The City of Grove City, Ohio

4035 Broadway • Grove City, Ohio 43123
(614) 277-3000

July 15, 2015

RECEIVED

JUL 27 2015

GC PLANNING COMMISSION

Darrel Rohrer
The Covenant Group
37 Lovella Drive
Hebron, OH 43025

Via email: Darrel@TheCovenantGroup.biz

Dear Mr. Rohrer:

Staff has reviewed your development plan application for the Canaan Land Church Building Expansion located at 2777 Gantz Road. The control number for this application is #201506290047 and should be referenced on any future correspondence concerning this matter.

Having compiled the comments/recommendations provided to the Development Department from our various departments, we request the following additional information and/or corrections:

Development Department (Kimberly Shields, 614-277-3007)

1. Multiple plan sheets are missing to consider this a complete Development Plan. Please submit the following plans on separate plan sheets with your revised materials: Grading plan, landscape plan (see comments from our Urban Forester), utility plan, photometric plan (see comment #2), and preliminary stormwater calculations.

2. A photometric plan is required showing lighting levels on the site. All vehicular and pedestrian areas must maintain a 0.5 footcandle minimum lighting level.

3. Please confirm that it is the desire of the property owner to tap into the sanitary sewer main for this project. A recent phone conversation with Joe Hammond gave staff the impression that this was not desired to be a part of the plan.

4. The proposed ponds along Gantz Road should be wet ponds with permanent normal pools and will be required to meet the city's Public and Private Pond Design Standards.

5. The proposed parking setback along the west property should be increased to 20' to meet Code requirements between incompatible land uses. Landscaping will also be required to be installed within this setback (see Urban Forestry comments for more detail).

6. Lighting fixtures should match those already utilized on the site.

7. All parking lot aisles should end in landscape islands in the new portion of the parking lot. According to the BZA's ruling on 7/26/10, landscape islands are not required in the existing parking lot.

8. BZA stated at their 7/26/10 meeting that nine trees will need to be planted on the property (with approval of the Urban Forester) to replace those that would have been planted in the landscape islands in the existing parking lot.

9. Building elevations should be submitted showing all four sides of the proposed addition, with the heights noted. Proposed materials should also be noted for all elevations.

10. An 8.5x11" exterior material detail sheet should be submitted outlining the color and manufacturer of all proposed exterior materials.

11. A material sample board should be submitted with samples of all proposed exterior materials.

Building Division (Laura Scott, 614-277-3086)

12. No landscaping or lighting plan.

13. Aisle behind church narrows to 20'. Is drop off to be one way circulation?

14. Does not meet parking setback of 20' adjacent to incompatible use or landscaping requirements.

Urban Forestry (Jodee Lowe, 614-277-1103)

A Landscape Plan should be submitted that includes the following:

15. 1136.05 (b) Tree Inventory: Need to have a list and map showing all existing trees that are on the property that are 6" in caliper or larger

16. 1136.06(a) (1): Frontage Along Public Streets: Parking spaces facing Gantz Road are required to have one of the following options:
    - **Option A:** 10' minimum parking set back with a continuous 3' height evergreen hedge;
    - **Option B**: 10' minimum parking set back with a continuous 3-5' maximum height wall constructed of like materials on the building; or
    - **Option C**: 20' minimum parking set back with a continuous 3' in height earthen mound. In addition to one of these options, a 2" minimum caliper tree needs to be planted for every 35' of frontage

17. 1136.06(a) (c): Rear and Side Yards Adjacent Incompatible Use Districts: Between the parking lot and western property boundary (Village at Gantz Meadows), one of the following options:
    - **Option A:** 20' minimum setback with either a continuous 6' height wall or solid fence or a 90" opaque 5' height evergreen screen, or a combination thereof. In addition to the wall or fence, one 2" caliper small class tree, two 6' height evergreen trees, and two 18" height deciduous shrubs are to be planted per each 40 lineal feet of property line. You are also encouraged to install additional planting beds with annual or perennial flowers to increase the aesthetic appeal of the parking side of the screen.
    - **Option B**: 30' setback with a continuous 4' height earthen mound. In addition to the mounding, a double staggered row of 6' height minimum evergreen trees at 20' maximum spacing and one 2" caliper minimum small class tree and two 18" height deciduous shrubs per each 40 lineal feet of property line.

18. 1136.06(d): Parking Lot Islands: City Code requires to have at least 9 island beds in the new parking lot addition based on the number of parking spaces being added; it appears from the plans that there needs to be a total of 22 island beds in the parking lot. Each island needs to have a 2" minimum caliper tree per island bed

19. 1136.09: Landscaping Abutting the Structure: City Code requires that there be one 2" minimum caliper tree planted per each 40 lineal feet of building perimeter. 6 trees are required in addition to 64 square feet minimum of landscape area. Trees should be arranged around all sides of the building.

20. 1136.10: Retention Pond Area: City Code requires that a 2" minimum caliper tree be planted in a landscape area for every 50 lineal feet of retention area. Retention area on west side of property would require 5 trees and the retention area on the east side would require 6 trees.

21. 1136.11: Grass seed/Sod: Need to show on the plans where grass seed and sod will be used to establish lawn areas

Service Department (Cindi Fitzpatrick, 614-277-1110)

22. Comments not received

Engineering, EMH&T (Erik Meininger, 614-775-4436)

23. State the total proposed lot coverage and landscaping percentages

24. Show the existing or proposed building locations on the adjacent property (plans for Village at Gantz Meadows are available for view and download online (http://www.grovecityohio.gov/development/ongoing-development/).

25. Label the right-of-way on the east side of Gantz Road consistently with the other rights-of-way

26. Show the front setback at 30 feet per Grove City Code Table 1135.12-II.

27. Identify the garbage pick-up location

28. Provide dumpster and mechanical equipment screening details. The dumpster should be screened in brick to match the main structure and should have stained wood gates.

29. Label pipe sizes and grade of existing gravity sewers

30. Provide a full stormwater management plan that includes pre- and post-developed drainage boundary exhibits and a stormwater management narrative/calculations that reflect how the proposed development will comply with the City's stormwater detention and post-construction water quality requirements with the construction submittal. Include the applicable water quality drawdown calculations to demonstrate compliance with the BMP requirements in Ohio EPA's General Permit.

31. Provide calculations and design features that ensure the proposed wet basins meet the requirements of the Public and Private Pond Design Standards (available on the City's website).

Grove City Division of Police (Jeff Pearson, 614-277-1709)

32. Comments not received

Jackson Township Fire Department (Tammy Green, 614-945-5043)

33. Comments not received

Please revise your materials accordingly and submit twenty (20) completely folded copies along with a response letter indicating how each issue noted was addressed in the revised plans to my attention by 12:00 p.m. on Monday, July 27th. This will allow us time to review the revisions prior to finalizing the agenda for the August Planning Commission meeting. If for any reason you feel a meeting with staff is warranted prior to the Planning Commission meeting, please call me as soon as possible to arrange a date and time. If revised drawings cannot be submitted by the above deadline, the Development Department will recommend that this application be postponed until the September Planning Commission meeting; however, if the above deadline is met, staff will recommend that your application be heard as described below.

Planning Commission will hear your request on Tuesday, August 4th, 2015 in the lower level of City Hall at 1:30 p.m. Your request will be postponed to a future date if you are unable to attend the meeting.

If you have any questions or need additional information, please call me at 277-3007 or email kshields@grovecityohio.gov .

Sincerely,

Kim Shields

Kimberly Shields, AICP
Planning and GIS Supervisor

The Covenant Group

37 Louella Drive

Hebron, Ohio 43025

Canaan Land FWB Church

2777 Gantz Road

Grove City, Ohio

Response to Planning Commission Letter of July 15, 2015

1. Multiple plan sheets are missing to consider this a complete Development Plan. Please submit the following plans on separate plan sheets with your revised materials: Grading plan, landscape plan (see comments from our Urban Forester), utility plan, photometric plan (see comment #2), and preliminary stormwater calculations.

The development plan set now includes a grading plan, landscape plan, utility plan and photometric plan. Preliminary stormwater calculations have also been included.

2. A photometric plan is required showing lighting levels on the site. All vehicular and pedestrian areas must maintain a 0.5 footcandle minimum lighting level.

A separate plan sheet showing the photometric layout for the site is included as part of the plan set.

3. Please confirm that it is the desire of the property owner to tap into the sanitary sewer main for this project. A recent phone conversation with Joe Hammond gave staff the impression that this was not desired to be a part of the plan.

The building committee of the church has gone on record as desiring to tap into the Grove City sanitary sewer for this project. Mr. Dick Brush, head of the building committee, has confirmed this desire. The connection will be a 6-inch lateral extending across the adjoining property to a connection to the sanitary sewer from the Villages (to the west). As part of the lateral connection, the church will obtain a dedicated easement from the adjoining property owner.

4. The proposed ponds along Gantz Road should be wet ponds with permanent normal pools and will be required to meet the city's Public and Private Pond Design Standards.

Detailed plans for the design of the retention ponds will be submitted as part of the site improvement plans. The proposed ponds will be designed with permanent normal pools and will meet the city's Public and Private Pond Design Standards.

5. The proposed parking setback along the west property should be increased to 20' to meet Code requirements between incompatible land uses. Landscaping will also be required to be installed within this setback (see Urban Forestry comments for more detail).

The proposed new parking along the west property has been increased from 17 feet to 20 feet to meet Code requirements. Landscaping is shown in this location. The existing parking area will be maintained.

6. Lighting fixtures should match those already utilized on the site.

The proposed lighting fixtures shown on the plan have been selected to match the existing units.

7. All parking lot aisles should end in landscape islands in the new portion of the parking lot. According to the BZA's ruling on 7/26/10, landscape islands are not required in the existing parking lot.

The plans have been revised to show landscape islands in the new portions of the parking lot. Landscaping is also shown in these islands.

8. BZA stated at their 7/26/10 meeting that nine trees will need to be planted on the property (with approval of the Urban Forester) to replace those that would have been planted in the landscape islands in the existing parking lot.

Nine additional trees will be planted on the property in locations to be approved by the Urban Forester. These are being planted in lieu of construction of landscape islands in the existing parking lot. The landscape plan submitted as part of this development plan shows proposed locations for the nine trees.

9. Building elevations should be submitted showing all four sides of the proposed addition, with the heights noted. Proposed materials should also be noted for all elevations.

Building elevations, prepared by the architect, accompany this submittal.

10. An 8.5x11" exterior material detail sheet should be submitted outlining the color and manufacturer of all proposed exterior materials.

Material detail sheets, prepared by the architect, accompany this submittal.

11. A material sample board should be submitted with samples of all proposed exterior materials.

Physical samples of the exterior materials, prepared by the architect, accompany this submittal.

12. No landscaping or lighting plan.

Per response to comment no. 1, these plans are now part of the development plan set.

13. Aisle behind church narrows to 20'. Is drop off to be one way circulation?

The aisle behind the church is not the drop off area. The drop off area is under the porta-cochere on the east side of the new building and will be one way, as shown on the plan. The aisle behind the church will only be used to access the existing parking area and will be two way (in and out). This is an existing access drive and no changes are plannedt.

14. Does not meet parking setback of 20' adjacent to incompatible use or landscaping requirements.

Per response to comment no. 5, the parking setback has been modified.

15. 1136.05 (b) Tree Inventory: Need to have a list and map showing all existing trees that are on the property that are 6" in caliper or larger.

16. 1136.06(a) (1): Frontage Along Public Streets: Parking spaces facing Gantz Road are required to have one of the following options:
Option A: 10' minimum parking set back with a continuous 3' height evergreen hedge;
Option B: 10' minimum parking set back with a continuous 3-5' maximum height wall constructed of like materials on the building; or
Option C: 20' minimum parking set back with a continuous 3' in height earthen mound. In addition to one of these options, a 2" minimum caliper tree needs to be planted for every 35' of frontage

Option A that includes a 10 feet minimum parking set back with a continuous 3 feet high evergreen hedge will be planted along the parking area facing Gantz Road. This is shown on the landscape plan.

17. 1136.06(a) (c): Rear and Side Yards Adjacent Incompatible Use Districts: Between the parking lot and western property boundary (Village at Gantz Meadows), one of the following options:
Option A: 20' minimum setback with either a continuous 6' height wall or solid fence or a 90" opaque 5' height evergreen screen, or a combination thereof. In addition to the wall or fence, one 2" caliper small class tree, two 6' height evergreen trees, and two 18" height deciduous shrubs are to be planted per each 40 lineal feet of property line. You are also encouraged to install additional planting beds with annual or perennial flowers to increase the aesthetic appeal of the parking side of the screen.
Option B: 30' setback with a continuous 4' height earthen mound. In addition to the mounding, a double staggered row of 6' height minimum evergreen trees at 20' maximum spacing and one 2" caliper minimum small class tree and two 18" height deciduous shrubs per each 40 lineal feet of property line.

Option A described above has been incorporated into the landscape plan for this site.

18. 1136.06(d): Parking Lot Islands: City Code requires to have at least 9 island beds in the new parking lot addition based on the number of parking spaces being added; it appears from the plans that there needs to be a total of 22 island beds in the parking lot. Each island needs to have a 2" minimum caliper tree per island bed.

