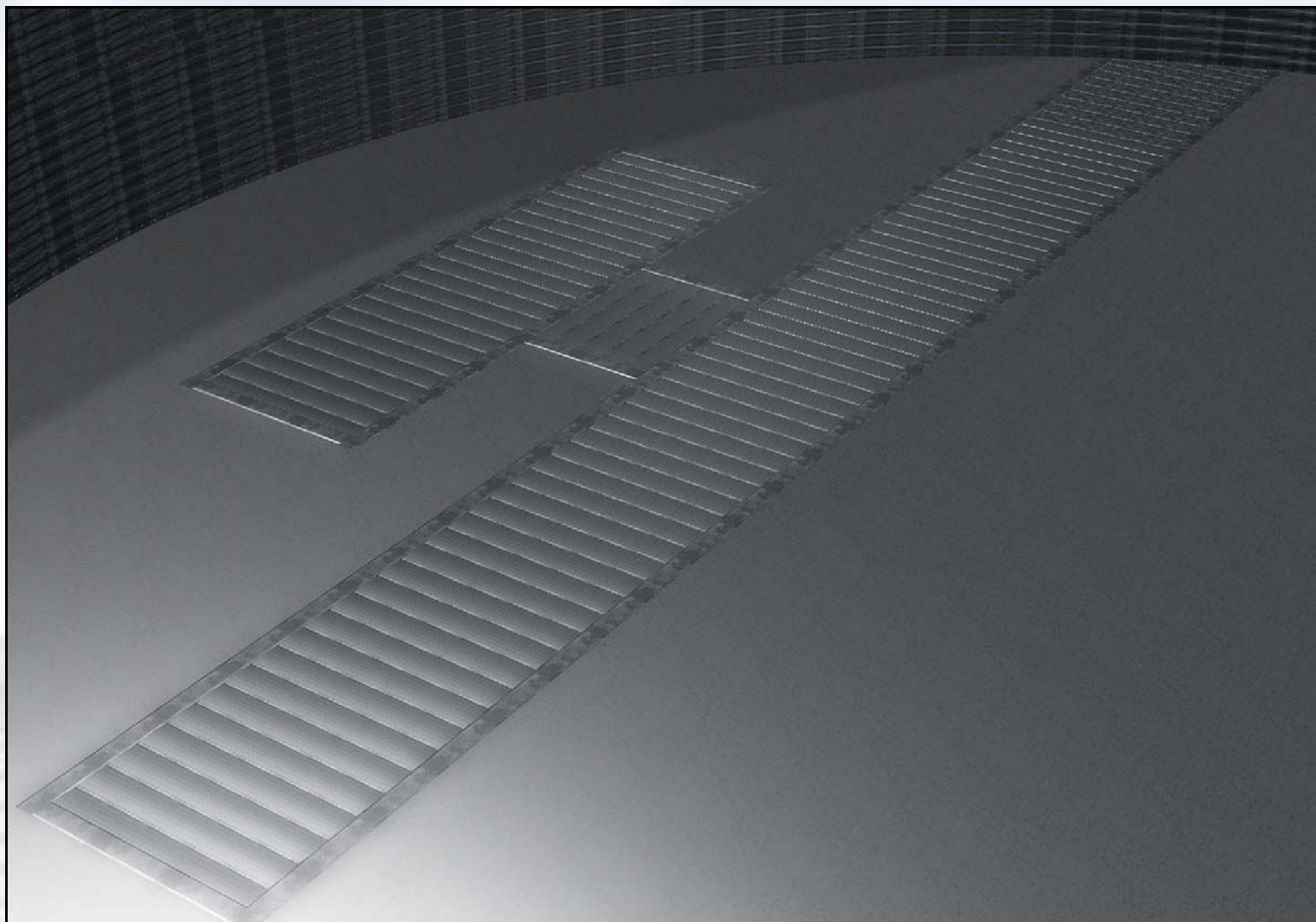


GRAIN GUARD

TUNNEL AERATION FLOOR INSTALLATION MANUAL



ORIGINAL INSTRUCTIONS



Read this manual before using product. Failure to follow instructions and safety precautions can result in serious injury, death, or property damage. Keep manual for future reference.

Part Number: PZL-17730 R0

Revised: Aug/13

AGI
AG GROWTH INTERNATIONAL

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1. Safety

1.1. GENERAL SAFETY INFORMATION



The Safety Alert symbol identifies important safety messages on the product and in the manual. When you see this symbol, be alert to the possibility of personal injury or death. Follow the instructions in the safety messages.

Why is SAFETY important?

- Accidents disable and kill.
- Accidents cost.
- Accidents can be avoided.

SIGNAL WORDS: Note the use of the signal words **DANGER**, **WARNING**, **CAUTION**, and **NOTICE** with the safety messages. The appropriate signal word for each message has been selected using the definitions below as a guideline.

DANGER



Indicates an imminently hazardous situation that, if not avoided, will result in serious injury or death.

WARNING



Indicates a hazardous situation that, if not avoided, could result in serious injury or death.

CAUTION



Indicates a hazardous situation that, if not avoided, may result in minor or moderate injury.

NOTICE

Indicates a potentially hazardous situation that, if not avoided, may result in property damage.

YOU are responsible for the **SAFE** use and maintenance of your equipment. **YOU** must ensure that you and anyone else who is going to work around the equipment understands all procedures and related **SAFETY** information contained in this manual.

Remember, **YOU** are the key to safety. Good safety practices not only protect you, but also the people around you. Make these practices a working part of your safety program.

Important: *Below are general instructions that apply to all safety practices. Any instructions specific to a certain safety practice (e.g., Operational Safety), can be found in the appropriate section. Always read the complete instructional sections and not just these safety summaries before doing anything with the equipment.*



- It is the equipment owner, operator, and maintenance personnel's responsibility to read and understand **ALL** safety instructions, safety decals, and manuals and follow them when assembling, operating, or maintaining the equipment. All accidents can be avoided.
- Equipment owners must give instructions and review the information initially and annually with all personnel before allowing them to operate this product. Untrained users/operators expose themselves and bystanders to possible serious injury or death.
- Use this equipment for its intended purposes only.
- Do not modify the equipment in any way without written permission from the manufacturer. Unauthorized modification may impair the function and/or safety, and could affect the life of the equipment. Any unauthorized modification of the equipment voids the warranty.
- Do not allow any unauthorized person in the work area.

1.2. ASSEMBLY SAFETY

- Have 2 people handle the heavy, bulky components.
- Stay away from overhead power lines and other obstructions during assembly. Contact with power lines can cause electrocution.
- Tighten all fasteners to their specified torque before using the equipment.
- Do not work in high winds.
- Edges of floor planks, supports, and other components may be sharp and can cut. Handle with care and wear protective gloves and clothing when handling.
- When welding, use personal protective equipment such as welding helmet or face shield, tinted safety goggles, earplugs, gloves and protective clothing.

2. Installation

WARNING *Before continuing, ensure you have read and understand the relevant information in the safety section. Safety information is provided to help prevent serious injury, death, or property damage.*

2.1. PRE-FLOOR INSTALLATION

2.1.1. CHECK SHIPMENT

Unload the parts at the assembly site and compare the bill of materials to the shipment. Ensure that all items have arrived and that none are damaged.

It is important to report missing or damaged parts immediately to ensure that proper credit is received and to ensure that any missing parts can be shipped quickly to avoid holding up the assembly process.

2.1.2. STORAGE FOR GALVANIZED STEEL PARTS

Galvanized steel is coated with zinc to protect it from rust. If moisture (rain or condensation) gets in between the materials, and is not dried immediately, white rust can occur and the zinc that is intended to protect the steel will be consumed by oxidation.

To prevent white rust, follow the safety instructions below.

Keep all bundles dry and assemble as soon as possible. If parts become wet, wipe them down and apply petroleum jelly or food-grade oil with a clean, lint-free cloth.

