

# Titan Ready USA

## Hydrant 3 Barrel Rack System

### Assembly Instructions



## **Contents**

### **STEEL RACK**

#### **PARTS:**

- 2 - Top (3) H-frames
- 2 - Middle (2) H-frames
- 2 - Bottom (1) H-frames
- 4 - 1 3/4" x 6" connecting tubes (4)
- 4 - 1 3/4" x 8-1/2" connecting tubes (5)
- 4 - Anchor feet
- 12 - 1" x 30" flat bars

#### **FASTENERS:**

- 20 - 1/4" x 2 1/4" bolts (A)
- 4 - 1/4" x 2" bolts (B)
- 6 - 1/4" x 3/4" bolts (C)
- 30 - 1/4" locknuts

### **PLUMBING KIT**

#### **PARTS:**

- 3 - 2" bung Buttress
- 3 - 2" bung NPT
- 4 - 3/4" hose barb connection
- 2 - 3/4" threaded nipple
- 2 - 3/4" quarter-turn ball valves
- 4 - stainless steel hose clamps
- 1 - 3/4" hose adapter
- 2 - 3/4" x 18" braided vinyl hose
- 1 - roll of Teflon tape

### **TOOLS NEEDED:**

- 1- Flat Screw Driver (Not Included)
- 2- 7/16" Wrench (Not Included)
- 1- Bung Wrench (Included)



## **STEEL RACK ASSEMBLY:**

**Note:** Hand tighten all nuts and bolts until assembly is complete.

1. Assemble 6 X-frame cross members. Create each X-frame by connecting 2 flat bars using 1/4"x 3/4" (C) bolt and 1/4" locknut. Insert bolt through middle hole in center of the bars and hand-tighten with locknut. Repeat process until all 6 X-frames are assembled.  
*See figure #1*

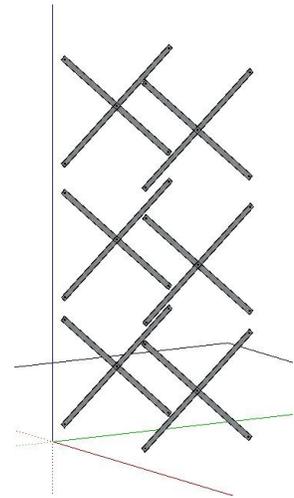


Figure #1

2. Locate 2 Bottom (1) H-frames and 4 anchor feet. Slide anchor foot onto each leg of Bottom (1) H-frame. Insert 1/4"x 2 1/4" (A) bolt from the inside out on each side, connecting anchor foot to Bottom (1) H-frame. Do not screw locknut on yet.  
*See figure #2*

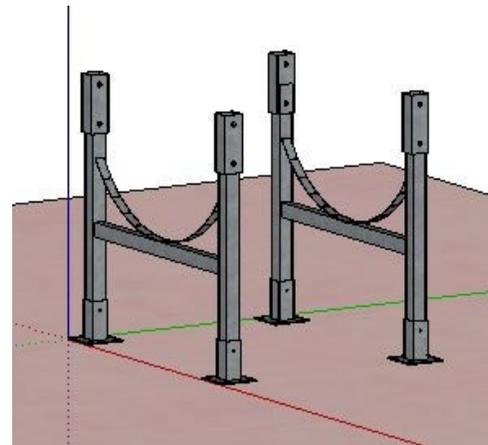


Figure #2

3. Locate 4 – 6" long square connecting tubes. Slide square connection tube over top of the Bottom (1) H-frame (from Step 2). Secure each connection tube by lining up the holes and insert a 1/4"x 2 1/4" (A) bolt from the inside out on each side, connecting square tube to Bottom (1) H-frame. Again do not screw locknut on yet.  
*See figure #2*

4. Attach 2 X-frames assembled in Step 1 to Bottom (1) H-frames used in Step 2. Insert X-frame onto bolts in both of the Bottom (1) H-frames. Hand-tighten each 1/4" nut. Stand up Bottom (1) H-frame.  
*See figure #3*

