilities.
- Market conditions for various land uses.
- The goals and objectives of the plan that express the community character desired by residents.

5-1 Future Land Use Draft 10/22/13

served, or are planned to be served, by public water and sewer. The capacity of the road network defines the intensity of uses that may be served without adversely impacting traffic operations. The availability of community facilities such as schools, recreational facilities, police and fire protection places bounds on service to land use, particularly the residential density. For this reason, this plan includes a growth boundary.

Desires of the Township - The land use pattern desired by Township officials and property owners has been expressed with the objective of a diversified tax base, employment opportunities, provision of services for residents and desire for a mixture of uses.

The future land use map is a guide to the orderly development in the area and is intended to assist in decision-making. The future land use map is based on the current transportation system with the addition of the new full I-96 interchange at Latson Road and the existing partial interchange at Lake Chemung (See Map13).



5-2 Future Land Use Draft 10/22/13

B. Future Land Use Categories

Agricultural/Country Estate: These areas shall remain in agricultural use, or develop as single family residential on estate lots. Many of the areas are prime farmland or have significant natural limitations such as wetlands or severe soil limitations. As these areas are not planned for sanitary sewer, they can only support low density residential development. This classification is recommended for single family residences on lots no smaller than 5 acres.

Rural Residential: This designation identifies that this area shall develop as single family residential on large lots. Many of the areas have significant natural limitations such as wetlands or severe soil limitations and are not planned for sanitary sewer. This classification is recommended for single family residences on lots no smaller than 2 acres or clustered development with a net density of 2 units per acre.

Low Density Residential: These areas are designated for single family residential use, located on the fringe between the rural residential and the more urbanized areas of the Township. While these areas are not planned for sewer service, they have fewer environmental constraints found in the Rural Residential. Single family residential uses within these areas will be located on lots of at least 1 acre in size.

Small Lot Single Family Residential: This designation refers to two distinct groups of moderate density single family residential uses. The older, existing, single homes around Lake Chemung and the Trilakes Area are situated on smaller lots. It is intended that this area shall remain single family residential. Secondly are newer, small lot, single family subdivisions located within the more urbanized area of the Township. These areas will generally be, or are planned to be, served by public water and sanitary sewer. Single family residential uses located within these areas will typically be located on lots ranging from 14,520 square feet to 21,780 square feet in size or 2 to 3 units per acre.

Medium Density Residential: This designation refers to medium density duplexes, attached condominiums and other multiple-family dwelling units. This area may also be developed with single-family homes on smaller 1/4 acre lots. This designation is found within areas served, or planned to be served, by public water and sanitary sewer. Development will be at a density consistent with the infrastructure and land capabilities, but will not exceed a density of 5 units per acre. Developments in these areas will be served by public water and sewer.

High Density Residential: This designation refers to higher density condominiums, apartments and other multiple family dwellings. This

Future Land Uses:

- Agriculture/Country Estate
 5 acres per dwelling unit
- Rural Residential
 2 acres per dwelling unit
- Low Density Residential
 1 acre per dwelling unit
- Small Lot Single Family Residential of 2 to 3 dwelling units per acre
- Medium Density
 Residential
 5 dwelling units per acre
- High Density Residential
 8 dwelling units per acre
- Neighborhood Commercial
- General Commercial
- Regional Commercial
- Mixed Use Town Center
- Office
- Industrial
- Planned Industrial
- Public/Quasi-Public
- Private Recreational
- Planned Unit Development

5-3 Future Land Use Draft 10/22/13

designation is found within areas served, or planned to be served, by public water and sanitary sewer. Development should respond to infrastructure and land capabilities, and should not exceed 8 units per acre. High density residential developments will be served by public water and sewer.

Manufactured Housing: These areas are designated for manufactured housing/mobile home parks. Manufactured housing areas will be served, or planned to be served by public water or a community well and sanitary sewer. Development in these areas will be limited by infrastructure and land capabilities.

Neighborhood Commercial: Retail and service establishments whose primary market area includes residents and employees from within a two mile radius are designated by this category. These retail businesses and services are intended to serve the needs of nearby residential neighborhoods. Typical uses would include smaller general merchandising/retail establishments such as convenience stores, banks, dry cleaners, and beauty/barber shops, and small retail strips.

General Commercial: Businesses which serve the requirements of the community at large including Genoa Township, Howell, Brighton, and pass-by traffic along Grand River Avenue are designated by this category. The large size and variety of permitted commercial uses generate significant volumes of vehicular and pedestrian traffic. There may be some outdoor sales or display areas. These districts are intended to be clustered, rather than allowed to create an undesirable commercial strip pattern of development, and buffered from nearby residential area. Appropriate uses include larger grocery stores, restaurants and retail shopping centers.

Regional Commercial: Land uses within this category include higher intensity commercial uses that serve the comparison shopping needs of the entire community and the regional market. Uses include bigbox retail, large shopping centers, restaurants (including fast-food) and automobile service centers. Such land uses rely on higher traffic volumes and easy access via a major arterial or highway. Development within such areas should occur within a planned, integrated commercial setting. Site design for these uses should include high quality architectural and landscape design with parking areas and access points that promote safe and efficient circulation throughout the site. The location of this land use designation shall be focused along the Grand River Avenue corridor between Latson Road and Grand Oaks Drive to create a focused regional commercial center so that the Township, County and State agencies can more efficiently focus the infrastructure and services needed to support this regional center.

Mixed-Use Town Center: This category includes a mixture of uses integrated into a traditional-style development of high density single

5-4 Future Land Use Draft 10/22/13

family homes, attached and detached, along with various commercial uses including retail and office. The intent is to create a destination in the Township as an alternative to the consistent strip development that currently exists along Grand River Avenue from Howell to Brighton.

A more detailed description of this area can be found later in this chapter.

Office: This use includes various forms of office development including professional offices, medical offices and banks.

Industrial: The intent is to develop industrial uses such as research, wholesale and warehouse activities and light industrial operations which manufacture, compounding, process, package, assemble and/or treat finished or semi-finished products from previously prepared material. The processing of raw material for shipment in bulk form, to be used in an industrial operation at another location is found only in very defined and limited portions of this area.

Research and Development: This area should be developed as a light industrial/R&D/office park. High quality building architecture should be utilized to convey a high-quality image. Enhanced landscaping and screening should be provided along adjoining major thoroughfares. Flexibility in some zoning requirements may be considered in exchange for these aesthetic enhancements.

Public/Quasi-Public: These are institutional land areas to be occupied by government, utility or civic uses such as churches, parks, state, county and municipal facilities and major utility lines.

Private Recreational: These are areas designated for private recreational facilities such as golf courses, campgrounds and private parks.

Redevelopment of Public/Quasi-Public Sites: Development pressures may lead to a demand for some public sites or private recreational property to be developed with other types of uses. If there is any redevelopment of public sites or private recreational lands, proper land use relationships must be maintained to ensure design and uses are compatible with the planned character of the surrounding area. In addition, since most of those sites have significant open space or natural features, some element of those features should be preserved. The Planned Unit Development (PUD) option contained in the Zoning Ordinance would be a good approach for this type of redevelopment. PUD provides design options to permit flexibility in the regulation of land development and innovation in design.

 The relatively large size of sites allows coordinated development and transitional land uses within the site to ensure compatibility with the surrounding area.



5-5 Future Land Use Draft 10/22/13

- Clustering residential units can be used to preserve common open space and natural features such as trees, topography and key views.
- Any development with another, more intense quasi-public land use, such as a medical center or hospital, should be designed as a PUD to properly integrate the development within the community. Such facilities should be designed to provide a campus type design, with coordinated access and circulation, consistent building design and preserved open space and natural features.

Interchange Commercial: Rather than typical interchanges where gas stations and fast food establishments are built piecemeal with little consideration for aesthetics, the intent of this designation is to promote planned development of these interchange commercial uses with high quality architecture. The new Latson interchange is envisioned to be the premier exit for travelers along I-96: a destination where they can get out of their vehicles to walk around, dine, and shop.

- Appropriate uses include fast food, sit-down restaurants, gas stations, retail, and entertainment
- This area may be subject to design guidelines promoting walkability, increased landscaping standards, pedestrianscale building siting and massing, and outdoor dining/gathering.
- Very few access points: each development shall provide access connections to adjacent properties so that there may be a shared access connection to a future traffic signal.

For more information on the Latson Interchange Subarea, please see below.

Interchange Campus: With the creation of a new interchange at Latson/Nixon in 2013, development pressures may exist for large-scale users seeking large parcels of land with convenient access to I-96. The intent is to create a district that will accommodate large-scale institutional campuses close to the interchange without leap-frog development further south.

- Possible principal uses alone or in combination: medical center/clinics, higher education satellite, corporate offices, high-tech research & development (with no external impacts), indoor sports center, conference center/hotel, health clubs, office centers, or senior living. Ancillary uses that have a direct connection to the principal use are allowed and should be part of the overall plan, such as limited restaurants and professional services when included as part of an overall development.
- Any large-scale development should be a well-planned, campus-like setting, planned in close coordination with the

5-6 Future Land Use

Township. Upon submittal of the first development proposal for this area, an overall development plan must be provided. This plan shall guide development in the interchange campus area including signs, access/circulation, building design, landscape, and streetscape.

 A well-landscaped entry corridor that includes a median, sidewalks, street trees, and ample places for pedestrians to cross S. Latson Road. This may require provision of 40' of right-of-way from the center of the road.

For more information on the Latson Interchange Subarea, please see below.

Table 12 Future Land Uses

Future Land Use	Acres	Percentage
Ag/Country Estates	6,159	28.6%
Large Lot Rural Residential	4,151	19.3%
Low Density Residential	4,370	20.3%
Small Lot Single Family Residential	2,364	11.0%
Medium Density Residential	443	2.1%
High Density Residential	119	0.6%
Manufactured Housing	399	1.9%
Neighborhood Commercial	116	0.5%
General Commercial	348	1.6%
Regional Commercial	270	1.3%
Mixed Use Town Center	186	0.9%
Office	238	1.1%
Industrial	340	1.6%
Research and Development	241	1.1%
Public/Quasi-Public	724	3.4%
Private Recreation	502	2.3%
Interchange Commercial	70	0.3%
Interchange Campus	520	2.4%
FLU Total	21,560	

5-7 Future Land Use Draft 10/22/13

OCEOLA TOWNSHIP GOLF CLUB CITY OF HOWELL BLACKBERRY RIDGE BRIGHTON TOWNSHIP CLOVER BEND BEAGLE RUN MARION TOWNSHIP PARDEE CHALLIS CITY OF BRIGHTON

HAMBURG TOWNSHIP

MAP 7

Future Land Use

Master Plan Update Genoa Township Livingston County, MI

AGRICULTURE/COUNTRY ESTATE - 5 acres per unit LARGE LOT RURAL

RESIDENTIAL - 2 acres per unit

LOW DENSITY
RESIDENTIAL - 1 acre per unit

SMALL LOT SINGLE FAMILY
RESIDENTIAL - 2 to 3 units per acre

MEDIUM DENSITY
RESIDENTIAL - 5 units per acre

HIGH DENSITY
RESIDENTIAL - 8 units per acre

MANUFACTURED HOUSING

NEIGHBORHOOD COMMERCIAL

GENERAL COMMERCIAL

REGIONAL COMMERCIAL

MIXED-USE TOWN CENTER

OFFICE INDUSTRIAL

RESEARCH AND DEVELOPMENT

PUBLIC/INSTITUTIONAL/UTILITIES

PRIVATE RECREATION

INTERCHANGE CAMPUS

INTERCHANGE COMMERCIAL

October 2013



5-9 Future Land Use Draft 10/22/13

C. GROWTH MANAGEMENT BOUNDARY

The residents of Genoa Township have consistently said that preserving the natural beauty of the Township and controlling urban sprawl are important priorities for planning the community. The Township also desires to be able to provide efficient infrastructure services to support development. One of the most effective ways to meet both of these goals is with a "growth boundary." The growth boundary concept in the plan is designed to encourage the following:

- Efficient land use,
- Protection of farmland and natural areas,
- Efficient provision of utilities, services and infrastructure,
- An efficient transportation system,
- Locations for economic growth, and
- Diverse housing options.

The growth boundary marks the separation between rural and urban areas and defines land that can efficiently support urban services such as sewer, water and roads. Secondary growth areas are also provided adjacent to the City of Brighton for low density residential. Development outside the boundary is not prohibited; however, because public utilities are not available in these areas, development needs to be maintained at a relatively low intensity and the character of development needs to not adversely impact natural features and agricultural uses.

Areas within the growth boundary include the Grand River Avenue/I-96 corridor between Brighton and Howell and areas surrounding the City of Brighton. Land within the growth boundary are separated into two distinct areas:

- Primary growth areas are currently served or available to be served by public sewer and water. These areas include single family and multiple family residential at higher densities with public water and sewer, commercial centers, industrial parks and mixed-use centers.
- Secondary growth areas do not have sewer and water, but due to their proximity to the cities of Brighton or Howell, are appropriate for infill with low density residential. Typical lot sizes will be around one acre or clustered developments at an overall density of two acres per dwelling.

Rural reserve areas outside of the growth boundary should be maintained at a relatively low intensity rural character of development that will not adversely impact natural features and agricultural uses.

There is presently vacant or under-utilized land within the growth boundary that can be served by public water and sewer. By focusing new development in these areas, the Township and the County can more efficiently provide the necessary infrastructure to support new growth.

In addition, the Township has planned for a mixed-use town center at Grand River and Dorr Road. This center is inside the growth boundary and currently has the public utility and transportation infrastructure to support development. This higher density center will form a compact area for housing, shopping, employment, cultural and recreational activities in a pedestrian-friendly, vital and attractive neighborhood.

An extension of utilities south of I-96 to the Latson subarea was a determining factor in the planned land uses for that area. After the interchange is completed, the area should be monitored annually for potential development and proposed expansion of the growth boundary south.

The growth boundary is not intended to be static, but should be evaluated on a regular basis along with other updates to the Master Plan. The Township Planning Act requires that the Master Plan be evaluated and updated at least every 5 years. With each update, the following criteria should be taken into consideration for amending the growth boundary:

- Amount and capacity of undeveloped or under-developed land currently within the growth boundary, which should be used to satisfy the demand for development prior to expanding the boundary.
- Projected population growth within the Township and demand for other land areas for commercial or industrial development.
- The ability to extend public water and sewer to serve new land areas outside of the growth boundary.
- The capacity and condition of the road system to support the new growth areas.
- The ability of the Township, County and other public agencies to provide necessary services to the new growth areas and the additional resulting population.
- The impact of higher density development from expanding the growth boundary will have on natural features, agricultural uses and rural character.
- Consistency with the goals and objectives of the Master Plan.

