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Memo To: Ms. Cheryl Chrusz, Planning Board Secretary
Montgomery Township Planning Board
2261 Van Horne Road
Route 206
Belle Mead, NJ 08502

Date: May 3, 2023
55175 01

From: Rakesh R. Darji, PE, PP, CME
Environmental Resolutions, Inc.
Planning Board Engineer

RE: BPS Development Company, LLC
Preliminary and Final Major Site Plan with Variances
Application #PB-07-22
Engineering Review #3
Block 28003, Lot 211
Hartwick Drive and Village Drive, Skillman
Township of Montgomery, Somerset County

Our office has reviewed the revised plans and documents submitted by the applicant for a Preliminary and Final Site Plan with Variances application. The subject tract consists of Block 28003, Lot 211, comprising approximately 4.4 acres. The applicant proposes to construct a 65,730 SF Assisted Living and Memory Care Facility with a building footprint of 35,404 SF containing 80 units with the capacity for 91 beds. Approximately 13.6% of the building area is dedicated to common facilities, services and activities for residents. The site is currently undeveloped but contains a stormwater management facility, inlets and piping.

In addition to the Memory Care facility, site improvements include parking, sidewalks, resident courtyards, landscaping, lighting, utilities and stormwater facilities, which includes a small-scale bioretention basin.

The site is located on the northeast corner of the Hartwick Drive and Village Drive intersection. The plans propose two (2) full-movement driveways onto the site from Hartwick Drive. A grass paver emergency access drive is proposed along Village Drive.

The zoning district is Age Restricted Housing (AHR).

Numerous easements are located on the property. These include easements for utility, stormwater/drainage and ROW. A 30 FT right-of-way dedication is proposed along the frontage with Village Drive. In addition, a 60 FT wide township easement for the future extension of Village Drive (also known as Research Drive). A portion of the existing stormwater piping will be relocated, requiring a vacation of the existing easement and providing a new 20 FT drainage easement. A 10 FT wide drainage easement is located along Hartwick Drive.

The following information, submitted by the applicant in support of this application, has been reviewed by our office:

1. Montgomery Township Land Development Application, dated December 2022.
2. Checklist, Final Major Subdivision Plats and Final Major Site Plan, dated December 2022.

3. ALTA/NSPS Land Title Survey, prepared by Dynamic Survey, LLC, dated November 2, 2022.
4. Preliminary and Final Major Subdivision and Site Plan, prepared by Dynamic Engineering, dated December 7, 2022, revised to April 10, 2023, consisting of the following:
 - a. Cover Sheet, sheet 1 of 20.
 - b. Aerial Map, 2 of 20.
 - c. Demolition Plan and Steep Slopes Analysis, sheet 3 of 20.
 - d. Site Plan, sheet 4 of 20.
 - e. Grading Plan, sheet 5 of 20.
 - f. Drainage Plan, sheet 6 of 20.
 - g. Utility Plan, sheet 7 of 20.
 - h. Utility Profiles, sheet 8 of 20.
 - i. Landscape Plan, sheet 9 of 20.
 - j. Lighting Plan, sheet 10 of 20.
 - k. Soil Erosion and Sediment Control Plan, sheet 11 of 20.
 - l. Soil Management and Compaction Plan, sheet 12 of 20.
 - m. Construction Details, sheets 13 through 16 of 20.
 - n. Vehicle Circulation Plan, SU-30, sheet 17 of 20.
 - o. Vehicle Circulation Plan, Fire Truck sheet 18 of 20.
 - p. (new) Vehicle Circulation Plan, Ambulance, 19 of 20.
 - q. (new) Vehicle Circulation Plan, Mini Bus, 20 of 20.
5. Stormwater Management, Groundwater Recharge and Water Quality Analysis, prepared by Dynamic Engineering, dated December 2022.
6. Addendum to the Stormwater Management, Groundwater Recharge and Water Quality Analysis, prepared by Dynamic Engineering, dated February 2023.
7. Report of Preliminary Geotechnical and Stormwater Basin Area Investigation, prepared by Dynamic Earth, dated November 4, 2022.
8. Stormwater Management Operation and Maintenance Manual, prepared by Dynamic Engineering, dated December 2022, last revised February 2023.
9. Traffic and Parking Assessment, prepared by Dynamic Traffic, LLC, dated December 9, 2022.
10. Environmental Impact Statement, prepared by Dynamic Engineering, dated December 2022.
11. Water and Sanitary Sewer Engineer's Report, prepared by Dynamic Engineering, dated December 2022.
12. Architectural Plans, for Assisted Living and Memory Care Facility, prepared by Studio Architects, dated December 13, 2022, revised to March 19, 2023, consisting of 5 sheets.
13. Utility Will-Serve Letters – PSEG Gas and Electric, dated September 2022