Storage of materials prior to installation:

- Keep all materials dry. If unable to store materials in a reliably dry location, cover with a well-secured water-proof tarp.
- Raise all materials 6" - 8" off of ground for storage, on wood blocks or timbers.

Note: *Brace materials properly to avoid damage or injury from material falling when in storage*

If parts become wet:

- Open bundles as soon as possible.
- Separate materials until dry.
- Wipe down parts and apply petroleum jelly or food-grade oil with a clean, lint-free cloth.
- If left uncared-for, white rust can turn into red rust, which can be a structural concern. Immediately replace any part with red rust on it.

2.1.3. FOUNDATION

Important: Refer to the foundation section of the bin assembly manual to ensure foundation was adequately constructed to withstand the design load it is intended to carry and to ensure it conforms with the soil bearing capacity and complies with all applicable local codes and standards. Refer to Figure 2.1 for the bin foundation with typical 48" and 60" tunnel.

1. Ensure the foundation is level and free from any recess, dips and bumps.
2. Refer to bin installation manual to verify the bin wall is securely fastened/ anchored to the foundation.

NOTICE

If the foundation is not level or the bin wall is not securely fastened to the foundation, damage to the floor or bin may occur.

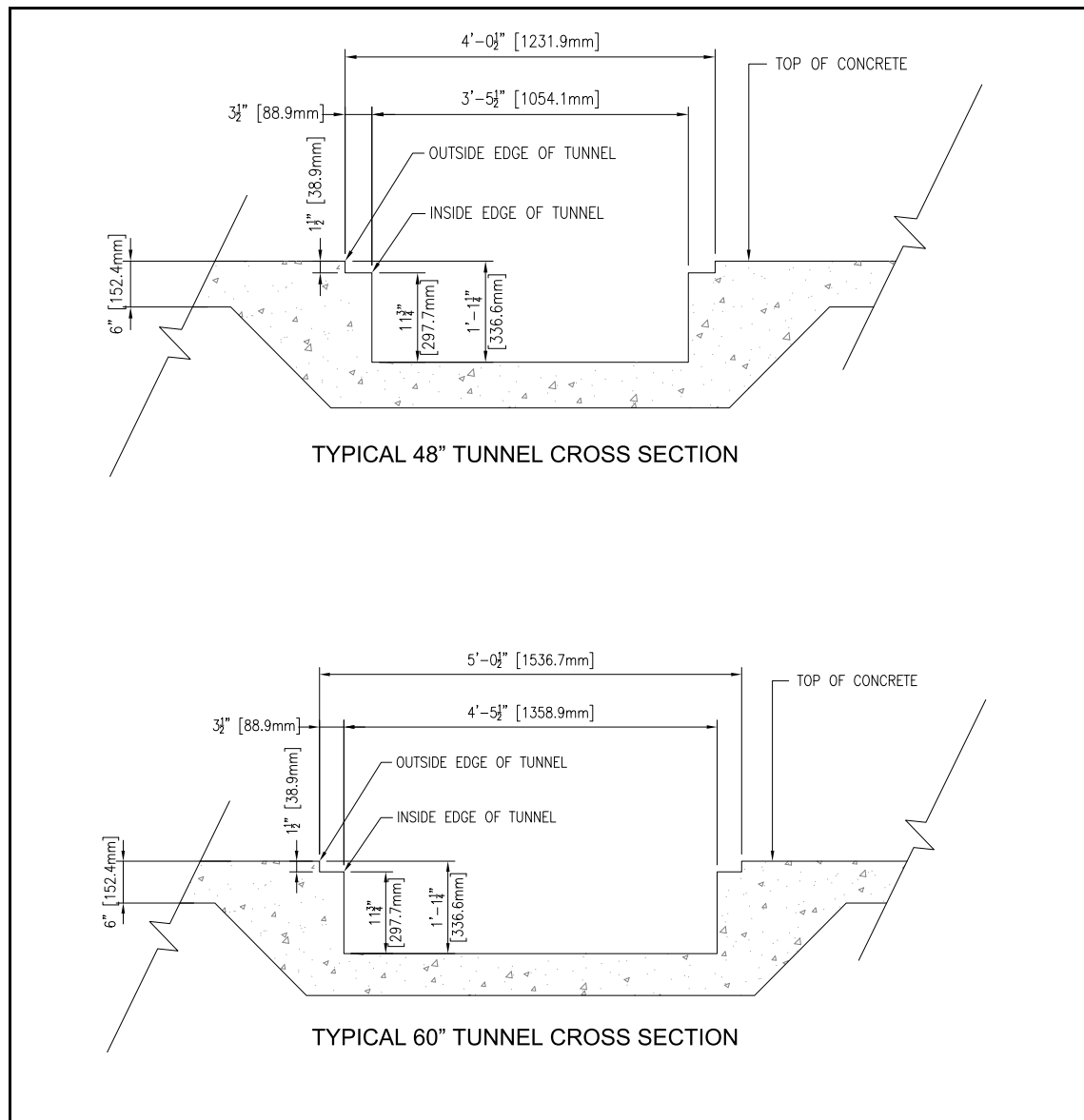


Figure 2.1

2.1.4. FAN AND UNLOAD EQUIPMENT

The locations of fan and unload equipment are determined by the design and type of system. Prior to the installation of the aeration floor, ensure that the fans and unload equipment do not interfere with the proper placement of any floor planks or floor supports.

2.2. FLOOR PARTS

1. Figure 2.2 shows the type of supports and configurations available with Grain Guard flooring packages.
2. See "Appendix" on pages 21 - 24 for the recommended quantity and gauge of the floor parts given the bin diameter and the number of bin rings.

