



**City of
Santa Clara**
The Center of What's Possible

Building Division: 408-615-2440
 Email: Building@santaclaraca.gov
 Permit Center: 408-615-2420
 Email: PermitCenter@santaclaraca.gov
 Automated Inspection Scheduling System: 408-615-2400

**SUBMITTAL REQUIREMENTS FOR NEW HOUSING
MULTIFAMILY & MIXED USE**

**SUBMITTAL REQUIREMENTS MATRIX
New Housing (Multifamily / Mixed Use)**

APPROVAL TYPE	SUBMITTAL REQUIREMENTS (See Legend Below)												
See Submittal Requirements List (below) for detailed submittal requirements.	1. General Requirements	2. Site Plan Package	3. Architectural Package	4. Structural Package	5. Mechanical/Plumbing Plans	6. Electrical Plans	7. California Energy Documentation	8. Structural Calculations	9. Truss Plans and Calculations	10. Geotechnical Report	11. Civil Package	12. Other Requirements	
	Multifamily / Mixed Use – New Building	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	Multifamily / Mixed Use – Addition	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	Multifamily / Mixed Use – Conversion	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
LEGEND <input type="checkbox"/> = Required <input type="checkbox"/> = Conditionally required depending on project design characteristics													

**SUBMITTAL REQUIREMENTS LIST
New Housing (Multifamily / Mixed Use)**

This list must be used in conjunction with the Submittal Requirements Matrix. The Submittal Requirements Matrix establishes the documents/plans that are required based upon the scope of work you are applying for. Acceptance of projects for review by the City depends upon the accuracy and completeness of the submitted plans and documents. This Submittal Requirements List establishes the minimum details that must be included in all plans and documents. The design professional should use this list when preparing project packages for review. Plans or documents missing any of the required detail may not be deemed complete (accepted into plan check). Additional information or clarification may be requested during the review process or prior to permit issuance.

Conditional: Where the word “Conditional” appears before the document and/or detail, this information will be required if those conditions are applicable to the proposed project.

Recommended: Where the word “Recommended” appears before the document and/or detail, the information is provided as a suggestion for improving the review process and is not required to accept your project for review. However, the recommended items may be a plan check correction item and required to be submitted for subsequent reviews. It is recommended that you provide the documents and information to reduce the number of review cycles.

All other detail is required unless not applicable to your project.

1. GENERAL REQUIREMENTS

- 1.1 **Building Permit Application:** Completed [Building Permit Application](#) form with plan check fee.
- 1.2 **Plan Review Document Format & Requirements:** Visit [Electronic Plan Submittal Guide](#) for plan review document format requirements.
- 1.3 **Conditions of Approval:** All conditions of approval for this Permit shall be reprinted and included within the first three sheets of the building permit plan sets submitted for review and approval.
- 1.4 **Project Information:** Provide, in a table format, the following information on the first sheet of the plans:
 - **Scope of Work** - Include a bullet point narrative that details the complete scope of work for the submittal.
 - **Sheet Index** - List all sheets included in the plan package.
 - **Project Team** - List name and phone number of all design professionals including engineers, architects, designers.
 - **Property Owner** name(s) and address(es).
 - **Assessor Parcel Number(s)** for the property on which the development is proposed.
 - **Lot Size.**
 - **Uses** - Existing and proposed (e.g., Single Dwelling Unit, Duplex, Accessory Dwelling Unit)
 - **Type of Construction** of existing and proposed structures per the California Building Code or California Residential Code.
 - **Occupancy Classification(s)**, existing and proposed, per the California Building Code or California Residential Code.
 - **Flood Zone** – Provide flood zone information (A, AE, AH, AO, X, etc.)
 - **Number of stories** (existing and proposed).
 - **California Building Standards Code year** used for the design of the project.
 - **Zoning** designation and/or overlay zone designations
 - **Floor Area Ratio (FAR)** - Provide the proposed FAR for the property.
 - **Floor Area Summary** - For new construction and additions, provide the gross floor area (existing area to remain, new area, and total area) per floor. Include exterior walls in gross floor area.
 - **Fire Sprinklers:** Yes/No, Type
- 1.5 **Scale:** Plans must be drawn accurately to scale, with the scale indicated on the plans.
- 1.6 **North Arrow**
- 1.7 **Legend:** Sheets must have a legend that clearly indicates the meaning of all graphic symbols.
- 1.8 **Key Map:** Projects requiring multiple base sheets must include a graphic key map on each sheet that indicates its relationship to the entire project.
- 1.9 **Deferred Submittals** – List of all deferred submittals. Items allowed as deferred submittal are noted in this list as “may be deferred”.
- 1.10 **Conditional - Floor Area Analysis Calculation:** The “floor area analysis” evaluates a new or existing building for compliance with allowable floor area limitations based upon the occupancies present in the building and the type of construction of the building. A floor area analysis, based upon the prevailing California Building Code, should show the following:
 - The square footage of the different occupancies in the building.
 - The allowable square footage for the noted occupancies.
 - A tabulation of the actual square footage of a noted occupancy to the allowable square footage for that occupancy.
- 1.11 **Conditional - Responsible Charge:** Plans shall be prepared, stamped and signed by either a California registered architect or California professional engineer in accordance with Business and Professions (B&P) Code Sections 5535 thru 5538, unless otherwise exempt per B&P Code. Visit [When is a California Licensed Professional Engineer or Registered Architect Required](#) for more information.
- 1.12 **Cal Green Standards and City adopted Reach Code:** Provide notes and details to show compliance with the California Green Building Standards Code and adopted Reach Code.
- 1.13 **Landscape Plan Requirements:** Please contact the Planning Division if any landscaping modifications are included as a part of the project.

