ROYS REDWOODS OPEN SPACE PRESERVE
MARIN COUNTY
FINAL SCHEMATIC DESIGN MARCH 31, 2020

CONSULTANTS:

LANDSCAPE ARCHITECTURE:
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PROJECT LOCATION:

CLIENT:
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JON CAMPO, SENIOR NATURAL RESOURCES PLANNER
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(415) 473-2686

PROJECT LOCATION:

CONSULTANTS:

CONTRACTORS:

ABBREVIATIONS:

T-1 COVER SHEET
T-2 OVERVIEW
L-1.0 ACCESSIBLE LOOP
L-1.1 ACCESSIBLE PARKING AND ENTRY
L-1.2 ROAD EDGE STEPS
L-1.3 NORTH ENTRY
L-1.4 NATURE EXPLORATION AREA
L-2.0 CONSTRUCTION DETAILS
L-2.1 CONSTRUCTION DETAILS
L-2.2 CONSTRUCTION DETAILS
L-2.3 TRAIL FEATURES
L-2.4 TRAIL PROFILES
L-2.5 TRAIL PROFILES
S-1 FOOTBRIDGE PLANS
S-2 FOOTBRIDGE SHORT AND DETAILS
S-3 BOARDWALK PLANS
S-4 BOARDWALK SECTION AND DETAILS
S-5 BOARDWALK SECTION AND DETAILS
NOTES:
1. CHANNEL RESTORATION, REVEGETATION, AND COMPACTION MITIGATION MEASURES ARE COVERED ON SEPARATE RESTORATION PLANS PREPARED BY PRUNSKE CHATHAM, INC.
2. SALVAGE AND NATIVE PLANTS WITHIN THE FOOTPRINT OF IMPROVEMENTS. RESTORE DUFF TO ALL AREAS DISTURBED BY CONSTRUCTION. RE-PLANT SALVAGED NATIVE PLANTS WITHIN THE RESTORATION AREAS. SEE RESTORATION PLANS BY OTHERS FOR LOCATIONS.
3. REMOVE ALL TREES AND STUMPS REMOVED THAT CONFLICT WITH THE SITE IMPROVEMENTS. SEE RESTORATION PLANS FOR LOCATIONS.

LEGEND

PROPERTY BOUNDARY
(E) MAJOR CONTOUR
(M) MINOR CONTOUR
(E) EQUESTRIAN / ACCESS AND DISCOVERY TRAIL (FPT)
ACCESS AND DISCOVERY TRAIL (FPT)
PRIMARY TRAIL
SECONDARY TRAIL
DECOMMISSIONED TRAIL

SEE 1/2-1 FOR TRAIL TYPE DETAILS
NOTES:
1. Place logs around perimeter of nature exploration area as shown to delineate space and define edge.
2. Loose parts (shown dashed) are to be replenished over time.

- Loosely stacked sticks and branches for play
- Moveable log rounds of various sizes
- Placed log, typical
- (E) Tree, protect and preserve, typical
- (E) Log, typical
- Access and discovery trail
- Reposition (E) logs
- To Scramble
- Short loose planks
- Loose Sticks and Branches for play
- Access and discovery trail
WOOD GUARDRAIL ON FOOTBRIDGE

SECTION - TYPE 1
SECTION - TYPE 2

EDGE PROTECTION

1. 3X4 RECLAIMED REDWOOD CAP
2. 3X4 RECLAIMED REDWOOD RAIL
3. 3X4 RECLAIMED REDWOOD RAIL, TYP U.O.N
4. 3X4 RECLAIMED REDWOOD POST
5. 2.5 X 5 RECLAIMED REDWOOD RAIL
6. 1 3/4" CARRIAGE BOLT
7. RECLAIMED REDWOOD BOARDWALK BEAM
8. RECLAIMED REDWOOD DECKING AT POSTS
9. WOOD HALER
10. STEEL BRIDGE BEAMS
11. 3X6 RECLAIMED REDWOOD DECKING

3X8 RECLAIMED REDWOOD CAP
2X4 RECLAIMED REDWOOD RAIL
2X4 RECLAIMED REDWOOD RAIL, TYP U.O.N
3X6 RECLAIMED REDWOOD DECKING AT POSTS
2.5 X 5 RECLAIMED REDWOOD RAIL
1 3/4" CARRIAGE BOLT
RECLAIMED REDWOOD BOARDWALK BEAM
RECLAIMED REDWOOD DECKING AT POSTS
WOOD HALER
STEEL BRIDGE BEAMS
3X6 RECLAIMED REDWOOD DECKING
COMPACTED SURFACE
BOULDER, 12" - 30" DIAMETER
AGGREGATE BASE BACKFILL MATERIAL
REDWOOD OR BAY LOG, 18" - 42"Ø
REBAR SPIKE, #5 x 48" W/ FLAT CAP 3' O.C.; WHERE DOWNHILL SLOPE FOR LOG EDGING IS STEEPER THAN 2:1 SPACE AT 18" O.C.
FASCINE, (3-5) 2" - 5"Ø BUNDLED STICKS WOUND WITH BRAIDED JUTE TWINE
2" X 2" WOOD STAKE
8 X 8 TIMBER
DUFF
EXISTING GRADE
PROVIDE GAPS BETWEEN LOGS/BOULDERS AT TRAIL LOW POINTS AND AS REQUIRED TO PROVIDE POSITIVE DRAINAGE.
LAG EYE BOLT, STAINLESS STEEL, 1/2" X 8" FOR REBAR SPIKE
DOWNHILL SLOPE
REBAR SPIKE, #5 X 24" WITH FLAT CAP 3' O.C.

