



YOUR GOALS. OUR MISSION.

August 1, 2024

Smithfield Township Planning Commission
1155 Red Fox Road
East Stroudsburg, PA 18301

**SUBJECT: LTS HOMES, LLC – 3-POINT GARDEN ROAD MAJOR SUBDIVISION
PRELIMINARY PLAN REVIEW NO. 1
SMITHFIELD TOWNSHIP, MONROE COUNTY, PENNSYLVANIA
PROJECT NO. SMTW-R0010**

Dear Planning Commission Members:

Pursuant to the Township's request, we have performed our first review of the Preliminary Major Subdivision Plan Application for 3-Point Garden Road. The submitted information consists of the following items.

- Letter of transmittal prepared by Ott Consulting, Inc., dated June 28, 2024.
- Project Narrative prepared by Ott Consulting, Inc., dated June 28, 2024.
- PA Department of Conservation and Natural Resource PNDI Receipt dated June 27, 2024.
- Wetland Evaluation prepared by C&H Environmental, dated December 14, 2023.
- Model Home Renderings and Floor Plans prepared by LTS Homes.
- Resource Impact and Conservation Analysis prepared by Ott Consulting, Inc., dated June 28, 2024.
- Notice to Landowners Abutting the Proposed Subdivision or Land Development prepared by Ott Consulting, Inc., dated June 28, 2024.
- Letter of transmittal to Smithfield Township Sewer Authority prepared by Ott Consulting, Inc., dated June 28, 2024 and including:
 - Capacity Request for Sanitary Sewer Service prepared by Ott Consulting, Inc., dated June 28, 2024.
 - Project Narrative prepared by Ott Consulting, Inc., dated June 28, 2024.
 - PADEP Sewage Facilities Planning Module Application Mailer.
 - Preliminary Grading and Utility Plan prepared by Ott Consulting, Inc., dated June 28, 2024.
- Stormwater Management & PCSM Report prepared by Ott Consulting, Inc., dated June 28, 2024.
- Preliminary Post Construction Stormwater Management Plan (2 sheets) prepared by Ott Consulting,



Inc., dated June 28, 2024.

- Preliminary Erosion & Sediment Control Plan (2 sheets) prepared by Ott Consulting, Inc., dated June 28, 2024.
- Preliminary Major Subdivision Plan set (6 sheets) prepared by Ott Consulting, Inc., dated June 28, 2024.

BACKGROUND INFORMATION

The Applicant is proposing a 7-lot major subdivision of a property located on the northern side of 3-Point Garden Road and is bordered to the north by Franklin Hill Road. The property is located within the R-1, Low Density Residential Zoning District.

The existing property has an area of 10.48 acres and consists of steep slopes and woodland areas. An unidentified stream is shown traversing the northern portion of the existing property.

The submitted plan proposes to subdivide the existing property into seven (7) lots.

1. Proposed Lot 1 will have an area of 41,972 square feet and consist of a single-family residential dwelling taking access from 3-Point Garden Road and will be served by public sanitary sewer and on-lot water.
2. Proposed Lot 2 will have an area of 40,920 square feet and consist of a single-family residential dwelling taking access from 3-Point Garden Road and will be served by public sanitary sewer and on-lot water.
3. Proposed Lot 3 will have an area of 40,920 square feet and consist of a single-family residential dwelling taking access from 3-Point Garden Road and will be served by public sanitary sewer and on-lot water.
4. Proposed Lot 4 will have an area of 41,202 square feet and consist of a single-family residential dwelling taking access from 3-Point Garden Road and will be served by public sanitary sewer and on-lot water.
5. Proposed Lot 5 will have an area of 50,030 square feet and consist of a single-family residential dwelling taking access from 3-Point Garden Road via a shared driveway with Proposed Lot 1. Proposed Lot 5 will be served by public sanitary sewer and on-lot water.
6. Proposed Lot 6 will have an area of 51,454 square feet and consist of a single-family residential dwelling taking access from 3-Point Garden Road via a shared driveway with Proposed Lot 4. Proposed Lot 6 will be served by public sanitary sewer and on-lot water.
7. Proposed Lot 7 will have an area of 140,245 square feet and consist of a single-family residential dwelling taking access from Franklin Hill Road and will be served by an on-lot sewage disposal system and on-lot well.

Stormwater management is proposed on each lot. In addition, and per Section 309, Schedule of District Regulations, one-family detached dwellings are permitted within the R-1, Low Density Residential Zoning District.



Based on our review of the above information, we offer the following comments and/or recommendations for consideration.

ZONING ORDINANCE COMMENTS

1. Public sanitary sewer and on-lot water are proposed for Lots 1 through 6, and on-lot sewage disposal and on-lot water are proposed for Lot 7. Therefore, the development standards listed in Section 309, Schedule of Regulations are different for Lots 1 through 6 and for Lot 7. *The Zoning Data chart on Sheet C-1.1 shall be revised accordingly.*
2. In accordance with Section 309, Schedule of District Regulations, the minimum required lot width for Proposed Lots 1 through 6 is 150-feet and the minimum required front yard depth is 25-feet.

The Zoning Ordinance defines Lot Width as “the horizontal distance between the side lot lines, measured along the building setback line and parallel to the front lot line”. In addition, the Zoning Ordinance defines Setback, Front Yard as “a line parallel to the front lot line at a distance therefrom equal to the depth of the minimum front yard required under the Schedule of District Regulations for the applicable zoning district”.

Per the Schedule of District Regulations and the definitions noted above it does not appear that the flag lots/lane lots are permitted and Proposed Lots 5 and 6 should be removed from the plan. The Zoning Officer shall review and determine whether the proposed flag lots/lane lots are permitted.

3. In accordance with Section 309, Schedule of District Regulations, the minimum required lot depth for Proposed Lots 1 through 6 is 175-feet, and for Proposed Lot 7 is 200-feet. *The required and proposed lot depths shall be listed in the Zoning Data chart and shown in plan view on Sheet C-1.1.*
4. In accordance with Section 401.1.C, the maximum impervious area for all proposed lots is 25%. *The allowable (%) and proposed (in square feet and percent) impervious areas shall be listed for each proposed lot on Sheet C-1.1.*
5. In accordance with Section 401.1.E, “limited disturbance of moderately steep slopes and very steep slopes shall be permitted under the conditions described below:

Steep Slope Category	Percent	Maximum Area of Disturbance
Moderately Steep Slope	15% to 25%	60%
Very steep slope	25% or greater	10%

Disturbance refers to any development activities, including regrading and stripping of vegetation. The use of regraded slopes shall be minimized and is generally discouraged. The use of retaining walls for grade changes is encouraged”.

