LILAC HILLS RANCH
FEIR GLOBAL RESPONSES
PROJECT CONSISTENCY WITH GENERAL PLAN POLICY LU-1.2

A number of commenters assert that the County is precluded by law from approving the Project because the Project does not comply with General Plan Policy LU-1.2 and the Community Development Model. Some comments were received that challenge the REIR by suggesting that the REIR did not adequately analyze the Project's consistency with the General Plan's overall policies and objectives. Finally, a number of comments assert that the REIR included unsubstantiated assertions in favor of the Project and should have included other opposing viewpoints in its analysis. This global response was prepared to address these issues.

CEQA

Some commenters assert that the REIR failed to analyze whether the Project would further the objectives of the Guiding Principles of the General Plan. The underlying premise of the General Plan is to conserve natural resources and develop lands and infrastructure more sustainably in the future. (Page 1-16) The General Plan identifies those goals and policies that contribute to achieving this premise as listed in Table I-1. As required by CEQA, the REIR determined whether the Project would result in any significant environmental impacts by analyzing whether the Project met all of the relevant policies listed in Table I-1, including the principles of LU-1.2 and the Community Development Model, as described throughout each of the subchapters of the REIR and in Appendix-W to the REIR. Furthermore, all of the goals and policies of the General Plan are based upon the ten guiding principles that are set forth in Chapter 2 of the General Plan. (Page 2-6) The RREIR analyzed whether the Project met the ten guiding principles by its analysis of the appropriate policies that implement those principles throughout each of the subchapters of the REIR and in Appendix-W to the REIR.

Finally, a number of commenters state that the REIR should have included other opposing viewpoints in its analysis. They assert that Kaid Benfield's blog post, **"Green Sprawl Is Still Sprawl,"** submitted via email by EHL, September 3, 2013, is substantial evidence that the Project does not meet LU-1.2. However, discrepancies arising from different methods for assessing environmental issues do not undermine the validity of an REIR's analysis if the Lead Agency provides a reasonable explanation supporting the REIR's analysis. When competing experts arrive at different results, courts will defer to the agency if there is substantial evidence in the record supporting the REIR's approach. See Laurel Heights Improvement Association v. Regents of University of California (1988) 47 Cal.3d 376.

The County has considered Mr. Benfield's comments but found that his analysis of the project was based upon USBC LEED®ND[1] certification not in terms of being an "equivalent" design. LU-1.2 focuses on the design component of LEED®®ND Certification process. The REIR and Specific Plan provide sufficient facts and analysis to support the County's conclusion that all of

[1]The U.S. Green Building Council (USGBC®) and LEED for Neighborhood Development (LEED®ND) are trademarks owned by the U.S. Green Building Council and are used with permission. The information provided by the County of San Diego in this response is not intended to represent the opinion of the USGBC®.

the components of LU-1.2 have been met and that the Project is in compliance with the Community Development Model.

General Plan Conformance with Policy LU-1.2

A number of comments question the County's ability to approve the Project asserting that the Project does not comply with General Plan Policy LU-1.2 and the Community Development Model. Policy LU-1.2 specifically states:

Prohibit leapfrog development which is inconsistent with the Community Development Model. Leapfrog Development restrictions do not apply to new villages that are designed to be consistent with the Community Development Model, that provide necessary services and facilities, and that are designed to meet the LEED-Neighborhood Development Certification or an equivalent. For purposes of this policy, leapfrog development is defined as Villages densities located away from established Villages or outside of established water and sewer service boundaries.

Policy LU-1.2 does not prohibit new villages from being established, rather it allows new villages to be developed that "are designed to be consistent with the Community Development Model, that provide necessary services and facilities, and that are ***designed to*** meet the LEED-Neighborhood Development Certification ***or an equivalent.*****"[***Emphasis added*]

In determining whether a project complies with the General Plan, the Board of Supervisors is considered uniquely qualified to interpret the provisions of the General Plan and their decision carries a strong presumption of regularity if supported by findings and substantial evidence. (*No Oil, Inc. v. City of Los Angeles* (1987) 196 Cal.App.3d 223, 243 and *Eureka Citizens for Responsible Gov't v. City of Eureka* (2007) 147 CA4th 357.) The County's determination as to whether the Project is consistent with the General Plan will not be set aside by a court unless the County has acted arbitrarily, capriciously, or without evidential support. (*No Oil, Inc. v. City of Los Angeles , supra,* 196 Cal.App.3d 223, at p. 243.) Where a provision of the general plan might be considered ambiguous, the court will defer to the local government's resolution of that ambiguity so long as the interpretation adopted is reasonable. (Save Our *Peninsula Committee v. Monterrey County Bd. Of Supervisors* (2001) 87 Cal.App.4th 99, 142.)

A number of cases provide a framework for determining the meaning of general plan policies, which is similar to the analysis that is used to interpret statutes, contracts, and other instruments. The primary goal in construing the meaning of a statute is to ascertain its legislative intent so as to effectuate the purpose of the law. No Oil, Inc. v. City of Los Angeles , supra, 196 Cal.App.3d 223, at p. 244.). The language of the statue must be examined giving the words their ordinary, commonsense meaning and conferring significance to all the words used. (Friends of Lagoon Valley v. City of Vacaville (2007) 154 Cal.App. 4th 807, 825.) The courts have consistently held that an interpretation that would render words as insignificant or mere surplusage, should be avoided. (DYNA–MED, Inc v. Fair Employment and Housing Commission (1987) 43 Cal..3d 1379, 1386.). With this background, the requirements of LU-1.2 are discussed below:

Requirements of LU-1.2

1. Project must be designed to be consistent with the Community Development Model.

The General Plan Land Use Framework defines the Community Development Model as consisting of three regional categories- Village, Semi-Rural and Rural Lands. The highest intensities of development are located in the "Village" and are surrounded by areas of lesser intensity including "Semi-Rural" and "Rural Lands." The edge of a "Village" can be defined by a boundary that can be used to differentiate permitted development densities and design standards. The "Village" would contain the densest neighborhoods and a broad range of commercial and civic uses that are supported by a dense network of local roads containing bicycle lanes and walkways linking the neighborhoods with parks, schools, and public areas. Outside of the "Village," "Semi-Rural" areas would contain low-density residential neighborhoods, small-scale agricultural operations, and rural commercial businesses. (General Plan, page 2-8.)

The Project complies with the Community Development Model because it proposes a new "Village" Regional Category that is surrounded by Semi-Rural Regional Category lands, which transitions to Rural Regional Category areas. (See Specific Plan, Figure 8.) The project has been designed with the highest intensities (commercial, mixed-use and attached residential) within the central portion of the project (Town Center) and the lower-intensity residential uses around the perimeter of the site (single-family detached residential uses.) The Town Center includes high-density residential development, commercial and professional offices uses, various private facilities, multiple private parks, and community trails. Compact residential neighborhoods surround the Town Center towards the Project perimeter and support several small parks and community trails. There are also two Neighborhood Centers (highly abbreviated forms of the Town Center) planned southeast of the Town Center. The northern Neighborhood Center clusters 105 attached homes with commercial and retail uses on 4.3 acres, and the southern Neighborhood Center is consistent with the model concept of graduating lesser intense uses away from its core, supporting the commercial uses. The Project perimeter transitions to surrounding semi-rural areas by featuring: wider, ranchette-style lots, a 50-foot wide orchard-planted buffer, and a 104-acre natural open space preserve. The road network leads to the Town Center and Neighborhood Centers and there are over sixteen miles multi-use community trails providing a pedestrian linage to every part of the community, which also connects to the County regional trail system. (See Specific Plan, Part V.B., pp. v-7 to v-9) (REIR, Subchapter 3.1.4.2, Land Use Planning, p. 3-87-89; Technical Appendix W, Att. A, pp. 1-2; Specific Plan, Part II.G., pp. II-38-40.)

2. Project must provide necessary services and facilities.

The project will provide necessary services and facilities to its residents. Specifically, the Project is located within the following service districts: the County Water Authority, Valley Center Municipal Water District (VCWMD), Valley Center Pauma Unified School District, Bonsall Unified School District and the Deer Springs Fire Protection District (DSFPD). The VCWMD provided a Project Facility Availability Form for both sewer and water, which indicates that the Project is eligible for service and facilities are expected to be available within the next 5 years. Project Facility Availability Forms have also been provided from other service districts as well, such as the school districts and DSFPD. Based upon the data in the Lilac Hills Ranch Fire Service Response Capabilities Assessment (attached as appendix "D" to the Specific Plan) DSFPD would have the existing capacity to respond to expected calls and would not be

overloaded due to the build out of the project. (See REIR, Subchapter 1.2.1.7, pp. 1-22 to 1-27; Specific Plan, p. II-7; pp. II-30 to II-34, pp. IV-11 to IV-16)

The Project will be responsible for the construction/improvement or the payment of appropriate mitigation fees for private roads, storm drain facilities, underground utility lines, potable and irrigation water lines, water reclamation and distribution facilities, storm water detention basins, wet weather storage ponds, parks and recreational facilities and a school site. Infrastructure improvements will follow the phasing of the Lilac Hills Ranch Specific Plan and the project will be conditioned to provide the facilities as needed by the Project. This will ensure that adequate infrastructure is available to each phase of development at the appropriate time. Finally, acceptable mitigation is included that would allow emergency services to be provided to the project consistent with the requirements of the General Plan as outlined in REIR Subchapter 2.7.2.4. (See also REIR, Subchapter 1.8.4; Specific Plan, pp. III-52-53 and III-69 to III-71.) (See Specific Plan, p. III-49 and p. V-14; pp. IV-12 to IV-16

3. Project must be … designed to meet the LEED- Neighborhood Development Certification or an equivalent.

LEED- Neighborhood Development ("LEED-ND") is a rating system for neighborhood planning and development projects that incorporates the principles of smart growth, New Urbanism, and green building and infrastructure. It is a trademarked program administered and marketed by the U.S. Green Building Council (USGBC) in which a developer pays USGBC to rate a project once it has been fully developed. ("LEED 2009 for Neighborhood Development," Congress for the New Urbanism, Natural Resources Defense Council and the U.S. Green Building Council, Updated Oct. 2012, page xii, which page is incorporated herein by this reference.) It is not meant to be a national standard that replaces zoning codes or comprehensive plans. (id at page 15, which page is incorporated herein by this reference.)

Policy LU-1.2 does not demand rigid conformance to the LEED®-ND program, but rather uses the term "equivalent." The word equivalent is not defined in Policy LU-1.2 or in the General Plan and a number of questions have been raised as to its meaning. The ordinary meaning of the word equivalent is described by the dictionary as something that is "corresponding or practically equal in effect." (Webster's II New College Dictionary, Third Edition, 2005.) Similar definitions can be found from other sources, such as for purposes of determining when alternative designs will be at least equivalent to conventional technologies designed to meet fire codes; fire experts have determined if congruency in meeting design objectives can be established, then alternative design is deemed to be equivalent to the conventional method in the context of performance. ("Empirical Validation of Detection Systems Equivalency for Coincidence Suppression Actuation, Ming He, John Vythoulkas, Wes Marcks, Vision Fire & Security 2007, Suppression and Detection Research and Applications –A Technical Working Conference, page 1, which page is incorporated herein by this reference, and can be found at (http://www.nfpa.org/~/media/files/proceedings/empiricalvalidationofdetectionsystemsequivalency.pdf?as=1&iar=1&la=en)

It is reasonable for the Board of Supervisors to interpret the word "equivalent" to mean that a village could be designed to meet a program that is corresponding to the LEED®-ND Certification program or designed in accordance with the underlying principles of LEED®-ND (smart growth, New Urbanism, and green building and infrastructure). In other words, a project may be approved if found to have been designed in a manner that is corresponding or practically equal in effect in performance or outcome with LEED®-ND.

The idea that the County can substitute a corresponding or equal program with LEED®-ND is not an uncommon tenet under California law. For example, California, Public Contract Code Section 3400 generally prohibits state agencies, political subdivision, or municipal corporation, from drafting specifications for bids in connection with the construction, alteration, or repair of public works that calls for a designated material, product, thing, or service *by specific brand or trade name* (as in the case of LEED®-ND) but when such a brand name is called for in connection with a bid, it provides a period of time prior to and after, the award of the contract for submission of data substantiating a request for substitution of ***"an equal" item.*** (See also "Guide to Bidding and Contracting for School Districts and Community College Districts," March 22, 2013.)

Some commenters assert that this policy must be strictly interpreted to mean that new villages must qualify for LEED®-ND certification, or must be LEED®-ND certified, or qualify to meet or be certified by a program that is *identical* to LEED®-ND in all aspects. However, there are a number of problems with this interpretation. First, as a trademark program, LEED®-ND cannot be explicitly duplicated by any other program. Therefore no identical program can ever legally exist. In particular, the LEED- ND manual warns:

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Second, the interpretation by some commenters that a new village could only be found to comply with Policy LU-1.2 if it qualified or was certified as LEED®-ND would render the term "equivalent" meaningless. Similarly, an interpretation that an equivalent program means it must be identical to LEED®-ND would also mean that it was pointless for the Board of Supervisors to have inserted the term "equivalent" when adopting Policy LU-1.2. The courts have consistently held that an interpretation, that would render words as insignificant or mere surplusage, should be avoided. (*DYNA–MED, Inc v. Fair Employment and Housing Commission* (1987) supra 43 Cal.3d at p. 1386. See also *Moyer v. Workmen's Comp. Appeals Bd.* (1973) 10 Cal.3d 222, 230. *Select Base Materials, Inc. v. Board of Equalization* (1959) 51 Cal.2d 640, 645.)

