

GENERAL NOTES - PRECAST CONCRETE

Materials:

1. All precast modules shall be manufactured with class PC concrete according to Section 504, Article 1042.02, Article 1042.03 and the following requirements:
 - a. Lightweight coarse aggregates according to ASTM C330 shall be used such that the maximum cured density shall be 120 lbs./cu. ft. (ASTM C567).
 - b. The minimum 28-day compressive strength shall be 5,000 psi.
2. Reinforcing steel shall be according to Article 1006.10(a)(2). Welded steel wire fabric shall be according to Article 1006.10(b)(1).
3. Steel inserts shall be galvanized according to AASHTO M 232 or AASHTO M11 as applicable and have the following safe working load capacities:
 - a. F41 Wingwall Anchor, 1" diameter x 8":
 - i. Tension: 10,711 lbs.
 - ii. Shear: 5,400 lbs.
 - b. F-42 Loop Ferrule Insert, 3/4" diameter:
 - i. Tension: 2,200 lbs.
 - ii. Shear: 2,200 lbs.
 - c. F-57 Expanded Coil Ferrule Insert, 3/4" diameter:
 - i. Tension: 4,250 lbs.
 - ii. Shear: 2,450 lbs.
 - d. F-62 Flared Thin-Slab Ferrule Insert, 3/4" diameter bolt x 3 5/8" high:
 - i. Tension: 3,300 lbs.
 - ii. Shear: 3,300 lbs.
 - e. D-108-A Headed Dowel Bar Insert, 3/4" diameter to #5 bar x 9" long:
 - i. Tension: 6,975 lbs.
 - ii. Shear: 4,440 lbs.

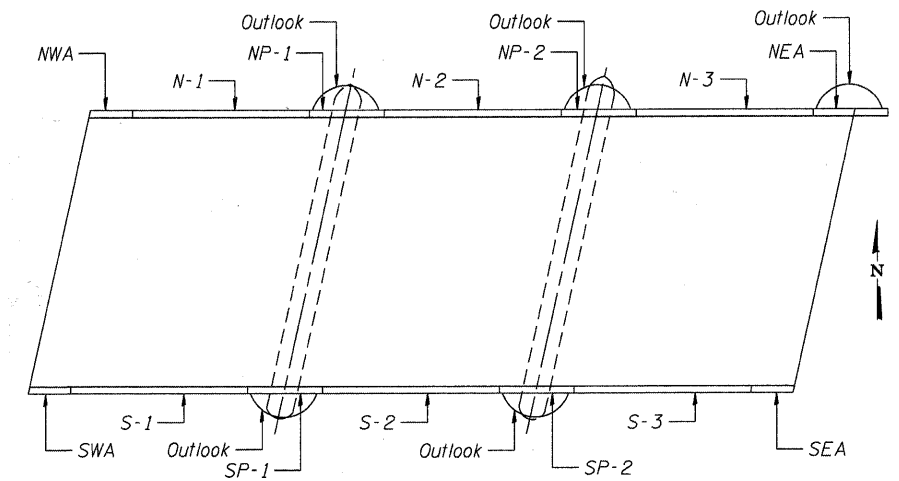
Note that these items are manufactured by Dayton/Superior. Alternates shall be submitted to the Engineer for review and approval and must meet the capacities shown above.

4. Bearing pads, where specified, between precast concrete elements shall be plain, unreinforced neoprene with a minimum thickness of 1/2" and a minimum durometer hardness of 50.
5. All precast fascia panels and outlooks shall be sealed with Canyon Tone Clear sealer by United Coatings or an approved equal. See specification for more information.
6. Steel plates shall conform to AASHTO M270M Grade 50. All steel plates shall be hot dip galvanized in accordance with AASHTO M-111 and ASTM A-385. Plate washers shall be 5"x5"x 1/2" Thk. with 7/8" diameter holes centered on the plate.

7. Non-shrink grout shall be according to ASTM C-1107 and have a minimum compressive strength of 5,000 psi.
8. All threaded rods, nuts and connection bolts shall be Type 304 Stainless Steel.

Fabrication:

1. All reinforcement shall have a minimum of 1 1/2" of clear cover.
2. Formliners shall have a maximum relief of 1/8" and be from or equivalent to the following manufacturers and patterns:
 - a. Custom Rock pattern T315 (Heavy Sandblast)
 - b. Fitzgerald pattern 16991 (Medium Sandblast)
 - c. Greenstreak pattern 348 (Medium Sandblast)
3. Prepare all precast surfaces in accordance with sealer manufacturer's recommendations. At a minimum, all surfaces shall receive a brush-blast cleaning and water rinse.
4. The reinforcement as shown is for in-place structural adequacy only. The precaster shall be responsible for any other reinforcement required for shipping and handling as well as inserts required for lifting.



PRECAST PIECE LOCATION PLAN

COMPANY NAME: HRGreen
 PROJECT: Precast
 CLIENT: City of Aurora
 DATE PLOTTED: 7/26/2011 11:05:08 AM
 FILE NAME: 8620412-E-PreCast.dgn
 PLOT DRIVER: pdfLdt
 PEN TABLE: Struct 22-34.tbl



USER NAME = whood	DESIGNED - SSM	REVISED -
	CHECKED - RGD	REVISED -
PLOT SCALE = N.T.S.	DRAWN - WJH	REVISED -
PLOT DATE = 7/26/2011	CHECKED -	REVISED -

**CITY OF AURORA
DOWNER PLACE OVER THE EAST BRANCH
OF THE FOX RIVER**

**PRECAST CONCRETE FASCIA PANEL - NOTES
STRUCTURE NO. 045-6005**

SHEET NO. SE-19 OF SE-45 SHEETS

F.A. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
	07-00264-00-BR	KANE	164	119
CONTRACT NO.			63620	
ILLINOIS FED. AID PROJECT				