General Information

Applicant: BPS Development Company, LLC
643 Starlight Drive
Atlanta, GA 30342
cwade@braemarpartners.com

Owner: Sharbell Plainsboro, Inc.
1 Union Street, Suite 208
Robbinsville, NJ 08691

Engineer: Jeffrey Haberman, PE
Dynamic Engineering Consultants, PC
1904 Main Street
Lake Como, NJ 07719
jhaberman@dynamiccec.com

Architect: Studio Architects
1000 Marietta Street NW, Suite 244
Atlanta, GA 30318
cvankley@studioarchitects.us

Attorney: Frank Petrino, Esq.
Princeton Pike Corporate Center, Suite 203
2000 Lenox Drive
Lawrence, NJ

Zoning

1. This parcel is within the Age Restricted Housing (ARH) zoning district.
2. An assisted living facility is permitted provided that the gross acreage devoted to the assisted living facility within the mixed-use, age restricted housing development shall not exceed 5-1/2 acres of land with a maximum of 120 beds.
3. Area, yard, and coverage requirements are detailed in §16-4.13.d2.

	Required	Proposed	
Maximum Lot Area	5.5 Acres	4.43 Acres	Conforms
Minimum Lot Width	-	566.2 FT	
Minimum Lot Frontage	-	566.2 FT	
Minimum Lot Depth	-	414.8 FT	
Setbacks			
Min Front Yard Setback (Hartwick)	50 FT	51 FT	Conforms
Min Front Yard Setback (Village)	50 FT	90.1 FT	Conforms
Min Side Yard Setback	50 FT	100 FT	Conforms
Min Rear Yard Setback	50 FT	124.8 FT	Conforms
Parking Requirements			
Min Parking Setback (Hartwick)	25 FT	12.5 FT	Variance
Min Parking Setback (Village)	25 FT	112.3 FT	Conforms
Min Parking Setback (Side)	25 FT	60.4 FT	Variance
Min Parking Setback (Rear)	25 FT	N/A	
Parking Space: 1/3 space/unit (80 UN)	27 spaces	42 spaces	Conforms
Electric Vehicle: 15% of # of spaces	4 spaces	1 space	Waiver
Drive Aisle Width (perpendicular space)	28 FT	24 FT	Waiver
Coverage and Height			
Maximum Building Height	35 FT/2.5 stories	35 FT/2. stories	Conforms
Maximum Lot Cover	50%	35.7%	Conforms

Variances

1. Per §16-4.13d2(b), parking shall be a minimum from the Hartwick Drive ROW. The applicant is proposing 12.5 FT from the lot line along Hartwick. A variance will be required. *The site plan has been revised; a variance is no longer required.*
2. Per §16-4.13d2(b), the minimum distance for parking to a residential lot line is 75 FT. The applicant is proposing parking 62.4 FT from the property line of the “Apartments at Montgomery.” *The site plan has been revised; a variance is no longer required.*

3. Per §16-4.13d2(b), the minimum distance of the building to a residential lot line is 150 FT. The entrance overhang of the proposed building is 100.9 FT to the property line of the “Apartment at Montgomery.” *The site plan has been revised; a variance is no longer required.*
4. Per §16-4.13d2(c), the required buffer with the western property line is 25 FT. The applicant is proposing a buffer of 12.5 FT. A variance will be required. *The site plan has been revised; a variance is no longer required.*
5. Per §16-4.13d2(c), the required buffer composition is 6 FT high evergreens. The applicant is proposing a diverse planting selection. A variance will be required.
6. Per §16-4.13d2(c), the required buffer tree spacing is 10 FT on-center. The applicant is proposing a tree spacing of 30 FT. A variance will be required.
7. Per §16-4.13i1, any loading dock space shall be at least 15 FT in width by 40 FT in length. The applicant is proposing a loading area of 15 FT x 36.8 FT. A variance will be required.