The disturbance in acreage and percent for each steep slope category shall be listed on the plan to confirm compliance with this Section. The steep slopes shall also be delineated on the Erosion & Sediment Control Plan to confirm areas of disturbance.



SUBDIVISION AND LAND DEVELOPMENT ORDINANCE COMMENTS

6. In accordance with Section 602.1.F and 603.A.1.A.(12), all submissions to, correspondence with, and approvals/permits from the following agencies shall be provided.
 - a. Smithfield Township Sewer Authority – *A copy of the transmittal and submitted documents were provided with this submission.*
 - b. Fire Company
 - c. Monroe County Planning Commission
 - d. Monroe County Conservation District/Pennsylvania Department of Environmental Protection – *Erosion control and NPDES Permit.*
7. In accordance with Section 602.1.G, “the applicant/developer shall notify all abutting property owners of the proposed development. This notification shall contain a statement as to the size and scope of the proposed project and the date of the first Planning Commission review of the project. Said notice shall be sent to the mailing address of the abutting property owners as shown on the tax rolls of the Township. A list indicating the names and addresses of the people notified as well as a copy of the letter center, a certification with “return receipt requested” indicating that the letters had been sent, shall be submitted to the Township.” *Abutting property owners including the First Baptist Church located across Franklin Hill Road were sent notifications. The property owners across 3-Point Garden Road shall also be notified of the project.*
8. In accordance with Section 603.1.A.(10), the plan shall include “the original date, dates last revised, sheets revised, north point and scale shown graphically and numerically”. *The written scale on Sheet C-2.2 is inconsistent with the graphic scale and shall be revised accordingly.*
9. In accordance with Section 603.1.A.(11), “a recent title report shall be submitted verifying any restrictions in the deed affecting the subdivision or development of the property, including, but not limited to, any underground, overhead or surface utility easements or rights-of-way. Copies of easements shall be submitted for review.” *The title report shall be submitted as required.*
10. In accordance with Section 603.1.A.(13), “signature blocks for the Township Planning Commission, Township Supervisors, Township Engineer, and County Planning Commission shall be included on all plan sheets which are intended to be recorded”. *The language “approved by” shall be removed from the Township Engineer signature block. In addition, the language “reviewed by” in the Township Planning Commission’s signature block shall be revised to read “recommended for approval by”.*
11. In accordance with Section 603.1.C.(2), “the features to be shown on the Site Context Map include:
 - (a) “Topography (from the most current U.S.G.S. maps).” *The existing topography shall be provided on the Site Context Map (Sheet C-2.2).*
 - (b) “Streams and water courses, drainage basins and sub-basins.” *Sheet C-2.2 shows what appears to be an existing stream traversing the northern portion of the existing property. This shall be clarified.*



- (j) “Names of owners of all properties and the names of all subdivisions. The above information may be superimposed on an aerial photograph.” *Adjacent property owners are listed on Sheet C-2.2. Property owners within 1,000 feet of the project site shall also be listed as required.*
12. In accordance with Section 603.1.D.(1), “a complete outline survey of the property to be subdivided or developed shall be provided, showing all courses, distances, areas and tie-ins to all adjacent intersections. The survey shall not have an error of closure greater than one part in 10,000. Lot closure reports shall be submitted demonstrating the above stated closure requirements.” *The metes and bounds of the existing property shall be provided on the plan.*
13. In accordance with Section 603.1.D.(4), the plan shall include “the location, name and right-of-way and cartway widths of all streets bordering the land to be developed or subdivided, including State and local traffic route numbers”. *The cartway widths of Franklin Hill Road and 3-Point Garden Road shall be dimensioned on the plan.*
14. In accordance with Section 603.1.D.(7), the plan shall include “the location of all existing monuments, iron pipes or pins and spikes relating to the property”. *Existing monumentation shall be shown and labeled on the plan.*
15. In accordance with Section 603.1.D.(10), “if aerial photography is used in the preparation of a plan the name of the company producing the aerial information and date the aerial photography was flow shall be provided on the plan. If significant man-made features or natural activities, as identified by the Township Engineer, has changed the land since the date of the aerial additional/revised aerial photography will be required.” *The source and date of the aerial photograph utilized with the Site Context Map on Sheet C-2.2 shall be provided on the plan.*
16. In accordance with Section 603.1.D.(13)(d), the plan shall include “the soil classifications, hydraulic soil classification and boundary lines of all soils located on the tract with specific reference to any alluvial soils boundary. Soil descriptions for all soil types shall be provided and any building restrictions due to wet soils, seasonally high water table or other restrictions shall be provided on the plans.” *The existing soils shall be delineated on the plan.*
17. In accordance with Sections 603.1.D.(13)(f) and 1002.7.E, slopes of 15% to 25% and slopes greater than 25% shall be mapped and shown on the plans. The total area of land within these slopes shall be calculated and shown in table form on the plans. The area to be disturbed under the proposed plan application within each slope classification shall be shown and the area of proposed disturbance shall be shown and compared with the Zoning Ordinance [Chapter 27] requirements on slope restrictions. *The existing area (in square feet) and disturbed area (in square feet and percent) of each steep slope category shall be provided on the plan. The steep slopes shall also be delineated on the Erosion & Sediment Control Plan to confirm areas of disturbance. Also refer to Zoning Ordinance Comment 5.*
18. In accordance with Section 601.1.G.(1), the plan shall include “the layout, proposed dimensions, proposed use and consecutive numbering of all lots. All sheets shall show lot numbers. Lot closure reports shall be supplied demonstrating that the proposed lots close with an error less than one in 10,000.” *The dimensions of the proposed lots shall be provided on the plan and lot closure reports shall be submitted for review.*



