

Self-Adhesive Stamps

*The Biggest Postal Innovation
of the 20th Century*



Modern Self-Adhesive Stamp
U.S. #5430 – 2020 Grand Island Ice Caves

A Brief History of Self-Adhesive US Postage Stamps

Few, if any, postal innovations of the 20th century have had as large an impact as the self-adhesive stamp – on both the public and the stamp collector. For consumers, self-adhesives are far more convenient to use (and more sanitary) than water-activated stamps. For the collector, they represent a challenge. And because almost every postage stamp issued by the US Postal Service today is self-adhesive, now is a good time to discover a little more about this phenomenon.

What Is a Self-Adhesive Stamp?

A self-adhesive stamp (also known as “peel and stick”) is one coated with an adhesive substance to make it pressure sensitive. Unlike a “lick and stick” stamp, it doesn’t need water to activate the adhesive.

The United States wasn’t the first country to issue self-adhesive stamps. That honor goes to the West African country of Sierra Leone, a former British colony. In 1964, Sierra Leone introduced the first-ever self-adhesive stamps to the world to celebrate its participation in the 1964 World’s Fair. The set of 7 stamps was shaped like the country’s map and had a waxed paper liner. Tonga and Bhutan were next, and Gibraltar just before the United States.

The First Attempt – #1552

In 1974, at the request of the United States Postal Service, the Bureau of Engraving and Printing (BEP) produced the first self-adhesive stamp. The stamp was the Dove of Peace Weathervane (#1552), issued in November for the Christmas season. The BEP worked with Avery Label Systems and International Machine Products, makers of self-stick labels.



First U.S. self-adhesive stamp – Scott #1552

It was hoped the center slits would prevent reuse.

The new stamp included a precancel inscription for speeding up mail delivery during the busiest mailing season of the year. It also featured crossed slits through the dove, designed to prevent attempts to remove and reuse the stamp.

The pane of fifty stamps had a backing paper liner. The horizontal and vertical rouletted slits took the place of traditional round perforation holes. The slits went through the liner as well as the stamps. And, there was backing paper between the rows of stamps, both horizontally and vertically. Both characteristics made it easier to remove the stamps from the sheet.

This first experiment at creating self-adhesive stamps didn't go well at all. It was too expensive. The cross cuts didn't do the job of stopping reuse. And, after several years, collectors were disappointed to see the rubber-based adhesive used for #1552 had caused yellowing plus unattractive brown spots on the face of the stamp. The adhesive was also found to stain covers franked with the stamp.

The USPS Tries Again in 1989: Eagle and Shield

This time around, the Postal Service used acrylic, instead of rubber-based adhesive. The stamp was the 25¢ Eagle and Shield #2431, issued in both an 18-stamp convertible booklet and a strip of 18 for use in stamp-affixing machines.

For the experiment, the stamps were sold in 15 large cities for 30 days and at the philatelic agency. Customers answered a questionnaire to determine how well-liked the stamp was. But an extra 25¢ premium added to cover Postal Service production costs seems to have put a damper on customers' response. Like the first attempt before it, the newest self-adhesive experiment had failed.



The USPS tries again.

Next Self-Adhesive Stamps Involve PLASTIC!

Over the next two years, three more self-adhesives were issued. The first two were made of a special polyester film suitable for sale in Automated Teller Machines. They were 2475a (25¢ Flag) and #2522a (29¢ “F”)



These two plastic self-adhesive Flag stamps were sold only in panes of 12. In 1990, the first was tested for six months in ATM machines around Seattle, Washington. In 1991 the rate-change non-denominated “F” stamp was introduced and tested in Seattle as well. Each pane was the size, shape, and thickness of US currency bills, so existing machines could be used. The pane was also convenient for fitting in a wallet. There was no added premium to pay for these stamps, either, which helped make them a success. That is, until paper recyclers complained about the plastic material.

Though the next self-adhesive, #2531Ab pane of 18 (29¢ Liberty Torch), was the same size as the previous two, it was made of environmentally sound paper. It was issued only in a pane of 18 and tested in Seattle ATMs as well.



Sheet of Torch #2531Ab

National Distribution of Self-Adhesive Stamps Begins Again

After the success of the Liberty Torch, the national distribution of self-adhesive stamps picked up where the failed Dove Weather Vane stamp left off. In 1992, the 29¢ Eagle and Shield definitives were issued. From then on, self-adhesive stamps became more and more common, with some important firsts.



*1992 U.S. 29¢ Eagle & Shield
First Self-Adhesive Stamp Since 1974*

Timeline

- 1993** First self-adhesive coil with a plate number – #2799-2802 – Contemporary Christmas Issue.
- 1996** First self-adhesive commemorative – #3071 booklet Tennessee State Capitol (in addition to the water-activated single)
- 1996** First commemoratives to be issued only self-adhesive; first since #1552 to be separated by simulated die-cut serpentine perforations going through the backing paper – #3091-95 Riverboats
- 1998** First Semipostal stamp (#B1) – issued self-adhesive
- 1999** First stamps die-cut to the shape of their design – 33¢ Victorian Love stamps – #3274-75
- 1999** First self-adhesive se-tenant sheet issued – #3293. Some collectors don't consider this a se-tenant sheet because the stamps aren't joined to one another.
- 2002** By now, most US stamps issued self-adhesive. Exceptions: some coils with water-activated gum used by bulk mailers.
- Today** Virtually all US stamps are now issued self-adhesive.