Waivers

8. Per §16-5.3, no fence or wall shall be erected over 4 feet in height in side, rear and front yard areas. The applicant is proposing an 8 FT high board-on-board fence along the western side of the building. A waiver will be required.

General

9. It is unclear if there is sufficient back up space for a vehicle exiting the Electric Vehicle Charging station space. In addition, this space plus the next three spaces may conflict with vehicles entering the site. ***Testimony has been provided at the March 2023 Planning Board meeting.***
10. The applicant should discuss: ***Testimony will be provided at the May Planning Board meeting.***
 - a. Anticipated timing of deliveries
 - b. Anticipated timing of trash pickup
 - c. Anticipated number of employees per shift
11. There is a utility easement running along the Hartwick Drive frontage. The plans are unclear as to the purpose of the easement in the pre- and post-developed condition. In addition, there is a notation to the north of an easement to be extinguished and a proposed ROW to be vacated. The applicant should provide testimony regarding what will be remaining. The site plan should clearly identify the various dashed lines within Village Drive.
12. The northern most proposed sidewalk along Hartwick Drive should be aligned to be completely within the ROW. It appears to encroach on Lot 211 as it approaches the headwall/drainage crossing to the property line. ***Comment has been addressed satisfactorily.***
13. A dimension from the property line to the proposed gate for the emergency access drive should be provided. ***Comment has been addressed satisfactorily.***
14. The sidewalk along Hartwick Drive is located both in the Right of Way and on private property. It is recommended that the sidewalk location be revised so that it is entirely within the ROW. ***Comment has been satisfactorily addressed.***
15. This office defers to the Fire Marshal for further comments regarding any fire lanes, signage, etc. relating to site safety.

Grading and Drainage

16. None of the provided test pit locations are located within the bottom of the proposed basin. An additional test pit should be performed to verify consistency with testing used to design the basin. ***The applicant will provide an additional test pit in the vicinity of the proposed basin.***
17. This office recommends that all existing pipes and structures to remain televised to ensure that the structures are intact and functioning as designed. ***A note has been added to the plan indicating lines to be televised.***
18. The callout for the SP3 test pit should be moved. It is obstructed by a TC/BC callout. ***Comment has been satisfactorily addressed.***
19. The grass swale is proposed to be relocated/realigned. The applicant should provide testimony that the change to the swale will not impact existing drainage conditions or downstream facilities. ***Testimony has been provided and an analysis of the swale is included in the Stormwater report.***
20. We defer to the Township Utility Department for further comment regarding the utilities including any analysis that may be necessary for the downstream pumpstation. ***Acknowledged.***

Stormwater Management

21. The applicant should provide testimony regarding the existing on-site basin. This testimony should discuss the following: ***Testimony has been provided at the March 2023 Planning Board meeting.***
 - a. The condition of the basin and any maintenance or repair that may be required.
 - b. The condition of the existing concrete walls
 - c. The condition of the existing pipes
 - d. The condition of the existing structures (headwalls, inlets, etc.)
 - e. It is recommended that the applicant televise the existing stormwater pipe to determine if there are any locations that may require repair or replacement prior to final surface work (paving, sidewalks, etc.).
 - f. If the basin was designed to safely accept the conveyance from the proposed improvements without any adverse impact downstream.
 - g. There is a proposed easement (existing stormwater easement which has been relocated), state who the easement is dedicated to.
 - h. If the existing basin has the same storage capacity once site improvement have been completed.
22. The applicant is proposing to relocate an existing grass swale. In accordance with Chapter 9.3 of the NJ BMP manual, the following are the requirements for the grass swale: ***Testimony has been provided at the March 2023 Planning Board meeting.***
 1. A maintenance plan must be provided and it should be reflected in a deed notice recorded in the County office.
 2. The applicant should provide testimony regarding any changes in flow expected due to the proposed site improvements and the relocated swale.
 3. No calculations for the grass swale have been provided in the Stormwater Report for the project.
 4. There is an existing grass swale which will be relocated to accommodate the proposed parking. The applicant indicates that the maintenance of this swale will be the responsibility of the same party as that of the existing basin. It is recommended that a stormsewer easement be provide for the swale.
23. The applicant should provide a discussion regarding any easement or agreement needed in order for the proposed improvements to ultimately discharge into the existing basin. ***As a condition of approval, the applicant will coordinate with the current property owner for an easement agreement for discharge into the existing basin. Agreement shall be provided prior to signature of approved plans.***

