### **SECTION 329202**

#### **SODDING**

### **PART 1 - GENERAL**

#### 1.1 SUMMARY

- A. Section Includes:
  - 1. Sodding.

#### 1.2 REFERENCES

- A. Hortus III 1976 Edition, Bailey Hortorium, Cornell University.
- B. Guideline Specifications to Turfgrass Sodding 1995 Edition, By Turfgrass Producers International

# 1.3 DEFINITIONS

- A. Finish Grade: Elevation of finished surface of planting soil.
- B. Manufactured Soil: Soil produced off-site by homogeneously blending mineral soils or sand with stabilized organic soil amendments to produce topsoil or planting soil.
- C. Planting Soil: Native or imported topsoil, manufactured topsoil, or surface soil modified to become topsoil; mixed with soil amendments.
- D. Subgrade: Surface or elevation of subsoil remaining after completing excavation, or top surface of a fill or backfill immediately beneath planting soil.
- E. Subsoil: All soil beneath the topsoil layer of the soil profile, and typified by the lack of organic matter and soil organisms.

#### 1.4 SUBMITTALS

- A. Product Data: For each type of product indicated.
- B. Certification of grass sod.
  - 1. Certification of each seed mixture for turfgrass sod.
- C. Product certificates.

D. Planting Schedule: Indicating anticipated planting dates for each type of planting.

#### 1.5 QUALITY ASSURANCE

- A. Installer's Field Supervision: Require Installer to maintain an experienced full-time supervisor on Project site when planting is in progress.
- B. Topsoil Analysis: Furnish soil analysis by a qualified soil-testing laboratory.
  - 1. Report suitability of topsoil for lawn growth. State-recommended quantities of nitrogen, phosphorus, and potash nutrients and soil amendments to be added to produce satisfactory topsoil.

### 1.6 DELIVERY, STORAGE, AND HANDLING

A. Sod: Harvest, deliver, store, and handle sod according to requirements in TPI's "Specifications for Turfgrass Sod Materials" and "Specifications for Turfgrass Sod Transplanting and Installation" in its "Guideline Specifications to Turfgrass Sodding." Deliver sod in time for planting within 24 hours of harvesting. Protect sod from breakage and drying.

#### 1.7 PROJECT CONDITIONS

A. Do not install lawns during rainy or freezing weather, or when soil is frozen.

## 1.8 TIMING OF INSTALLATION

- A. Sod:
  - 1. Immediately after finish grading is accepted.
  - 2. Allow sufficient time for sod to knit together and meet requirements for preliminary review.

#### 1.9 WARRANTY

- A. Time Period: Warrant that lawns are in healthy and flourishing condition of vigroious active growth one year from date of Final Acceptance.
- B. Appearance During Warranty: Lawns shall be free of dead or dying patches, and all areas shall show foliage of a normal density, size and color.
- C. Delays: Delays caused by the Contractor in completing planting operations which extend the planting into more than one planting season shall extend the Warranty Period correspondingly.

D. Exceptions: Contractor shall not be held responsible for failures due to neglect by Owner, vandalism, or Acts of God during Warranty Period. Report such conditions in writing.

### 1.10 MAINTENANCE SERVICE

- A. Initial Lawn Maintenance Service: Provide full maintenance by skilled employees of landscape Installer. Maintain as required in Part 3. Begin maintenance immediately after each area is planted and continue until acceptable lawn is established, but for not less than the following periods:
  - 1. Seeded Lawns: 60 days from date of planting completion.
    - a. When initial maintenance period has not elapsed before end of planting season, or if lawn is not fully established, continue maintenance during next planting season.
  - 2. Sodded Lawns: 30 days from date of planting completion.

### PART 2 - PRODUCTS

#### 2.1 LAWN SOD

- A. One year old nursery-grown sod that is certified Common Bermuda.
- B. Dense, healthy, field-grown on fumigated soil with the grass having been mowed at 1-inch height before lifting from field.
- C. Dark green in color, free of thatch, free from diseases, weeds and harmful insects.
- D. Reasonably free of objectionable grassy and broad leaf weeds. Sod shall be considered weed free if no more than ten (10) such weeds are found per 100 sq. ft. of sod.
- E. Sod shall be rejected if found to contain the following weeds:
  - 1. Quackgrass.
  - 2. Johnson grass.
  - 3. Poison ivy.
  - 4. Nimbleweed.
  - 5. Thistle.
  - 6. Bindweed.