Some commenters assert that only new villages that meet the Prerequisite-Smart Locational requirement of LEED®-ND can be approved by the County. Again this would suggest that only LEED®-ND could be used to design a village since the Prerequisite-Smart Locational requirement is unique to the LEED®-ND program. As discussed above, this is inconsistent with the inclusion of "equivalent" in Policy LU-1.2. Also, this would mean that new villages could only be established in very limited areas within the unincorporated County that qualify as urban infill areas under LEED®-ND. However, most areas in the County that would qualify as urban infill under LEED®-ND are likely already designated as a Village Regional Category under the current General Plan. In such cases, development of these areas would be an expansion of an existing village and Policy LU-1.4 would apply. Therefore, an interpretation that requires new villages to comply with the Prerequisite-Smart Locational requirement of LEED®-ND would essentially render Policy LU-1.4 meaningless. This interpretation is also contrary to language in the General Plan that indicates that land use designations are not to be locked in perpetuity and that amendments to the General Plan will be allowed as determined appropriate by the Board of

Supervisors. The General Plan states that it is intended to be a dynamic document and "must be periodically updated to respond to changing community needs." The General Plan also states that amendments will be reviewed to ensure that such changes are not detrimental to public health, safety, and welfare (General Plan, page 1-15). Rather, new villages are expressly allowed so long as consistent with the Community Development Model and the other requirements of LU-1.2. Furthermore, the General Plan includes a number of policies that address future growth, such as LU-3.2 Mix of Housing Units in Large Projects, LU-3.3 Complete Neighborhoods, and H-1.7 Mix of Residential Development Types in Villages.

Therefore, under LU-1.2, a new village may be designed to meet a program that is "corresponding or practically equal in effect" to the LEED®-ND Certification program. As discussed further below, Carrier Johnson + Culture, a professional in the field of smart growth and New Urbanism, has verified the Project for future certification under the ICC 700 *National Green Building Standard* ("NGBS"), a program that has been identified as "equivalent" to the LEED®-ND Certification program. In addition to meeting the criteria of the NGBS program, the Project has also been designed by Calthorpe Associates[2] and can be determined to have been designed to be equivalent or corresponding in performance or outcome with the LEED®-ND Certification program, also as explained further below.

Equivalent Program

NGBS was established in 2007 as a rating system for sustainable development practices and construction. It was established through a consensus process that involved experts in the field of sustainable building practices and other interested stakeholders.[3] NGBS is the only ANSI accredited program in the country, and is considered "equivalent" to the LEED®-ND Certification program for a number of reasons. It provides a program for the design, planning, construction, and certification of land development, including both residential and mixed-use communities. It offers four levels of green certification for site design and land development which is indicated with One through Four Stars, depending on the number of "green" practices incorporated into the project's design and construction. Smart growth practices included within the land development certification include: reduced soil disturbance; stormwater management; heat island mitigation; and innovative zoning to encourage dense, mixed used development near transit options. The NGBS has few mandatory provisions, though all of them must be met for certification at any level. Instead, the NGBS is an expansive point-based system that requires a project to include many different types of green practices. Builders and developers are able to customize projects by the practices they select to earn the "Additional Points" that are required. (See Exhibit "A," letter from Michael Luzier of Home Innovation Research Labs, dated June, 2015, attached and incorporated herein by this reference.)

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[2]In 1991, Peter Calthorpe helped to form an urban planning movement referred to as the Congress for the New Urbanism ("CNU") which has become the foundation for sustainable planning. (See also "Peter Calthorpe," Planetizen, available at http://www.planetizen.com/topthinkers/calthorpe, and incorporated herein by this reference.)

[3]NGBS received approval from the American National Standards Institute (ANSI), which requires standards to be developed through an open and balanced process and subject to regular reviews. As an ANSI accredited standard, NGBS was originally developed by a diverse group of stakeholders consisting of government agencies, municipalities, home building industry stakeholders, and non-profit organizations, including, representatives from the U.S. Department of Energy and the U.S. Environmental Protection Agency. (See Exhibit "A," page 1.)

Home Innovation Research Labs administers NGBS and provides certification services as an independent third- party product testing and certification lab. To be NGBS certified, every building is subject to two independent, third-party verifications. Home Innovation Labs qualifies, trains, and accredits building professionals to provide independent verification services for builders. Verifiers must first demonstrate that they possess experience in residential construction and green building before they are qualified to participate in the verifier training program. After completing the training, verifiers must pass a written exam and demonstrate that they carry sufficient liability insurance before receiving Home Innovation Labs accreditation. Builders must hire an independent, accredited verifier who is responsible for inspecting the project.

The Smart Location Prerequisite has often been raised as a major element of the LEED®-ND program. Although the NGBS program does not have a specific component identified as a Smart Location Prerequisite, Home Innovation Labs does not believe that this would result in a significant difference between the two rating systems. When examining the purpose and performance of the Smart Location Prerequisite, LEED®-ND and NGBS both focus on the locational *criteria, while NGBS* uses a slightly different format to achieve the same goals and overall performance. (See Exhibit "B," Letter from Michael Luzier, Home Innovation Research Labs, dated June, 2015, attached and incorporated herein by this reference.)

The purpose for the LEED®-ND Smart Location Prerequisite is described as: (1) encouraging development within and near existing communities and public transit infrastructure, (2) encouraging appropriate regional development expansion, (3) reducing vehicle miles traveled, and (4) encouraging daily physical activity associated with walking and bicycling. ("LEED 2009 for Neighborhood Development," Congress for the New Urbanism, Natural Resources Defense Council and the U.S. Green Building Council, Updated Oct. 2012, "Smart Location and Linkage," page 1, which page is incorporated herein by this reference.) Home Innovation Research Labs describes NGBS as achieving the same purpose and performance as the LEED®-ND Smart Location Prerequisite but in a different format as shown in the following comparison of the two programs:

1. **LEED®-ND INTENT: "Encouraging development within and near existing communities and public transit infrastructure"**

    - NGBS Section 401, awards points for selection of an infill or greyfield site, which is the same as LEED®-ND, encouraging development near existing communities, however NGBS takes into account slope.

    - NGBS Section 405.6, awards points for practices that are related to multi-modal transportation access.

    - NGBS Section 405.6 (1), awards points if a site is selected with a boundary within one-half mile of pedestrian access to a mass transit system or within five miles of a mass transit station with available parking.

2. **LEED®-ND INTENT: "Encouraging appropriate regional development expansion"**

    - NGBS Section 403.1 (1-2) contains mandatory requirements to ensure that a natural resources inventory is created and those priority areas are preserved. This credit ensures that new communities avoid priority habitat conservation areas.

- NGBS Section 405.6 (3), awards points for designing walkways, bikeways, street crossings and entrances that promote pedestrian activity and connects new communities to existing areas of development.

- NGBS Section 405.7, awards points for meeting minimum density requirements, which is consistent with LEED®-ND's intent of compact development.

3. **LEED®-ND INTENT: "reducing vehicle miles traveled"**

   - NGBS Section 405.4, awards points for mass transit usage and for increased biking and walking opportunities. Mixed-use development allows for different land uses to be located in close proximity to one another, and in some cases within the same structure. Separated land uses increase automobile dependency and household vehicle miles traveled. By encouraging more mixed-use, developments can be more compact, thus reducing the VMT required by residents. Reduced VMT will reduce fuel consumption and associated emissions, and therefore yield benefits to the overall environment.

   - NGBS Section 405.6 (4), awards points for bike parking and multi-modal transportation to reduce reliance on the automobile.

   - NGBS Section 405.6 (6), awards points for car sharing programs, such as Transportation Demand Programs, that promote and encourage innovative ways to reduce car trips and VMT's.

   - NGBS Section 405.8, awards points for Mixed-Use Development, which focuses on a diversity of uses within walking distance of the residential uses. By encouraging more mixed-use, developments can be more compact, thus reducing the VMT required by community residents. Reduced VMT will reduce fuel consumption and associated emissions, and therefore yield benefits to the overall environment.

4. **LEED®-ND INTENT: "encouraging daily physical activity associated with walking and bicycling"**

   - NGBS Section 405.4 (3), awards points for increased biking and walking opportunities. These practices, under both programs, encourage increased daily physical activity associated with walking and bicycling.

   - NGBS Section 405.6 (3), awards points for community design that promotes and encourages pedestrian activity.

   - NGBS Section 405.6 (4), awards points for bike parking.

Project conformance with NGBS

Carrier Johnson + Culture was hired to independently review the Project for conformance with the NGBS program based upon an application that was submitted to Home Innovation Labs. (See NGBS Application, attached to the Specific Plan as an appendix.) On March 6, 2015, Home Innovation Research Labs issued the Project a Letter of Approval for Future Certification as a Green Land Development project pursuant to the NGBS program once construction is completed. This is the first step toward certification under this program. (See Exhibit "C," letter

from Thomas M. Kenney, Home Innovation Research Labs, dated March 6, 2015, attached and incorporated herein by this reference.)

As the independent verifier for Home Innovation Labs, Carrier Johnson + Culture found that the Project meets all of the fundamental criteria in the NGBS program that makes it equivalent to the LEED®-ND intent, scoring Four out of a possible Four Stars. The Project was awarded points for meeting NGBS sections relating to location, smart growth, compact development and walkability – with the main goal to minimize environmental impacts, reduce the reliance on automobiles and reduce vehicle trip length. Carrier Johnson + Culture found that although no two programs can be exactly the same, after examining the smart growth goals and intent of LEED®-ND and NGBS, they were able to determine that the two programs were equivalent based upon overall performance.

In addition to the overall verification of the Project, Carrier Johnson examined the Project's performance as related to "Location" and found that the Project met all of the fundamental criteria in the NGBS program related to location which makes it equivalent to the LEED®-ND "smart location" criteria intent. In particular, the Project received points for the following: (1) NGBS Section 405.6 (1), for a location in close proximity to multi-modal transportation access, (2) NGBS Section 403.1 (1-2), for avoiding priority habitat conservation areas, (3) NGBS Section 405.6 (3), for allowing people to select from a variety of non-motorized options through neighborhood connectivity, and (4) NGBS Section 405.7, for meeting minimum density requirements of 7 dwelling units per net acre. (See Exhibit "D," letter from Carrier Johnson + Culture, dated June 29, 2015, attached and incorporated herein by this reference).

Designed as an equivalent of LEED®-ND

In addition to the Project being in conformance with the NGBS program, the Project was also designed in a manner that is equivalent or corresponding in performance or outcome with the LEED®-ND Certification program. In order to make this determination, the following method was established by which to compare the Project against the principles of LEED®-ND. First, 18 fundamental development practices ("Green Development Practices) were identified from the various categories of credits that could be received under the LEED®-ND Certification model. These green Development Practices were chosen because they are the key tenements of LEED-ND and recognized smart growth principals. The Project was then evaluated under each of the Green Development Practices as well as against the intent provisions of the corresponding relevant credit categories under LEED®-ND. Subparagraph (a) below describes each of the three topic categories of LEED®-ND, the principles it promotes, and how the Project complies. Subparagraph (b) below outlines each of the Green Development Practices used to design the Project, describes how the practices correlate with the principles of the relevant credit categories of the LEED®-ND program, and how the Project complies.

a. The project is designed to be equivalent to LEED®-ND in that:

    1) **Smart Location and Linkage:** For purposes of this evaluation, some of the relevant underlying objectives for this topic area include: reducing vehicle miles traveled, encouraging daily physical activity associated with walking and bicycling, locating within a water and wastewater service area, conserving natural resources, preserving water quality, natural hydrology, habitat and wetlands, protecting prime and unique soils on farmland from development, and enhancing natural hydrological systems. The Project's location is within existing water and sewer service district boundaries; it protects and restores habitat for sensitive species, wetlands, and natural drainages, and long-term

management is ensured through implementation of a resource management plan; it would promote on-going agriculture land uses on-site; is not in a flood plain; contains 16 plus miles of walkable and bikeable trails; and complies with the Resource Protection Ordinance (RPO) by avoiding 99.7 percent of the RPO defined steep slopes.

2) **Neighborhood Pattern and Design:** For purposes of this evaluation, some of the relevant underlying objectives for this topic area include: promoting transportation efficiency, promoting walking, encouraging physical activity, promoting internal connectivity and to the community at large, clustering diverse land uses, promoting diversity of housing opportunities, improving physical and mental health, promoting local food production, and reducing urban heat. The Project's neighborhood pattern and design creates walkable streets, compact development, mixed-use neighborhood centers, and mixed-income diverse communities; implements traffic calming; provides for a mass transit bus stop and includes a Transit Demand Management program; provides close access to civic and public spaces and to recreational facilities; promotes local food production; has tree-lined streets, parks, and trails; and a neighborhood school that is walkable and bikeable by students because of traffic calming measures.