19. 1136.09: Landscaping Abutting the Structure: City Code requires that there be one 2" minimum caliper tree planted per each 40 lineal feet of building perimeter. 6 trees are required in addition to 64 square feet minimum of landscape area. Trees should be arranged around all sides of the building

20. 1136.10: Retention Pond Area: City Code requires that a 2" minimum caliper tree be planted in a landscape area for every 50 lineal feet of retention area. Retention area on west side of property would require 5 trees and the retention area on the east side would require 6 trees.

21. 1136.11: Grass seed/Sod: Need to show on the plans where grass seed and sod will be used to establish lawn areas

22. Comments not received

No response needed.

23. State the total proposed lot coverage and landscaping percentages.

24. Show the existing or proposed building locations on the adjacent property (plans for Village at Gantz Meadows are available for view and download online (http://www.grovecityohio.gov/development/ongoing-development/).

The development plan has been revised to show the locations of the nearest buildings on the adjacent property to the west. The locations were taken from the development plans on file with Grove City.

25. Label the right-of-way on the east side of Gantz Road consistently with the other rights-of-way.

The right-of-way on the east side of Gantz Road has been labeled to be consistent with the other rights-of-way.

26. Show the front setback at 30 feet per Grove City Code Table 1135.12-II.

The development plan has been revised to show a front setback of 30 feet.

27. Identify the garbage pick-up location.

Refuse and garbage generated from the church will be collected in dumpsters located on site.

28. Provide dumpster and mechanical equipment screening details. The dumpster should be screened in brick to match the main structure and should have stained wood gates.

Attached details –location shown on site plan

29. Label pipe sizes and grade of existing gravity sewers.

There are no existing gravity sewers on the property. As noted in the response to comment no. 3, the church proposes to extend a 6-inch lateral from the building to a manhole connection on the adjacent Village at Gantz Meadows sanitary sewer. The church will negotiate an easement for the permanent connection of the building lateral.

30. Provide a full stormwater management plan that includes pre- and post-developed drainage boundary exhibits and a stormwater management narrative/calculations that reflect how the proposed development will comply with the City's stormwater detention and post-construction water quality requirements with the construction submittal. Include the applicable water quality drawdown calculations to demonstrate compliance with the BMP requirements in Ohio EPA's General Permit.

A stormwater management report will be prepared for the site and submitted with the site improvement plans. The report will include figures showing the pre- and post-developed drainage boundaries of the site. The report will include a narrative explaining how the proposed site improvements will comply with the City's stormwater detention and post-construction water quality requirements. The report will include calculations to demonstrate compliance with the BMP requirements of Ohio EPA's General Permit No. OHC00004.

31. Provide calculations and design features that ensure the proposed wet basins meet the requirements of the Public and Private Pond Design Standards (available on the City's website).

Wet basins are planned and design features will be shown on the site improvement plans. Calculations will be provided in the stormwater management report that will be prepared as described in comment response to item. 30.

32. Comments not received

No response needed.

33. Comments not received

No response needed.

Canaan Land Church

2777 Gantz Road • Grove City, Ohio 43123 • 875-9255

To whom it may concern,

It is our desire to submit this letter and signatures as a reference of acceptance from the Building Committee of Canaan Land FWB Church.

Our intention is to accept & submit to the request of the city for the church to tap into the city sanitary system.

Signatures of Building Committee Board Members

- Richard L Bender - CCC Chairman
- [signature]
- Shaun Beaty
- Thomas E Damron
- Linda Sue Spiegel
- Randy Drake
-
-

RECEIVED
JUL 27 2015
GC PLANNING COMMISSION

1" = 40'

DISTURBED AREA=118,429 SF (2.719 AC)

EX FENCE

3 EX. CROSSES (TO BE RELOCATED)

INTERSTATE 270

R=11,309.16
CB=S 71° 05' 35" E
CH=736.97

TIME OF CONCENTRATION FLOW PATH
L=632 LF(CUT GRASS), 130 LF(PAVEMENT)
S=1.57%
Tc= 36 MIN

JACKSON TWP
CITY OF GROVE CITY

EX. LAWN

EX. LIGHT POLES (TO BE RELOCATED)

EXISTING VOLLEYBALL COURT (TO BE RELOCATED)

EX PAVEMENT

EX. LAWN

EX CONC PAD W/CANOPY

EX GARAGE

EX TRASH CONTAINERS

EX CB 1
TC=769.96
S. INV.=765.76
N. INV. =767.36

EX. CB 2
TC=780.59
S. INV. 774.29
E. INV. 774.39

EX. CB 3
TC=781.16
INV'S=775.81

EX CB 4
TC=779.60
S. INV.=776.70
N. INV. =776.50

EX. CB 5
TC=779.91
INV.=776.91

EX 12" STM

EX CONC

EXISTING CHURCH
1 STORY
FF=780.49

EXISTING CHURCH
(1 STORY)
FF=780.45

EX CONC

EX PAVEMENT

EX 8" GAS

237.90'

S45° 13' 44"W

EX POND
WSE=778.4

SOUTH DRAINAGE AREA
(OFFSITE EX DRAINAGE) 30" CULVERT UNDER HOME ROAD TO MARSH EX WATERCREEK
TOTAL AREA=121,975 SF (2.800 AC)

EX SANITARY

EX GAS

EX ELEC PED

EX SEPTIC TANK

EX LEACH FIELD

EX SIGN

IRON PIPE END

EX GUARD RAIL

INV.=772.45

ENTRANCE

GANTZ ROAD

EX. 16" WL

UNKNOWN CONNECTION

EX. INV. 771.63

10' ESMT

EX UG ELEC

EX 12" STM

R=889.93
CB=S 72° 29' 41"W
CH=52.22

EX LANDSCAPE PLANTER

5/8" REBAR END

EX. R/W

IRON PIPE END

INV.=756.32

STREET SIGN

TRAFFIC POLE

HYD

EX. 14"-30" STM @ 0.28%

EX. 16" WL

HOME ROAD

EXISTING ASPHALT BIKEPATH

APPROX. R/W LOCATION

INV.=755.83

MARSH RUN

EX. 16" WL

EX SAN. MH. #7
RIM 764.71
30" INV.=751.01(E&W)

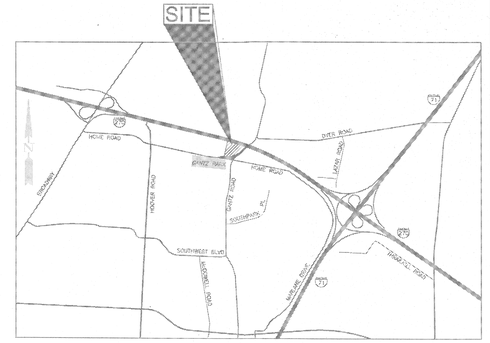
30' SANITARY SEWER EASEMENT

EX. 30" SAN. SEW.

EX. 12" WL

THIS PROJECT IS 100 YEAR FLOOD MAP RATED ZONE X PER FLOOD INSURANCE RATE MAP (FIRM), PANEL 318 OF 465, FRANKLIN COUNTY, OHIO MAP NUMBER 39049C0318K, JUNE 16, 2008.

STATE OF OHIO
STUART P. RAVARY
E-60041
REGISTERED PROFESSIONAL ENGINEER



LEGEND

SURFACE RUNOFF

STORM SEWER FLOW

SITE DATA
NORTH DRAINAGE AREA
(TO EXIST LOW POINT AND OFFSITE)
TOTAL AREA=168,153 SF=3.860 AC.
IMPERVIOUS AREA=56,113 SF= 1.288 AC (CONC., ASPHALT)
PERVIOUS AREA=112,040 SF= 2.572 AC (CUT GRASS)

SUMMARY OF FLOW TABLE
TOTAL SITE AREA=290,128 SF (6.660 AC)
TOTAL DISTURBED AREA=118,429 SF (2.719 AC)
AREA THAT FLOWS OFFSITE=121,975 SF (2.80 AC)

Q1YR=2.12 CFS

SITE AREA=6.660 ACRES TO R/W (290,128 SF)

FROM THE NATURAL RESOURCES CONSERVATION SERVICE, NRCS THE SITE SOIL DESCRIPTION IS:

CeB–CELINA SILT LOAM, 2–6 PERCENT SLOPES (1.1 AC.±)
(HYDROLOGIC SOIL GROUP 'C/D')
CeC2–CELINA SILT LOAM, 6–12 PERCENT SLOPES (1.3 AC.±)
(HYDROLOGIC SOIL GROUP 'C')
CrA–CROSBY SILT LOAM, SOUTHERN OHIO TILL PLAIN, 0–2 PERCENT SLOPES (4.1 AC.±)
(HYDROLOGIC SOIL GROUP 'C/D')
Mh–MEDWAY SILT LOAM, OCCASIONALLY FLOODED, (0.0 AC±)
Ut–UDORTHENTS–URBAN LAND COMPLEX, GENTLY ROLLING, (0.2± AC)

RECEIVED
JUL 27 2015
GC PLANNING COMMISSION

PROPOSED CURB

EXISTING LIGHT POLE

PROPOSED 32–FT HIGH "WIDELIGHT" LIGHT POLE

100–YEAR FLOOD PLAIN

CITY ADMINISTRATOR	DATE
SERVICE DIRECTOR	DATE
CITY OF GROVE CITY REVIEWER	DATE
JACKSON TOWNSHIP FIRE DEPARTMENT	DATE

CHURCH EXPANSION
CANAAN LAND CHURCH
2777 GANTZ ROAD
GROVE CITY, OHIO 43123

SHEET TITLE: EXISTING CONDITIONS

SCALE: 1" = 40'

SHEET: 1/3

CITY PROJECT NO. _____

DATE: JUNE, 2015

P:\Land Projects 3\Stone Environmental\Canaan Church_Grove City\dwg\Plan\CC BASE 7-15-15.dwg Thu, Jul 23, 2015 - 2:15pm

1" = 40'

EX. LAWN

EX FENCE

3 EX. CROSSES (TO BE RELOCATED)

PROPOSED NEW PAVEMENT AREA (NO CURBING AND LANDSCAPE ISLANDS)

INTERSTATE 270

R=11,309.16
CB=S 71° 05' 35" E
CH=736.97

TIME OF CONCENTRATION FLOW PATH
L=100 LF(CUT GRASS), 560 LF(PAVEMENT)
S=1.36%
Tc=18 MIN

JACKSON TWP.
CITY OF GROVE CITY

SITE BOUNDARY 582.60'

EX. LAWN

EX PAVEMENT

DROP OFF LANE

EX PAVEMENT

EX CB 1
TC=769.96
S. INV.=765.76
N. INV. =767.36

EX. CB 2
TC=780.59
S. INV. 774.29
E. INV. 774.39

EX. CB 3
TC=781.16
INV'S=775.81

EX CB 4
TC=779.60
S. INV.=776.70
N. INV. =776.50

EX. CB 5
TC=779.91
INV.=776.91

EX CONC PAD W/CANOPY

EX TRASH CONTAINERS

EX GARAGE

PROPOSED CHURCH ADDITION
1 STORY
FF=780.45

PORTA-COCHERE DROP OFF CANOPY

EX PAVEMENT

80% SHRUBERY SCREEN ALONG THE WEST PROPERTY LINE WITH A 3' HIGH MOUND

EX PAVEMENT

EX 12" STM

EX CONC

EX 12" STM

EX CONC

EXISTING CHURCH
1 STORY
FF=780.45

EXISTING CHURCH
(1 STORY)
FF=780.45

EX CONC

EX POND
WSE=778.4

SOUTH DRAINAGE AREA
(OFFSITE RUNOFF TO 30" CULVERT UNDER HOME ROAD TO MARSH RUN CREEK)
TOTAL AREA=121,975 SF (2.800 AC)

EX GM

EX WM

EXISTING SEPTIC TANK AND LEACH FIELD TO BE REMOVED AND DISPOSED OF

EX SAN

EX GAS

EX ELEC PED

EX SEPTIC TANK

EX LEACH FIELD

PROPOSED POND AREA

EX LEACH FIELD

EX SIGN

EX CURB INLET

INV.=772.45

PROPOSED POND AREA

IRON PIPE END

EX GUARD RAIL

S15° 13' 44" W
237.90'

GANTZ ROAD

ENTRANCE

EX. 16" WL

PROP. 90°-30" STM. SEW. @ 0.11%

EX. 12" STM

R=689.93
CB=S 72° 29' 41" W
CH=522.42'

EX LANDSCAPE PLANTER

INV.=

UNKNOWN CONNECTION

20"

12"

EX. LAWN

6"

12"

EX. UG ELEC

EX. TELE

EX. UG TELE

EX. UG

EX. GAS

SAN

EX. 12" STM

5/8" REBAR END

EX. R/W

PROPOSED EASEMENT

IRON PIPE END

PROP. 6" LATERAL TO BE CONNECT TO MANHOLE AT VILLAGES AT GANTZ MEADOWS

INV.=756.32

PROP. OUTLET CONTROL STRUCTURE W/ORIFICE PLATE

PROP. 100'-15" STM. SEW. @ 3.0%

INV.=764.00

STREET SIGN

HYD

TRAFFIC POLE

EX. 16" WL

HOME ROAD

EXISTING ASPHALT BIKEPATH

EX. 141'-30" STM @ 0.28%

APPROX. R/W LOCATION

INV.=755.93

MARSH RUN

EX. 16" WL

DIRECTIONAL BORE UNDER MARSH RUN CREEK FOR FM

30' SANITARY SEWER EASEMENT

PROPOSED 20" SAN. SEWER EASEMENT

16"

MARSH RUN

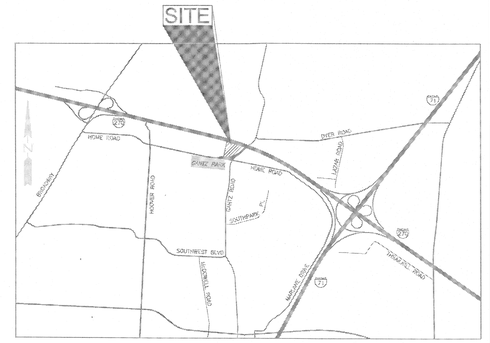
EX SAN. MH. #7
RIM 764.71
30" INV.=751.01(E&W)

EX. 30" SAN. SEW.

