

PATENTED RELIABLE VOID FORMS

**INTRODUCING, THE MOST RELIABLE,
AFFORDABLE, EASY TO USE VOID FORM**



Store it dry • Use it wet • Break it & Drop it



America's Reliable Void Form, Reliable Molded Pulp Voids™

Reliable Void Forms | 13801 Avenue K, Austin, Texas 78728 | (512) 636-1513

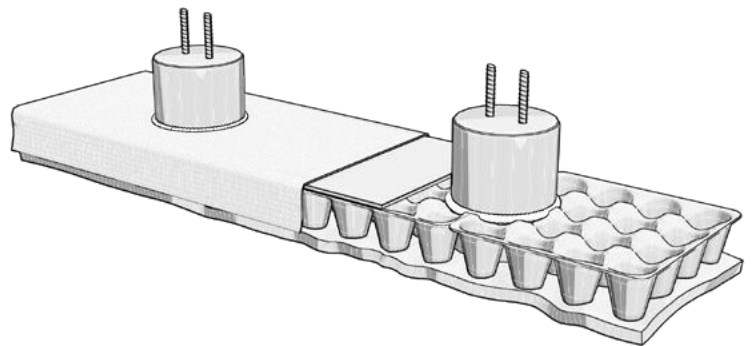
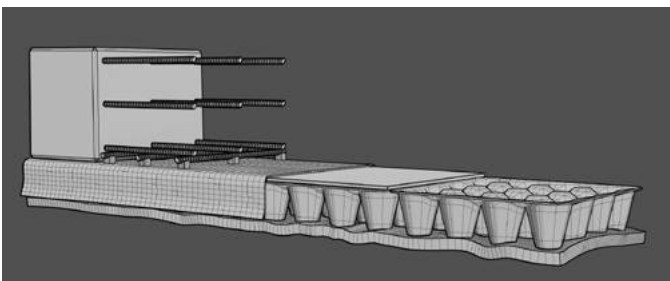
OUR GOAL AT RELIABLE VOID FORMS WAS TO CREATE A BETTER VOID FORM. A RELIABLE VOID FORM THAT CONTRACTORS AND ENGINEERS COULD TRUST WHEN CONDITIONS ARE NOT PERFECT. TO DO THIS WE HAD TO THINK OUTSIDE THE BOX. WE TESTED DIFFERENT MATERIALS AND DESIGNS AND PATENTED OUR MULTI-CONE MOLDED PULP VOID.

Reliable Void Forms (RVF) relieve ground swell in two ways:

- 1.** RVF weaken when exposed to moisture. Wiss, Janney, Elstner Associates, Inc. (WJE) tested our products using the same test criteria that our competition used and in accordance with the test criteria designed by Foundation Performance Group in Houston, Texas.
- 2.** RVF cone design allows the soil to expand into the open space. With only 18% of the form in contact with the ground the soil can expand around our cones. Gausul Hasan, M Sc., E.I.T, tested and proved that soil expands around our form in his thesis study for the University of Texas at San Antonio.

Reliable Void Form benefits:

- RVF can be used in wet conditions for up to 48 hours after exposure to moisture. They are not water proof. They are designed to slow down the absorption process and remain functional longer.
- RVF can be stored outside as delivered, no trailer rentals.
- Our nesting design allows more square feet per pallet.
- Our simple design is easy to install and estimate.
- RVF can be cut or broken to fit, no problem.
- We stand behind our products. If our forms are properly installed in accordance with our instructions and they fail, we have product liability insurance.



RELIABLE VOID FORMS

- Ok up to 48 hours after moisture
- Simple to layout
- No trailer fees, nested stack, less space
- Break or cut - easy, no problem
- **RELIABLE, EVEN WHEN IT RAINS**

Reliable Void Forms mission is to provide affordable void forms that:

Reliable Void Forms mission is to provide affordable void forms that contractors & engineers can trust and protect foundations from expansive soils as well as keep projects moving when it's wet.





1 out of 4 homes in the United States has some damage caused by expansive soils.