3) **Green Infrastructure and Building:** For purposes of this evaluation, some of the relevant underlying objectives for this topic area include: reducing effects on natural resources, improving water quality, and reducing heat islands. The Project's buildings will exceed the State's Building Code efficiency standards (2008 Title 24) by thirty percent; construction activity will meet all air and water pollution prevention regulatory requirements; landscaping will be drought tolerant and consist of native and regionally appropriate species; stormwater management plans will reduce pollution; the project will install 2,000 kilowatts (kW) of on-site solar/photovoltaic systems, which are estimated to produce 3,400,000 kW hours of electricity, or approximately 22 percent of the project's total electricity needs at build-out (see RREIR GHG Section); waste disposal will be reduced by 20 percent through the construction of an on-site recycling facility; potable water consumption will be reduced by 20 percent; and light pollution reduction measures will protect night skies; project-related construction activities shall use a minimum of Tier III U.S. EPA/CARB-certified construction equipment for the majority of construction equipment used, during the entire construction period; The project will install high-efficiency public street and area lighting to achieve an overall minimum 15 percent lighting energy reduction; The project will install Energy Star appliances (including clothes washers, dish washers, fans, and refrigerators) in 95 percent of the single-family, mixed-use residential, and senior community residential uses; Project design shall include the installation of Smart Meters; All fireplaces installed in residential uses must be natural gas or equivalent non-wood burning fireplaces; The project requires that only electric-powered landscaping equipment be used on property managed by the homeowners' association (HOA); and lastly, in addition to the Specific Plan policies, performance measures, and project design features, the project's GHG emissions also would be reduced as a result of several existing statewide regulations: Pavley I and II (the latter of which also is sometimes referred to as LEV III or ACC), the LCFS, the RPS, and the Tire Pressure Program. (See "LEED 2009 for Neighborhood Development Rating System," CNU/NRDC/USGBC; "LEED v4 for Neighborhood Development," updated July 1, 2014, USGBC; "LEED 2009 for Neighborhood Development Project Scorecard," USGBC).

b. The following information (as found in RREIR, related Appendixes, and Specific Plan) provides support that the Project has been designed to meet an equivalent of LEED®ND Certification by incorporating the following 18 Green Development Practices: Building Site Selection, Compact and Efficient Development Footprints, Mixed-use Development, Innovative Zoning and Design, Conservation of Wildlife Habitat, Soil Conservation, Storm Water Management, Natural Filtering and Drainage, Water Efficient and Native Palette Landscaping, Operation and Maintenance Plans for Project Plans and Facilities, Recycling and Innovating Wastewater Technology, Pedestrian and Bike Paths Connecting the Community Amenities, Topographic Preservation, Floodplain Avoidance, Sustainable Location, Sustainable Building, Integrated Transportation Planning and Dark Sky Protection. The following provides a description of each of the foregoing Green Development Practices" of the Project that support its design as an equivalent to LEED®ND Certification as well as the equivalent principles of LEED®ND Certification described in the "Intent" provisions of the LEED®ND that it also meets. (Reference Guide "LEED v4 for Neighborhood Development," updated July 1, 2014, USGBC

1. Sustainable Location.

a. The project is located within existing water and sewer district boundaries, namely the County Water Authority and the Valley Center Municipal Water District.

b. Although the project would add traffic to the area, the project will reduce trip length and vehicle distances traveled as a result of locating services in the vicinity of residential uses. The project incorporates principles of smart location as required by the County General Plan, which requires new villages to be located within existing water and sewer districts and near existing infrastructure and facilities. In addition, State and Local planning policies (for example, SB-375 and AB-32) encourage locating Projects near major transportation corridors, in part to reduce commuting distances and carbon footprints by lowering vehicle miles travelled ("VMT's"). The project entrance from West lilac Road is approximately 1.6 to 1.8 miles from the I-15 on and off-ramps, and as shown in Table 4.12 of the Traffic Impact Study (Appendix E), would reduce trip lengths within the Valley Center community by 0.08 miles, assuming the construction of Road 3, and 0.09 miles without the construction of Road 3. The proposed Project is projected to have an average vehicular trip length of 7.6 miles, which is over a half-mile lower than the rest of the Valley Center community, both with and without the construction of Road 3.

c. The Project would encourage daily physical activity associated with walking and biking. The project also locates neighborhood services within short walking and biking distances as follows:

1. The project village core will reserve a future site for a mass transit stop, which is located within a short walk or bike ride from all points within the community.

2. A 16-plus mile landscaped community path and trail network supports pedestrians, bicyclists, and equestrians. Trails are crisscrossed throughout the project encouraging their use from all points. The trail system will tie into the planned County trail system at the north and south ends of the Project. Streets are designed to promote traffic calming through the use of narrow roads, curvatures, roundabouts, landscaping, and parallel parking. The proposed paths are placed parallel to the

streets to reduce vehicle speeds, promote pedestrian connections and increase roadway safety.

d. The Project is designed so that all homes within the project will be located within one-half mile distance of at least seven neighborhood assets or "diverse uses" which are located in the Town Center and neighborhood centers. Among the LEED®ND®-defined "diverse uses" proposed are the following: general store/market, farmer's market, bank, coffee shop, bakery, drug store, senior care center, gym, recreational center, school, civic offices, public park, and commercial office. Project zoning would allow "diverse uses" within one-half mile of the project's geographic center on account of the dense, mixed-uses permitted in the Town Center, the Neighborhood Centers, and the location of the Senior Center and the Group Residential/Group Care Facility.

Therefore the project **Sustainable Location** practice is equivalent to the **Smart Location** principle of LEED®ND (SLL Prerequisite 1), to locate projects within existing water and sewer service district boundaries, to encourage reducing vehicle trips and vehicle distance traveled, to improve health by encouraging daily physical activity associated with walking and bicycling, as well as locating "neighborhood assets" or "diverse uses" within ½ mile walking and biking distance of project residents.

2. **Compact and Efficient Development Footprint.** The Project densities under the County's standards, ranging from 24 du/acre to 2.9 du/acre, result in a compact, pedestrian-oriented planning and design. Project densities are illustrated in the Specific Plan in Table 3, Land Use Summary by Phase. The project also complies with the Community Development Model as explained previously under section 1, which is the County's model for compact development. The Project also includes an extensive and thoroughly integrated, 16 plus mile Trail Network, including community pedestrian and bike paths, linking together the project components, including the Town Center, the Neighborhood Centers, all the Neighborhoods, the school site, the 13.5 acre central park, and the dozen smaller parks and green spaces located throughout the Project. This promotes the project's walkability and livability. The trails include a staging area in the Town Center, and three trail connections at the north and south ends of the Project to trails defined in the County Master Trail Plan. See REIR, Figure 1-4a (Lotting Study) and Figure 1-8 (Trails Plan). Project parks and trails are designed to be wholly integrated with the dedicated 104.1 acre Biological Open Space. The REIR, Figure 1-9 (Open Space and Parks) illustrates this for example, in showing adjacency of the Biological Open Space to four parks, including the 13.5 acre central park, and to the school site and adjoining recreational and play fields areas. Certain trails, towards the Project perimeters connect to the County Master Trail Plan and will also allow equestrian usage.

   The foregoing **Compact and Efficient Development Footprint Practice** is equivalent to the LEED®ND **Compact Development** principle (NPD Prerequisite 2), to conserve land and promote livability, walkability, transportation efficiency and reduce vehicle distance traveled the LEED®ND Walkable Streets principle (NPD Prerequisite 1), to promote walking by providing safe, appealing and comfortable street environments that support public health by encouraging daily physical activity and the LEED®ND **Bicycle Facility** principle(SLL Credit 4), to promote bicycling and transportation efficiency and reduce vehicle distance traveled, as well as to improve public health by encouraging utilitarian and daily physical activity.

3. **Mixed-Use Development.** The Project's Town Center, consisting of 21.4 acres, and the northern Neighborhood Center, 4.8 acres, provide for mixed-use development as shown in

REIR, Project Lotting Study, Figure 1-4a. These areas will be zoned to allow an urban core of mixed use, clustered development, including 375 higher-density, up-to-three-story, attached residential units, including live/work and row homes, some with minimums of 1,000 square feet, along with specialty retail, community serving commercial, professional offices, a town green, a civic center, a country inn, and a central recycling facility, where a trail staging area leads to 16 plus miles of trails. At the southern portion of the Project there will be a senior group residential care facility. The inclusion of smaller, denser homes in the core areas, a senior care facility, and surrounding residential neighborhoods provide a variety of housing types.

The foregoing **Mixed-Use Development** practice is equivalent to the LEED®ND **Mixed Use Neighborhood Center** principle (NPD Credit 3) , to reduce automobile dependence, encourage daily walking, biking, and transit use, and support car-free living by providing access to diverse land uses, and the LEED®ND Mixed Income Diverse Communities principle (NPD Credit 4), to promote socially equitable and engaging neighborhoods by enabling residents from a wide range of economic levels, household sizes, and age groups to live in a community.

4. Innovative Zoning and Design.

a. Variation in Design and Clustering. The Project was designed in accordance with the Community Development Model establishing a new "Village" Regional Category that is surrounded by Semi-Rural Regional Category lands, which transitions to Rural Regional Category areas. (See Specific Plan, Figure 8.) The project has been designed with the highest intensities (commercial, mixed-use and attached residential) within the central portion of the project (Town Center) and the lower-intensity residential uses around the perimeter of the site (single-family detached residential uses.) The Town Center includes high-density residential development, commercial and professional offices uses, various private facilities, multiple private parks, and community trails. Compact residential neighborhoods surround the Town Center towards the Project perimeter and support several small parks and community trails. There are also two Neighborhood Centers (highly abbreviated forms of the Town Center) planned southeast of the Town Center. The road network leads to the Town Center and Neighborhood Centers and there are over sixteen miles of multi-use community trails providing a pedestrian linage to every part of the community, which also connects to the County regional trail system. The Project is compact enough to encourage residents to walk to amenities and service, as all residences would be within half (½) a mile, and less than 10-minute walk from the Town Center or from one of the two Neighborhood Centers.

A snapshot of the compact, village model is seen in the REIR, Project Lotting Study at Figure 1-4a. The Project design also illustrates how residential areas are attractively interspersed among and defined by predominant swaths of open space, parks, and an extensive community path network thus preserving the natural and scenic qualities of the site, which further encourage walking and biking and further reduce auto dependence.

b. Local Design Criteria The County Zoning Ordinance allows for a variety of innovative techniques to address local development criteria and standards. The Specific Plan text includes detailed **development** design criteria and standards for both subdivision design and for architectural design. All development will require Site Plan approval, pursuant to the "D" Special Area Designator, for implementation to ensure compliance with the Design Guidelines and developments standards included respectively in the Specific Plan's Section III, Design Guidelines, and in Section III, Development Standards and

Regulations. These guidelines address the design elements that contribute to Project planning concepts for pedestrian-oriented residential and commercial/mixed use design. Guidelines are provided for architectural styles, facade elements, garage location and design, and landscape themes. Conceptual site plans and architecture for the residential and commercial/mixed use areas of the project are illustrated at the end of Section III of the Specific Plan. . The development of the single family detached areas of the project is regulated by Figures 98 and 99, which identify 17 different lot configurations. The Site Plan required for all detached single family development requires that each lot must show a specific lot configuration from the table coupled with one of 14 single family architectural configurations. This results in a permutation of numerous combinations of lot sizes and architectural styles ensuring that the compact form of development has a wide range and diversity of designs.

c. **Traffic Calming Design.** Pedestrian safety is essential to encouraging a pedestrian-oriented community, and a community where children can safely walk to school. Thus the Project includes multiple approaches to traffic calming throughout the Project. Traffic calming features include roadway design (such as roundabouts, one-way streets and slightly curved streets), road features (such as bulb-outs and on-street parking) and landscaping such as, landscaping areas for trees to be planted close to the curb, to cause automobile drivers to reduce their travel speeds without having to resort to less effective measures (such as speed bumps). The Project includes one public road, West Lilac Road that is designated as part of the County maintained road system. Furthering pedestrian safety, the Project will dedicate and construct a portion of West Lilac Road with a multi-purpose pathway to be built within a 12-foot section of the road right of way and includes an 8-foot Decomposed Granite (DG) pathway and landscaping per the guidelines and standards set forth in the Specific Plan. (Specific Plan, p. 1-20, Figure 1-8.)

The foregoing **Innovative Zoning and Design** practice is equivalent to the LEED®ND **Walkable Streets** principle (NPD Credit 1), to promote transportation efficiency and reduce vehicle distance traveled and to improve public health by providing safe, appealing, and comfortable street environments that encourage daily physical activity and avoid pedestrian injuries, the LEED®ND **Community Outreach and Local Input** principle (NPD Credit 12), to encourage responsiveness to community needs by involving the people through the HOA who live or work in the community in project design and planning and in decisions about how the project should be improved or changed over time, and the **Neighborhood Schools** principle (NPD Credit 15), to promote community interaction and engagement through traffic calming and thereby improve students' health by encouraging walking and bicycling to school.

5. Conservation of Wildlife Habitat.

a. **Conservation by Design**. The project includes the preservation of 104.1 acres of open space that includes native habitat to support a variety of wildlife species. See REIR, Ch. 2.5, Biology Resources Report, Section 8.0 and Table 10 for a summary of impacts and mitigation measures. Mitigation measures will restore, enhance, and maintain open space subject to a Resource Management Plan, funded through an endowment or community facilities district, will enhance and create wetlands, under the jurisdiction of local, state, and federal resource agencies, and will include a Revegetation Plan, with numeric success criteria, and subject to local, state, and federal review and approval prior to issuance of wetland and the first and all subsequent grading permits. The wildlife habitat to remain in the 104.1 acres Biological Open Space on-site will be subject to an

open space easement and maintained according to the guidelines contained in the Conceptual Resource Management Plan. See Table 1 and Section 4.0 of the Conceptual Resource Management Plan. Measures employed to establish and promote wildlife habitat include the preservation of 104.1 acres of biological open space for wildlife use, the on-site creation of 6.0 acres of wetland habitat for wildlife use, and the enhancement of 12 acres of existing disturbed riparian habitat to native riparian habitat for wildlife use. See REIR, Ch. 2.5 Biological Resources Report, Section 8.0 and Table 10. The biological open space being preserved on the project site conserves the local important wildlife corridors. See Figures 14a and 14b of the REIR, Ch. 2.5 Biology Resource Report.