CONNECT 2" DIA FORCEMAIN TO MH #7

EX. 12" WL

THIS PROJECT IS 100 YEAR FLOOD MAP RATED ZONE X PER FLOOD INSURANCE RATE MAP (FIRM), PANEL 318 OF 465, FRANKLIN COUNTY, OHIO MAP NUMBER 39049C0318K, JUNE 16, 2008.



VICINITY MAP

LEGEND

SURFACE RUNOFF

STORM SEWER FLOW

NORTH DRAINAGE AREA
(TO PROPOSED DETENTION POND)
TOTAL AREA=162,283 SF=3.726 AC.
IMPERVIOUS AREA=115,191 SF= 2.644 AC (CONC., ASPHALT)
PERVIOUS AREA=41,222 SF= 0.946 AC (CUT GRASS, LANDSCAPING)

INCREASE IN NEW IMPERVIOUS SURFACE=115,191 SF-56,113 SF= 59,078 SF (105% INCREASE)

OFFSITE DRAINAGE AREA
(TO INTERSTATE 270 DRAINAGE SYSTEM)
TOTAL AREA=5,870 (CUT GRASS)

SUMMARY OF FLOW TABLE
TOTAL SITE AREA=290,128 SF (6.660 AC)
TOTAL DISTURBED AREA=118,429 SF (2.719 AC)
AREA THAT FLOWS OFFSITE=121,975 SF + 5,870 SF=127,845 SF(2.935 AC)
AREA THAT FLOWS TO DETENTION=156,413 SF (3.591 AC)

Q1YR=5.87 CFS

CRITICAL STORM CALCULATION:
PERCENT INCREASE IN 1-YEAR PRE-DEVELOPMENT TO 1 YR POST-DEVELOPMENT=2.12 CFS TO 5.87 CFS = 177% INCREASE: THEREFORE CRITICAL STORM IS 25 YEAR STORM

FIRST FLUSH WATER QUALITY VOLUME=2,992 CF RELEASED @ 0.035 CFS OVER 24 HOURS.

PROPOSED CURB

EXISTING LIGHT POLE

PROPOSED 32-FT HIGH "WIDELIGHT" LIGHT POLE

100-YEAR FLOOD PLAIN

CITY ADMINISTRATOR	DATE
SERVICE DIRECTOR	DATE
CITY OF GROVE CITY REVIEWER	DATE
JACKSON TOWNSHIP FIRE DEPARTMENT	DATE

CHURCH EXPANSION
CANAAN LAND CHURCH
2777 GANTZ ROAD
GROVE CITY, OHIO 43123

SHEET TITLE: POST DEVELOPMENT DRAINAGE PLAN

SCALE: 1" = 40'

SHEET: 2/3

CITY PROJECT NO. _____

DATE: JUNE, 2015

P:\Land Projects 3\Stone Environmental\Canaan Church, Grove City\dwg\Plan\CC BASE 7-15-15.dwg Thu, Jul 23, 2015 - 2:13pm

1" = 40'

QUERCUS RUBRA (RED OAK) TYP.

3 EX. CROSSES (TO BE RELOCATED)

EX FENCE

PROPOSED NEW PAVEMENT AREA (NO CURBING AND LANDSCAPE ISLANDS)

INTERSTATE 270

EX. LAWN

R=11,309.16
CB=S 71° 05' 35" E
CH=736.97

EX. LIGHT POLES (TO BE RELOCATED)

JACKSON TWP
CITY OF GROVE CITY

GLEDITSIA TRIACONTHES VAR. INERMIS (HONEY LOCUST) TYP.

EX CB 1
TC=769.96
S. INV.=765.76
N. INV. =767.36

EX. CB 2
TC=780.59
S. INV. 774.29
E. INV. 774.39

EX. CB 3
TC=781.16
INV'S=775.81

EX CB 4
TC=779.60
S. INV.=776.70
N. INV. =776.50

EX. CB 5
TC=779.91
INV.=776.91

EXISTING VOLLEYBALL COURT (TO BE RELOCATED)

EX PAVEMENT

DROP OFF LANE

EX. LAWN

BM#1

EX CONC PAD W/CANOPY

EX TRASH CONTAINERS

EX GARAGE

PROPOSED CHURCH ADDITION
1 STORY
FF=780.45

PORTA-COCHERE DROP OFF CANOPY

EX PAVEMENT

80% SHRUBERY SCREEN ALONG THE WEST PROPERTY LINE WITH A 3' HIGH MOUND

EX PAVEMENT

EX 12" STM

EX CONC

EXISTING CHURCH
(1 STORY)
FF=780.45

EX CONC

EXISTING CHURCH
1 STORY
FF=780.49

EX POND
WSE=778.4

EX GM

EX WM

EXISTING SEPTIC TANK AND LEACH FIELD TO BE REMOVED AND DISPOSED OF

EX SAN

EX GAS

EX ELEC PED

EX SEPTIC TANK

EX LEACH FIELD

PROPOSED POND AREA

EX SIGN

EX

INV.=772.45

ENTRANCE

GANTZ ROAD

EX. 16" WL

UNKNOWN CONNECTION

EX. INV. ELEV. 765.0

EX. LAWN

EX UG ELEC

10' ESMT

5/8" REBAR FND

EX R/W

PROPOSED EASEMENT

IRON PIPE END

EMES INV.=756.32

PROP. 6" LATERAL TO BE CONNECT TO MANHOLE AT VILLAGES AT GANTZ MEADOWS

PROP. 90'-30" STM. SEW. @ 0.11%

EX. 12" STM

R=869.93
CB=S 72° 29' 41" W
CH=532.12

EX LANDSCAPE PLANTER

INV.=768

PROP. OUTLET CONTROL STRUCTURE W/ORIFICE PLATE

PROP. 100'-15" STM. SEW. @ 3.0%

WATER SURFACE ELEVATION OF POND

STREET SIGN

TRAFFIC POLE

HYD

EX. 16" WL

HOME ROAD

EXISTING ASPHALT BIKEPATH

EX. 114' 50" STM @ 1.28%

APPROX. R/W LOCATION

MARSH RUN

DIRECTIONAL BORE UNDER MARSH RUN CREEK FOR FM

30' SANITARY SEWER EASEMENT

PROPOSED 30" SAN. SEW. EASEMENT

EX. 16" WL

EX. 30" SAN. SEW.

EX SAN. MH. #7
RIM 764.71
30" INV.=751.01(E&W)

CONNECT 2" DIA FORCEMAIN TO MH #7

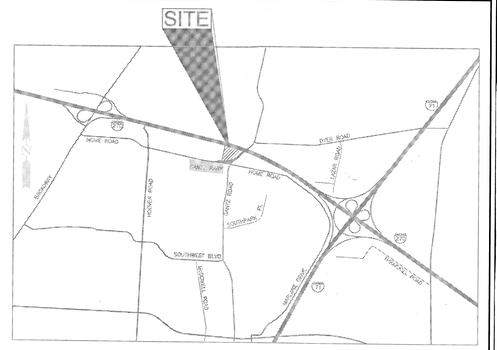
EX. 12" WL

BENCHMARKS:

REFERENCE B.M. M 310 UNITED STATES COASTAL AND GEODETIC BENCHMARK, A BRASS DISK STAMPED "M 310 1967" FOUND AT THE SOUTHWESTERLY CORNER OF THE INTERSECTION OF SOUTH HIGH STREET AND HOSACK STREET, 23 FEET SOUTH OF THE EXTENDED CENTERLINE OF HOSACK STREET, 18-1/2 FEET WEST OF THE WEST CURB OF SOUTH HIGH STREET. ELEV.=747.49' (NGVD 1929) – (746.89' – NAVD 1988)

B.M. #1 CHISELED BOX SET IN THE TOP OF A CONCRETE LIGHT POLE BASE, APPROX. 100' E. OF THE E. PROPERTY LINE OF SUBJECT PROPERTY AND 200' S. OF THE NORTH PROPERTY LINE, JUST NORTH OF THE CHURCH ON THE WEST SIDE OF THE PARKING LOT AT THE SOUTHEAST CORNER OF A COVERED SHELTER. ELEV.=784.43' (NGVD 1929)

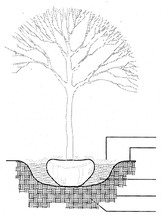
B.M. #2 RAILROAD SPIKE FOUND AT IN THE SOUTH SIDE OF A UTILITY POLE NEAR THE SOUTWEST PROPERTY CORNER. ELEV.=759.29' (NGVD 1929)



VICINITY MAP

LEGEND

- EXISTING LIGHT POLE
- PROPOSED 32-FT HIGH "WIDELIGHT" LIGHT POLE
- PROPOSED ASPHALT PAVEMENT (NO CURB AND LANDSCAPE ISLANDS)
- QUERCUS RUBRA (RED OAK)
- GLEDITSIA TRIACONTHES VAR. INERMIS (HONEY LOCUST)

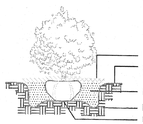


NOTES:

1. TOP OF ROOT BALL TO BE 2"-3" ABOVE ADJACENT FINISH GRADE
2. REMOVE ROPE AND BURLAP FROM TOP 1/3 OF ROOT BALL CUT TOP 1/3 OF WIRE BASKET FROM ROOT BALL. REMOVE ALL LABELS, TAGS OR OTHER FOREIGN MATERIALS FROM LIMBS.

HARDWOOD BARK MULCH
FINISH GRADE
BACKFILL PLANTING MIX
EXISTING SOIL
UNDISTURBED SOIL OR COMPACTED BACKFILL

TREE PLANTING
NTS



NOTES:

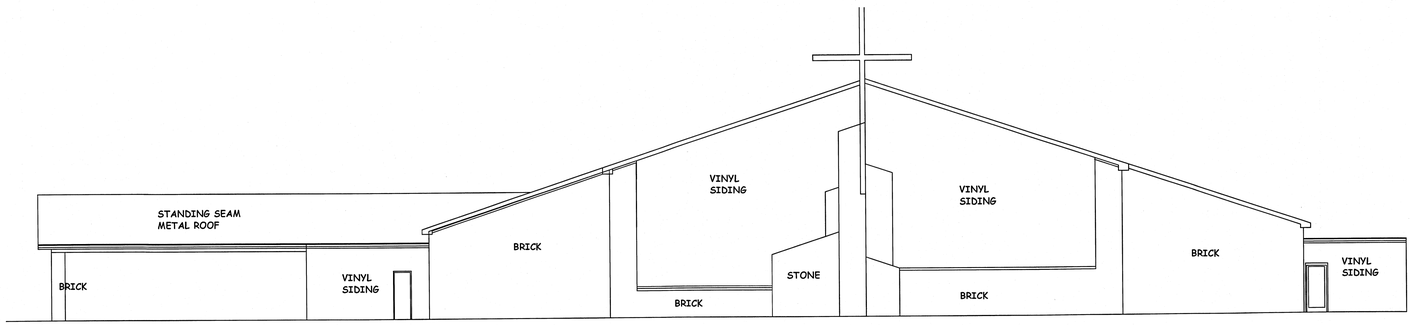
1. TOP OF ROOT BALL TO BE 2"-3" ABOVE ADJACENT FINISH GRADE
2. REMOVE ROPE AND BURLAP FROM TOP 1/3 OF ROOT BALL. REMOVE ALL LABELS, TAGS OR OTHER FOREIGN MATERIALS FROM LIMBS.

