Memorandum

To: Chapel Hill Town Manager

From: Scott Radway, AICP Date: March 17, 2009

Subject: Aydan Court R-SS-C Zoning Map Amendment Request

Statement of Compliance

The applicant believes that the proposed Aydan Court medium density development meets the goals for residential development in the R-SS-C district under Option B below. (The R-SS-C District standards as proposed in "Ordinance B" are shown below in bold text. The applicant's response information is shown in italics.)

"3.4.1 Residential-Special Standards-Conditional Zoning Districts

A Residential-Special Standards-Conditional (R-SS-C) is hereby established, pursuant to North Carolina General Statutes Section 160A-382. Uses allowed in this district shall be those described in Section 3.7 and Table 3.7-1 (Use Matrix) of this Chapter, and are permitted only upon issuance of a Special Use Permit by the Town Council pursuant to Section 4.5 of this Chapter.

Residential development and the recreational, open space, and other urban amenities associated with such development when located within the Residential-Special Standards-Conditional district shall, to the extent practical, comply with the goals and objectives of the Comprehensive Plan. Zoning Atlas amendment applications, proposing to rezone a site to the Residential-Special Standards-Conditional district shall comply with A or B below:

- A. An applicant must demonstrate that the associated Special Use Permit application complies with the following objective:
 - 1. Promotion of a 100% affordable on-site housing component.

OR

- B. An applicant must demonstrate that the associated Special Use Permit application <u>achieves the purposes of the Comprehensive Plan by complying</u> with each of the following objectives:
 - 1. Promotion of affordable housing on-site, and off-site when appropriate, that complies with or exceeds the Council's current affordable housing policy.

Aydan Court proposes to provide four affordable housing units on-site and a payment in lieu to the Town Housing Trust Fund for the equivalent of 4.8 affordable housing units.



- 2. Implementation of an energy management and conservation plan that addresses carbon reduction, water conservation and other conservation measures that comply with or exceed the Council's current energy management/ conservation policies.
 - a. <u>Energy Management and Conservation Carbon Reduction</u> Aydan Court will comply with the Council resolution for an energy reduction of 20% above ASHAE as outlined in the applicant's Energy Management Plan of November 6, 2007. (Attached) The plan also identifies a homeowners association Energy Management Plan for the ongoing use of the Condominium Association in maintaining the commitment to lowering energy use. Common area electricity will be purchased from NC Greenpower.
 - b. <u>Water Conservation Measures</u> The applicant will implement a stormwater collection and re-use program for Aydan Court. It will provide for (1) collection and retention of stormwater that will be used for flushing toilets in the condominium-flats building and (2) collection of and retention of stormwater for on-site irrigation.

These measures will result in (1) reducing the amount of energy used, (2) reducing the potable water used by residents, and (3) reducing the amount of stormwater permitted to leave the site by 34%.

3. Encouragement of a balanced private and public transportation system that promotes connectivity and safety for vehicles, bicycles, and pedestrians including direct and/or indirect improvements to the community's transportation systems.

Aydan Court is located in the NC 54 roadway corridor that enters Chapel Hill from the southeast. Public roadway, transportation system, pedestrian, and bicycle facilities improvements by Aydan Court include:

- a. Paired "leftover" directional left turning lanes at the entrance to Aydan Court and the entrance of Downing Creek.
 - 1) As well as facilitating entry to Aydan Court for drivers headed east, these improvements provide more convenient and safer access to the existing Downing Creek and Sherwood Forest residential neighborhoods. This will also eliminate the unsafe median break at Little John Street.
 - 2) The paired leftover turning lanes provide a U-Turn location within Chapel Hill for public, emergency, and service vehicles thus eliminating the need to travel one mile into Durham before reaching the U-Turn location at Huntingridge Road. This also provides U-Turn options for Chapel Hill Transit buses.
- b. A \$17,000 payment for Transit System Improvements will be made for the construction of a bus shelter that will serve Aydan Court and adjoining properties, especially the UNC-Chapel Hill Foundation, Inc. property, when and where the Town determines.
- c. The internal private roadway in Aydan Court is designed to provide a future connection to the UNC-Chapel Hill Foundation, Inc. property immediately to the west of the site and by ex-



tension to Meadowmont. This future connection will eliminate auto trips that would otherwise use NC 54 and will encourage pedestrian and bicycle use for trips going to the Meadowmont town center and public facilities (parks/greenway).

d. Aydan Court will extend the existing public NC 54 bicycle and pedestrian path 2,040 linear feet to provide a safe walking and biking path from Meadowmont to the Upper Little Creek Waterfowl Impoundment area located east of Aydan Court.