2. SITE PLAN

A site plan is required for all projects and shall include the following information as necessary to demonstrate compliance with legal lot status, site accessibility, parking, distances of proposed construction to property lines and other structures, etc.

- 2.1 Property Lines:** Show, label, and dimension all property lines.
- 2.2 Setback Lines:** Show and label all required and proposed setback lines.
- 2.3 Easements:** Show and label all existing and proposed easements, including the type of easement. Provide a note on the plan stating, "All easements on the subject property are accurately shown and identified on this sheet." This note must be signed by the design professional responsible for the preparation of the plan.
- 2.4 Street/Right of Way:** Show and label all existing and proposed streets, parkways, sidewalk, curb cuts, driveways, curb to property line distances. Indicate any separate permit for proposed improvements in the public right of way or public service easements.
- 2.5 Conditional - Off-Street Parking:** Show all "off-street" parking spaces that are not within a structure. Identify any accessible parking spaces.
- 2.6 Drainage:** Show existing and proposed drainage patterns, including roof drains and area drains.
- 2.7 Structures and Hardscape:** Show location and dimensions of all existing and proposed buildings and structures, including accessory structures such as fences, walls, patio covers. Hardscape (pavement) shall be delineated and identified by a symbol/pattern.
- 2.8 Fire Separation Distances:** Show the separation distance between adjoining buildings or structures and the distance from property lines to all buildings or structures.
- 2.9 Projections:** Show and dimension all architectural projections such as stairs, balconies, eave overhangs etc.
- 2.10 Refuse & Recycling Areas:** Show and label the location, including dimensions of existing and proposed refuse and recycling materials storage areas.
- 2.11 Utilities:** Show all existing and proposed utilities on the property and adjacent right of way, including hydrants, vaults, transformers, electrical meters, electric sub-panels, poles, water meters, water and sewer lines, gas meters and gas lines, etc. Show overhead and underground utility lines. Include size and type of existing and proposed utilities.
- 2.12 Plumbing Site Plan:**
- Include the size and layout of the building sewer, point of connection to the public sewer, and clean outs.
 - Show water meter(s), backflow prevention device(s), main water piping. Specify sizes and types. The size of the water meter and building supply pipe shall be determined in accordance with the California Plumbing Code. Calculations used to determine the required size of the water meter and building supply pipe shall be provided on the plan.
 - For projects involving installation or relocation of gas appliances, provide floor plan and isometric layout or line diagram of gas piping and location of gas meter. Line diagram shall indicate the maximum length of gas piping (or length of branches if calculation is done for each pipe branch).
- 2.13 Conditional – Drainage/SWPPP:** Stormwater treatment measures are required for all construction projects that create and/or replace 5,000 square feet or more of impervious surface (including road and trail projects). Fill out the [C.3 Data Form](#) and submit it with the development project application. Visit "[Stormwater Resources for Development & Construction](#)" webpage for more information.
- 2.14 Conditional – Allowable Area Frontage Increase:** When yards are used for allowable area increase per CBC, show the extent and depth of the required yards on the site plan.
- 2.15 Recommended - Lighting Plan:** Where project proposes outdoor lighting (parking lots, private drives, security, etc.), a photometric drawing shall be provided that clearly demonstrates that the project site lighting does not fall on surrounding properties or create glare hazards within the public rights-of-way.
- 2.16 Best Management Practice (BMP) Plan:** Show all construction BMPs, permanent construction BMPs, post construction BMP'S, and Low Impact Development (LID) design features and details. Label as BMP Sheet.
- 2.17 Conditional - ACCESSIBILITY PLANS**
- The development shall comply with accessibility standards specified in the California Building Code Chapter 11A and/or 11B as applicable. Unless the development is specifically exempted by the California Building Code, accessibility plans are required. When providing these plans, include the following details.
- **Accessible Routes on Private Property:** At least one accessible route shall be shown within the site from accessible parking spaces and accessible passenger drop-off and loading zones; public streets and sidewalks; and public transportation stops to the accessible building or facility