19. In accordance with Section 601.1.G.(9), the plan shall include “location and size of sanitary sewers, on-site sewage disposal facilities, gas mains, water mains, fire hydrants, streetlights, special structures and other underground conduits or structures, including all related appurtenances”. *The grading associated with the proposed on-lot sewage disposal system on Lot 7 shall be shown on the plan.*
20. In accordance with Section 603.1.G.(11), the plan shall include “the location of proposed monuments”. *Proposed monumentation in accordance with Section 1025 of the Subdivision and Land Development Ordinance shall be shown and labeled on the plan.*
21. In accordance with Section 603.1.G.(14), “a landscape plan showing all required street trees, buffers, tree protection areas, a plan for tree protection during construction designed to meet the requirements of §22-1103 of this Chapter and other required plantings, as required by §22-1101 of this Chapter and other Township Ordinances”. *A waiver from this Section is requested. The request states:*

A landscaping plan is not proposed at this time, due to the rural nature of the subject property and limited site disturbance.

Per Section 1101.1.C.(2)(e), existing woodlands along Franklin Hill Road and 3-Point Garden Road may be utilized as street trees. Also, per Section 1102.1, the existing woodlands may be utilized to meet the buffer requirements. However, the Applicant shall demonstrate that the existing trees to remain meet the requirements of Part 11 and the intent of the buffer and street trees. There is concern with the proximity of the proposed driveways accessing Lots 1/5 and 4/6 to the existing property line and retaining woodlands that meet the intent of the buffer requirements.

22. In accordance with Section 603.1.G.(15), “a lighting plan in accordance with the requirements of this Chapter and the Smithfield Township Zoning Ordinance [Chapter 27] shall be submitted”. *A waiver from this Section is requested. The request states:*

A lighting plan is not proposed at this time, due to the rural and residential nature of the subject development.

The lighting requirements of the Zoning Ordinance and Subdivision and Land Development Ordinance do not apply to this land development, therefore the requested waiver is not required and shall be removed from the Waiver Requests list on Sheet C-1.1.

23. In accordance with Section 603.1.G.(17)(b), “Soil Erosion and Sedimentation Control Plan. The plan shall include all grading and facilities proposed to control soil erosion and sedimentation during construction and proposed detention/retention facilities, in conformance with all applicable Pennsylvania Department of Environmental Protection and United States Soil Conservation Service regulations. A satisfactory letter shall be required from the Monroe County Conservation District on the soil erosion and sediment control plan.” *All submissions to, correspondence with, and approvals from the County Conservation District/PADEP shall be provided. The following comments are related to our review of the Erosion & Sediment Control Plan (Sheets C-8.1 and C-8.2).*



- a. *The proposed development is located within a High Quality Watershed, therefore the construction entrances shall either be 100-feet long or wash racks shall be provided. Standard Construction Details #3-1 and #3-2 are provided on Sheet C-8.2. The plan shall be revised to clarify which construction entrance will be utilized. If Standard Construction Detail #3-1 applies, the detail shall be revised to require a 100-foot long stone entrance.*
 - b. *Additional silt sock shall be provided downslope and east of the proposed stormwater management facility and house to provide erosion control of stormwater runoff from Proposed Lot 7. Silt sock shall also be provided upslope of the proposed stormwater management facility on Proposed Lot 7.*
 - c. *The Staging of Earthmoving Activities provided on Sheet C-8.1 references Lehigh County and shall be revised to reference Monroe County.*
 - d. *The Staging of Earthmoving Activities shall be revised to include the installation of the proposed storm sewer and driveway pipes.*
 - e. *The Staging of Earthmoving Activities shall be revised to include paving of the proposed driveways.*
24. In accordance with Section 603.1.G.(19), “where on-site sewage disposal facilities are proposed, a statement from the Township SEO, with regard to the suitability of the soil to absorb sewage wastes and the appropriate planning modules” shall be provided. *The on-lot sewage disposal facility on Proposed Lot 7 shall be reviewed and approved. All submissions, correspondences, and approvals shall be provided to the Township.*
25. In accordance with Section 603.1.G.(21), the plan shall include “a statement or certificate by the applicant/developer indicating that, to the best of his or her knowledge, the plans are in conformity with engineering, zoning, building, sanitary and other applicable Township ordinances and regulations and, if they are not so conforming, detailing the areas of nonconformance and the reasons for requesting a modification to Township standards.” *The Owner’s Statement provided on Sheet C-1.1 shall be revised to reflect the language in this Section.*
26. In accordance with Section 603.1.H.(3)(b), the plan shall include storm sewer profiles including:
- “1) Profile of existing ground surface with elevations at top of manhole or inlets.
 - 2) Profile of storm drain and subsurface drains or sewer, showing type and size of pipe, grade, cradle, manhole and inlet locations.”
- Profiles of the proposed storm sewer pipes crossing the driveway on Lot 3 and the shared driveway accessing Lots 4 and 6 shall also be provided on the plan.*
27. In accordance with Section 1002.5, “where no public water supply is available to the subdivision or land development, the Township shall require the applicant/developer to obtain from a licensed testing laboratory certificates of approval for each lot as to the quality and adequacy of the water supply proposed to be utilized by the applicant/developer.” *This requirement shall be included in General Note 9 on Sheet C-1.1.*