TRAIL TABLE

<table>
<thead>
<tr>
<th>TRAIL TYPE</th>
<th>MATERIAL</th>
<th>MAX WIDTH</th>
<th>MIN WIDTH</th>
<th>% SLOPE</th>
<th>MAX</th>
<th>MIN</th>
<th>% SLOPE</th>
<th>MAX</th>
<th>MIN</th>
<th>% SLOPE</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACCESS AND DISCOVERY</td>
<td>PARK, TRAIL OR SIMILAR</td>
<td>6'-0&quot;</td>
<td>4'-0&quot;</td>
<td>8% SLOPE</td>
<td>6' MIN</td>
<td>8' MIN</td>
<td></td>
<td></td>
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<tr>
<td>EQUESPIKE</td>
<td>PARK, TRAIL OR SIMILAR</td>
<td>6'-0&quot;</td>
<td>4'-0&quot;</td>
<td>15% SLOPE</td>
<td>12' MIN</td>
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<tr>
<td>PRIMARY TRAIL</td>
<td>C Nineteen</td>
<td>4'-0&quot;</td>
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EDGING CONDITIONS

1. COMPACTED SURFACE
2. BOULDER, 12" - 30" DIAMETER
3. AGGREGATE BASE BACKFILL MATERIAL
4. REDWOOD OR BAY LOG, 18" - 42"Ø
5. REBAR SPIKE, #5 x 48" W/ FLAT CAP 3' O.C.; WHERE DOWNHILL SLOPE FOR LOG EDGING IS STEEPER THAN 2:1 SPACE AT 18" O.C.
6. FASCINE, (3-5) 2" - 5"Ø BUNDLED STICKS WOUND WITH BRAIDED JUTE TWINE
7. 2" X 2" WOOD STAKE
8. 8 X 8 TIMBER
9. DUFF
10. EXISTING GRADE
11. PROVIDE GAPS BETWEEN LOGS/BOULDERS AT TRAIL LOW POINTS AND AS REQUIRED TO PROVIDE POSITIVE DRAINAGE.
12. LAG EYE BOLT, STAINLESS STEEL, 1/2" X 8" FOR REBAR SPIKE
13. DOWNHILL SLOPE
14. REBAR SPIKE, #5 X 24" WITH FLAT CAP 3' O.C.

ROYS REDWOODS OPEN SPACE PRESERVE
VISITOR ACCESS AND PUBLIC ENGAGEMENT MARCH 31, 2020
FINAL SCHEMATIC DESIGN

CONSTRUCTION DETAILS

OFFICE OF 18
7581
2
EDGING CONDITIONS

1. COMPACTED SURFACE
2. BOULDER, 12" - 30" DIAMETER
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TRAIL TYPES

1. ROCK WALL AT BASE OF SLOPE
2. FASCINE EDGING ON LEVEL GROUND
3. TIMBER EDGE ON LEVEL GROUND

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ROAD ENTRY STEPS

1. Redwood log, 8" - 20" Ø
2. Redwood plank, 3" x 10" - 3" x 24"
3. No. 5 rebar x 48", counter sink 2", space 24" min at top, angle 5° off vertical all directions as shown, min 12" for log
4. Coarse woody debris, 2-6" thick layer of twigs and branches placed naturally to protect forest from trampling, see plans for extents
5. Wood fastener

NOTES:
1. Ensure all elements are set free of movement/shaking.
2. Use rebar/fasteners to hold positions of elements not to stabilize elements.
3. Scary as necessary to provide roughened texture to walking surfaces.

