

NOSY PEPPER

Embroidery



Stabilizer Guide



There are so many types of embroidery stabilizers, it can be confusing to understand the differences and applications of each when you are first starting. This guide will go over some of the basics of stabilizers and the differences between them. Choosing the right stabilizer can make the difference between results you love and results you are frustrated by. This is in no way meant to be an exhaustive guide, or a how to. As always, if you have your preferred stabilizers and it's working, then this guide is not for you :)

Stabilizers can be reduced down to 3 main types: **Tear Away, Cut Away and Wash Away** (aka water soluble stabilizer). You will find that any type of stabilizer will fall under of those three categories.

Tear away:

As the name implies, this stabilizer is meant to be torn away from your stitches once completed. There are many different weights of tear away, as well as some different types (sticky, fusible, etc). This is not my favorite stabilizer because it doesn't give as much structure and support to your stitches. It can be a great option for designs with low stitch counts and not much density. With that said, it does have a VERY important use and in some in the hoop projects, it is absolutely necessary. It is a MUST for in the hoop bags and other in the hoop projects that will require the stabilizer to be removed from the fabric. I generally use medium weight tear away 2 oz weight. You can find a variety of types of tear away (including fusible and sticky). Tear away will not give the same results on denser designs as the same weight of cut away will. It's important to understand that tear away is not entirely permanent on your material. It adds stability to your material, but in theory, the material itself should be able to handle the stitches if there was no tear away. This is why it's not recommended for garments.

Cut away:

Absolutely what I use the most of. Like tear away, it comes in a variety of weights from sheer to heavy. My most commonly used weight is 2 or 3 oz. I use cutaway on totes, towels, shirts, snap tabs, bookmarks, etc. It's a great choice for designs with higher stitch counts and it will support your heavier stitches like satins and fills. It's meant to permanently support your stitches, which is why it is recommended for garments. It's not a good option for things like ITH bags and wipes, where you need to remove the stabilizer from your materials to use the finished design.

Wash Away (aka water soluble stabilizer):

This is meant to be a very temporary stabilizer and to be removed or “washed” away when finished. Like cut away and tear away, there are a variety of weights of wash away stabilizer. WSS issued either as a topper or in your hoop as base for your stitches. You can find this in forms that are similar to plastic wrap, mesh or more fabric types, and even heavy that is meant for use with patches and super dense designs. I use this on almost every project I make that involves a fabric. It’s great for putting on top of towels and blankets with a nap, so that it keeps your stitches from sinking into the nap or pile of the material. I also like it for stitching on fabrics with an obvious texture like canvas to keep the stitches from looking distorted from the variation in texture. It’s also great to use when stitching on softer vinyls to keep your stitches looking crisp and keep them from sinking into the vinyls. For towels and fabric materials, I prefer the mesh type, as it is less likely to shift and just generally easier to work with because it has some body to it. When stitching on vinyls that are soft or not as high quality, I will use a layer or two of the thinner plastic type. Finally, for patches all I will use forever and ever is badge master heavy water soluble stabilizer. It perforates cleanly from satins leaving no excess stabilizer to remove. Although it will perforate on satins and heavy fills, it will still stand up to the heavy stitching and not tear away from your hoop prematurely.

Specialty Stabilizers:

Polymesh Stabilizer:

This is a cut away stabilizer that is meant for use in garments or for fabrics that you need to add a little more body to support your stitches. You can find this in fusible and non fusible varieties as well as different weights. I prefer to use the fusible and I fuse it to shirts before stitching. It’s a nice way to add more stability without having to add additional layers of cut away or using heavier cut away. The fusible is also fantastic for stabilizing knits so they don’t stretch and while you are stitching.

Sticky Stabilizer:

These are more specialty and used for more non traditional or harder to handles items like hats, cuffs, pants, etc. I have some and I have never actually tried it. It can also be used when floating items to help secure them, but the adhesive generally isn’t terribly strong. Think post it note level of stickiness. As I don’t make items that this would generally be recommended for, I can’t speak much more on it. They also make a sticky water soluble stabilizer to be used as a topper but I haven’t yet tried it.

If you are just starting out, my recommendation would be to get one medium weight cut away, one medium weight tear away and one medium weight water soluble. You will find that you can make almost any uth project with a combination of those three. Stabilizer can ABSOLUTELY be doubled up. If you are stitching up a design and you need a heavier stabilizer, just add another layer. It is not unusual for me to use 2 layers of stabilizer on a project, or a combination of different types.

Common problems that can be fixed with stabilizers:

Bubbling on vinyls, especially on areas with fills or satin stitching. This can be a sign of crappy vinyls but more often than not, it needs more stabilizer than what was used. Adding more or heavier stabilizer will fix this 90% of the time. Fix: If using a tear away, switch to cut away, if using cut away try adding another layer.

