

Scenario Worksheet

Practice and Scenario Description:

| Information Type | Data |
|---------------------------|--|
| Region | New England |
| State | Connecticut |
| Discipline Group | Range/Pasture Grazing |
| Practice Code/Name | 382 - Fence |
| Scenario ID | 2 |
| Scenario Name | Electric 5-6 wire HT |
| Scenario Description | Electric - Installation of fence will allow for implementation of a grazing management that allows for an adequate rest and recovery period, protection of sensitive area, improved water quality, reduction of noxious and invasive weeds. |
| Before Practice Situation | On grazing lands health and vigor are negatively impacted by poor grazing distribution, timing of grazing and inadequate rest and recovery periods. Water quality may be impacted by increased erosion and runoff, livestock access to water bodies may be uncontrolled. Reduced vegetative cover increases the opportunity for encroachment of noxious and invasive weeds. |
| After Practice Situation | Installation of fence will allow for implementation of grazing management that allows for an adequate rest and recovery period, protection of sensitive area, improved water quality, reduction of noxious and invasive weeds. Fence includes posts, wire, fasteners, gates, fence charger, etc... five or (six) strand wire is commonly installed. Fence will be installed with wildlife friendly considerations. |
| Scenario Feature Measure | Length of Fence |
| Scenario Unit | Feet |
| Scenario Typical Size | 2640 |

Cost Summary:

| Cost Category | Scenario Cost | Scenario Cost/Unit |
|------------------------------------|---------------|--------------------|
| Materials | \$3,367.45 | \$1.28 |
| Equipment/Installation | \$1,872.38 | \$0.71 |
| Labor | \$2,428.34 | \$0.92 |
| Mobilization | \$688.98 | \$0.26 |
| Acquisition of Technical Knowledge | \$0.00 | \$0.00 |
| Foregone Income | \$0.00 | \$0.00 |
| Total | \$8,357.15 | \$3.17 |

Cost Details:

| Cost Category | Component ID | Component Name | Component Description | Unit | Price (\$/unit) | Quantity | Cost |
|------------------------|--------------|--|--|------|-----------------|----------|------------|
| Materials | 1058 | Gate, Pipe, 14' | 6 rail tube gate, 16 gauge | Each | \$167.67 | 2 | \$335.34 |
| Materials | 34 | Fence, Wire Assembly, High Tensile, Electric, 3 Strand | Brace pins, springs, strainers, battens, clips, crimp sleeves, staples, insulators, wrap around sleeves | Foot | \$0.12 | 5280 | \$633.60 |
| Materials | 29 | Electric, Energizer, 6 joule | Electric, Energizer, 6 joule for electric fence | Each | \$331.70 | 1 | \$331.70 |
| Materials | 12 | Post, Wood, CCA treated, 6" x 8' | Wood Post, End 6" X 8', CCA Treated | Each | \$20.58 | 26 | \$535.08 |
| Materials | 2 | Wire, High Tensile, 12.5 Gauge, 4,000' roll | High Tensile 12.5 gauge, 4,000' roll | Each | \$116.48 | 4 | \$465.92 |
| Materials | 10 | Post, Wood, CCA treated, 4" x 8' | Wood Post, Line 4" X 8', CCA Treated | Each | \$10.69 | 78 | \$833.82 |
| Materials | 24 | Electric, Power Surge Protector | Electric, Power Surge Protector for electric fence | Each | \$25.15 | 1 | \$25.15 |
| Materials | 26 | Electric, Tester | Electric, Tester for electric fence | Each | \$34.60 | 1 | \$34.60 |
| Materials | 25 | Electric, Cutoff Switch | Electric, Cutoff Switch for electric fence | Each | \$10.99 | 2 | \$21.98 |
| Materials | 23 | Electric, Insulated cable | Electric, Insulated cable for electric fence. Typically in spools of 100 to 200 feet. | Each | \$31.64 | 1 | \$31.64 |
| Materials | 22 | Electric, Lightning Diverter | Electric, Lightning diverter for electric fence | Each | \$12.01 | 1 | \$12.01 |
| Materials | 21 | Electric, Ground Rod Clamps | Electric, Ground Rod Clamps for electric fence | Each | \$2.39 | 7 | \$16.73 |
| Materials | 20 | Electric, Ground Rods | Electric, Ground Rod for electric fence | Each | \$12.84 | 7 | \$89.88 |
| Equipment/Installation | 934 | Auger, Post driver attachment | Auger or post driver attachment to a tractor or skidsteer. Does not include power unit. Labor not included. | Hour | \$7.49 | 22 | \$164.78 |
| Equipment/Installation | 937 | Chainsaw | Equipment and power unit costs. Labor not included. | Hour | \$5.48 | 2 | \$10.96 |
| Equipment/Installation | 939 | Truck, Pickup | Equipment and power unit costs. Labor not included. | Hour | \$26.51 | 48 | \$1,272.48 |
| Equipment/Installation | 963 | Tractor, agricultural, 60 HP | Agricultural tractor with horsepower range of 50 to 90. Equipment and power unit costs. Labor not included. | Hour | \$19.28 | 22 | \$424.16 |
| Labor | 231 | General Labor | Labor performed using basic tools such as power tool, shovels, and other tools that do not require extensive training. Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$25.71 | 74 | \$1,902.54 |
| Labor | 232 | Equipment Operators, Light | Includes: Skid Steer Loaders, Hydraulic Excavators <50 HP, Trenchers <12", Ag Equipment <150 HP, Pickup Trucks, Forklifts, Mulchers | Hour | \$23.90 | 22 | \$525.80 |
| Mobilization | 1138 | Mobilization, small equipment | Equipment <70 HP but can't be transported by a pick-up truck or with typical weights between 3,500 to 14,000 pounds. | Each | \$187.23 | 2 | \$374.46 |
| Mobilization | 1142 | Mobilization, General labor | Mobilization of general labor: Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$26.21 | 12 | \$314.52 |

