

Proposal



Project Data

Project No:		Project Name:	Demo Drawing 4
System No:	295515	Location:	MO
Date:	10/15/2025	Layout/BOM No:	295515.01.00
Prepared for:		Layout/BOM Title:	Demo Drawing 4
Prepared by:	Grizzly Industrial - Bellingham, WA Justin Mathis	Product(s):	US-Duct

Calculation Details

Duct Results

Section	Length	Duct Dia.	Duct Volume	Duct Velocity	Duct ΔP
01	2' 11 ¼"	Ø4"	393 CFM	4503 FPM	0.181 inWC
02	5' 8 ½"	Ø4"	393 CFM	4503 FPM	0.351 inWC
03	13' 9 ½"	Ø4"	393 CFM	4503 FPM	1.576 inWC
04	3' 8"	Ø5"	614 CFM	4503 FPM	0.171 inWC
05	5' 8 ½"	Ø5"	614 CFM	4503 FPM	0.266 inWC
06	6' 6 ½"	Ø5"	614 CFM	4503 FPM	0.824 inWC
07	3' 8"	Ø5"	614 CFM	4503 FPM	0.171 inWC
08	5' 8 ½"	Ø5"	614 CFM	4503 FPM	0.857 inWC
09	5' 7 ¾"	Ø7"	1228 CFM	4595 FPM	0.058 inWC
10	3' 8"	Ø4"	393 CFM	4503 FPM	0.226 inWC
11	5' 8 ½"	Ø4"	393 CFM	4503 FPM	1.006 inWC
12	27' 5 ½"	Ø5"	786 CFM	5764 FPM	1.97 inWC
13	5' 2 ½"	Ø5"	786 CFM	5764 FPM	1.309 inWC
14	3' 8"	Ø4"	393 CFM	4503 FPM	0.226 inWC
15	5' 8 ½"	Ø4"	393 CFM	4503 FPM	0.748 inWC
16	4' 11 ¼"	Ø8"	1571 CFM	4501 FPM	-0.135 inWC
17	3' 8"	Ø4"	393 CFM	4503 FPM	0.226 inWC
18	5' 8 ½"	Ø4"	393 CFM	4503 FPM	1.139 inWC
19	5' 2"	Ø8"	1571 CFM	4501 FPM	-0.129 inWC
20	3' 8"	Ø4"	393 CFM	4503 FPM	0.226 inWC
21	5' 8 ½"	Ø4"	393 CFM	4503 FPM	1.139 inWC
22	4' 7 ¾"	Ø8"	1571 CFM	4501 FPM	-0.143 inWC
23	3' 8"	Ø4"	393 CFM	4503 FPM	0.226 inWC
24	5' 8 ½"	Ø4"	393 CFM	4503 FPM	1.139 inWC
25	4' 3 ¼"	Ø8"	1571 CFM	4501 FPM	-0.153 inWC
26	3' 8"	Ø4"	393 CFM	4503 FPM	0.226 inWC
27	5' 8 ½"	Ø4"	393 CFM	4503 FPM	1.139 inWC
28	6' 1"	Ø8"	1571 CFM	4501 FPM	-0.106 inWC
29	4' 1"	Ø4"	393 CFM	4503 FPM	0.251 inWC
30	5' 3 ½"	Ø4"	393 CFM	4503 FPM	1.114 inWC
31	10' 9 ¼"	Ø8"	1571 CFM	4501 FPM	0.279 inWC
32	3' 3"	Ø8"	1571 CFM	4501 FPM	0.383 inWC
33	4' 2"	Ø8"	1571 CFM	4501 FPM	0.407 inWC
34	6' 4 ¼"	Ø4"	393 CFM	4503 FPM	0.391 inWC
35	3' ¼"	Ø4"	393 CFM	4503 FPM	0.344 inWC
36	6' 7"	Ø7"	1179 CFM	4412 FPM	0.194 inWC

37	5' 10 ¾"	ø7"	1179 CFM	4412 FPM	0.367 inWC
38	5' 10 ½"	ø8"	1571 CFM	4501 FPM	0.152 inWC
39	1' 8"	ø8"	1571 CFM	4501 FPM	0.342 inWC