HARDWOOD BARK MULCH
FINISH GRADE
BACKFILL PLANTING MIX
EXISTING SOIL
UNDISTURBED SOIL OR COMPACTED BACKFILL

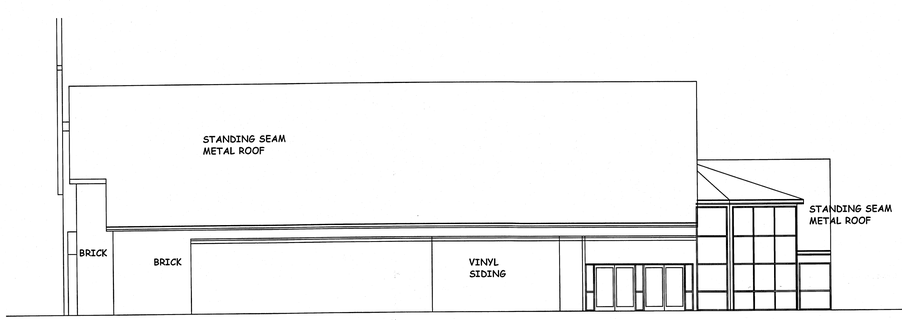
SHRUB PLANTING
NTS

CITY ADMINISTRATOR DATE	CHURCH EXPANSION CANAAN LAND CHURCH 2777 GANTZ ROAD GROVE CITY, OHIO 43123
SERVICE DIRECTOR DATE	SHEET TITLE: LANDSCAPE PLAN
CITY OF GROVE CITY REVIEWER DATE	SCALE: 1" = 40' / SHEET: 3/3
JACKSON TOWNSHIP FIRE DEPARTMENT DATE	CITY PROJECT NO. _____ / DATE: JUNE, 2015

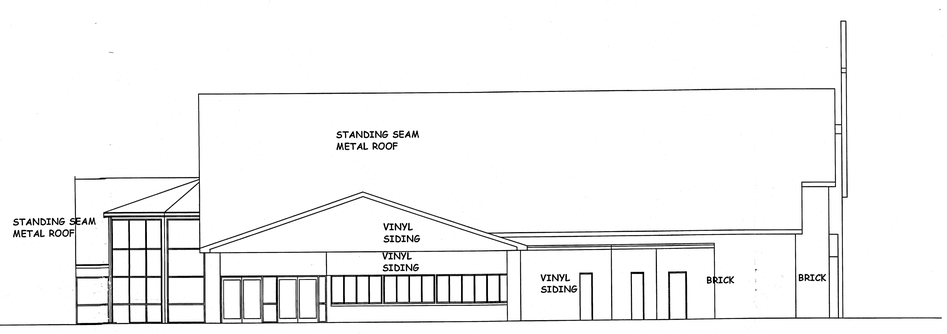
P:\Land Projects 3\Stone Environmental\Canaan Church_Grove City\dwg\Plan\CC BASE 7-15-15.dwg Thu, Jul 23, 2015 - 2:17pm



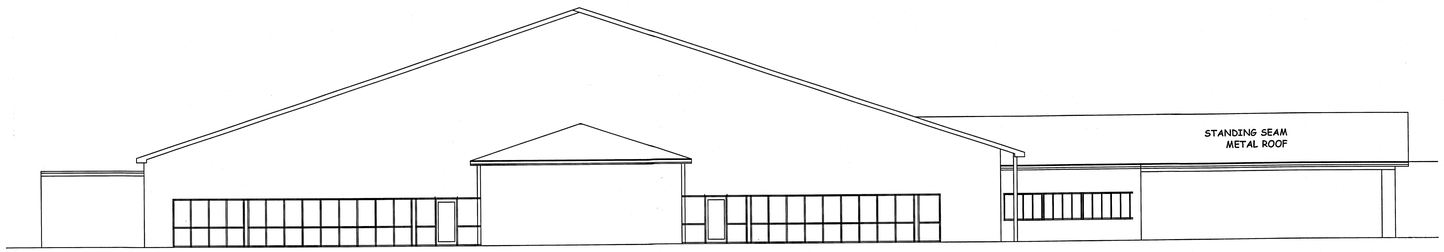
NORTH ELEVATION



WEST ELEVATION



EAST ELEVATION



NORTH ELEVATION

THE COVENANT GROUP

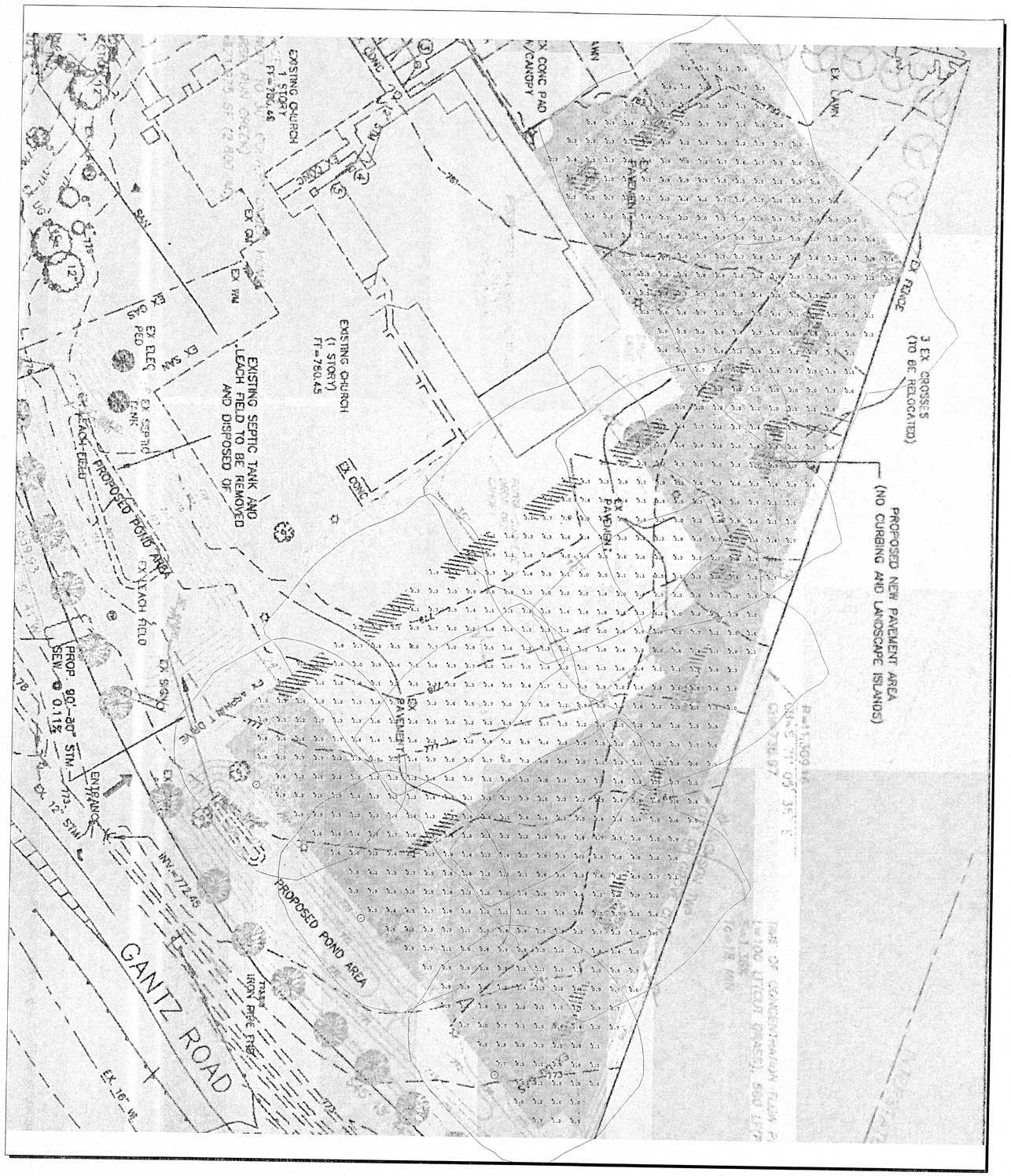
37 LOUELLA DRIVE
HEBRON, OH

ADDITION TO
CANAAN LAND FWB CHURCH
GANTZ ROAD
GROVE CITY, OHIO

REVISIONS

DATE
7-15-15

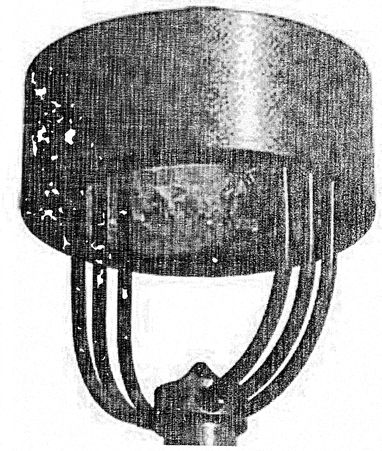
301



Luminaire Schedule						
Symbol	Qty	Label	Arrangement	Lumens/Lamp	Description	LLF
→	8	P5	SINGLE	40000	RSBPT25-V-SQ-400PSMH	0.850
→	3	P4	SINGLE	40000	RSBPT25-IV-400PSMH	0.850

Calculation Summary							
Label	CalcType	Units	Avg	Max	Min	Avg/Min	Max/Min
CalcPts_1	Illuminance	Fc	2.41	8.5	0.3	8.03	28.33

Notes:
1. Fixtures are mounted at 30'
2. Isolines are 0.25fc
3. Scale is 1"=40' if printed at 24x36



Cannan Church Parking Lot

Proposed Lighting Analysis

prepared by: Alec Vink

Lighting Systems
Of Columbus, Inc.

Lighting Systems of Columbus
8877 Whitney Drive
Lewis Center, Ohio 43035
v. 614.876-6722
www.lightingsystemscol.com

project name lighting analysis.agi 000014

RECEIVED
JUL 27 2015
GC PLANNING COMMISSION

RECEIVED
JUL 27 2015
GC PLANNING COMMISSION

Canaan Land FWB Church

2777 Gantz Road

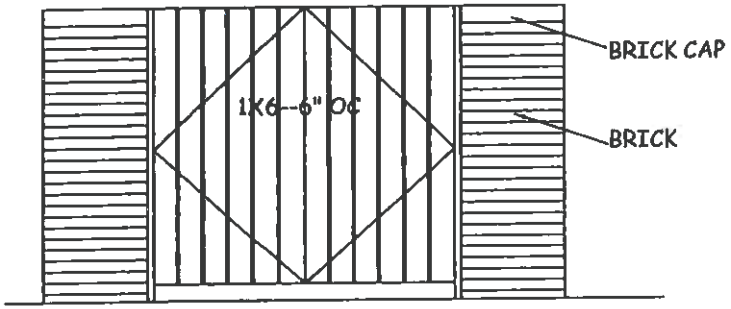
Grove City, Ohio

Exterior Material List

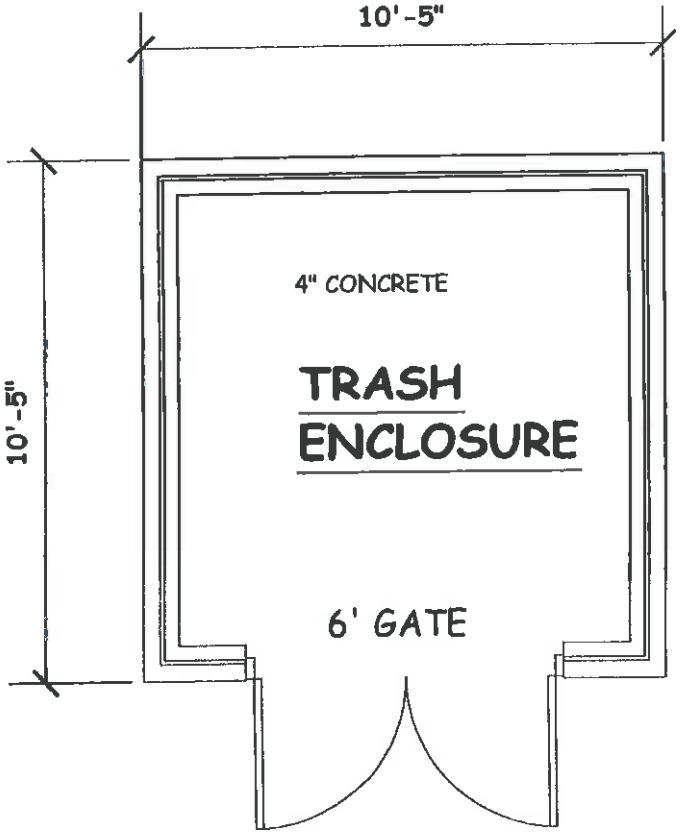
July 25, 2015

Material	Supplier	Color
-Brick	Hamilton Parker	Admiral Red Valour
-Siding	Certainteed	Sandstone Beige
-Stone	Dutch Quality	Sagewood Field Stone
-Fascia	Hager	White
-Roof	Chief Buildings Standing Seam	Fieldstone
-Storefront	Kawneer Tri-fab 451	Solar Bronze Aluminum 5/8" Clear Glass

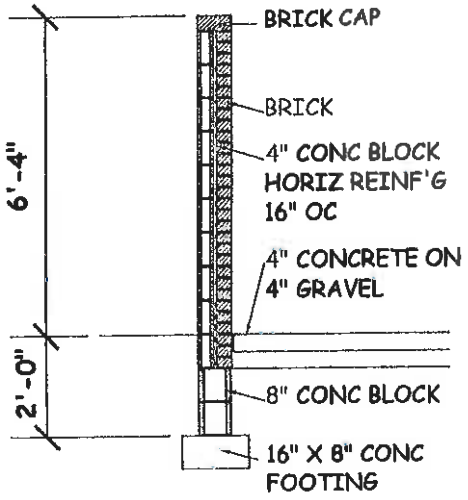
RECEIVED
JUL 27 2015
GC PLANNING COMMISSION



ELEVATION



PLAN



SECTION

PROJECT NAME:

FIXTURE TYPE:

RECEIVED
JUL 27 2015
GC PLANNING COMMISSION

H.I.D. AREA LIGHTING

RSBPT SERIES-HID

S P E C I F I C A T I O N S

HOUSING
Heavy wall spun aluminum construction. Entire housing surface shall be free of welds or seams. 3"x5"x6" long heavy wall extruded aluminum arm is secured to housing and to pole with stainless steel rods.

ARM
Four (4) extruded aluminum (.84" O.D.) arms welded to a cast aluminum pole top fitter. Arms are internally welded to housing.