In summary, Aydan Court will provide significant improvements to the community's transportation and circulation systems.

4. Support of a healthy downtown district <u>and/or neighborhood commercial/ employment centers</u> by identifying or providing reasonable accessible pedestrian/bicycle and non-vehicular access to downtown/centers.

In support of this objective, the proposed development shall be located within a reasonable walking/cycling distance of downtown or within a reasonable walking/cycling distance of a neighborhood commercial /employment center, and include frontage along one of the following transportation corridors:

- NC 54 between Town limits and US 15-501; or
- Martin Luther King Jr. Blvd. between Rosemary Street and I-40; or
- <u>US 15-501 between I-40 and Chatham County.</u>

The applicant provides the following information in response to conditional rezoning requirement number 4 above.

- a. Aydan Court meets the location requirement as it is within the Town limits of Chapel Hill and has frontage on and direct access to NC 54.
- b. Aydan Court will be a medium density residential neighborhood that supports a healthy Meadowmont neighborhood commercial and employment center by adding the retail and service business purchasing power of 58 dwelling units with reasonable pedestrian and bicycle access.
- c. At the request of the Town Council, Aydan Court's design includes an internal circulation plan for pedestrians, bicyclists, and drivers of vehicles that provides for direct access to Meadowmont thru the UNC at Chapel Hill Foundation Inc. property when it develops in the future. This link is less than 1/4th mile in length to Meadowmont and approximately ½ mile to the Meadowmont Neighborhood center. This is a 5-10 minute walk for adults.

For reference of time and distance, the applicant notes that this connective pathway is the same distance from the Meadowmont town center as the recently approved Residences of Grove Park is from the intersection of Franklin and Columbia Streets.

d. Between now and the time the UNC at Chapel Hill Foundation Inc. property is developed, Aydan Court residents will have direct access to Meadowmont and to the existing Chapel Hill



Transit routes that serve Meadowmont via the extension of the NC 54 pedestrian and bicycle trail by the applicant. This extension of the NC 54 trail will complete this trail to the eastern town limits of Chapel Hill. This walk is approximately a 10-15 minute walk for an adult.

e. Aydan Court residents will be able to use their bicycles on the NC 54 bicycle and pedestrian trail to access the Meadowmont transit stop(s) where they can easily take Chapel Hill Transit – and their bicycles – downtown. This is a form of mobility that we currently see every day as buses with bicycles attached enter the downtown.

The applicant believes that the Aydan Court application meets this criterion for rezoning.

5. Promotion of Art (Private or Public) in private development that is visually accessible to the public and/or provide direct/indirect opportunities for public art.

The applicant proposes to place an artwork visible to the public, but not visually competitive with the Town of Chapel Hill entry monument sign, within the NC 54 right-of-way at the front of Aydan Court,

The artwork shall be placed outdoors in the NCDOT right-of-way, subject to NCDOT approval of an appropriate encroachment agreement. The artist and artwork shall be selected jointly by the developer and the Town of Chapel Hill Public Art Administrator. The value of this public art installation shall be no less than \$20,000 including artist fee, fabrication cost, transportation, and installation cost. The artwork shall be installed prior to the receipt of a Certificate of Occupancy for the last dwelling unit at Aydan Court.

If NCDOT will not permit the placement of the artwork in the NC 54 right-of-way at the front of Aydan Court, the developer shall make a payment-in-lieu of \$20,000 to the Chapel Hill Public Arts fund prior to issuance of the Certificate of Occupancy for the last dwelling unit at Aydan Court. This PIL shall be used only for the creation and installation of an artwork on public property with appropriate credit citing the source of all funds used in the artwork.

6. Protection of adjoining residential uses and neighborhoods with appropriate screening/buffering and/or architectural design elements that is congruous and sensitive to the surrounding residential areas.