Fan Results

System	Fan Volume	Fan Pressure Requirements
1	1571 CFM	7.725 inWC

Order of Install

Section	Qty Description
39 T	1 Cable Hanger, 15 ft., ø8
39 T	1 59" Pipe Length, ø8, cut to L=6" (Leftover goes in section 16)
39 T	1 90° Elbow, 1.5xD, ø8
38 T	1 Adjustable sleeve, ø8
38 T	1 59" Pipe Length, ø8, cut to L=47 ½" (Leftover is not used)
38 T	1 45° Lateral Branch, ø8-ø8-ø7
37 T	1 Adjustable sleeve, ø7
37 T	1 59" Pipe Length, ø7, cut to L=50 ¼" (Leftover is not used)
37 T	1 45° Elbow, 1.5xD, ø7
36 T	1 Cable Hanger, 15 ft., ø7
36 T	1 Adjustable sleeve, ø7
36 T	1 59" Pipe Length, ø7, cut to L=53" (Leftover is not used)
36 T	1 45° Lateral Branch, ø7-ø5-ø4
33 T	1 Adjustable sleeve, ø8
33 T	1 Cut Pipe Length, ø8, L=19" (Leftover from section 32)
33 T	1 90° Elbow, 1.5xD, ø8
32 T	1 Cable Hanger, 15 ft., ø8
32 T	1 Adjustable sleeve, ø8
32 T	1 59" Pipe Length, ø8, cut to L=11" (Leftover goes in section 33)
32 T	1 90° Elbow, 1.5xD, ø8
31 T	2 Cable Hanger, 15 ft., ø8
31 T	1 Adjustable sleeve, ø8
31 T	1 59" Pipe Length, ø8, cut to L=36 ¾" (Leftover is not used)
31 T	1 59" Pipe Length, ø8
31 T	1 45° Lateral Branch, ø8-ø8-ø4
28 T	1 Cable Hanger, 15 ft., ø8
28 T	1 Adjustable sleeve, ø8
28 T	1 59" Pipe Length, ø8, cut to L=53" (Leftover is not used)
28 T	1 45° Lateral Branch, ø8-ø8-ø4
25 T	1 Cable Hanger, 15 ft., ø8
25 T	1 Adjustable sleeve, ø8
25 T	1 59" Pipe Length, ø8, cut to L=31 ¼" (Leftover is not used)
25 T	1 45° Lateral Branch, ø8-ø8-ø4
22 T	1 Cable Hanger, 15 ft., ø8
22 T	1 Adjustable sleeve, ø8
22 T	1 59" Pipe Length, ø8, cut to L=35 ¾" (Leftover is not used)
22 T	1 45° Lateral Branch, ø8-ø8-ø4
19 T	1 Cable Hanger, 15 ft., ø8
19 T	1 Adjustable sleeve, ø8
19 T	1 59" Pipe Length, ø8, cut to L=42" (Leftover is not used)
19 T	1 45° Lateral Branch, ø8-ø8-ø4

16 T	1 Cable Hanger, 15 ft., ø8
16 T	1 Adjustable sleeve, ø8
16 T	1 Cut Pipe Length, ø8, L=39 ¼" (Leftover from section 39)
16 T	1 45° Lateral Branch, ø8-ø7-ø4
13 T	1 Cable Hanger, 15 ft., ø5
13 T	1 Adjustable sleeve, ø5
13 T	1 Cut Pipe Length, ø5, L=50 ½" (Leftover from section 12)
13 T	1 90° Elbow, 1.5xD, ø5
12 T	3 Cable Hanger, 15 ft., ø5
12 T	1 Adjustable sleeve, ø5
12 T	1 59" Pipe Length, ø5, cut to L=3 ½" (Leftover goes in section 13)
12 T	5 59" Pipe Length, ø5
12 T	1 45° Lateral Branch, ø5-ø4-ø4
09 T	1 Cable Hanger, 15 ft., ø7
09 T	1 Adjustable sleeve, ø7
09 T	1 59" Pipe Length, ø7, cut to L=45" (Leftover is not used)
09 T	1 45° Lateral Branch, ø7-ø5-ø5
35 D	1 45° Elbow, 1.5xD, ø4
35 D	1 Adjustable sleeve, ø4
35 D	1 59" Pipe Length, ø4, cut to L=17 ¼" (Leftover Is Not used)
34 D	1 Cut-Off Full
34 D	1 Flex Hose, ø4, L=76 ¼"
34 D	1 Hose Adapter, ø4
30 D	1 45° Elbow, 1.5xD, ø4
30 D	1 Adjustable sleeve, ø4
30 D	1 59" Pipe Length, ø4, cut to L=43 ½" (Leftover is not used)
29 D	1 Cut-Off Full
29 D	1 Flex Hose, ø4, L=49"
29 D	1 Hose Adapter, ø4
27 D	1 45° Elbow, 1.5xD, ø4
27 D	1 Adjustable sleeve, ø4
27 D	1 59" Pipe Length, ø4, cut to L=48 ½" (Leftover is not used)
26 D	1 Cut-Off Full
26 D	1 Flex Hose, ø4, L=44"
26 D	1 Hose Adapter, ø4
24 D	1 45° Elbow, 1.5xD, ø4
24 D	1 Adjustable sleeve, ø4
24 D	1 59" Pipe Length, ø4, cut to L=48 ½" (Leftover is not used)
23 D	1 Cut-Off Full
23 D	1 Flex Hose, ø4, L=44"
23 D	1 Hose Adapter, ø4
21 D	1 45° Elbow, 1.5xD, ø4
21 D	1 Adjustable sleeve, ø4
21 D	1 59" Pipe Length, ø4, cut to L=48 ½" (Leftover is not used)
20 D	1 Cut-Off Full
20 D	1 Flex Hose, ø4, L=44"
20 D	1 Hose Adapter, ø4
18 D	1 45° Elbow, 1.5xD, ø4
18 D	1 Adjustable sleeve, ø4
18 D	1 59" Pipe Length, ø4, cut to L=48 ½" (Leftover is not used)
17 D	1 Cut-Off Full
17 D	1 Flex Hose, ø4, L=44"
17 D	1 Hose Adapter, ø4
15 D	1 45° Elbow, 1.5xD, ø4
15 D	1 Adjustable sleeve, ø4