Scenario Worksheet

Practice and Scenario Description:

| Information Type | Data |
|---------------------------|--|
| Region | New England |
| State | Connecticut |
| Discipline Group | Range/Pasture Grazing |
| Practice Code/Name | 382 - Fence |
| Scenario ID | 7 |
| Scenario Name | Confinement 96 inch |
| Scenario Description | Installation of fence reduces resource concerns associated with livestock feeding operations and/or wildlife access to prevent conflicts between humans and livestock or wildlife species. |
| Before Practice Situation | Wildlife negatively impacting sensitive areas such as riparian areas, windbreaks and shelterbelts or feed storage. Disease transmission from wildlife poses a significant health risk to domestic animals. |
| After Practice Situation | Installation of fence reduces resource concerns associated with livestock and/or wildlife access and prevents conflicts between humans and threatened, endangered or sensitive species. Fence includes posts, wire, fasteners, gates, etc... |
| Scenario Feature Measure | Length of Fence |
| Scenario Unit | Feet |
| Scenario Typical Size | 1320 |

Cost Summary:

| Cost Category | Scenario Cost | Scenario Cost/Unit |
|------------------------------------|---------------|--------------------|
| Materials | \$6,945.26 | \$5.26 |
| Equipment/Installation | \$1,862.20 | \$1.41 |
| Labor | \$2,746.65 | \$2.08 |
| Mobilization | \$474.22 | \$0.36 |
| Acquisition of Technical Knowledge | \$0.00 | \$0.00 |
| Foregone Income | \$0.00 | \$0.00 |
| Total | \$12,028.33 | \$9.11 |

Cost Details:

| Cost Category | Component ID | Component Name | Component Description | Unit | Price (\$/unit) | Quantity | Cost |
|------------------------|--------------|--|--|------|-----------------|----------|------------|
| Materials | 35 | Fence, Wire Assembly, Woven Wire | Brace pins, twist sticks, staples | Foot | \$0.12 | 1320 | \$158.40 |
| Materials | 1086 | Gate, Game, 8' High X 16' | 16' Wide Game Gate (8' Tall) | Each | \$418.25 | 2 | \$836.50 |
| Materials | 6 | Wire, Woven, Wildlife, 96" | High Tensile 12.5 gauge, 96" - 330' roll | Each | \$437.50 | 4 | \$1,750.00 |
| Materials | 13 | Post, Wood, CCA treated, 6" x 12-14' | Wood Post, Line/End 6" X 12-14', CCA Treated | Each | \$41.18 | 102 | \$4,200.36 |
| Equipment/Installation | 934 | Auger, Post driver attachment | Auger or post driver attachment to a tractor or skidsteer. Does not include power unit. Labor not included. | Hour | \$7.49 | 25 | \$187.25 |
| Equipment/Installation | 939 | Truck, Pickup | Equipment and power unit costs. Labor not included. | Hour | \$26.51 | 45 | \$1,192.95 |
| Equipment/Installation | 963 | Tractor, agricultural, 60 HP | Agricultural tractor with horsepower range of 50 to 90. Equipment and power unit costs. Labor not included. | Hour | \$19.28 | 25 | \$482.00 |
| Labor | 231 | General Labor | Labor performed using basic tools such as power tool, shovels, and other tools that do not require extensive training. Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$25.71 | 65 | \$1,671.15 |
| Labor | 232 | Equipment Operators, Light | Includes: Skid Steer Loaders, Hydraulic Excavators <50 HP, Trenchers <12", Ag Equipment <150 HP, Pickup Trucks, Forklifts, Mulchers | Hour | \$23.90 | 45 | \$1,075.50 |
| Mobilization | 1143 | Mobilization, Light Equipment Operator | Mobilization of light equipment operators: Skid Steer Loaders, Hydraulic Excavators <50 HP, Trenchers <12", Ag Equipment <150 HP, Pickup Trucks, Forklifts, Mulchers | Hour | \$23.67 | 2 | \$47.34 |
| Mobilization | 1138 | Mobilization, small equipment | Equipment <70 HP but can't be transported by a pick-up truck or with typical weights between 3,500 to 14,000 pounds. | Each | \$187.23 | 2 | \$374.46 |
| Mobilization | 1142 | Mobilization, General labor | Mobilization of general labor: Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$26.21 | 2 | \$52.42 |