LENS ASSEMBLY
One piece hinged heavy gauge die formed aluminum door frame surrounds 3/16" clear tempered flat glass lens. Glass is sealed to door with high temperature silicone seal. Captive thumb screw disengages lens assemble and activates Accuhinge™ hinge to allow lens assembly to hinge away from housing for luminaire access without the use of tools

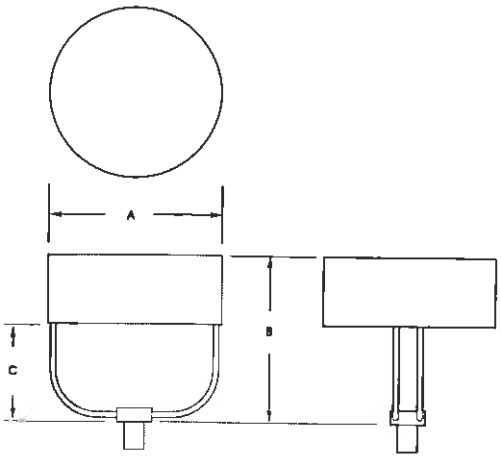
REFLECTOR MODULE
Specular Alzak® optical segments rigidly mounted in an aluminum frame, which attaches to the housing as a one piece module. Reflector module is field rotatable in 90° increments and may be rotated or removed without the use of tools. Reflector modules are factory prewired with a quick-disconnect plug. Sockets are porcelain 4KV pulse rated, medium base (E26) for 50W – 150W or bi-pin (G12) for 70W and 150W; mogul base (E39) for 200W; pin oriented mogul base (E39) for 200W – 400W. Special for 210W and 315W CDM Elite lamp base is PGZ18. Lamp is horizontally mounted.

ELECTRICAL COMPONENTS
All electrical components are UL and cUL recognized mounted on a single plate and factory wired with quick-disconnect. Electrical module attaches to housing with toolless hinge and latch. Electronic MH ballasts have power factor of >.95, -20°F starting, 120-277V 50Hz/60Hz and have lamp End-of-life protection. Special for Philips MasterColor CDM Elite: Electronic MH ballast has a power factor of >.90 (210W & 315W), -4°F starting, 200 - 277V, 50Hz/60Hz and has lamp End-of-life protection. 315W electronic MH ballast has 0 – 10V dimming capability. Magnetic MH ballasts are high power factor (70W – 150W) or CWA (250W), -20°F starting, multi-tap 120-277V, 60Hz. All HPS ballasts are core and coil, high-reactance, high power factor (70W – 150W) or CWA (200W – 400W), -40°F starting.

FINISH
Electrostatically applied TGIC Polyester Powder Coat on substrate prepared with 20 PSI power wash at 140° F. Four step iron phosphate pretreatment for protection and paint adhesion. 400°F bake for maximum hardness and durability. Texture finish is standard.

RSBPT

PATENT PENDING



FIXTURE	A	B	C
RSBPT325	25" 635mm	24" 610mm	14" 356mm
RSBPT318	18" 457mm	18" 457mm	10" 254mm

LPC Light Pollution Control Classification System
Full cutoff 0% Uplight Luminaire

UL U.L. Listed for wet location

MADE IN THE USA

2014251

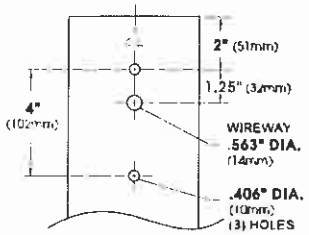
U.S. Architectural Lighting
660 West Avenue O Palmdale CA 93551
Phone (661) 233-2000 Fax (661) 233-2001
www.usalfg.com

U.S. ARCHITECTURAL LIGHTING

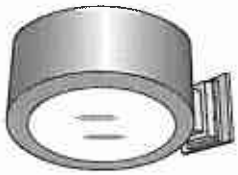
RSBPT SERIES - HID

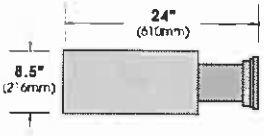
SPECIFICATIONS

POLE DRILLING TEMPLATE



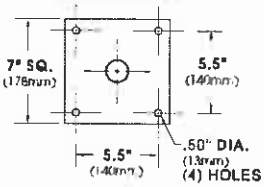
WALL MOUNT



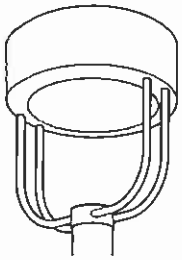


ARM BRACKET EXTRUDED AND CAST ALUMINUM CONSTRUCTION.

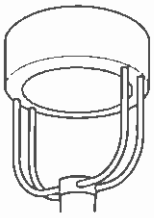
WALL PLATE



E.P.A. & LAMP WATTAGE



RSBPT25 E.P.A.= 1.48
LAMP SIZE: 100 - 400 WATT



RSBPT18 E.P.A.= 1.04
LAMP SIZE: 50 - 150 WATT

Spec/Order Example: RSBPT18/150PSMH347/II/3-90/RAL-9005-T/SF

SPEC/ORDERING INFORMATION

MODEL	WATTAGE TYPE VOLTAGE	OPTICS	MOUNTING	FINISH	OPTIONS

MODEL

STANDARD FLAT GLASS LENS

☐ RSBPT25

☐ RSBPT18

FOR CONVEX LENS USE "CG" SELECTION IN OPTIONS COLUMN

LAMP

STANDARD MAGNETIC BALLAST

☐ 400[4] ☐ 350[4] ☐ 320[4] ☐ 315[5] ☐ 250 ☐ 210[5] ☐ 200[3] ☐ 175[5] ☐ 150T[2] ☐ 150 ☐ 100

☐ PSMH ☐ HPS

☐ 120 ☐ 208 ☐ 240 ☐ 277 ☐ 347 (CAN) ☐ 480

NOTES:
1 – 120-277V ONLY
2 – G12 BASE
3 – POSITION SENSITIVE LAMP
4 – "E" BALLAST NOT AVAILABLE
5 – PGZ18 BASE

☐ E[1] (ELECTRONIC)

STANDARD MAGNETIC BALLAST

☐ 150T[2] ☐ 150 ☐ 100 ☐ 70T[2] ☐ 70 ☐ 50

☐ PSMH ☐ HPS

☐ 120 ☐ 208 ☐ 240 ☐ 277 ☐ 347 (CAN) ☐ 480

☐ E[1] (ELECTRONIC)

CONSULT FACTORY FOR OTHER BALLAST CONFIGURATIONS AND LAMP OPTIONS

OPTICS

☐ TYPE II
HR - III. .....

☐ TYPE III
HR - IV .....
(FORWARD THROW)

☐ TYPE IV
HR - IV .....
(FORWARD THROW)

☐ TYPE V-SQ
HR - V - SQ .....

☐ FORWARD THROW
(HOUSE SIDE CUT-OFF)
HR - FT -HSC .....

MOUNTING

ARM MOUNT

☐ 1 .....

☐ 2-180 .....

☐ 2-90 .....

☐ 3-90 .....

☐ 3-120 .....

☐ 4-90 .....

WALL MOUNT

☐ WM .....

POST TOP

☐ PT .....

FINISH

STANDARD TEXTURED FINISH

☐ BLACK RAL-9005-T

☐ WHITE RAL-9003-T

☐ GREY RAL-7004-T

☐ DARK BRONZE RAL-8019-T

☐ GREEN RAL-6005-T

FOR SMOOTH FINISH REPLACE SUFFIX "T" WITH SUFFIX "S" (EXAMPLE RAL-9500-S)

SEE USALTG.COM FOR ADDITIONAL COLORS

OPTIONS

HOUSE SIDE SHIELD
☐ 90 .... HS 90°
☐ 135 ... HS 135°
☐ 180 ... HS 180°

☐ PHOTO CELL + VOLTAGE (EXAMPLE PC120V) ... PC+V

☐ SINGLE FUSE (120V 277V) ..... SF

☐ DOUBLE FUSE (208V, 240V, 480V) ..... DF

☐ HIGH-LOW DIMMING FOR HARDWIRED SWITCHING OR NON-INTEGRATED MOTION SENSOR ..... HLSW

☐ CONVEX GLASS ..... CG

U.S. Architectural Lighting
660 West Avenue O, Palmdale CA 93551
Phone (661) 233-2000 Fax (661) 233-2001
www.usaltg.com

U.S. ARCHITECTURAL LIGHTING

AL3 Series

Spectra III Area Luminaire, 150-450W HID

Type:	Job:	Page 2 of 6

Series/Source-Wattage[1]

Pulse Start Metal Halide

- ☐ AL3P-150
- ☐ AL3P-175
- ☐ AL3P-250
- ☐ AL3P-320
- ☐ AL3P-350
- ☐ AL3P-400
- ☐ AL3P-450[2,3]

High Pressure Sodium

- ☐ AL3S-150
- ☐ AL3S-250
- ☐ AL3S-400

Optics (Distribution)

AL3 Type IV optics include an internal house side shield. Consult factory to specify Type IV optics without internal house side shield.

Vertical lamp
Full Cutoff, Flat Glass[4]

- ☐ 2F Type II
- ☐ 3F Type III
- ☐ 4F Type IV
- ☐ 5F Type V

Vertical lamp
Cutoff / Semi-Cutoff, Sag Glass[5]

- ☐ 2V Type II
- ☐ 3V Type III
- ☐ 4V Type IV
- ☐ 5V Type V

Horizontal lamp
Full Cutoff, Flat Glass

- ☐ 2H Type II
- ☐ 3H Type III
- ☐ 4H Type IV
- ☐ 5H Type V

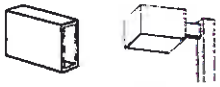
Distribution Patterns

Voltage

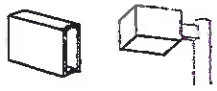
- ☐ 120
- ☐ 208
- ☐ 240
- ☐ 277
- ☐ 480
- ☐ QV[6]

Mounting[7]

- ☐ **SS** Surface arm mount to square pole *(standard)*



- ☐ **SR(X)**[8] Surface arm mount to round pole
  Mounting edge of arm is contoured to match pole radius.



- ☐ **H** HIBRED Arm System *(HID/LED Night Ambient Series (HiB)*
  See current HIBRED spec sheet WLSP0278 to specify AL3 HIBRED system. Not available in 480V.
- ☐ **DM** Direct mount to square pole
  Luminaire housing mounts flush to pole without the use of mounting arms. 1@90 or 2@180 mount only.

- ☐ **SA2**[9] Adjustable arm mount to square pole *Includes transition plate.*

- ☐ **MA2** Adjustable mastfitter mount to 2-3/8" O.D. tenon
  Includes transition plate.

- ☐ **RTA-(X)-(Y)**[10,11] Round pole tenon adapter
  Slipfitter for Round Pole with 2.375" O.D. x 4" vertical tenon. 9" arm included.

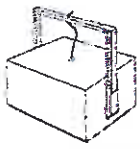
- ☐ **SPTA-(X)-2.375**[10] Square pole tenon adapter
  Slipfitter for Square Pole with 2.375" O.D. x 4" vertical tenon. 9" arm included.

- ☐ **WB** Wall mount bracket

- ☐ **WBA** Wall mount bracket with 6" arm

- ☐ **PT(XY)**[12] Post top yoke mount

- ☐ **Y** Trunnion yoke mount



Options (Factory installed)

- ☐ **BL** Bi-Level dimming
- ☐ **CSR** Hot Quartz Restrike
- ☐ **LQ** Hot/Cold Quartz Restrike
- ☐ **LQ1** Separately Wired (120V) Quartz Restrike
- ☐ **F1** Single Fuse (120/277V)
- ☐ **F2** Double Fuse (208/240/480V)
- ☐ **TLR** Twist-Lock Photocell Receptacle
- ☐ **TLR-PC(***)V** Twist-Lock Receptacle with Photocell
  Specify voltage. 480V not available.
- ☐ **PCB(***)V** Photocell Button
  Specify voltage. 480V not available.
- ☐ **HSS-H-AL3** Internal House Side Shield (for flat glass optics)
  (internal house side shield is standard with Type IV optics)
- ☐ **HSS-V-AL3** Internal House Side Shield (for sag glass optics)
  (internal house side shield is standard with Type IV optics)
- ☐ **ASL** Acrylic Sag Lens
- ☐ **SLS** Stabilux Socket (for H optics only)
- ☐ **DS(XX)** Decorative Striping
  XX = color: 01 = White, 02 = Black, 03 = Gold metallic, 04 = Red, 05 = Silver metallic, 08 = Blue, 69 = Dark Green

Finish

- ☐ **SA** Satin Aluminum
- ☐ **BK** Black
- ☐ **DB** Dark Bronze
- ☐ **WH** White
- ☐ **GR** Gray
- ☐ **GN** Green

Accessories (Ordered Separately)

- ☐ **F1-KIT** Single Fuse Kit (120/277V)
- ☐ **F2-KIT** Double Fuse Kit (208/240/480V)
- ☐ **HSS-H-AL3** Internal House Side Shield (for flat glass optics)
  (internal house side shield is standard with Type IV optics)
- ☐ **HSS-V-AL3** Internal House Side Shield (for sag glass optics)
  (internal house side shield is standard with Type IV optics)
- ☐ **SK-AL3-(F)** External Glare Shield
  F = Specify finish

Notes

1) Depth of housing dependent on wattage.
2) 2H reflector not available.
3) Vertical burn lamp only, at time of publication.
4) 400 watt and below, Pulse Start Metal Halide only.
5) Cutoff distribution at 150-400 watts. Semi-Cutoff at 450 watts.
6) Allows field selection of 120/208/240/277V. (No 480V). Certain options require voltage selection as well.
7) Refer to page 6 for Drill Templates.
8) X = Specify pole size: (3.5 / 4)" OD; (4 / 5)" OD.
9) May be used in the following configurations only: 1 @ 90°; 2 @ 180°.
10) X = Specify configuration: 1 @ 90°; 2 @ 90°; 3 @ 90°; 4 @ 90°; 2 @ 180°; 2 @ 120°; 3 @ 120°.
11) Y = Specify tenon size: 2.375" OD x 4" tall; 3 / 3.5" OD x 6" tall; 3.5 / 4" OD x 6" tall.
12) XY = Specify pole size and type: 4S, 5S, 2.375R, 3R, or 4R.