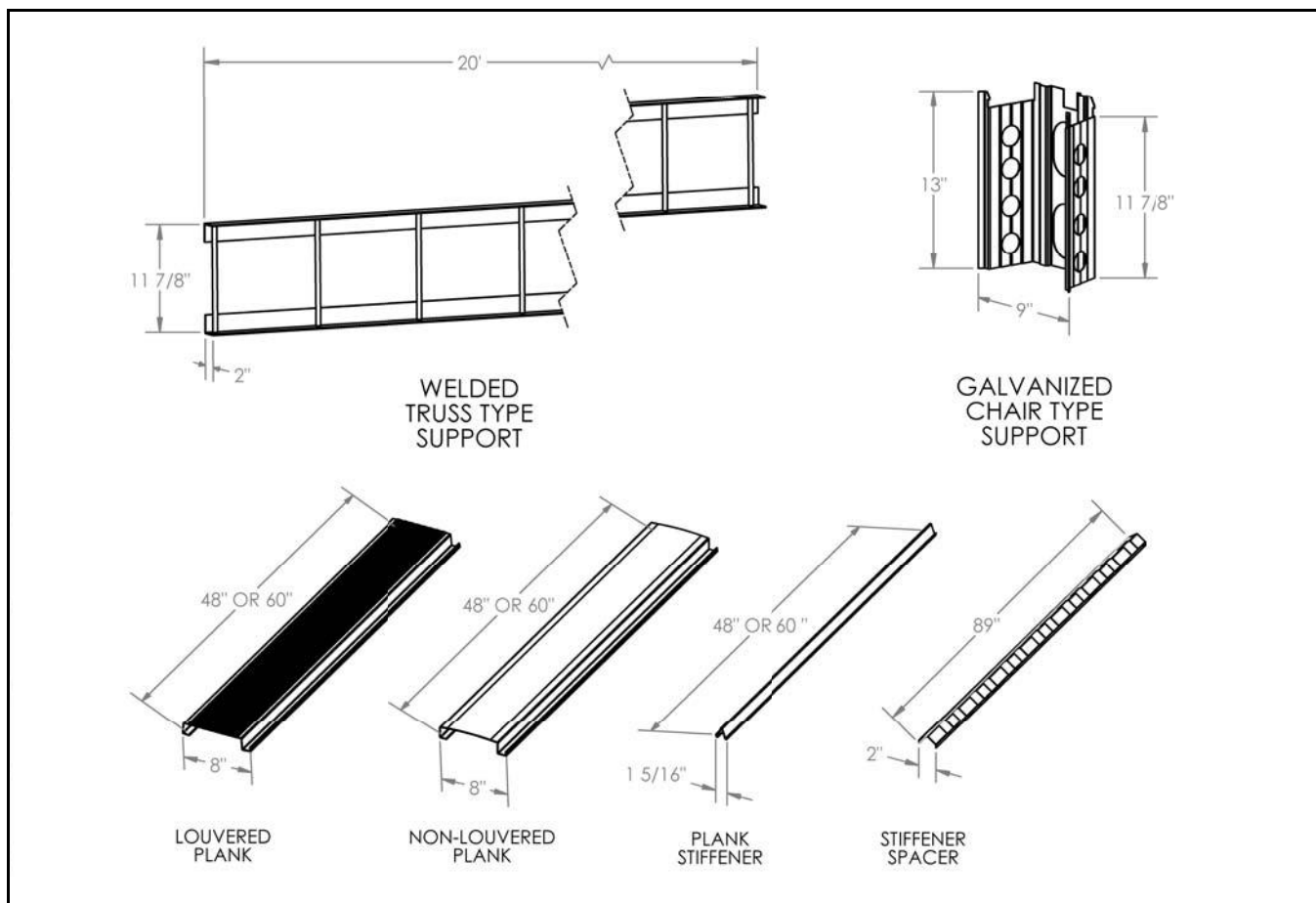


Figure 2.2

2.3. FLOOR SUPPORT LAYOUT

1. For each tunnel, mark the center of the tunnel width and extend this point to draw a line parallel to the tunnel length, dividing the tunnel into two equal parts.
2. Select the appropriate floor support layout spacing (distance X) from the table in Appendix section. Also from the selected table, identify if the number of rows is odd or even.

- If odd number, the centerline drawn in step 1 is considered as a layout line (Figure 2.3A). From this line, measure distance X to mark the succeeding layout lines. Continue measuring and marking distance X until the whole tunnel width is covered.
 - If even number, $1/2 X$ is measured away from both sides of the centerline (Figure 2.3B) and then mark these two points. These two points represent two layout lines. From these lines, mark the succeeding layout lines as described above.
3. Using a chalk line or other marking tool, extend and trace the marks covering the tunnel length. These lines represent the layout lines for the floor support. Ensure the layout lines are parallel with each other.

Note: *The spacing between the tunnel wall and the outer row of the floor supports should be less than the distance X.*

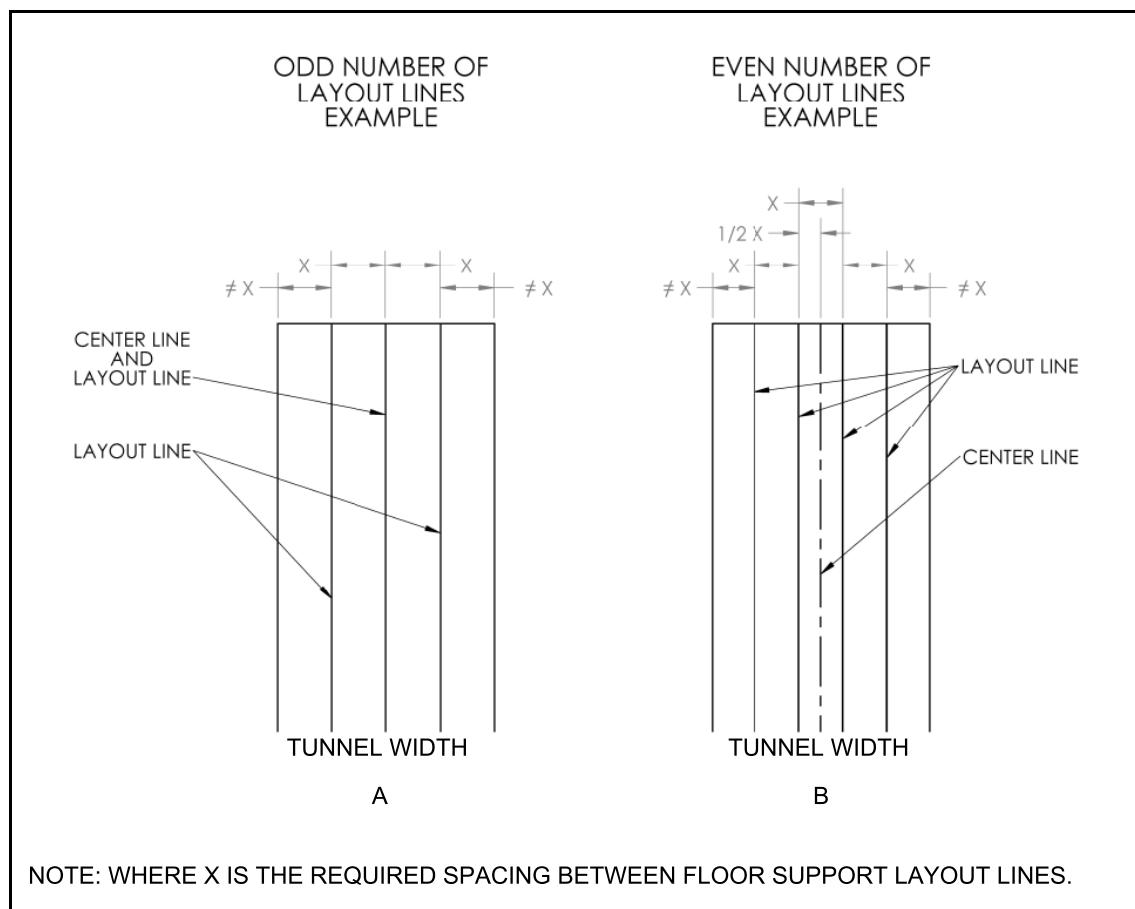


Figure 2.3

2.4. FLOOR SUPPORT INSTALLATION

2.4.1. GALVANIZED CHAIR TYPE FLOOR SUPPORT

1. Starting as close to the end of the tunnel as possible, place the first floor support on alternating layout lines (Figure 2.4A). If plank stiffeners are included in the package, place the first stiffener as well (Figure 2.4B).

Note: *Plank stiffeners should be placed in the notches on top of the chair supports.*

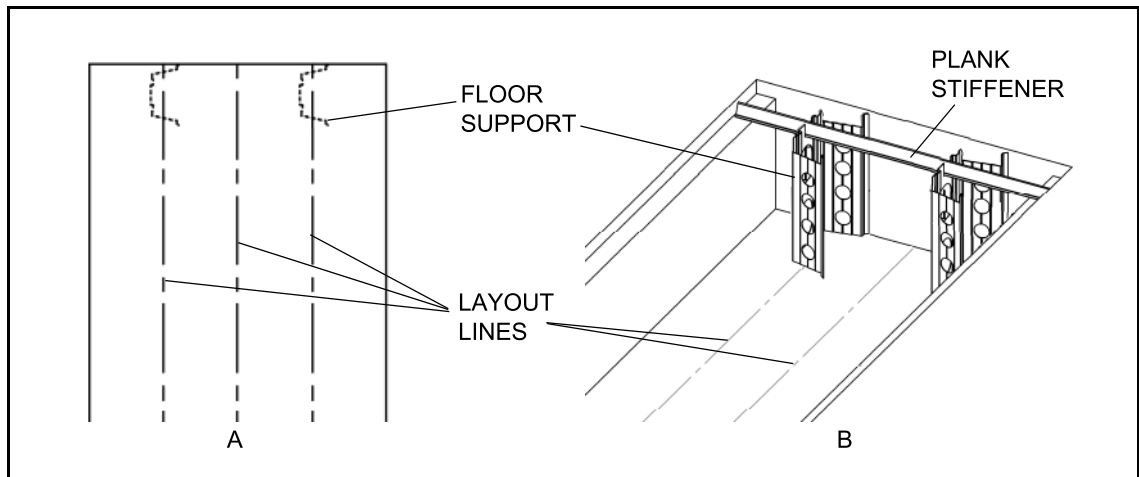


Figure 2.4

2. Place the first floor support on the skipped layout line(s) in step 1 approximately 11-1/2" from the tunnel end (Figure 2.5A). Place the plank stiffener when included (Figure 2.5B).