Scenario Worksheet

Practice and Scenario Description:

| Information Type | Data |
|---------------------------|--|
| Region | New England |
| State | Connecticut |
| Discipline Group | Range/Pasture Grazing |
| Practice Code/Name | 382 - Fence |
| Scenario ID | 4 |
| Scenario Name | Barbed 4 strand |
| Scenario Description | Multi-strand, Barbed Wire - Installation of fence will allow for implementation of grazing management that allows for an adequate rest and recovery period, protection of sensitive area, improved water quality, reduction of noxious and invasive weeds. Constructed using approved fencing materials. |
| Before Practice Situation | On grazing lands health and vigor are negatively impacted by poor grazing distribution, timing of grazing and inadequate rest and recovery periods. Water quality may be impacted by increased erosion and runoff, livestock access to water bodies may be uncontrolled. Reduced vegetative cover increases the opportunity for encroachment of noxious and invasive weeds. |
| After Practice Situation | Installation of fence will allow for implementation of grazing management that allows for an adequate rest and recovery period, protection of sensitive area, improved water quality, reduction of noxious and invasive weeds. Fence includes posts, wire, fasteners, gates, etc. Four strand wire is commonly installed. Fence will be installed with wildlife friendly considerations. |
| Scenario Feature Measure | Length of Fence |
| Scenario Unit | Feet |
| Scenario Typical Size | 2640 |

Cost Summary:

| Cost Category | Scenario Cost | Scenario Cost/Unit |
|------------------------------------|---------------|--------------------|
| Materials | \$3,598.73 | \$1.36 |
| Equipment/Installation | \$2,620.64 | \$0.99 |
| Labor | \$2,046.31 | \$0.78 |
| Mobilization | \$636.56 | \$0.24 |
| Acquisition of Technical Knowledge | \$0.00 | \$0.00 |
| Foregone Income | \$0.00 | \$0.00 |
| Total | \$8,902.24 | \$3.37 |

Cost Details:

| Cost Category | Component ID | Component Name | Component Description | Unit | Price (\$/unit) | Quantity | Cost |
|------------------------|--------------|---|--|------|-----------------|----------|------------|
| Materials | 1058 | Gate, Pipe, 14' | 6 rail tube gate, 16 gauge | Each | \$167.67 | 2 | \$335.34 |
| Materials | 30 | Fence, Wire Assembly, Barbed Wire, 3 Strand | Brace pins, battens, clips, staples | Foot | \$0.16 | 3520 | \$563.20 |
| Materials | 12 | Post, Wood, CCA treated, 6" x 8' | Wood Post, End 6" X 8', CCA Treated | Each | \$20.58 | 26 | \$535.08 |
| Materials | 1 | Wire, Barbed, Galvanized, 12.5 Gauge, 1,320' roll | Galvanized 12.5 gauge, 1,320' roll | Each | \$63.52 | 8 | \$508.16 |
| Materials | 10 | Post, Wood, CCA treated, 4" x 8' | Wood Post, Line 4" X 8', CCA Treated | Each | \$10.69 | 155 | \$1,656.95 |
| Equipment/Installation | 934 | Auger, Post driver attachment | Auger or post driver attachment to a tractor or skidsteer. Does not include power unit. Labor not included. | Hour | \$7.49 | 45 | \$337.05 |
| Equipment/Installation | 937 | Chainsaw | Equipment and power unit costs. Labor not included. | Hour | \$5.48 | 2 | \$10.96 |
| Equipment/Installation | 939 | Truck, Pickup | Equipment and power unit costs. Labor not included. | Hour | \$26.51 | 53 | \$1,405.03 |
| Equipment/Installation | 963 | Tractor, agricultural, 60 HP | Agricultural tractor with horsepower range of 50 to 90. Equipment and power unit costs. Labor not included. | Hour | \$19.28 | 45 | \$867.60 |
| Labor | 231 | General Labor | Labor performed using basic tools such as power tool, shovels, and other tools that do not require extensive training. Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$25.71 | 61 | \$1,568.31 |
| Labor | 232 | Equipment Operators, Light | Includes: Skid Steer Loaders, Hydraulic Excavators <50 HP, Trenchers <12", Ag Equipment <150 HP, Pickup Trucks, Forklifts, Mulchers | Hour | \$23.90 | 20 | \$478.00 |
| Mobilization | 1138 | Mobilization, small equipment | Equipment <70 HP but can't be transported by a pick-up truck or with typical weights between 3,500 to 14,000 pounds. | Each | \$187.23 | 2 | \$374.46 |
| Mobilization | 1142 | Mobilization, General labor | Mobilization of general labor: Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$26.21 | 10 | \$262.10 |