Aydan Court has no immediately adjoining residential uses or neighborhoods and is unlikely to have a residential neighborhood located on the UNC-Chapel Hill Foundation Inc. land to its west or the Army Corps of Engineers property to its north and east. Downing Creek is located on the southern side of NC 54 and separated from Aydan Court by the NC 54 right-of-way that varies between 200-300 feet.

Because of the NC 54 embankment, the intermittent steam at the front of the Aydan Court site, and the dense vegetation within the stream buffers, the Aydan Court development will be visually screened to Downing Creek residents and travelers on NC 54.

7. Protection/restoration of the natural environment by implementing program(s) addressing stream restoration, wildlife habitat, woodland, meadow restoration, steep slope protection,



and exotic invasive vegetation management, including programs that encourage private/public partnership to restore and enhance environmental resources.

Restoration of the Natural Environment

The intermittent stream corridor at the front of the Aydan Court site will be protected by the current RCD regulations. However, not all stream corridors along which development has occurred over the past 25 years have been equally well protected. Therefore the applicant proposes a payment of \$10,000 to the Town of Chapel Hill for use as needed to provide for the remediation or restoration of damaged stream corridor(s) in Chapel Hill. These could be corridors within which the town currently has greenways and trails or some other appropriate stream corridor as determined by the Town Council.

Natural Resource Protection

For Aydan Court, protection of the natural environment is a principle that has both on-site and off-site components. Discussed below are some of the on-site measures that will protect both areas on-site as well as the adjoining off-site Upper Little Creek Impoundment area.

a. Intermittent Stream Protection

The intermittent stream corridor at the front of the site is the primary area of the site that was not previously disturbed for farming activity. The stream channel now carries stormwater run-off from portions of the Aydan Court site, NC 54, and the UNC at Chapel Hill Foundation Inc. properties. This stream corridor, including the area of the RCD buffer, contains the majority of the older, larger hardwood trees on-site.

The Aydan Court proposal is designed to maintain and protect this intermittent stream and its RCD buffer by:

- 1) Creating an entry road with an arched culvert bridge over the stream crossing to minimize disturbance in the stream corridor, and
- 2) Collecting all the stormwater falling on the entrance roadway and sidewalks and directing this stormwater and its accumulated particulate matter away from the stream corridor and into the on-site stormwater management facilities.

The limited development in the RCD and the arched culvert bridge will allow this stream corridor to continue to serve as a wildlife movement corridor to and from the adjoining Upper Little Creek impoundment.

b. On-Site Stormwater Harvesting and Use – Stormwater Discharge Reductions

Aydan Court will harvest stormwater for: 1) flushing of commodes in the condominium building and 2) irrigation of landscaping materials, thereby substantially reducing the amount of stormwater that will leave the site.



- 1) The condominium rooftop area represents 17% of the impervious surface area of the site. Water collected from this surface will be used for the flushing of commodes in that building with OWASA as a back-up water source.
- 2) Irrigation storage and reuse tanks will collect water from another 11% of the impervious surface area of the site.

These two water harvesting and re-use practices reduce the amount of stormwater that will leave the site to the equivalent of an impervious surface coverage of 34% - substantially less that the 50% impervious surface discharge maximum permitted by current LUMO regulations.

The Upper Little Creek Impoundment area has a drainage shed of 13,000 acres in Chapel Hill and Carrboro. As a result of the stormwater harvesting practices, only 1.96 acres of impervious surface area in the Aydan Court 5.8 acre site will drain into the Impoundment. The run-off will be treated by multiple smaller integrated facilities so that any individual facility failure will be supported by other elements in the treatment train.

The permanent stormwater management and stormwater re-use facilities will ensure that the amount of stormwater and temporary suspended solids that are discharged from the site will be significantly less than permitted by the current town standards.

Further, the stormwater management system will capture completely all rain events up to and including a 100-year storm event. A 25-year storm event is the town standard.

