

GENERAL NOTES:

1. FABRICATION SHALL CONFORM TO VAOT STANDARD SPECIFICATIONS, SECTION 540, PRECAST CONCRETE STRUCTURES.
2. CONCRETE SHALL HAVE A MINIMUM COMPRESSIVE STRENGTH OF 7,500 PSI AT 28 DAYS OF AGE.
3. AIR CONTENT SHALL BE 5.0 – 9.0%.
4. POSITION OF REINFORCEMENT TO BE MAINTAINED WITH THERMOPLASTIC CHAIRS OR PLASTIC TIPPED SLAB BOLSTERS. CHAIRS, TIE WIRES, AND OTHER DEVICES USED TO SUPPORT, POSITION, OR FASTEN EPOXY COATED REINFORCEMENT SHALL BE MADE OF OR COATED WITH DIELECTRIC MATERIAL.
5. SEE CURING METHOD THIS SHEET FOR CURING PROCEDURE DESCRIPTION.
6. SEE TYPICAL LEGEND THIS SHEET FOR IDENTIFICATION INFORMATION.
7. CONCRETE REPAIR MATERIAL (IF USED) TO BE IN ACCORDANCE WITH VAOT STANDARD SPECIFICATION SECTION 580.
8. REINFORCEMENT STEEL SHALL MEET VAOT STANDARD SPECIFICATION SUBSECTION 713.01(a), ASTM A615 GRADE 75. REBAR SAMPLES TO BE PROVIDED FOR TESTING IN ACCORDANCE WITH SPEC.
9. SEE DIMENSIONAL TOLERANCES THIS SHEET.

DESIGN NOTES:

1. CONCRETE STRENGTH TO BE 7,500 PSI AT 28 DAYS FOR 3-SIDED UNITS.
2. MIN. LIFTING (STRIPPING) STRENGTH = 3,500 PSI U.N.O.

DIMENSIONAL TOLERANCES:

1. SLAB THICKNESS: $-\frac{1}{4}$ ", $+\frac{1}{2}$ "
2. REINFORCEMENT COVER: -0 , $+\frac{1}{4}$ " END COVER LONGITUDINAL BARS ± 1 "
3. REINFORCEMENT SPACING: ± 2 " NON-CUMULATIVE
4. LOCATION OF PROJECTING REINFORCEMENT: $\pm \frac{1}{4}$ "
5. SPAN: ± 1 "
6. RISE: ± 1 "
7. HAUNCH: $\pm \frac{1}{4}$ " OF DESIGN DIMENSIONS
8. LAYING LENGTH OF TWO ADJACENT UNITS SHALL NOT VARY BY MORE THAN $\frac{5}{8}$ " MAX. IN ANY SECTION, EXCEPT WHERE BEVELED ENDS FOR LAYING OF CURVES ARE SPECIFIED.
9. LENGTH OF SECTION: UNDER RUN IN ANY SECTION SHALL NOT BE MORE THAN $\frac{1}{2}$ " MAX.
10. LOCAL SMOOTHNESS OF ANY SURFACE: $\frac{3}{4}$ " PER 10FT.
11. LOCATION OF INSERTS: $\pm \frac{1}{2}$ "
12. VARIATION FROM SPECIFIED END SQUARENESS OR SKEW: $\pm \frac{1}{4}$ "
13. LOCATION OF HANDLING DEVICES: ± 3 "

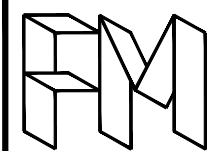
TESTING/INSPECTION: VAOT

SPECIAL NOTE:

1. THIS DRAWING IS TO BE USED IN CONJUNCTION WITH THE APPROVED DRAWINGS FOR NYSDOT PROJECT D900054 STRUCTURE N20 (FM PROJECT NUMBER 24695.) THESE DRAWINGS HAVE BEEN PROVIDED TO VAOT. FMC WILL PRODUCE (13) MK# N3 UNITS FROM THESE DRAWINGS.