Scenario Worksheet

Practice and Scenario Description:

| Information Type | Data |
|---------------------------|---|
| Region | New England |
| State | Connecticut |
| Discipline Group | Range/Pasture Grazing |
| Practice Code/Name | 382 - Fence |
| Scenario ID | 8 |
| Scenario Name | Chain Link Safety |
| Scenario Description | A barrier (fence) implemented on an NRCS constructed waste storage system according to engineering design to exclude human access. Permanently installed fence built to keep humans away from waste ponds & lagoons. |
| Before Practice Situation | Where a NRCS designed and constructed waste storage pond is planned, and significant risk to human safety is determined to be evident. |
| After Practice Situation | A five foot high chain link fence is installed to exclude humans and livestock from the waste storage pond for safety purposes. The fenced area would typically be 100 wide x 175 long with one gate and installed by a fencing contractor. |
| Scenario Feature Measure | Length of Fence |
| Scenario Unit | Feet |
| Scenario Typical Size | 500 |

Cost Summary:

| Cost Category | Scenario Cost | Scenario Cost/Unit |
|------------------------------------|---------------|--------------------|
| Materials | \$12,301.37 | \$24.60 |
| Equipment/Installation | \$0.00 | \$0.00 |
| Labor | \$0.00 | \$0.00 |
| Mobilization | \$0.00 | \$0.00 |
| Acquisition of Technical Knowledge | \$0.00 | \$0.00 |
| Foregone Income | \$0.00 | \$0.00 |
| Total | \$12,301.37 | \$24.60 |

Cost Details:

| Cost Category | Component ID | Component Name | Component Description | Unit | Price (\$/unit) | Quantity | Cost |
|---------------|--------------|-----------------------------------|--|------|-----------------|----------|-------------|
| Materials | 1079 | Fence, Chain Link | Fence, Chain Link, 5' High, 9ga Wire, Posts in Concrete on 10' Centers | Foot | \$24.33 | 500 | \$12,165.00 |
| Materials | 1081 | Gate, Chain Link, 18', Slide Gate | Chain Link Gate, 18' Wide X 5' Tall, Installed in Concrete | Each | \$136.37 | 1 | \$136.37 |

Scenario Worksheet

Practice and Scenario Description:

| Information Type | Data |
|---------------------------|---|
| Region | New England |
| State | Connecticut |
| Discipline Group | Range/Pasture Grazing |
| Practice Code/Name | 382 - Fence |
| Scenario ID | 6 |
| Scenario Name | Confinement |
| Scenario Description | Installation of fence reduces resource concerns associated with livestock feeding operations in confinement areas such as HUAs. |
| Before Practice Situation | Lack of HUA and/or appropriate confinement fence results in degradation of pasture, vegetated treatment areas, or other sensitive areas. |
| After Practice Situation | A rugged wooden fence or woven wire with two strands of barbed wire at the top. Typically on an area less than 1/4 to 1/2 acre and 3-sided, such as a Heavy Use Area, Vegetated Treatment Area, or other instance where animal control is extremely important. Installation of fence reduces resource concerns associated with livestock access and/or prevents conflicts between humans and threatened, endangered or sensitive species. |
| Scenario Feature Measure | Length of Fence |
| Scenario Unit | Feet |
| Scenario Typical Size | 330 |

Cost Summary:

| Cost Category | Scenario Cost | Scenario Cost/Unit |
|------------------------------------|---------------|--------------------|
| Materials | \$1,113.05 | \$3.37 |
| Equipment/Installation | \$585.04 | \$1.77 |
| Labor | \$782.53 | \$2.37 |
| Mobilization | \$426.88 | \$1.29 |
| Acquisition of Technical Knowledge | \$0.00 | \$0.00 |
| Foregone Income | \$0.00 | \$0.00 |
| Total | \$2,907.50 | \$8.81 |

Cost Details:

| Cost Category | Component ID | Component Name | Component Description | Unit | Price (\$/unit) | Quantity | Cost |
|------------------------|--------------|---|--|------|-----------------|----------|----------|
| Materials | 1059 | Gate, Pipe, 16' | 6 rail tube gate, 16 gauge | Each | \$219.68 | 1 | \$219.68 |
| Materials | 12 | Post, Wood, CCA treated, 6" x 8' | Wood Post, End 6" X 8', CCA Treated | Each | \$20.58 | 12 | \$246.96 |
| Materials | 1 | Wire, Barbed, Galvanized, 12.5 Gauge, 1,320' roll | Galvanized 12.5 gauge, 1,320' roll | Each | \$63.52 | 0.5 | \$31.76 |
| Materials | 11 | Post, Wood, CCA treated, 5" x 8' | Wood Post, End 5" X 8', CCA Treated | Each | \$15.72 | 12 | \$188.64 |
| Materials | 4 | Wire, Woven, Galvanized, 12.5 Gauge, 48" | Galvanized 12.5 gauge, 48" - 330' roll | Each | \$201.52 | 1 | \$201.52 |
| Materials | 10 | Post, Wood, CCA treated, 4" x 8' | Wood Post, Line 4" X 8', CCA Treated | Each | \$10.69 | 21 | \$224.49 |
| Equipment/Installation | 934 | Auger, Post driver attachment | Auger or post driver attachment to a tractor or skidsteer. Does not include power unit. Labor not included. | Hour | \$7.49 | 7 | \$52.43 |
| Equipment/Installation | 939 | Truck, Pickup | Equipment and power unit costs. Labor not included. | Hour | \$26.51 | 15 | \$397.65 |
| Equipment/Installation | 963 | Tractor, agricultural, 60 HP | Agricultural tractor with horsepower range of 50 to 90. Equipment and power unit costs. Labor not included. | Hour | \$19.28 | 7 | \$134.96 |
| Labor | 231 | General Labor | Labor performed using basic tools such as power tool, shovels, and other tools that do not require extensive training. Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$25.71 | 23 | \$591.33 |
| Labor | 232 | Equipment Operators, Light | Includes: Skid Steer Loaders, Hydraulic Excavators <50 HP, Trenchers <12", Ag Equipment <150 HP, Pickup Trucks, Forklifts, Mulchers | Hour | \$23.90 | 8 | \$191.20 |
| Mobilization | 1138 | Mobilization, small equipment | Equipment <70 HP but can't be transported by a pick-up truck or with typical weights between 3,500 to 14,000 pounds. | Each | \$187.23 | 2 | \$374.46 |
| Mobilization | 1142 | Mobilization, General labor | Mobilization of general labor: Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$26.21 | 2 | \$52.42 |