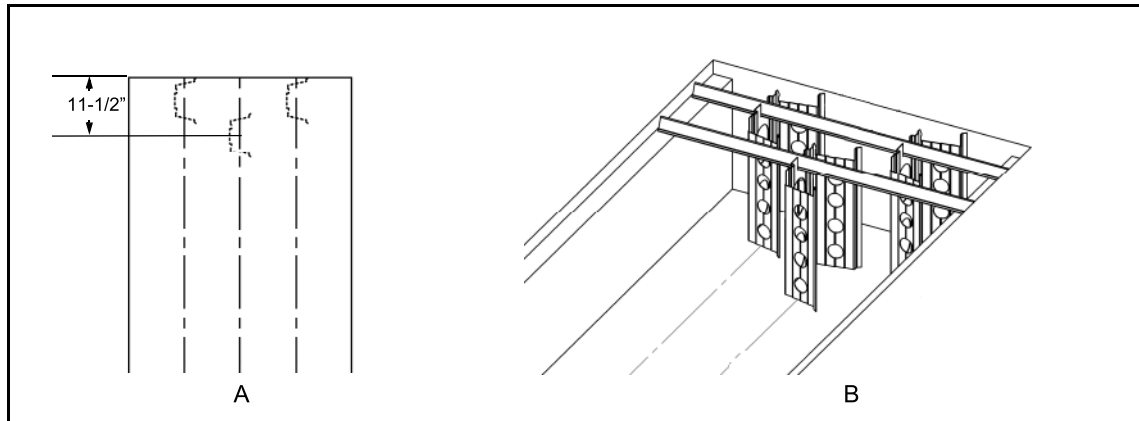


Figure 2.5

3. Offset the next floor support on each layout lines by 14" from the previous floor support (Figure 2.6). Supports on adjacent layout lines are offset by 7". Place the plank stiffener when included.
4. Place the first louvered plank on top of supports. Ensure the straight edge is against the end of the tunnel and lock into position. Check if the supports remain vertical and still in correct spacing.
5. Add another row of supports by following step 3. Install second plank by placing its open edge channel into the supports and then pushing the straight edge down until it locks into the open edge channel of the first plank (Figure 2.7).

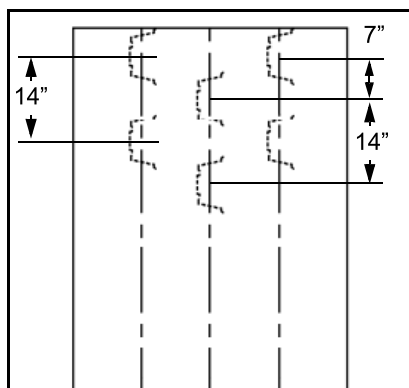


Figure 2.6

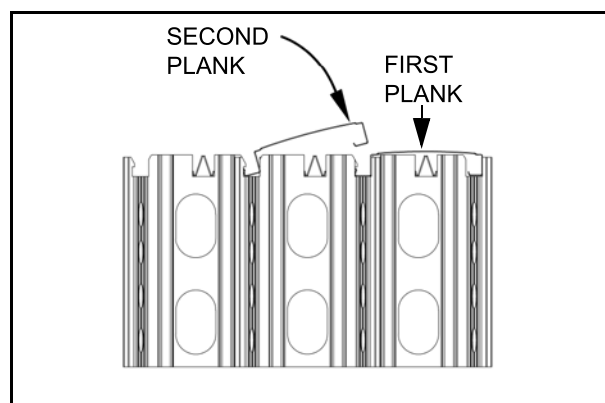


Figure 2.7

6. Continue adding floor supports, placing stiffeners (when included) and installing the louvered floor planks. Always ensure that the supports are vertical and still in required spacing.

Note: *During assembly, it is recommended to always have one row of supports ahead of the desired plank placement.*

7. When working around tunnel intersections, extra supports will be required to support the plank ends (Figure 2.8).

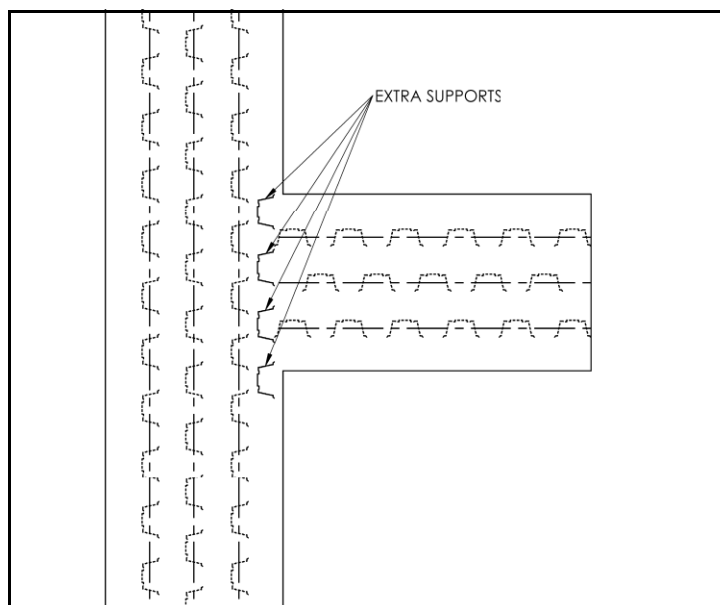


Figure 2.8

2.4.2. WELDED TRUSS TYPE FLOOR SUPPORT

1. Place the truss type floor support on top of the layout lines. These supports will need to be cut to size or welded to another floor support to fit into the tunnel length. Refer to Figure 2.9 for the typical truss type support layout pattern.

Note: *Welded truss type floor supports are shipped in standard 20' length.*

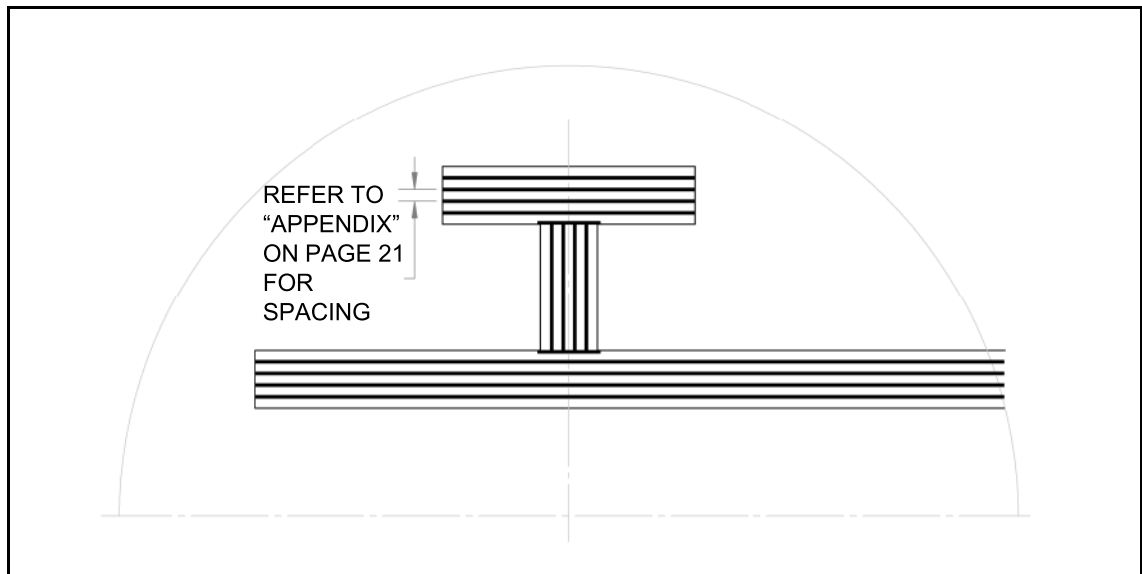


Figure 2.9

2. When cutting or welding truss support, ensure the unsupported chord length or web spacing does not exceed $\frac{1}{2}$ of the original web spacing. Weld additional web when necessary (Figure 2.10).