15 D	1 59" Pipe Length, ø4, cut to L=48 ¾" (Leftover is not used)
14 D	1 Cut-Off Full
14 D	1 Flex Hose, ø4, L=44"
14 D	1 Hose Adapter, ø4
11 D	1 45° Elbow, 1.5xD, ø4
11 D	1 Adjustable sleeve, ø4
11 D	1 59" Pipe Length, ø4, cut to L=50 ¼" (Leftover is not used)
10 D	1 Cut-Off Full
10 D	1 Flex Hose, ø4, L=44"
10 D	1 Hose Adapter, ø4
08 D	1 45° Elbow, 1.5xD, ø5
08 D	1 Adjustable sleeve, ø5
08 D	1 Cut Pipe Length, ø5, L=48" (Leftover from section 06)
07 D	1 Cut-Off Full
07 D	1 Flex Hose, ø5, L=44"
07 D	1 Hose Adapter, ø5
06 D	1 Cable Hanger, 15 ft., ø5
06 D	1 Adjustable sleeve, ø5
06 D	1 59" Pipe Length, ø5, cut to L=7 ¼" (Leftover goes in section 08)
06 D	1 59" Pipe Length, ø5
06 D	1 90° Elbow, 1.5xD, ø5
05 D	1 Adjustable sleeve, ø5
05 D	1 59" Pipe Length, ø5, cut to L=57" (Leftover is not used)
04 D	1 Cut-Off Full
04 D	1 Flex Hose, ø5, L=44"
04 D	1 Hose Adapter, ø5
03 D	2 Cable Hanger, 15 ft., ø4
03 D	1 Adjustable sleeve, ø4
03 D	1 59" Pipe Length, ø4, cut to L=37" (Leftover is not used)
03 D	2 59" Pipe Length, ø4
03 D	1 90° Elbow, 1.5xD, ø4
02 D	1 Adjustable sleeve, ø4
02 D	1 59" Pipe Length, ø4, cut to L=58 ½" (Leftover is not used)
01 D	1 Cut-Off Full
01 D	1 Flex Hose, ø4, L=35 ¼"
01 D	1 Hose Adapter, ø4