Philips Wide-Lite reserves the right to change specifications and dimensions without notice. Lamp and electrical specifications / availability subject to change by manufacturer without notice. Please refer to detailed specification sheets for additional information and spec details.

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Bulletin No. WLSP0126J0512

PHILIPS
WideLite

AL3 Series

Spectra III Area Luminaire, 150-450W HID

Type:	Job:	Approvals:
Catalog Number:		
Series/Source-Wattage	Optics (Distribution) / Voltage / Mounting / Options (Factory Installed) / Finish / Accessories (Field Installed)	Date:
		Page 1 of 6

Overall Dimensions

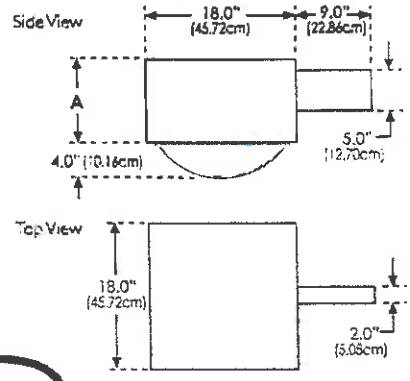
For Reference Only

150-400 Watt non dimming unit	A = 10.00" (25.40cm) B = 27.25" (69.22cm)
450 Watt non dimming or 150-400 Watt Bi-Level unit	A = 12.00" (30.48cm) B = 29.25" (74.30cm)

AL3 arm mount

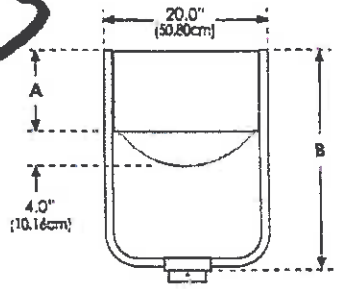
SS

Surface Arm Mount to Square Pole (standard)

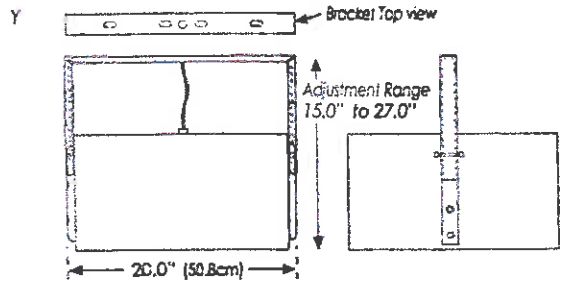


AL3 post top mount

PT(XY)



AL3 trunnion yoke mount



Weight	150 - 400W	450
	50 lbs. (22.68 kgs)	82 lbs. (37.19 kgs)

EPA data shown on page 3.

Specifications

Housing

Formed aluminum sheet metal housing and top. The sides and top shall be mechanically and chemically sealed to ensure a rain-tight seal. Standard unit constructed to IP54.

Optical Module

Rotatable multi-faceted segmented reflectors shall be made of high purity, anodized "Super Sheet" aluminum with an inorganic dielectric coating, producing a minimum reflectivity of 94% for optimum efficiency. Optical assemblies shall be field rotatable at 90° increments and exchangeable. Lamp orientation and lens flexibility allow the AL3 Series (Spectra III Area Luminaire) to provide optics meeting the IES definitions of Full Cutoff, Cutoff, and Semi-Cutoff. "F" optics (available for 400W max Pulse Start Metal Halide only) combine standard flat glass lens with vertical lamp orientation to achieve Full Cutoff and is Dark Sky Ordinance compliant.

Lamp Access

Door frame shall be mitered anodized aluminum extrusion, gasketed to ensure a positive seal to the housing.

Lens

Lens shall be tempered glass to withstand thermal and physical shock. (Flat glass or sag glass is determined by wattage and type of optics specified.)

Socket

A porcelain, 4KV pulse-rated, grip-type, mogul based socket shall be used to prevent lamp loosening and to maintain proper lamp positioning. Optional Stabilux lamp socket is available for horizontal lamps to provide added protection to reduce lamp breakage due to mechanical shock and vibration.

Ballast

Ballast shall be high power factor with reliable starting at temperatures as low as -29°C (-20°F) for Metal Halide, -34°C (-30°F) for Pulse Start Metal Halide, and -40°C (-40°F) for High Pressure Sodium. Crest factor does not exceed 1.8. Class H, 180°C (356°F) rated insulation system.

Mounting

Surface arm mount (field installed) shall be of heavy gauge extruded aluminum. Threaded tension rods shall be used to bolt to square (standard) or round poles. Optional post top mount shall allow fixture to be mounted to square or round poles or tenons. Additional mounting options include direct mount to square pole, an adjustable arm mount, an adjustable mastfitter, a wall mount bracket (with or without arm), a trunnion yoke mount, and pole top tenon adapters with arm mount for square and round poles.

Finish

Finish color options include Satin Aluminum, Black, Dark Bronze, White, Grey and Green. Finishes are a polyester powder coating, 2.5 mil nominal thickness, electrostatically applied and oven cured to ensure extreme durability. Other colors may be specified. Decorative striping option also available

Listings

ETL/cETL listed to the UL 1598 standard, suitable for Wet Locations. The quality systems of this facility have been Registered by UL to the ISO 9000 Series Standards.

Warranty / Terms and Conditions

Mechanical, finish and electrical shall be covered by a limited 3-year warranty. Warranty is 1-year when purchased with the ASL (acrylic sag lens) option.

The current Philips Wide-Lite Warranty may be found at www.wide-lite.com (keyword: warranty) as well as the current Standard Terms and Conditions of Sale (keyword: terms).

All sales of items in this catalogue shall be subject to the Philips Wide-Lite Standard Terms and Conditions of Sale current at the time of shipment. If you do not have a copy of the Philips Wide-Lite Warranty and Standard Terms, please contact the factory for same prior to ordering.

(Hg) Some luminaires use fluorescent or high-intensity discharge (HID) lamps that contain small amounts of mercury. Such lamps are labeled 'Contain Mercury' and/or with the symbol 'Hg'. Lamps that contain mercury must be disposed of in accordance with local requirements. Information regarding lamp recycle and disposal can be found at *www.lamprecycle.org*.

Philips Wide-Lite reserves the right to change specifications and dimensions without notice. Lamp and electrical specifications / availability subject to change by manufacturer without notice. Please refer to detailed specification sheets for additional information and spec details.

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Bulletin No. WLSP0126J0512

PHILIPS WideLite

1" = 40'

DISTURBED AREA = 118,427 SF (2.719 AC)

3 EX CROSSES (TO BE RELOCATED)

EX FENCE

EX LAWN

R=11,309.16'
CB=S 71° 05' 38" E
CH=736.97

TIME OF CONCENTRATION FLOW PATH
L=632 LF(CUT GRASS), 130 LF(PAVEMENT)
S=1.57%
Tc= 20 MIN

EX LIGHT POLES (TO BE RELOCATED)

EX PAVEMENT

EX PAVEMENT

EX CB 1
TC=769.96
S INV=765.76
N INV =767.36

EX CB 2
TC=780.59
S INV 774.29
E INV 774.39

EX CB 3
TC=781.16
INV'S=775.81

EX CB 4
TC=779.60
S INV = 776.70
N INV =776.50

EX CB 5
TC=779.91
INV=776.91

EXISTING VOLLEYBALL COURT (TO BE RELOCATED)

EX LAWN

EX CONC PAD W/CANOPY

EX GARAGE

EX TRASH CONTAINERS

EX PAVEMENT

EX 12" STM

EX CONC

EX STM

EXISTING CHURCH (1 STORY) FF=780.65

EXISTING CHURCH 1 STORY FF=780.49

EX CONC

EX POND WSE=778.4

PROPOSED AREA TO BE DISTURBED (OFFSITE)
EX CMP TO BE REPLACED W/ 30" GALVANIZED UNDER WORK ROAD BY MARSH RUN EX WW RELIEF
TOTAL AREA=121,675 SF (2.793 AC)

EX SAN MH #8
RIM 772.45
8" INV = 762.45 (E)

EX SIGN

EX LEACH FIELD

EX SEPTIC TANK

EX ELEC PED

EX SAN

EX GAS

UNKNOWN CONNECTION

EX LAWN

EX UG ELEC

EX 6" INV. EL=774.63

5/8" REBAR FND

IRON PIPE FND

EX 16" W

EX 12" STM

EX LANDSCAPE PLANTER

INV=772.45

EX GUARD RAIL

IRON PIPE FND

GANTZ ROAD

ENTRANCE

EX 16" W

EX 12" W

EX 10" STM @ 28%

EX 14" S

INV=755.93

HOME ROAD

EXISTING ASPHALT BIKEPATH

APPROX R/W LOCATION

MARSH RUN

MARSH RUN

EX 16" W

EX 16" W

30' SANITARY SEWER EASEMENT

EX 30" SAN SEW

EX SAN MH #7
RIM 764.71
30" INV = 751.01(E&W)

EX 12" W

STREET SIGN

TRAFFIC POLE

HYD

EX 8" W

EX 6" W

EX 4" W

EX 2" W

EX 1" W

EX 3/4" W

EX 1 1/2" W

EX 2" W

EX 4" W

EX 6" W

EX 8" W

EX 10" W

EX 12" W

EX 16" W

EX 20" W

EX 24" W

EX 30" W

EX 36" W

EX 42" W

EX 48" W

EX 54" W

EX 60" W

EX 72" W

EX 84" W

EX 96" W

EX 108" W

EX 120" W

EX 132" W

EX 144" W

EX 156" W

EX 168" W

EX 180" W

EX 192" W

EX 204" W

EX

1" = 40'

3 EX CROSSES (TO BE RELOCATED)

PROPOSED NEW PAVEMENT AREA (NO CURBING AND LANDSCAPE ISLANDS)

R=11,303.16
CB=S 71° 05' 35" E
CH=736.97

TIME OF CONCENTRATION FLOW PATH
L=100 LF(CUT GRASS) 560 LF(PAVEMENT)
S=1.3F%
Tc=18 MIN

EX CB 1
TC=769.96
S INV=765.76
N INV =767.36

EX CB 2
TC=780.59
S INV 774.29
E INV 774.39

EX CB 3
TC=781.16
INVS=775.81

EX CB 4
TC=779.60
S INV=776.70
N INV =776.50

EX CB 5
TC=779.91
INV=776.91

80% SHRUBERY SCREEN ALONG THE WEST PROPERTY LINE WITH A 3' HIGH MOUND

EX POND
WSE=778.4

SOUTH DRAINAGE AREA
(OFFSITE RUNOFF TO 30" CULVERT UNDER HOME ROAD TO MARSH RUN CREEK)
TOTAL AREA=12,275 SF (2.800 AC)

EXISTING CHURCH
1 STORY
FF=780.45

EXISTING CHURCH
(1 STORY)
FF=780.45

EXISTING SEPTIC TANK AND LEACH FIELD TO BE REMOVED AND DISPOSED OF

PROPOSED POND AREA

PROP 90°-30" STM
SEW=0.11%

PROP DUKE CONTROL STRUCTURE W/ORIFICE PLATE

PROP 100'-15" STM
SEW=3.0%

PROPOSED LATERAL TO BE CONNECT TO MANHOLE AT VILLAGES AT GANTZ MEADOWS

PROPOSED EASEMENT

5/8" REBAR FND

IRON PIPE END

EX ELEC PED

EX SEPTIC TANK

EX LANDSCAPE PLANTER

EX GUARD RAIL

ENTRANCE

STREET SIGN

TRAFFIC POLE

EX 16" WL

EX 12" WL

EX 6" WL

EX 8" WL

EX 30" SAN SEW

EX SAN MH #7
RIM 764.71
30" INV=751.01(E&W)

CONNECT 2" DIA FORCEMAIN TO MH #7

30' SANITARY SEWER EASEMENT

PROPOSED 20' SAN SEW EASEMENT

MARSH RUN

DIRECTIONAL BORE UNDER MARSH RUN CREEK FOR FM

APPROX R/W LOCATION

EXISTING ASPHALT BIKEPATH

HOME ROAD

GANTZ ROAD

THIS PROJECT IS 100 YEAR FLOOD MAP RATED ZONE X PER FLOOD INSURANCE RATE MAP (FIRM), PANEL 318 OF 465, FRANKLIN COUNTY, OHIO MAP NUMBER 39049C0318K, JUNE 16, 2008

SITE

VICINITY MAP

NORTH DRAINAGE AREA
(TO PROPOSED DETENTION POND)
TOTAL AREA=167,283 SF=3.726 AC
IMPERVIOUS AREA=115,191 SF= 2.644 AC (CONC/ASPHALT)
PERVIOUS AREA=41,222 SF= 0.946 AC (CUT GRASS/LANDSCAPING)

