

# Recommended Materials and Equipment for Field-Grown Industrial Hemp

## Propagation Supplies

Trays/Flats (pick one):

- [1020 flats](#) (no drainage holes) w/ [1020 web trays](#) - \$1.89 ea.
- [Extra-strength 1020 flats](#) (no drainage holes) - \$3.50 ea.

Seedling pellets (pick one):

- [J42100 TPH](#) (50/tray, holds seedlings 15-20 days)
- [J50150 TPH](#) (32/tray, holds seedlings 21-30 days)

## Cloning supplies

- Rooting plugs (pick one):
  - [J3675 TPH](#) (84/tray)
  - [35mm X 65mm Ellepots w/72 deep ellepot trays](#)
- [Water soluble IBA salt](#)
- [Disposable propagation scalpels](#)
- [Heat mats w/thermostats](#) \$31 ea

## Indoor propagation supplies

- [7 in. humidity domes](#) (indoor use only) \$4.06 ea.
- [Propagation Racks](#) (\$203) holds 20 flats with [additional shelf](#) (\$87 for 2). [Caster set](#) (\$75) recommended for hard surfaces (indoor only) TOTAL: \$321.50 ea.
- [48" single bulb T5 lights](#) (\$40) supplies light to 1 shelf or 4 flats (indoor only)

## Greenhouse Propagation Supplies

- Propagation Bench materials: [4'x8' bench frame](#) \$213 ea. (or use 2x4 lumber and cinder blocks) and [bench top](#) \$60 ea. - holds 18 flats \$276 total
- [50% Shade Cloth](#) \$0.29/sq ft; 14'x10' piece (\$40.60) required for each bench
- Shade cloth frame (PVC): 36' 3/4" sch. 40 pipe, 4x3-way 3/4" tees, 2x3/4" tees (~\$16 per bench)
- [1HP Shallow well pump with bladder](#), 1" poly or PVC pipe, 3/4" poly pipe. Misc. fittings (total cost varies)
- [18 GPH Inverted Micro Sprinkler w/ 12" Micro Tubing and Weight Assembly](#) (\$2.56 ea) 3 per bench
- Propagation timers: Requires one zone per 50 benches (up to 2 zones in a 4,000 sq ft greenhouse: [One or two zone timer/valve](#) \$49 ea. Multi-zone timers available for larger greenhouses. Contact CRF for details.

## Fertilizers

Depends on growing methods, soil tests, water quality, and regional availability. Contact CRF for assistance selecting dry, liquid, and/or water-soluble fertilizers that will work for your farm.

## **Field Prep Equipment**

Fertilizer Spreader/Seed Broadcaster\*

Manure/Compost Spreader\*

[Articulating Spader](#)

[Bed Shaper](#)

[Plastic Layer/Drip tape applicator](#)

## **Transplanting Equipment**

[Single Bed Water Wheel Transplanter](#) (0-30 acres) \$2500-\$4000 depending on model and add-ons\*.

[Two- or Three-bed mechanical transplanter](#) (30-100 acres) \$5000+\*

\* Contact CRF for assistance selecting a model that is right for your farm

## **Cost Calculator for Producing Seedlings from Feminized Seed**

Enter the number of acres of hemp you intend to grow and the cost will be estimated.

Assumes cheaper trays and 50 cell/tray peat plugs are used. Fertilizer costs only include liquid or water-soluble fertilizers for nursery production of planting stock.