OCEOLA TOWNSHIP CITY OF HOWELL BECK MARION TOWNSHIP CROOKED LAKE COON LAKE CITY OF BRIGHTON BRIGHTON HAMBURG TOWNSHIP

MAP 8

Growth Boundary

Master Plan Update Genoa Township Livingston County, MI



Primary Growth Areas

Secondary Growth Areas

Rural Reserve Areas

October 2013



D. GENOA TOWN CENTER

An area has been designated for the Genoa Town Center around the intersections of Grand River Avenue with Dorr and Hughes Roads. This area is planned to become a mixed-use town center with local businesses, neighborhood service establishments and traditional residential neighborhoods. Residential uses will provide a variety of housing types including apartments on upper floors above commercial uses, traditional townhouses and single family homes on smaller lots. The intent is that this area will be integrated into a pedestrian-friendly, walkable area with sidewalks connecting all uses and community parks and plazas integrated into the fabric of this town center area. The Town Center area has the potential to become an activity center for the Genoa Township community that will provide a defined sense of place for the Township.

This area is planned for higher density development and a mixture of uses; however for this type of development to be successful, it must be properly designed and developed. For that reason, this area is planned to be developed with a Town Center Overlay Zone, with specific design standards for traditional architecture, buildings, neighborhood form and streetscape elements, commonly referred to as traditional neighborhood design. Below are some general guidelines on how this area should develop.



Local Retail and Neighborhood Service

Local businesses and neighborhood service uses along Grand River Avenue will be a focal point of the proposed town center. The intent is that these areas will develop in a manner consistent with the desired small town center environment and defined by closely-knit neighborhoods surrounding a node of neighborhood commercial. Development should be similar to the traditional urban forms found in downtown Brighton and Howell.

Commercial architecture should contribute to the desired town center character. The architectural styles for buildings should resemble that of traditional architecture. Town centers commonly possess an integrated pedestrian circulation system that conveniently links residents of surrounding neighborhoods to public gathering places, neighborhood commercial areas within the town center and civic and recreational facilities. It is therefore important to ensure adequate connections are provided through the creation of a system of sidewalks and pathways that emphasizes human scale and makes a neighborhood walkable. The commercial areas of the town center need to include the following elements:

 Traditional architecture similar to that found in downtown Brighton and Howell should be used.







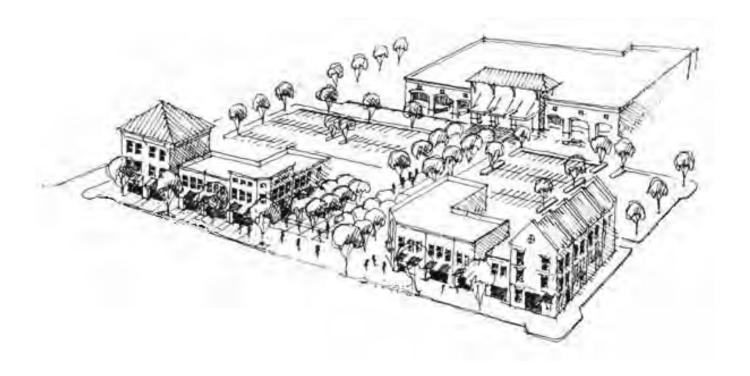
5-14 Future Land Use

- Buildings should front towards and relate to the street at a pedestrian scale and orientation.
- Building envelopes should create a continuous street edge with buildings built-to the front lot line and with zero side yards between adjacent buildings.
- Parking lots should be located behind the building to minimize the dominance of automobiles and make the site more pedestrian friendly.
- Sidewalks and pathways should interconnect all uses within the town center with convenient links to residential areas and parks.
- Street trees should be provided along all frontages and brick walls or hedge rows used to screen any visible parking lots.
- The area should be developed with an interconnected grid street pattern with on-street parking.
- Signage on businesses should be designed to fit the traditional architecture and be pedestrian in scale.
- A vertical mixture of uses should be encouraged with residential or office above retail businesses and services.









5-15 Future Land Use Draft 10/22/13

Residential Uses

The residential areas of the town center should develop in a manner that is consistent with the traditional neighborhood character of a small-town. Residential will be a mixture of apartments above businesses, traditional townhouses, and single family homes on smaller lots. Other uses may include churches, civic spaces, parks and recreational uses.

With the potential of higher density of development, it is important that residential areas be designed to include all of the elements essential to a high quality traditional neighborhood. Neighborhoods need to consist of physical components such as streets, lots, blocks, homes and community facilities, such as parks, schools and churches. Residential development should include all of the following elements:

- Traditional architecture should be utilized.
- Multiple family should be developed as traditional townhouses with courtyards and parking to the rear. Single family homes should be designed with the living areas on front and garages recessed to the side or rear of the home.
- Porches or stoop entrances should be provided on all front facades.
- An interconnected grid street pattern should be developed with 600-800 foot maximum block lengths. Where locations prevent through streets, then looped drives with large center green spaces should be used instead of cul-de sacs.
- Neighborhoods need to be developed at a walkable scale with sidewalks and pathways system.
- Vistas should be maintained to natural areas and focal points.
- Neighborhood parks need to be provided in visible and accessible locations to serve as neighborhood focal points/gathering places and provide for recreation.





5-16 Future Land Use

Public Streetscape and Open Space

Streetscape improvements, such as street lights, landscaping, pathways and street furniture, should be integrated into the design of development in the Genoa Town Center as well as other areas along Grand River Avenue. This will create a strong sense of place and identity for the community. In order to break the corridor up, separate design themes should be considered for distinct areas such as the Genoa Town Center and the regional shopping area centered around Grand River Avenue and Latson Road.

Ornamental street lighting should be included along the frontage of development to provide unity along certain sections of the corridor. The regional commercial section of Grand River Avenue at Latson Road currently has a uniform type of street light that creates a unique identity of this area. A uniform style of street light should also be used in the Genoa Town Center area. This should be a different style of ornamental lighting to distinguish from the regional commercial area.

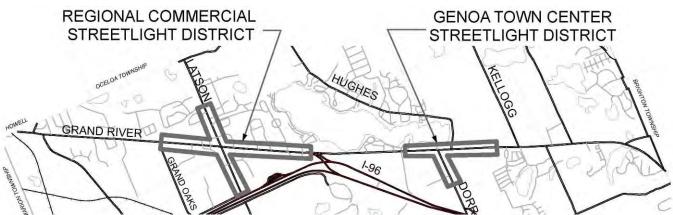
Gateway signs should be installed at major entryways to the Township, such as along Grand River Avenue. Enhancement elements of the entrance sign should include lighting, landscaping and masonry material.

Mixed-use developments should include plazas and public art. Public art should be designed as an enhancement to a site and provide a strong focal point. This public art should be:

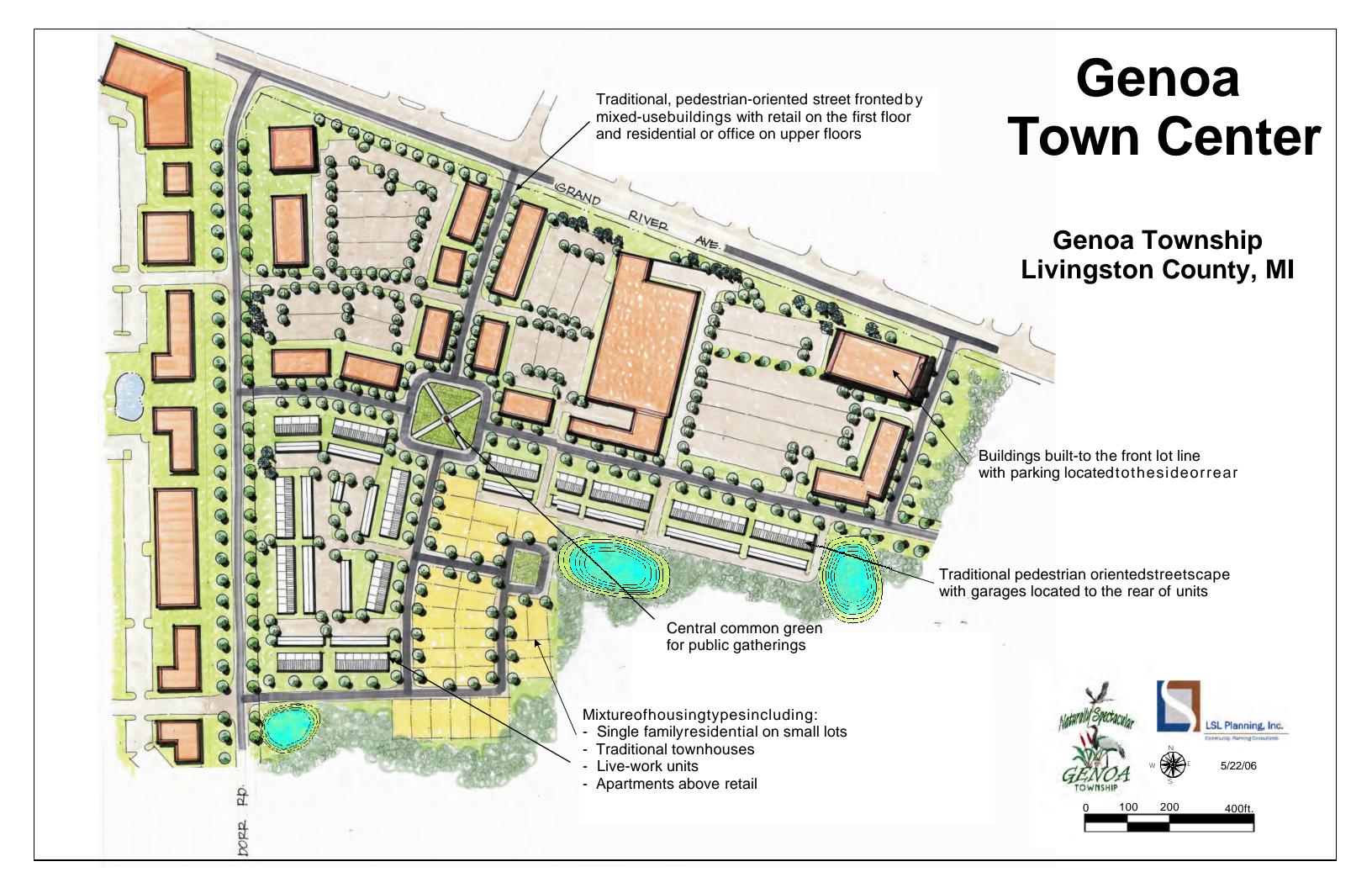
- Appropriate to the scale and nature of the site.
- Integrated into the design of the building.
- Preserve and integrate natural features of the site.
- Use materials, textures, colors and design that are within the context of the surrounding area's character.
- Designed to be accessible, durable, secure, easily maintained and not pose a hazard to public safety.







5-17 Future Land Use Draft 10/22/13



E. I-96/Latson Road Subarea Plan

At the time this Master Plan update was prepared, a new full service I-96 interchange was under construction at Latson Road. The new interchange includes an overpass connecting Latson and Nixon Roads and a widening to five lanes between Grand River Avenue and the C.S.X. Railroad tracks. Nixon Road, renamed to S. Latson Road, would be improved to a paved, two lane roadway from the railroad south to Chilson Road. Grand Oaks Drive and Beck Road have been realigned to accommodate the interchange ramps.

With the development of the new interchange, Latson Road will be an important gateway to both north and south Genoa Township. Access to the area south of I-96 will dramatically change, necessitating a specific subarea plan to guide development decisions. The subarea plan is intended to address the following:

- Manage traffic around the new I-96 interchange and the intersection of Latson and Grand River Avenue to maintain a level of service that will meet the needs of travelers, protect the significant investment of the interchange, and allow some well-managed intensification of land use near the interchange.
- Encourage high-quality design for the land uses surrounding the interchange to create a gateway that presents a positive image to the community for residents, businesses and visitors.
- Protect the established rural and suburban residential areas south of I-96 through preservation of natural features, limiting density and preventing the intrusion of nonresidential uses outside of identified boundaries where land use change has been planned.
- Identify a secondary area along S. Latson Road where some additional land use change may be considered once a principal use has been established and approved.

The Latson Road Subarea Plan includes the following recommendations for when the interchange is completed, as illustrated on the subarea map (See Map 10):

- The land on the east and west side of Latson Road between I-96 and Grand River Avenue is planned for Regional Commercial and will be rezoned for a mixed-use PUD (NR-PUD). This PUD should include the following:
 - A diversified mixture of uses that may include commercial and office/research and development.
 - A mixture of uses that will diversify traffic generated from the site by spreading out the peak hour over times that minimize impact to the interchange's peak hour traffic.

Planning for the Latson/Nixon Road Corridor when the I-96 interchange is completed:

- Manage traffic and access around interchange.
- Create community gateway with distinctive character.
- Diversified mixture of land uses.
- High quality architecture.
- Streetscape and landscaping improvements along Latson and Grand River.
- Protect character of rural residential neighborhoods south of I-96.
- Reevaluate the plan yearly to respond to development and market factors.

- Access management that will minimize the number of driveways and protect the efficiency of traffic flow along Latson Road between the interchange and Grand River Avenue.
- Distinct and prominent architectural features of enhanced character, which reflect the importance of the site's location and create a positive visual landmark for this gateway to the community.
- Extensive landscaping along Latson Road and Grand River Avenue to enhance the appearance of these corridors and the gateway to the community.
- Uniformity in design through coordination of architectural styles, landscaping, ornamental lighting, pedestrian circulation and vehicular access.
- The areas immediately south of the interchange along S. Latson Road are planned for Interchange Commercial, as described in Section B above. This area is intended to accommodate the needs of interstate traffic and should complement, not duplicate the commercial areas north a long Latson and Grand River.
- The areas adjacent to the Interchange Commercial area as depicted on the map are planned for Interchange Campus uses. This area can be served by utility extensions and is intended to be a well-planned, campus setting.
- Residential development along S. Latson Road south of the Interchange Campus area will remain at large lot residential densities. The intent is to protect the residential character and natural features through lower density development (Future Transition Area on Map X).
- As the areas designated for Interchange Commercial and Campus are approved for significant development, areas south currently planned residential should be reevaluated for potential supporting uses, conditional upon the utility and roadway capacities, as shown as Future Transition Area on Map 10. This plan is intended to be flexible, balancing the impacts of new development on the infrastructure system, accommodating new uses dependent on surrounding uses, and limiting the negative impacts on existing nearby uses.

South Latson Interchange Design Guidelines

Streetscape

Streetscape improvements, such as street lights, landscaping, wayfinding signage, and pathways, should be integrated into the interchange commercial and campus developments. This will contribute to the unified, high-quality development the Township would like to project at the new interchange.

 As part of the development of the South Latson campus, a landscaped median should be installed south of the railroad. This will not only help beautify the corridor but improve safety by restricting left-turns.

Interchange Commercial Examples



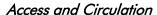






5-21 Future Land Use Draft 10/22/13

- Ornamental street lighting should be included along South Latson and within the new development itself to contribute toward the site's unified design.
- South Latson should be well landscaped, not only in the median, but along the frontage, with street trees and knee walls or hedgerows screening parking.
- Gateway and wayfinding signs should be installed at the interchange welcoming visitors to the Township and directing them to major landmarks. This signage should be consistent with that proposed along Grand River and for the Town Center. Elements of a gateway entrance sign should include lighting, landscaping, and masonry material.
- Pathways should be installed on both sides of South Latson and connect to the interior of the site. Buildings and parking should all have pedestrian connections to the pathway network.



In order to efficiently accommodate new traffic that is likely to result from new development, having a coordinated circulation and access plan is essential.