Expansive soils cause a **greater financial loss** to property owners than **earthquakes, floods, hurricanes & tornadoes** combined.*

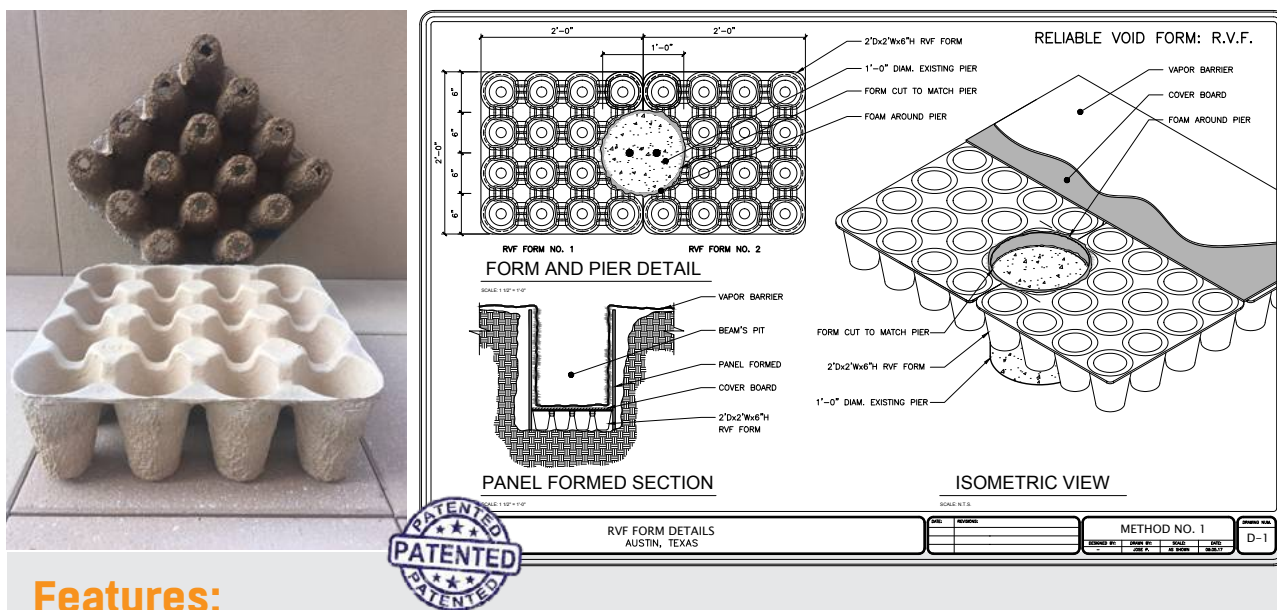
The **best protection** from expansive soil is **void space**.

Excavation and replacement is **expensive**, time consuming and **risky**

Source: The American Society of Civil Engineers

Introducing, the most reliable, affordable, easy to use void form in the world

RELIABLE VOID FORMS



Features:

- Engineered to weaken slowly
- Reliable to use up to 48 hours after exposure to wet conditions
- Shape allows soil expansion into cavities
- American made from 100% recycled paper

Unexpected rain fell on this project, but they used **Reliable Void Forms**, so, **no problem**

If they had used traditional **carton forms**, they would have had to **remove and replace the boxes**



RELIABLE VOID FORMS

solve the moisture problem:

- ✓ Reliable Void Forms store safely outside as delivered
- ✓ Use Reliable Void Forms in either wet or dry conditions
- ✓ OK up to 48 hours after exposure to moisture



STORAGE: Pallets will arrive at job on pallets shrink wrapped and with a pallet cover. Place pallets in original shipping packaging on high point of area so no rain will puddle around the pallet and so air will flow underneath. No need for storage containers if stored onsite in this manner.



RVF

Packaging

	6 Inch Forms		8 Inch Forms	
Item #	7671 L	7671 H	7678 L	7678 H
Stripe color	Orange	Black	White	Blue
Length x Width x Height	24" x 24" x 6"	24" x 24" x 6"	24" x 24" x 8"	24" x 24" x 8"
Description	6" Light Load	6" Heavy Load	8" Light Load	8" Heavy Load
Approved Concrete Thickness	Up to 8"	10" to 48"	Up to 8"	10" to 48"
Forms per pallet	72	72	56	56
# of pallets	52	52	52	52
Units per truck	3744	3744	2912	2912
Total square feet per truck load	14,976	14,976	11,648	11,648

	10 Inch Forms		12 Inch Forms	
Item #	7720 L	7720 H	7745 L	7745 H
Stripe color	Purple	Yellow	Green	Red
Length x Width x Height	24" x 24" x 10"	24" x 24" x 10"	24" x 24" x 12"	24" x 24" x 12"
Description	10" Light Load	10" Heavy Load	12" Light Load	12" Heavy Load
Approved Concrete Thickness	Up to 8"	10" to 48"	Up to 8"	10" to 48"
Forms per pallet	40	40	52	52
# of pallets	52	52	52	52
Units per truck	2080	2080	2704	2704
Total square feet per truck load	8,320	8,320	10,816	10,816

For less than truck load prices please call Cheryl at 361-549-0186 or Steve at 512-924-8839

Recommended installation procedures:

- Place RVF forms end to end on level ground
- Break or cut RVF to fit. Foam can be used for gaps around pipes & piers
- Cover RVF forms with hardboard panels, 1/8" minimum thickness

- Cover hardboard with poly-film, 10 mil minimum thickness
- We recommend you start at the perimeter so that you do not have cut forms on the edge. Then work around the piers so that any cut forms are in the middle, away from edges.

