I. STRUCTURAL FRAMING

A. Systems over which tile or stone will be installed shall be in conformance with the International Residential Code (IRC) for residential applications, the International Building Code (IBC) for commercial applications, or applicable building codes.
   1. Stud spacing not to exceed 16" (400mm) on center with lateral bracing and battens. Joist sizing/construction must meet local codes and APA standards.
   2. The actual weight of materials and construction assemblies, including concentrated dead loads of fixed service and other equipment, shall be utilized as prescribed by state and local building codes to estimate dead loads for the purpose of structural design.
   3. The minimum uniformly distributed live load and minimum concentrated live loads, wherever such loads shall occur, shall be provided for as prescribed by state and local building codes.
   4. Lateral and other bracing must be constructed as prescribed by code and/or engineer to achieve required deflection values.

II. SHEATHING

A. 5/8" (15 mm) - minimum thickness for exterior glue plywood panels
   1. Minimum acceptable exterior glue plywood grades:
   2. Installation
      a. Face grain across supports
      b. Panel continuous over two or more spans – stagger panels (offset sheets in 4 foot staggered increments)
      c. End joints must occur over framing members (battens)
      d. Allow 1/8" (3mm) space between panel ends and 1/8" (3mm) between panel edges
      e. Fastening:
         i. 6" o.c. (150mm) along ends and battens
         ii. 8" o.c. (200mm) along intermediate supports
         iii. Screwed in place with galvanized fasteners able to support the weight of the entire installation system including the stone.
         iv. Glue sheathing to stud members (with construction adhesive) – (if wood framing)

III. LIMITATIONS

A. Plywood is not a suitable substrate where exposed to excessive moisture or humidity (e.g.; steam rooms, showers, Roman tubs, pools, fountains, spas, etc) or for exterior installations.
B. Fire retardant, chemically or preservative treated plywood, interior glue plywood, Masonite®, hardwood, strip wood, “yellow pitch pine” plywood, composite panels, luan, wafer board, particleboard, oriented strand board/OSB, or similar engineered or reconstructed wood panels are not suitable substrates for the direct adhesive installation of tile, stone or brick.

Consult LATICRETE product data sheets for specific installation instructions and ES-W311 at www.laticrete.com/ag.