### PROPOSED SYMBOLS

#### EXISTING SYMBOLS

<table>
<thead>
<tr>
<th>Symbol</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>DRA</td>
<td>DRAINAGE</td>
</tr>
<tr>
<td>R/W-DA</td>
<td>RIGHT-OF-WAY</td>
</tr>
<tr>
<td>PROPOSED R/W &amp; DENIAL OF ACCESS</td>
<td></td>
</tr>
<tr>
<td>ENERGY DISSIPATOR</td>
<td></td>
</tr>
<tr>
<td>SIGNAL CONDUIT</td>
<td></td>
</tr>
<tr>
<td>MANHOLE - UNDETERMINED OWNER</td>
<td></td>
</tr>
<tr>
<td>ORDINARY HIGH WATER BOUNDARY</td>
<td></td>
</tr>
<tr>
<td>LATERAL OFFSET</td>
<td></td>
</tr>
<tr>
<td>ABANDON BY OTHERS</td>
<td></td>
</tr>
</tbody>
</table>

#### PROPOSED RIGHT-OF-WAY SYMBOLS

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<tr>
<td>PROPOSED R/W &amp; DENIAL OF ACCESS</td>
<td></td>
</tr>
<tr>
<td>PROPOSED PERMANENT EASEMENT</td>
<td></td>
</tr>
<tr>
<td>PROPOSED RIGHT-OF-WAY MONUMENT</td>
<td></td>
</tr>
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#### PROPOSED CONSTRUCTION SYMBOLS

<table>
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</thead>
<tbody>
<tr>
<td>CONCRETE SAFETY BARRIER - PERMANENT</td>
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</tr>
</tbody>
</table>

#### CONTENTS

- **DELAWARE STATEWIDE HOPPER RACKS FY18-20**
- **100+00**
- **NEW CASTLE COUNTY**
- **T201780103**
- **DESIGNED BY:**
- **BRIDGE NO.:**
- **WJD**
- **CSR**
- **N/A**

#### LEGEND

- **LANDSCAPING**
  - **UNOFFICIAL**
  - **WEBSITE**
  - **COPY**
- **NOT TO SCALE**
- **STATEWIDE HOPPER RACKS FY18-20**
- **CONTRACT**
- **10**
- **2**

#### MANMADE ROADSIDE FEATURES

- **UTILITY**
  - **CABLE TV DISTRIBUTION BOX**
  - **SOIL BORING LOCATION**
  - **SILT FENCE**
  - **REMOVE BY TRAFFIC CONTRACTOR**
  - **UNDERDRAIN CLEANOUT**
  - **UNDERDRAIN OUTLET PIPE**
  - **RIPRAP**
  - **REMOVE BY OTHERS**
  - **RELOCATE BY CONTRACTOR**
- **MONUMENT - RIGHT-OF-WAY**
  - **MANHOLE**
  - **JUNCTION BOX**
  - **GUARDRAIL**
  - **FILTRATION STRUCTURE**
  - **FILL WITH FLOWABLE FILL**
- **CURB RAMP / TYPE**
  - **CURB RAMP / TYPE**
  - **CURB OPENING**
  - **CONVERT TO DRAINAGE MANHOLE**
  - **CURB OR CURB & GUTTER**
- **CONSTRUCTION SAFETY FENCE**
  - **DO NOT DISTURB**
  - **ELECTRIC METER**
  - **ELECTRIC MANHOLE**
- **CONSTRUCTION SAFETY FENCE**
  - **FLARED END SECTION**
  - **FENCE - METAL**
  - **DITCH**
  - **DRAINAGE INLET**
- **CLEAR ZONE**
  - **CURB & GUTTER, TYPE 4**
  - **CURB & GUTTER, TYPE 3**
  - **CURB & GUTTER, TYPE 2**
  - **CURB & GUTTER, TYPE 1**
  - **CURB, TYPE 2**
  - **CURB, TYPE 1 & TYPE 3**
  - **BUTT JOINT**
  - **BRICK PATTERNED SURFACE**
  - **CONCRETE SAFETY BARRIER - PERMANENT**
  - **CONSTRUCTION**