Scenario Worksheet

Practice and Scenario Description:

| Information Type | Data |
|---------------------------|--|
| Region | New England |
| State | Connecticut |
| Discipline Group | Range/Pasture Grazing |
| Practice Code/Name | 382 - Fence |
| Scenario ID | 1 |
| Scenario Name | Electric HT |
| Scenario Description | Electric - Installation of fence will allow for implementation of a grazing management that allows for an adequate rest and recovery period, protection of sensitive area, improved water quality, reduction of noxious and invasive weeds. |
| Before Practice Situation | On grazing lands health and vigor are negatively impacted by poor grazing distribution, timing of grazing and inadequate rest and recovery periods. Water quality may be impacted by increased erosion and runoff, livestock access to water bodies may be uncontrolled. Reduced vegetative cover increases the opportunity for encroachment of noxious and invasive weeds. |
| After Practice Situation | Installation of fence will allow for implementation of grazing management that allows for an adequate rest and recovery period, protection of sensitive area, improved water quality, reduction of noxious and invasive weeds. Fence includes posts, wire, fasteners, gates, fence charger, etc... Two to four (three) strand wire is commonly installed. Fence will be installed with wildlife friendly considerations. |
| Scenario Feature Measure | Length of Fence |
| Scenario Unit | Feet |
| Scenario Typical Size | 2640 |

Cost Summary:

| Cost Category | Scenario Cost | Scenario Cost/Unit |
|------------------------------------|---------------|--------------------|
| Materials | \$2,817.69 | \$1.07 |
| Equipment/Installation | \$1,660.30 | \$0.63 |
| Labor | \$2,016.98 | \$0.76 |
| Mobilization | \$636.56 | \$0.24 |
| Acquisition of Technical Knowledge | \$0.00 | \$0.00 |
| Foregone Income | \$0.00 | \$0.00 |
| Total | \$7,131.53 | \$2.70 |

Cost Details:

| Cost Category | Component ID | Component Name | Component Description | Unit | Price (\$/unit) | Quantity | Cost |
|------------------------|--------------|--|--|------|-----------------|----------|------------|
| Materials | 1058 | Gate, Pipe, 14' | 6 rail tube gate, 16 gauge | Each | \$167.67 | 2 | \$335.34 |
| Materials | 34 | Fence, Wire Assembly, High Tensile, Electric, 3 Strand | Brace pins, springs, strainers, battens, clips, crimp sleeves, staples, insulators, wrap around sleeves | Foot | \$0.12 | 2640 | \$316.80 |
| Materials | 29 | Electric, Energizer, 6 joule | Electric, Energizer, 6 joule for electric fence | Each | \$331.70 | 1 | \$331.70 |
| Materials | 12 | Post, Wood, CCA treated, 6" x 8' | Wood Post, End 6" X 8', CCA Treated | Each | \$20.58 | 26 | \$535.08 |
| Materials | 2 | Wire, High Tensile, 12.5 Gauge, 4,000' roll | High Tensile 12.5 gauge, 4,000' roll | Each | \$116.48 | 2 | \$232.96 |
| Materials | 10 | Post, Wood, CCA treated, 4" x 8' | Wood Post, Line 4" X 8', CCA Treated | Each | \$10.69 | 78 | \$833.82 |
| Materials | 24 | Electric, Power Surge Protector | Electric, Power Surge Protector for electric fence | Each | \$25.15 | 1 | \$25.15 |
| Materials | 26 | Electric, Tester | Electric, Tester for electric fence | Each | \$34.60 | 1 | \$34.60 |
| Materials | 25 | Electric, Cutoff Switch | Electric, Cutoff Switch for electric fence | Each | \$10.99 | 2 | \$21.98 |
| Materials | 23 | Electric, Insulated cable | Electric, Insulated cable for electric fence. Typically in spools of 100 to 200 feet. | Each | \$31.64 | 1 | \$31.64 |
| Materials | 22 | Electric, Lightning Diverter | Electric, Lightning diverter for electric fence | Each | \$12.01 | 1 | \$12.01 |
| Materials | 21 | Electric, Ground Rod Clamps | Electric, Ground Rod Clamps for electric fence | Each | \$2.39 | 7 | \$16.73 |
| Materials | 20 | Electric, Ground Rods | Electric, Ground Rod for electric fence | Each | \$12.84 | 7 | \$89.88 |
| Equipment/Installation | 934 | Auger, Post driver attachment | Auger or post driver attachment to a tractor or skidsteer. Does not include power unit. Labor not included. | Hour | \$7.49 | 22 | \$164.78 |
| Equipment/Installation | 937 | Chainsaw | Equipment and power unit costs. Labor not included. | Hour | \$5.48 | 2 | \$10.96 |
| Equipment/Installation | 939 | Truck, Pickup | Equipment and power unit costs. Labor not included. | Hour | \$26.51 | 40 | \$1,060.40 |
| Equipment/Installation | 963 | Tractor, agricultural, 60 HP | Agricultural tractor with horsepower range of 50 to 90. Equipment and power unit costs. Labor not included. | Hour | \$19.28 | 22 | \$424.16 |
| Labor | 231 | General Labor | Labor performed using basic tools such as power tool, shovels, and other tools that do not require extensive training. Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$25.71 | 58 | \$1,491.18 |
| Labor | 232 | Equipment Operators, Light | Includes: Skid Steer Loaders, Hydraulic Excavators <50 HP, Trenchers <12", Ag Equipment <150 HP, Pickup Trucks, Forklifts, Mulchers | Hour | \$23.90 | 22 | \$525.80 |
| Mobilization | 1138 | Mobilization, small equipment | Equipment <70 HP but can't be transported by a pick-up truck or with typical weights between 3,500 to 14,000 pounds. | Each | \$187.23 | 2 | \$374.46 |
| Mobilization | 1142 | Mobilization, General labor | Mobilization of general labor: Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$26.21 | 10 | \$262.10 |

Scenario Worksheet

Practice and Scenario Description:

| | |
|---------------------------|--|
| Information Type | Data |
| Region | New England |
| State | Connecticut |
| Discipline Group | Range/Pasture Grazing |
| Practice Code/Name | 382 - Fence |
| Scenario ID | 5 |
| Scenario Name | Interior, electric |
| Scenario Description | Electric - Permanent or semi-permanent lighter-duty fence for interior subdivisions for a grazing system. Installation of fence will allow for implementation of a grazing management that allows for an adequate rest and recovery period, protection of sensitive area, improved water quality, reduction of noxious and invasive weeds. |
| Before Practice Situation | |
| After Practice Situation | Installation of interior fence will allow for implementation of grazing management that allows for an adequate rest and recovery period, protection of sensitive area, improved water quality, reduction of noxious and invasive weeds. Fence is used for laneways and/or subdivisions of grazing system. |
| Scenario Feature Measure | Length of Fence |
| Scenario Unit | Feet |
| Scenario Typical Size | 1320 |

Cost Summary:

| Cost Category | Scenario Cost | Scenario Cost/Unit |
|------------------------------------|---------------|--------------------|
| Materials | \$1,192.36 | \$0.90 |
| Equipment/Installation | \$344.89 | \$0.26 |
| Labor | \$332.42 | \$0.25 |
| Mobilization | \$187.23 | \$0.14 |
| Acquisition of Technical Knowledge | \$0.00 | \$0.00 |
| Foregone Income | \$0.00 | \$0.00 |
| Total | \$2,056.90 | \$1.56 |

Cost Details:

| Cost Category | Component ID | Component Name | Component Description | Unit | Price (\$/unit) | Quantity | Cost |
|------------------------|--------------|---|--|------|-----------------|----------|----------|
| Materials | 30 | Fence, Wire Assembly, Barbed Wire, 3 Strand | Brace pins, battens, clips, staples | Foot | \$0.16 | 1320 | \$211.20 |
| Materials | 7 | Wire, Polytape | Wire, Polytape for electric fence. Rolls of 65' to 825' | Each | \$114.64 | 4 | \$458.56 |
| Materials | 15 | Post, Steel T, 1.33 lbs, 6' | Steel Post, Studded 6' - 1.33 lb | Each | \$7.59 | 44 | \$333.96 |
| Materials | 11 | Post, Wood, CCA treated, 5" x 8' | Wood Post, End 5" X 8", CCA Treated | Each | \$15.72 | 12 | \$188.64 |
| Equipment/Installation | 934 | Auger, Post driver attachment | Auger or post driver attachment to a tractor or skidsteer. Does not include power unit. Labor not included. | Hour | \$7.49 | 1 | \$7.49 |
| Equipment/Installation | 939 | Truck, Pickup | Equipment and power unit costs. Labor not included. | Hour | \$26.51 | 12 | \$318.12 |
| Equipment/Installation | 963 | Tractor, agricultural, 60 HP | Agricultural tractor with horsepower range of 50 to 90. Equipment and power unit costs. Labor not included. | Hour | \$19.28 | 1 | \$19.28 |
| Labor | 231 | General Labor | Labor performed using basic tools such as power tool, shovels, and other tools that do not require extensive training. Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$25.71 | 12 | \$308.52 |
| Labor | 232 | Equipment Operators, Light | Includes: Skid Steer Loaders, Hydraulic Excavators <50 HP, Trenchers <12", Ag Equipment <150 HP, Pickup Trucks, Forklifts, Mulchers | Hour | \$23.90 | 1 | \$23.90 |
| Mobilization | 1138 | Mobilization, small equipment | Equipment <70 HP but can't be transported by a pick-up truck or with typical weights between 3,500 to 14,000 pounds. | Each | \$187.23 | 1 | \$187.23 |

