

## **Product** Information

**PRODUCT NAME:** Zip-Zag Bag

PRODUCT CODE: ZZB

CATEGORY Gadgets & Growing Aids



## PRODUCT DESCRIPTION





## Zip-Zag®

Pressure Test: Bags are high pressure tested up to 200 lb to ensure the seal stays secure, even under heavy loads.

Puncture Resistance: Materials are tested for their ability to withstand punctures from sharp objects.

Tensile Test: Material strength is tested to ensure it withstands stress without splitting or tearing.

Odour Test: Olfactory testing, compliant with BS EN 13725, simulates real-world conditions to ensure odours stay sealed inside the bag.

CONTACT INFORMATION 𝔅 (03) 9335 3310
☑ sales@whg.net.au

the whg.net.au

🕥 3 Legacy Rd, Epping VIC 3076 Australia

Zip-Zag bags are odor proof, BS EN 13725 tested compliant by ISO 17025 laboratories. Grove Bags do not pass this test, they leak. In fact, they admit this in their own FAQ that even a heat-sealed Grove Bag will leak cannabis odors. I would strongly recommend not using a bag that leaks cannabis odors in an illegal market. This video gives a visual example of how badly the Grove Bags leak air and smell. Bag on the left is Grove, the other two are Zip-Zags. This is a simple test that you can replicate anywhere. It takes about 10-15min for the Grove Bags leaks to become noticeable, and 1h to fully deflate.

Zip-Zag bags are food safe all the way down to our cardboard boxes, which are certified IFS PAC secure. Grove bags have occasionally stated they use food grade materials, but I have yet to see them make any official claim.

Packaging Technology and Research's sustainability comparison shows Zip-Zag bags to have 22% lower environmental impact when compared to Grove Bags. This study was based solely on the materials and manufacturing process. It did not take into account that Zip-Zag bags are reusable and Grove Bags are not - due to poor construction and requirement to heat seal.

Zip-Zag owns its factory and we control every step of the manufacturing process. Zip-Zag Bags standards exceed the packing industry by such a large margin that we had to build our own side seal bag machines and zip applicators. Not only do we own the factory, we designed and built our bag making machines in partnership with Simon Fraser University's engineering departments. The manufacturing process is not only overseen by Jason and I, we are both hands-on in every stage. On a near daily basis, Jason or I will audit the QC process. The same zipper and process that makes Zip-Zag bags is used in several biomedical applications and in the storage of volatile chemicals in workplace settings, we can not afford to send out a bad bag. Grove Bags are manufacturing processes.

Zip-Zag's QC process is extreme. Each batch of the bags we produce is assigned a unique identifier code. Batch size is determined by a few factors: roll/material change, speed changes, bag sizes etc. Our largest batch is 1800 bags and can be infinitely small, depending on the timing of material/production changes. Each batch has several samples pulled throughout its production in sets of 3. 1/3 of these are tagged with data and stored in our archive for future reference, 1/3 are put through rapid pass/fail benchmark testing, and the final 1/3 undergo 24h sustained pressure leak tests. Each batch is quarantined until all testing is completed. If any test fails, the product is disposed of. Our QC process is better than the condom factories! Last calendar year, our largest customer purchased 14,008 packs of 150 bags (2,101,200 bags) and packed each bag with cannabis. They returned 6 packs (900 bags) due to shipping damage, and 1 pack (150 bags) due to a printing error on 3 of the bags in the box.

Zip-Zag is a real product that works and is tested over and over to work. The claims we make, we can back up. We have found Grove products in the following product ranges; TerpLoc Liners, Terpy bags, Safevac Rolls and some of their limited-edition pouch bags, which have been made with standard flexible materials that do not contain its active packaging "TerpLoc" technology. However, Grove continues to sell overpriced products with false claims into the cannabis market. It is extremely unlikely that TerpLoc technology is effective in cannabis, especially after it has been exposed to humidity/oxygen in the shipping/handling and retail shelf environments.

## Drying/Curing:

There is a lot more going on than meets the eye. Chemical changes, preservation of terpenes, mold prevention! Outside of a lab environment it is nearly impossible to accurately assess the results from the drying/curing process and understand the impact on their cannabis.