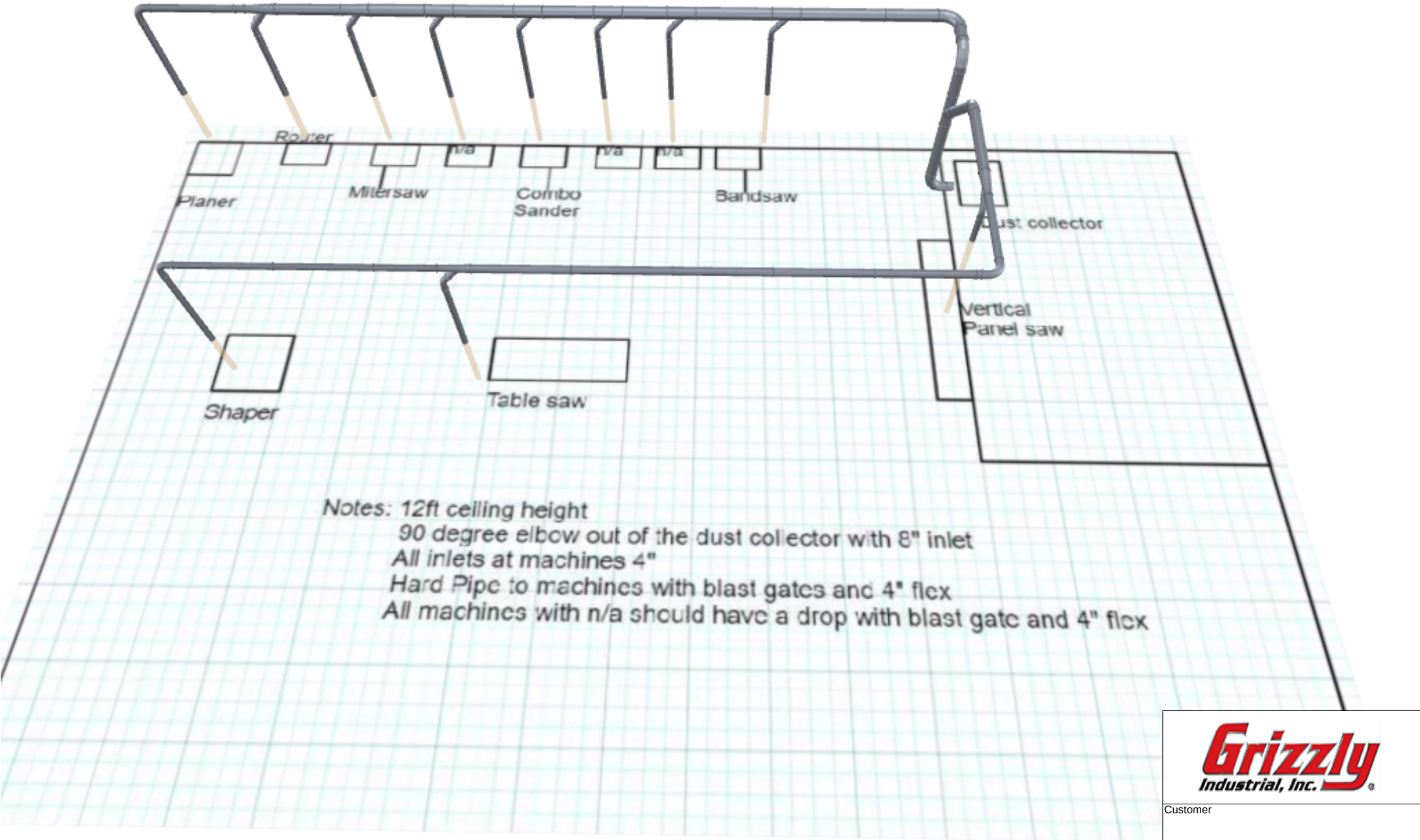
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Unless otherwise stated, packaging and shipping charges will be added after the items have shipped.

- DuctQuote.com is designed to ensure ductwork is sized for proper air velocity and volume only. All issues related to safety and duct supports as well as compliance with industrial or governmental guidelines, codes and regulations are the responsibility of the customer and end user.
- Duct Quote users are responsible for reviewing their layouts and Bill of Materials to confirm their order accuracy.
- Duct Quotes are covered under the **"The Incredible Guarantee"**. For details see our website <https://www.us-duct.com/blog/when-it-comes-delivery-incredible-guarantee>.
- US Duct standard Terms & Conditions Apply. These can be viewed at www.us-duct.com.
- All prices are subject to change based on metal pricing or system changes.
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This quote specifies US Duct products which have been selected by the customer named on this quote. Any other quote must provide the following to be equivalent.

- a. This quote submittal provides 3D images of the ducting system which can be accessed online. These online images allow display of diameters of duct sections.
- b. The 3D images are able to index each duct section with a reference number.
- c. This submittal can include a report of pressure calculations upon request to the dealer named on this quote. This report can show pressure loss information for each duct section in the system.
- d. The pressure calculations must show, at a minimum, Loss Coefficient, Air volume, Air Velocity, Velocity Pressure and Static pressure for all sections.
- e. This quote submittal can include installation instructions specific to the system(s) being quoted. These instructions should include lengths to cut duct sections if any cutting is required. If the remaining duct piece can be used elsewhere in the system, the instructions should indicate where it can be used. This can be obtained from the dealer named on this quote.
- f. This quote submittal can include a Bill of Materials (BoM) listing all parts needed in the quoted system. The BoM is accessible online with a secure login.
- g. The 3D model of the system(s) should be available as either an STL or IFC file format.
- h. Any Spark Trap must be a US Duct patented Spark Trap or equivalent.
- i. Duct fittings (elbows and branches) must allow for adjustability in connections.
- j. All clamps in clamping duct systems must be made of 304 stainless steel.
- k. Any airtight ducting sections must be US Duct "US Tubing" Clamp together, airtight duct or equivalent.
- l. Ducting not requiring airtight connections must be US Duct Rolled Lip Clamp together duct or equivalent.



Notes: 12ft ceiling height
90 degree elbow out of the dust collector with 8" inlet
All inlets at machines 4"
Hard Pipe to machines with blast gates and 4" flex
All machines with n/a should have a drop with blast gate and 4" flex



Customer		
Project Demo Drawing 4		
Layout Demo Drawing 4		
Date 10/15/2025	By Justin Mathis	
System No 295515	Ref.No	Scale None