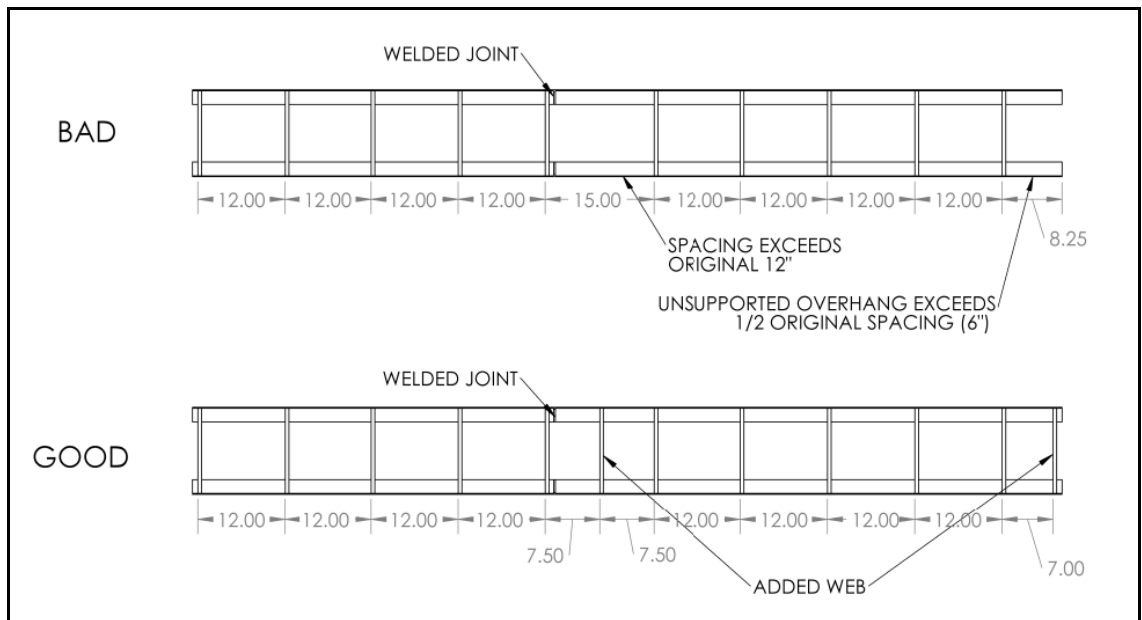


Figure 2.10

3. Once all trusses for a tunnel have been made to length, cut $\frac{1}{2}$ " rod into suitable lengths to join the supports together. The length and quantity will depend on the number of supports and the length of the tunnel. Weld a rod every 4' alternating top and bottom chords.

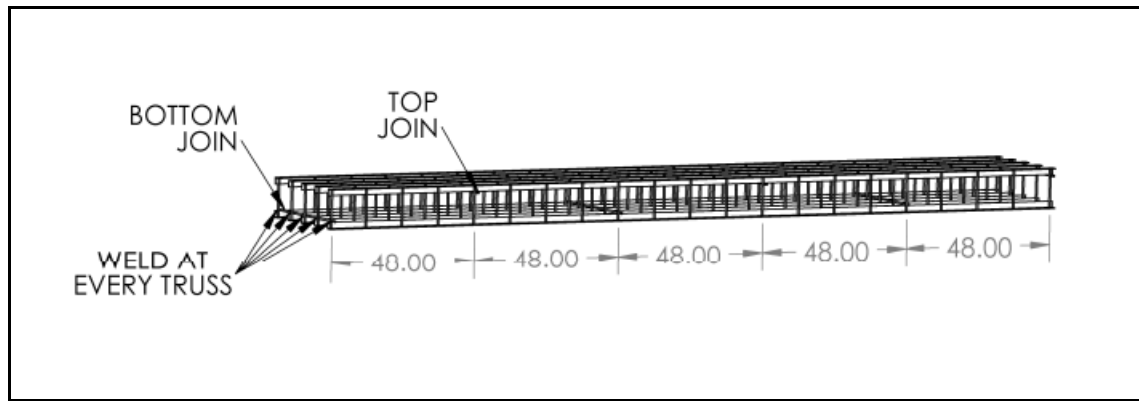


Figure 2.11

4. When working around tunnel intersections, cut a section of the truss to span the width of the tunnel so it will provide support to the plank ends. (Figure 2.12).

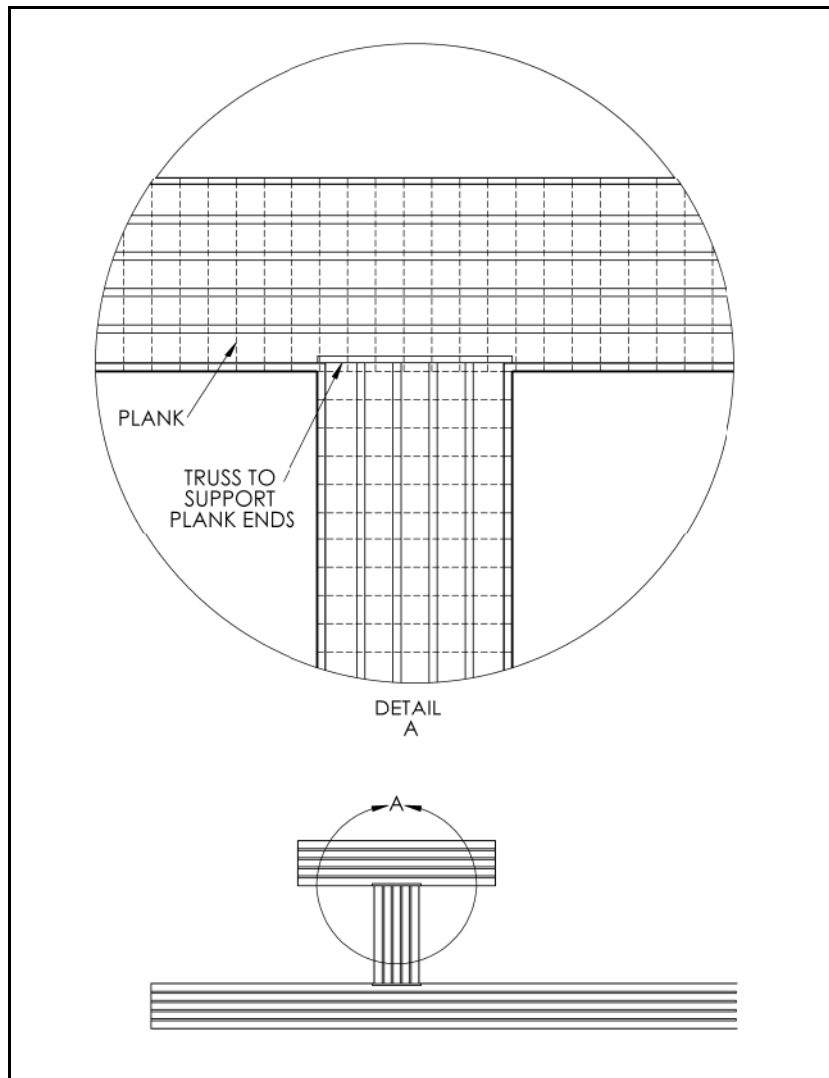


Figure 2.12

5. If plank stiffeners are included in the flooring package, install first the spacer by positioning its starting edge 1-1/8" from the end of the outer top chord of truss assembly (Figure 2.13). Press the spacer onto the chord to fasten. Starting edge of the spacer is identified by a round hole.
6. Succeeding spacers must be spaced 1-5/16" from the previous spacer. Place stiffeners in the 1-1/2" notches along the spacer's length (Figure 2.13).

