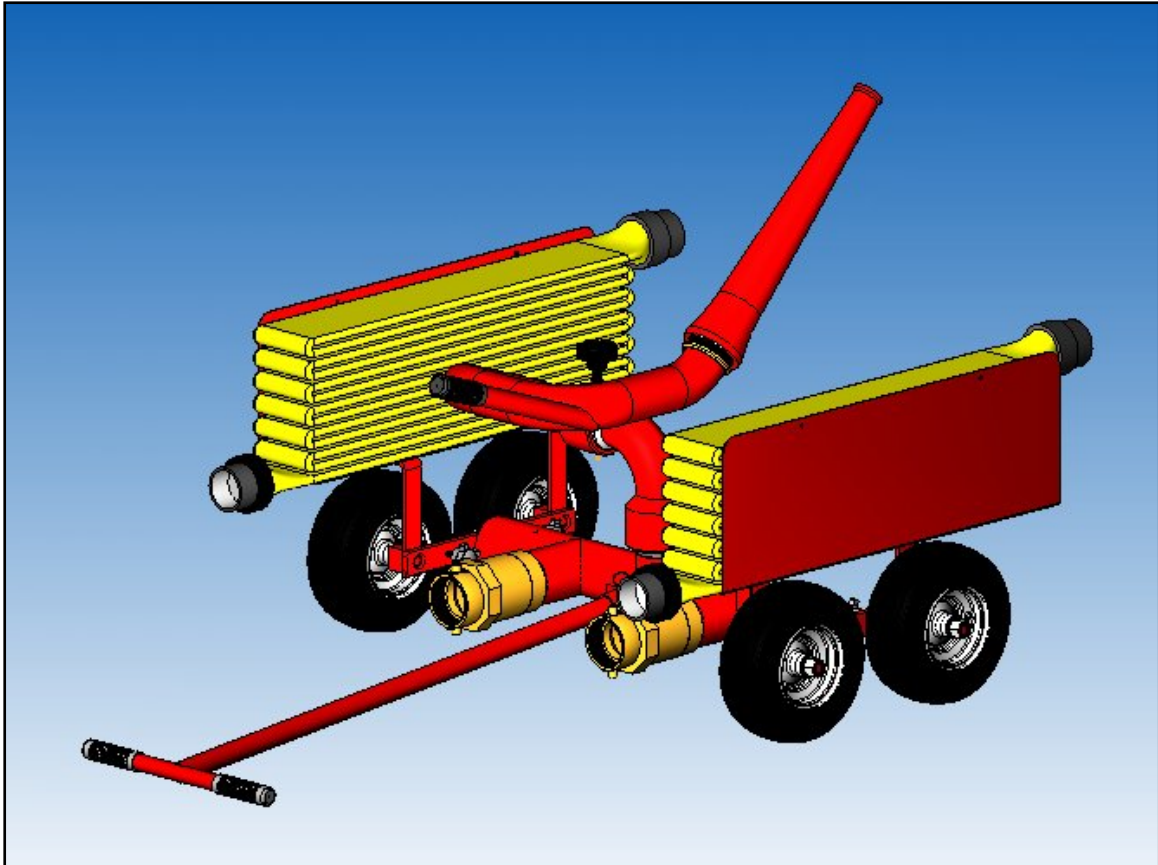




Stang Industrial Products

Operation and Maintenance Manual



2.50" Stang Firefly Model # 100880-1 & 100880-11

1250 Railroad St.
Corona, Ca 92882 USA

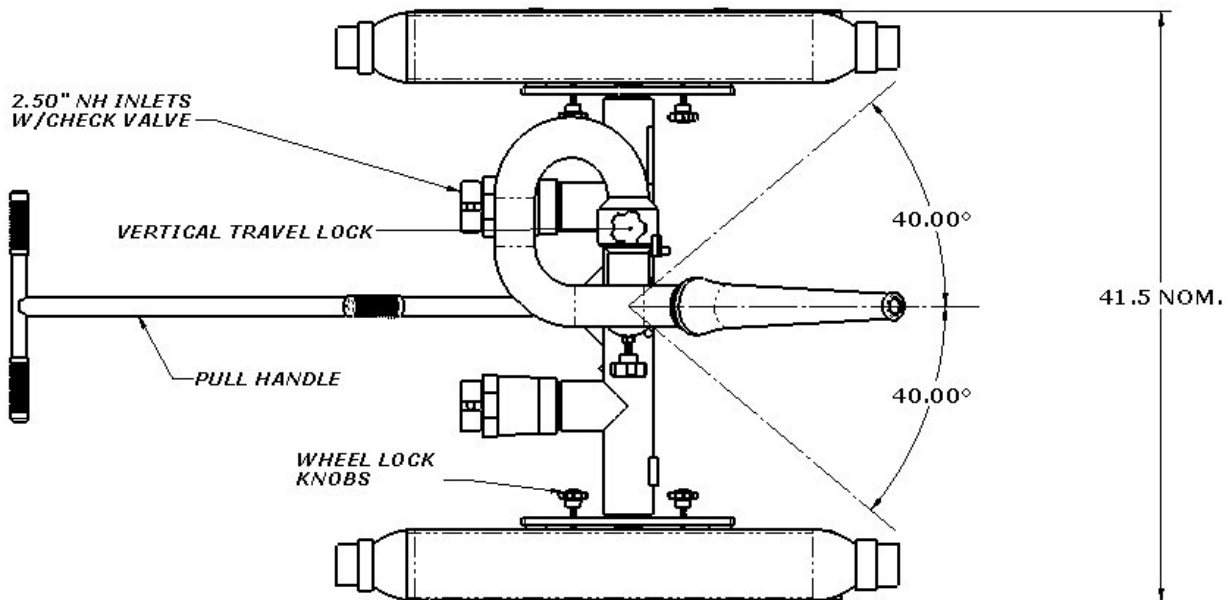
04/2006

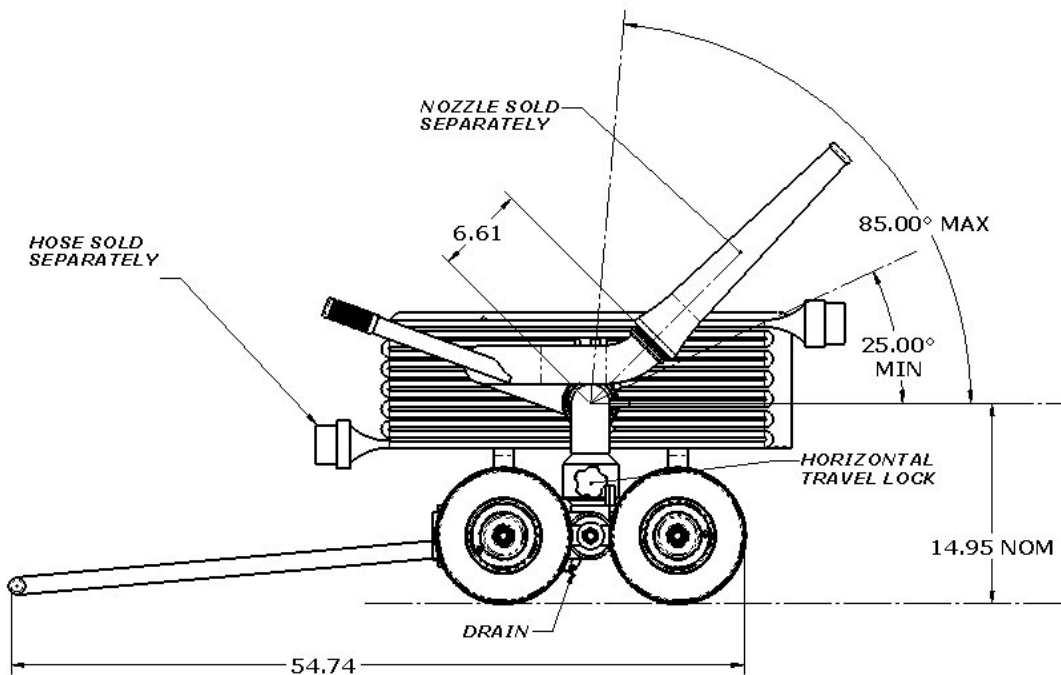
1. Introduction

The Stang 2.50" Firefly is a four wheeled portable monitor used in many different applications such as refineries, mining and waste management facilities. There is a pull handle to roll the unit around, wheel locks to lock the unit down prior to use and two inlets for attaching the fire hose. The Firefly comes in two versions, the Standard (100880-1) & the Deluxe (100880-11). The Deluxe version comes with hose racks, pressure gauge/guard & a cover.

2. Features & Specifications

- a. 2.50" NH female threaded inlets
- b. 2.50" NH male thread on monitor
- c. Foam filled tires for ballast
- d. Powder coated or epoxy coated Stang Red
- e. Aluminum/Bronze swivels
- f. Check valves at the inlet
- g. Drain valve on axle
- h. Lock knobs on monitor
- i. Wheel lock knobs
- j. Pull handle quick release pin
- k. Approx 120lbs.
- l. 750 GPM Max. @ 100 PSI inlet pressure Max
- m. 41.50" width
- n. 22.00" height
- o. 55.00" length