entrance they serve. Where more than one route is provided, all routes must be accessible. Show at least one accessible route within the boundary of the site from accessible parking spaces and accessible passenger loading zones to the accessible building entrance they serve. When more than one route is provided, all routes shall be accessible.

- **Accessible Routes Between Buildings:** Show at least one accessible route connecting accessible buildings, accessible facilities, accessible elements, and accessible spaces that are on the same site.
- **Routes from Right-of-Way:** Show at least one accessible route from public transportation stops, public street or sidewalk to the accessible building entrance they serve. When more than one route is provided, all routes shall be accessible.
- **Parking Spaces:** Provide fully dimensioned details of accessible parking spaces, ramps, curb ramps, sidewalks, and signage.
- **Entrances:** Show that all exterior entrances and all ground-floor level exits to buildings comply with accessibility requirements.
- **Covered Multi Family Dwelling Units:** On the plan, provide a detailed listing of all "Covered Dwelling Units" in each covered multi-family dwelling building. State on plans the source of construction funds as privately funded, publicly funded, or a combination of both.
- **Path of Travel:** Show accessible route to rooms and spaces, including to all path of travel elements such as toilet facilities, drinking fountains, etc.

2.18 Conditional - FIRE ACCESS AND HYDRANT DRAWING

- If the project has a previously approved fire access and hydrant plan, a copy of the stamped and approved site plan must be submitted.

3. ARCHITECTURAL PACKAGE

This package consists of floor plans, elevations, roof plans, building sections, door & window schedules, architectural details, etc.

- ### 3.1 FLOOR PLAN
- Provide a floor plan of all floors; indicate use of all rooms (existing and proposed); show all balconies, attached decks, covered porches and patios, etc.
- **Dimensions:** Show dimensions to all proposed spaces and notable features, including but not limited to walls, columns, doors, windows, stairs, etc.
 - **Floor Levels:** Indicate all floor levels (i.e., ground floor, second, third, etc.). Identify any level changes within floors.
 - **Ceiling Heights** – Note the ceiling height of each room.
 - **Doors and Windows:** Identify and show all doors and windows. Cross reference doors and windows to the door and window schedule.
 - **Conditional - Demolition Floor Plan:** Where portions of any structure are to be demolished or altered, provide a demolition floor plan. Submit a clear, fully dimensioned demolition sheet for each floor that shows and identifies all walls, windows, doors, stairs, appliances, plumbing fixtures, etc., to be altered or removed.
 - **Plumbing Fixtures:** Show all existing, proposed and relocated plumbing fixtures.
 - **Plumbing & Mechanical Equipment:** Show location, size, make and model of proposed heating equipment and water heater. (May be shown on separate mechanical plans.)
 - **Bathroom Fixture Clearances** – Specify and show required fixture clearances and dimensions, e.g., minimum shower size, toilet, and lavatory clearances, etc.
 - **Ageing-In-Place** – Specify required ageing-in-place features.
 - **Conditional –Accessibility – Enlarged Floor Plans and Interior Elevations:** Provide fully dimensioned enlarged floor plans and interior elevations for the kitchen, powder room, and all bathrooms. Show compliance with California Building Code Chapter 11A and 11B as applicable.
 - **Attic Access** – Show location and size of attic access.
 - **Stairways & Elevators:** Indicate the location and travel direction of all stairways.
 - **Roof Access:** Show location of roof access stairs and ladders.
 - **Fire Resistive Construction:** Where fire resistive construction is proposed, show fire resistive construction components of the building on the floor plans. These components may include fire rated shafts, fire walls, fire barriers, fire partitions, rated corridors, horizontal exits, and other rated construction.