Note: *Everytime a new tunnel section is started, the first spacer should be offset by 1-1/8" from the end of the truss assembly.*

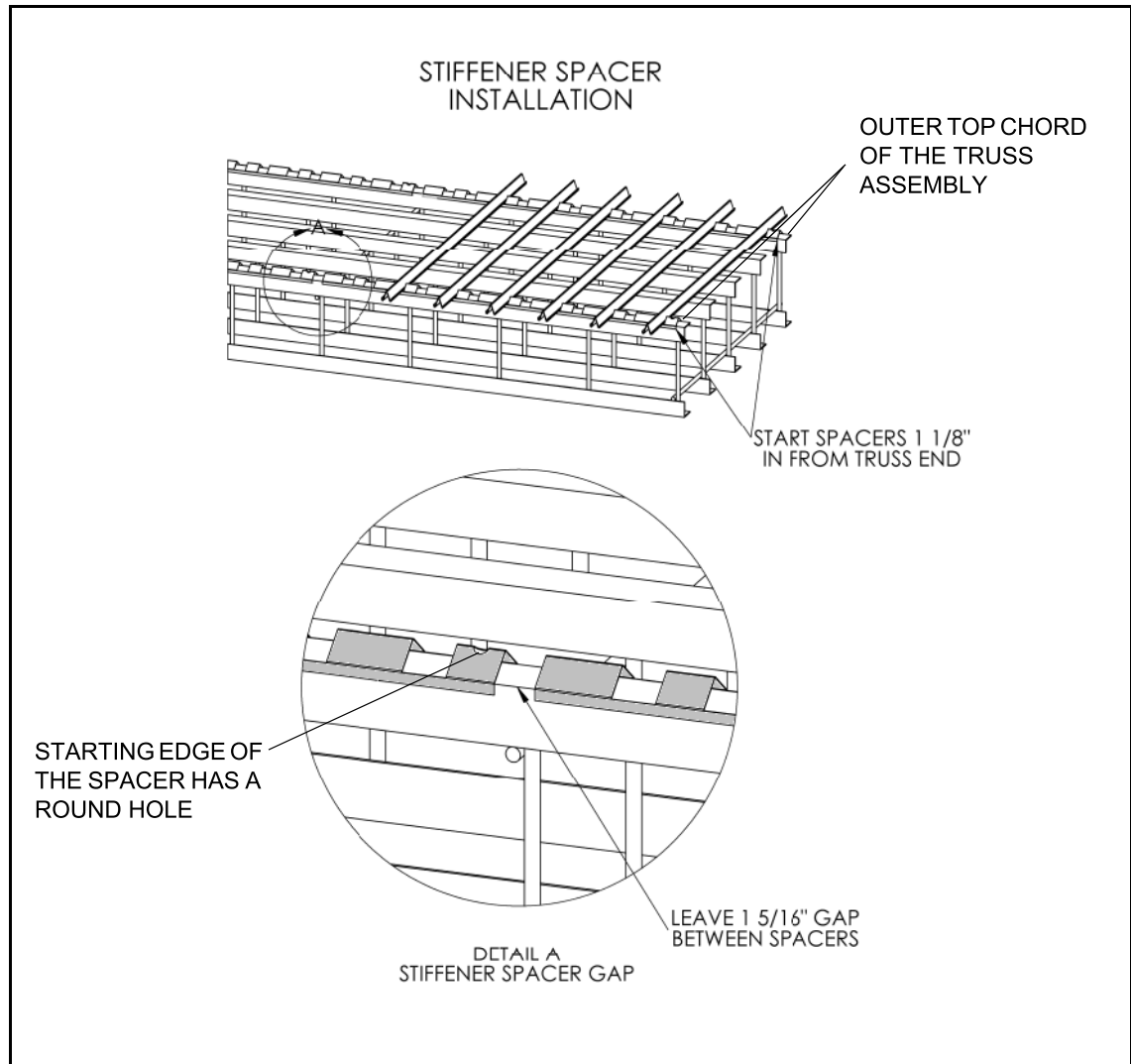


Figure 2.13

7. Position the first louvered plank on top of floor supports with the straight edge against the end of the tunnel.
8. Place the open edge channel of the second louvered plank into the floor supports and then push the straight edge down until it locks into the open edge of the first plank. Repeat the same procedure to install the remaining louvered planks.

2.5. NON-LOUVERED PLANKS

Non-louvered planks are included in the Grain Guard flooring packages. Position these planks near the air inlet to force air towards the center of the bin, providing more even conditioning. Ideally, the length covered by the non-louvered planks should be equal to the distance from the end of the tunnel to the bin wall (Figure 2.14). Installation of non-louvered planks is the same with the louvered planks.

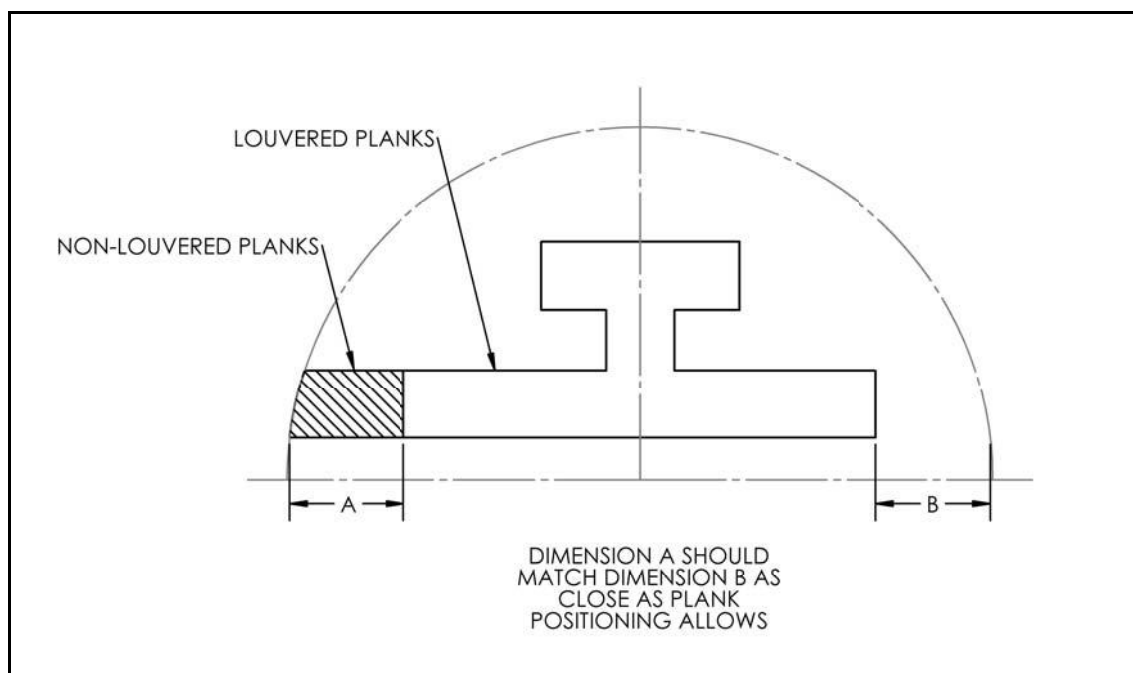


Figure 2.14

2.6. FLASHING

1. After all planks and supports have been placed, use the 4-1/2" flashing to cover the perimeter of the tunnel, and the 8" flashing to cover the larger gaps at the end of the each tunnel section (where the last plank of a section was placed).
2. It is recommended to center the flashing over the gaps and overlap flashing pieces by 2". Use supplied TEK screws at 8-12" spacing to attach the flashing to the floor planks. If possible, position the screws so they attach into the non-louvered portions of the planks.
3. No attachment is necessary between the flashing and the concrete, however, a properly rated construction adhesive (not supplied) should be used to improve the flashing to concrete seal.