3. Operation

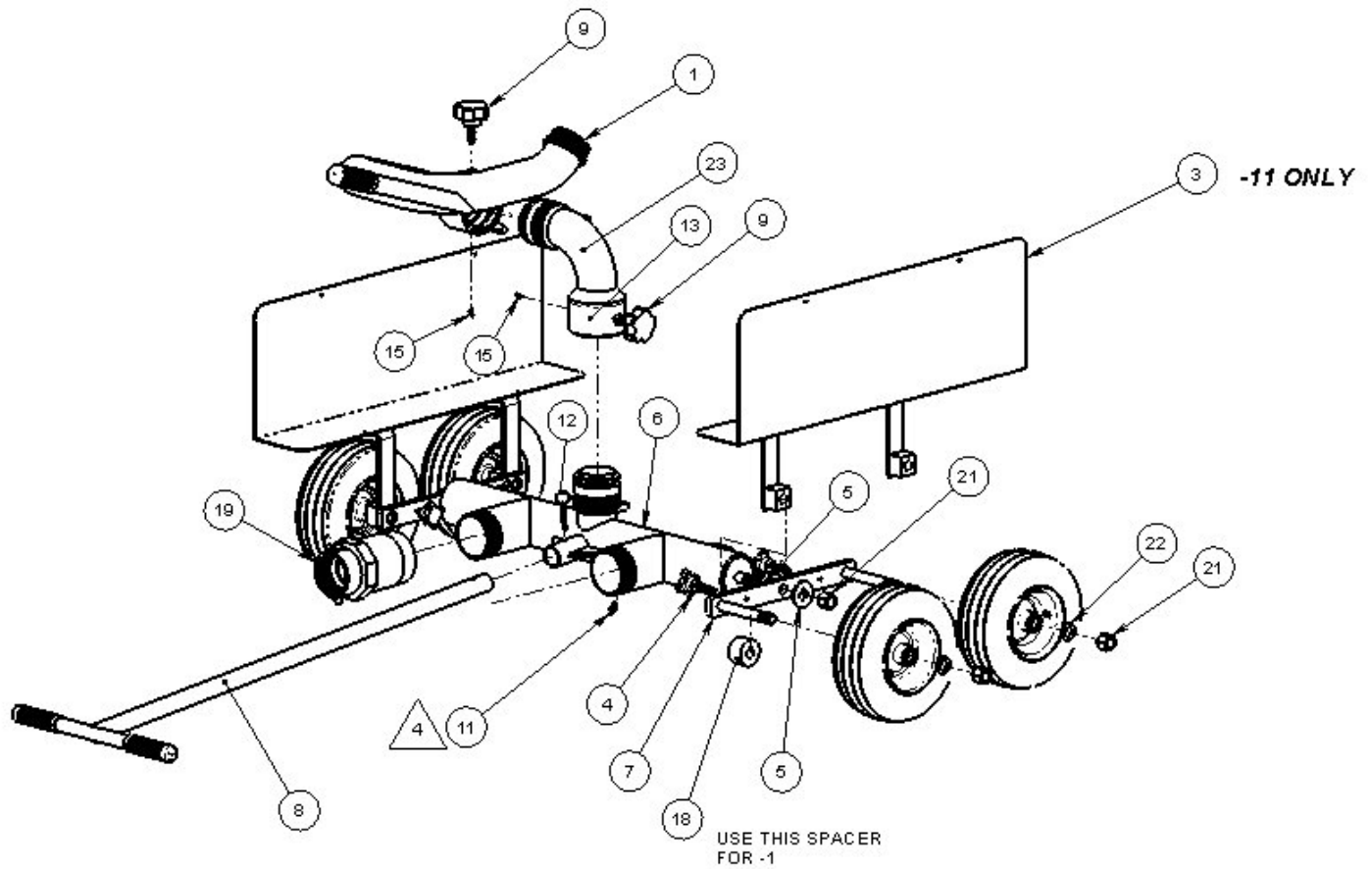
- Set unit to where you want to operate it.
- Lock all wheel locks where so unit will not move.
- Inspect unit to make sure all parts are operational.
- Attach hoses.
- Slowly turn on water to minimize jet reaction shock.

4. Maintenance

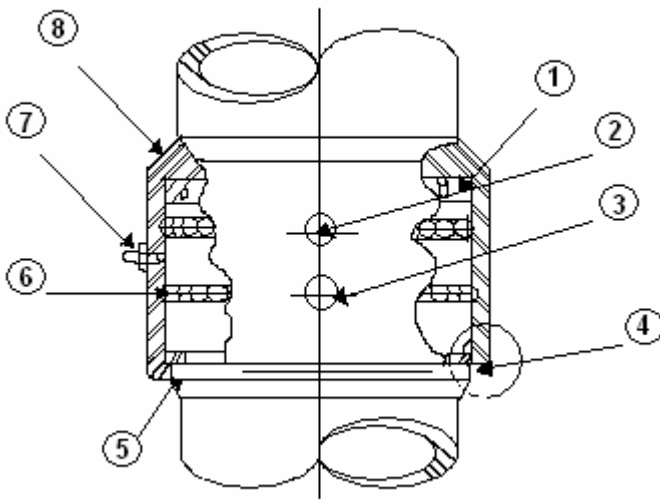
- Keep swivel joints well greased as per swivel grease maintenance instructions.
- Drain axle after using
- Make sure all moving parts are clean & operable
- Do not inflate tires