- A signalized intersection should be located approximately ¼
 mile south of the railroad at Sweet Road. This should be the
 primary entrance to campus Area A as identified on the
 Subarea Map.
- An additional entrance to Area A should be located halfway between the signalized intersection and the railroad tracks and be right-in/right-out.
- Area A's ring road should be sensitive of the wetland/wooded area in its southeast corner and provide stub roads for future connections to the south.
- Area B should be accessed via the newly realigned Beck Road which can be extended and configured into a loop road
- Area B's loop road should be sensitive to the wetland/natural areas at the south of the site.
- Auxiliary campus uses on the east side of South Latson across from Area A should be primarily accessed via the signalized intersection. Additional access points north and south of the signalized intersection should be right-in/right-out. A frontage road will help provide convenient access for these businesses and should continue south for future connections.
- No access points other than Beck Road should be allowed on South Latson at the interchange north of the railroad tracks.
 Businesses fronting South Latson at this location should share access off Beck Road.









5-22 Future Land Use

- Access to the Future Transition Area should be integrated into the overall circulation plan for Areas A and B.
- Further access management standards are included in the Township's zoning ordinance and MDOT's Access Management Manual

Building and Site Design

In order to establish a cohesive, high-quality campus at the South Latson interchange, it will be important to have consistent building and site design features.

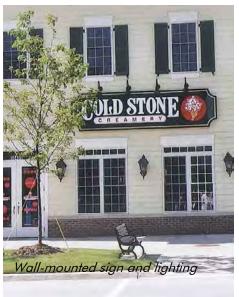
- Entrances should be well defined and easily accessible by pedestrians.
- Buildings should orient toward South Latson where possible with parking given a less dominant presence along the corridor.
- Parking should be buffered with landscaping or decorative fencing.
- Understanding that a user like a hospital may need several stories for its patient wings, this plan seeks not to require a maximum building height. More importantly, any new building built along South Latson fronting the corridor should be built at a pedestrian scale at its Latson frontage.
- Stormwater should be consolidated and treated through low-impact design and retention ponds that contribute to the existing natural character of the site.
- Building orientation should be sensitive to wetlands and existing natural features and be situated to maximize the sight lines and pedestrian access to enjoy them.
- Materials should be of high quality brick, stone, glass, or similar, reflective of a well-designed modern research park or medical campus.
- Loading zones and waste receptacles should be well delineated and appropriately screened (see zoning ordinance).
- Lighting should be directed downward and fully shielded to eliminate an outward or upward glare, providing for adequate public safety without overly illuminating a site or building.
- Site lighting should consist of decorative fixtures, such as goose neck fixtures, and be architecturally integrated with the building style, materials and color. Pole fixtures should be located within landscaped islands or behind the curb or sidewalk.
- Monument signs should be well landscaped and have masonry bases.











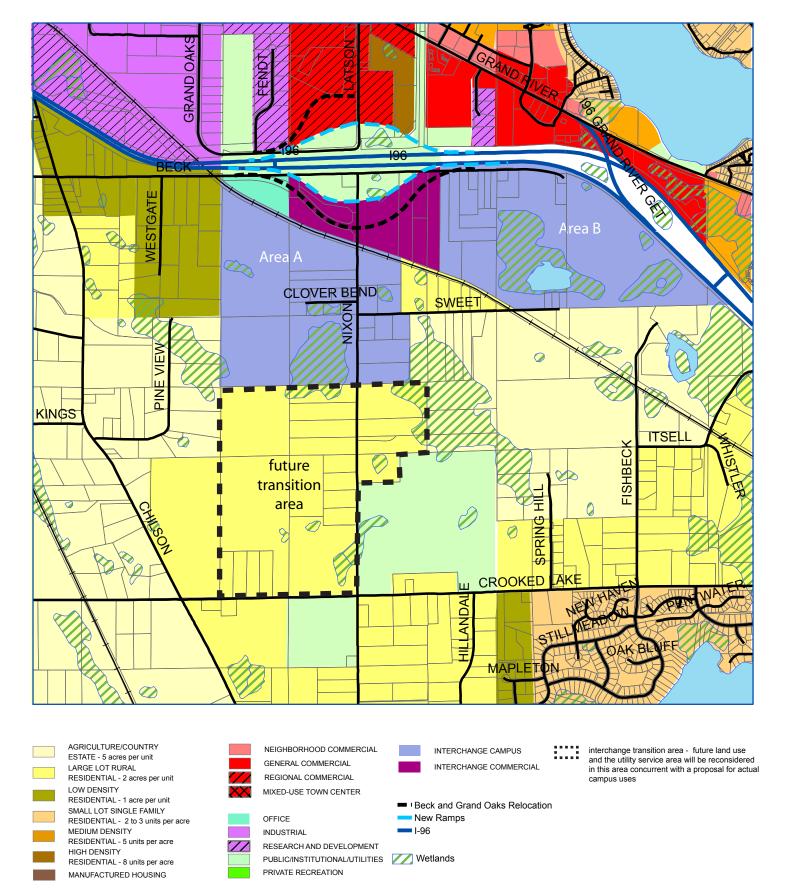
5-23 Future Land Use Draft 10/22/13

- Signs should be comprised of an interesting design that adds interest to the business and the streetscape. Signs that have the appearance of a box sign are discouraged.
- Signs should be architecturally integrated with their surroundings in terms of size, shape, color, texture and lighting and not promote visual competition with other signs in the area.



5-24 Future Land Use Draft 10/22/13

5-25 Future Land Use Draft 10/22/13



Map 10: I-96 Interchange Latson/Nixon Road Subarea Plan



October 2013

Data Sources:

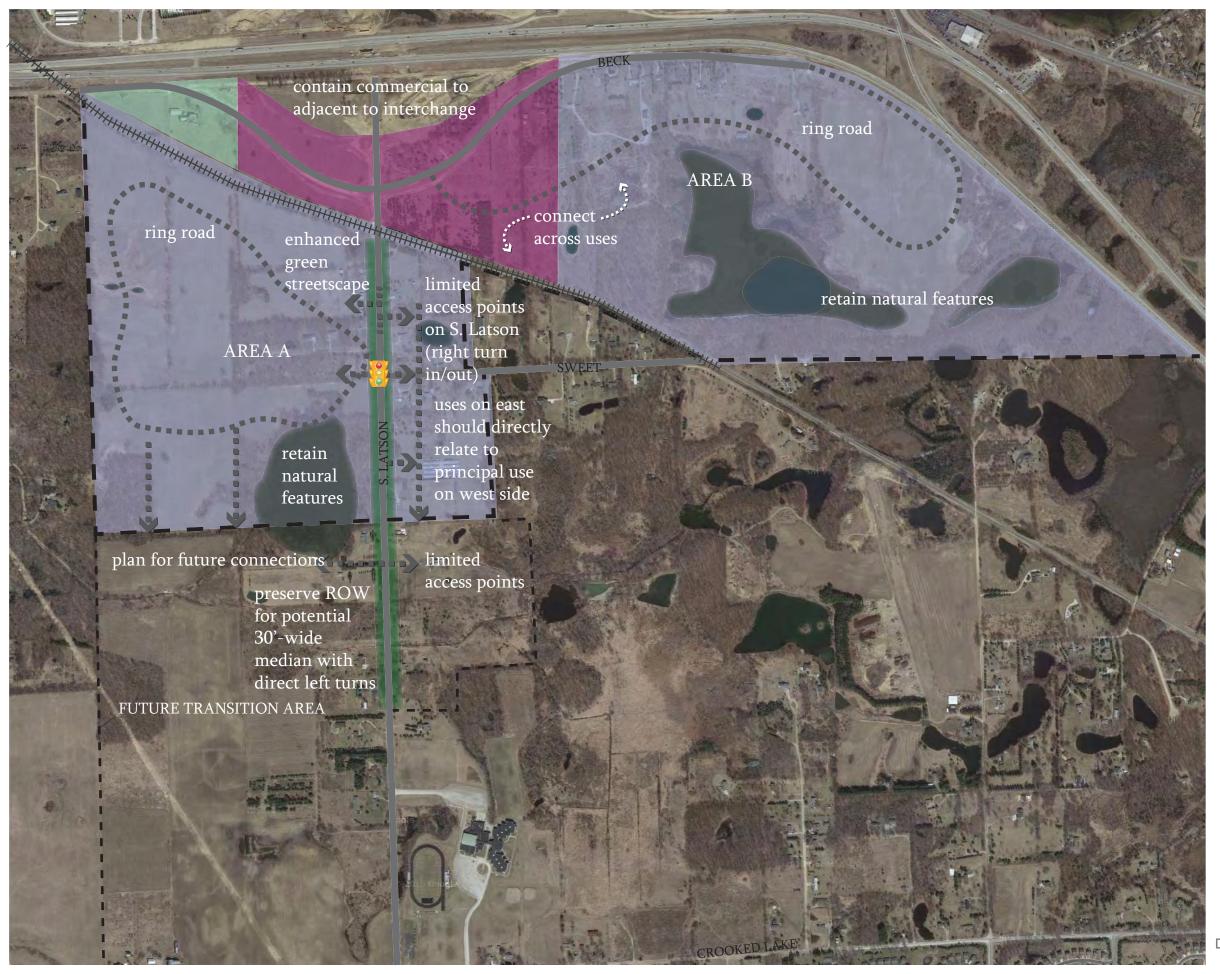
0.5

Miles

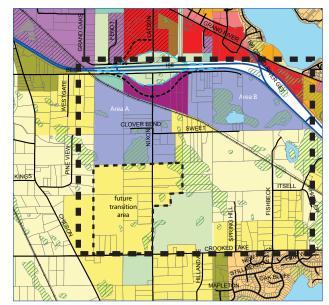
Base Map: Genoa Township



5-27 Future Land Use Draft 10/22/13



I-96/Latson Subarea **Schematic Plan**



Future Transition Area - future land use and the utility service area will be reconsidered in this area as the campus area is developed with primary uses



Interchange Campus

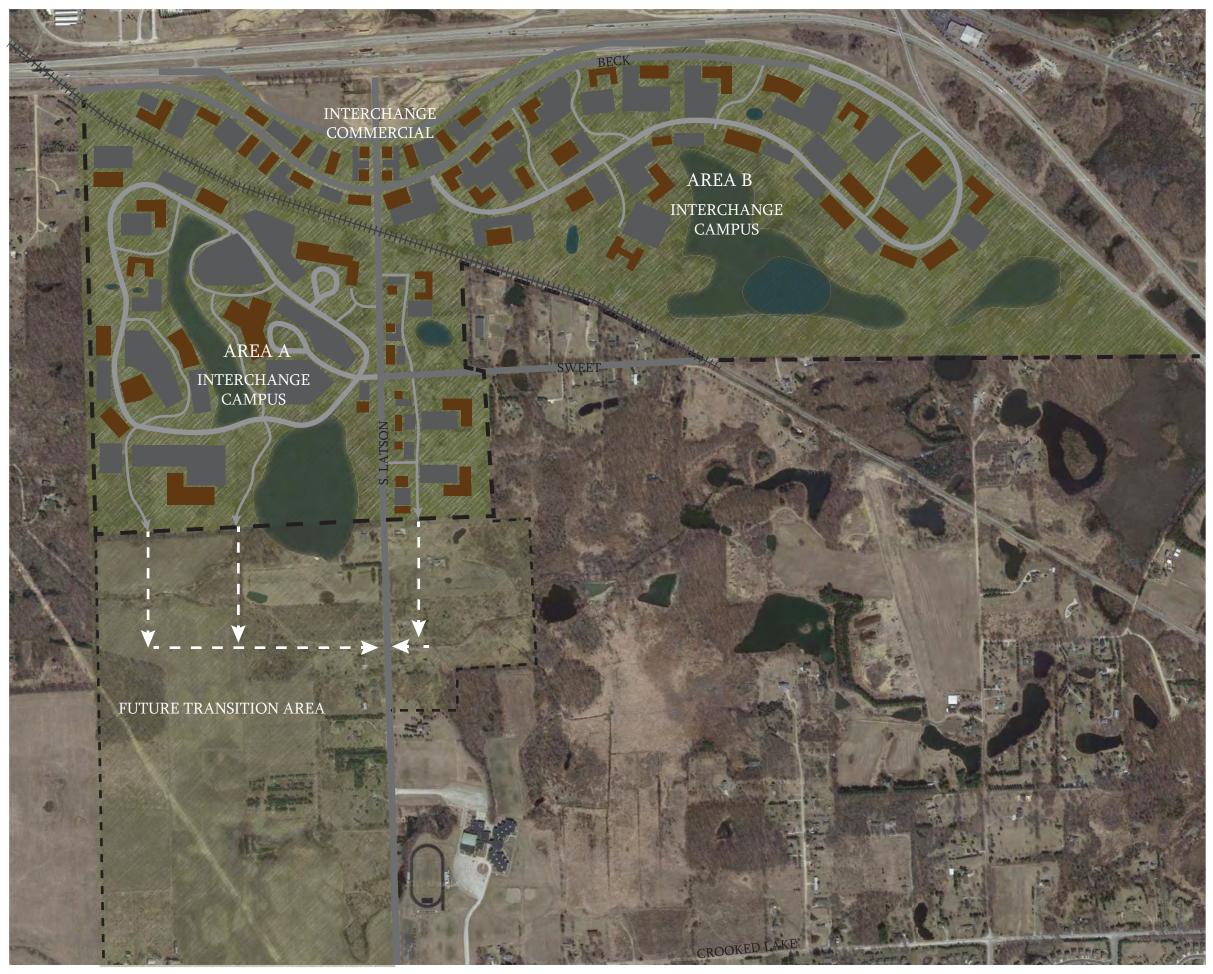
Interchange Commercial



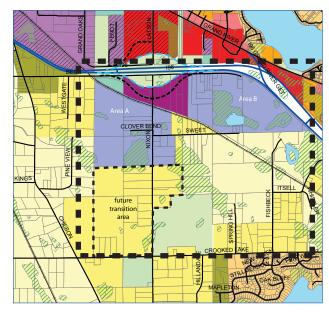




5-29 Future Land Use Draft 10/22/13



I-96/Latson Subarea Concept Plan Map 12



Future Transition Area - future land use and the utility service area will be reconsidered in this area as the campus area is developed with primary uses

This Concept Plan is meant to illustrate the principles of the Future Land Use categories of Interchange Campus and Commercial. This is not intended to be a detailed plan that will be built as indicated, but as a reference for the general circulation, building, greenspace, and connectivity/access concepts for the redevelopment of this area.







5-31 Future Land Use Draft 10/22/13

E. PLANNED UNIT DEVELOPMENT

Some areas may be appropriate for development under the Planned Unit Development (PUD) option contained in the Zoning Ordinance. Areas of the Township that contain significant natural features are appropriate to develop under the PUD option. The purpose of this alternate development procedure is to facilitate the following:

- Provide flexible design to respond to the unique characteristics of the site, instead of the conventional zoning standards.
- Coordinate development on larger sites.
- Preserve significant natural features.
- Provide alternatives for land that exhibits difficult development constraints, where an improved design can provide a community benefit.
- Allow clustering of residential units to preserve common open space and natural features.
- Ensure public infrastructure and road improvements are made concurrent with the development, with developer participation.
- Provide the opportunity to mix compatible land uses or residential types.
- Coordinate infill and redevelopment along the Grand River Avenue Corridor.