- **Electrical Floor Plan:** Show and specify electrical appliances, receptacle outlets, light fixtures, switches, meter panel, sub panel(s), etc. (May be shown on electrical plan.)
 - **Electrical Smoke Detectors/Carbon Monoxide Alarms:** show all existing, proposed and relocated smoke detectors and carbon monoxide alarms.
 - **Recommended - Grid Lines:** The grid lines specified on the architectural plans must be consistent with grid lines shown on structural plans.
- 3.2 ELEVATIONS** - Required for new construction or alterations that impact the exterior of the buildings and shall include the following:
- **Elevation Labels:** Drawings must be separate and labeled North Elevation, South Elevation, East Elevation and West Elevation. All elevation plans must be drawn accurately to scale and fully dimensioned.
 - **Grades:** Clearly show and label existing and proposed grades.
 - **Floor Elevations:** Indicate all finished floor elevations.
 - **Building Height:** Indicate building heights.
 - **Exterior Finishes** – Specify and show all exterior finish materials.
 - **Architectural Details:** Show and label exterior architectural details and location of all windows, doors, balconies, and other architectural features.
 - **Label Buildings:** If more than one building is located on the project site, clearly label each building elevation to distinguish one from the other.
- 3.3 ROOF PLAN:** Required for all new construction or any modification to the existing roof and shall include the following:
- **Roof Elevations** - Show and label elevations for all roof peaks, ridges, low points.
 - **Roof Detail:** Show all hips, valleys and ridges, drains and overflow drains.
 - **Material:** Show roofing material with complete specifications.
 - **Screening Elements:** Indicate any mechanical equipment and details of any architectural screening element.
 - **Vents/Skylights/Chimneys:** Show location and type of all roof vents, chimneys and skylights if applicable.
- 3.4 BUILDING SECTIONS** shall include the following information:
- **Framing:** Show sections across floors, walls, and roof and include the insulation R values.
 - **Elevations:** Show finish floor and roof level elevations.
 - **Ceilings:** Show ceiling framing, height of ceiling, suspended ceiling, dropped ceilings and soffits.
 - **Architectural Projections:** Show all interior and exterior architectural projections. Include stairs, balconies and eave overhangs.
 - **Stories:** Provide cross section views of the building such that the numbers of stories are clearly identified. Cross reference building sections to architectural floor and site plans.
 - **Stairs, Shafts, and Elevators:** Show stairs, shafts, elevators in the building cross sections.
- 3.5 DOOR AND WINDOW SCHEDULES**
- **Door and Window Schedules:** The schedule should include size, type, hardware, fire, and Sound Transmission Class (STC), U value (overall coefficient of thermal transmission), and SHGC (Solar Heat Gain Coefficient) for all fenestration.
 - **Recommended - Finish Schedule:** Provide a finish schedule. This schedule should include finishes for walls, ceilings, and floors.
- 3.6 ARCHITECTURAL DETAILS**
- **Stairs, Handrails and Guardrails:** Provide dimensioned architectural details of all stairs, handrails and guardrails.
 - **Fire Resistive Details:** When proposed construction involves fire resistive assemblies, provide fire resistive details of walls, ceilings, floors, roofs, shafts and penetrations. Include the agency approval number for each detail (e.g., UL No. or ICC No.).
 - **Attic and Underfloor Ventilation:** Provide ventilation calculations and specifications for attic and underfloor ventilation. Show vents on Elevations and Roof Plans.
- 3.7 MEANS OF EGRESS**

- **Space and Occupant Loads:** Show the use of all spaces with their corresponding occupant load. The occupant load must be determined using appropriate occupant load factors per the California Building Code.
- **Means of Egress Elements:** Identify on the plans all elements of the means of egress system. These elements will include items such as corridors (rated), passageways, horizontal exits, stair enclosures, egress balconies, etc.
- **Means of Egress Floor Plans:** Provide a complete and clear means of egress plan for every floor. Identify path of exit travel from the most remotely occupied point of the floor to a public way. Plans shall show the elements of means of egress (e.g., exit access, the exit, and the exit discharge), number of exits required and provided, travel distance, common path of travel, etc.