#### NATURAL ROADSIDE FEATURES

- **DECIDUOUS TREE**
  - **SHRUBBERY**
  - **LANDSCAPE PLANTINGS**
  - **LANDSCAPING**

#### SURVEY CONTROL & MONUMENTATION

- **SURVEY CONTROL & MONUMENTATION**
  - **POINT OF INTERSECTING TANGENTS**
  - **SURVEY TRAVERSE POINT**
  - **SURVEY TIE POINT LOCATION**
  - **SURVEY BENCHMARK LOCATION**
  - **PROPERTY MARKER - IRON PIPE**
  - **PROPERTY MARKER - CONCRETE MON.**

#### PAINTING MARKINGS

- **PAVEMENT STRIPING**
  - **PAVEMENT MARKINGS**
  - **LUMINAIRE**
  - **CONDUIT JUNCTION WELL**
  - **ITMS CONDUIT**

#### GROUNDWORK

- **P.C.C. SIDEWALK - 6" (USE 8" DEPTH**
  - **P.C.C. SIDEWALK - 4"**
  - **RIPRAP**
  - **PIPE & DIRECTIONAL FLOW ARROW**
  - **TOPSOIL, SEED AND MULCH**
  - **PAVEMENT REMOVAL -**
  - **PAVEMENT PATCH**
  - **MANHOLE**
  - **LIMIT OF CONSTRUCTION**
  - **IMPACT ATTENUATOR**
  - **GUARDRAIL END TREATMENT, TYPE 2**
  - **GUARDRAIL END ANCHORAGE**
  - **GUARDRAIL, TYPE 2**
  - **GUARDRAIL, TYPE 1**
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#### CONSTRUCTION

- **CONCRETE SAFETY BARRIER - PERMANENT**
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  - **CONSTRUCTION**
FOUNDATIONS, EXCAVATION AND FILL

1. All excavation for foundations shall be performed in accordance with the site plan and in accordance with the approved shop drawings of the general contractor.

2. All fill material used to support the structure shall be clean, free from organic material, and compacted to at least 95% of their compactive effort. The compactive effort shall be determined by testing the material at a moisture content of optimum minus 2%, and at least 10% above their moisture content of optimum minus 2%.

3. All fill material placed shall be compacted in lifts not exceeding 12" in thickness and compacted to at least 95% of their compactive effort. The compactive effort shall be determined by testing the material at a moisture content of optimum minus 2%, and at least 10% above their moisture content of optimum minus 2%.

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DRAWING NOTES

1. CENTRAL AND CANAL DISTRICTS ONLY USE CHAIN FOR HOPPER SUSPENSION ATTACHMENT.

FOOTING SCHEDULE

MARKSIZETHICK. REINFORCING

NOTE

PRESUMPTIVE ALLOWABLE SOIL BEARING PRESSURE = 1500PSF, TO BE VERIFIED IN FIELD BY A GEOTECHNICAL ENGINEER PRIOR TO CASTING FOOTING CONCRETE.

PAD EYE & PULLY (TYP.)

STEEL CHAIN & HOOK

P1,F5 P1,F5 P1,F5

PAD EYE & PULLY (TYP.)

MARK HOIST BEAMS WITH "SWL 15,000 lbs" USING 6" LETTERS

PAINT HOIST BEAMS WITH "SWL 15,000 lbs" USING 6" LETTERS

TYPICAL ROOF FRAMING PLAN

AS SHOWN

STATEWIDE HOPPER RACKS FY18-20

6 WHEEL TRUCK

DEPARTMENT OF TRANSPORTATION

NEW CASTLE

DESIGNED BY: CR

CHECKED BY: DO

T201780103

AS SHOWN

B.O. STEEL

FINISH GRADE

W12x26

HSS8x8 TYP.

CONCRETE PEDESTAL

14'-0"

B.O. STEEL 14.00'

FINISH GRADE

±0.00'

HSS8x8 TYP.

CONCRETE PEDESTAL

STEEL CHAIN

& HOOK

FOUNDATION PLAN

PARTIAL REAR ELEVATION

PARTIAL FRONT ELEVATION

END ELEVATION

TYPICAL ROOF FRAMING PLAN

FOUNDATION PLAN

PARTIAL REAR ELEVATION

PARTIAL FRONT ELEVATION

END ELEVATION

TYPICAL ROOF FRAMING PLAN