Residential Densities/Rezonings: Residential densities will be based primarily on the Master Plan's Future Land Use Map. With a rezoning, the Master Plan must be considered in conjunction with site specific conditions & timing. Other factors that need to be considered are soil suitability, utilities, road conditions, natural features and surrounding land uses.

Large lot vs. cluster: Where public utilities such as sewer and water are available, this creates the opportunity to have clustered development. In areas where sewer and water are not available, there may still be the opportunity to provide a degree of clustered housing in locations where soils are well suited for individual onsite septic systems.

In general, areas not served, or planned to be served by sanitary sewer are planned for a low density and large lot size to accommodate on-site sanitary drainfields without compromising environmental quality. Areas planned for the lower densities are also not able to support higher densities due to limitations of roads and other public services. Areas with sensitive natural features are also planned for lower densities. While the overall net density of a



New residential development should include the following elements:

- Density and character of development consistent with plan and surroundings.
- Clustered development where beneficial and appropriate
- Preserved natural features.
- Open space and neighborhood recreational areas.
- Pedestrian facilities for higher densities.
- Landscaping.

5-32 Future Land Use

site can remain consistent with the Master Plan, the PUD or cluster development option can be used to cluster the dwelling units in areas with soils suitable for sanitary drainfields and away from sensitive natural features.

Natural features preserved: Natural features that can be preserved by clustering include woodlands, wetlands, steep slopes, waterfront and poor development soils. Clustering should also be utilized to preserve greenway corridors, buffers and natural open space. A uniformly wooded site or an open site may not benefit from clustering, unless innovative design is utilized. In all instances, the benefit of clustering should be determined by a comparison of larger lot conventional subdivision and clustered development.

Open space standards: Standards need to specify that the location of open space will preserve natural features, open space corridors along waterfronts creeks and major roads. Standards in the Zoning Ordinance PUD regulations should specify the desired size of open space areas and identify priorities of items to preserve. Quality open space needs to be maintained as opposed to leftover, unusable remnant land.

Recreational facilities: Requirements should be made for all major residential developments to have active and passive recreational amenities. The Township Subdivision Regulations should be amended to require a minimum amount of usable neighborhood recreational area within all subdivisions and condominium projects, whether a development is a clustered PUD or a conventional subdivision.

Pedestrian circulation: As the community grows and traffic volumes increase, the need for pedestrian facilities becomes more apparent. Neighborhood streets should be constructed with some form of pedestrian circulation, particularly for higher density developments or along collector roads. Sidewalks should be provided in consideration of factors such as the density of development, age characteristics of the expected residents, expected traffic volumes along the street, proximity to other sidewalk systems and proximity to schools, parks and public institutions.

- Sidewalks should be required along new streets within residential developments that have half acre or smaller lots or an overall density of 2 units per acre or greater.
- Bikepaths should be required where a development fronts on a major road that is designated for a pathway in the Greenways and Pathways section of this Master Plan.
- Paved pathways should be required within open space areas of PUD's. Stone or wood chip paths or wooden boardwalks should be provided in areas with sensitive environmental features instead of paved sidewalks.



5-33 Future Land Use Draft 10/22/13

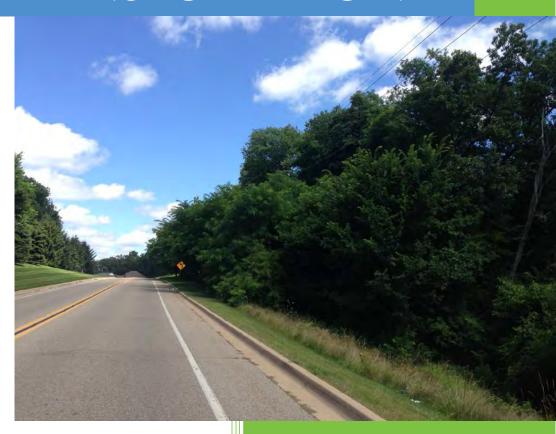
Landscaping: To preserve the rural character of the Township and to enhance the natural quality of residential neighborhoods, the following landscaping should be required in all residential developments:

- Street trees or canopy trees within the front yard of each lot.
- Perimeter buffering along major roads that border the development.
- Detention pond landscaping.

5-34 Future Land Use

5-35 Future Land Use Draft 10/22/13

VI. TRANSPORTATION





A. INTRODUCTION

There is a strong link between land uses and transportation in Genoa Township. In addition to residential growth in the Township, there is significant new development in the surrounding townships. The area's population growth has increased the demand for retail services and has been a catalyst for economic development. A significant portion of the county's commercial and industrial development has been in Genoa Township along Grand River Avenue between the cities of Brighton and Howell. One of the more visible impacts of this growth is the increase in traffic volumes. Traffic volumes have increased even faster than the population growth.

One challenge for the Township is managing growth and road improvements to provide a safe and efficient system without compromises to the natural features and other characteristics that make the Township so desirable. It is also important to understand that while Genoa Township does plan and regulate the land use and zoning, all the roads in the township are either MDOT routes (part of Grand River), Livingston County Road Commission, or private roads. Therefore coordination with the road agencies is important.

To some degree, there is a conflict between the need for road improvements and other goals of the Township and residents. The same natural features that make Genoa Township a desirable place to live can be viewed as constraints to road improvements. The rolling topography, sharp curves, and limited sight distances contribute to difficult driving conditions, especially during adverse weather. In some places the unpaved roads in previously rural areas must accommodate more traffic than those roads can handle. Adjacent land uses and numerous road intersections at curves and areas with poor sight distance cause traffic flow restrictions and potential safety hazards.

One big change is the new interchange along I-96 at Latson Road. Previous Township plans had promoted this interchange to improve accessibility. With the interchange, thoughtful management of the land use in the vicinity is critical to ensuring the interchange and access roads to it have smooth traffic flow. The current redesign of S. Latson Road (formerly Nixon Road), which maintains two lanes south of the railroad tracks, will be at its capacity when built, restricting the land use potential.

For more on the interchange subarea, please see Chapter 5: Future Land Use

The transportation issues to be addressed in this chapter include:



6-1 Transportation Draft 10/22/2013

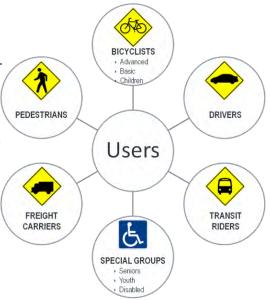
- What road improvements are needed to accommodate the projected volumes?
- How can the Township preserve its visual features and still provide safe and efficient traffic flow?
- What innovative regulatory and financial techniques can help preserve capacity and accelerate improvements?
- How can the Township ensure the impacts of each incremental development are considered and addressed?
- How can the Township improve safety and travel not just for cars, but for those walking and bicycling as well?

B. Complete Streets

The Michigan Planning Enabling Act amendment now requires master plans to include a transportation component that addresses different types of travel (pedestrians, bicyclists, etc). The State of Michigan Transportation Fund was amended to provide for coordination among local agencies to improve the environments for walking, biking and transit use in Michigan. Genoa Township's consideration of pedestrians and bicyclists has been part of the program well before the state's policy changed.

The basic objectives of a "complete street" system in Genoa Township are listed below:

- Provide a Variety of Travel Routes. Those walking or biking are more likely to do so when they feel safe and comfortable. Therefore, a variety of routes should be provided so non-motorized facilities are planned along roads with travel conditions that would naturally attract such activity. This involves providing connections from neighborhoods to schools, the Township Hall campus, and recreation in and near the Township.
- Provide for Safe Travel Along the Street. A variety of options may be considered to facilitate non-motorized and/or transit travel, in addition to moving vehicular traffic. Depending on the context, bike lanes, cycle tracks, sidewalks and pathways can all assist in moving pedestrian and bicycle traffic.
- Provide for Safe Travel Across the Street. Where travel along the road is often considered in non-motorized planning, it is often the travel across the street that can deter non-motorized activity, such as busy arterials like Grand River. The goal is to provide some convenient places to cross where the pedestrian is very obvious to the driver.
- Different Types for Different Folks. While experienced bicyclists prefer riding in the travel lane or along its right edge, less experienced riders prefer a bit more protection. Since one goal is to encourage people to bicycle more frequently, a system that meets the needs of those potential users is important. Therefore,



6-2 Transportation Draft 10/22/2013

bike lanes, buffered bike lanes, and separated pathways should be part of an overall bikeway system.

In response to the recommendations of the Grand River Avenue Corridor Plan, the Zoning Ordinance, Subdivision regulations, and ordinances were amended several years ago to require sidewalks in medium to higher density residential developments and commercial frontages of Grand River Avenue. Many sidewalks have since been built. Reconstructing the west portion of Grand River Avenue with a median will also make it easier for pedestrians to cross the street

Many developments that have utilized the Zoning Ordinance's Planned Unit Development (PUD) option to create clustered housing surrounded by natural open space have included trail networks. Efforts should be made to create linkages between these PUD's to create an integrated community network.

For more on the Township's pathways, please see Chapter 7: Greenways and Pathways

C. Existing Traffic Conditions

Genoa Township is linked to the overall region by I-96, with full movement interchanges in both of the adjacent cities of Brighton and Howell; and a partial interchange in the center of the Township for traffic traveling to and from the southeast.

A new interchange is under construction at the intersection of I-96 and Latson Road. This interchange will provide full access to I-96 for the community.

Within the county, Genoa Township is linked to adjacent communities by Grand River Avenue and a number of county primary roads such as Chilson and Brighton Roads.

Genoa Township's local transportation network is segmented by I-96, an east-west limited access highway that passes through the community. The division created by the expressway separates the northern third of the Township containing a majority of the commercial and industrial land from the southern two-thirds containing the majority of residential lands. Currently, only two roads cross the six mile length of I-96 through the Township (Chilson and Dorr Roads). A third crossing at the I-96 Latson Road interchange will increase the North-South mobility.

Among the roads in Genoa Township, I-96 and the western half of Grand River Avenue are under the jurisdiction of the Michigan Department of Transportation. Primary and local roads are maintained by the Livingston County Road Commission with the State Motor Vehicle Highway Fund matched by Township funds.



6-3 Transportation Draft 10/22/2013

Grand River Avenue is a five lane roadway that runs between the cities of Howell and Brighton. This roadway is discussed in greater detail in the Grand River Avenue Corridor Subarea Plan, a separate document considered part of this Master Plan.

The county primary roads are generally two lane paved roadways. Many of these roads have limitations due to topography, sharp curves and poor sight distance.

Future traffic patterns within the road network will be closely related to land use. Because of this, it is vitally important that road development be coordinated with the overall plan for the Township.

Existing Traffic Volumes

Existing traffic volumes for roadways throughout Genoa Township vary, depending upon the location of the segment studied or the date the study was conducted. Specific studies of intersections are possible and encouraged, depending upon development trends in the Township. Recent traffic counts for several arterial, collector and local streets throughout Genoa Township are shown on Map 12.

These traffic counts demonstrate several of the Township's most traversed roadways. It is important to consider existing traffic volumes when considering future development within the Township, plans for roadway upgrading or widening or projection of future capacity.

It is impossible to apply general formula to each of the Township's many arterial and collector streets to establish a threshold of maximum expected roadway capacity. The Township should work with the Michigan Department of Transportation and the Livingston County Road Commission to evaluate existing conditions and establish an action plan for review of specific traffic management issues.

Capacity of the Roadway System

Traffic operations are typically evaluated by the extent to which motorists are delayed in their travel. Future traffic operations are evaluated by comparing projected traffic volumes to the capacity or the road network. Roadway capacity is defined as the

number of vehicles that can travel through an intersection or roadway segment during a specified time period. Generally, traffic operations and capacity analysis is evaluated for the peak hours of traffic. Traffic engineers use a gradation scale of A through F.

TABLE 13
Comparison of Trip Generation Rates

Comparison of Trip Generation Rates								
	Trips In Peak Hour	Trips In Average Weekday						
Residential (per unit)								
Single Family	.75	9.57						
Apartment	.51	6.72						
Condominium	.44	5.86						
Mobile Home	.44	4.99						
Office (per 1,000 sq. ft. gross floor area	a)							
General Office Building	1.55	11.01						
Medical Office Building	2.48	36.13						
Research and Development	1.24	8.11						
Commercial (per 1,000 sq. ft. gross floor area)								
Shopping Center	3.75	42.94						
Pharmacy (w/drive through)	9.51	88.16						
Quality Sit-down Restaurant	9.02	89.95						
Fast Food Restaurant (w/drive through)	54.81	496.12						
Service Station (per pump)	15.65	168.56						
Convenience Store	67.03	737.99						
Drive-in Bank	53.46	246.49						
Industrial (per 1,000 sq. ft. gross floor c	area)							
Light Industrial	.92	6.97						
Heavy Industrial	.51	1.50						
Industrial Park	.84	6.96						
Manufacturing	.73	3.82						
Warehousing	.45	4.96						
(Note: A trip is a one-way movement, 1	0 trips = :	5 in, 5 out)						

Source: Institute of Transportation Engineers, Trip Generation Manual, 7th Edition.

6-4 Transportation Draft 10/22/2013

Generally a level of service of D or better is considered acceptable. Level of service E or F represents long, undesirable delays.

Determination of roadway capacity is dependent on a number of factors. Generally, a two lane paved roadway will have a 24 hour capacity of 8,000 to 10,000 vehicle trips for Level of Service A (unrestricted flow). This will be influenced by a number of factors that will define individual roadway capacity. These include:

- Intersection design, turning lanes and traffic control devices;
- Pavement condition and material;
- Roadway width and number of lanes;
- Topography (rolling or flat);
- Design setting (winding rural or unswerving urban);
- Location and frequency of curb cuts;
- Speed limits and other traffic control devices; and
- Sight distance limitations.

Crash Data

Auto accidents occur more frequently on the major roads and intersections of the Township. Locations of relatively high accident locations are shown on the Traffic Conditions Map, based upon SEMCOG crash rates between 2006-2010.

According to the Livingston County Road Commission, intersection operation and design issues (sight distance limitations, too many driveways, etc.) are a major consideration in determining road safety conditions. The motorist on a roadway approaching an at-grade intersection with another roadway (including driveways) should have an unobstructed view of the entire intersection and sufficient distance to the intersecting roadway to permit control of a vehicle, thus avoiding accidents. At a minimum, the driver should be able to see the headlights of an approaching vehicle.

Unobstructed sight distances should be provided on all approaches at each intersection. After a vehicle has stopped at an intersection, a driver should have sufficient sight distance to make a safe departure through an intersection area. The intersection design should provide adequate sight distance for all of the various vehicular maneuvers required upon departure from a stopped position.

Roadway Functional Classification

Function, efficiency and safety of roadway movement in Genoa Township can be furthered through the establishment of a classification of roads and planning and designing these facilities for their specific purpose. A functional system or hierarchy of roads provides for movement of traffic as well as access to specific sites. This hierarchy will range from major arterials such as Grand River Avenue, which primarily serves for cross-town movement, to local subdivision streets which serve to access individual homes.