28. In accordance with Section 1002.7.F, “natural areas containing rare or endangered plants and animals, as well as other features of natural significance exist throughout the Township. Some of these have been carefully documented (e.g., by the Statewide Natural Diversity Inventory), whereas for others, only the general locations are known. Subdivision applicant/developers shall take all reasonable measures to protect significant natural areas and features either identified by the Township Map of Potential Conservation Lands or by the applicant/developer’s Existing Resources and Site Analysis Plan by incorporating them into proposed conservation open space areas or avoiding their disturbance in areas proposed for development.” *The avoidance measure required by the U.S. Fish and Wildlife Service for the northern long-eared bat shall be noted in the Staging of Earthmoving Activities on Sheet C-8.1.*
29. In accordance with Sections 1002.13 and 1302.3.A, lots and/or parcels shall be laid out and graded to provide positive drainage away from buildings and to prevent damage to neighboring lots, tracts, or parcels. Stormwater management shall be provided in accord with Township stormwater regulations. *The following comments shall be addressed to confirm positive drainage away from the proposed dwellings.*
 - a. *On Proposed Lot 3, a spot elevation shall be added along the northern most edge of the proposed driveway.*
 - b. *Spot elevations shall be provided on the eastern side of the proposed dwelling on Lot 4. Also, the proposed grading at the rear of this dwelling is less than 2%. The proposed grading shall be revised to provide a minimum slope of 2% across the proposed lawn.*
30. In accordance with Section 1008.3, “where a subdivision abuts or contains an existing street, the applicant/developer shall be required to improve said street to Township standards, and, provide an additional ultimate right-of-way width to conform to the standards set by the Township”. Franklin Hill Road and 3-Point Garden Road are classified as Local Access Streets. Appendix B requires a 50-foot wide right-of-way and a 26-foot wide cartway (18-foot wide travelway with 2, 4-foot wide shoulders) along Local Access Streets. *The existing widths of Franklin Hill Road and 3-Point Garden Road are 20-feet ± and 22-feet ±, respectively. In addition, the existing rights-of-way are 33-feet, and a 60-foot right-of-way is proposed. The plan shall be revised to meet the requirements of this Section.*
31. In accordance with Section 1011.1, “intersection streets and driveways shall intersect at a 90° angle for a minimum of 75 feet beyond the intersection of the right-of-way lines and 20 feet for driveways”. *The proposed driveway on Lot 7 shall be revised to maintain 90° for 20-feet beyond the proposed right-of-way line.*
32. In accordance with Section 1012.4, “no dwelling shall hereafter be erected unless there is a direct access to it through an open space on the same lot. Such open space shall not be less than 25 feet in width and shall extend from the dwelling to a street. Every principal building shall be built on a lot with frontage on a public street or road improved to meet the Township’s standards.” *The access legs to Proposed Lots 5 and 6 are 20-feet wide and extend through Proposed Lots 1 and 4, respectively. The proposed access legs shall be revised to have a width of 25-feet. Access easements are required and shall be shown on the plan with metes and bounds, and lot closure reports shall be submitted for review. In addition, Proposed Lots 5 and 6 do not have frontage along 3-Point Garden Road, and a waiver is required as proposed.*



33. In accordance with Section 1012.7, “driveways and access point shall be so located, designed and constructed as to provide adequate sight distance at intersections with streets”. *A sight distance note is provided along 3-Point Garden Road on Sheet C-1.1, however it is unclear which driveway it is related to. Sight distance information shall be provided for each proposed driveway. In addition, the Available Sight Distance shall be provided for the Proposed Lot 7 driveway.*
34. In accordance with Section 1012.9, the maximum change of grade along the proposed driveways shall be 10%. *The change of grade exceeds 10% at locations described below and the plan shall be revised.*
- Between the 2% and 9% slopes along the proposed driveway on Lot 1 near its intersection with 3-Point Garden Road.*
 - Between the 9% and 4% slopes along the proposed driveway on Lot 2.*
 - Between the 2% and 9% slopes along the proposed driveway shared by Lots 4 and 5 (near the shared property line).*
 - A spot elevation shall be provided along the centerline of Franklin Hill Road at the proposed driveway onto Lot 7.*
35. In accordance with Section 1012.10, “in all zoning districts, private driveways or other street access points shall be controlled and shall be so located so as to provide a minimum distance of five feet from the paved edge of any such driveway or access point to any property line”. *The proposed driveways accessing Lots 1/5 and 4/6 are less than 5-feet from the existing property lines and shall be relocated.*
36. In accordance with Section 1014.1.A, “curbs shall be installed along each side of every arterial, collector and local street, access driveway, and parking lots in a land development where pedestrian traffic will be travelling adjacent to the street, access driveway, or parking lot”. *Curbs shall be provided along Franklin Hill Road and 3-Point Garden Road.*
37. In accordance with Section 1015.1, “sidewalks shall be required on both sides of all streets in subdivision plans and land developments. Street sidewalks shall have a minimum width of four feet, unless otherwise approved by the Board of Supervisors. There shall be a minimum three foot-wide planting strip, between the curb and sidewalk along local streets and 10 feet along collector and arterial streets. This grass planting strip can be used for the location of the underground utilities.” *Sidewalk shall be provided along Franklin Hill Road and 3-Point Garden Road. A waiver from this Section is requested. The request states:*
- The subdivision location is rural in nature and there are no existing/connecting sidewalks in the vicinity of the project.*
38. In accordance with Section 1022.2, “residential lots shall front on a street, existing or proposed”. *Proposed Lots 5 and 6 achieve access through Proposed Lots 1 and 4, respectively, therefore Lots 5 and 6 do not have street frontage. A waiver from this Section is requested. The request states:*
- Lots 5 & 6 have been designed with shared driveways to minimize site impacts in accordance with §22-603.1.E.(1).*



39. In accordance with Section 1023.5, “where stormwater or surface water will be gathered within the subdivision or land development and discharged or drained in volume over lands within or beyond the boundaries of the subdivision or land development, the applicant/developer shall reserve or obtain easements over all lands affected thereby, which easements shall be adequate for such discharge of drainage and the carrying off of such water and for the maintenance, repair and reconstruction of the same by vehicles, machinery and other equipment for such purposes, and which shall be of sufficient width for such passage and work. The applicant/developer shall convey, free of charge or cost, such easements to the Township upon demand.” *An access easement shall be provided to permit, but not obligate the Township to access and observe, repair, replace, and/or maintain the proposed stormwater management facilities should the property owner fail to do so, at no cost to the Township. Also refer to Stormwater Management Ordinance Comment 76.*

40. In accordance with Section 1202.A, “in conformance with the Pennsylvania Municipalities Planning Code, this Section requires the public dedication of land suitable for park land, noncommercial recreational uses, preserved open space, and the construction of recreational facilities. Upon agreement of the Board of Supervisors, any of the following alternatives may be approved by the Board of Supervisors in lieu of public dedication of land, as specified in this Section:

1. Payment of recreation fees.
2. Construction of recreation facilities.
3. Dedication of recreation land or preserved open space to the Township or its designee.
4. A combination of these alternatives.”