Performance bonds that guarantee the functioning of the system after development are required prior to the issuance of occupancy permits.

c. Landscape Practices at Aydan Court

- 1) Non-invasive and native plant materials will be used at Aydan Court with the goal of reducing irrigation demands over time once the plants are established.
- 2) Organic landscape practices will be used, including food grade organic fertilizer. This will reduce substantially, if not eliminate, the discharge of fertilizer nitrogen and phosphates that are damaging to water bodies.
- d. <u>Steep Slope (25%+) Protection & Public Development Requirements</u>

A detailed discussion is provided in the attached November 6, 2008 memorandum.

e. Erosion and Sediment Control Practices During Construction

Responding to concerns about the potential effects of erosion and sediment on the Upper Little Creek Impoundment, the applicant has provided an Erosion Control plan at this time. This plan is typically provided at Final Construction Plan review. This plan has been reviewed by the Town staff and the Orange County Erosion Control Office and officer.



No site activity can occur until erosion control measures are approved, on-site meetings with inspectors have been completed and tree protection and silt protection fencing is in place.

This erosion control plan was developed by the applicant's engineer and stormwater management design team with the added input of the site development contractor. This procedure assures that early in the process the site contractor understands the importance of erosion and sediment control and that the plan has all the needed guidance from those that will do the on-site work.

8. Promotion of green and ecologically sound developments.

Aydan Court incorporates green building and ecologically sound development practices in the following ways:

a. <u>Limiting Off-Site Impacts – Reusing Stormwater and Reducing Stormwater Discharge & Its</u>
Affects

The stormwater management plan creates a system with numerous safeguards and built-in redundancies that will aid in the long-term protection of the sensitive ecological conditions of the adjoining Upper Little Creek Impoundment. It is a multi-faceted rainwater management concept.

The variety of rainwater management elements provide a system that will reduce the negative effects of concentrated and accumulated stormwater while they add visual and landscaping variety and functionality.

b. <u>Carbon Reduction and Energy Conservation</u>

- 1) Aydan Court will reduce the per household demand for electricity generated by carbon producing power plants. (See the attached Energy Management Plan.)
- 2) Electricity used for common areas and facilities will be purchased from NC Greenpower.
- 3) Aydan Court will establish a Home Owners' Association maintenance manual to guide homeowners on energy management practices within their homes.

c. Solid Waste Reduction - Recycling

Aydan Court will encourage recycling by providing the easiest storage and collection systems for the respective types of dwelling units: (1) Indoor storage and individual floor recycling locations for the Condominium building residents and (2) indoor storage and curbside pickup for the townhome residents.

d. <u>Environmental Protection – Resident Awareness and Support</u>



Marketing materials for Aydan Court will include information that explains in detail the progressive and unique on-site stormwater re-use facilities. In addition, at closing, Aydan Court buyers will receive information about environmental protection organizations such as Riverwatch and Clean Sweep and will be encouraged to join and support these organizations.

9. Encouragement of a community character that promotes economic vitality, <u>environmental</u> protection and social equity.

<u>Community Character</u> - The location of Aydan Court in the NC 54 corridor places the highest emphasis on maintaining a green front yard to continue the open, green, visual landscape when entering Chapel Hill. Aydan Court accomplishes this more than any existing or proposed development along the NC 54 corridor by developing residentially with buildings that are visually screened by existing vegetation.

<u>Economic Vitality</u> – Aydan Court will provide additional tax base for Chapel Hill and provide additional purchasing power within Chapel Hill. This will aid to the overall economic strength of the town and will support existing businesses, rather than providing competition from new, outlying business.

<u>Environmental Protection</u> – The applicant has provided a large amount of material about environmental protection in the information provided in support of findings #7 and #8 above. The applicant believes that the proposed plan not only provides the highest level of protection of the adjacent wildlife and water resources impoundment, but provides a higher level of environmental protection than possible if developed as a single-family neighborhood in the current R-1 Residential District.

<u>Social Equity</u> – As a residential property, Aydan Court will provide two types of employment opportunities. First, the site and building construction employment available during construction and second, the service and maintenance jobs required by the homeowners association for the upkeep of the buildings and landscaping owned in common.

Aydan Court also contributes to social equity by providing both on-site affordable housing and a proportional affordable housing payment-in-lieu. The on-site housing will be able to address housing for households of 1-2 persons. The payment-in-lieu can be flexibly used to provide housing for families with children in other locations within Chapel Hill.