4. STRUCTURAL PLAN PACKAGE

Structural Plan Package is required for all construction that involves any new construction, modification to existing structure, additions to existing structures, and major changes of use. The structural plan package includes schedules and construction specifications, foundation plans, framing plans and structural details.

4.1 SCHEDULES AND CONSTRUCTION SPECIFICATIONS

- **Structural Notes**
- **Nailing Schedule:** When the construction involves wood components, provide a complete nailing schedule consistent with the California Building Code or the California Residential Code.
- **Construction Specifications:** Provide complete construction specification for materials used on the project. The materials may include concrete, wood, steel, masonry, etc.
- **Shear Wall Schedule:** Show shear wall schedule, if applicable (wood construction) and identify all shear walls, specifications, and nailing requirements.
- **Statement of Special Inspection:** List required special inspection(s).
- **“Basis of Structural Design” information:** The “Basis of Structural Design” information must include design loads such as dead, live, wind, and seismic, seismic design criteria information, soil profile information and condition of soil information.

4.2 FOUNDATION PLAN - Provide the following details on foundation plans:

- **Dimensions:** Show completely dimensioned foundation plans. The foundation plan must incorporate the foundation system as recommended in the Geotechnical Investigation Report.
- **Retaining Walls:** Show location, height, and complete details of all proposed retaining walls.
- **Footings and Grade Beams:** Show continuous and spread footings and grade beams. Include dimensions, reinforcement size and spacing.
- **Anchors/Bolts:** Show location, size and spacing of hold down anchors and anchor bolts.
- **Slab Details:** Show slab thickness, size and spacing of reinforcing steel, including tendon layout for post tension slab.
- **Caissons and Piers:** Show size and dimensioned location of caissons and piers. Specify rebar size and spacing when the foundation system includes caissons and piers.
- **Design:** A licensed professional engineer must design the foundation system when the foundation is supported on expansive soils or fill soils per Chapter 18 of the California Building Code or Section R401.4 of the California Residential Code.

4.3 FRAMING PLANS - FLOOR, ROOF & CEILING

- **Framing Members:** Show the material, size, location, direction, span, and spacing of all framing members. The framing members include headers, beams, girders, floor joists and/or trusses and ceiling framing, etc.
- **Posts/Columns:** Identify posts and columns on the plans by size, type, location and spacing.
- **Diaphragms:** Specify type and thickness of floor and roof diaphragms.
- **Roof framing:** Identify all ridge, hip and valley members by size and framing system.
- **Bearing & Shear Walls:** Identify bearing walls, and shear walls above and below floor/roof levels.
- **Nailing:** Identify roof and floor diaphragm nailing pattern. Shows nail type, size and spacing.
- **Reinforcing Steel:** Show reinforcing steel grade size and spacing for post-tension and conventionally reinforced concrete members.
- **Lateral Load Resisting Frames:** Identify by type and location all lateral load resisting frames on the

plans. Provide frame elevations and cross reference to the detail sheets.

- **Conditional - Mechanical Equipment:** When provided, show location of mechanical equipment on structural floor or roof plans. Show method of attachment to roof and floor framing. Structural calculations may be required for their support.
- **Conditional – Solar Photovoltaic (PV) System:** Show support system for roof PV installations. Show method of attachment to the supporting system.

4.4 STRUCTURAL DETAILS - Details shown on the construction documents should be specific to the project. All details not applicable to the project must be either removed from the project documents or be noted as being “not applicable.”