24. The routing diagram should route the existing basin as a “basin” and not a “link.” *As a condition of approval, the hydraulic routing for the existing basin will be modified. The applicant agreed at the hearing to analyze the existing outlet structure to assess if it can be modified to provide additional detention to further mitigate downstream flooding.*
25. The project proposes to disturb more than 0.5 acres of land, creates greater than an additional 5,000 SF of regulated impervious surface, and creates greater than an additional 5,000 SF of regulated motor vehicle surface and thus is classified as a "major development" for the purposes of stormwater management and must comply with the requirements of NJAC 7:8 and the Township of Montgomery Ordinance §16-5.2. The project must, therefore, meet the following requirements: *Acknowledged.*
- a. Address the rate and volume of runoff from the project site. This may be done in one of three ways as outlined in NJAC 7:8:
 - Reduce the peak rate of runoff from the project area by 50%, 25%, and 20% for the 2-year, 10-year, and 100-year storms, respectively; or
 - Demonstrate that the rate of runoff for the project is not increased from the pre-developed condition at any point along the post-developed condition hydrograph; or
 - Demonstrate that the peak rate of runoff is not increased and that the increase in volume and variation in timing will not have an adverse downstream impact.
 - *The applicant proposes to attenuate the majority of the runoff such that the peak rates of runoff from the area of disturbance are reduced in accordance with the first method outlined above by proposing the bioretention basin. This basin will collect run-off from the site and discharge to the existing basin at a rate which reduces the stormwater to the existing basin from the pre-disturbance conditions.*
 - b. Reduce the Total Suspended Solids (TSS) loading in stormwater by 80% for new impervious.
 - *The proposed bioretention basin is designed to store and infiltrate the entire water quality storm, thus meeting the requirements of §16-6.5, Table 1, which state that the bioretention basins are approved as having an 80% total TSS removal rate.*
 - *There are no TSS removal rates discussed for the existing basin.*
 - c. Demonstrate that the amount of groundwater recharge in the post-developed condition is equal to or greater than the pre-developed.
 - *The applicant has provided the Groundwater Recharge spreadsheet to show that no recharge occurs in the existing condition, thus the proposed development satisfies the recharge requirements.*
 - d. Green Infrastructure.
 - *The applicant meets requirements for green infrastructure by proposing the bioretention basin.*
26. The lot shall be “deed restricted” to require the perpetual maintenance of the stormwater management system in accordance with the approved Stormwater Management Maintenance Plan. The restriction shall reference the maintenance manual by title, preparer, and most recent revision date. Further, the restriction shall allow that, if the responsible party fails to maintain the system, the Township shall have the right (but not the obligation) to enter upon the property to perform the requisite maintenance at the responsible party's expense. A note indicating this should be placed on the plan. Further information on the deed records and

dedications are found at §16-5.2u. ***As a condition of approval, the applicant will coordinate the recording of this deed restriction. A note referencing the deed restriction is provided on the drainage plan.***

27. The applicant has designed the bioretention stormwater basin to collect motor vehicle runoff, and open space areas. Proposed roof runoff is directly discharged into the existing basin. The applicant should discuss how the downstream drainage will be impacted as a result of this proposed project. ***Testimony has been provided at the March 2023 Planning Board meeting.***
28. The applicant has provided an operations and maintenance report. The applicant should review the requirements of the Township Stormwater Ordinance and the NJ DEP BMP manual to ensure that all requirements have been met.
 - a. It is noted that the existing basin as well as the re-aligned swale are not included in the Operations and Maintenance manual. The maintenance for the existing improvements should be discussed and responsibility noted.
 - b. Inspection guidelines for rip rap should be provided.
 - c. It is recommended that the maintenance plan for the small-scale bioretention basin in the BMP manual be provided for guidance in the Operations and Maintenance manual. This should include all maintenance and care of the vegetation.
 - d. Maintenance of the grass-paver access roadway should be included.
 - e. The soil bed detail should be provided in this plan.
 - f. The OCS chart on page 3 should be revised to coordinate with the identification of the OCS on the plan set. One is labeled OCS#1 and the other is OCS#13.
 - g. Label the existing detention basin on the site plan.
29. The operations and maintenance manual states that Sharbell will bear the responsibility for operations and maintenance of the existing basin and the grass swale. The applicant should provide written documentation from Sharbell that they will continue to maintain these stormwater facilities. ***As a condition of approval, the Applicant will provide written documentation.***
30. OCS#13 on the drainage plan shows an invert out to be 112.40; the detail is 112.42 for the 15” pipe. In addition, review and revise the invert for the 4” pipe on the drainage plan. ***Comment has been satisfactorily addressed.***