Roadway capacity is dependent on:

- Intersection design and control
- Pavement condition
- Width
- Topography
- Design
- Curb cuts
- Traffic control
- Sight distance

The functional classification system has a four element hierarchy in Genoa Township:

- Expressway- I-96
- Major Arterial Grand River Ave.
- Arterial
- Collector
- Local

6-5 Transportation Draft 10/22/2013

This system defines the roles of each street, in terms of operational requirements; which is in turn translated into planning, management and physical design features.

Expressway: I-96 serves as the principal route between the residential population of Genoa Township and major activity centers throughout the region.

Major Arterial: The Grand River Avenue Corridor is the major roadway through Genoa Township. This roadway serves a vital function towards connecting the Township with the adjacent cities of Brighton and Howell. Because of the amount of traffic on Grand River Avenue, commercial uses have developed along this corridor.

Arterial: There are a number of roadways which move traffic throughout the Township and provide connections with other adjacent communities including Brighton Rd., Chilson Rd., and Latson Rd. These roadways also provide access from other areas of Genoa Township to Grand River Avenue.

These roadways serve for longer trips within the Genoa Township and adjacent communities. Like Grand River Avenue, the primary function of these roads is to move traffic. Access to these roads must be managed in order to maintain safe and effective movement.

Collector: The collectors serve to assemble traffic from local subdivision streets of residential neighborhoods and deliver it to the arterial. Collectors will also serve to provide access to abutting properties. Many individual subdivisions will contain one or more collector streets which funnel traffic from the local streets and connects with adjacent neighborhoods.

Local Streets: Local streets serve primarily to provide access to property and homes. These roadways are generally short and discontinuous, and generally only provide connection to one or two collector streets.

Constraints

Several natural and fiscal constraints impact the development and efficiency of Genoa Township's public roadway network. In a featureless environment, where no financial hindrances to development are present, the roadway system will most likely resemble a grid system, much like that which has developed in many Midwestern communities. Genoa, however, is not a featureless environment, nor does it benefit from infinite resources. As such, the following considerations must be examined to most effectively plan, prioritize and program the Township's transportation system:

- I-96 limited access freeway;
- Water bodies:
- Wetlands;

6-6 Transportation Draft 10/22/2013

- Topography;
- Rights-of-way;
- Financing availability; and
- Cost effectiveness of proposed improvements.

D. Improvements

There are a number of improvements that will need to be made to the road network in Genoa Township. As the Township continues to develop, traffic levels will increase creating capacity deficiencies. Maintaining the capacity of the transportation network should be done through a comprehensive approach. Intersection improvements and signalization can be made at congested intersections or intersections with relatively high crash rates. Transportation management practices, such as access management, can be used to maintain the efficiency of the transportation network.

Grand River Avenue

Specific recommendations are made for Grand River Avenue, including signalization, road widening and service drives. These are contained in the Grand River Avenue Corridor Plan.

A particular recommendation to highlight in the plan is eventually reconstructing Grand River Avenue with a narrow median in the existing right-of-way. A median will reduce conflicts thereby improving safety and traffic operations. In addition, a median adds greenspace and makes it easier for pedestrians to cross. In the past, the Livingston County Road Commission and MDOT both had concerns with a narrow median. Since the concept was last discussed with those road agencies, there has been considerable research that all supports a narrow median over five lanes, at least for some of the Grand River Avenue segments, particularly for the Lake Chemung interchange to the Howell city limits.

I-96 Interchanges

I-96 was constructed in the 1960s. The original Lake Chemung Interchange (Exit 141) was typical of many partial access facilities built in rural areas at the beginning of the Interstate Highway System. Interstate drivers going to a major community, such as Howell, were provided a smooth transition from the Interstate to the old highway which was usually the community's main street. A similar interchange, on the far side of the community allowed travelers, who had completed their business, to continue, via the Interstate, to their next destination. As the area continues to grow, however, direct access to the freeway from both sides of the interchange becomes important in improving traffic conditions.

A Major Investment Study and Environmental Impact Statement was prepared to evaluate improvements to the original interchange. This The MIS/EIS identified the following needs:

- Rapid suburbanization.
- Access to westbound I-96.
- Congestion and safety.
- Access south of I-96.
- Long distance north / south access.
- Limited improvement options at the Lake Chemung interchange.
- Livingston County expected to grow significantly by 2020.

6-7 Transportation Draft 10/22/2013

study identified the following needs for transportation improvements and proposed major access modifications.

The resulting improvements consisted of two separate parts, with one half of the improvements being modifications to the existing Lake Chemung Interchange and the other half consisting of a new interchange at Latson/Nixon Roads. The modifications to the Lake Chemung Interchange have already been completed.

The Latson interchange is designed as a diamond interchange, which can accommodate two loop ramps in the future should the increased volumes along Latson Road require them.

Other improvements included in the interchange development will include:

- Nixon road will be renamed S. Latson Road and will be upgraded to an asphalt roadway south of the interchange with 2 lanes and turning pockets at intersections
- Beck Road and Grand Oaks Drive have been relocated around the interchange ramp area
- Latson and Grand River intersection will be widened to 7 lanes at each approach with dual left turns in all directions
- Large detention pond will be located north of I-96 at the previous rest area property

Road Widening

In order to preserve the rural character of Genoa Township, any future road widening should balance traffic needs with consideration of natural features. Excessive road widening would lead to increased traffic speeds and a more suburbanized appearance. The narrower roads which wind through the hills of the community add to the natural rural character of Genoa Township. Periodic congestion may be preferred over excessive widening for through traffic. In addition, the Road Commission does not have funding available for road widening.

Because road widening is not planned, improvements will need to be made at intersections to improve efficiency. Much of the improvements to roads will include left turn lanes at intersections.

The Township should also request acceleration and deceleration lanes along major roads for all developments which require site plan review and passing lanes for projects that will generate moderate to high left turn volumes or where there are sight distance limitations.

Road Paving

Much of the expected road paving will be completed in conjunction with the proposed I-96 interchange improvements at Latson Road. Nixon Road, south of I-96 will be paved southward to Chilson Road and renamed S. Latson Road. Crooked Lake Road is also in need of

6-8 Transportation Draft 10/22/2013

pavement to provide access to the Three Fires Middle School, however funding has not been allocated for this project.

Intersection Improvements

Selected intersection improvements should be made at locations which have experienced higher crash rates than other intersections (see Map 13). Improvements can include turn lanes, sight distance improvements, pavement improvements, signalization or other form of traffic control.

The major roadway improvement planned within the Township is the realignment of Challis Road at Bauer Road. The west approach of Challis Road is to be realigned to the south to line up with the east approach. This will create a regular "T" intersection with the south approach of Bauer road. The north section of Bauer Road will be accessed from the former west leg of Challis Road.

Another intersection under consideration for improvements is the intersection of Brighton Road and Chilson Road. This intersection is a four-way stop that currently meets at an odd angle. Also, there is a by-pass lane from northbound Chilson road to east bound Brighton Road. The by-pass may be eliminated and the intersection realigned to create more of a regular, 90 degree intersection.

There are long traffic delays associated with traffic attempting to exit the Meijer/Hampton Ridge driveway. A traffic signal would improve access to and from those developments. The Township should request a traffic signal study by MDOT to determine if a new signal could be timed to coordinate with the traffic flow through other signals and if the state's criteria for a signal installation are met.



6-9 Transportation Draft 10/22/2013

Models have been used to predict the volumes and patterns of traffic flow to and from the new I-96 interchange at Latson Road. Actual traffic volumes do not always match the patterns expected in modeling. In order to determine if additional road improvements may be needed, the Township should coordinate with the Road Commission to conduct traffic counts and analyze if other improvements are needed, such as at the S. Latson Road and Chilson Road intersection.

Access Management

Typically the approach to addressing high traffic volume is to widen a road to 3, 4 or 5 lanes. However, widening can disrupt the rural atmosphere of an area. Maintaining safety and smooth traffic flow without costly, premature or even unnecessary widening is a goal of this Plan. One technique to help preserve capacity and promote safety while delaying or avoiding the need for widening is access management.

The lack of controls over the number and placement of driveways increases potential for traffic congestion and crashes. Poor but heavily used access systems conflict with the traffic movement function of the Township's major roads. Because of sight distance limitations in many areas of the Township, there are limited locations for optimum driveway and intersection placement.

Access management involves a series of tools to reduce traffic conflict points, and thus preserve capacity and improve safety. Access management standards regulate the number, spacing and design of access points, and requires the use of shared access systems where practical. The Township has adopted zoning standards for access management.

Number of Access Points: The number of access points should be limited to one where possible. Along major roads, driveways should be properly spaced from one another and from intersections with other major streets. Driveways should be aligned with those across the street or properly offset following the adopted zoning standards.

Alternative Access: Along major arterials, such as Grand River Avenue, alternative access should be encouraged, such as shared driveways, rear service drives or frontage roads. Commercial developments and parking lots should be connected through front or rear service drives. Frontage drives, rear service drives, shared driveways, and connected parking lots should be used to minimize the number of driveways, while preserving the property owner's right to reasonable access. Certain turning movements should be limited, especially left turns, where safety hazards may be created or traffic flow may be impeded.

High Traffic Generators: Uses that are high traffic generators should be located on the future land use and zoning maps where they can best be accommodated by the roadway system.

New Road Development

There are currently no plans or funding for the Livingston County Road Commission, or the Michigan Department of Transportation to construct new public roads. As presently planned, all new road construction within the Township will be the result of private development.

There are a number of areas in the Township that have unsubdivided parcels. All newly created lots (and condominium units) are required by the Zoning Ordinance to have public road frontage, or frontage on a private road constructed to the standards of the Township Private Road Ordinance.

Development of future roads, whether public or private, needs to be well planned to ensure the establishment of a safe and efficient vehicular circulation system. Special attention needs to be given to the planning and design of roads for the following purposes:

- Protect the substantial public investment in the street system.
- Promote and coordinate effective and energy efficient development.
- Promote the orderly development of, and ongoing access to, land.
- Protect community character and minimize environmental impacts.
- Promote safe and efficient travel within the Township.
- Prevent duplication of roads.
- Ensure reasonable, though not always direct, access to properties.
- Ensure roads remain passable in all weather conditions and are adequate to provide safe, year-round access by fire, police and other public and emergency vehicles.
- Ensure roads are improved to properly handle development impacts.

Requiring connections of local roads is essential to developing a local road network and maintaining the effectiveness of the Township's major roads. Providing road connections between adjacent subdivisions allows for the movement between adjacent neighborhoods without the need to access major roads. It also provides alternative means for residents within the subdivisions to access the major road network at locations that are most efficient for traveling to their destination, shortening trips and thereby minimizing traffic impacts to the major road network. It is important that connections between local streets be designed to discourage use by through traffic that does not have an origin or destination within the local neighborhood.



6-11 Transportation Draft 10/22/2013

Residential Roads

The Township currently has standards in the Township Private Road Ordinance for development of local private roads. These standards are applicable to local streets with a primary function to provide access to abutting residential land, and not serve higher volumes of through traffic. While all roads are required to be designed to meet Livingston County Road Commission standards, the Township has the discretion to allow some modifications on private roads where significant natural features will be preserved.

Township roadway standards provides for a hierarchy of roads based upon function. The following are used to determine the necessary road widths in residential developments:

- Lower density developments are allowed to have roads with widths as narrow as 22 feet with gravel shoulders and open ditch drainage, particularly in the rural residential areas of the Township.
- Higher density developments are required to have wider roads of 26-28 feet with concrete curb and gutter.
- Wider roads are required where a larger amount of on-street parking is anticipated.
- Collector roads in higher density developments are required to be 30 feet wide to handle larger traffic volumes.
- The roads that serve as a single point of access for a relatively large number of residential units will need to be wider and boulevards should be provided into the development. The divided roadway in effect provides an alternate access for emergency vehicles in the event one side is blocked by an accident or fallen tree.

Implementation

A majority of the road improvements, including new road development and improvements to existing roads, will be privately implemented concurrent with development. These improvements are necessary to serve development. The Township should also work closely with the Michigan Department of Transportation and the Livingston County Road Commission to ensure that proper road improvements are being installed with development. This can include additional turn lanes or the dedication of future right-of-way.

A number of public road improvements will also be implemented by the Michigan Department of Transportation and the Livingston County Road Commission. The Township should continue to work with these agencies to ensure road improvements will meet the needs of Township residents and businesses.

The Township can also take a direct role in implementing public road improvements. Current practices and programs for funding maintenance and improvements to Genoa's roadways allow a range



of options, including: dedicated millage, special assessments, bond programs, tax increment financing and Federal transportation funding.

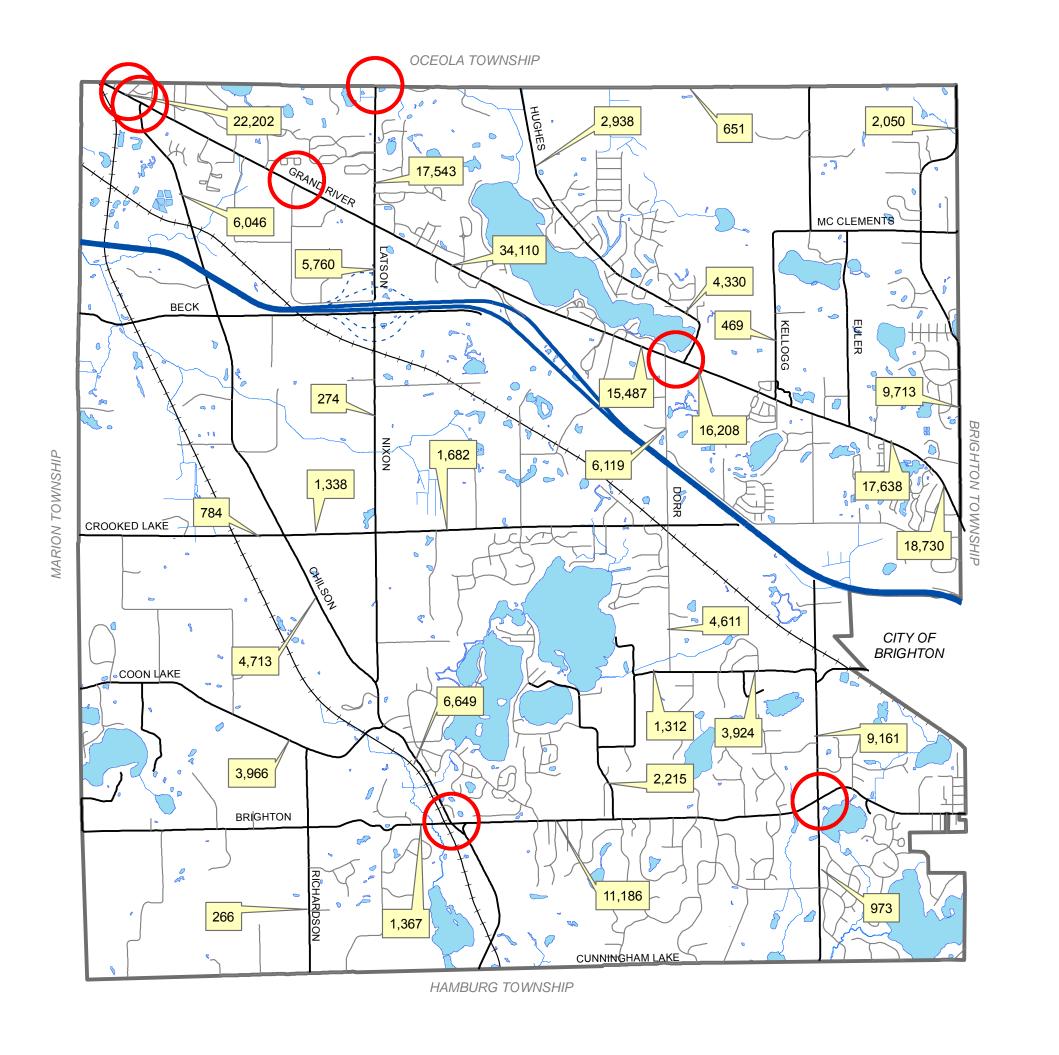
E. Other Modes of Transportation

Rail

Genoa Township has two active railroad lines. The Great Lakes Rail Road line runs north and south through the west side of the Township. The C.S.X. Rail Road line runs east and west through the center of the Township between the cities of Brighton and Howell. Both of these lines are fairly active. These rail lines are predominantly for freight transit.

