



Select Cast Series™ - Wall & Pier Cap Specifications

1. All of the following specifications are made assuming that all StoneTransitions™ - Select Cast Series™ wall and pier cap products have been manufactured by NV Cast Stone LLC. utilizing their established level of strength, dimensional and finish consistency.
2. Physical Mix Design Properties
 - a. CURED PRODUCT WEIGHT: 108 per Cu' unless otherwise noted.
 - b. ABSORPTION: 13.5% maximum, tested per cold water method-ASTM C-1195
 - c. COMPRESSIVE STRENGTH: minimum 3500-psi strength, at 28-days cure [actual avg. \approx 4200-psi] tested per ASTM C-1194.
 - d. BENDING MODULUS: calculated per ACI reinforced Concrete where $A_s = A_g$ for tension, in lieu of product tests per ASTM C880 Standard Flexure tests [loads at quarter-points], or ASTM C947 Thin Section GFRC Flexure tests [1/3-point loads].
 - e. RUPTURE MODULUS [Cracking]: In lieu of specific finished product ASTM C99 Modulus of Rupture test, that value shall be taken as $[F_R] = (7.5[f_c]^{3/4}) = 500$ psi., per ACI procedure for plain concrete.
3. Raw Materials
 - a. CEMENT: per ASTM Standard C150, et seq. Type I White or Type III Colton Black for its special color mixes; Type I or II gray cement for typical color mixes.
 - b. AGGREGATE QUALITY: pertinent sections of ASTM Standard C33, et seq.
 - c. AGGREGATE SIZE: fine sand and plaster's sand, full grade mix with Sieve sizes No. 16 to No.100 typical, to Pan Fines [#140 & #200 minimum size passing].
 - d. INTEGRAL PIGMENTS: shall conform to per the ASTM Standard C979, et seq.
 - e. ADMIXTURE: Generally as accepted by ASTM C-494, et seq.
 - f. WATER: potable, per ACI 318R-99, et seq., Sect. 3.4.
4. Color
 - a. Product must match color and texture of the Approved Sample when viewed in direct sunlight, at distance of not less the 10 feet [3 meters].
 - b. CIELAB standard acceptable color variation 2% hue; 5% lightness for chroma and hue combined.
5. Dimensional Tolerances
 - a. For all dimensions up to 20 inches, linear dimensions shall be as drawn [+/-1/8"].
 - b. For all dimensions up to 20 inches, Linear dimensions shall be as drawn [+/-1/8"] plus 1/360 of the length in excess of 20 inches
 - c. Twist and Deflection shall not exceed 1.5 degrees per 12" of linear measurement.
6. Curing and Packaging
 - a. All Cast Stone components must be warm air cured minimum 48 hours and prior to packaging and shipment.
 - b. All components to be securely palletized and completely covered made weather proof and dust proofed to prevent staining from chafing in shipment. Only approved water protect ant boxes that allow air circulation are allowed for Optional packing.
 - c. Site Storage of components shall be off ground, under cover, in a dry location.
7. Quality Assurance
 - a. Installer Qualifications: engage an installer with a demonstrable five-year record of masonry cladding and ornamentation and whose crew is similarly experienced and adequate to install the job properly and in a timely workmanlike manner.
8. Installation
 - a. Mortar and Field Grout shall be Type S or Type N Portland cement mortar in accordance with ASTM C270 Standard Specification for Unit Masonry. Color is to match or complement the selected cap product.
 - b. Cap and Pier materials should be free of dust, debris or other that would affect bond strength.
 - c. Setting walls or other shall be free of dust, debris or other that may affect bond strength.
9. Cleaning
 - a. Please refer to our cleaning specifications section.

StoneTransitions™ and Select Cast Series™ products are manufactured by NV Cast Stone LLC.