5. Exploded Parts Drawing

1	1	23	101221-6	ELL, LOWER, 2.50' FIREFLY, STL-AB
4	4	22	101715-75C	WASHER, FLAT, .765ID X1.31OD X.063T, 18-8
6	6	21	100249-13C	NUT, NYLOCK, 3/4-10UNC, 18-8
1	1	20	100853-1	PLATE, ALUM ID (NOT SHOWN)
2	2	19	189450-1	VALVE, ONE-WAY, 2.50NH(F) IN X 3.00NPT(F) OUT, BRASS
-	4	18	100831-3	SPACER, FIREFLY STL WHEEL
4	-	17	100795-1	CORD BUNGEE24L W/HOOKS RED
1	-	16	103782-1	COVER, FIREFLY W/HOSE RACK, PATTERN #1-#16 RED VINYL (NOT SHOWN)
2	2	15	100112-8	FITTING, ZERK, STR, 1/4-28UNF, CRES
1	1	14	100751-1	LABEL, INSTRUCTION
2	2	13	103829-1	SWIVEL KIT, 2.5 NOM.
1	1	12	100789-5	PIN, HITCH, .25Dx1.75 SS
1	1	11	100235-4	VALVE, PETCOCK, .125-27NPT, MFN, #135
1	1	10	100256-8	GRIP, HAND, BLK PLSTC, #RG28055
2	2	9	102537-1	LOCK KNOB, 50-20UNF-2A THD
1	1	8	100834-1	HANDLE, FIREFLY
2	2	7	100830-1	BOGIE WELDMENT, FIREFLY STL
1	1	6	100829-1	WLDMT, AXLE 2-INLET FIREFLY
4	4	5	101989-75	WASHER, FLAT, 2.00D X .813ID X .156THK STL
4	4	4	100983-1	LOCK KNOB ASSY
2	-	3	103106-21	RACK, FIREFLY HOSE
4	4	2	104503-1	WHEEL ASS'Y, FOAM FILLED
1	1	1	103316-111	ELL, 2.5" UPR FIREFLY STD, STL
-11/QTY.	-1/QTY.	ITEM NO.	PART #	DESCRIPTION



6. Swivel Joint Service Instructions



Parts

1. Pressure Seal
2. Ball Retainer Plug
3. Retaining Ring (For Plug)
4. Dirt Seal
5. Inner Race
6. Steel Balls
7. Grease Zerk
8. Outer Race

Equipment Needed

1. Retaining ring pliers (Truarc or equal: #1 internal rings on joints up to 4", and #3 for 6" joints and larger)
2. Sharp pointed tool (Example: alignment punch or ice pick).
3. Solvent to soften grease in ball races.
4. Cleaning material-rags.
5. Lubricant: All purpose grease, grade #2.
6. New Seals.

Maintenance

1. Lubricate swivel joint through grease zerk (7) after each 24 hours of accumulated use.

CAUTION: Excessive grease pressure can cause packing displacement and consequent leakage.

2. Inspect swivel joint at regular intervals for water leakage. If leakage is detected, replace packing as described in the repair procedure.

Repair

1. Disassembly:
 - A. With retaining ring pliers, remove the two retaining rings (3).
 - B. Insert sharp pointed tool into middle of the ball retainer plug (2) and lift at slight angle. The ball retainer plug has a metal plate on top with a small hole in the middle of the plate to aid in removal.
 - C. Rotate swivel joint to allow balls (6) to roll out of races. If grease is thick and heavy, balls may not fall free. Use solvent to clean. Balls will always roll out if races are clean. Parts will disassemble when all the balls have been removed, and the

seals will be exposed. A flexible polyethylene rod or similar tool may be used to push balls from race.

2. Cleaning:

A. Remove old seals (1 & 4) and replace with new parts.

B. Thoroughly clean all parts and apply a thin coat of lubricant around the packing.

Reassembly

1. Replace pressure seal with new part if necessary. Lips must face away from ball grooves. Put small amount of grease on seal to ease reassembly.
3. Replace dirt seal. (Item 4)
4. Press the separate swivel joint races together and drop in the balls until the races are filled.
5. Replace the ball retainer plugs (2).
6. Replace retainer rings (3) with retaining ring pliers.
7. Lubricate the ball race area by using a small hand grease gun to force a small amount of the lubricant through grease zerk (7). Then rotate one portion of the 90% and regrease. Repeat 2 more times.

CAUTION: Do not over grease. Excessive grease pressure can cause leakage and/or difficult rotation.