b. Environmentally Sensitive Areas Restored, Mitigated or Avoided. The Project's 104.1 acre Biological Open Space plan assures the permanent conservation of wetlands and associated riparian upland habitats, the restoration of degraded wetland habitat, and the provision of opportunities for wetland enhancement, in accordance with a prior-approved and funded Resource Management Plan (for example the County's MSCP) that meets wetland conservation and mitigation criteria required by local, state, and federal natural resource agencies. For example, the County RPO limits impacts to wetlands, wetland buffers, and sensitive habitat lands and requires a wetland buffer where development is adjacent to wetland areas. According to the REIR Biological Resource Report, current wetland buffers, as contained within the designated limits of the proposed biological open space areas are a minimum of 50 feet wide for the preserved wetlands, with some wetland buffer widths exceeding 100 feet for limited distances. The Project, in total, will mitigate for all impacts to wetlands and associated riparian and upland areas, onsite and offsite, through the following mitigation: coast live oak woodland (preserve 3.3 acres on-site; purchase 1.2 acres off-site); coastal sage scrub (preserve 2.9 acres on-site; purchase 39.4 acres off-site); coastal/valley freshwater marsh (preserve 0.5 acre on-site; create 0.3 acre off-site); southern coast live oak riparian woodland (preserve 22.8 acres on-site; create/purchase 4.8 acres off-site); southern mixed chaparral (preserve 27.1 acres on-site; purchase 26.9 acres off-site); southern willow riparian woodland (preserve 4.2 acres on-site; create/purchase 1.5 acres off-site); southern willow scrub (preserve 5.8 acres on-site; create/purchase 1.8 acres off-site); mule fat scrub (create/purchase 0.3 acre off-site), open water/freshwater wetland (create/purchase 1.5 acres off-site); and disturbed wetland (preserve 0.3 acre on-site; create/purchase 0.3 acre off-site). In addition, the Project will create 6.0 acres of wetland and enhance 12.0 acres of existing disturbed wetland resources on-site to help offset a portion of the creation/purchase of wetland habitat mitigation off-site. Conceptual Resource Management Plans have been prepared that proscribes the protection and maintenance of wetland areas and associated riparian and upland habitats being preserved on the site. See REIR, Ch. 2.5, Biological Resource Report, Attachments 15 (Wetlands) and 16 (Biological Open Space). These plans require, among other measures, the removal of invasive species and fencing and signage to prevent site disturbance and degradation. As stated, the final Resource Management Plan must be reviewed and approved by local, state and federal resource agencies and must meet all sensitive habitat and wetland regulatory standards including no net loss of habitat functions and values. The 104.1 acre Biological Open Space will require a permanent conservation easement and Revegetation Plan for impacts to wetlands. In addition, while the project uses avoidance as the foremost site design concept to minimize impacts to wetlands, where unavoidable impacts may occur, the Project is required to obtain the following permits for project-related impacts. These permits ensure no net loss of habitat functions and values and protect wetland from exposure to pollutants, hydro-

modification, vegetation clearing, and the introduction of invasive species, and ensure that the feasibility of alternatives will have been considered:

- 4(d) Habitat Loss Permit issued by the County, U.S. Fish and Wildlife Service and the California Department of Fish and Wildlife. (See REIR, Habitat Loss Permit application and Habitat Loss Permit Exhibits)

- Section 404 Permit by the U.S. Army Corps of Engineers.

- 1603 Streambed Alteration Agreement from the California Department of Fish and Wildlife.

- NPDES General Permit for Stormwater Discharges (State Water Resources Control Board) and NPDES Municipal Stormwater Permit Compliance (County and Regional Water Quality Control Board).

- Section 401 Water Quality Certification or waiver from the Regional Water Quality Control Board.

The foregoing **Conservation of Wildlife Habitat** practice is equivalent to the LEED®ND **Imperiled Species and Ecological Communities (SLL Prerequisite 2)** and the **Wetland and Water Conservation (SLL Prerequisite 3)** principles, to promote open space and habitat conservation, preserve and enhance water quality and natural hydrologic systems, and protect habitat and biodiversity through conservation of wetlands and water bodies.

6. Soil Conservation.

a. Soil Disturbance and Erosion During Grading. The Project must comply with major grading provisions of the San Diego County Grading Ordinance and with the Regional Water Quality Board Order R9-2007-0001, as implemented through the County Standard Urban Stormwater Mitigation Plan for Land Development and Public Improvement (SUSMP) which will require a broad range of construction best management practices to minimize soil disturbance and erosion during construction, further described in the County Stormwater Ordinance/Stormwater Standards Manual, and will include practices such as staking the limits of clearance and grading prior to construction, fencing or flagging limits of no disturbance, covering and protecting stockpiles of soil, minimizing soil compaction using materials capable of distributing equipment weight, stabilizing disturbed areas before grading, and amending soils with organic material and mulch.

b. Soil Disturbance and Erosion Minimization During Construction. The Project construction activities are scheduled per the Community Phasing Plan to minimize the length of time soils are exposed. The total disturbance area on the site would be 504 acres but less than 50 acres would be disturbed at any given time under the worse-case scenario. The Project Stormwater Plan must comply with the Regional Water Quality Board Order R9-2007-0001, as implemented through the County Standard Urban Stormwater Mitigation Plan for Land Development and Public Improvement (SUSMP) will require a broad range of construction best management practices to minimize soil disturbance and erosion during construction, further described in the County Stormwater Ordinance/Stormwater Standards Manual.

The foregoing **Soil Conservation** practice is equivalent to the LEED®ND **Construction Activity Pollution Prevention** principle (GIB Prerequisite 4), to reduce pollution from construction activities by controlling soil erosion, waterway sedimentation and airborne dust.

7. **Storm Water Management, Natural Filtering and Drainage.**

   Project stormwater is managed through the use of low-impact development techniques to preserve natural drainages and minimize concentrated hydrological flows. As for preservation, the Stormwater Plan does not include disturbance of natural drainages and all flows would be directed on-site, grass-lined detention basins, as described in the project Drainage Plan, for settling and filtration prior to discharge off-site through both natural and man-made drainages. The Drainage Plan includes measures such as planting shallow drainage slopes to prevent erosion and siltation. The Project Drainage Plan must meet applicable local, state and federal standards, be approved by the Department of Public Works, and maintained by either the Public Works Flood Control Division or the HOA. Natural drainages within the project site are further protected by the Resource Management Plan, to protect 104 acres of biological open space, including natural drainages throughout the site, as detailed in REIR S-1, Mitigation Measures M-BIO-2. To minimize concentrated hydrological flows, the project General Use and Performance Standards as described in the Specific Plan allows the use of permeable road pavers, that meet private road and Consolidated Fire Code requirements, throughout the private road system within the project area. In conjunction with the reduced detention basins, bio-retention area and other BMP facilities, pavers add another component to the storm water runoff treatment that further enhances the runoff water quality leaving the project site. The Specific Plan's Infrastructure/Public Facilities and Services Plan allows for cisterns and roof collection systems for the storing and use of rain water on single family homes. The Project trail network will include permeable materials such as decomposed granite. Project area parking lots will include interior tree planting areas. The Project would also incorporate long-term water quality controls pursuant to the County Stormwater Ordinance, Stormwater Standards Manual, and related National Pollutant Discharge Elimination System Municipal Permit requirements. Short-term erosion and sedimentation impacts would be addressed through conformance with the NPDES Construction Permit and County Stormwater Ordinance/Stormwater Standards Manual which include developing and implementing an authorized SWPP for proposed construction, including erosion and sedimentation BMPs.

   The foregoing **Stormwater Management, Natural Filtering and Drainage** practice is equivalent to the LEED®ND **Stormwater Management** principle (GIB Credit 8), and **Minimized Site Disturbance in Design** principle (GIB Credit 7) to reduce runoff volume and improve water quality by replicating the natural hydrology and water balance of the site, based on historical conditions and undeveloped ecosystems in the region, and the LEED®ND **Reduced Parking Footprint** principle (NPD Credit 5), to minimize the environmental harms associated with parking facilities, including automobile dependence, land consumption, and rainwater runoff.

8. **Water Efficient and Native Palette Landscaping.** The Project Landscape Plan which is incorporated into the Specific Plan is designed to limit water and energy use while preserving and enhancing the environment. The Landscape Plan conserves water through the use of native and drought resistant species and integrates existing field agriculture, orchards, riparian corridors, and native oaks into the project design. Oaks and Sycamores will accent channel crossings and drainages. All three public parkways will be planted with

regionally appropriate native trees and shrubs such as Olives, Sycamores, Oaks, Madrone, Currant, Toyon, as well as Apricot, Lemon, Orange, Guava, and Avocado. Medians will be landscaped in accordance with County Water Conservation and Landscape Design Manual guidelines including drought tolerant and native plant materials where appropriate. Community recreational areas will use groves, drought tolerant and naturalizing plant material to transition to natural open space areas. Native vegetation will be emphasized, supplemented by compatible, non-invasive ornamental plant materials. Street trees will be planted at close intervals to assure overlapping foliage along West Lilac Road. Trees will be protected by planting wells and retaining walls. The Landscape Plan also encourages turning tree trimmings into mulch. The community Recycling Facility will accept residential and community compost waste. To limit water and energy usage, all of the reclaimed water from the Water Reclamation Facility treated to Title 22 Standards will irrigate on-site parks, street parkways, private residential lots, private and public open space, agricultural land in both common areas and in Biological Open Spaces, manufactured slopes and the school site, or as allowed by the Valley Center Municipal Water District and other regulatory agencies, thus preserving and protecting the environment. Irrigation systems will be designed in accordance with the Irrigation Association's *Turf and Landscape Best Management Practices* consistent with the applicable requirements of the Water District. All landscape plans will be submitted for County review and approval prior to the start of construction. Such plans shall comply with the County Water Conservation Landscaping Ordinance, the Water Efficient Landscape Design Manual, the Specific Plan Design Guidelines, the County Grading Ordinance, the Off Street Parking Design Manual and the Valley Center MWD policy Article 190.7 regarding Conservation and Local Supply Use Requirements.

The foregoing **Water Efficient and Native Palette Landscaping** practice would be equivalent to the LEED®ND **Minimized Site Disturbance in Design** principle (GIB Credit 7) and **Water-Efficient Landscaping principle**, (GIB Credit 4) to reduce outdoor water consumption.

9. **Operation and Maintenance Plans for Project Plans and Facilities Project Wide.** Conceptual Resource Management Plans have been prepared setting forth guidelines for the operation and maintenance of preserved environmental resources both on and off site. (REIR, Ch. 2.5, Biological Resources Report, Attachments 15 (Wetlands), 16 (Biological Open Space) Attachment 17 (Off-site Habitat Mitigation). These plans must be reviewed and approved by local, state, and federal resource agencies before being finalized. A Revegetation Plan with numeric success criteria and subject to local, state, and federal review and approval is also required. Prior to Final Map an HOA Operations and Maintenance Manual will be prepared and adopted by the HOA. The manual will provide guidelines and standards for the common open space management activities. In addition, the onsite stormwater system, including the detention basins, will be owned and managed by the HOA. Prior to Final Map a Stormwater Management and Operations Manual, approved by the RWQCB, will be prepared and adopted by the HOA. The manual will provide guidelines and standards for the operations and management activities for the storm drain system. Included with the documentation will be contact information so that the HOA and the County Department of Public Works can effectively coordinate issues and concerns regarding the operation of the system. The Recycling Facility licenses and permits will require operation and maintenance plans, which must comply with 16 performance standards, and with all local, state, and federal environmental, health and safety laws, as applicable. The Wastewater Treatment Facility MUP will require operation and maintenance plans. All wastewater systems will be owned and managed by the Valley Center MWD which

is responsible to ensure the system complies with 16 particular performance standards, and with all other local, state, and federal environmental, health and safety laws, as applicable.

The foregoing **Operation and Maintenance Plans for Project Plans and Facilities Project Wide** practice would be equivalent to the LEED®ND **Long-Term conservation Management of Habitat or Wetlands Principle** (SLL Credit 9) to create and commit to implementing a long term management plan for native habitats and water conservation areas, and create guaranteed funding sources.

10. **Recycling and Innovating Wastewater Technology.** A Major Use Permit is being processed concurrently with the Specific Plan for construction of a Water Reclamation Facility (WRF) located on a 2.4-acre site in the southwestern portion of the site. Depending on which option is implemented by the Project, wastewater generated by the Community may be treated at the proposed on-site WRF, which would accommodate up to 356,510 gallons per day of wastewater from the development or by the other options identified in the REIR. Recycled water will be subject to Valley Center Municipal Water District policy on reclaimed water uses (Article 190.7 Conservation and Local Supply Use Requirements section (c)). Recycled water distribution pipelines may be installed within the Community roadways to deliver the recycled water to the targeted on-site areas. The reclaim wastewater generated by the project will be used for community open space irrigation. Also planned within the site, in the Town Center is a Recycling Facility (RF) to be located in the Town Center at a trail head staging area. (Specific Plan, Figure 1-4a) The purpose of this facility is to provide and encourage recycling among project residents in addition to the weekly collection of waste. The RF would be available for use by project residents, as well as those residing in the surrounding area. (Specific Plan, pp. 1-11)

    Therefore the foregoing **Recycling and Innovating Wastewater Technology** practice is equivalent to the LEED®ND **Wastewater Management** principle (GIB Credit 14) to reduce pollution from wastewater and encourage water reuse, and the LEED®ND **Solid Waste Management Infrastructure** principle (GIB Credit 16), to reduce the volume of waste deposited in landfills by including a recycling or reuse station.

11. **Pedestrian and Bike Paths Connecting the Community Amenities.** The project includes an extensive and thoroughly integrated, 16 plus mile Trail Network, including community pedestrian and bike paths, linking together the major project components, including the Town Center and Neighborhood Centers, Neighborhoods, the school, and the and 13.5 acre central park. The trails include a staging area in the Town Center, and three trail connections at the north and south ends of the project to trails defined in the County Master Trail Plan. See REIR, Figure 1-4a (Lotting Study) and Figure 1-8 (Trails Plan) showing the integration of the project as whole with the Trail Network. Also, project parks and trails are designed not to disturb the dedicated 104.1 acre Biological Open Space. Certain trails, towards the project perimeters, linking to the County Master Trail Plan will also allow equestrian usage.

    Therefore the foregoing **Pedestrian and Bike Paths Connecting the Community Amenities** practice is equivalent to the LEED®ND Access to Civic and Public Space (NPD Credit 9) to improve physical and mental health and social capital by providing a variety of open spaces close to work and home and **LEED®ND Compact Development** (NPD Prerequisite 2) to promote livability, walkability, to reduce public health risks by encouraging daily physical activity associated with walking and bicycling.