Pulling from outline in some areas of the design (especially on just one side). Please do not confuse this with the whole design being shifted (as when the hoop is bumped). When a fill is being stitched, it naturally pulls a bit in the direction of the stitches, when it is stabilized properly it helps keep this from happening. Designers account for this pulling, but proper stabilization will make sure your results look as they should. Fix: If using a tear away, switch to cut away, if using cut away try adding another layer.

"Fuzzy" stitches or stitches that don't look crisp. This happens more commonly on fabrics with pile like towels and fleece, but it can also happen on textured materials like canvas or burlap. It can also happen on softer vinyls. Fix: Use a wash away topper on top of your material.

Puckering. This happens frequently because the fabric doesn't have enough body to support the stitches. Fix: Add more stabilizer, and make sure the material is secured well in your hoop. Some materials are just harder to stitch on (especially lighter weight materials like satins, knits, rip stop nylons, etc). You can also add some polymesh fusible to the back of the material (especially in the case of knits) or if not stitching on garments, you can add a layer of woven fusible interfacing such as Pellon SF 101.

What I use by project type

Towels:

Either tear away or cut away depending on the type of towel and the density and overall stitch count of the design.

-With more "tea type" towels or towels that have no nap or pile, I will default to cut away, and often I will use polymesh on the back to give the fabric extra support to avoid puckers.

-For bath type towels with a nap, I will choose cut away or tear away depending on the design itself. I ALWAYS use a water soluble stabilizer on top to keep my stitches from sinking and getting lost in the nap.

Totes:

Either tear away or cut away depending on the density and overall stitch count of the design.

-For denser designs I will use cut away. For lighter stitched designs (that don't have a lot of fills or satins) I will opt for tear away.

-For totes that are canvas and have an obvious texture, I will also use a water soluble stabilizer to keep my stitches looking crisp.

Garments:

-Cut away and polymesh fusible every single time. Remember, tear away isn't meant to stay, and you don't want your beautiful stitches to lose the support.

Snap tabs, bookmarks, fobs, shoe charms and other small designs on vinyl:

Either tear away or cut away depending on the density and overall stitch count of the design as well as the quality AND color of the vinyl if using marine (the lighter the color or marine, the softer the vinyl is and will be more prone to sinking stitches).

-Simple designs without fills and satins, I will use tear away unless the vinyl is not great quality

-Designs with more fills, higher stitch counts and satin stitches (including appliques), I will use cut away every time.

-Depending on the vinyl, I may add a layer of water soluble topper to keep the stitches from sinking.

Notebook Covers:

Exactly the same as I do snap tabs and other smaller vinyl designs.

In the Hoop Bags:

-Tear away ALWAYS. It is a MUST for them. With that said, you can always double up, or even slide a small piece of cut away under your material if there is going to be an area of heavy stitching, just make sure you add this AFTER you add the zipper and it only covers the bottom portion of the bag. It should never be close to the zipper or potentially get sewn into the line of stitching just below the zipper.

Hoop Art:

-Another it depends, but generally as I use quilting weight cotton I will default to cut away. You can also add a layer of poly mesh or (my favorite) a layer of fusible woven interfacing such as Pellon SF 101.

Patches:

-Badgemaster Heavy Water soluble stabilizer every, single, time. I will die on this hill. This stuff is life changing.

Remember, if in doubt, add more stabilizer. There is no reason you cannot double (heck even triple) up if you are not getting the results you want.

Stabilizers I use regularly:

[Cut Away](#)

[Tear Away](#)

[Water soluble Topper plastic](#)

[Water Soluble Topper mesh](#)

[Badgemaster Heavy Water soluble](#)

[Polymesh Fusible](#)

[Pellon Shapeflex 101](#) (Not a stabilizer per say, but I am giving it an honorable mention as I use this on every fabric I use for bags, mug rugs and hoop art.). Please note this will fray over time, so it would not be advised for garments, where the edges of the interfacing would be exposed to repeated laundering.

This isn't meant to be a list to tell you what you NEED to buy right away or that you MUST buy. I am a big fan of using what you have and making it work, but with that said, if you are struggling to get the results you want, it may be time to add a few new stabilizers to your arsenal. After you have been stitching for a while, you will develop your own "recipe" of preferred stabilizers that work best for you. It may not be the same as mine, and that's ok!! The goal is to make sure that **you** are happy with what you make, regardless of what stabilizers you use. I want to reiterate that I am NOT the authority on all things stabilizer, these are just what have worked for me.

Happy Stitching  Cyndi