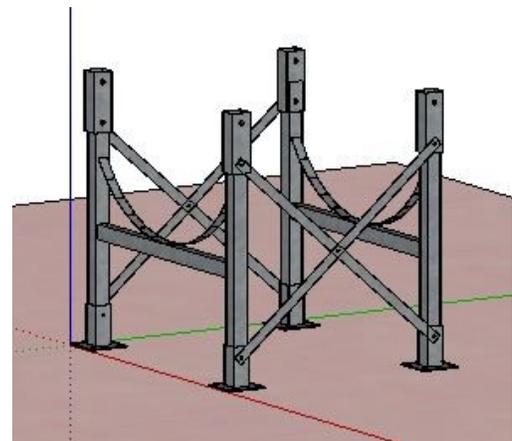


Figure #3

5. Repeat step #4 for opposite side of Bottom (1) H-frame.  
*See figure #3*



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**6.** Locate 2 Middle (2) H-frames. Insert Middle (2) H-frame into square connecting tubes. From the inside out, use 1/4" x 2 1/4" (A) bolts to connect square tube to Middle (2) H-frame. Repeat for opposite side.

*See figure #4*

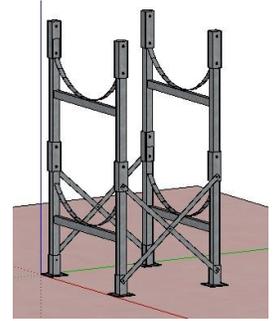


Figure #4

**7.** Connect 2 more X-frames to each side of Middle (2) H-frame. Attach X-frame to H-frame with 1/4"x 2" (B) bolts and 1/4" locknuts.

*See figure #5*

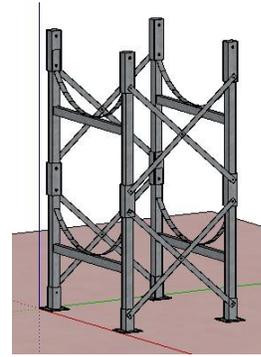


Figure #5

**8.** Locate 2 Top (3) H-frames. Insert Top (3) H-frame into square connecting tubes. From the inside out, use 1/4" x 2 1/4" (A) bolts to connect square tube to Top (3) H-frame. Repeat for opposite side.

*See figure #6*

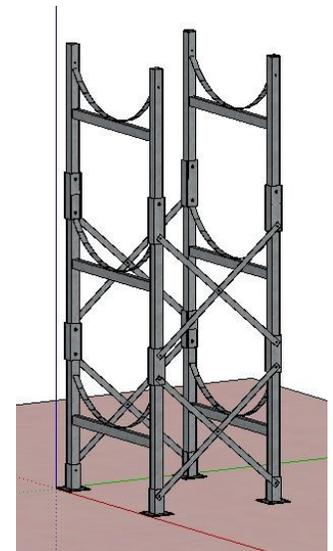


Figure #6

**9.** Connect last 2 X-frames to each side of Top (3) H-frame. Attach X-frame to Top (3) H-frame with 1/4"x 2" (B) bolts and 1/4" locknuts.

*See figure #7*

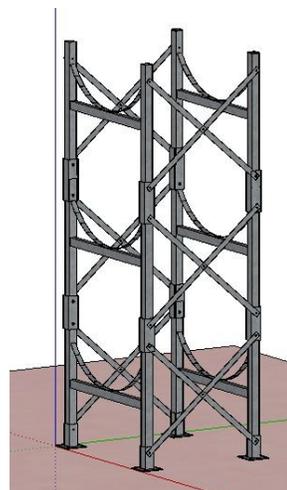


Figure #7

**10.** Tighten all nuts & bolts with wrench.



## How To Apply PTFE Tape on Pipe Threads

### Assembly Procedures

1. For best results, clean all surfaces (external and internal) to remove oil, dirt, and grease.
2. Lay the end of the PTFE tape on threads two threads back from the end of the fitting to begin your wrap.
3. Wrap the tape in the direction of the thread spiral (clockwise as you are looking at threads) to ensure that the tape does not unwrap during assembly. Wrap tape 6-8 complete revolutions.
4. During the wrapping, pull and stretch the tape enough so it pulls down into the threads. After wraps, press on and hold the tape and pull to break.
5. Hand-tighten joints until snug. **DO NOT OVER-TIGHTEN.**

### Cautions

Avoid using too many wraps of PTFE tape. Avoid over-tightening. Doing so will cause thread and joint damage and your barrels will leak.

Fill barrels and test for leaks before adding water preserver (optional) to your barrels.