Scenario Worksheet

Practice and Scenario Description:

| | |
|---------------------------|---|
| Information Type | Data |
| Region | New England |
| State | Connecticut |
| Discipline Group | Range/Pasture Grazing |
| Practice Code/Name | 382 - Fence |
| Scenario ID | 9 |
| Scenario Name | Portable poly fence |
| Scenario Description | Portable electric fence manufactured for the purpose of managing livestock on grazing systems is used within the confines of a permanent perimeter fence which supplies the electric charge. Use of portable fence will allow for implementation of grazing management that allows for an adequate rest and recovery period, protection of sensitive area, improved water quality, reduction of noxious and invasive weeds. Constructed using approved fencing materials. This fence might also be used as an extension of a permanent fence where seasonal flooding or other conditions dictate use of a removable fence. One portable fence setup is used for a grazing system, and may be transported to fields within the system. |
| Before Practice Situation | On grazing lands health and vigor are negatively impacted by poor grazing distribution, timing of grazing and inadequate rest and recovery periods. Water quality may be impacted by increased erosion and runoff, livestock access to water bodies may be uncontrolled. Reduced vegetative cover increases the opportunity for encroachment of noxious and invasive weeds. |
| After Practice Situation | Pasture is subdivided into appropriately-sized paddocks to control animal access to forage. Fence is comprised of materials manufactured for this use, including poly wire, rope, or tape, fiberglass rods, and reels to hold the conductors. Typical pasture is subdivided with a movable system to control livestock and allow for appropriate rest and recovery of forage. |
| Scenario Feature Measure | |
| Scenario Unit | Foot |
| Scenario Typical Size | 1000 |

Cost Summary:

| Cost Category | Scenario Cost | Scenario Cost/Unit |
|------------------------------------|---------------|--------------------|
| Materials | \$897.18 | \$0.90 |
| Equipment/Installation | \$0.00 | \$0.00 |
| Labor | \$0.00 | \$0.00 |
| Mobilization | \$0.00 | \$0.00 |
| Acquisition of Technical Knowledge | \$0.00 | \$0.00 |
| Foregone Income | \$0.00 | \$0.00 |
| Total | \$897.18 | \$0.90 |

Cost Details:

| Cost Category | Component ID | Component Name | Component Description | Unit | Price (\$/unit) | Quantity | Cost |
|---------------|--------------|-------------------------------|---|------|-----------------|----------|----------|
| Materials | 7 | Wire, Polytape | Wire, Polytape for electric fence. Rolls of 655' to 825'. | Each | \$114.64 | 4 | \$458.56 |
| Materials | 15 | Post, Steel T, 1.33 lbs, 6' | Steel Post, Studded 6' - 1.33 lb | Each | \$7.59 | 2 | \$15.18 |
| Materials | 19 | Post, Fiberglass, 11/16" X 6' | Fiberglass line post, 11/16" diameter X 6' length | Each | \$6.32 | 67 | \$423.44 |

Scenario Worksheet

Practice and Scenario Description:

| Information Type | Data |
|---------------------------|---|
| Region | New England |
| State | Connecticut |
| Discipline Group | Range/Pasture Grazing |
| Practice Code/Name | 382 - Fence |
| Scenario ID | 3 |
| Scenario Name | Woven Wire / Electric |
| Scenario Description | Woven with 2 strand electric or barbed top and one offset electric or barbed at 8 inches on exterior for predator control- Installation of fence will allow for implementation of a grazing management that allows for an adequate rest and recovery period, protection of sensitive area, improved water quality, reduction of noxious and invasive weeds. Woven wire is typically used in applications with sheep, goats, hogs, wildlife exclusion, shelterbelt/tree protection, etc. Constructed using approved fencing materials. |
| Before Practice Situation | On grazing lands health and vigor are negatively impacted by poor grazing distribution, timing of grazing and inadequate rest and recovery periods. Water quality may be impacted by increased erosion and runoff, livestock access to water bodies may be uncontrolled. Reduced vegetative cover increases the opportunity for encroachment of noxious and invasive weeds. |
| After Practice Situation | Installation of fence will allow for implementation of a rotational grazing plan that allows for an adequate rest and recovery period, protection of sensitive area, improved water quality, reduction of noxious and invasive weeds. Woven wire fence includes posts, wire, fasteners, gates, etc. Woven wire is typically used in applications with sheep, goats, horses and camels. |
| Scenario Feature Measure | Length of Fence |
| Scenario Unit | Feet |
| Scenario Typical Size | 2640 |