Airports

There are no airfields in Genoa Township. The nearest public airport to Genoa Township is the Livingston County Airport, northwest of the City of Howell. Detroit Metropolitan Airport is in the City of Romulus, approximately 45 miles southeast of Genoa Township. Capital City Airport in Lansing is 50 miles west. Flint's Bishop Airport is 40 miles north.



MAP 13

Transportation Conditions

Master Plan Update Genoa Township Livingston County, MI

Interstate

—— Major

—— Minor

----- Future Interchange

Township Boundary

Railroads

Hydrology

Waterways

Relatively high crash rate/ accident locations (2006-2010)

727

Traffic Volumes - vehicles per day SEMCOG data 2010-2011

October 2013



This page intentionally left blank.

VII. BIKEPATHS & GREENWAYS





A. GREENWAYS DEFINED

A greenway is a linear feature within the natural landscape that acts as a conveyance to integrate the various components of the landscape. Portions of the greenway function is to tie together the cultural landscape by providing transportation routes and access between Genoa's residential population and the various recreational, civic, cultural, and natural resources. Greenways also enhance the ecological function of Genoa's natural environment by preserving natural areas and corridors which are vital to the environment. A greenway is a corridor that provides the following:

- Protection, management and enhancement of Genoa's cultural resources and provision of recreational opportunities, including:
 - o nature trails, bike paths and pedestrian facilities development,
 - o establishing linkages between cultural and recreational resources, and
 - o providing recreational opportunities;
- Protection, management and enhancement of Genoa's natural resources, including:
 - o water quality improvement,
 - o fish and wildlife migration and habitat enhancement,
 - protection of natural vegetation;
- Enhancement of the quality of life and aesthetic appeal of Genoa, including:
 - o scenic natural areas,
 - o natural character of residential neighborhoods, and
 - o natural buffers between residential and nonresidential land uses,
- Provision of an alternative non-motorized transportation mode to link residential areas to major destination points within the Township.

Greenways function as linkages which tie together the various components of Genoa's cultural and natural resources. The function of creating and maintaining these linkages as a Township wide network, enhances the value and quality of each individual component.

GREENWAY GOALS & OBJECTIVES

- Create a complete non-motorized network to provide the opportunity for pedestrian activity such as walking, jogging, and bicycling in a safe and comfortable environment.
- Provide linkages between residential areas and recreation areas.
- Preserve the Township's natural character of forested areas, water resources and open views of rural open space.

Greenways are corridors or linkages that are managed for conservation and/or recreation and which connect focal areas. These include:

- Recreational greenways featuring paths and trails of various kinds, based upon natural corridors and public rights-of-ways;
- Ecologically significant natural corridors possibly along waterways and/or drainageways;
- Scenic routes along public right-of-ways, especially along waterways and through natural areas;
- Buffer zones between neighborhoods and other, non-residential land uses; and,
- Linkages providing for alternative modes of nonmotorized movement between residential neighborhoods and destinations such as recreation areas, shopping districts, schools and churches.

- Provide a natural corridor of open space connecting significant natural/open space and conservation areas of the Township.
- Provide buffers between development and ecologically sensitive areas.
- Maintain the ecological functions of natural waterways and drainage networks.
- Enhance natural habitat and migration routes to increase the Township's ability to support indigenous wildlife.
- Increase awareness and access to the system of greenways, bike paths and the Township's natural amenities.

SOUTHEAST LIVINGSTON GREENWAYS

A greenways plan was prepared a number of years ago for southeast Livingston County. This plan illustrates a non-motorized system of paths and conservation corridors containing significant natural features. This plan is a cooperative effort between the City of Brighton, the four surrounding townships, including Genoa, the Livingston County Planning Department and the Southeastern Livingston County Recreation Authority

The Livingston County Planning Department has also prepared a greenway manual for the Livingston County Greenways Initiative. This document outlines goals, and objectives of greenways and standards for greenway development within the county.

Both of these documents are incorporated into this plan by reference as they provide a basis and a regional context. This plan examines Genoa Township in more detail and makes additional recommendations relative to the development of greenways concurrently with the growth and development of Genoa Township.

Greenway Objectives:

- Pedestrian activity
- Linkages from neighborhoods to destinations
- Preserve natural rural character
- Natural corridors connecting open space
- Buffer ecologically sensitive areas
- Protect natural waterways
- Wildlife habitat
- Increase awareness of greenways



GENOA'S CULTURAL AND NATURAL RESOURCES

Cultural and natural resource components are comprised of a variety of land and water areas; all of which function as an integral system. Because the combined total system provides more value than the sum of its individual parts decisions on individual locations should be based upon the vision of the whole. The components of Genoa's cultural and natural resource system are classified into a range of categories from public to private. These include the following:

- Brighton State Recreation Area;
- Chaldean Camp;
- County lands;
- Township Hall and other Township owned properties;
- Other government properties such as public schools, road rightsof-way and utility easements;
- Private areas which are maintained in a natural state such as drainageways and wetlands;

These open space areas are accessible to a varied group of people. Government owned areas are generally accessible to the public while private green space is only open to a smaller private group of users.

TOWNSHIP PROPERTY

The Township owns approximately 72 acres containing Township Hall and featuring large open space areas, trails, parks, athletic fields, pavilion, sled hill, playground equipment, and wetlands. The surrounding land also provides the opportunity for other uses such as public open space, conservation and recreation. In addition, two sites located near Latson Road and Grand River Avenue were dedicated for future neighborhood parks. The Township is also seeking locations for future community parks, as detailed in the Parks and Recreation Plan. The Township lands should be linked with the greenways and bike path system for the community to tie the public lands with surrounding neighborhoods.

Genoa Township is made up of a number of individual cultural and natural resource components which combine to create the overall quality community. These include:

- Township owned natural areas and public open space properties;
- Other municipal properties such as the Township Hall;
- Schools, roads and bike paths;
- Drainageways, wetlands and floodplains; and,
- Private open space.

PROPERTIES OWNED BY OTHER GOVERNMENT AGENCIES

The Township contains other publicly owned lands which contribute to the overall network of public open space. These include the following:

- Many road rights-of-way provide linear paths. Some have improvements such as bike paths that allow non-motorized movement. Many provide natural aesthetic amenities such as natural vegetation and views of open water.
- Public schools will serve more as destinations then routes for cultural and civic activities. These facilities are destinations for children in the community as well as locations for school related community events.
- The Brighton State Recreation Area is 4,947-acre park is located at the southern edge of the Township. The majority of the park is located in Hamburg Township, however a portion is in Genoa. Brighton Recreation Area provides a multitude of year round activities.
- The Lake Chemung Park is a recreational facility, located along Grand River on Lake Chemung, is owned by the Livingston County Road Commission. The small site provides open space and picnic facilities.
- There are two Department of Natural Resources (DNR) Access Sites within Genoa Township, one of which is located on Lake Chemung and the another on Crooked Lake. These sites provide public boat launches.

PRIVATE OPEN SPACE

In addition to having public areas for access, recreation and non-motorized movement, a need exists to have these networks for ecological reasons. Private open space plays an important role in maintaining the Township's ecological functions. These include private lands maintained in a near natural state through regulatory means such as drainageways and wetlands. Private open space can also include conservation easements or park/common areas within developments, such as PUD's as well as areas which have been left undeveloped due to constraints, such as steep slopes and dense forest.

While these private open space areas are not accessible by the general public, they do enhance the quality of each individual's personal space. Collectively, these open space areas are essential to maintaining the investment that each resident has made as a part of the community. As the Township becomes more developed, natural ecosystems will be disrupted and the rural character of the community may be altered. Providing for a natural open space which is integrated with development will help to mitigate these impacts and protect private property owner's investments. This private open space also still provides ecological benefits and wildlife

Management of natural greenway systems enhances each individual's enjoyment of their own private open space and protects the investment that each resident has made in their property through the following:

- Habitat for wildlife.
- Buffers between clustered development and ecologically sensitive areas.
- Minimize increases in storm water runoff.
- Vegetation to maintain air quality.
- Maintain natural rural character.

habitat. Private open space within Genoa Township includes the following:

- Subdivision parks and common areas range in size from about half an acre to over 100 acres.
- Commercial Recreation Facilities include; the Mt. Brighton Ski Area, a 220-acre recreation area located in the southeastern portion of the township featuring downhill skiing during winter and an 18-hole golf course. Other commercial recreational facilities within Genoa Township include golf courses.

It is important that pathways to these publicly and privately owned facilities be provided to ensure a higher level of pedestrian activity is achieved within the Township.

ENVIRONMENTAL CONDITIONS

The natural environment is a critical element. The components to the environment function, change and interact as part of the ecosystem. A major objective of the greenway program is to maintain these natural functions in a balanced state, while still allowing the community to grow in a controlled manner. One method to protect these areas is through the greenways program. The environmental features to be considered, as described in the Environmental Conditions section of this Master Plan, are soils, topography, creeks, wetlands, lakes, woodlands and wildlife habitat.



USER GROUPS

There are a number of user groups for various components of the Township Greenways system. These include the following:

- Pedestrians: This group utilizes the trail and path system for an alternative means of transportation. While the requirements of this group are similar to those of the recreational walkers, convenient and safe access to destinations is most important.
- Bicyclists: This group utilizes the path system for recreation as well as transportation. The pathway's physical requirements are much different for this group. Bicyclists will generally have a much larger range than pedestrians and require more greatly improved trails. In crowded situations, there will be conflicts between pedestrians and bicyclists. If there are high traffic areas, separately designated paths may be required.
- Recreational/health walkers and joggers: These groups will utilize the path system for recreation, scenic enjoyment and physical exercise. These users require a safe and relaxing environment.
- People with disabilities: In development of a greenway system, the specialized needs of those with disabilities need to be considered. Accessible facilities should minimize hazardous conditions and permit maneuverability.
- Educators/students: An integral part of the greenway system are Brighton and Howell area schools. Greenways can not only be used as routes for students going to and from school, but also as "outdoor classrooms" for the study of nature.
- Equestrians: Despite the rapid rate of development in Genoa Township, there is a significant amount of residents that keep horses. Currently, horseback riders utilize private property, the Brighton State Recreation Area, and gravel county roads with low traffic volumes. Trails for this use may conflict with other users. If there is a demand for this use, specific bridle trails may be designated in proximity to any riding stables in the Township.

User Groups:

- Pedestrians
- Bicyclists
- Recreational/health walkers and joggers
- Handicapped
- Educators/students
- Equestrians

B. GREENWAYS

PATHWAYS

The trails proposed under the Greenway plan will provide connections between homes and neighborhood schools, and activity centers, as well as other trails and transportation facilities. In addition, these trails will provide ample opportunities for recreational use.

RECREATION

In addition to recreation related to trails and active parks, other passive recreation is encouraged where environmental impacts will be acceptable and where appropriate easements exist. Passive recreation consists of activities which are not programmed and do not require developed facilities. Examples are photography, resting, bird and wildlife observation, picnicking, reading, and fishing.

CONSERVATION

Greenways can be established to maintain and enhance the ecological functions which are vital to the quality of life on Genoa. The natural functions to maintain and the components of the natural system are described in the previous section of this plan under Environmental Conditions. Natural features which will determine the most appropriate location for greenways serving this purpose are soils, drainage, wetlands, vegetation and wildlife habitat.

Drainageways: Greenways should be established to protect natural drainageways. This will include the drainageways wetland areas that the drain flows through and the natural vegetation in the upland areas surrounding drainageways. Sufficient natural buffers on both sides of creeks should be protected in a natural vegetative state to maintain the quality and moderation of surface water flow into the drainageways and protect from excessive soil erosion.

Habitat: Greenways should be established to reconnect natural habitat corridors. Where there are areas of wildlife habitat such as wooded areas or wetlands, these can be connected by greenways. Connections should be made between like natural areas, and the connection should match the natural characteristics of the existing habitat areas.

Types of Greenways:

- Conservation
- Recreation
- Pathways

Pathways are to be shared use facilities among pedestrians, cyclists, equestrians, the handicapped, and other pathway users. provide connections pathways will between homes neighborhood schools, other activity centers, other pathways and transportation facilities. In addition, these pathways will provide ample opportunities for recreation. Pathways are proposed in the following locations:

- Along Grand River Avenue: The goal is to have a complete sidewalk system along both sides of Grand River Avenue from the City of Brighton to the City of Howell. This will serve as the principal east-west connection through the Township and link many of the neighborhoods in the northern portion of the Township with the adjacent cities. The current priority is filling sidewalk gaps and future plans are to add paths on the eastern side of the Township. Other north-south pathways will provide connections to the Grand River Avenue paths to create an integrated network.
- Latson/ Chilson Roads: A continuous paved path is proposed to span the Township from north to south along the Latson/ Chilson Road corridor. The new interchange at Latson Road will include a pedestrian pathway that continues south to Crooked Lake and Three Fires school. Pathways are proposed along Latson Road, north of Grand River Avenue to serve the higher density residential in this area which is in close proximity to the Grand River Avenue corridor. The sections along S. Latson Road and Chilson Road in the southern portion of the Township may include a paved path and a separate unpaved path for horseback riding. At the southern edge of the Township, the pathway will enter the Brighton State Recreation Area and tie into the hiking paths located in Hamburg Township to the south.
- Brighton Road: A pathway is proposed along Brighton Road between Honors Way and the City of Brighton. This will provide a connection between the higher density residential in the area of Oak Pointe and the City of Brighton.
- Dorr Road: The Township Hall is located on Dorr Road between 1-96 and Crooked Lake Road provides recreational amenities such as playgrounds, soccer fields, and bike paths. A pathway along Dorr Road would provide a link between the Township Hall and Crooked Lake Road to the interchange and also to Challis Road and Brighton Road.
- Crooked Lake Road: A pathway extending west along Crooked Lake Road from the Township Hall to S. Latson Road would complete a looped path system around the Tri-Lakes area. This would also provide a linkage between the Township Hall and the Three Fires Elementary School.