- 7. Bentgrass.
- 8. Perennial sorrel.
- 9. Bromegrass.
- F. All sod to be cut 1-1/2 inches deep. Rhizome development should be apparent.

#### 2.2 GENERAL ACCESSORIES

- A. Water: Potable water as furnished by Owner.
- B. Pre-plant Fertilizer: See Soil Preparation Section 329113
- C. Top-Dress Fertilizer: 16-6-8 (N-P-K)
- D. Herbicides: Do not use herbicides which persist in the ground longer than 30 days.

### **PART 3 - EXECUTION**

### 3.1 EXAMINATION

- A. Verification of Conditions:
  - 1. Grades: Verify that grades are within 1-inch plus or minus the required finished grades. Verify that all soil preparation has been completed and approved. Report all variations in writing.
  - 2. Stones, Weeds, Debris: Verify that all areas to receive lawns and grasses are clear of stones larger than 1-1/2 inch in diameter, weeds, debris, and other extraneous materials.

#### 3.2 PREPARATION

- A. Moisten prepared lawn areas before planting if soil is dry. Water thoroughly and allow surface to dry before planting. Do not create muddy soil.
- B. Before planting, restore areas if eroded or otherwise disturbed after finish grading.

#### 3.3 SODDING

- A. Sod Bed Preparation:
  - 1. Rolling: Roll amended soil with 200 pound water-ballast roller.

- 2. Moistening Soil Surface: After all unevenness in the soil surface has been corrected, lightly moisten the soil immediately prior to laying the sod.
- 3. Timing: Sod immediately thereafter, provided the sod bed has remained in friable condition.

### B. Sodding Operations:

1. Big roll sod shall be installed by tractors with proper flotation tires of by an approved big roll sod installation machine. Care should be taken to roll out sod at a proper speed so that no humping or tearing of sod occurs. Sod will be manually pulled together by stiff rakes to insure no gaps remain in the seams. Joints should be staggered. Damaged or problem areas shall be cut out and replaced in a professional matter.

### 2. Starter Strip:

- a. Lay first row of sod in a straight line, with subsequent rows parallel to and tightly against each other.
- b. Stagger lateral joints.
- c. Do not stretch or overlap sod.
- d. Butt all joints tightly to eliminate all voids.
- 3. Cutting: Use a sharp knife to cut sod to fit curves, surface components of the irrigation system or other items.
- 4. Tamping and Rolling: Thoroughly tamp and roll sod to make contact with sod bed. Roll each entire section of completed sod.
- 5. Watering: Thoroughly water sod immediately after installation to wet the underside of the new sod pad and the soil immediately below to a depth of 6 inches. Maintain constant moisture for 2 weeks or until sod is fully rooted.
- 6. Top-Dress Fertilizer: Apply at the rate of (6) to (8) pounds per 1,000 square feet at 25 days and at 50 days after sodding.

## 3.4 LAWN MAINTENANCE

A. Maintain and establish lawn by watering, fertilizing, weeding, mowing, trimming, replanting, and other operations. Roll, re-grade, and replant bare or eroded areas and re-mulch to produce a uniformly smooth lawn. Provide materials and installation the same as those used in the original installation.

B. Mow lawn as soon as top growth is tall enough to cut. Repeat mowing to maintain specified height without cutting more than 1/3 of grass height. Remove no more than 1/3 of grass-leaf growth in initial or subsequent mowing.

#### 3.5 SATISFACTORY LAWNS

- A. Satisfactory Sodded Lawn: At end of maintenance period, a healthy, well-rooted, even-colored, viable lawn has been established, free of weeds, open joints, bare areas, and surface irregularities.
- B. Use specified materials to reestablish lawns that do not comply with requirements and continue maintenance until lawns are satisfactory.

### 3.6 FIELD QUALITY CONTROL

- A. Tests: Samples of materials may be taken and tested for conformity to specifications at any time.
- B. Rejected Materials: Remove rejected materials immediately from site at Contractor's expense. Pay cost of testing of materials not meeting specified requirements.

### 3.7 CLEANING

A. Erosion: Immediately restore eroded areas. Keep all adjacent paved surfaces clear of dirt, mud, stains, and organic debris.

**END OF SECTION 329200**