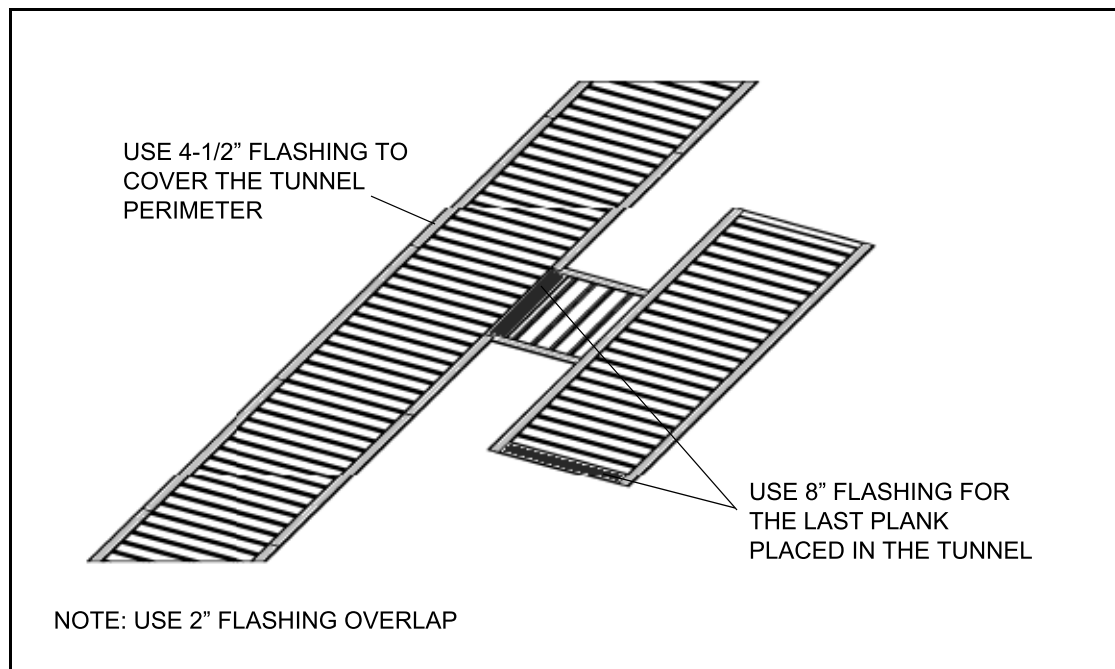


Figure 2.15

3. Maintenance

WARNING *Before continuing, ensure you have read and understand the relevant information in the safety section. Safety information is provided to help prevent serious injury, death, or property damage.*

3.1. GENERAL MAINTENANCE PROCEDURE

Note: *Use only genuine Grain Guard replacement parts or equivalent. Use of unauthorized parts will void warranty. If in doubt, contact your dealer/distributor.*

1. Ensure all floor planks are flush and seated properly on top of the floor support.
2. Check if the flashing is securely fastened to the floor.
3. Replace any damaged floor planks, flashing and hardware.
4. Periodically inspect the bin floor. If cracks start appearing, contact your dealer for ways of repairing this before it becomes an issue.

4. Appendix

4.1. GALVANIZED CHAIR TYPE SUPPORT SELECTION CHART

4.1.1. 48" TUNNEL

Grain Depth		Recomm mended Floor Gauge	Use Plank Stiffener (Y/N)	Chair Support Gauge	Chair Support Layout Spacing (in)	Even/ Odd # of Rows	Quantity of Chair Support				
Bin Rings (44" high)	ft						42' Dia. (182 Planks)	48' Dia. (194 Planks)	60' Dia. (258 Planks)	72' Dia. (360 Planks)	75' Dia. (378 Planks)
6	22' 0"	20	N	18	14	even	207	219	283	385	403
7	25' 8"	20	N	18	14	even	207	219	283	385	403
8	29' 4"	20	N	18	14	even	207	219	283	385	403
9	33' 0"	20	N	18	14	even	207	219	283	385	403
10	36' 8"	20	N	18	10.5	odd	298	291	412	565	592
11	40' 4"	18	N	16	10.5	odd	298	291	412	565	592
12	44' 0"	18	N	16	10.5	odd	298	291	412	565	592
13	47' 8"	18	N	16	10.5	odd	298	291	412	565	592
14	51' 4"	18	N	16	8.5	even	389	388	537	745	781
15	55' 0"	18	N	16	8.5	even	389	388	537	745	781
16	58' 8"	18	N	16	8.5	even	389	388	537	745	781
17	62' 4"	18	N	16	7	odd	480	485	670	925	970
18	66' 0"	18	N	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
19	69' 8"	18	N	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
20	73' 4"	18	N	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
21	77' 0"	18	N	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
22	80' 8"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
23	84' 4"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
24	88' 0"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
25	91' 8"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
26	95' 4"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
27	99' 0"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
28	102' 8"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
29	106' 4"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
30	110' 0"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
31	113' 8"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
32	117' 4"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
33	121' 0"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
34	124' 8"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

4.1.2. 60" TUNNEL

Grain Depth		Recomm mended Floor Gauge	Use Plank Stiffener (Y/N)	Chair Support Gauge	Chair Support Layout Spacing (in)	Even/ Odd # of Rows	Quantity of Chair Support				
Bin Rings (44" high)	ft						42' Dia. (182 Planks)	48' Dia. (194 Planks)	60' Dia. (258 Planks)	72' Dia. (360 Planks)	75' Dia. (378 Planks)
6	22' 0"	20	N	18	13.5	odd	323	341	437	590	617
7	25' 8"	20	N	18	13.5	odd	323	341	437	590	617
8	29' 4"	20	N	18	13.5	odd	323	341	437	590	617
9	33' 0"	20	N	18	10.75	even	414	438	562	770	806
10	36' 8"	20	N	18	10.75	even	414	438	562	770	806
11	40' 4"	18	N	16	10.75	even	414	438	562	770	806
12	44' 0"	18	N	16	10.75	even	414	438	562	770	806
13	47' 8"	18	N	16	10.75	even	414	438	562	770	806
14	51' 4"	18	N	16	9	odd	505	535	695	950	995
15	55' 0"	18	N	16	9	odd	505	535	695	950	995
16	58' 8"	18	N	16	7.75	even	599	632	824	1130	1184
17	62' 4"	18	N	16	7.75	even	599	632	824	1130	1184
18	66' 0"	18	N	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
19	69' 8"	18	N	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
20	73' 4"	18	N	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
21	77' 0"	18	N	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
22	80' 8"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
23	84' 4"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
24	88' 0"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
25	91' 8"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
26	95' 4"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
27	99' 0"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
28	102' 8"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
29	106' 4"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
30	110' 0"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
31	113' 8"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
32	117' 4"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
33	121' 0"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
34	124' 8"	16	Y	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