Open space and recreation facilities and/or a fee in-lieu-of shall be provided.

41. In accordance with Section 1301.5.D, “the Board of Supervisors may require the applicant/developer to provide a permanent drainage easement along any watercourse located within or along the boundary of any property being subdivided or developed. The required width of any such easement shall be determined by determining the extent of the width of flow from a fifty-year twenty-four-hour design storm or as determined by one of the following; United States Army Corps of Engineers, Pennsylvania Department of Environmental Protection or other public agency having jurisdiction. The purpose of the easement is to maintain the free flow of the watercourse. The applicant/developer will retain the easement until such time as one of the following is accomplished:

- (1) The easement is offered for dedication by the applicant/developer and accepted by the Township.
- (2) If an easement required by the Township is established, but not to be dedicated, the maintenance shall then be the responsibility of the individual lot owners through whose property the easement passes. For land developments, the maintenance shall then be the responsibility of the applicant/developer.



- (3) A homeowners' association or their legal entity approved by the Township assumes responsibility for the maintenance of the development, including the easements.

It appears a stream exists on Proposed Lot 7. This shall be addressed.

42. In accordance with Section 1301.6.A, “all plans and designs for stormwater management facilities shall determine the maximum expected discharge and run-off by use of the Soil Cover Complex Method as set forth in the latest edition of Urban Hydrology for Small Watersheds, Technical Release No. 55 and National Engineering Handbook, Section 4, Hydrology, as published by the United States Department of Agriculture, Soil Conservation Service. The rainfall intensities found in NOAA ATLAS 14 for a site closest to the subject parcel shall be used for the precipitation frequency estimate.” *Routing calculations for the proposed rain gardens and infiltration trenches shall be submitted for review. In addition, data in support of the rainfall depths utilized in the hydrographs shall be included in the Stormwater Management & PCSM Report to determine compliance with this Section.*
43. In accordance with Section 1301.6.B.(2), “the allowable peak discharge rate after development shall be in accordance with the release rates criteria found in the Stormwater Management Ordinance [Chapter 26, Part 2] of Smithfield Township. In areas outside of the study no more runoff shall be allowed in the post developed condition than existed pre development. *The project site is located within Stormwater Management District A, therefore the post development peak flows of the 2-, 5-, 10-, 25-, 50-, and 100-year storm events shall be less than the predevelopment peak flows of the 1-, 5-, 10-, 25-, 50-, and 100-year storm events, respectively. Routing calculations for the proposed rain gardens and infiltration trenches shall be submitted to determine compliance with this Section. Calculations shall include all storm events, including the 5-year event which is missing from the hydrographs provided in the submitted Stormwater Management & PCSM Report.*
44. In accordance with Section 1301.6.B.(3), “the maximum draw down time for stormwater management facilities shall be 72 hours”. *The drawdown time in the Rain Garden Design Data worksheet in the Stormwater Management & PCSM Report shall be revised as needed based on the results of the required infiltration testing.*
45. In accordance with Section 1301.6.F, “access to facilities shall be provided for maintenance and operation. This access shall be 20 feet wide and shall be cleared, when possible, to a minimum width of 10 feet. Multiple accesses are encouraged for major facilities. The applicant/developer shall provide driveways, curb depressions, sidewalk aprons and all easements and rights-of-way for access to stormwater management facilities.” *An access easement shall be provided to permit, but not obligate the Township to access and observe, repair, replace, and/or maintain the proposed stormwater management facilities should the property owner fail to do so, at no cost to the Township. Also refer to Stormwater Management Ordinance Comment 76.*
46. In accordance with Sections 1301.7.M.(1) and 1301.7.M.(2), “all drainage channels shall be designed to prevent erosion of the bed and banks”. “Suitable stabilization shall be provided where required to prevent erosion of the drainage channels.” *Calculations and details in support of the swales shown on Proposed Lots 4, 5 and 6 shall be provided for review. Also refer to Stormwater Management Ordinance Comment 66.*



47. In accordance with Section 1301.7.M.(2), “the minimum diameter of all storm drainage pipe shall be 18 inches or an equivalent thereto. Where headroom is restricted, equivalent pipe arches may be used in lieu of circular pipe.” *The proposed pipe extension crossing the driveway at Lot 2 has a diameter of 12-inches. The existing pipe also has a diameter of 12-inches. A waiver will be required as proposed. The request shall include calculations ensuring the proposed pipe extension meets the requirements of the Subdivision and Land Development Ordinance and the Stormwater Management Ordinance.*
48. In accordance with Section 1301.7.O.(1), “a fifty-year storm for the design of all stormwater systems” is required. *The storm sewer and swale calculations shall comply with this Section.*
49. In accordance with Section 1302.3.D, “edges of slopes shall be a minimum of five feet from property lines or right-of-way lines in order to permit the normal rounding of the edge without encroaching on the abutting property”. *The proposed driveways accessing Lots 1/5 and 4/6 and the associated grading are located closer than 5-feet from the existing property boundary and the plan shall be revised for compliance with this Section.*
50. In accordance with Section 1402.1.A, “for residential purposes, where public water supply is not available within 100 feet of the property boundary, and a public water supply is not required for the proposed use by the Zoning Ordinance [Chapter 27], the applicant/developer shall construct a well on each proposed lot to service only that lot”. *A waiver from this Section is requested. The request states:*

Public water infrastructure does not abut nor run adjacent to any boundary lines of the subject parcel; therefore, on-lot wells are proposed for the project.

No existing watermain is shown within 100-feet of the project site on the Existing Resources and Site Analysis Plan (Sheet C-2.1). If public water does not exist within 100-feet of the project site, then the proposed wells are permitted, and this waiver is not required.

51. In accordance with Section 1402.1.F, “for all proposed residential subdivisions containing six or more lots/units including the existing lot/unit, and, all proposed nonresidential subdivisions and/or land developments which are estimated to produce between 500 gallons and 100,000 gallons of water per day over any thirty-day period, the applicant/developer shall complete a “Water Resource Impact Study” which shall in general satisfy” Subsections (1) through (5). *A waiver from this Section is requested. The request states:*

The developer would like to discuss this requirement in more detail with the Township and a hydrogeologist.