12. **Topography Preservation.** The County of San Diego has adopted the Resource Protection Ordinance (RPO), which regulates the development of steep slopes. All 608-acres of the Project have been designed so that 99.7% of all grading will occur outside of the RPO defined steep slope areas. Less than 1.6 acres of RPO-defined steep slopes would be disturbed by the project, which complies with the RPO. The project is designed to minimize slope disturbance through preservation and alignment of project forms to the natural topography. Construction activities must conform to the project Grading Plan Development Standards governing contour grading, manufactured slopes and material import/export balance. For example, the project will not import or export any soil. The project site grading plan complies with the San Diego County Grading Ordinance, the Hillside Development Policy (1-73) and complies with the 10 percent steep slope encroachment limit allowed under Resource Protection Ordinance as only 0.8 percent (1.6 acres) encroachment of steep slopes is proposed. Further, the Specific Plan's Landform Grading Guidelines, the techniques for blending and rounding slopes, roadways and building pads to reflect the natural contours will minimize long-term erosion effects.

    This **Topography Preservation** practice is equivalent to the LEED®ND **Steep Slope Protection** principle (SLL Credit 6), to minimize erosion, protect habitat, and reduce stress on natural water systems by preserving steep slopes in a natural, vegetated state.

13. **Agricultural Land Conservation.** The project would support continued agricultural operations as follows: The project would permanently preserve 43.8 acres of agriculture off-site based on the County's Guidelines for the Determination of Significance for Agriculture or purchase agricultural mitigation credits at a 1:1 ratio through the County's PACE (Purchase of Agricultural Conservation Easement) program. The site is not located within a Williamson Act Contract or an Agricultural Preserve. Approximately 23.8 acres of active agriculture would remain on-site within the biological open space and 18.3 acres of orchards will be planted within the project agricultural buffers. An additional 20 acres of common area open space could include community gardens and agriculture. Other compatible agricultural uses would be allowed by the Specific Plan, such as farmers' markets, community gardens and vineyards.

    Therefore this **Agricultural Land Conservation** practice also incorporates the equivalent principle as the LEED®ND **Agricultural Land Conservation** principle (SLL Prerequisite 4), to preserve irreplaceable agricultural resources by protecting prime and unique farmland from development, and as the LEED®ND **Local Food Production** principle (NPD Credit 12) to promote the environmental and economic benefits of community-based food production and improve nutrition through better access to fresh produce.

14. **Floodplain Avoidance.** The project is not located in a flood plain and therefore would meet the equivalent principle as the LEED®ND **Floodplain Avoidance** principle, to protect life and property, promote open space and habitat conservation, and enhance water quality and natural hydrologic systems.

15. **Building Site Selection.** The project conducted an initial inventory of the natural resources (REIR, Ch. 2.5 Biological Resources Report, and Tables 1-2) across the site to create a development plan that would maximize avoidance of natural resources. This is reflected in the Open Space and Recreation Plan, and to varying other extents other resource-attentive plans, such as the Drainage Plan, the Landscape Concept Plan, and the Water and Wastewater Plan. These plans are assured proper implementation, though several county, state, and federal government agency approvals and oversight mechanisms, to protect

project site natural resource areas both during construction and in perpetuity. Two plans in particular, both Conceptual Resource Management Plans (Attachments 15 and 16 have been prepared that provide the guidelines for the protection and maintenance of natural resources and areas being preserved. (REIR, Ch. 2.5, Biological Resources Report, Attachments 15 (Wetlands) and 16 (Biological Open Space) Three top priority resources to preserve include Coast Live Oak Woodland, Riparian Woodlands (southern coast live oak riparian woodland, southern willow riparian woodland) and Riparian Scrubs (southern willow scrub, mule fat scrub). See REIR, Ch. 2.5, Sec. 1.4 Biology Resources Report. Project streets, buildings, homes, facilities, and all built features are sighted to avoid and thus conserve natural resources, natural drainages and several high priority vegetation communities.

The Project's **Building Site Selection** Green Building Practice is equivalent to the LEED®ND intent of **Minimize Site Disturbance (GIB Credit 7) by** preserving existing noninvasive trees, native plants, and pervious surfaces.

16. **Sustainable Building.** The project includes the following performance measures related to energy use: Lilac Hills Ranch homes and buildings will be designed, constructed and built to exceed 2008 Title 24 Energy Standards by 30%, and the project will install 2,000 kilowatts (kW) of on-site solar/photovoltaic systems, which are estimated to produce 3,400,000 kW hours of electricity, or approximately 22 percent of the project's total electricity needs at build-out. In order to achieve this total photovoltaic energy production volume, the project shall produce or cause to be produced renewable electricity by one of the following methods to be determined by the applicant: (1) installation of the equivalent of one photovoltaic (i.e., solar) power system no smaller than 2 kW on 500 single-family homes, and a photovoltaic power system(s) no smaller than 1,000 kW on 90,000 square feet of non-residential roof area; or (2) the installation of the equivalent of one photovoltaic (i.e., solar) power system no smaller than 2 kW on 1,000 single-family homes. The actual capacity and/or conversion efficiency of the photovoltaic panels may alter the actual number of roofs or non-residential roof space requirements to meet the annual 3,400,000 kW-h requirement at project build out.

    The project would also plant shade along streets, trails, in parks, in parking lots, in the commercial centers and in civic and public spaces, which would negate the formation of urban heat islands and reduce energy demand during the hottest weather.

    Therefore the project **Sustainable Building** practice would be equivalent to the LEED®ND **Certified Green Building** principle (GIB Prerequisite 1), to encourage the design, construction, and retrofit of buildings using green building practices, the LEED®ND **Building Energy Efficiency** principle (GIB Credit 2), to encourage the design and construction of energy-efficient buildings that reduce air, water, and land pollution and environmental damage from energy production and consumption, the LEED®ND **Solar Orientation** principle (GIB Credit 2), to encourage energy efficiency by creating optimum conditions for the use of passive and active solar strategies, and the LEED®ND **Tree-Lined Streets** principle (NPD Credit 12) to, encourage walking and bicycling and discourage speeding, and to reduce urban heat island effects, improve air quality, increase evapotranspiration, and reduce cooling loads in buildings

17. **Integrated Transportation Planning.** The project site is less than a half-mile from I-15, with access to regional destinations, and approximately a mile of frontage along West Lilac Road

(a Mobility Element roadway), maximizing efficient community access within Valley Center and Bonsall. The village core will reserve a future mass transit stop, which is located within a short walk or bike ride from all points within the community and would include an interim transit service to transport residents to the nearest transit stop until the NCTD establishes a transit route to the Project. A 16-plus mile community path and trail network supports pedestrians, bicyclists, and equestrians and is connected to the planned County trail system at the north and south ends of the Project. Streets are designed to promote traffic calming through the use of narrow roads, curvatures, roundabouts, landscaping, and parallel parking. The proposed paths are placed parallel to the streets to reduce vehicle speeds, promote pedestrian access and increase roadway safety. Finally, the Project will implement a Transportation Demand Management Plan and private interim-transit program until regional transit plans are coordinated. The Specific Plan also requires planning and integration of transit facilities within the project to meet the standards of the North County Transit District which are described in the project's Transportation Demand Management program: will coordinate with the NCTD as to the future sighting of transit stops/stations within the project site. As the project is built-out, the NCTD may adjust routes and services to meet the needs of the growing community. The project would allocate a site for public transportation within the Town Center. The applicants will continue to coordinate with NCTD and MTS regarding potential transit options for the project site.

Therefore this **Integrated Transportation Planning** practice would be equivalent to the LEED®ND **Transit Facility** principle (NPD Credit 7) to encourage transit use and reduce driving by providing safe, convenient, and comfortable transit waiting areas, and **LEED®ND Transportation Demand Management** principle (NPD Credit 8) to reduce energy consumption, pollution from motor vehicles and adverse public health effects by encouraging multimodal travel.

18. Dark Sky Protection.

The project is 3,700 feet beyond the Zone A radius for Palomar Observatory. The project is however, designed to comply with the safety standards of the County Light Pollution Code. Street lighting will include downward directed lighting, shielded lighting, low voltage decorative lighting, and lighting lower than what would typically be found on an urban street. See Specific Plan, Section III.D. The project Lighting Fixture Schedule illustrates sensitive and rural-themed lighting designs.

This **Dark Sky Protection** practice is equivalent to the LEED®ND **Light Pollution Reduction** principle (GIB Credit 17) to increase night sky access, improve nighttime visibility, and reduce the consequences of development for wildlife and people.

Specific Objections Raised

The matrix below addresses a number of related the objections that were discussed above but may not have been entirely covered.

Comment	Response
LEED®ND Certification The project should be LEED®ND Certified by the United States Green Building Council.	LU-1.2 does not require certification under LEED®ND®. The policy allows projects which have been designed to meet LEED®ND Certification or an equivalent. As described above the project has been designed to be equivalent to LEED®ND and its design is in compliance with the NGBS program. See above.
LEED®ND Program Neither the REIR nor the Specific Plan identify what equivalent design program was used to design the project.	There is nothing in the language of LU-1.2 or the General Plan that requires the "disclosure" of a program. In fact, LU-1.2 does not require application of any particular program but rather only that the project demonstrate equivalent design**.** The policy permits projects which are designed to meet LEED®ND equivalency independent of any particular program. The project has been designed to comply with the NGBS program as explained above as well as being designed to be equivalent to LEED®ND which is described in the Specific Plan.
LEED®ND Equivalency The project does not meet LEED®ND equivalency.	The policy allows projects which have been designed to meet LEED®ND Certification or an equivalent. The project was designed to be equivalent to LEED®ND and has received preliminary certification through the NGBS program. See above.
LEED®ND Smart Location and Linkage Prerequisite The project location does not meet the LEED®ND Certification Smart Location and Linkage ("SLL") Principles.	Policy LU-1.2 requires the project to be "designed" to meet the LEED®ND Certification or an equivalent. The policy does not require the project to be LEED®ND certified. As discussed above, the Project has been found to meet all of the fundamental criteria of NGBS, a program that has been identified as "equivalent" to the LEED®-ND Certification program, including the location requirements of LEED®-ND. Although the NGBS program does not have a specific component identified as a Smart Location Prerequisite, Home Innovation Labs does not believe that this would result in a significant difference between the two rating systems. When examining the purpose and performance of the Smart Location Prerequisite, LEED®ND and NGBS both focus on the locational *criteria, while NGBS* uses a slightly different format to achieve the same goals and overall performance.

Comment	Response
	When looking at Policy LU-1.2 in totality and harmonizing every word and part to be internally consistent, it is clear that the policy requires new villages to be designed to be consistent with the Community Development Model, and also designed to meet LEED®ND or an equivalent. The Board of Supervisors could reasonably reconcile the word "design" to mean that for purposes of planning and designing the new village, the underlying principles of LEED®ND or equivalent would apply and for purposes of guiding the physical planning of the unincorporated county, the "Community Development Model" would prevail. (General Plan, page 3-6.) The courts favor a construction that harmonizes all of the words in a statute and accords significance to every word in a manner that would not create inconsistencies within the statute. (*DYNA–MED, Inc v. Fair Employment and Housing Commission* supra 43 Cal..3d at p. 1386. See also California Mfrs. Assn. v. Public Utilities Com. Supra p. 844.) This interpretation is also consistent with the explicit intent expressed in the General Plan that Policy LU-1.2 implement (not overrule) the Community Development Model, and that densities be assigned throughout the County based upon the Community Development Model. (General Plan, page 3-23.) Furthermore, the assertion that projects must meet the Prerequisite-Smart Locational requirement of LEED®ND would mean that new villages could only be established within areas of the unincorporated County that qualify as urban infill under LEED®ND. However, if an area qualified as urban infill, the area would likely be designated as a Village Regional Category under the current General Plan. In such cases, development would be expanding an existing village and LU-Policy 1.4 would apply. Therefore, interpreting LU-1.2 to require projects to meet the location requirements of LEED®ND would essentially be rendering Policy LU-1.4 meaningless. This interpretation is also contrary to language in the General Plan that indicates that land use designations are not to be locked in perpetuity and that amendments to the General Plan will be allowed as determined appropriate by the Board of Supervisors. The General Plan states that it is intended to be a dynamic document and "must be periodically updated to respond to changing community needs." Furthermore, the General Plan includes a number of policies that address future growth, such as LU-3.2 Mix of Housing Units in Large Projects, LU-3.3 Complete Neighborhoods, and H-1.7 Mix of Residential Development Types in Villages.

Comment	Response
	Nonetheless, as stated in the attached letter from Carrier Johnson + Culture, "…the Project has met all of the fundamental criteria in the NGBS program that makes it equivalent to the LEED-ND intent." Additionally, as stated by Home Innovation Research Labs on June 30, 2015, "the National Green Building Standard (NGBS) Chapter 4 Site Design and Development is clearly equivalent with LEED 2009 for Neighborhood Development (LEED ND)." Although the NGBS program does not have a specific component identified as a Smart Location Prerequisite, Home Innovation Labs does not believe that this would result in a significant difference between the two rating systems. When examining the purpose and performance of the Smart Location Prerequisite, LEED®®ND and NGBS both focus on the locational *criteria, while NGBS* uses a slightly different format to achieve the same goals and overall performance. The Project was also designed in a manner that is equivalent or similar in performance or outcome with the LEED®ND Certification program and the project **Sustainable Location** practice is equivalent to the **Smart Location** principle of LEED®ND (SLL Prerequisite 1). See discussion above.
LEED®ND Density The project does not achieve "a minimum average density of seven dwellings per acre" that "LEED®ND requires."	The project is not a LEED®ND project and so the stated density requirement does not apply, however, the project would meet the minimum density requirement of 7 dwelling units per (net) acre under the LEED®ND definition, which states that a dwelling unit is defined as: "living quarters intended for long-term occupancy that provide facilities for cooking, sleeping, and sanitation. This does not include hotel rooms." The net usable residential land area is 256.06 acres, divided by 1,746 residential dwelling units, which equals 6.82 dwelling units per acre. Rounded up, this equals 7 dwelling units per acre. Furthermore, the project includes components that would achieve over 20 du/ac of buildable land, including the Town Center. . It should be noted that the LEED®ND definition of density is different than the County's density requirements for Village Residential, which is calculated based on gross acres and range from 2.9 du/ac to 24 du/ac. The LEED®ND definition excludes all non-residential areas such as open space, common areas, parks and roads.