Cost Summary:

| Cost Category | Scenario Cost | Scenario Cost/Unit |
|------------------------------------|---------------|--------------------|
| Materials | \$4,971.98 | \$1.88 |
| Equipment/Installation | \$2,832.72 | \$1.07 |
| Labor | \$3,055.17 | \$1.16 |
| Mobilization | \$366.94 | \$0.14 |
| Acquisition of Technical Knowledge | \$0.00 | \$0.00 |
| Foregone Income | \$0.00 | \$0.00 |
| Total | \$11,226.81 | \$4.25 |

Cost Details:

| Cost Category | Component ID | Component Name | Component Description | Unit | Price (\$/unit) | Quantity | Cost |
|------------------------|--------------|--|--|------|-----------------|----------|------------|
| Materials | 1058 | Gate, Pipe, 14' | 6 rail tube gate, 16 gauge | Each | \$167.67 | 2 | \$335.34 |
| Materials | 32 | Fence, Wire Assembly, High Tensile, Electric, 1 Strand | Brace pins, springs, strainers, battens, clips, crimp sleeves, staples, insulators, wrap around sleeves | Foot | \$0.02 | 7920 | \$158.40 |
| Materials | 35 | Fence, Wire Assembly, Woven Wire | Brace pins, twist sticks, staples | Foot | \$0.12 | 2640 | \$316.80 |
| Materials | 12 | Post, Wood, CCA treated, 6" x 8' | Wood Post, End 6" X 8', CCA Treated | Each | \$20.58 | 26 | \$535.08 |
| Materials | 3 | Wire, Woven, Galvanized, 12.5 Gauge, 32" | Galvanized 12.5 gauge, 32" - 330' roll | Each | \$166.41 | 8 | \$1,331.28 |
| Materials | 2 | Wire, High Tensile, 12.5 Gauge, 4,000' roll | High Tensile 12.5 gauge, 4,000' roll | Each | \$116.48 | 2 | \$232.96 |
| Materials | 28 | Electric, Energizer, 3-4 joule | Electric, Energizer, 3-4 joule for electric fence | Each | \$195.16 | 1 | \$195.16 |
| Materials | 10 | Post, Wood, CCA treated, 4" x 8' | Wood Post, Line 4" X 8', CCA Treated | Each | \$10.69 | 155 | \$1,656.95 |
| Materials | 24 | Electric, Power Surge Protector | Electric, Power Surge Protector for electric fence | Each | \$25.15 | 1 | \$25.15 |
| Materials | 26 | Electric, Tester | Electric, Tester for electric fence | Each | \$34.60 | 1 | \$34.60 |
| Materials | 23 | Electric, Insulated cable | Electric, Insulated cable for electric fence. Typically in spools of 100 to 200 feet. | Each | \$31.64 | 1 | \$31.64 |
| Materials | 22 | Electric, Lightning Diverter | Electric, Lightning diverter for electric fence | Each | \$12.01 | 1 | \$12.01 |
| Materials | 21 | Electric, Ground Rod Clamps | Electric, Ground Rod Clamps for electric fence | Each | \$2.39 | 7 | \$16.73 |
| Materials | 20 | Electric, Ground Rods | Electric, Ground Rod for electric fence | Each | \$12.84 | 7 | \$89.88 |
| Equipment/Installation | 934 | Auger, Post driver attachment | Auger or post driver attachment to a tractor or skidsteer. Does not include power unit. Labor not included. | Hour | \$7.49 | 45 | \$337.05 |
| Equipment/Installation | 937 | Chainsaw | Equipment and power unit costs. Labor not included. | Hour | \$5.48 | 2 | \$10.96 |
| Equipment/Installation | 939 | Truck, Pickup | Equipment and power unit costs. Labor not included. | Hour | \$26.51 | 61 | \$1,617.11 |
| Equipment/Installation | 963 | Tractor, agricultural, 60 HP | Agricultural tractor with horsepower range of 50 to 90. Equipment and power unit costs. Labor not included. | Hour | \$19.28 | 45 | \$867.60 |
| Labor | 231 | General Labor | Labor performed using basic tools such as power tool, shovels, and other tools that do not require extensive training. Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$25.71 | 77 | \$1,979.67 |
| Labor | 232 | Equipment Operators, Light | Includes: Skid Steer Loaders, Hydraulic Excavators <50 HP, Trenchers <12", Ag Equipment <150 HP, Pickup Trucks, Forklifts, Mulchers | Hour | \$23.90 | 45 | \$1,075.50 |
| Mobilization | 1142 | Mobilization, General labor | Mobilization of general labor: Ex. pipe layer, herder, concrete placement, materials spreader, flagger, etc. | Hour | \$26.21 | 14 | \$366.94 |