52. In accordance with Section 1405.2.A, “if a sanitary sewer system is within 5,000 feet of the proposed subdivision or land development, the Board of Supervisors shall require the applicant/developer to provide sewage facilities to connect to this system where practical and shall prescribe the procedures to be followed by the applicant/developer in connecting to the system. *A waiver from this Section is requested. The request states:*

Public sewer infrastructure does not abut nor run adjacent to any boundary lines of the subject parcel along Franklin Hill Road (T-569).



Proposed Lots 1 through 6 will connect to the existing sanitary sewer along 3-Point Garden Road. Proposed Lot 7 which takes access from Franklin Hill Road will be served by an on-lot sewage disposal system.

Sanitary sewer exists along S.R. 0447 and is less than 5,000-feet from the proposed development (the intersection of S.R. 0447 and Franklin Hill Road is approximately 1,200-feet). Extending the existing sanitary sewer along Franklin Hill Road or connecting to the existing system along 3-Point Garden Road shall be discussed for Proposed Lot 7.

STORMWATER MANAGEMENT ORDINANCE COMMENTS

53. In accordance with Section 223.1.A, “for water quality and stream bank erosion, the applicant shall design a water quality BMP to detain the proposed conditions two-year, twenty-four-hour design storm to the existing conditions one-year flow using the SCS Type II distribution. The applicant shall demonstrate that applicant has made provisions (such as adding a small orifice at the bottom of the outlet structure) so that the proposed conditions one-year storm takes a minimum of 24 hours to drain from the facility from a point where the maximum volume of water from the one-year storm is captured (i.e., the maximum water surface elevation is achieved in the facility). At the same time, the objective is to not attenuate the larger storms in "no detention" areas (District C) only. This can be accomplished by configuration of the outlet structure not to control the larger storms, or by a bypass or channel to divert only the two-year design storm into the basin or divert flows in excess of the two-year storm away from the basin.” *Routing calculations for the proposed rain gardens and infiltration trenches shall be provided in the Stormwater Management & PCSM Report to determine compliance with this Section.*
54. In accordance with Section 223.1.J.(3)(a), “Stream Buffer Delineation. A fifty-foot inner buffer and 100-foot outer buffer, measured perpendicular to and horizontally from the top-of-bank on both sides of any stream, for a total distance of 150 feet, shall be maintained on both sides of any stream.” *It appears a stream exists on Proposed Lot 7 and the required inner and outer buffers shall be shown on the plan to confirm compliance with the permitted activities/development listed in Sections 223.1.J.(3)(a)(1)(a), 223.1.J.(3)(a)(2), and 223.1.J.(3)(a)(3), and the maximum disturbance of the outer buffer listed in Section 223.1.J.(3)(a)(4).*
55. In accordance with Section 225.1.A.(3)(a), “a minimum depth of 24 inches between the bottom of the BMP and the limiting zone” is required. *Soil testing shall be completed, and the results submitted for review.*
56. In accordance with Section 225.1.A.(3)(b), “an infiltration and/or percolation rate sufficient to accept the additional stormwater load and drain completely as determined by field tests conducted by the applicant's design professional”. *The Rain Garden Design Data worksheet in the Stormwater Management Report notes infiltration testing was completed in 2014. The results shall be submitted for review. Confirmation that the infiltration testing from 2014 is still valid is required.*
57. In accordance with Section 225.1.A.(3)(c), “the recharge facility shall be capable of completely infiltrating the recharge volume within four days”. *The drawdown time in the Rain Garden Design Data worksheet in the Stormwater Management & PCSM Report shall be revised as needed based on the results of the infiltration testing.*



58. In accordance with Section 225.1.A.(4), the size of the recharge facility shall be based on the volume criteria provided in this Section. *Calculations in support of the required recharge volume shall be submitted for review.*
59. In accordance with Section 225.B, “the applicant shall submit a detailed soils evaluation of the development site to determine the suitability of recharge facilities. The evaluation shall be performed by a design professional, and, at a minimum, address soil permeability, depth to bedrock and subgrade stability. The general process for designing the infiltration BMP shall be:
- (1) Analyze hydrologic soil groups as well as natural and man-made features within the watershed to determine general areas of suitability for infiltration practices.
 - (2) Provide site-specific infiltration test results (at the level of the proposed infiltration surface) in accord with ASTM Guide No. D 5126 to determine the appropriate hydraulic conductivity rate.
 - (3) Design the infiltration structure for the required storm volume based on field-determined capacity at the level of the proposed infiltration surface.
 - (4) If on-lot infiltration structures are proposed by the design professional, the applicant shall demonstrate to the Township that the soils are conducive to infiltrate on the lots identified.

The soil testing shall be completed and submitted as required.

60. In accordance with Section 226.1 and Table 226.1, the project site is located within Stormwater Management District A therefore, the post development peak flows of the 2-, 5-, 10-, 25-, 50-, and 100-year storm events shall be less than the predevelopment peak flows of the 1-, 5-, 10-, 25-, 50-, and 100-year storm events, respectively. *Routing calculations for the proposed rain gardens and infiltration trenches shall be submitted to determine compliance with this Section. Calculations shall include all storm events, including the 5-year event.*
61. In accordance with Section 226.6, “off-site areas that drain through a development site are not subject to release rate criteria when determining allowable peak runoff rates. However, on-site drainage facilities shall be designed to safely convey off-site flows through the development site.” *Offsite drainage area/land use calculations have been provided. Peak flow calculations shall be provided for the offsite drainage areas and the areas shall be included in the required basin routings.*
62. In accordance with Section 227.2, “all calculations consistent with this Part using the Soil Cover Complex Method shall use the appropriate design rainfall depths for the various return period storms consistent with current NOAA Atlas 14 Point Precipitation Frequency Estimates. If a hydrologic computer model such as PSRM or HEC-1 is used for stormwater runoff calculations, then the duration of rainfall shall be 24 hours. The SCS "S" curve shown in Figure B-1 of Appendix B shall be used for the rainfall distribution.” *Data in support of the rainfall depths utilized in the hydrographs shall be included in the Stormwater Management & PCSM Report to determine compliance with this Section.*