Landscaping

31. It is recommended that the maintenance guarantee be provided for a 2-year period. ***Comment has been satisfactorily addressed, per Planting Note #5. Planting Specification #11 should be updated for the 2-year maintenance.***

Soil Erosion and Sediment Control

32. It is recommended that hatched areas for compaction testing and exempt areas is provided to differentiate between the two. ***Comment has been satisfactorily addressed.***

Approvals and Permits

33. The following is the list of outside agency approvals required for this application. The applicant should submit copies of all permits/approvals to the Board as each are received.
 - a. Montgomery Township Planning Board
 - b. Montgomery Township Engineering Department
 - c. Montgomery Township Shade Tree Commission
 - d. Somerset County Planning Board, *application submitted December 2022.*
 - e. Somerset Union County Conservation District, *application submitted December 2022.*
 - f. NJDEP, TWA approval
 - i. NJ DEP, LOI (Presence Absence), *application submitted December 2022.*
 - g. NJ American Water

- h. Delaware and Raritan Canal Commission, *application submitted December 2022*.

Administrative

33. The applicant shall pay all taxes, fees and required escrow due and owing.
34. This office reserves the opportunity to make further comment if additional information is presented.
35. All future resubmissions of the plans shall clearly indicate a revision date and be accompanied by a point-by-point response letter to the comments of the Board's professional staff.

New Comments

- A. The width of the sidewalk along Hartwick Drive should be provided.
- B. An accessible ramp should be provided on the northern side of the southern driveway site access.
- C. This office recommends that a person gate be provided at the trash enclosure.
- D. There is an area located under the porte-cochere that is landscaped. If this is a curbed location, spot grades and TC/BC grades should be provided.
- E. The contours and spot grades in the vicinity of the emergency spillway should be reviewed. A 122.5 spot grade is located on the 122 contour.
- F. The Top of Curb at the trash enclosure is higher than the spot grade on the inside of the sidewalk, causing runoff toward the building.
- G. The plans set dated 2/17/2022 indicated that the existing storm piping is RCP. The revised plan set shows that HDPE is the existing piping (see the pipe crossing summary). In addition, one of the existing pipes was 30" RCP and is now shown as 24" HDPE. These pipes are not proposed to be removed for construction of this project.
- H. Sanitary sewer cleanout inverts should be provided.
- I. Notes should be added to the landscaping plans to provide guidance for caring for any plantings located within a sight triangle. It is recommended to limb trees to 7 FT and trim bushes to 3 FT.
- J. Provide the description of any proposed sight triangle easements (per §16-5.3c) and identify the locations on the site plan.
- K. It is noted there may be conflicts with the proposed lighting and landscaping at several locations. The plans should be removed so that lighting is not impacted by the proposed landscaping.
- L. There are 12 "A1" callouts for the lights, where only 10 are provided on the plan/lighting table. The stray callouts should be removed.
- M. Provide a sequence of construction.
- N. Dimension the height of the trash enclosure to the highest point of the proposed roof.
- O. No overflow detail is provided on the roof drain detail (sheet 14).
- P. The applicant should provide testimony regarding the proposed chain to be used as a gate to emergency access. Testimony should indicate if the emergency vehicles are to drive through the chain.
- Q. Addendum to Stormwater Report
- a. Inlet #58 should be identified on the plan. (Pipe Sizing Appendix)

Should you or the applicant have any questions, please do not hesitate to contact this office.

RRD/mb

Cc: BPS Development Company, LLC, applicant (cwade@braemarpartners.com)
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