Comment	Response
	As described above, the Compact and Efficient Development Footprint green design practice, as summarized in the Specific Plan at Table 1 Land Use Summary, incorporates the equivalent principles as the LEED®ND Compact Development principle, to conserve land and promote livability, walkability, transportation efficiency and reduce vehicle distance traveled. See explanation above.
The project methodology, calculations, comparative analysis, and conclusions regarding Average Trip Lengths to I-15 and within the Valley Center Planning Area are not useful in determining LEED®ND equivalency.	The **Sustainable Location** green design practice incorporate equivalent principles to the **Smart Location** Prerequisite of LEED®ND. The intent of the **Smart Location** Prerequisite is to locate projects within existing water and sewer service district boundaries, to encourage reducing vehicle trips and vehicle distance traveled, to improve health by encouraging daily physical activity associated with walking and bicycling, as well as locating "neighborhood assets" or "diverse uses" within ½ mile walking and biking distance of project residents.
Integrated Transportation Planning The project bus stop in the Town Center is inadequate because it is more than ¼ mile away from some of the residents and because the project fails to require 60 departures per weekday.	The project is not a LEED®ND project and so requiring that transit facilities provide 60 departures per weekday, does not apply, however, the project's Specific Plan requires planning and integration of a transit stop within the project to meet the standards of the North County Transit District which are described in the project's Transportation Demand Management program. In addition, the future transit stop would be within the Town Center, which is located within a short walk or bike ride from all points within the community. As the project is built-out, the NCTD may adjust routes and services to meet the needs of the growing community. The County will continue to coordinate with NCTD and MTS regarding potential transit options for the project site.
Pedestrian Orientation The project will not encourage walking or biking to the Town Center or Neighborhood Centers because some residents are more than ¼ mile away from these centers.	As described above, the project contains compact residential neighborhoods that surround the Town Center, and supports several small parks and community trails. There are also two Neighborhood Centers (highly abbreviated forms of the Town Center) planned southeast of the Town Center. There are over sixteen miles of multi-use community trails providing a pedestrian linage to every part of the community, which also connects to the County regional trail system. The Project design encourages residents to walk to amenities and service, as all residences would be within half (½) a mile, and less than 10-minute walk from the Town Center or from one of the two Neighborhood Centers.

Comment	Response
Regional Planning The project area is not included in SANDAG regional growth forecasts, or in related smart growth and mass transportation plans.	The County of San Diego is a member jurisdiction of the San Diego Association of Governments (SANDAG) and SANDAG's regional transportation planning role is subordinate to the county's land use authority. The project will amend the General Plan and afterwards, the County will forward the amendment to SANDAG. SANDAG will then incorporate the project, as appropriate, into its updates to regional growth forecasts, and land use plans.
Outdoor Water Use Reduction. The use of drought tolerant plants is not useful in determining LEED®ND equivalency here because the county would require drought tolerant plants anyway.	The **Water Efficient and Native Palette Landscaping**, as applied to the project through the use of drought tolerant and regionally appropriate species throughout and incorporates the equivalent principles as LEED®ND **Outdoor Water Use Reduction** principle, to reduce outdoor water consumption. Achieving LEED®ND equivalency is not negated when local building and design standards meet or exceed LEED®ND design standards.

Home Innovation
RESEARCH LABS™

NATIONAL GREEN BUILDING STANDARD (NGBS) AND LEED ND COMPARISON

Prepared For

San Diego County
Planning Department

JUNE 2015

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Summary

The San Diego Planning Department requested a comparison of the National Green Building Standard ICC 700-2012 (NGBS) Chapter 4 Site Design and Development to LEED 2009 for Neighborhood Development (LEED ND) to demonstrate certification equivalency between the two programs.

This analysis is submitted by Home Innovation Research Labs, which serves as Secretariat for, and provides national certification services to, the NGBS. Home Innovation Labs is a 50-year old, internationally-recognized, accredited product testing and certification laboratory located in Maryland. Our work is solely focused on the residential construction industry and our mission is to improve the affordability, quality, performance, and durability of housing by helping overcome barriers to innovation. Our core competency is as an independent, third-party product testing and certification lab, making us uniquely suited to administer a green certification program for residential buildings.

First, it is worth noting that LEED ND is a proprietary program that cannot be duplicated by another program. There can never be an identical rating system. However, the vast majority of the green development practices within the NGBS Chapter 4 Site Design and Development and LEED ND overlap, making the two rating systems equivalent in scope and intent. Further, based on this equivalency as detailed below, NGBS Green Certification meets San Diego's requirement for LEED ND certification.

Evaluating certification equivalency requires a comparison of four elements of the programs: 1) the rating system's goals; 2) the process for the development and maintenance of the rating system; 3) the rating system's substantive requirements; and 4) the rigor of the verification and certification process and procedures.

Both the NGBS and LEED ND seek to promote and recognize high-performing, sustainable communities that offer a variety of uses and unique places for residents to live, work, and play. Both the NGBS and LEED ND followed a consensus-based process for their development, although only the NGBS has won approval as an ANSI-approved American National Standard. This means the NGBS development process was reviewed and approved by ANSI, an independent third-party, to ensure all stakeholders' due process rights were met through stringent requirements for a collaborative, publicly-open, balanced, and consensus-based review and approval process. There is no higher validation of a standard's development process or the resultant standard than approval by a standards developing organization such as ANSI.

Although there are differences in structure and certification requirements, LEED ND and the NBGS Chapter 4 Site Design and Development are functional equivalents. Since it was developed, the NGBS has been consistently considered as on par, or more stringent, than LEED as a green building rating system for residential projects at the federal, state, and local level. For example:

- **On the federal level, HUD recognizes the NGBS as on par with LEED.** In its 2013 funding notice, *Allocations, Common Application, Waivers, and Alternative Requirements for Grantees Receiving Community Development Block Grant (CDBG) Disaster Recovery Funds in Response to Hurricane Sandy*, HUD cited the NGBS as an acceptable green standard for reconstruction efforts along with LEED. [Docket No. FR–5696–N–01]
- **Congress declared NGBS or LEED as equally suitable for military housing construction and renovation.** [Public Law No: 113-291, Section 2807]
- **Eighteen states recognize, mandate, or incentivize NGBS or LEED certification as equivalents through their state Qualified Allocation Plans for the federal Low Income Housing Tax Credit Program.**

- **States such as Delaware and New York, as well as a number of local jurisdictions, provide financial incentives for residential buildings certified to either the NGBS or LEED.**
- **Local jurisdictions – e.g., Dallas, Texas; Washington, D.C.; Baltimore, Md.; and Anne Arundel and Howard Counties in Maryland – have deemed the NGBS as equivalent to LEED for their local incentives or mandates.**

To date, not a single jurisdiction has refused to recognize the NGBS as an alternative compliance path for any regulatory or incentive program where we have asked them to make an equivalency decision. For a more complete listing of where the NGBS has been recognized, see Appendix A.

Because LEED was first to market, an accomplishment that we recognize and commend, Home Innovation is typically asked to answer the question, "Is the NGBS equivalent to LEED?" As noted above, jurisdictions when asked inevitably deem the NGBS and LEED as substantive equivalents with regard to requirements as green rating systems. However, the two should also be compared with regard to equivalency as certification programs. In this regard, we assert that NGBS Green is the most robust and rigorous certification program available on the market for green and sustainable residential construction and development precisely because the NGBS is an ANSI-approved consensus standard administered by an accredited third-party organization with over 50 years expertise in the residential construction industry.

Sustainability Goals

Both the NGBS and LEED ND are intended to promote sustainable communities and reduce the impacts of land development. Development projects that incorporate practices such as smart location strategies, green building and infrastructure techniques, and efficient neighborhood and building design have an opportunity to reduce their environmental footprint, and even potentially enhance the quality of life for those living in and around the new communities.

The NGBS is designed as a comprehensive green rating system for all residential construction, development, and renovation. The NGBS addresses land development requirements in Chapter 4 *Site Design and Development*; the remaining NGBS sections are applicable to building construction and renovations. In contrast, LEED ND is designed specifically for land development, requiring buildings seeking certification within a LEED ND development to use another green rating system, such as LEED for Homes or LEED for New Construction (NC).

Both NGBS's Chapter 4 and LEED ND are structured around three major sections/themes:

1. Smart Location
2. Neighborhood Pattern & Design
3. Green Infrastructure & Buildings

Within each of these major sections, the rating systems recognize best practices for sustainable development. The vast majority of green practices overlap.

While the majority of content is shared, there are some differences in the approach taken by each rating system. However, this difference in approach does not change the outcome with respect to incorporating practices such as smart location strategies, green building and infrastructure techniques, and efficient neighborhood and building design into land development.

The NGBS's philosophy is to encourage implementation of the best environmental practices for land development that integrate, complement, and uplift local planning and zoning. The NGBS provides planners and developers with flexibility to recognize regional differences in development patterns, housing types, and preferences; allow innovative approaches and techniques; and consider the vast array of cultures, family living and housing styles, and business and retail needs that may need to be addressed within an individual community. The NGBS promotes flexibility *and* sustainability.

Conversely, where the NGBS is focused on the *intent* of the green practices, LEED ND works more like a design and zoning standard. Consider, for example, the concept of walkable streets. In LEED ND, the rating system takes 1.5 pages to describe what is meant by a "walkable street" and includes very specific requirements with regard to building frontage, height-to-street-width ratio, and detailed sidewalk requirements. While LEED ND states that is it not intended to replace zoning codes or comprehensive plans, such prescriptive design requirements are more traditionally the purview of local jurisdictions who have a better understanding of the form of local development that they wish to promote through local regulations. In contrast, the NGBS provides points toward certification for "walkways, bikeways, street crossings, and entrances designed to promote pedestrian activity." The NGBS is focused on developers ensuring that residents can walk and bike within and without the neighborhood to areas where they live, work, and play without prescribing specifically how that is accomplished. Some NGBS Green neighborhoods attain points toward certification using bike trails and pedestrian walkways. Other NGBS Green neighborhoods earn points by more traditional sidewalks and bike lanes on streets. A few NGBS Green neighborhoods provide all of these amenities as choices for the residents. The NGBS's goal isn't the specific design of the street; rather, it is getting people out of their cars whenever possible. The NGBS language is clear, straightforward, and performance-oriented. Because its specific design details are flexible, the NGBS is structured to better support and uplift local zoning requirements.

Another difference between the NGBS Site Selection Chapter and LEED ND is applicability of the rating systems to a diversity of land developments. The NGBS is more flexible than LEED ND because while it promotes a variety of sustainable land development practices, it does not set mandates that favor one specific development form, i.e., neo-traditional urbanism, over others. This is particularly important in areas with unique landscapes and natural habitats such as those in and around San Diego. LEED ND singularly defines sustainable development as high-density grid development. This non-negotiable prerequisite makes LEED ND inappropriate and impractical for many communities in the United States. By contrast, the NGBS takes into consideration the variety of communities, such as the County of San Diego, that could benefit from incorporating green and sustainable development practices into land use decisions, without being located within a dense urban setting. The NGBS promotes connectivity, density, a variety of land uses, multi-modal transportation, and environmentally-sensitive design and construction practices through its extensive point-based system. It was the belief of the NGBS Consensus Committee, which was confirmed through the NGBS's extensive public comment process, that there is value to having a green development rating system that could help improve the sustainability of all residential developments – big and small; rural, suburban, and urban; neo-traditional developments à la Andres Duany, or those in the style of Ian McHarg who used ecology as a basis for design and planning.

Process for the Development and Maintenance of the Rating System

The NGBS is the first and only residential green rating system to undergo the full consensus process and receive approval from the American National Standards Institute (ANSI) as an American National Standard. ANSI approval is important because it is a third-party confirmation of balance, representation, openness, consensus, and due process in the standard's development process. The Consensus

Committee that developed the first version of the NGBS (2008) was comprised of 42 individuals representing a variety of government agencies, municipalities, home building industry stakeholders, and non-profit organizations, including the US Green Building Council (USGBC), which administers LEED. The 2012 NGBS followed a similarly rigorous and inclusive development process. The 2015 NGBS is currently under development and is expected to be submitted for ANSI review within this calendar year.

USGBC's rating system development process suggests a consensus-based approach to development of its LEED rating system; however, it is not a true consensus standard. In order to participate in the LEED development process, one must be a USGBC member. This factor would disqualify LEED from being accepted as a true consensus standard, as the development process is not open. Since 2006, USGBC has been an approved ANSI-accredited Standards Development Organization (SDO) with an approved ANSI Process that allows for a broad, consensus-oriented development process that requires formal responses to all comments submitted. However, despite being accredited and using the power of the ANSI brand to gain credibility, USGBC has not followed the ANSI process in its LEED development.

Verification and Certification Process and Procedures

Both the NGBS and LEED have mandatory practices that must be completed to attain certification at any level. LEED ND has a total of 12 prerequisites; the NGBS has 3 mandatory practices.

The NGBS requires far more points to attain certification at any level (95 points compared to LEED's requirement for 40), but also provides a far greater selection of green development practices so that developers can select the practices that make the most sense for the location, scale, and type of development. [See Table below.] NGBS land developments can attain one of four certification levels: One-Star; Two-Star; Three-Star; or Four-Star.

NGBS Threshold Point Ratings for Site Design and Development

Site Design and Development	Certification Level Points			
	One Star	Two Stars	Three Stars	Four Stars
	95	122	149	176

LEED ND land developments can attain one of four certification levels: Certified; Silver; Gold; and Platinum.

LEED ND

Land Developments	Certification Level Points			
	Certified	Silver	Gold	Platinum
	40-49	50-59	60-79	80+

Certification Criteria: Smart Location & Linkages

The NGBS and LEED ND include many identical practices or practices that are similar in intent. Both rating systems include practices related to: (1) Avoiding environmentally sensitive areas; (2) Developing near existing infrastructure and transportation options; and (3) Designing for natural resources and wildlife protection.

The NGBS includes several practices related to project management and team formation; there are no corresponding LEED equivalents. These practices serve to help developers manage and execute the environmental practices outlined in their design documents.