- Challis Road: An off-road shared used pathway should be developed along Challis Road from Dorr Road to the existing path on Brighton Road.
- Bauer Road: An off-road shared used pathway has been developed along Bauer Road from Challis Road to the Brighton State Recreational Area at the southern edge of the Township.

Pathway Siting: The major objectives of pathway location are as follows:

- To design a pathway that produces a minimum impact on the land.
- To provide for recreation and transportation.
- To choose an alignment that is visually pleasing and provides a variety of views and experiences.
- To take advantage of the natural terrain and vegetation.
- To provide a pathway that requires minimum maintenance.
- To have minimum impact on wildlife habitat and wetlands.

Design:

- The Livingston County Greenways Initiative contains standards for development of various types of trails. The standards contained in this plan should be followed.
- A pathway should be designed with curves that appear to have a purpose, not be placed haphazardly or regularly throughout the pathway length. An alignment which has long curves and short tangents will flow gracefully through the landscape.
- The relationship between Greenway projects, particularly pathways, and nearby private spaces must be carefully considered. Views, residential privacy, and access from residential privacy, and access from residential areas adjacent to Greenways are important.
- Residential neighborhoods require a design that is sensitive to the character, forms, materials, and colors. Nearby residents should be closely involved in the design process. Consider carefully the character of the public/private interface.
- Environmentally sensitive areas require a careful balance between the desire for recreation and the protection of natural resources. Determine the appropriate location and intensity of use of any path system carefully. Take advantage of opportunities to enhance the natural environment of the greenway. Provide seating in areas where wildlife can be observed without being disturbed.
- Pathways and wildlife habitat potentially conflict because of the environmental impact of construction. In addition, some wildlife species are intolerant of the presence of pathway users. Where high quality habitat is present, pathway links should be rerouted around the habitat. Subtle, attractive buffers should be integrated where necessary to protect privacy and wildlife.

- Occasional viewing, and seating areas can be provided along the path for resting and passive recreation activities.
- Path alignment should consider the larger patches of vegetation, open space, and drainage corridors that have high wildlife value by not cutting through the center of such parcels.
- Locate path intersections at natural focal points and convenient access points.

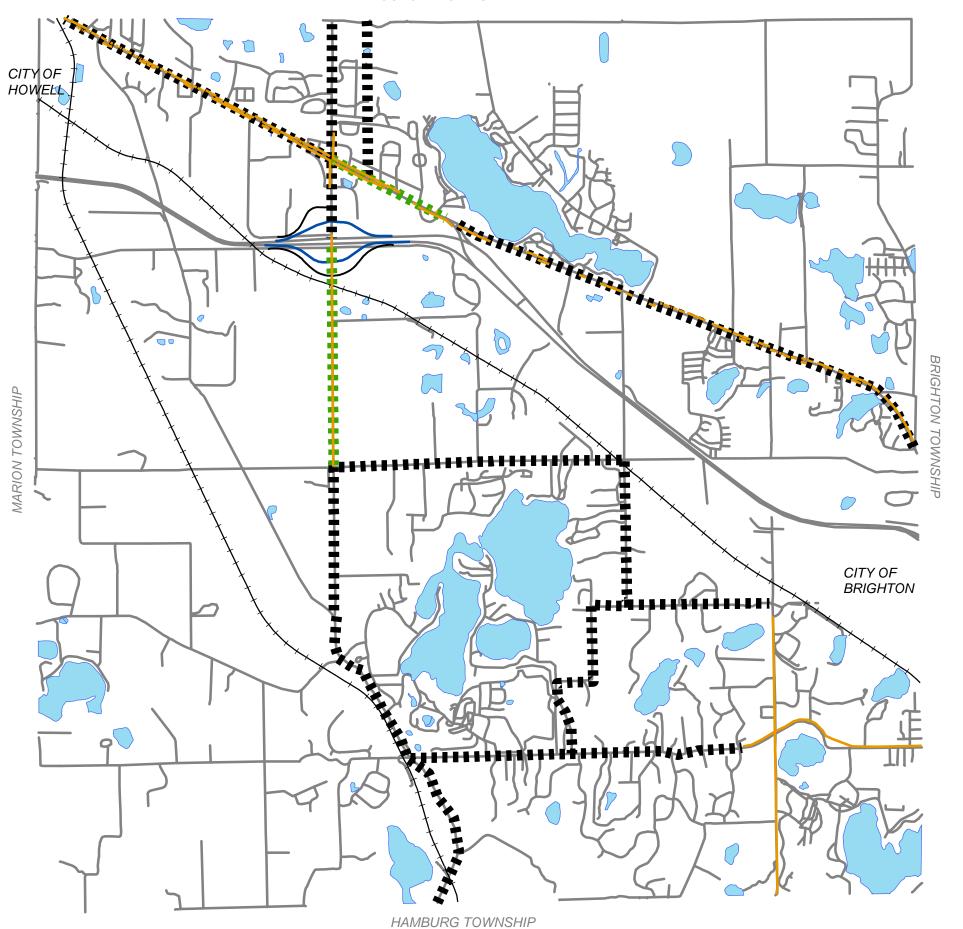
Pathway type: Pathways can be paved or unpaved. Paved pathways should be designed and constructed following the standards of the American Association of State Highway and Transportation Officials. To determine whether paved, unpaved, or parallel paved and unpaved pathways are most appropriate, the following criteria can be used:

- Paved pathways should be provided when:
 - o High bicycle speed and volume is anticipated
 - o There is an existing or projected year round transportation need for the pathway.
 - o Winter maintenance is anticipated.
 - The pathway connects paved pathway sections along a Greenway.
- Unpaved pathways should be provided when:
 - o The Township finds that a paved pathway would cause unacceptable environmental impacts.
 - The criteria for paving a pathway are un-met and a pathway is still needed.
 - o Equestrian use is anticipated.
- Separate paved and unpaved pathways may be provided when:
 - o Both the criteria for paving a pathway are met and equestrian use is anticipated.
 - o Use conflict are anticipated because of high volume.
 - o The environmental impacts of separate pathways are acceptable.
 - The area has sufficient space and amenity to make separate pathways desirable.





This page left intentionally blank.



MAP 14

Pathway Plan

Master Plan Update Genoa Township Livingston County, MI

Existing Pathways

IIIII Programmed

■■■■ Planned

October 2013



This page intentionally left blank.

VIII. IMPLEMENTATION





A. Tenets of Successful Implementation

This plan is intended to be a policy guide for moving Genoa Township forward, guiding decisions about future physical and economic development. But the plan is more than just a policy guide for Township officials and staff. With the commitment of resources to this planning effort come the high expectations that the recommendations will be implemented, some soon, or others over the next five to ten years.

Transforming the plan's goals into reality will require a long-term commitment and political consensus. The plan is designed to be a road map for action, incorporating strategies, specific projects, and programs that will achieve the desired results. This chapter synthesizes the many plan recommendations and identifies the actions and timing needed to transform the plan's vision into reality.

Commitment

Successful plan implementation will be directly related to a committed township leadership. While elected and appointed officials - the Township Supervisor, Manager, Township Board, and Planning Commission - will have a strong leadership role, many others - Township department directors, staff, and leaders from the community's institutions and organizations - will also be instrumental in supporting the plan.

However, commitment reaches beyond just these individuals and includes the array of individuals with an interest and stake in the future. Citizens, landowners, developers, and business owners who will be impacted by how Genoa Township changes must unite toward the plan's common vision.

Integrate with Capital Improvements

Township officials and departments must embrace the plan, applying its recommendations to help shape annual budgets, work programs, and the design of capital improvements. For example, the Township's engineering division can support implementation through infrastructure improvements, streets, and storm systems designed consistent with plan policies and recommendations, or the planning and building department through site plan review. Each department, staff person, and elected official should find it a benefit, if not an obligation, to reference the plan when making decisions and setting priorities.

Guidance for Development Decisions

This plan is designed for routine use and should be consistently employed during any process affecting the community's future. Private investment decisions by developers, corporations, and land owners should consider the plan's direction. Other planning efforts for subareas, corridors, and community facilities should be in harmony with the master plan. Finally, the plan should be used when reviewing development proposals and referenced in related reports and studies.

8-1 Implementation Draft 10/22/2013

Partnerships

While the Township is in a position to coordinate many of the plan's implementation tasks, responsibility should not solely rest on the government. Instead, the vast array of stakeholders having key roles in either the township or region must all participate. Partnerships may range from sharing information to funding and shared promotions or services.

Municipal government cannot and should not do it all. Only through public/private collaboration can the plan's vision be realized. What can these partnerships do that the Township cannot do alone?

- Solve Larger Issues. Many issues are beyond the control of individual jurisdictions and require cooperation, including major infrastructure improvements, non-motorized options, and economic development.
- Meeting Expectations for Public Services. Economic conditions make it more difficult for individual communities to meet residents' needs and expectations. More sharing of resources and eliminating duplicated efforts may result in more cost effective ways of providing essential community services.

Evaluation and Monitoring

This plan has been developed with a degree of flexibility, allowing nimble responses to emerging conditions, challenges, and opportunities. To help ensure the plan stays fresh and useful, periodic reviews and amendments are required. This will ensure plan goals, objectives, and recommendations reflect changing community needs, expectations, and financial realities.

Any more detailed subarea plans should be adopted as master plan amendments. The plan should be reviewed at least every five years. Updates should reflect changing conditions, unanticipated opportunities, and acknowledge the implementation to date.

Roles of the Supervisor and Township Board

The Supervisor and Township Board must be solidly engaged in the process to implement the plan. Their responsibilities will be to prioritize various action items and establish timeframes by which each action must be initiated and completed. They must also consider and weigh the funding commitments necessary to realize the township's vision, whether involving capital improvements, facility design, municipal services, targeted studies, or changes to development regulations, such as municipal codes, the zoning ordinance and procedures.

Planning Commission as Facilitators

The Planning Commission is charged with overseeing plan implementation and is empowered to make ongoing land use decisions. As such, it has a great influence on how sustainable Genoa Township

8-2 Implementation Draft 10/22/2013

will be. Therefore, several tasks in the Action Plan are the responsibility of the Planning Commission and its staff.

As an example, the Planning Commission is charged with preparing studies, ordinances, and certain programmatic initiatives before they are submitted to the Township Board. In other instances, the Planning Commission plays a strong role as a "Plan Facilitator" overseeing the process and monitoring its progress and results. Together, Township staff and the Planning Commission must be held accountable, ensuring the township's master plan impacts daily decisions and actions by its many stakeholders.

B. Zoning Recommendations

Zoning is a key mechanism for achieving the desired land use pattern and quality of development advocated in the plan. This section provides a useful guide relative to the inconsistencies between current zoning patterns and proposed future land use designations.

Because the Future Land Use Plan is a long range vision of how land uses should evolve over time, it should not be confused with the Township's zoning map, which is a current (short term) mechanism for regulating development. Therefore not all properties should be immediately rezoned to correspond with the plan. The Future Land Use Plan is intended to serve as a guide for land use decisions over a longer period of time (5+ years).

Review of the Existing Land Use map in comparison to the Future Land Use map reveals a gradual transition to the planned land use pattern. Achievement of this goal will be gradual particularly where established businesses and homes are located in areas intended for other types of uses in the long term.

In addition, the Future Land Use map (Map x) is generalized. More detailed evaluation would be required as part of any rezoning consideration.

The plan categories correspond to zoning districts, but there is some generalization. The following table provides a zoning plan indicating how the future land use categories in this master plan relate to the zoning districts in the zoning ordinance. In certain instances, more than one zoning district may be applicable to a future land use category. Notes are provided to guide the Planning Commission in determining the appropriate zoning district based upon the context of the surrounding area.

8-3 Implementation Draft 10/22/2013

Zoning Districts	Agriculture/Country Estate	Large Lot Rural Residential	Low Density Residential	Small Lot Single Family Residential	Medium Density Residential	High Density Residential	Manufactured Housing	Neighborhood Commercial	General Commercial	Regional Commercial	Mixed-Use Town Center	Office	Industrial	Research and Development	Public/Institutional Utilities	Private Recreation	Interchange Campus	Interchange Commercial
AG – Agricultural District																		
CE – Country Estate District																		
RR – Rural Residential																		
LDR – Low Density Residential																		
SR – Suburban Residential																		
UR – Urban Residential																		
LRR – Lakeshore Resort Residential																		
MDR – Medium Density Residential																		
HDR – High Density Residential																		
MHP – Manufactured Housing Park																		
PRF – Public and Recreational Facilities District																		
NSD – Neighborhood Services District																		
OSD – Office Service District																		
GCD – General Commercial District																		
RCD – Regional Commercial District																		
IND – Industrial District																		
R-PUD – Residential Planned Unit																		
Development Overlay District MU-PUD – Mixed Use Planned Unit																		
Development District																		
NR-PUD – Non-residential Planned																		
Unit Development District																		
RD-PUD – Redevelopment Planned																		
Unit Development Overlay District																		
PID – Planned Industrial																		
Development District TCOD – Town Center Overlay																		
District																		
New Form-Based District #1																		
New Form-Based District #2																		

Zoning changes in accordance with the plan should be made gradually so that change can be managed. The Future Land Use map as well as

8-4 Implementation Draft 10/22/2013

the plan's goals and recommendations should be consulted to judge the merits of a rezoning request. In review of rezoning and development proposals, the Township should consider the following sequencing standards:

- Is the proposed rezoning consistent with the policy statements and future land use plan recommended in this study. If not, is it reasonable to change the plan? There should be justification for a deviation from the plan. The Planning Commission could require an amendment to the plan before approval of a contrary zoning request.
- Is the timing for the zoning change correct?
- Is there reason to believe that the property owner cannot realize a reasonable rate of return with any use allowed under the current zoning classification? (i.e. is use under current zoning viable?) The right to a "reasonable" use of the property, is not necessarily the most profitable use.
- Are all of the permitted uses allowed under the requested zoning district compatible with surrounding land uses and zoning?
- Is the environment of the site capable of accommodating the list of uses permitted under the requested zoning classification?
- Is the proposed change in keeping with the growth management plan? Is there sufficient public infrastructure (street, sewer and water capacity) to accommodate the host of uses allowed under the requested zoning classification? If not, is mitigation being proposed to accommodate the impacts?
- Is the site large enough to meet all requirements for setbacks, area, utilities and driveway spacing?

If the response to all those questions is affirmative, then the Township should approve the rezoning. If the response to one or more of the questions is "no" then substantial evidence should be provided by the applicant to justify the change.

Zoning changes following the future land use plan may be made over time if conditions warrant:

- Consistency with the Master Plan.
- Timing.
- Reasonable use of land.
- Compatibility with surrounding land uses.
- Environmental conditions.
- Infrastructure capacity.
- Suitability of the lot to meet zoning requirements.

8-5 Implementation Draft 10/22/2013

C. Action Plan

The following table provides a summary list of the recommendations contained in this plan and alternative implementation tools for each.