THE FORT MILLER CO., INC.
 F.M. JOB#: 25105 PIECE ID:
 DATE OF MANUFACTURE:
 VT 110 B-15

TYPICAL LEGEND
 MARKED ON INSIDE OF FRAME



THE FORT MILLER Co., Inc.
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CURING METHOD (NON-ACCELERATED CURE / SATURATED COVER):

1. FOR EACH PRODUCTION DAY, CURING TEMPERATURES SHALL BE CONTINUOUSLY MONITORED THROUGH THE USE OF A SINGLE RECORDING TEMPERATURE PROBE. BOTH INTERNAL AND EXTERNAL CONCRETE TEMPERATURES SHALL BE MONITORED. THE CONCRETE SHALL BE COVERED WITH SATURATED BURLAP (PER THE FOLLOWING) AS SOON AS POSSIBLE TO PREVENT MARRING OF CONCRETE SURFACE AND PREMATURE DRYING OF CONCRETE SURFACE. THE CONCRETE SHALL BE RAISED TO AN INTERNAL TEMPERATURE OF NOT LESS THAN 68°F WITHIN THE FIRST 12 HOURS OF THE CURING PERIOD, AND SHALL BE MAINTAINED AT OR ABOVE 68°F FOR THE REMAINDER OF THE CURING PERIOD.
2. THE FOLLOWING STEPS SHALL BE FOLLOWED FOR EACH UNIT:
 - 2.1. COVER EACH UNIT WITH (2) LAYERS OF HEAVY, WATER-SATURATED BURLAP (OR OTHER MATERIAL ACCEPTABLE TO VAOT). THE BURLAP SHALL BE KEPT SATURATED AND THE CONCRETE INTERNAL TEMPERATURE NOT ALLOWED TO FALL BELOW 68°F.
 - 2.2. COVER THE SATURATED BURLAP WITH POLYETHYLENE SHEETING.
 - 2.3. IF REQUIRED, PLACE ELECTRIC HEATING BLANKETS OR CONCRETE INSULATING BLANKETS ON TOP OF THE POLYETHYLENE SHEETING.
3. THESE CONDITIONS SHALL BE MAINTAINED UNTIL 80% OF 28 DAY STRENGTH (6,000 PSI) AND 72 HRS HAS ELAPSED FROM TIME OF CASTING.
4. WINTER/SPRING CURING: ALL CONCRETE PLACEMENT WILL TAKE PLACE IN HEATED PRODUCTION BUILDINGS WHERE AMBIENT AIR TEMPERATURES ARE ABOVE 50°F. PRECAST ELEMENTS THAT ARE EXPOSED TO COLD WEATHER CONDITIONS AS DEFINED IN SECTION 540.07(i) MUST BE ALLOWED TO COOL AND DRY IN AN ENVIRONMENT OF AT LEAST 40°F FOR 24 HOURS PRIOR TO EXPOSURE TO COLD WEATHER CONDITONS.

TESTING:

A. DEFINITIONS:

- a. LOT – 25 CY OR FRACTION THERE OF, PER PRODUCTION DAY.
- b. REQUIRED CONCRETE TESTING:
 - 1) ASTM C172/AASHTO R60 SAMPLING OF FRESH CONCRETE
 - 2) ASTM C231/AASHTO T152 – PERCENT AIR CONTENT
 - 3) ASTM C138 – UNIT WEIGHT/YIELD
 - 4) ASTM C1611/ASTM C143 – SPREAD/SLUMP
 - 5) ASTM C1064/AASHTO T309– TEMPERATURE
 - 6) ASTM C39/AASHTO T22 COMPRESSION TESTING
- i. REQUIRED QUANTITY OF 4X8 CYLINDERS, 8 MIN PER LOT.
- ii. CYLINDERS CURED PER AASHTO T23, 10.2, FIELD CURING,

B. FROM THE CONCRETE REQUIRED TO MANUFACTURE A LOT, (25 CY OR FRACTION THERE OF) THE REQUIRED SAMPLE SIZE SHALL BE OBTAINED TO BE TESTED PER THE ITEMS LISTED IN (A.b, 1 THRU 6 ABOVE).