- **Cross Section:** Provide cross section details of all free-standing walls, structures, and fences.
- **Framing Detail:** Provide framing detail of all walls, floors, roofs, stairs. Specify size, type, and spacing of all members.
- **Shear Transfer Details:** Provide shear transfer details (show blocking, nailing, bolts).
- **Connection Details:** Provide connection details representative of the assumed framing and support elements used in the engineering of the structural system of the project. The connection details should include connection for all structural elements such as columns, beams, walls, floor framing elements. Show all hardware, nails, welds, and reinforcing bars.

5. MECHANICAL/PLUMBING PLANS

- 5.1 Responsible Charge:** Mechanical/plumbing plans and calculations shall be stamped and signed in accordance with the California Business and Professions Code. The mechanical/plumbing plans and calculations shall be signed by a licensed mechanical engineer. An architect or civil engineer can sign the Mechanical plans and Plumbing plans only if he or she has designed the project as the responsible designer of the mechanical system. A mechanical contractor can sign and stamp the mechanical/plumbing plans and calculations and/or Title 24 energy compliance for the mechanical system only if he/she is responsible for both the design and installation of the system.
- 5.2 Conditional - Mechanical Floor Plans:** When proposing new HVAC systems, provide mechanical floor plans showing layout of duct work, supply and return air registers with CFM.
- 5.3 Conditional - Equipment Schedule:** Provide mechanical equipment schedule, including type, capacities, efficiencies, and weights.
- 5.4 Conditional - Isometric Layout or Line Diagram of Gas Piping:** For projects involving installation or relocation of gas appliances, provide floor plan and isometric layout or line diagram of gas piping and location of gas meter. Line Diagram shall indicate the maximum length of gas piping (or length of branches if calculation is done for each pipe branch).
- 5.5 Conditional -Storm Drain System:** Provide a plumbing plan with complete storm drain layout and sizes of main and all branches for storm drain piping from rooftop and impervious surfaces to the Civil POC(s). Show POC(s), sizes, materials, inlets, cleanouts, roof downspouts, and discharge points.
- 5.6 Conditional - Sanitary System:** Provide a plumbing floor plan with complete plumbing layout and sizes of main and all branches for waste and vent piping, isometric layout for sanitary system when the number of fixture counts is 8 or more. Show point of connection, sizes, materials, and cleanouts.
- 5.7 Conditional - Water System:** Provide a plumbing floor plan with complete plumbing layout and sizes of main water piping and all branches. Show materials, meters, backflow prevention, point of connection.
- 5.8 Recommended - Condensate Drains:** Show condensate drains, pipe sizes, and condensate receptors.
- 5.9 Conditional - Kitchen Hoods:** When a commercial kitchen hood is included, provide the dimensions of the kitchen hood(s), hood elevation, material, and hood calculations. For Type I kitchen hoods, fire suppression system plans will be required but can be deferred.
- 5.10 Recommended - Kitchen & Fume Hood Exhausts:** Provide roof and plot plans showing required clearances for new or relocated kitchen and fume hood exhausts for commercial projects.

6. ELECTRICAL PLANS

Electrical plans shall include the following information.

- 6.1 **Responsible Charge:** Electrical plans and calculations shall be stamped and signed in accordance with the California Business and Professional Code. The electrical plans and calculations shall be signed by a licensed electrical engineer. An architect or civil engineer can sign the Title 24 energy compliance as the responsible designer of the electrical system. An electrical contractor can sign and stamp the electrical plans and calculations and/or Title 24 energy compliance for the system only if he/she is responsible for both the design and installation of the system.
- 6.2 **Power Plans:** Provide power plans showing location of all equipment and devices such as switchgear, panel boards, transformers, etc.
- 6.3 **Single Line Diagram:** Show a single line diagram representative of new or modified electrical distribution equipment.
- 6.4 **Electrical Load Calculations:** Provide electrical load calculations identifying existing electrical loads that are being modified and/or all new loads.
- 6.5 **Conditional - Title 24 Documentation:** For new lighting or when fixtures are relocated or changed in an existing lighting system, provide Title 24 energy lighting computation documents.
- 6.6 **Conditional - Electrical Site Plan:** For new construction, provide an electrical site plan showing the location of electrical metering and point of connection to utility.
- 6.7 **Conditional - Lighting Layout Plan:** For new or relocated lighting fixtures, provide a lighting layout plan.
- 6.8 **Conditional –Solar PV Manufacturers’ Electrical Data Sheets:** If proposing (PV) systems, provide specification of the PV modules and the inverter, showing all electrical information. Required Solar Photovoltaic Systems may be deferred.
- 6.9 **Conditional – Solar PV Systems:** When proposing solar PV system, provide a building layout plan indicating location of roof-mounted photovoltaic array. If the photovoltaic system was preapproved through a master plan, provide a copy of approved plans.
- 6.10 **Recommended - Electrical Room Details:** Provide ¼ inch minimum scale details of all electrical rooms showing all equipment.