Plan Recommendation	Implementation Mechanisms				
Natural Resources Management					
Lower density zoning districts for areas with significant fragile natural resources.	< Maintain lower density Country Estate and Rural Residential zoning districts.				
Natural features setbacks from wetlands, creeks, ponds and lakes.	 Maintain setback requirements from waterways in Zoning Ordinance. Utilize clustering allowed by PUD to preserve wetlands as open space and provide greater setbacks from shorelines. 				
Protect natural topography and vegetation on areas with steep slopes.	 Maintain setback requirements from waterways in Zoning Ordinance. Utilize clustering allowed by PUD to preserve steep slopes as open space. Adopt slope based density regulations to reduce allowable density on steep slopes. 				
Storm water management to protect the quality of natural waterways and adjacent properties.	< Adopt Township Stormwater Ordinance.				
Protect quality of ground and surface water from contamination by septic disposal or hazardous materials.	 Provide sanitary sewer service to existing higher density residential areas. Minimize residential densities in areas where public sewer is not available. Require all uses that handle hazardous materials to prepare a pollution incident prevention plan and provide secondary containment and other necessary protection measures. Prohibit floor drains for industrial uses from discharging to storm or sanitary sewer. 				
Restore natural wetlands that have been altered from their natural state.	 Require PUD's to restore previously disturbed wetlands as a qualification condition for PUD approval. Incorporate restoration of wetlands into drainage design for new development. 				
Manage boat usage to prevent overcrowding and degradation of lake quality.	< Maintain keyhole ordinance. < Adopt additional lake access regulations.				
Preserve natural vegetation.	 Utilize clustering allowed by PUD to preserve steep slopes as open space. Require natural buffer zones along public road frontages. 				

8-6 Implementation Draft 10/22/2013

Land Use	
Implement future land use plan.	 Maintain current zoning that is consistent with Future Land Use Plan Gradually rezone properties to the Future Land Use Plan when timing and other conditions are met.
Maintain growth boundaries.	< Do not extend sewer or water services outside of growth boundary.
	Promote infill development within growth boundary and do not rezone land outside of the growth boundary to allow higher density residential or commercial uses.
	 Evaluate growth boundary with each regular Master Plan update to ensure there is land available for infill development
Develop Genoa Town Center.	Maintain form-based zoning regulations for the Town Center to ensure all development and redevelopment in this area is consistent with the intent to create a traditional, walkable neighborhood. Processor and all are for this area to a said in the
	 Prepare an overall concept plan for this area to coordinate development between adjacent sites. Develop streetscape standards for this area including sidewalks, landscaping, street lighting, street furniture, public art and plazas. Utilize PUD regulations to coordinate development of larger
Implement I-96/Latson Road Subarea Plan.	sites. < Adopt form-based districts. < Ensure infrastructure can support new development. < Adopt additional access management standards for roads adjacent to interchange. < Require design of developments to preserve buffers along adjacent residential.
Transportation	
Grand River Avenue improvements, including signalization, road widening, median, and service drives, as detailed in the Grand River Avenue Corridor Plan.	 Coordinate with MDOT and LCRC. Special Assessment District. Require proportionate share of improvements as a condition of development approvals.
Road Widening	 Coordinate with MDOT and LCRC. Require proportionate share of improvements as a condition of development approvals. Regulate residential densities and the location of traffic intense uses to minimize need for road widening.

8-7 Implementation Draft 10/22/2013

	T
Road Paving	 Coordinate with LCRC. Require proportionate share of improvements as a condition of development approvals. Regulate residential densities to minimize traffic on gravel roads.
Intersection Improvements	Coordinate with MDOT and LCRC.Special Assessment District.
Access Management	 Coordinate with MDOT and LCRC. Regulate access through Zoning Ordinance access management standards.
New Road Development	< Require adequate roadways within all new development through subdivision and condominium regulations.
Greenways, Pathways and Recreation	n
Provide for recreational areas	 Work with Livingston County, school districts and the cities of Brighton, and Howell to provide recreational facilities for the area. Require private neighborhood recreational areas within all residential developments. Obtain grant to acquire site for future Township park. Private investment and donations.
Provide for conservation greenways	 Utilize clustering allowed by PUD to preserve ecological and riparian corridors as natural open space. Private investment and donations.
Develop bike path system for Township	 Provide dedicated millage for bike path construction. Include bike paths in Township Capital Improvement Plan Work with LCRC to include bike paths with road projects. MDNR funds for pathways. Private investment and donations. Require all developments to construct bike paths along site frontages, where designated in plans.

D. Township Implementation Funding Sources

Dedicated Millage

Special millage can be used to generate revenues for a specific purpose. The Township could consider opportunities for special millage to implement recommendations in the Master Plan. For example, several Michigan communities have special land acquisition fund that is supported by a one-quarter mill property tax. A land acquisition fund would be a useful tool to promote right-of-way widening or dedication in Genoa Township. Other communities have millages to fund road improvements, bike path programs and parkland acquisition.

8-8 Implementation Draft 10/22/2013

Special Assessment

Special assessments are compulsory contributions collected from the owners of property benefited by specific public improvements (paving, drainage improvements, etc.) to defray the costs of such improvements. Special assessments are apportioned according to the assumed benefits to the property affected. Special assessment funding might prove useful to implement roadway paving, streetscape improvements, secondary access drives in districts fronting on arterial streets and to construct new roads, as necessary and appropriate. These programs are particularly helpful for improving and upgrading older local roads.

Bond Programs

Bonds are among the principal sources of financing used by communities to pay for capital improvements. General obligation bonds are issued for specific community projects and are paid off by the general public via property tax revenues. Revenue bonds are issued for construction of projects that generate revenue (i.e. parking structures, etc.). These bonds are retired, or serviced, using income generated by the project.

Tax Increment Financing

Tax increment financing is authorized by the Downtown Development Authority Act and Local Development Finance Authority Act. When a tax increment finance district is established, the stated equalized assessment value of all properties within the district is recorded. Every year thereafter, the property tax revenue generated by any increase in the total stated equalized value is "captured" by the responsible organization to finance improvements established in the overall development plan. The development plan is a required document illustrating all proposed improvements within the district. Often, revenue bonds are used to finance the improvements and the tax increment revenues are used to repay the bonds. This tool could also prove to be a valuable tool for roadway improvements within the Township.

Michigan Natural Resources Trust Fund

MNRTF provides funding assistance for state and local outdoor recreation needs, including land acquisition and development of recreation facilities. This assistance is directed at creating and improving outdoor recreational opportunities and providing protection to valuable natural resources. These are grants between \$15,000 and \$500,000 with a required minimum local match of 25 percent. This grant is ideal for implementing land acquisition and park development goals in the future.

8-9 Implementation Draft 10/22/2013

Land and Water Conservation Fund

LWCF provides funding assistance for communities to acquire and develop land for outdoor recreation. The minimum award is \$15,000 and the maximum of \$500,000. The eligibility criterion emphasizes preservation of natural resources such as waterways. This grant is ideal for land acquisition that is intended for passive recreation and open space in the future.

Michigan Natural Resources Tree Planting Grants

Through the Michigan Department of Natural Resources, there are three tree planting grant programs that will assist in funding landscape enhancements at the parks and re-foresting projects. The township was awarded some tree planting monies to plant trees at the Township Hall.

8-10 Implementation Draft 10/22/2013

GENOA CHARTER TOWNSHIP PLANNING COMMISSION PUBLIC HEARING September 9, 2013 6:30 P.M. MINUTES

<u>CALL TO ORDER:</u> The meeting of the Genoa Charter Township Planning Commission was called to order at 6:30 p.m. Present were Dean Tengel, Barbara Figurski, James Mortensen, Eric Rauch, Chairman Doug Brown, Diana Lowe, and John McManus. Also present were Assistant Township Manager, Kelly VanMarter, Gary Markstrom of Tetra Tech and Brian Borden of LSL.

<u>PLEDGE OF ALLEGIANCE:</u> The Pledge of Allegiance was recited.

<u>APPROVAL OF AGENDA:</u> **Motion** by Barbara Figurski to approve the agenda as proposed. The motion was supported by John McManus. **Motion carried unanimously.**

CALL TO THE PUBLIC: Chairman Brown made a call to the public at 6:33 p.m.

John Waldeck, 2899 Pardee Road addressed the Commission regarding the Latson Road interchange and the traffic impact at Coon Lake and Chilson Roads. Kelly VanMarter indicated that the Township does not have any plans, but that the Livingston County Road Commission has made reference to a potential roundabout at that location. He was referred there.

No one else wished to address the Planning Commission and the call to the public was closed at 6:36 p.m.

OPEN PUBLIC HEARING #1... Review of site plan, special use, and environmental impact assessment for proposed 16,120 square-foot gymnasium and classroom addition for Brighton Nazarene Church, located at 7669 Brighton Road in Section 25, petitioned by Brighton Nazarene Church.

Brent LaVanway of Boss Engineering and Gary Anscombe addressed the Commission. The petitioner proposes to plant 44 shrubs and 40 trees in addition to any trees that need to be replaced in the existing evergreen buffer. The remaining landscape revisions were reviewed. The east and west property lines were addressed. The islands have been relocated to allow for cars to accelerate in parking lot.

Mr. LaVanway reviewed his letter of July 2013. There were eight conditions placed upon the previous approval. The 16 trees were replaced and those that have died will be replaced. The three Austrian pines were planted. Two of those have died and will be replaced. The tree line on the east property line was to be

maintained. Those trees that have died will be replaced. Mr. Anscombe indicated that the maintenance company has caused some die-off with their snow removal methods. He has addressed this with the maintenance company. The skate park rules were to be placed on the liability form and that has been done. The lights were to be turned off by 11 p.m. They are on a timer that turns them off at 11 p.m. The park is closed for the full month of July and August this year, although it won't be closed every August. The two signs prohibiting outdoor skating have been installed. One was removed and is being replaced. No commercial activities have been permitted at the skate park. Security guards to patrol the skate park were required by the Commission. There were guards until the security cameras were installed. Now there is an on-staff person who lives immediately adjoining the skate park and who is also the manager of the skate park.

Brian Borden addressed the Commission. In terms of the zoning standards, there are three discretionary items: design of the building; parking; and improvements to existing conditions as to lighting.

Mr. LaVanway indicated the lighting is shoe box type fixtures with 100% cut off. It is a two foot base with an eighteen foot pole. It is proposed for two locations. This is sufficient per Brian Borden.

Chairman Brown inquired of the petitioner why so much parking is requested. Mr. Anscombe indicated there is an overlap between people coming and going from the various services each Sunday.

Mr. LaVanway reviewed the storm water management plan. The expanded use of asphalt should not cause an issue. The underground system will require maintenance and it is designed with access in mind for that.

Mr. Mortensen asked if there are setback issues caused by the playground. Ms. VanMarter indicated there are not.

Gary Markstrom reviewed the engineer's report. The drainage issues have been addressed. There are some construction plan issues that need to be addressed. The petitioner needs to get a permit for the additional fire hydrants. Chairman Brown asked how a water main is bent. Gary Markstrom explained that fittings are used for this.

The Fire Department letter of August 6, 2013 was addressed by Chairman Brown. The letter by Harry Eiss was addressed by Chairman Brown.

Mr. Mortensen voiced his concerns with the petition. He was not aware that drivers training was occurring in the lot. Andrew Kotch is the designated representation for AK Services, who subcontracts with the State of Michigan as it relates to the driver license testing and was present at the meeting. He indicated there were 160 trucks/busses, 60 motorcycles and 800 automobile tests

performed last year. Each test lasts about 15 minutes. Mr. David Tiemann addressed the Board and indicated that the noise levels are higher and it has become problematic. Mr. Kotch indicated that the noise is limited and is of short duration. Mr. Kotch will disconnect his reverse beeper on the buses/trucks to avoid some noise.

Kelly VanMarter reviewed the ordinance to determine if the driver license testing is a special use under the ordinance. AK Services has been providing this service at the church for 18 years. Mr. Tengel thinks that this business should not be in a church parking lot, which is a residential area. Ms. VanMarter indicated, and Mr. Borden concurred, that this use was never lawful under the ordinance and therefore is an illegal use. In order for it to be a legal non-conforming use, it would have had to have been a lawful use when it started at that site. Mr. Mortensen said he believes if it is not an approved use, then it cannot be assumed to be an unapproved use--it's a "limbo" item.

Mr. David Tiemann addressed the Planning Commission regarding the noises caused by AK Services. Marcia Kotch indicated that had they known before July that the sounds were causing a problem for the neighbors, they would have forbidden back-up beepers much earlier.

Planning Commission disposition of petition

- A. Recommendation of Special Use
- B. Recommendation of Environmental Impact Assessment.
- C. Recommendation of Site Plan (07-30-13).

Motion by James Mortensen to recommend to the Township Board approval of the special use permit, subject to:

- The same conditions of the special use permit granted June 2, 2003 shall be complied with and expanded to include maintenance of all of the additional trees and bushes, as well;
- 2. The petitioner, with respect to the original conditions, shall provide a security guard to patrol the parking lot on the days the skate park is open between the hours of 9 p.m. and 12 a.m. The church employee living on the site will be permitted to perform the security guard duties provided he is appropriately licensed;
- 3. Procedures will be in place, available for Township inspection, regarding the maintenance of the underground detention system;
- 4. Trash pick up will not be permitted until after 8 a.m.;
- 5. The approval of the site plan and environmental impact assessment: This recommendation is made because this commission has found that the general land use standards of ordinance 19.03 and article 3 are met.

Support by Diana Lowe. **Motion carried unanimously.**

Motion by Barbara Figurski to recommend to the Township Board approval of the environmental impact assessment, subject to:

1. The parsonage should be listed as to the north, rather than the south in section C.

Support by John McManus. Motion carried unanimously.

Motion by James Mortensen to recommend to the Township Board approval of the site plan dated 7/30/13, subject to:

- 1. A note will be added to the site plan briefly describing how the underground detention system will be maintained;
- 2. The requirements of the Township Engineer addressed in his 8/18/13 letter will be complied with, as well as the requirements of the Brighton Fire Department addressed in their letter of 8/6/13;
- 3. The building elevations are acceptable;
- 4. The materials will match the existing building;
- 5. Parking at 134% is approved;
- 6. Lighting will comply with the ordinance in terms of foot candles at the property line;
- 7. Language will be added to the site plan regarding the landscape plan as it relates to how the landscaping will be maintained to avoid future failures that have occurred in the past.

Support by Eric Rauch. Motion carried unanimously.

OPEN PUBLIC HEARING #2... Review of request to table to the October 15, 2013 Planning Commission Meeting for a site plan, special use, and environmental impact assessment to construct a new 2,700 square foot Qdoba drive through restaurant located at the Meijer outlot at 3883 E. Grand River, Howell, petitioned by Kevin Egnatuk of Southwind Restaurants, LLC.

No one appeared to address the Planning Commission.

Planning Commission disposition of petition

A. Disposition of Request to Table.

Motion by Barbara Figurski to table this issue. James Mortensen addressed the lack of a bypass lane for the drive-thru. This was addressed by LSL and the petitioner is working on inserting a bypass lane in future plans. Support by James Mortensen. **Motion carried unanimously.**

Administrative Business:

- Staff report
- Approval of August 26, 2013 Planning Commission special meeting minutes.
 Motion by Barbara Figurski to approve the minutes of August 26, 2013. Support by John McManus. Motion carried unanimously.
- Member discussion
- Adjournment. **Motion** by Barbara Figurski to adjourn the meeting at 8:24 p.m. Support by John McManus . **Motion carried unanimously.**