63. In accordance with Section 227.4, times of concentration for overland flow shall be calculated using the methodology presented in Chapter 3 of Urban Hydrology for Small Watersheds, NRCS, TR-55 (as amended or replaced from time to time by NRCS).” *Per Chapter 3 of the TR-55 Manual, a minimum time of concentration of 6 minutes shall be utilized. In addition, calculations in support of the time of concentration utilized in all hydrographs shall be submitted for review and the time of concentration paths shall be shown on the Pre-Development and Post-Development Watershed Plans (Sheets WS-1.1 and WS-2.1).*
64. In accordance with Section 227.11, “the design of any stormwater detention facilities intended to meet the performance standards of this Part shall be verified by routing the design storm hydrograph through these facilities using the Storage-Indication Method. The design storm hydrograph shall be computed using a generally accepted calculation technique that is based on the NRCS Soil Cover Complex Method. The Township may approve the use of any generally accepted full hydrograph approximation technique that shall use a total runoff volume that is consistent with the volume from a method that produces a full hydrograph.” *Basin routings and pond reports shall be included in the Stormwater Management & PCSM Report.*
65. In accordance with Section 228.3, “any stormwater management facility (i.e., BMP, detention basin) designed to store runoff and requiring a berm or earthen embankment required or regulated by this Part shall be designed to provide an emergency spillway to handle flow up to and including the 100-year proposed conditions, considering the primary outlet control structures are blocked. The height of embankment must provide a minimum 1.0 foot of freeboard above the maximum pool elevation computed when the facility functions for the 100-year proposed conditions inflow. Should any stormwater management facility require a dam safety permit under Chapter 105, the facility shall be designed in accordance with Chapter 105 and meet the regulations of Chapter 105 concerning dam safety which may be required to pass storms larger than the 100-year event.” *The proposed spillways with elevations shall be shown in the plan view and details shall be provided on the plan. The Applicant shall ensure that stormwater is retained within the proposed rain gardens and infiltration trenches for the 1- through 100-year post development storm events. Routing calculations shall be provided to confirm the proposed high-water elevation in each stormwater management facility.*
66. In accordance with Section 228.6, “any drainage conveyance facility and/or channel not governed by Chapter 105 must be able to convey at a minimum, without damage to the drainage structure or roadway, runoff from the twenty-five-year design storm. Conveyance facilities to or exiting from stormwater management facilities (i.e., detention basins) shall be designed to convey the design flow to or from that structure. Roadway crossings located within designated floodplain areas must be able to convey runoff from a 100-year design storm. Any facility located within a PennDOT right-of-way must meet PennDOT minimum design standards and permit submission requirements.” *Calculations and details in support of the swales shown on Proposed Lots 4, 5 and 6 shall be provided for review.*
67. In accordance with Sections 228.7, “storm sewers must be able to convey at a minimum proposed conditions runoff from a twenty-five-year design storm without surcharging inlets, where appropriate. Storm sewers and other drainage conveyance systems may be required to convey larger design storms based on individual drainage/subdrainage area characteristics. Storm sewers to or exiting from stormwater management facilities shall be designed to convey design flow to or from that structure.”



- a. *Profiles of the proposed storm sewer pipes crossing the driveway to Lot 3 and the shared driveway to Lots 4 and 6 shall also be provided on the plan. In addition, calculations in support of the proposed driveway pipes shall be submitted for review.*
 - b. *The invert elevation down utilized in the storm sewer calculations for Inlet 2 to LS1 is low when compared to the proposed grading.*
 - c. *Inlet 2 surcharges. The calculations shall be revised for compliance with this Section. In addition, the top of grate elevation at Inlet 2 utilized in the storm sewer calculations is inconsistent with that shown in the plan and profile views. The top of grate elevation shall be revised.*
 - d. *The level spreader shall be shown with the associated elevations labeled in the Bypass Pipe Run profile on Sheet C-6.1.*
 - e. *The top of grate elevation at Inlet 4 is high when compared to the existing contours. The plan, profile, and calculations shall be revised accordingly.*
 - f. *The existing and proposed contours shall be labeled with elevation in the plan views provided on Sheet C-6.1.*
68. *In accordance with Section 229.1, “any earth disturbance must be conducted in conformance with Chapter 102”. All submissions to, correspondence with, and approvals from the County Conservation District/PADEP shall be provided. Refer to Comment 23 for comments related to our review of the Erosion & Sediment Control Plan (Sheets C-8.1 and C-8.2).*
69. *In accordance with Section 233.2.B.(1), the plan shall include “the location of the project relative to highways, municipalities or other identifiable landmarks”. A location map shall be provided on the Post Construction Storm Water Management Plan (Sheet C-9.1).*
70. *In accordance with Section 233.2.B.(3), the plan shall include “existing streams, lakes, ponds or other waters of the commonwealth within the development site”. An existing stream appears to be located on Proposed Lot 7. The stream shall be identified on Sheet C-9.1.*
71. *In accordance with Section 233.2.B.(8), the plan shall include “soil names, boundaries, hydrologic group, and limitations”. The soils shall be delineated on the Pre-Development and Post-Development Watershed Plans (Sheets WS-1.1 and WS-2.1) and the Post Construction Storm Water Management Plan (Sheet C-9.1). Sheet C-9.1 shall also include descriptions and the hydrologic soil group for each existing soil.*
72. *In accordance with Section 233.2.B.(9), “limits of earth disturbance, including the type and amount of impervious area that would be added” shall be provided on the plan. The amount of proposed impervious surfaces shall be provided on Sheet C-9.1.*
73. *In accordance with Section 233.2.B.(11), the plan shall include “the name of the development, the name and address of the applicant, the address of the property, and the name and address of the individual or firm preparing the drainage plan”. The name and address of the developer and the property information shall be provided on Sheet C-9.1.*



74. In accordance with Section 233.2.B.(15), the plan shall include “the total parent tract and, if different, development site boundary and size with distances marked to the nearest foot and bearings to the nearest degree”. *Metes and bounds along the existing property and proposed lots shall be provided on Sheet C-9.1.*