PLANK ON LOG - PROFILE
PLANK ON LOG - SECTION

SCRAMBLE EDGING

SCRAMBLE ELEMENTS

LOG ROUND ON GRADE
LOG AS TREAD
LONGITUDINAL SECTION THROUGH BRIDGE (LOOKING WEST-DOWNSTREAM)

SECTION AT ABUTMENT - END OF BRIDGE BEAMS

SECTION AT ABUTMENT - THRU STONWORK

CUSTOM STEEL CAP AT TOP OF HELICALPILE
PLAN VIEW - BOARDWALK FOUNDATIONS AND MAIN BEAMS (VARIOUS CONFIGURATIONS SHOWN)

DESIGN LOADS:
This bridge has been designed for the following live loads:
Uniform: 80 psf (50 lbs/sq ft) 
Concentration: 250 lbs, 37.5 in. long

BOARDWALK BEAM SCHEDULE

<table>
<thead>
<tr>
<th>Beam</th>
<th>Max. Spn (Ft)</th>
<th>Spn (Ft)</th>
<th>Pro. Support</th>
<th>Pro. Column</th>
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<tbody>
<tr>
<td>6&quot; x 6&quot;</td>
<td>5'-0&quot;</td>
<td>4'-0&quot;</td>
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<td>4'-0&quot;</td>
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<tr>
<td>6&quot; x 6&quot;</td>
<td>5'-0&quot;</td>
<td>4'-0&quot;</td>
<td>5'-0&quot;</td>
<td>4'-0&quot;</td>
</tr>
<tr>
<td>4&quot; x 4&quot;</td>
<td>5'-0&quot;</td>
<td>4'-0&quot;</td>
<td>5'-0&quot;</td>
<td>4'-0&quot;</td>
</tr>
</tbody>
</table>

LEGEND:
1. Steel piling, concrete platform/cap for metal piling, foundation and referencing as shown on this sheet and rest, too 2500 psi concrete mix.
2. Heavy piling, concrete cap and support piles, other details or injection support, &c, as noted. These piling piles shall have 50 standard steel pipe sheet piles. The various piles shall be designed for self-stress balanced load, and these piles shall be placed in a rigid backfill of soil in order to avoid buckling or bending. The piling piles shall be marked out between the pile line and the pile line on the sheet, for further clarification, line on the sheet.
3. Galvanized piling, platform/cap for metal piling, foundation and referencing as shown on this sheet and rest, too 2500 psi concrete mix.
4. Wood boardwalk beams, the rectangular clear, referenced, face schedule.
5. Wood boardwalk beams, the rectangular clear, referenced, face schedule.
6. Wood boardwalk beams, the rectangular clear, referenced, face schedule.

PROJECT TITLE: ROYS REDWOODS OPEN SPACE PRESERVE VISITOR ACCESS AND PUBLIC ENGAGEMENT
SHEET TITLE: BOARDWALK PLANS
DESIGN PHASE: FINAL DRAFT SCHEMATIC DESIGN

SHEET SCALE: 1/10" = 1'-0"
DATE: MARCH 27, 2020
DRAWN BY: K.H.
CHECKED BY: ----
REVISIONS: ----
**PROJECT TITLE**: Boardwalk Decking

**SHEET TITLE**: Plan View - Boardwalk Foundations and Main Beams (Various Configurations Shown)

**DESIGN PHASE**: Final Draft Schematic Design

**DESCRIPTION**

**LEGEND**

1. Most deck boards, 100% clear rot resistant hemlock selected for quality. Most deck planks on floor to floor, copy between deck boards. Carbon, deck planks should be split, 2 1/2" x 6" but otherwise thickness from 1" to 2 1/2". Overhead should be at least 8" wide. Stained boards should be lightly sanded or splayed and all top edges should be rounded or radius 1/8". Woodbridges are connected with 1/2" thick boards and lip is cut into each outside edge between boards. Fasten board to floor by nailing or driving screws along the sides of the board. The maximum distance allowed between screws is 6". Screws are 1 1/2" long and are driven approximately 1" into the wood.

2. Usually installed behind the screen. Installation of these screens shall be at the discretion of the Landscape Architect.

**TABLE**

<table>
<thead>
<tr>
<th>Board</th>
<th>Clear space between supports</th>
<th>Overall width of board</th>
<th>Overall depth of board</th>
</tr>
</thead>
<tbody>
<tr>
<td>2 x 6</td>
<td>0.6&quot;</td>
<td>6.0&quot;</td>
<td>2.6&quot;</td>
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<tr>
<td>2 x 8</td>
<td>0.4&quot;</td>
<td>8.0&quot;</td>
<td>2.8&quot;</td>
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<tr>
<td>2 x 10</td>
<td>0.7&quot;</td>
<td>10.0&quot;</td>
<td>2.10&quot;</td>
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<tr>
<td>2 x 12</td>
<td>0.9&quot;</td>
<td>12.0&quot;</td>
<td>2.12&quot;</td>
</tr>
</tbody>
</table>

**NOTES**

- All dimensions are in inches.
- All clearances are to be maintained.
- All materials are to be installed according to the manufacturer's specifications.

**CHECKED BY**: K.H.

**DRAWN BY**: K.H.

**SCALE**: 1:50

**DATE**: MARCH 27, 2020

**OF 17**