7. CALIFORNIA ENERGY DOCUMENTATION

Energy documentation is required to indicate compliance with the California Energy Commission regulations.

- 7.1 Energy compliance forms are required to appear on the plans and must be signed by a licensed design professional per California Business and Professions Code.
- 7.2 When using Performance approach, submit a complete performance package using the most current version of California Energy Commission (CEC) approved computer program.
- 7.3 If your project scope includes HERS measures, documents must be completed through a HERS Provider's registry.
- 7.4 For all new construction projects with solar PV requirements, the solar PV plans shall be included with the building permit package. The solar PV plans will not be allowed to be submitted as deferred submittal.

8. STRUCTURAL CALCULATIONS

Required for new buildings and structures and for modifications to existing buildings and structures.

- 8.1 **Responsible Charge:** First sheet of calculations shall include the name, stamp, and signature of the California licensed Civil or Structural engineer or architect who prepared the construction plans and/or is responsible for the calculations.
- 8.2 **Design Loads:** Tabulate and itemize, on the first sheet of the calculations, the design loads used on the project. These loads will include dead loads, live loads, seismic and wind lateral loads. Show summary of assumptions made in the engineering design. Make a reference to the project's Geotechnical Investigation Report by specifying the firm name, report and date of the report.
- 8.3 **Construction Details:** All construction details shown in the structural calculations must be on the plans and cross referenced to applicable locations on the roof, floor or foundation plans.
- 8.4 **Computer Generated Calculations:** All computer-generated structural calculations must be based upon the governing building codes. Provide documentation showing compliance with this requirement that

shows the programming logic of computer-generated or computer calculated structural calculations. There are several standardized recognized and accepted programs that may not need this documentation to be presented at submittal.

9. Conditional - TRUSS PLANS AND CALCULATIONS

When prefabricated trusses are proposed, plans must be accompanied by truss calculations and details and must meet the following submittal requirements.

- 9.1 **Plans:** The framing plan for the roof or floor shall include a complete layout of the trusses with the identification of the trusses. Name and address of the manufacturer of trusses must be shown on truss framing plan. Truss framing plan and each sheet of the truss details shall be stamped and signed by the California registered civil or structural engineer in responsible charge of design of trusses.
- 9.2 **Details:** Shear transfer details compatible with the truss system must be shown on the plans.
- 9.3 **Design Loads:** A summary of the loading criteria for the design of the trusses must be shown on the plans.
- 9.4 **Truss Calculation:** Provide truss calculations, indicating loading criteria and member sizes. The first page of truss calculations and each page showing truss details and specifications shall be stamped and signed by the California registered civil or structural engineer in responsible charge of design trusses.
- 9.5 **Responsible Charge:** Each sheet of the truss plans and details must be stamped and signed by the California registered civil or structural engineer in responsible charge of design of trusses.
- 9.6 **Identification:** Each truss shall be identified with a truss identification number which is referenced on floor or roof framing plans.
- 9.7 **Design Loads:** The specified dead, live and seismic or wind lateral loads used in the design must be comparable to the design loads assumed in the engineering calculations of the building.
- 9.8 **Loads:** Any special loading conditions on trusses such as concentrated drag or chord loads must be shown on the plans.

10. Conditional – GEOTECHNICAL REPORT

A geotechnical investigation report shall be submitted for new residential buildings, locations in hillside areas, locations with questionable soil characteristics, expansive soil, earthquake fault zones, liquefaction zones, landslide zones, or as required by the Building Official.