Certification Criteria: Neighborhood Pattern & Design

Both rating systems recognize communities that are: (1) Walkable; (2) Connected to transit facilities; (3) Compact; and (4) Mixed-use. Both rating systems also recognize communities with shade trees and community gardens for local food production.

Most of the LEED ND practices for this section have corresponding practices in the NGBS, with three exceptions – the NGBS does not have practices specifically related to mixed-income communities; visitability and universal design; and neighborhood schools.

Certification Criteria: Green Infrastructure & Buildings

The purpose of this section to reduce the environmental impact of a community's built infrastructure through established criteria for buildings, landscaping, stormwater management, and driveways/parking. Over half of the LEED ND credits in this section have an NGBS equivalent.

Although LEED ND is a land development rating system, many practices are focused on buildings that will be eventually constructed on the development. In contrast, Chapter 4 of the NGBS specifically covers only the land development activities planned for the site. The NGBS land development green practices and certification are completely separate from the NGBS building certification.

Certification Criteria: Innovation and Design Process

LEED ND's Innovation credit is wide open for applicants to submit what they believe will meet the credit's intent. The NGBS is more specific in what are considered innovative practices with regard to green development. The NGBS allows the Adopting Entity to permit alternative compliance methods should a green practice meet the intent of the NGBS, however, to date Home Innovation has not approved any alternative compliance methods or practices that are not found in the 2012 NGBS.

While NGBS includes practices related to project management within the Site Design and Development chapter, LEED ND has a dedicated section for Design Process. LEED ND awards one point if a LEED Accredited Professional is on the project design team. Our understanding is that USGBC added this practice to help reduce the amount of time necessary for its staff to review and process LEED ND applications, not for any specific sustainability benefit related to a project's design.

Certification Criteria: Regional Priority

LEED ND offers credits for green development practices that are a regional priority for a given location. The NGBS does not allow credits for practices that have a regional priority. However, as explained above, NGBS provides for greater flexibility to accountant for the diversity found within local jurisdictions. We find that developments incorporate those green development practices from the NGBS's broad array of practices that make the most sense for the project's geographic location.

LEED ND includes a section for Regional Priority. While the NGBS does not contain a similar category or practice, it provides greater flexibility for architects and developers to recognize regional priorities through an expansive, flexible point system.

Verification Requirements

NGBS Green certification requires independent, third-party verification. To be NGBS Green Certified, every green project is subject to independent in-field verification. Developers must hire an accredited NGBS Green Verifier who is responsible for visual inspection of the green practices in the development.

Home Innovation Labs qualifies, trains, and accredits building professionals to provide independent verification services for builders and developers participating in our NGBS Green certification program. Verifiers must first demonstrate they possess experience in residential construction and green building before they are eligible to take the verifier training. Potential verifiers must complete thorough training on exactly how to verify NGBS practices, then pass a written exam before receiving Home Innovation accreditation. Verifiers renew their accreditation annually.

Home Innovation Labs reviews every inspection report to ensure national consistency and accuracy in the verification reports. Further, we regularly audit our verifiers and the verifications they perform as part of our internal quality assurance program.

LEED ND has a documentation-based verification program that does not require any on-site, independent verification that green practices were implemented as designed.

VERIFICATION REQUIREMENTS COMPARISON

NGBS Site Development	LEED ND
Every NGBS project is required to be inspected by a third-party, accredited NGBS Green Verifier. Self-certification is not permitted. Practices must be visually inspected by an independent verifier to receive points after the land development activities are complete.	LEED ND certification is a documentation-based verification program. Each LEED rating system and version thereof has unique documentation requirements to complete a LEED certification application. Within the LEED certification application, a series of required documents, attestations, data, or other information must be indicated in order to demonstrate the satisfaction of each minimum program requirements (MPR), prerequisite, and attempted credit.

Conclusion

As demonstrated above, the National Green Building Standard (NGBS) Chapter 4 Site Design and Development is clearly equivalent with LEED 2009 for Neighborhood Development (LEED ND). While the rating systems are structured very differently, the vast majority of the green development practices overlap. The NGBS offers a flexible, performance-based rating system that is suitable for communities of all sizes and density thresholds. We respectfully request that San Diego County conclude that the NGBS is functionally equivalent to LEED ND, and further that NGBS Green Certification may be used as an equivalent alternative to San Diego's requirement for LEED ND certification.

Michael Luzier
President and CEO
Home Innovation Research Labs

APPENDIX A
NGBS Government Acceptance as on Par With LEED

Federal Recognition

HUD – Multiple financing programs recognize the NGBS:

- The Main Street/HOPE IV grant program awards up to three points to applicants seeking NGBS Green certification.
- The Rental Assistance Demonstration (RAD) awards up to 10 points for Public Housing Authorities to commit to NGBS Green certification.
- The Choice Neighborhoods Implementation Grants 2013 NOFA encourages NGBS Green certification for homes constructed within the funded communities.
- The 2013 Community Development Block Grant (CDBG) Disaster Recovery Funds in Response to Hurricane Sandy cited NGBS as an acceptable green building standard.

USDA Rural Development, Multifamily Housing Energy Efficiency Initiative – applicants to several Rural Rental Housing, Farm Labor Housing, Housing Preservation Grants, and Multifamily Housing Revitalization grants and loans are eligible to receive additional points for new construction and rehabilitation projects that are certified to the NGBS, LEED for Homes, Enterprise Green Communities, and/or Energy Star. Points are awarded for each certification obtained, and more points are awarded for higher certification levels.

2015 National Defense Authorization Act (NDAA) – Congress authorized NGBS use for military residential construction with passage of the 2015 NDAA. Reasonable certification costs and consensus development were key factors Congress sought in expanding options beyond LEED.

State & Local Recognition

See full details at www.homeinnovation.com/NGBSGreenIncentives

ARIZONA, City of Phoenix	Local code requirement
ARKANSAS, City of Bentonville	Local code requirement
ARKANSAS, City of Little Rock	Builder cash incentive
COLORADO, City of Cherry Hills Village	Permit Rebate
COLORADO, City of Fort Collins	Local code requirement
COLORADO, City of Longmont	Local code requirement
CONNECTICUT	Incorporated into Housing Finance Authority's Standards of Design and Construction
DELAWARE	Homebuyer cash incentive
DISTRICT OF COLUMBIA	Local code requirement
FLORIDA, Miami-Dade County	Expedited permitting
FLORIDA, Volusia County	Expedited permitting, public recognition, application rebate
GEORGIA	Optional statewide code
GEORGIA, Qualified Allocation Plan	QAP awards up to 2 additional points for NGBS Green Certified buildings
HAWAII	Expedited permitting
HAWAII, Qualified Allocation Plan	QAP awards up to 8 additional points for NGBS Green Certified buildings
IDAHO	QAP awards up to 7 additional points for NGBS Green Certified buildings
IDAHO, City of Moscow	Public recognition

IDAHO, Ketchum	Local code requirement
ILLINOIS	QAP awards up to 8 additional points for NGBS Green Certified buildings
INDIANA	QAP requires green certification by LEED, Energy Star, or NGBS
LOUISIANA, Qualified Allocation Plan	QAP awards up to 5 additional points for NGBS Green Certified buildings
MARYLAND	Statewide policy HB 630 defined High Performance Homes as those certified at the Silver level or higher to NGBS or LEED
MARYLAND, Qualified Allocation Plan	QAP awards up to 12 additional points for NGBS Green Certified buildings
MARYLAND, Anne Arundel County	Tax Credit
MARYLAND, Baltimore County	Tax Credit
MARYLAND, City of Baltimore	Tax Credit
MARYLAND, City of Baltimore	Local code requirement
MARYLAND, Howard County	Tax Credit
MISSISSIPPI, Qualified Allocation Plan	QAP awards up to 7 additional points for NGBS Green Certified buildings
MISSOURI, Qualified Allocation Plan	NGBS Green Certified buildings receive priority status in QAP
NEW HAMPSHIRE, City of Keene	NGBS recognized as “Allowable Green Building System” in City’s Sustainable Energy Efficient Development Zone
NEW JERSEY	New Jersey Urban Transit Hub Tax Credit Program provides tax credit for residential projects certified to NGBS
NEW JERSEY, Qualified Allocation Plan	QAP awards up to 4 additional points for NGBS Green Certified buildings
NEW MEXICO, Qualified Allocation Plan	QAP awards up to 18 additional points for projects certified to Build Green NM, which is largely based on the NGBS
NEW YORK, Green Building Grant Program	Between 2009 and 2012, NY offered generous financial incentives to new homes and remodels built and certified to the NGBS
NEW YORK, Green Building Tax Exemption	Statewide policy that enabled local jurisdictions to provide tax exemption to buildings that are certified to the NGBS
NEW YORK, Qualified Allocation Plan	QAP awards up to 5 additional points for NGBS Green Certified buildings
NEW YORK, Niagara County	Tax exemption
NEW YORK, Town of Islip	Density bonus
NORTH CAROLINA	The North Carolina Housing Finance Agency Community Partners Loan Pool offers financial incentive to local governments and nonprofits who seek NGBS Green certification
NORTH CAROLINA, Catawba County	Permit Fee Reduction
NORTH CAROLINA, Chatham County	Fee Rebate
NORTH CAROLINA, Pinehurst Village	Permit Rebate, Public Recognition
NORTH DAKOTA	QAP awards up to 7 additional points for NGBS Green Certified buildings
OHIO, Qualified Allocation Plan	QAP requires certification by Enterprise, LEED, or NGBS
PENNSYLVANIA	Pennsylvania’s High Performance Building Program
SOUTH CAROLINA, City of Columbia	Financial incentive
TENNESSEE, City of Nashville	Specialized green building permit
TEXAS	QAP awards up to 4 additional points for NGBS Green Certified buildings
TEXAS, City of Dallas	Local code requirement
VERMONT, Qualified Allocation Plan	NGBS Green Certified buildings given preference in QAP
VERMONT, Town of Hinesburg	Density bonus
WASHINGTON, Clark County	Recognized as voluntary green building code

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LEED-ND and NGBS

Comparison of Intent for Green Practices (June 2015)

By examination of the intent of each credit awarded under LEED–ND and NGBS, and by comparing the credits in both programs, the programs have more similarities than differences, with the same overall goal: *protect and enhance the overall health, natural environment and quality of life in our communities*.

In particular, the LEED-ND Smart Location Prerequisite has often been raised as a major difference between the two rating systems. However, when examining the purpose and performance for the Smart Location Prerequisite, LEED-ND and NGBS both focus on the locational criteria, while NGBS uses a slightly different format to achieve the same goals and overall performance.

The purpose for the LEED-ND Smart Location Prerequisite is described as:

1. encouraging development within and near existing communities and public transit infrastructure,
2. encouraging appropriate regional development expansion,
3. reducing vehicle miles traveled, and
4. encouraging daily physical activity associated with walking and bicycling.

NGBS achieves the same purpose and performance as the LEED-ND Smart Location Prerequisite but presents its material in a different format as shown in the following comparison:

1. **LEED-ND INTENT: "Encouraging development within and near existing communities and public transit infrastructure"**

    - NGBS Section 401 awards points for selection of an infill or greyfield site, which is the same as LEED-ND, encouraging development near existing communities, however NGBS takes into account slope.

    - NGBS Section 405.6 awards points for practices that are related to multi-modal transportation access. The intent for this practice, as noted in the ***ICC 700 2012 National Green Building Standard Commentary***, is to allow residents the ability to select from a variety of different transportation options which can serve to reduce auto dependency.

    - NGBS Section 405.6 (1) awards points if a site is selected with a boundary within one-half mile of pedestrian access to a mass transit system or within five miles of a mass transit station with available parking.

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2. **LEED-ND INTENT: "Encouraging appropriate regional development expansion"**

   - NGBS Section 403.1 (1-2) contains mandatory requirements to ensure that a natural resources inventory is created and those priority areas are preserved. This credit ensures that new communities avoid priority habitat conservation areas.

   - NGBS Section 405.6 (3) awards points for designing walkways, bikeways street crossings and entrances that promote pedestrian activity and connects new communities to existing areas of development.

   - NGBS Section 405.7 awards points for meeting minimum density requirements, which is consistent with LEED-ND's intent of compact development.

3. **LEED-ND INTENT: "reducing vehicle miles traveled"**

   - NGBS Section 405.4 awards points for mass transit usage and for increased biking and walking opportunities. Mixed-use development allows for different land uses to be located in close proximity to one another, and in some cases within the same structure. Mixed-use development was the predominant form of urban development up until World War II. During this time, walking and public transportation were primary modes of transportation as cities and suburbs were far more compact than today. After World War II, widespread implementation of zoning laws, massive road building programs and the explosive growth in automobile usage allowed for most new development to be strictly segregated over a much larger area of land. Separated land uses increase automobile dependency and household vehicle miles traveled. By encouraging more mixed-use, developments can be more compact, thus reducing the VMT required by residents. Reduced VMT will reduce fuel consumption and associated emissions, and therefore yield benefits to the overall environment.

   - NGBS Section 405.6 (4) awards points for bike parking. Multi-modal transportation to reduce reliance on the automobile.

   - NGBS Section 405.6 (6) awards points for car sharing programs, such as Transportation Demand Programs that promote and encourage innovative ways to reduce car trips and VMT's.

   - NGBS Section 405.8 awards points for Mixed-Use Development, which focuses on a diversity of uses within walking distance of the residential uses. By encouraging more mixed-use, developments can be more compact, thus reducing the VMT required by community residents. Reduced VMT will reduce fuel consumption and associated emissions, and therefore yield benefits to the overall environment.

4. **LEED-ND INTENT: "encouraging daily physical activity associated with walking and bicycling"**

   - NGBS Section 405.4 (3) awards points for increased biking and walking opportunities. These practices, under both programs, encourage increased daily physical activity associated with walking and bicycling.

- NGBS Section 405.6 (3) awards points for community design that promotes and encourages pedestrian activity.
- NGBS Section 405.6 (4) awards points for bike parking.