If joint leaks, disassemble joint and thoroughly clean old PTFE tape partials from both the male and female threads before re-assembling.

Make sure rack/barrels are placed at desired location before filling. **DO NOT MOVE RACK/BARRELS ONCE THEY ARE FILLED WITH WATER.**



## **PLUMBING HARDWARE**

### **PARTS:**

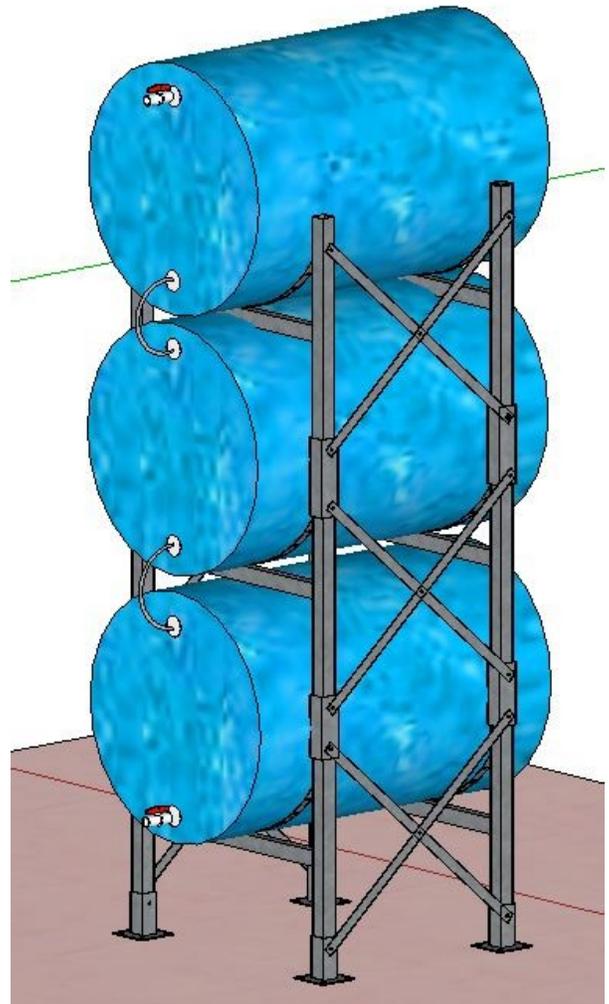
- 3 - 2" Buttruss bung with washer
- 3 - 2" NPT bung with washer
- 2 - 3/4" quarter-turn ball valves
- 2 - 3/4" threaded nipple
- 4 - 3/4" hose barb connection
- 4 - stainless steel hose clamps
- 1 - 3/4" hose adapter
- 2 - 3/4" x 18" braided vinyl hose
- 1 - roll of Teflon tape
- 1 - aluminum bung wrench

### **ASSEMBLY:**

1. Lubricate rubber washers on 2" bungs (barrel plugs) with clean water.
2. Screw in 2" bungs onto 55 gallon drum barrels using provided bung wrench.
3. Slide barrels onto rack and rotate so top and bottom barrel bungs with hose barb connection are in a vertical line with each other.
4. Attach braided vinyl hose to barrels. Slide both hose clamps to center of braided vinyl hose. Press, don't spin, one end of vinyl hose onto bottom barrel hose barb connection and opposite end of vinyl hose onto top barrel hose barb connection. Slide hose clamps over hose barb connections and tighten with a flat-head screwdriver.
5. Wrap Teflon tape around threaded nipples. In a clockwise direction 6-8 wraps around 3/4" threaded nipple on remaining bungs (top and bottom).
6. Screw 1/4 turn ball valve onto 3/4" threaded nipple on each bung until stop (top and bottom). **HAND-TIGHTEN ONLY.**
7. Wrap Teflon tape in clockwise direction 6-8 wraps around hose adapter threads.
8. Screw hose adapter into bottom barrel 1/4 turn ball valve.

### **FILLING BARRELS:**

1. Connect male end of food grade water hose to bottom barrel hose adapter.
2. Open 1/4 turn ball valves (top and bottom).
3. Connect female end of food grade water hose to hose bib (water spigot).
4. Turn on water.
5. Close both 1/4 turn ball valves when barrels are full.
6. Turn off water.
7. Remove hose.



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