Characteristics of Self-Adhesive Stamps

Self-adhesive stamps don't always follow the rules of water-activated stamps. For instance, a self-adhesive booklet stamp may have perforations on all sides, or no perforations at all.

Perforations

Self-adhesive stamps are not perforated in the traditional sense. There is no hole-punching or grinding. That is, no paper is removed, no little oval circles ("chads") produced, and no dust from the operation. So how are they separated? In two main ways:

Rouletting produces a series of small, regular slits (usually made by a toothed wheel) without removing any paper. This makes it easy to separate stamps without cutting or tearing.

Die Cutting is most commonly used for separation of self-adhesive stamps. A sharp metal device cuts through the stamp paper and adhesive layer, originally without cutting the backing paper. This leaves the stamps held together on the sheet by the liner. More recently, backing paper may also be slightly cut to make it easier to separate the stamps in multiples and still retain the backing.

Die cuts produce various types of "perforations". These perforations can be straight, serpentine (wavy), or serrated (jagged).

One example of a straight-line die-cut US stamp is the #3013 holiday issue showing children sledding.

The serpentine die-cut looks somewhat like the familiar punched or ground perforations. However, punched perforations have small paper fibers and do not look smooth and regular like their die-cut counterparts.

The peaks and valleys of die-cut perforations are measured the same way as traditionally perforated stamps are: by counting the number of perforations appearing in the length of two centimeters.

Backing Paper Liner vs. Linerless Coils – #3132 and #3133

Most self-adhesive stamps are attached to a "release", or backing paper, liner. This allows users to remove stamps without affecting the adhesive coating and collectors to trim the stamp and backing paper together for placing in an album with mount or hinge.



The first two linerless coil stamps #3132 and #3133

Always eager to reduce production costs, the US Postal Service experimented with issuing stamps without a backing paper liner – specifically rolls of “linerless” coil stamps. They introduced the first linerless self-adhesive coil stamps in 1997.

The linerless coil stamps were produced in rolls and dispensed like Scotch tape, with rouletting allowing for separation. This format called for a coating that would prevent the stamps from sticking to one another. The coating chosen was silicone. This process created a lot of extra steps including printing the stamp in one location, shipping to another for coating, then returning to the original location, and packaging in the tape-style dispenser.

The coils were tested in 17 post offices and with some bulk mailers. As before, consumers liked the convenient coils, collectors didn't. The USPS produced some specially treated backing strips so unhappy collectors could more easily place them in albums. In the early 2000s, a few more linerless coils were produced: Fruit Berries in 2000 and Snowmen in 2002. Due to the more complex production process, special machinery, and number of steps involved, the USPS stopped issuing linerless coils. Collectors were pleased.



Linerless coil stamp rolls from USPS included a plastic dispenser

How to Collect Self-Adhesive Stamps

Soaking vs. Trimming of Used Self-Adhesive Stamps

Many collectors have found soaking self-adhesive stamps off letters and packages a thankless task, yielding poor results or even worse, damage to their stamps. Other collectors have tried chemical solvents, air fresheners, and hot soapy water to remove their used self-adhesive stamps from paper with varying degrees of success; some of it good, others not so good.

Rather than coating used self-adhesive stamps with chemicals (some of which require special handling to avoid breathing the fumes, or having skin/eye contact) or soap and water, etc., consider this recommendation: We think the simplest method is the best when getting used self-adhesives ready for your album. For the least fuss, fumes, and mess, we suggest leaving the stamp on paper and very carefully trimming it close to the die-cut perforations, leaving approximately 1/16 to 1/8 of an inch on all sides if you're putting it in a mount. If you're using a hinge, the sky's the limit. This simple process can also be used on mint self-adhesive stamps to trim the backing paper.

Tips on How to Put Self-Adhesives in Your Album

As you know, once peeled off their backing paper, mint self-adhesive stamps will stick to anything they touch without being moistened. When putting them in your album, remember to leave the backing paper on. Just trim as suggested and you can easily use mounts or hinges to place them in your album.

Mounts

Unlike Mystic's mounts, which are sized to allow 5 millimeters on each side of water-activated stamps, those for self-adhesives are usually sized to allow 6-7 millimeters on all sides. Backing paper makes the stamps a little thicker and that means it needs a little more room in the mount. The same is true when a used self-adhesive stamp has the envelope paper left on it. This measurement is based on the backing paper having been trimmed 1/16 to 1/8 of an inch from the edge of the stamp.

If you need to order a mount for a self-adhesive stamp and don't know the size, you can use **Mystic's handy mount finder tool**. Just enter the stamp's Scott number and you'll see the correct size. If your stamp

needs a size that doesn't fit the above guideline, our online mount finder will give you the size most closely matching your stamp. This happens when the stamp measurement has been rounded up for a better fit.

1998 Commemoratives



Two examples of early self-adhesive stamps mounted to an album page using black split-back mounts

Hinges

You can also use hinges to mount your self-adhesive stamps. Since there will be paper on the back of your mint stamps, the gum will be undisturbed by the hinge. As with used stamps, you can trim the backing paper to any size you want.

It's your choice. That's the beauty of stamp collecting!