PO-017 Low commercial-waterer plinth

Raise a selected nonheated commercial drinker on a broad cleanable top to reduce litter kicked toward it; not a heated-water system.

Controlling dimensions: US inches and feet. Metric equivalents are references. Original editorial design; no physical build, animal trial or load certification is claimed.

Before marking and cutting

Read every step and identify the installed orientation. Make the component off-site with birds excluded.

Measure the actual receiving space, chosen commercial accessories and access route. Stop if the example does not fit; changing only one member can invalidate the assembly.

Reject split, warped, moldy or chemically contaminated stock. Keep exposed mesh cut ends and all sharp fasteners inaccessible to birds.

The drawing dimensions control; illustrations are not full-size templates. Allow a saw kerf between parts when laying out stock.

Use limits

No person may stand or sit on this component. No tested load rating is claimed.

A site-specific safe location and supervision are required; remove it if birds become trapped, peck damaged material, or cannot use their normal feed, water, shelter and escape routes.

Materials and finished cuts

Part	Qty	Size to cut	Material and detail
A Plinth top	1	18 × 18 × 3/4 in 457.2 × 457.2 × 19.05 mm	Exterior-bond plywood, measured actual thickness. Square ends; remove splinters.
B Leg block	4	3 × 3 1/2 × 1 1/2 in 76.2 × 88.9 × 38.1 mm	Untreated sound straight softwood. Square ends; remove splinters.
C Between-leg tie	2	11 × 1 1/2 × 1 1/2 in 279.4 × 38.1 × 38.1 mm	Untreated sound straight softwood. Square ends; remove splinters.

Hardware and consumables

16 × #8 corrosion-resistant exterior wood screw 1 1/4 in (31.75 mm). Four angles, four screws per angle [N1]

8 × #8 corrosion-resistant exterior wood screw 2 in (50.8 mm). Top to legs [N1]

4 × Small four-hole wood-connection angle. Two per tie

Selected complete nonheated waterer

Removable washable nonslip top pad

N1 applies to every entry marked [N1]: Use compatible coatings/metals and the maker's pilot-hole guidance; do not substitute drywall screws.

Tools

Tape measure, square and pencil; Saw appropriate to material and work supports; Drill/driver, countersink and pilot bits selected for the screws; Clamps, sanding block and eye/hearing protection; dust control appropriate to the material

Primary context and design record

Context references; not design endorsements or certifications.

S1 · Caring for chickens in cold weather · University of Minnesota Extension

S2 · Build a Clean Routine · USDA APHIS Defend the Flock

Assembly and first checks

The large drawing plates follow the instructions in this same PDF. Read the cut list and match part IDs before cutting. Print with automatic page orientation; use written dimensions rather than measuring the printed drawing.

01 Measure the selected nonheated waterer. Its entire footprint must fit the 18 in (457.2 mm) square, without an overhanging tray or an unstable rounded base.

02 Confirm an overall elevation of 3 3/4 in (95.3 mm) suits the actual birds and waterer instructions; height is not a universal prescription for chicks or every breed.

03 Cut A to 18 in square from actual 3/4 in plywood. Cut four B legs to 3 in long from actual 1 1/2 × 3 1/2 in stock.

04 Cut two C ties to 11 in (279.4 mm) from actual 1 1/2 in square stock. Remove sharp splinters and seal/cure plywood edges before assembly.

05 Place four legs with their 3 1/2 in dimension running left/right at the top's corners, their 1 1/2 in dimension front/rear; outside footprint remains 18 in square.

06 Fit C between left/right legs at the front and rear, with lower edges 3/4 in (19.1 mm) above the floor.

07 Use a small metal angle at each C end, two 1 1/4 in screws per angle leg. Tighten without splitting the short B blocks.

08 Clamp A onto the leg tops and drive two 2 in screws into each B from above, keeping every screw at least 1/2 in from a top edge.

09 Fit a removable thin washable nonslip pad no larger than 17 7/8 in (454 mm) square; do not make a loose edge accessible for pecking.

10 Place the empty waterer and check level, then fill only to its maker's normal level. With birds absent, check the plinth does not rock or bow.

11 Supervise access from all intended sides. Remove the plinth if water becomes inaccessible, birds perch/foul the top, or the chosen base slides.

12 Remove the drinker and pad daily as needed to check for trapped damp litter. This design excludes heated bases, cords, exposed elements and improvised electrical supplies.

Acceptance and intermediate checks

B positions leave an 11 in gap for C; both ties fit without spreading the legs.

Top elevation is 3 3/4 in and all screws remain within the selected members.

Actual filled waterer sits level with no overhang, rocking or sliding.