The chemical makeup of cannabis is diverse. In addition to CBD and THC, there are some 110+ unique cannabinoids with unique properties. To complicate things, some studies have shown that the process used for drying impacts the chemical makeup of cannabis, which, in turn, could impact the ideal moisture content. Much more research is needed. The process and our understanding of it is regularly evolving.

Ultimately, the entire process is a balancing act. Drying too fast results in a poor flavor and a harsh smoke, drying too slow risks mold. If the finished product is too moist, mold and storage issues... but if there is not enough moisture, you lose quality, which for the most part, can not be restored by rehydrating. A common error we see seasonally in hotter/tropical climates is drying great quality weed too quickly, which slows the breakdown of chlorophyll, this results in a hay smell that will often be unnoticed until the cannabis is moved into a sealed package for curing. Growers often blame genetics, or their nutrients, and completely miss the real culprit.

At the point of harvest, cannabis contains around 75-80% moisture/weight. There is a lot of debate on the ideal dry moisture content. Most studies show an ideal range of 6% - 9%, others 10% - 14%. However, it is universally agreed that properly cured cannabis should be under 15% to prevent fungal growth. Drying too quickly (drying room too hot or too dry) can give the appearance of a properly dried bud, but the inner core can be holding moisture that will be released, often after the bud is packaged resulting in mold.

\*For a faster turnaround, some commercial facilities run a longer drying time (around 14 days) at 60% relative humidity at 15c and no curing. Specialized climate control systems paired with mold mitigation practices make this possible. This is not recommended for a home grower.\*

When harvesting, promptly move cannabis into your drying environment. In a large time consuming harvest, cannabis materials should be regularly moved to the drying environment. If possible, wet and dry trimming as well as packaging should be done in your drying room. Cannabis waiting to be trimmed should be hung, or stored open to the environment with care. In smaller drying rooms or humid climates, wet trimming is recommended to help prevent mold.

Drying rooms should be as clean as possible. Floors should be swept of plant materials and you should remove any containers containing trimmings/garbage. It's best to not store chemicals/fertilizers in your drying environment, they gas off and can impact the flavor of your cannabis.

Cannabis should be distributed uniformly throughout your drying room and air flow should be managed to prevent fans from blowing directly on any cannabis material. If possible air filtration should be used to help prevent mold. If possible, drying rooms should be sterilized between harvests.

The drying room RH should be 50%-55% with a temperature of 18 - 21c. In some climates, when HVAC equipment is not available, exhaust fans on a cheap humidity controller can be used to help regulate humidity. A cheap hygrometer/thermometer that displays min/max values is extremely useful, every drying room should have one.

The quantity of cannabis, air flow, and room size will impact the drying time. In this environment, cannabis should dry in 5 - 10 days, with 7 days being typical. Buds should feel dry to the touch and spongy but should not be crispy.

Once the buds are dry, inspect them for any signs of mold. Trim and move them into a resealable airtight container, like a Zip-Zag bag. A standard zip lock bag is not airtight, Grove bags are somewhat airtight if heat sealed, but lab tests show they allow over 2.5 times the oxygen to transmit through the walls of their bag when compared with Zip-Zag Bags. Although it is possible to cure by burping, this requires a lot of guess and check work, it introduces variables yielding inconsistent results. Besides, it is not a practical workload, your time is money!! Instead, we recommend a properly sized two way desiccant pack like Intregra Boost or Boveda.

Curing should take place at the same temperature as drying, 18 - 21c. Typically, curing completes somewhere in the range of 10 to 30 days. In the absence of lab equipment, weekly taste tests are the best practice, which is why curing needs to be done in a resealable airtight package like a Zip-Zag bag.

Once curing is complete, cannabis should be stored in a dark cool location, in an airtight package. Some studies have shown that the ideal storage temperature for cured cannabis is 4°c. However, for numerous reasons, do not store cannabis in your fridge. Keep it in the coolest area of your house, a cellar or cold storage room is ideal.