In conclusion, both NGBS and LEED-ND contain locational goals and credits. However, NGBS ensures that their credits are achieved and implemented by field inspectors and third party verifiers. LEED-ND does not. This fundamental difference has made a lot of experts in the field question the validity and true outcome of the LEED-ND program. NGBS, as stated above, is the only ANSI accredited program in the country and will ensure adherence to the goals and credits of not only location, but overall community performance.

Michael Luzier
President and CEO
Home Innovation Research Labs

EDUCATIONAL RESOURCES

Urban Land Institute (2001). Transforming Suburban Business Districts.
Urban Land Institute (2003). The Mixed-Use Development Handbook.
Urban Land Institute (2005). Creating Walkable Places Compact Mixed-Use Solutions.
Congress of New Urbanism (2003). Greyfields into Goldmines.
Congress of New Urbanism (2004). Codifying New Urbani

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March 6, 2015

Mr. Jon Rilling
Accretive Investments, Inc.
12275 El Camino Real, Suite 110
San Diego, CA 92130

RE: Site Development Letter of Approval for Future Certification

Dear Mr. Rilling:

Accretive Investments, Inc. intends to have Lilac Hills Ranch certified as a Green Land Development per the ICC 700-2012 National Green Building Standard™ (NGBS) once the construction has been completed. An initial review and approval of the plans has been requested as a first step toward certification.

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The plans and intended construction practices for this site development have been reviewed by a Home Innovation Research Labs' Accredited NGBS Green Verifier, and the report from this assessment has been reviewed and approved by the Home Innovation Research Labs. This assessment indicates that this land development, when constructed in accordance with the plans submitted, will be eligible for NGBS Green Land Development certification at the Four Star level.

Home Innovation Research Labs will not issue the actual certification until the construction is complete and the verifier has completed a final inspection of the site development.

The final certification level will be determined by the total number of points awarded. The actual point values and certification level may differ from the expected based on the final inspection.

Best Regards,

Thomas M. Kenney, P.E.
VP Engineering & Research

Enclosure

cc: Michael Luzier, President & CEO

June 29, 2015

Mark Wardlaw
COUNTY OF SAN DIEGO
5510 Overland Ave.
San Diego, CA 92123

RE: Lilac Hills Ranch
NGBS Letter of Approval

Dear Mr. Wardlaw,

Carrier Johnson was hired to independently review and verify the Lilac Hills Ranch Project for conformance with the NGBS program. On April 6, 2015, we submitted a letter to the County confirming our verification that the Project met the NGBS criteria for a Letter of Approval at the highest level, which is Four out of a possible Four Stars. A Letter of Approval states that a development will be eligible to be certified at a certain level once it is built as planned. Attached is the Carrier Johnson analysis of the Project's application which was submitted to Home Innovation Labs.

We have found that the Project has met all of the fundamental criteria in the NGBS program that makes it equivalent to the LEED-ND intent. No two programs can be exactly the same; however, by examining the smart growth goals and intent of LEED-ND and NGBS, we are able to draw parallels that measure equivalency by overall performance.

The Project has been awarded points for meeting the following NGBS sections, which relate to location, smart growth, compact development and walkability – with the main goal to minimize environmental impacts, reduce the reliance on automobiles and reduce vehicle trip length:

1. **TRANSIT & MULTI-MODAL**

   - Under NGBS Section 405.6 (1), the project was awarded points for a location in close proximity to multi-modal transportation access, which states:

     (1) A site is selected with a boundary within one-half mile (805 m) of pedestrian access to a mass transit system or within five miles of a mass transit station with available parking.

     See Attached 405.6 (1) – Applicant Response, which was verified by Carrier Johnson.

2. COMPACT DEVELOPMENT

- Under NGBS Section 403.1 (1-2), the project was awarded points for creating a natural resources inventory to preserve priority areas. This credit ensures that new communities avoid priority habitat conservation areas.

  (2) A natural resources inventory is used to create site plan.
  (3) A plan to protect and maintain priority natural resources/areas during construction is created. (Also see Section 404 for guidance in forming the plan.)

  See attached applicant response to 403.1 (1-2), which was verified by Carrier Johnson.

- Under NGBS Section 405.6 (3), the project was awarded points for a pedestrian oriented design which connects new communities to existing areas of development. The project met the following criteria, which allows people to select from a variety of non-motorized options through neighborhood connectivity:

  (3) Walkways, bikeways, street crossings, and entrances designed to promote pedestrian activity are provided. New buildings are connected to existing sidewalks and areas of development.

  See attached applicant response to 405.6 (3), which was verified by Carrier Johnson.

- Under NGBS Section 405.7, the project was awarded points for meeting minimum density requirements of 7 dwelling units per net acre. This concept of compact development is consistent with LEED-ND, from a conceptual standpoint that compact development reduces infrastructure costs and environmental impacts.

  The density of a project, or the number of dwelling units per acre are in a development, changes the land use and the amount of resources necessary in the land development process. Increasing the number of dwelling units per acre typically reduces the capital costs for infrastructure (roads, water, storm sewer, etc.).

  See attached applicant response to 405.7, which was verified by Carrier Johnson.

3. REDUCING AUTO TRIP LENGTH

- Under NGBS Section 405.4, the project was awarded points for Mixed-use development, thus reducing the vehicle trip length required by residents. This reduction in VMT will reduce fuel consumption and

associated emissions, and therefore yield benefits to the overall environment.

(1) Innovative zoning ordinances or local laws are used or developed for permissible adjustments to population density, area, height, open space, mixed use, or other provisions for the specific purpose of open space, natural resource preservation or protection and/or mass transit usage. Other innovative zoning techniques may be considered on a case by case basis.

(2) An increase to the permissible density, area, height, use, or other provisions of a local zoning law for a defined green benefit.

(3) Place-based amenities such as plazas, squares, and attached greens located around civic, commercial, and mixed-use property are accessible by sidewalks, on-street parking, or provide for bike racks for the purpose of promoting higher density living.

See attached applicant response to 405.4, which was verified by Carrier Johnson.

- Under NGBS Section 405.6 (4), the project was awarded points for bike parking. As stated by NGBS, "multimodal transportation systems allow for people to select from a variety of different transportation options (walking, public transit, driving, cycling)."

(4) Bicycle parking and racks are indicated on the site plan and constructed for mixed-use, multi-family buildings, and/or common areas.

See attached applicant response to 405.6 (4), which was verified by Carrier Johnson.

- Under NGBS Section 405.8, the project was awarded points for Mixed-Use Development, which focuses on a diversity of uses within walking distance of the residential uses. The project application clearly shows a mixed-use, pedestrian oriented community, which has been proven to reduce automobile trip lengths and reduce VMT.

405.8 Mixed-use development. (1) Mixed-use development is incorporated, or (2) for single-use sites 20 acres or less in size with boundaries adjacent to a site with a minimum of two uses containing retail, services, and employment where a pedestrian network of streets, sidewalks, pathways, or plazas exists that connects a majority of lots within the site with the adjacent non-residential multi-use site.

See attached applicant response to 405.8, which was verified by Carrier Johnson.

4. **HEALTHY COMMUNITIES**

- Under NGBS Section 405.4 (3), the project was awarded points for increased biking and walking opportunities. The project demonstrated that through a combination of mixed-use design, amenities such as plazas, squares and village greens and pedestrian access, the project will promote pedestrian oriented healthy choices.

  (3) Place-based amenities such as plazas, squares, and attached greens located around civic, commercial, and mixed-use property are accessible by sidewalks, on-street parking, or provide for bike racks for the purpose of promoting higher density living.

  See attached applicant response to 405.4 (3), which was verified by Carrier Johnson.

- Under NGBS Section 405.6 (3), the project was awarded points for community design that promotes and encourages pedestrian activity, including walking, jogging, biking and hiking. The community is inter-connected through a 16 mile trail network, which is integrated into each neighborhood through a variety of trail types, staging areas and over 20 acres of active and passive parks.

  (3) Walkways, bikeways, street crossings, and entrances designed to promote pedestrian activity are provided. New buildings are connected to existing sidewalks and areas of development.

  See attached applicant response to 405.6 (3), which was verified by Carrier Johnson.

- Under NGBS Section 405.6 (4), the project was awarded points for bike parking.

  (4) Bicycle parking and racks are indicated on the site plan and constructed for mixed-use, multi-family buildings, and/or common areas.

  See attached applicant response to 405.6 (4), which was verified by Carrier Johnson.

In conclusion, Carrier Johnson has verified that the Lilac Hills Ranch project has earned 253 Points toward a Letter of Approval at the four star level,

which is the highest level possible. The fundamental reason that this community scored so highly, in so many different categories, is due to the project being designed as a smart growth community that supports mixed land uses, residential, commercial, institutional, civic and recreational uses, in a close walking distance to each other. This mix of uses also integrates multi-modal transportation opportunities and access that help to reduces reliance on the automobile. Finally, by designing a compact, mixed-use community, with a range of housing types, the project is able to provide healthy choices and alternatives that are not auto-dependent, promoting a healthy and active lifestyle, reducing infrastructure costs and environmental impacts.

We appreciate the opportunity to provide our assistance.

Sincerely,

Michael A. Stonehouse, AIA
NGBS Verifier
LEED AP,
Associate

Gordon Carrier, FAIA
Principal

CC: Jon D. Rilling, Accretive Investments, Inc.

R. Randy Goodson, Accretive Investments, Inc.

April 6, 2015

Mark Wardlaw
COUNTY OF SAN DIEGO
5510 Overland Ave.
San Diego, CA 92123
RE: Lilac Hills Ranch
NGBS Letter of Approval

Dear Mr. Wardlaw,

As an established architecture and planning firm in San Diego for over 35 years, Carrier Johnson ("CJ") was asked to review the Lilac Hills Ranch Project ("Project") for conformance with an industry-wide green standard. To that end, we have reviewed the requirements of LEED-ND certification and identified an equivalent LEED-ND rating system for the project. For residential land developments/communities seeking green certification, the ICC 700 National Green Building Standard ("NGBS") has been recognized as an equivalent land development program to LEED-ND. We have studied NGBS, analyzed the Project's application, including the Specific Plan, EIR and Tentative Maps for consistency with this standard and prepared a scoring report for the level of certification that may be possible (which the project achieved Four, out of a possible Four-Stars).

NGBS is a green rating system that covers the design, planning, and development of residential and mixed-use green communities and is administered by Home Innovation Research Labs. NGBS is the only Green Building Standard in the Country that has received approval from the American National Standards Institute (ANSI) in 2009. In order to receive an ANSI-approval, the standard must be developed by balanced representation through independent consensus committee and is subject to regular reviews and periods of public comment.

NGBS provides practices for the design, planning, construction, and certification of land development projects, including both residential and mixed-use communities. NGBS offers four levels of green certification for site design and land development – One through Four Stars, depending on the number of green practices incorporated into the project's design and construction. Smart growth practices included within the land development certification include: reduced soil disturbance; stormwater management; heat island mitigation; and innovative zoning to encourage dense mixed-used development near transit options.

To be NGBS certified, a project is subject to two independent, third-party verifications. The project applicant must hire an independent, accredited verifier who is responsible for visual inspection of the project to compare entitlement documents and site plans with the actual green practices implemented. To become certified as a verifier by Home Innovation Labs, the verifier must demonstrate experience in land development, residential construction and green building practices. The verifier must complete training on NGBS practices and must pass a written exam. Home Innovation Labs reviews every rough and final inspection to ensure national consistency and accuracy in the verification reports.

Michael Stonehouse, an Associate with Carrier Johnson+Culture, is qualified as an independent Verifier under NGBS. Mr. Stonehouse has over 20 years of experience as an architect and planner including sustainable building and development practices.

As an official NGBS Verifier, Michael Stonehouse has reviewed the Lilac Hills Ranch Project under NGBS for Land Development and has verified that the development is designed to meet NGBS certification, documented through a Letter of Approval prepared by Home Innovations Research Lab. The Letter of Approval recognizes that the Lilac Hills Ranch as presented by its development documents demonstrates that the design is in conformance with NGBS Land Development standard at the highest level. Mr. Stonehouse is also a LEED AP.

We find the NGBS Land Development rating system equivalent to the LEED-ND program. The goal of NGBS Land Development, like LEED-ND, is to recognize high performing projects that are designed to surpass the local minimum energy and sustainability standards and to promote high level of sustainable design in the construction industry. Both rating systems have weighted credits based upon the related impacts to the environment and similar credit categories. Due to the nature of timelines in land development, both rating systems offer a pre-construction review. LEED-ND has three stages of certification while NGBS has two. The NGBS Letter of Approval is equivalent to a "Stage 1" of LEED-ND that is awarded for pre-entitled projects. NGBS Land Development includes the following credit categories:

- Site Design and Development – site location
- Project Team & Mission Statement – selection of a qualified professional team
- Lot and Site Design – natural resources such as wetlands, steep slope conservation, cut & fill reduction, soil disturbance and erosion
- Energy Efficiency
- Water Efficiency

- Indoor Environmental Quality
- Homeowner Education
- Stormwater Management
- Landscape Planning
- Existing & Recycled Materials
- Site Development and Construction
- Wildlife Habitat – conservation and protection
- Mixed Use Zoning
- Compact Development
- Density
- Transit
- Innovative Practices

There are a few differences between the two rating systems. NGBS Land Development does not stipulate a density threshold for land development certification and there is no restriction on the community size, whereas LEED-ND has a 320-acre limit. Homes within an NGBS Green Certified Land Development are not required to be green certified to any rating system whereas LEED-ND requires at least one home to be LEED certified. Lastly, NGBS requires stringent post-approval on-site verifications to ensure that the standard is implemented. LEED-ND does not have this requirement.

We appreciate the opportunity to provide our assistance.

Sincerely,

Michael A. Stonehouse, AIA
LEED AP, NGBS Verifier
Associate

Gordon Carrier, FAIA
Principal

CC: Jon D. Rilling, Accretive Investments, Inc.

R. Randy Goodson, Accretive Investments, Inc.