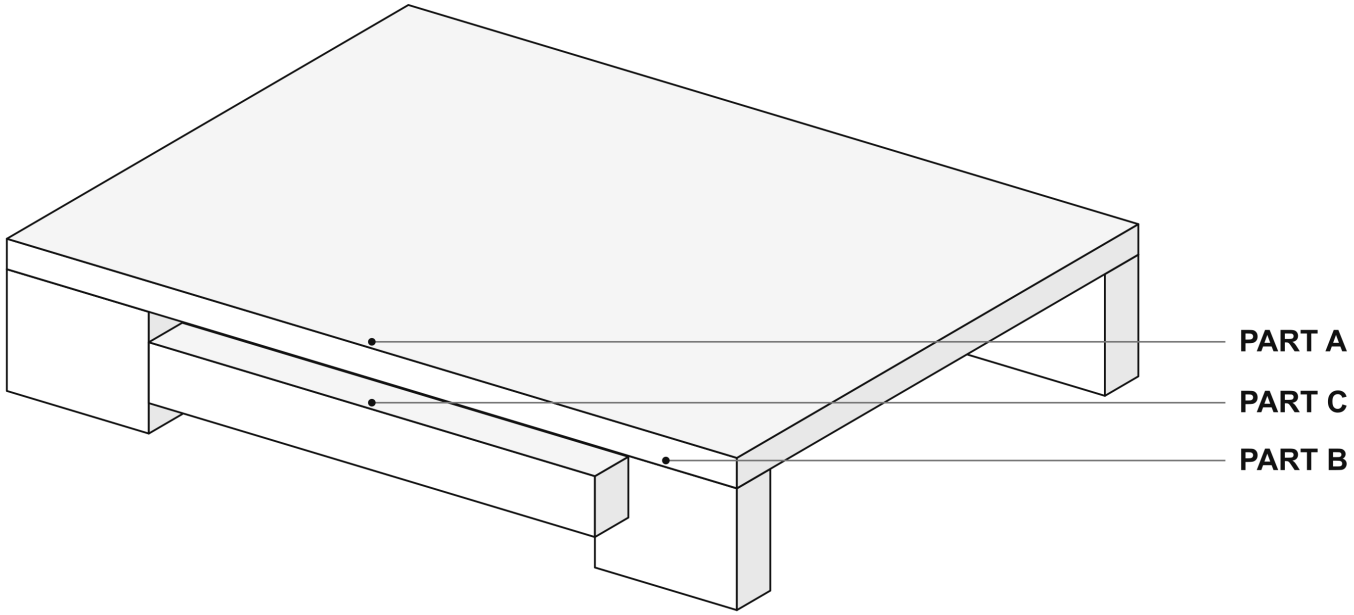
No heated device or electrical lead; actual birds reach water comfortably and the top stays clean.

Cleaning and maintenance

Inspect before each use for splits, loose joints, protruding points and trapped debris. Remove accumulated litter or manure promptly. When cleaning is needed, move birds away, remove debris first, wash and use only a suitable label-directed product if disinfection is indicated; let the item dry before return. Recheck the fit after seasonal wood movement. Replace cracked panels, rusted fasteners or frayed liners instead of concealing damage. Sand accessible edges to a small smooth radius. Use a removable washable contact liner where specified. Any optional coating must be suitable for the intended animal-equipment use and fully cured according to its label before installation. Porous wood is not represented as a disinfectable food-contact surface.

PO-017 | ASSEMBLY GEOMETRY

Low commercial-waterer plinth



Displayed schematic envelope (x × y × z):

18 in × 18 in × 3 3/4 in / 457.2 × 457.2 × 95.2 mm

Part letters match the cut list. Hardware/anchors are described in the steps.

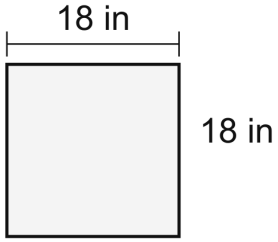
Original schematic • dimensions control • untested editorial draft

x = left/right; y = front/rear; z = height.

PO-017 | DIMENSIONED PARTS 1 OF 1

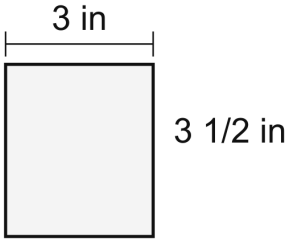
Finished sizes; allow for saw kerfs. Match part letters to the materials list.

A Plinth top ×1



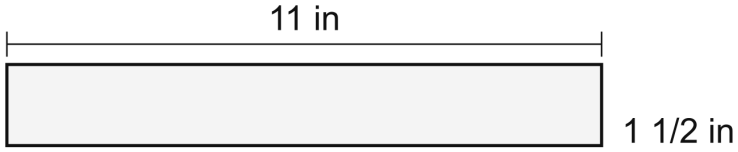
Metric face: 457.2 × 457.2 mm
Thickness: 3/4 in / 19.05 mm
Stock and special cuts: materials list.

B Leg block ×4



Metric face: 76.2 × 88.9 mm
Thickness: 1 1/2 in / 38.10 mm
Stock and special cuts: materials list.

C Between-leg tie ×2



Metric face: 279.4 × 38.1 mm
Thickness: 1 1/2 in / 38.10 mm
Stock and special cuts: materials list.

Original B/W vector drawing • US inches control • unbuilt / untested