C. COMPRESSIVE STRENGTH SHALL BE DETERMINED FROM CONCRETE TEST CYLINDERS MADE IN CONFORMANCE WITH AASHTO T23. ALL CYLINDERS SHALL BE TESTED IN CONFORMANCE WITH AASHTO T22 ON A CERTIFIED CALIBRATED TESTING MACHINE. THE FABRICATION AND TESTING OF CYLINDERS SHALL BE SUBJECT TO INSPECTION BY THE OWNER’S REPRESENTATIVE. CYLINDERS TO BE 4”Ø x 8” HIGH FORMED WITH STEEL OR PLASTIC MOLDS (CARDBOARD NOT ACCEPTABLE).

D. THE PRECASTER SHALL CAST A SUFFICIENT NUMBER OF CONCRETE TEST CYLINDERS TO FULFILL THE CONCRETE STRENGTH TEST REQUIREMENTS AS STATED BELOW.

1. MINIMUM LIFTING STRENGTH:

TWO (2) CYLINDERS REPRESENTING A LOT, SHALL BE TESTED IN IMMEDIATE SUCCESSION TO VERIFY LIFTING STRENGTH. THE AVERAGE STRENGTH OF THE TWO CYLINDERS SHALL BE EQUAL TO OR GREATER THAN THE REQUIRED LIFTING STRENGTH. NO CYLINDER SHALL BE LESS THAN 500 PSI OF THE REQUIRED LIFTING STRENGTH.

2. 28 DAY COMPRESSIVE STRENGTH VERIFICATION PRIOR TO OR AT 28 DAYS OF AGE:

COMPRESSION TESTING IS TYPICALLY PERFORMED AT (3), (7), AND 28 DAYS OF AGE, OR MAY BE TESTED AT A DATE PRIOR TO 28 DAYS OF AGE. WHEN TWO (2) CYLINDERS, REPRESENTING A LOT ARE TESTED IN IMMEDIATE SUCCESSION, AND THE AVERAGE STRENGTH OF THE CYLINDERS IS EQUAL TO OR GREATER THAN THE REQUIRED 28-DAY STRENGTH, WITH NO INDIVIDUAL CYLINDER TEST LESS THAN 500 PSI OF THE REQUIRED 28-DAY STRENGTH, THE SHIPPING STRENGTH REQUIREMENT FOR THE LOT REPRESENTED SHALL BE CONSIDERED SATISFIED. NO FURTHER COMPRESSION STRENGTH TESTING SHALL BE REQUIRED.

SHIP LOOSE MATERIALS:

1. (4) 20 TON LIFTING EYES (TO BE RETURNED) – ITEM #: 5340
 2. (2) 21 TON COFFEE POT LIFTING DEVICES (TO BE RETURNED) – ITEM #: 5362
- NOTE: CONTRACTOR TO HAVE SHIPLOOSE ITEMS MARKED "TO BE RETURNED"
 SENT BACK TO F.M. VIA COMMON CARRIER

				VT 110 B-15			
				WASHINGTON, VT 3-SIDED STRUCTURE			
				TOWN OF WASHINGTON, ORANGE COUNTY, VT			
				PRODUCTION NOTE SHEET			CONTRACTOR: VAOT – OPERATIONS 1 NATIONAL LIFE DRIVE MONTPELIER VT, 05633
				ENGINEER: VAOT			
DRAWN PJR	DATE 10/31/23	CHK'D TMT	SHEET 1	SCALE NONE	F.M. JOB No. 25105	DWG. T1	
REVISIONS							
NO.	DATE	BY	DESCRIPTION				