INCREASE IN NEW IMPERVIOUS SURFACE=115,191 SF-56,113 SF=59,078 SF (105% INCREASE)

OFFSITE DRAINAGE AREA
(TO INTERSTATE 270 DRAINAGE SYSTEM)
TOTAL AREA=5,870 (CUT GRASS)

SUMMARY OF FLOW TABLE
TOTAL SITE AREA=290,125 SF (6.660 AC)
TOTAL DISTURBED AREA=118,429 SF (2.718 AC)
AREA THAT FLOWS OFFSITE=121,975 SF + 5,870 SF=127,845 SF(2.934 AC)
AREA THAT FLOWS TO DETENTION=156,413 SF (3.591 AC)

Q100=5.87 CFS

RUNOFF STORM CALCULATIONS
PERCENT INCREASE = 1.1 CFS / 0.5 CFS = 120% INCREASE
POST DEVELOPMENT=2.1 CFS TO 5 PER CFS = 177% INCREASE
CRITICAL STORM IS 25 YEAR STORM

FIRST FLUSH WATER QUALITY VOLUME=2,992 CF RELEASED @ 0.035 CFS OVER 24 HOURS

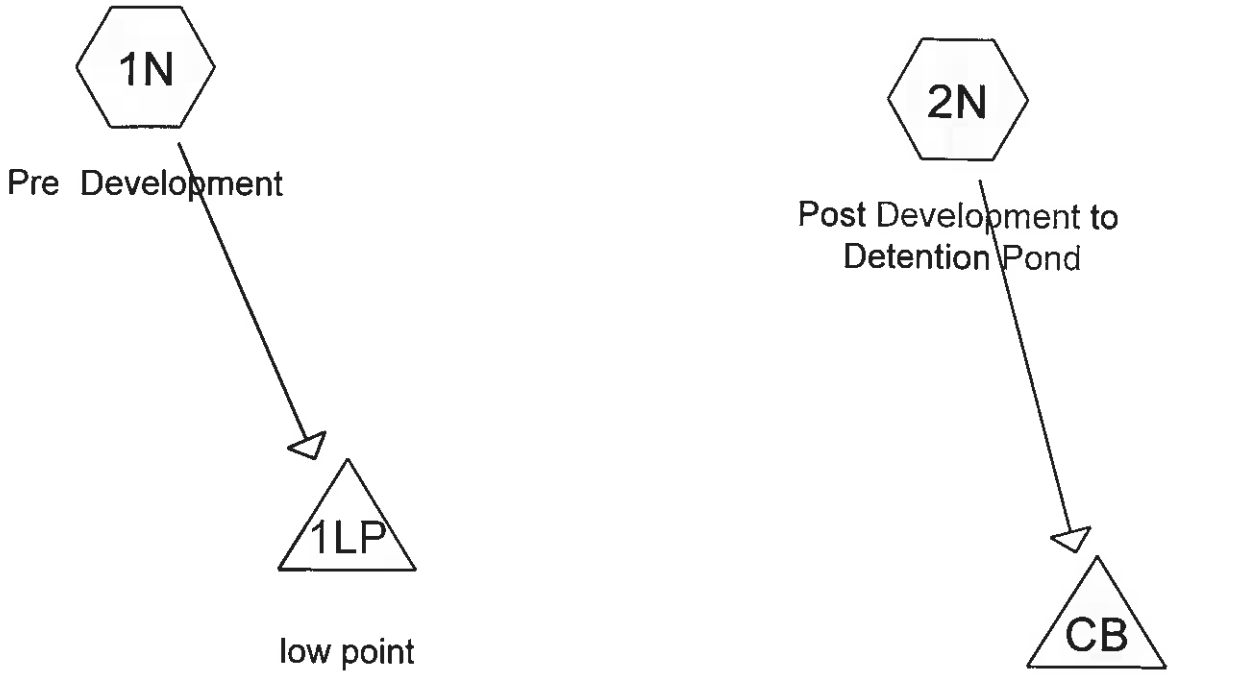
STATE OF OHIO
STUART P. RAVARY
E-60041
REGISTERED PROFESSIONAL ENGINEER

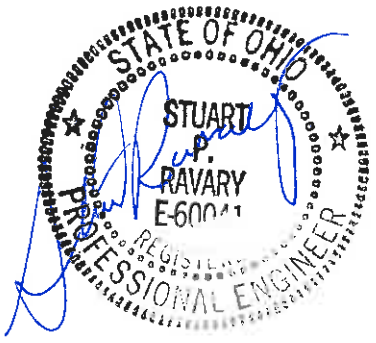
PROPOSED CURB
EXISTING LIGHT POLE
PROPOSED 32 FT HIGH WOODSIDE LIGHT POLE
100-YEAR FLOOD PLAIN

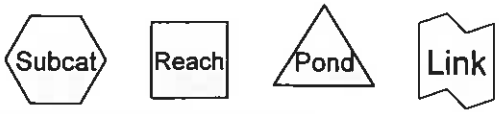
CITY ADMINISTRATOR DATE	CHURCH EXPANSION CANAAN LAND CHURCH 2777 GANTZ ROAD GROVE CITY, OHIO 43123
SERVICE DIRECTOR DATE	SHEET TITLE: POST DEVELOPMENT DRAINAGE PLAN
CITY OF GROVE CITY REVIEWER DATE	SCALE: 1" = 40' / SHEET: 2/2
JACKSON TOWNSHIP FIRE DEPARTMENT DATE	CITY PROJECT NO: _____ / DATE: JUNE, 2015

P:\and Projects 3\Stone Environmental\Canaan Church_Grove City\dwg\Plan\development plan.dwg Thu, Jul 23, 2015 - 2:31pm

RECEIVED
JUL 27 2015
GC PLANNING COMMISSION







Routing Diagram for drainage calcs 6-24-15
Prepared by Hewlett-Packard Company, Printed 7/23/2015
HydroCAD® 10.00 s/n 07636 © 2012 HydroCAD Software Solutions LLC

Area Listing (all nodes)

Area (sq-ft)	CN	Description (subcatchment-numbers)
153,262	74	>75% Grass cover, Good, HSG C (1N, 2N)
171,304	98	Paved parking, HSG C (1N, 2N)
324,566	**87**	**TOTAL AREA**

Soil Listing (all nodes)

Area (sq-ft)	Soil Group	Subcatchment Numbers
0	HSG A	
0	HSG B	
324,566	HSG C	1N, 2N
0	HSG D	
0	Other	
324,566		**TOTAL AREA**

Ground Covers (all nodes)

HSG-A (sq-ft)	HSG-B (sq-ft)	HSG-C (sq-ft)	HSG-D (sq-ft)	Other (sq-ft)	Total (sq-ft)	Ground Cover
0	0	153,262	0	0	153,262	>75% Grass cover, Good
0	0	171,304	0	0	171,304	Paved parking
0	**0**	**324,566**	**0**	**0**	**324,566**	**TOTAL AREA**

Pipe Listing (all nodes)

Line#	Node Number	In-Invert (feet)	Out-Invert (feet)	Length (feet)	Slope (ft/ft)	n	Diam/Width (inches)	Height (inches)	Inside-Fill (inches)
1	CB	770.00	767.00	100.0	0.0300	0.011	15.0	0.0	0.0

Time span=0.00-30.00 hrs, dt=0.02 hrs, 1501 points x 9
Runoff by SCS TR-20 method, UH=SCS
Reach routing by Dyn-Stor-Ind method - Pond routing by Dyn-Stor-Ind method

Subcatchment 1N: Pre Development Runoff Area=168,153 sf 33.37% Impervious Runoff Depth=2.64"
Flow Length=762' Slope=0.0157 '/' Tc=36.4 min CN=82 Runoff=7.76 cfs 36,939 cf

Subcatchment 2N: Post Development to Runoff Area=156,413 sf 73.65% Impervious Runoff Depth=3.60"
Flow Length=660' Slope=0.0136 '/' Tc=17.9 min CN=92 Runoff=14.63 cfs 46,951 cf

Pond 1LP: low point Inflow=7.76 cfs 36,939 cf
Primary=7.76 cfs 36,939 cf

Pond CB: prop. outlet control structure Peak Elev=773.21' Storage=26,887 cf Inflow=14.63 cfs 46,951 cf
Outflow=1.73 cfs 36,298 cf

Total Runoff Area = 324,566 sf Runoff Volume = 83,889 cf Average Runoff Depth = 3.10"
47.22% Pervious = 153,262 sf 52.78% Impervious = 171,304 sf

Summary for Subcatchment 1N: Pre Development

pre-development runoff

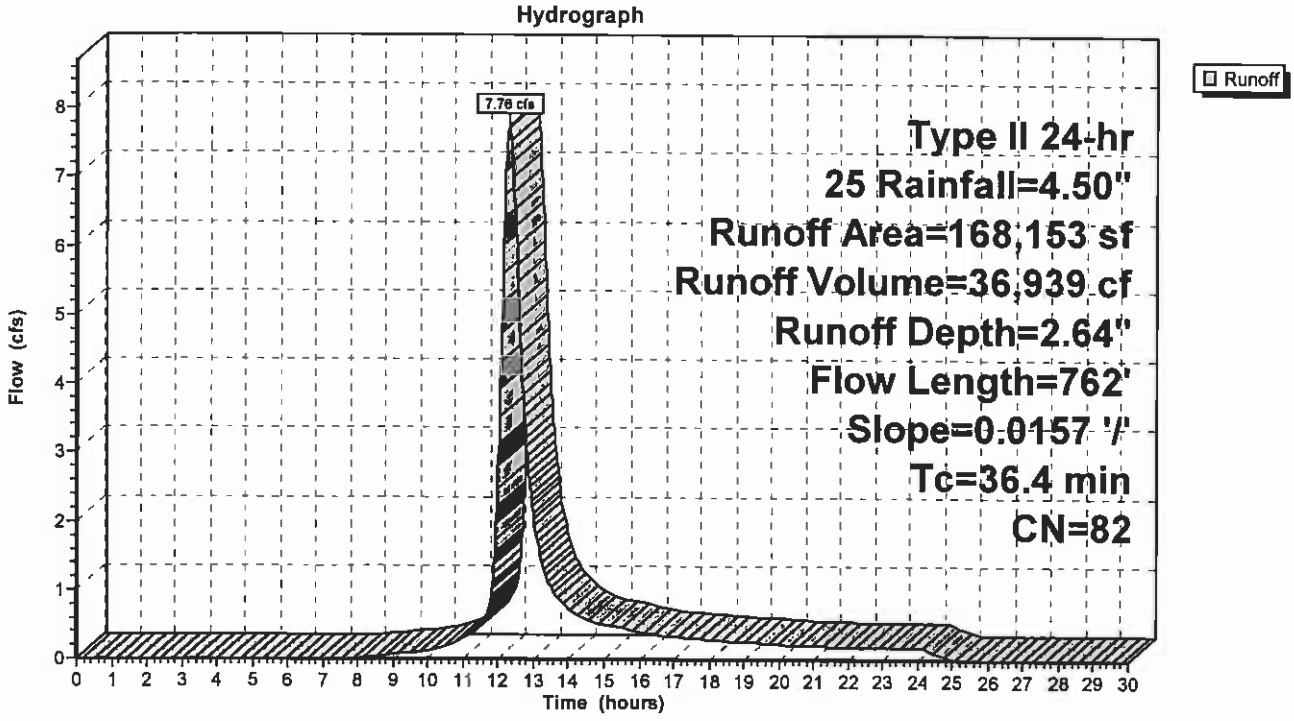
Runoff = 7.76 cfs @ 12.32 hrs, Volume= 36,939 cf, Depth= 2.64"

Runoff by SCS TR-20 method, UH=SCS, Time Span= 0.00-30.00 hrs, dt= 0.02 hrs
Type II 24-hr 25 Rainfall=4.50"

Area (sf)	CN	Description
56,113	98	Paved parking, HSG C
112,040	74	>75% Grass cover, Good, HSG C
168,153	82	Weighted Average
112,040		66.63% Pervious Area
56,113		33.37% Impervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
28.3	300	0.0157	0.18		**Sheet Flow, SHEET FLOW** Grass: Short n= 0.150 P2= 2.70"
1.8	130	0.0157	1.21		**Sheet Flow, PAVEMENT** Smooth surfaces n= 0.011 P2= 2.70"
6.3	332	0.0157	0.88		**Shallow Concentrated Flow, OVERLAND FLOW** Short Grass Pasture Kv= 7.0 fps
36.4	762	Total			