In accordance with Section 233.2.B.(17), the plan shall include “plan and profile drawings of all SWM BMPs, including drainage structures, pipes, open channels, and swales”. *Profiles of the proposed storm sewer pipes crossing the driveway to Lot 3 and the shared driveway to Lots 4 and 6 shall also be provided on the plan. In addition, details in support of the swales shown on Proposed Lots 4, 5 and 6 shall be provided on the plan.*

75. In accordance with Section 233.2.B.(20), the plan shall include “overland drainage patterns and swales with time of concentration paths”. *The offsite drainage areas and drainage areas to the proposed inlets and driveway pipes shall be included on the Pre-Development and Post-Development Watershed Plans (Sheets WS-1.1 and WS-2.1). In addition, the time of concentration paths shall be shown on Sheets WS-1.1 and WS-2.1.*
76. In accordance with Section 233.2.B.(21), the plan shall include “a twenty-foot-wide access easement to and around all stormwater management facilities that would provide ingress to and egress from a public right-of-way as necessary to implement the operations and maintenance (O&M) plan. Alternatively, a blanket easement may be provided by a note on the plan”. *An access easement shall be provided to permit, but not obligate the Township to access and observe, repair, replace, and/or maintain the proposed stormwater management facilities should the property owner fail to do so, at no cost to the Township.*
77. In accordance with Section 233.2.B.(24), the plan shall include “a statement, signed by the applicant, acknowledging that any revision to the approved drainage plan must be approved by the Township and that a revised erosion and sediment control plan must be submitted to the Conservation District for a determination of adequacy”. *The required statement shall be placed on Sheet C-9.1.*
78. In accordance with Section 233.2.B.(25), the plan shall include the following signature block for the design professional.

I, (design professional), on this date (date of signature), hereby certify that the drainage plan meets all design standards and criteria of the [name of applicable Act 167 plan] and Smithfield Township Stormwater Management Ordinance.

The required signature block shall be placed on Sheet C-9.1.

STORMWATER MANAGEMENT AND STORM SEWER DESIGN COMMENTS

79. The difference between the garage floor elevations and the spot elevations at the garages on all the proposed lots is 6-inches or greater. The plans shall be revised.
80. On Proposed Lots 1, 4, and 6, the spot elevations and slopes along the proposed driveways are illegible and the plan shall be revised for clarity.



81. On Proposed Lot 5, the spot elevation at the southwestern corner of the proposed dwelling is illegible and on Proposed Lot 6, the spot elevation at the southeastern corner of the proposed dwelling is also illegible. The plan shall be revised for clarity.
82. The Infiltration Trench Detail on Sheet C-9.2 shall be revised to include dimensions and elevations related to the construction of each trench. In addition, a berm shall be provided on the downslope side of the proposed infiltration trenches to ensure the stormwater runoff enters the trenches. The plan view and detail shall be revised.
83. The spillway with elevation shall be shown and labeled in plan view at each rain garden.
84. The Rain Garden Detail on Sheet C-9.2 shall include design information for each rain garden, i.e., bottom elevation, top of berm elevation, spillway elevation and width, etc.
85. A Level Spreader Detail is provided on Sheet C-9.2. The level spreader shall be shown and labeled in plan and profile views. In addition, the detail shall be revised to include dimensions and invert elevations related to the level spreader construction.
86. The proposed grading along the shared driveway accessing Lots 4 and 6 shall be revised to direct stormwater runoff to Infiltration Trench 12 as intended.
87. The “Bypass” labels between Proposed Lots 5 and 6 and between Proposed Lots 2 and 5 are located within the drainage area to Rain Garden 16, and the plan shall be revised.
88. In the POI 001 and POI 002 drainage areas, the sum of the onsite and off-site areas utilized in Worksheet 4b for each individual drainage area (i.e., Rain Garden 1 Onsite, Rain Garden 1 Offsite, Rain Garden 2 Onsite, etc.) does not equal the total onsite and off-site drainage areas (i.e., 4.00 acres for POI 001 Onsite, 10.05 acres for POI 001 Offsite, etc). The drainage areas shall be revised accordingly.
89. The predevelopment drainage area for POI 001 shown on Sheet WS-1.1 is less than that utilized in Worksheet 4b. This shall be addressed.
90. Operation and maintenance notes for the proposed infiltration trenches shall be provided on Sheet C-9.2.

MISCELLANEOUS COMMENTS

91. A current property deed shall be submitted.
92. The proposed contours shall be labeled with elevation on all plans.
93. The proposed utility easements shall extend to the property lines along 3-Point Garden Road and the shared property lines between Proposed Lots 1 and 5 and between Proposed Lots 4 and 6.
94. The shared driveway accessing Proposed Lots 1 and 5 is referenced as having a width of 12-inches and shall be revised.
95. The Resource Impact and Conservation Analysis shall be listed on Sheet C-1.1 to acknowledge its submission and inclusion in the plan set.



96. On Sheet C-9.1, the Covenant and Agreement for Maintenance of Privately Owned BMPs references “Borough” and shall be revised.
97. The sheet numbers (i.e., 1 of 2, 2 of 2, etc.) on the Post Construction Storm Water Management Plans (Sheets C-9.1 and C-9.2) are inconsistent with those listed in the Sheet Index on Sheet C-1.1. The sheet numbers shall be revised for consistency.
98. A pipe bedding detail shall be provided on the plan in support of the proposed storm sewer.

The above comments represent a thorough and comprehensive review of the information submitted, with the intent of giving the Township the best direction possible. However, due to the nature and number of comments, the receipt of a revised plan submission may generate new comments.

In order to facilitate an efficient re-review of revised plans, the Design Engineer shall provide a letter, addressing item by item, their action in response to each of our comments.

If you should have any questions regarding the above comments, please call me.

Sincerely,

Jon S. Tresslar, P.E., P.L.S.
Township Engineer

JST/meh

cc: Julia Heilakka – Township Manager
Ronold J. Karasek, Esquire – Smithfield Township Solicitor
Ken Wolf – Smithfield Township Zoning Officer
J. Michael Preston, P.E., Ott Consulting, Inc. – Applicant’s Engineer
Robert L. Weseloh, CPA, LTS Homes, LLC – Applicant/Developer
Rick Wyckoff, LTS Homes, LLC – Applicant/Developer
Melissa E. Hutchison, P.E. – T&M Associates