4.2. WELDED TRUSS TYPE SUPPORT SELECTION CHART

4.2.1. 48" TUNNEL

Grain Depth		Recomm mended Floor Gauge	Use Plank Stiffener (Y/N)	Truss Support Web Spacing (in)	Truss Support Layout Spacing (in)	Even/ Odd # of Rows	Quantity of Truss Supports @20' Length					Quantity of 1/2" Rod @20' Length				
							42' Dia. (182 Planks)	48' Dia. (194 Planks)	60' Dia. (258 Planks)	72' Dia. (360 Planks)	75' Dia. (378 Planks)	42' Dia	48' Dia	60' Dia	72' Dia	75' Dia
Bin Rings (44" high)	ft															
6	22' 0"	20	N	12	14	even	12	14	17	24	25	3	3	4	5	5
7	25' 8"	20	N	12	14	even	12	14	17	24	25	3	3	4	5	5
8	29' 4"	20	N	12	14	even	12	14	17	24	25	3	3	4	5	5
9	33' 0"	20	N	12	14	even	12	14	17	24	25	3	3	4	5	5
10	36' 8"	20	N	12	14	even	12	14	17	24	25	3	3	4	5	5
11	40' 4"	18	N	12	10.5	odd	18	20	24	35	37	3	4	5	6	7
12	44' 0"	18	N	12	10.5	odd	18	20	24	35	37	3	4	5	6	7
13	47' 8"	18	N	12	10.5	odd	18	20	24	35	37	3	4	5	6	7
14	51' 4"	18	N	12	10.5	odd	18	20	24	35	37	3	4	5	6	7
15	55' 0"	18	N	12	10.5	odd	18	20	24	35	37	3	4	5	6	7
16	58' 8"	18	N	12	10.5	odd	18	20	24	35	37	3	4	5	6	7
17	62' 4"	18	N	12	8.5	even	23	26	32	46	49	4	5	6	8	9
18	66' 0"	18	N	12	8.5	even	23	26	32	46	49	4	5	6	8	9
19	69' 8"	18	N	12	8.5	even	23	26	32	46	49	4	5	6	8	9
20	73' 4"	18	N	12	8.5	even	23	26	32	46	49	4	5	6	8	9
21	77' 0"	18	N	12	8.5	even	23	26	32	46	49	4	5	6	8	9
22	80' 8"	16	Y	12	8.5	even	23	26	32	46	49	4	5	6	8	9
23	84' 4"	16	Y	12	8.5	even	23	26	32	46	49	4	5	6	8	9
24	88' 0"	16	Y	12	8.5	even	23	26	32	46	49	4	5	6	8	9
25	91' 8"	16	Y	12	8.5	even	23	26	32	46	49	4	5	6	8	9
26	95' 4"	16	Y	12	8.5	even	23	26	32	46	49	4	5	6	8	9
27	99' 0"	16	Y	12	8.5	even	23	26	32	46	49	4	5	6	8	9
28	102' 8"	16	Y	6	8.5	even	23	26	32	46	49	4	5	6	8	9
29	106' 4"	16	Y	6	8.5	even	23	26	32	46	49	4	5	6	8	9
30	110' 0"	16	Y	6	8.5	even	23	26	32	46	49	4	5	6	8	9
31	113' 8"	16	Y	6	8.5	even	23	26	32	46	49	4	5	6	8	9
32	117' 4"	16	Y	6	8.5	even	23	26	32	46	49	4	5	6	8	9
33	121' 0"	16	Y	6	8.5	even	23	26	32	46	49	4	5	6	8	9
34	124' 8"	16	Y	6	8.5	even	23	26	32	46	49	4	5	6	8	9

4.2.2. 60" TUNNEL

Grain Depth		Recom- mended Floor Gauge	Use Plank Stiffener (Y/N)	Truss Support Web Spacing (in)	Truss Support Layout Spacing (in)	Even/ Odd # of Rows	Quantity of Truss Supports @20' Length				Quantity of 1/2" Rod @20' Length			
							48' Dia. (194 Planks)	60' Dia. (258 Planks)	72' Dia. (360 Planks)	75' Dia. (378 Planks)	48' Dia	60' Dia	72' Dia	75' Dia
6	22' 0"	20	N	12	13.5	odd	25	30	35	37	5	6	8	8
7	25' 8"	20	N	12	13.5	odd	25	30	35	37	5	6	8	8
8	29' 4"	20	N	12	13.5	odd	25	30	35	37	5	6	8	8
9	33' 0"	20	N	12	13.5	odd	25	30	35	37	5	6	8	8
10	36' 8"	20	N	12	13.5	odd	25	30	35	37	5	6	8	8
11	40' 4"	18	N	12	10.75	even	26	32	47	49	5	7	9	10
12	44' 0"	18	N	12	10.75	even	26	32	47	49	5	7	9	10
13	47' 8"	18	N	12	10.75	even	26	32	47	49	5	7	9	10
14	51' 4"	18	N	12	10.75	even	26	32	47	49	5	7	9	10
15	55' 0"	18	N	12	10.75	even	26	32	47	49	5	7	9	10
16	58' 8"	18	N	12	10.75	even	26	32	47	49	5	7	9	10
17	62' 4"	18	N	12	9	odd	32	40	58	60	6	8	11	12
18	66' 0"	18	N	12	9	odd	32	40	58	60	6	8	11	12
19	69' 8"	18	N	12	9	odd	32	40	58	60	6	8	11	12
20	73' 4"	18	N	12	9	odd	32	40	58	60	6	8	11	12
21	77' 0"	18	N	12	9	odd	32	40	58	60	6	8	11	12
22	80' 8"	16	Y	12	9	odd	32	40	58	60	6	8	11	12
23	84' 4"	16	Y	12	9	odd	32	40	58	60	6	8	11	12
24	88' 0"	16	Y	12	9	odd	32	40	58	60	6	8	11	12
25	91' 8"	16	Y	12	9	odd	32	40	58	60	6	8	11	12
26	95' 4"	16	Y	12	9	odd	32	40	58	60	6	8	11	12
27	99' 0"	16	Y	12	9	odd	32	40	58	60	6	8	11	12
28	102' 8"	16	Y	6	9	odd	32	40	58	60	6	8	11	12
29	106' 4"	16	Y	6	9	odd	32	40	58	60	6	8	11	12
30	110' 0"	16	Y	6	9	odd	32	40	58	60	6	8	11	12
31	113' 8"	16	Y	6	9	odd	32	40	58	60	6	8	11	12
32	117' 4"	16	Y	6	9	odd	32	40	58	60	6	8	11	12
33	121' 0"	16	Y	6	9	odd	32	40	58	60	6	8	11	12
34	124' 8"	16	Y	6	9	odd	32	40	58	60	6	8	11	12

WARRANTY

Except as expressly provided in this agreement, Grain Guard (hereinafter called the Manufacturer) excludes all express or implied warranties, conditions, and obligations of the Manufacturer, whether statutory or otherwise, concerning the quality of the units or their fitness for any purpose.

Under no circumstances will the Manufacturer be liable for any kind of special, consequential, indirect, or incidental damages resulting from the use of its products, nor shall the Manufacturer's liability ever exceed the selling price of the product.

Grain Guard warrants their products as follows:

1. Goods free from defect:
 - a. The unit shall be free from defects in materials and workmanship and shall operate properly in accordance with industry standards when employed in normal usage, provided the unit has been properly installed for a period of: three (3) years from the original date of purchase.
2. The warranty does not include:
 - a. Routine replacement of parts due to normal wear and tear arising from use.
 - b. Any defect attributable in whole or in part to misuse or improper installation.
 - c. Any damage or defect attributable to repair of the unit outside the Manufacturer's facilities or those of an authorized dealer, or the installation of unapproved parts on the unit in the Manufacturer's judgment to affect its performance or reliability, or which has been subject to misuse, negligence, or accident.
 - d. Any damage attributable to accident or to lightning, power surge, brownout, leaking, damage, or connection to a power source having a greater rating than that specified in the unit specifications.
3. Repair or Replacement

Where any part of the unit fails during normal usage during the warranty period specified, the Manufacturer, or authorized dealer of the Manufacturer, shall repair or replace the defective part of the unit with a new or factory reconditioned part, such replacement or repair to be made without charge for parts or labor, F.O.B. the Manufacturer.

4. Warranties shall not apply to any product made by the Manufacturer that has not been operated in accordance with the Manufacturer's printed instructions or shall have been operated beyond the rated capacity of the product or a use not intended.
5. The Manufacturer reserves the right to make design or specification changes at any time, without contingent obligation to purchasers of products already sold.

WARRANTY VOID IF NOT REGISTERED

GRAIN GUARD

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