- 10.1 **Project and Site Specific:** The Geotechnical Investigation Report must be specific to the proposed project and project site.
- 10.2 **Responsible Charge:** Geotechnical Investigation Report and other geotechnical documents must be stamped and signed by appropriately licensed professionals as required by State law.
- 10.3 **Date:** Geotechnical Investigation Reports shall not be more than two years old unless accompanied by an addendum geotechnical investigation report or update letter less than two years old that states the finding, conclusions, and recommendations remain valid for the proposed project.

11. CIVIL PACKAGE (Grading plans are required to be submitted under separate grading permit)

Generally, civil engineering documents are required when the project has earthwork quantities of 50 cubic yards or more or as dictated by the project's conditions of approval if an entitlement is involved. Some projects may be different, but civil packages for new housing projects typically consist of a grading plan, geotechnical report, hydrology report, and stormwater pollution prevention plan (SWPPP)/erosion control plan. All civil documents shall be submitted separately under a grading permit. Civil documents should be included along with the building plans when submitting for building permit as for referenced only.

The following are civil documents that are typically required.

- 11.1 **Grading Plan:** Grading plans shall be required when a project has earthwork quantities of 50 cubic feet or more or when a project has new building footprint in excess of 2000 square feet or more. Grading plans must be designed by a licensed civil engineer.
- 11.2 **Title Report:** Title report shall be submitted to verify all easements within the property. Easements

must be shown on the grading plan. Title reports can be obtained by a title company.

- 11.3 Geotechnical Investigation Report:** A geotechnical investigation report is required to be submitted along with the grading plan. For any geotechnical investigation report that is a year old or older, the soils engineer must submit a letter of update stating that they have reviewed the grading plan and that the plan is in conformance.
- 11.4 Hydrology-Hydraulics Report:** Report is also known as a drainage study. Report must compare the drainage conditions between the existing conditions and the proposed conditions.
- 11.5 Stormwater Pollution Prevention Plan (SWPPP):** Also known as an erosion control plan, this plan shows how stormwater will be mitigated at the construction site. Please note that for any project that is over 1 acre, there shall be a separate submittal to the state for review.
- 11.6 Water Plan:** Water plans may be required if property will have an increase in density or if dictated in the project's conditions of approval. Engineering and Water Division will review the plan for conformance.
- 11.7 Sewer Plan:** Sewer plans may be required if property will have multiple units, if existing sewer main does not reach the property, or dictated in the project's conditions of approval.

12. Conditional – OTHER REQUIREMENTS

When the proposed work is new construction or substantial improvement in a Special Flood Hazard Area (SFHA), the project shall comply with the Santa Clara Flood Damage Prevention Codes

12.1 Flood Plain Requirements:

When the proposed work is new construction or substantial improvement in a Special Flood Hazard Area (SFHA), the project shall comply with the Santa Clara Flood Damage Prevention Codes

- **Drawings:** The projects drawings shall be designed to comply with the City's floodplain ordinance and building/residential code requirements.
- **Flood Elevation Certificates:** A pre-construction Elevation Certificate (EC) shall be submitted to the City for review and approval prior to permit issuance. The information shown in the EC shall be reflected on the construction drawings. A post construction EC shall be submitted for review and approval prior to the building permit can be finalized.
- **Other Flood Certificates:** For project with engineered flood opening, the pre- and post-construction engineered flood opening certificate shall be submitted to the City for review and approval.

12.2 Addressing:

Submit to the Santa Clara Building Division, 2 copies of an addressing diagram request, to be prepared by a licensed architect or engineer.

- The addressing diagram(s) shall conform to Santa Clara City Manager Directive #5; Street Name and Building Number Changes, and Santa Clara Building Division Address Policy For Residential and Commercial Developments.
- The addressing diagram(s) shall include all proposed streets and all building floor plans. They shall indicate all unit numbers to be based off established streets, not alleys nor access-ways to garages.
- Per City policy, existing site addresses typically are retired. Also, any building or structure that is demolished shall have its address retired and a new address/s shall be issued for the project.

12.3 School District Certificate of Compliance

A School District Certificate of Compliance is required for new dwellings, additions of living space, and conversions to living space. The certificate is acquired directly from the appropriate school district office. Associated fees are paid directly to the school district. It is recommended that the school certificate is acquired after the plans have been reviewed and approved and not before. The certificate must be provided to the Building Division prior to issuance of the permit.