Frequently Asked QUESTIONS

1. Do you have preformed pieces to fit around the circumference of the pier?

Preformed shapes are not necessary with Reliable Void Forms (RVF). RVF can be cut to fit without losing the strength or moisture resistance. You can cut a hole in the middle, remove a corner, or cut a shape to fit around a pipe or pier without worry. Construction foam is also a good way to fill small gaps if you prefer not to cut forms.

2. Seems that the subcontractor will need to be very good at a tight fit for the mdf boards and the HDPE retainers to make the system close up well. I would not think that taped joints on the vapor retarder would be the only protection from concrete entering the void.

Just like with carton forms, a good vapor barrier with taped joints is all that is required. Some customers also choose to tape the hardboard panels.

3. The photos show separate beam and slab placements. Does this system work well when the beams and slab are cast monolithic?

Yes, this system works well when placed monolithic. It is not necessary but some customers have poured a thin mud seal over the covered Reliable Void Forms in the beams for protection and to form a soil retainer while they prep the slab and then place the foundation.

4. Why are the forms not larger?

Reliable Void Forms are 24" x 24", optimized for installer handling,

shipping, storage and production cost. Since the RVF only weighs 3 lbs. each, installers can pick up several in a stack and drop them one at a time to quickly cover a large area.

5. Does it take longer to install these parts?

No. Experienced users should be able to install RVF quicker than carton forms. Customers like that RVF can be torn or cut to shape and still hold their strength. No more complicated puzzle layouts, no cutting and taping carton forms with partitions hoping they won't fail.

6. What about storage at the job site?

Reliable Void Forms are stacked on 4x4 pallets, shrink wrapped for stability in transit and covered with a poly film pallet cover for job site storage protection. No costly storage trailers are in the way at the job and no back-haul charges for freight.

7. Can Reliable Void Forms be stacked to create deeper void space?

RVF can be stacked to achieve a deeper void. Place the first layer as normal. Stack the second layer upside down so the forms are face to face with good stability. Put cover board on the top only, not in between the stacked forms. Then cover with vapor barrier taped securely at all joints. We recommend you start at the perimeter so that you do not have cut forms on the edge. Then work around the piers so that any cut forms are in the middle, away from edges.

8. What if the Reliable Void Forms get wet?

The RVF are water resistant but NOT WATER PROOF. Some tips to determine if moist RVF are ok to use:

- A. They should support someone walking on them without deflection.
- B. You should not be able to compress the form with your hand
- C. If a form weighs more than 4 pounds it should not be used
- D. RVF can be used on damp or wet soil, (see note E). We do not recommend installing in standing water
- E. The ground should support the forms without sinking into the soil during the installation of rebar and placement of concrete
- F. The forms should not be exposed to moisture for more than 48 continuous hours before placement of concrete
- G. If you have doubts, replace the forms

MATERIAL SAFETY

Data Sheet (MSDS)

Material Makeup

Material is a mixture of primarily blank newspaper and corrugated in a proprietary ratio. All materials are 100% recycled and are primarily post-industrial, however they come from different sources so the exact composition of each item is unknown.

Chemical Additives

- Drainage and retention aid
 - Enhances water drainage and retention of fine fibers
- Dry strength additive
 - Increase strength of the dry products
- Sizing agent
 - Imparts water resistance to dry products. This does not make them waterproof
- Biocide
 - Kills germs and bacteria in pulp
 - This is not an insecticide and is rendered harmless during production process

Note: Exact Chemical additives are proprietary and will not be revealed.

Material Specifications

- Density: 0.0122 lb/in³
- Tensile Strength: 150 psi
- Yield Strength: 1339.77 psi
- Burst Strength: 175 psi
- Specific Heat: 0.478 Btu/(lb F°)
- Water Holdout: 3+ hours at 70-100 F°

Note: All values determined through experimentation and testing by HMP. Due to natural inconsistencies in material and variances in product design, values should be understood to be approximate and should not be relied upon for critical measures.