Subcatchment 1N: Pre Development



Summary for Subcatchment 2N: Post Development to Detention Pond

Sheet flow to detention pond

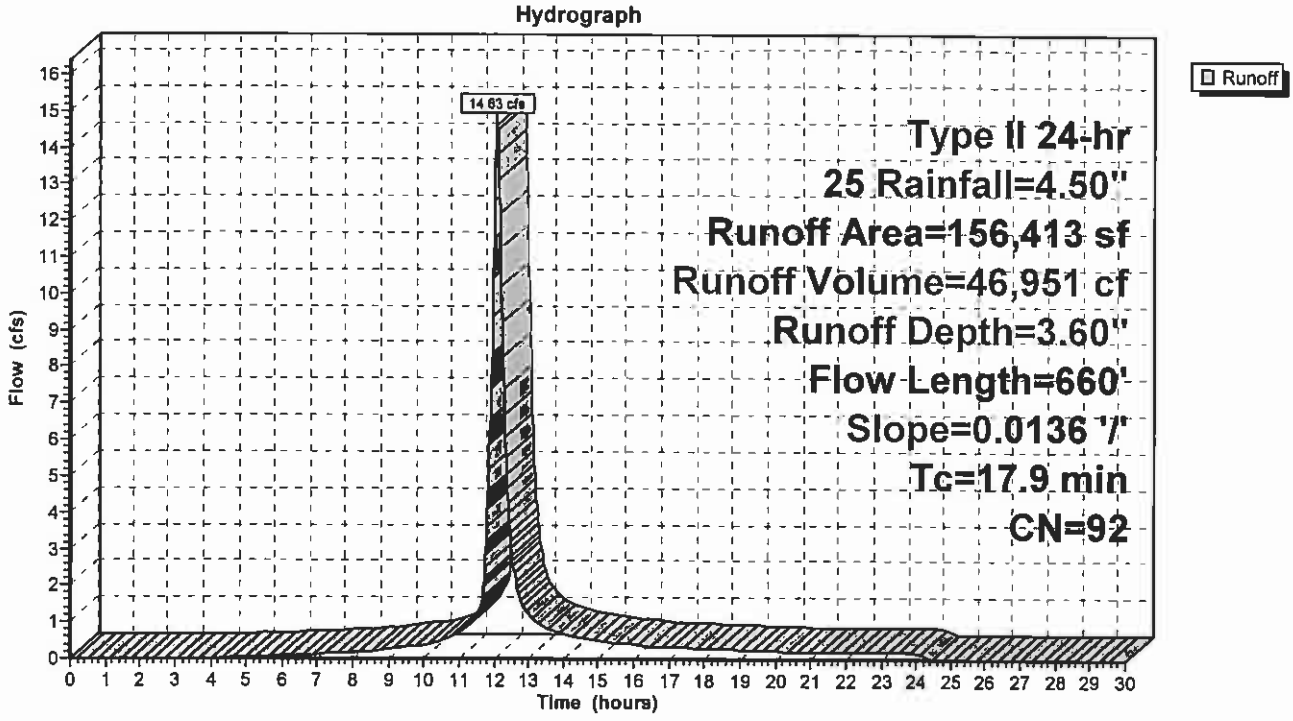
Runoff = 14.63 cfs @ 12.10 hrs, Volume= 46,951 cf, Depth= 3.60"

Runoff by SCS TR-20 method, UH=SCS, Time Span= 0.00-30.00 hrs, dt= 0.02 hrs
Type II 24-hr 25 Rainfall=4.50"

Area (sf)	CN	Description
115,191	98	Paved parking, HSG C
41,222	74	>75% Grass cover, Good, HSG C
156,413	92	Weighted Average
41,222		26.35% Pervious Area
115,191		73.65% Impervious Area

Tc (min)	Length (feet)	Slope (ft/ft)	Velocity (ft/sec)	Capacity (cfs)	Description
12.4	100	0.0136	0.13		**Sheet Flow, sheet flow** Grass: Short n= 0.150 P2= 2.70"
3.7	300	0.0136	1.35		**Sheet Flow, sheet flow** Smooth surfaces n= 0.011 P2= 2.70"
1.8	260	0.0136	2.37		**Shallow Concentrated Flow, over pavement flow** Paved Kv= 20.3 fps
17.9	660	Total			

Subcatchment 2N: Post Development to Detention Pond



Summary for Pond 1LP: low point

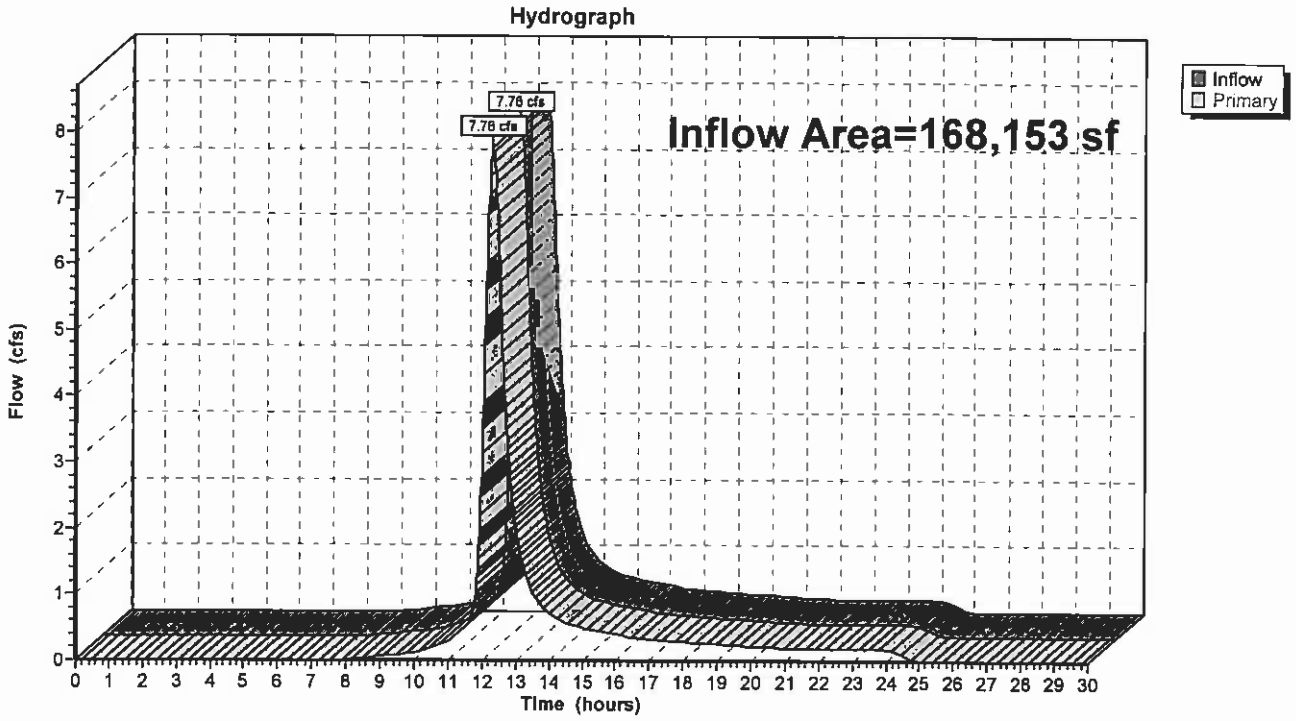
surface runoff to lowpoint

[40] Hint: Not Described (Outflow=Inflow)

Inflow Area =	168,153 sf,	33.37% Impervious,	Inflow Depth =	2.64"	for 25 event
Inflow =	7.76 cfs @	12.32 hrs, Volume=	36,939 cf		
Primary =	7.76 cfs @	12.32 hrs, Volume=	36,939 cf,	Atten= 0%,	Lag= 0.0 min

Routing by Dyn-Stor-Ind method, Time Span= 0.00-30.00 hrs, dt= 0.02 hrs / 9

Pond 1LP: low point



Summary for Pond CB: prop. outlet control structure

Inflow Area = 156,413 sf, 73.65% Impervious, Inflow Depth = 3.60" for 25 event
Inflow = 14.63 cfs @ 12.10 hrs, Volume= 46,951 cf
Outflow = 1.73 cfs @ 12.72 hrs, Volume= 36,298 cf, Atten= 88%, Lag= 37.5 min
Primary = 1.73 cfs @ 12.72 hrs, Volume= 36,298 cf

Routing by Dyn-Stor-Ind method, Time Span= 0.00-30.00 hrs, dt= 0.02 hrs / 9
Peak Elev= 773.21' @ 12.72 hrs Surf.Area= 15,306 sf Storage= 26,887 cf

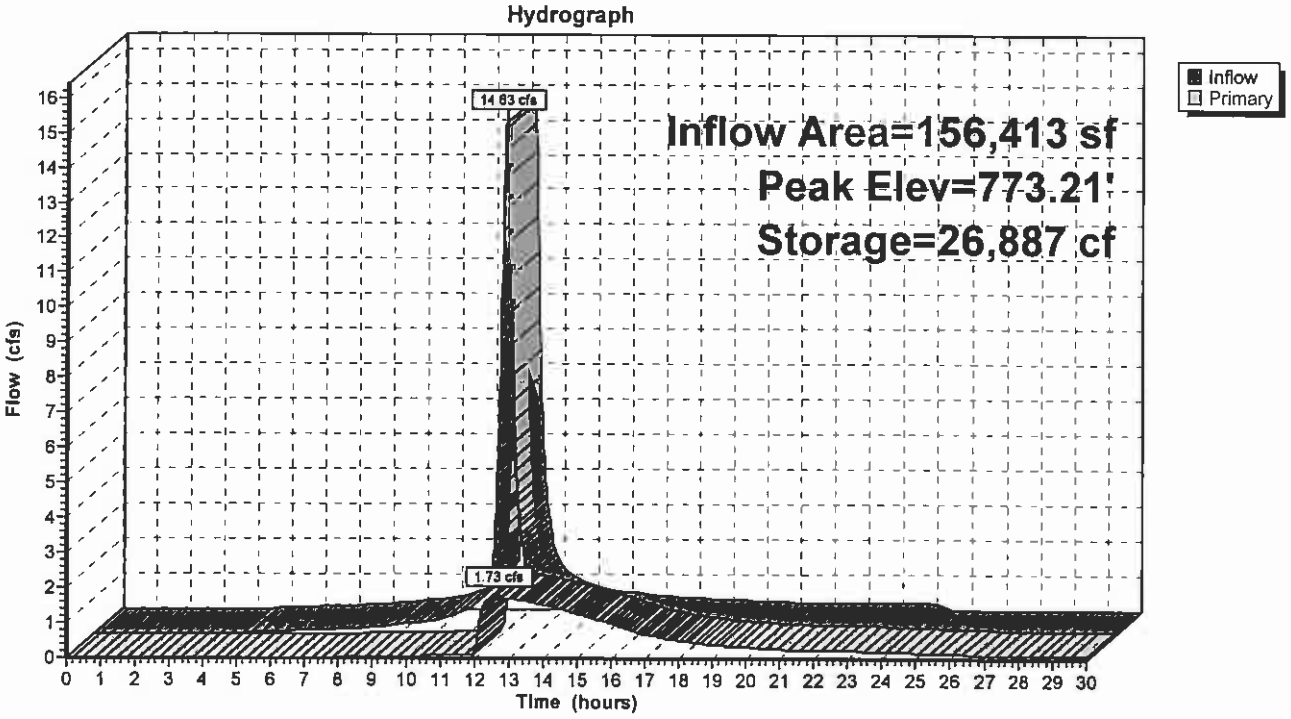
Plug-Flow detention time= 280.9 min calculated for 36,298 cf (77% of inflow)
Center-of-Mass det. time= 195.7 min (989.5 - 793.8)

Volume	Invert	Avail.Storage	Storage Description
#1	770.50'	23,952 cf	**Custom Stage Data (Irregular)** Listed below (Recalc)
#2	771.60'	442 cf	**30.0" D x 90.0'L RCP_Round 30" S= 0.0011 '/'**
#3	769.00'	38,699 cf	**Custom Stage Data (Irregular)** Listed below (Recalc)
		63,093 cf	Total Available Storage

Elevation (feet)	Surf.Area (sq-ft)	Perim. (feet)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)	Wet.Area (sq-ft)
770.50	0	0.0	0	0	0
771.00	448	106.0	75	75	895
772.00	2,752	324.0	1,437	1,511	8,357
773.00	5,570	533.0	4,079	5,591	22,617
774.00	8,559	628.0	7,011	12,602	31,413
775.00	14,393	699.0	11,350	23,952	38,940

Elevation (feet)	Surf.Area (sq-ft)	Perim. (feet)	Inc.Store (cubic-feet)	Cum.Store (cubic-feet)	Wet.Area (sq-ft)
769.00	0	0.0	0	0	0
770.00	2,222	242.0	741	741	4,662
771.00	5,100	377.0	3,563	4,303	11,319
772.00	6,786	415.0	5,923	10,226	13,747
773.00	8,549	447.0	7,651	17,877	15,983
774.00	10,405	472.0	9,462	27,339	17,869
775.00	12,343	497.0	11,360	38,699	19,856

Device	Routing	Invert	Outlet Devices
#1	Primary	770.00'	**15.0" Round culvert** L= 100.0' RCP, groove end projecting, Ke= 0.200 Inlet / Outlet Invert= 770.00' / 767.00' S= 0.0300 '/' Cc= 0.900 n= 0.011 Concrete pipe, straight & clean, Flow Area= 1.23 sf
#2	Device 1	770.00'	**1.8" Vert. Orifice/Grate** C= 0.600
#3	Device 1	772.00'	**8.0" Vert. Orifice/Grate** C= 0.600

Primary **OutFlow** Max=1.73 cfs @ 12.72 hrs HW=773.21' (Free Discharge)
└─**1=culvert** (Passes 1.73 cfs of 11.89 cfs potential flow)
  ├─2=Orifice/Grate (Orifice Controls 0.15 cfs @ 8.53 fps)
  └─3=Orifice/Grate (Orifice Controls 1.58 cfs @ 4.52 fps)

Pond CB: prop. outlet control structure