

Pure Seed Saving Project 2019

Help is needed to preserve pure varieties for the future. *Ida Kennedy, ikennedy5@msn.com*

The Need

Have you planted seed you saved from a gourd that was the perfect size and shape and when your plant yielded gourds, they were either slightly or very different from the parent, even when you hand-pollinated it?

Have you purchased seed from a reliable source and have the plants produce a variation of the gourd you were expecting?

Why do these issues happen? The answer is Cross-pollination.

The Solution

Save or purchase “true-to-type” seeds from reliable sources. That sounds simple, but is it? It is getting harder and harder to find pure seed, i.e., seeds you expect to get the type (size & shape) gourd you selected. But for that to be the case the seed seller must have saved seed from “pure” or “true to type” gourds. The challenge for maintaining true-to-type gourds is that they easily cross-pollinate, especially if different gourd types are planted within a mile of each other. What’s a gourd grower to do?

How to Prevent Cross Pollination:

Isolation

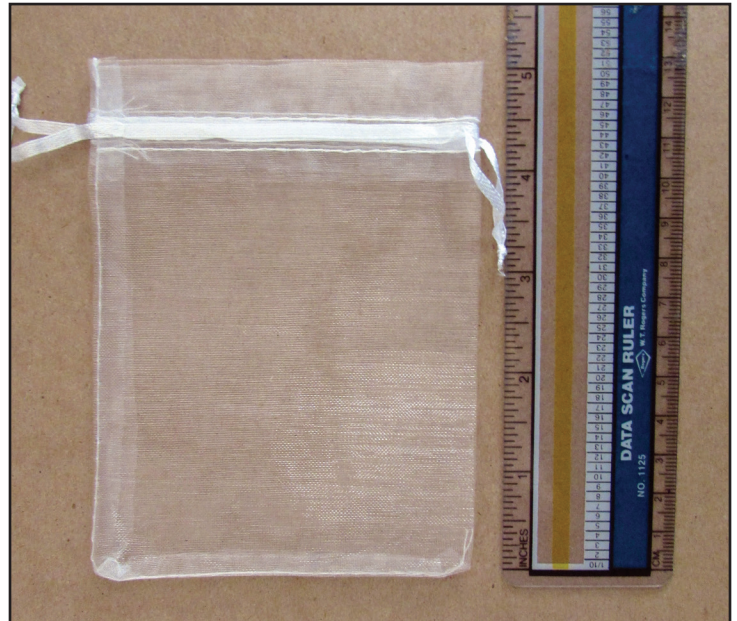
Isolation is one solution and probably the simplest for most people. You could only grow one hard shell gourd and one ornamental gourd at a time. You should try to be at least a 1 mile or more away from another gourd grower.

Hand Pollination

Hand pollination is the surest way to know how your gourd was pollinated. It is a labor of love and a little more time consuming.

What You Need For Hand Pollination

*Start with pure seed, and a prepared garden bed. If you don’t have a lot of space you can grow them on a fence or an arch made from hog panels that you can get at a farm supply store.



*Net bags (like those used for wedding favors) are ideal because it allows the plant to breathe. If it is going to rain you can slip a sandwich baggie loosely over the net bag and remove it in the morning.

*Tags (waterproof) to label the plant, permanent marker, colored yarn or other tag - - and a record book to keep track of the codes.

Steps:

1. Recognize (during the day) when a blossom is close to opening, maybe that evening or very early the next morning. The female blossoms will have a swollen base that will resemble the gourd you are growing. The male blossom will have longer stems and no swollen base.

2. Go to your gourd patch in the late afternoon or early evening before the blossoms are open and cover one female blossom and 2 to 3 male blossoms for each female blossom you want to pollinate that evening. I use the net treat bags you can get at Hobby Lobby

to cover all my blossoms, male and female. Most blossoms open early evening. There are a few though like the banana gourd and the basketball gourd that don’t open until the middle of the night or early morning. These can be pollinated early the next morning.



Apple gourd seeds



African Wine Kettle gourd seeds

3. To hand pollinate, you break off all the male blossoms you will be using for a particular female blossom, leaving a long stem to hold on to. Remove the petals from one male blossom at a time, being careful not to disturb the center. Remove the bag from the female blossom and gently brush the male stamen over the female blossom center (stigma) for 2-3 seconds, then discard the male stamen. Repeat with the second male blossom.
4. After you have hand pollinated the blossoms re-cover the female blossom with the net bag again. After a couple days you can take the net bag off. It will take a few days before you see a change in the size of the gourd. If it looks like it is getting bigger, the pollination was successful.
5. Make sure you tag each blossom with pertinent information such as date pollinated, type of gourd, where the seeds came from and the name of the grower for future reference.
6. It isn't necessary to hand pollinate every blossom you get on a plant. I would recommend hand pollinating at least 5 or 6 female gourd blossoms. After that just let your plant continue to grow and enjoy letting nature take its course.
7. Hand-pollinating a dozen or so blossoms should give you plenty seeds to keep for future use or to trade with someone. Do not save the seed from gourds that weren't hand pollinated. Save those gourds for your crafts.
8. Leave the gourds on the vine until the vine is dead, usually after a killing frost. Remove from the vine leaving the stem as long as possible. It is a good idea to let the seed gourd sit about a month to cure. I usually put them in my storage shed where they won't freeze until I get the opportunity to remove the seeds. Don't store them in the house as they will get moldy.
9. If you are careful you can cut a hole in your gourd to extract seeds and still use that gourd for a craft later. You should have plenty of true-to-type seeds to keep for future use or to trade with someone.
10. After you remove the seeds, rinse them well and lay them out on screens to dry with a fan blowing on them. Make sure you mark them when you do this as a lot of seeds look alike. You can test them to see if they are dry enough by snapping them in half. If they are dry enough they should snap easy. If they are rubbery, let them dry longer. It usually takes about a week to dry well.
11. Once they are completely dry, the seeds can be stored in small aluminum bags to keep the moisture out. I have been using small mylar and aluminum zip top bags. Seeds need to

be stored in a cool dry place. If done properly, seeds will be viable for 5 or more years.

Editor's note: When asked about the small aluminum bags, Ida responded "I had looked for some on the internet and got some to try a couple years ago and really like them. One bag will hold most of the seeds from one gourd so it makes it convenient for me to keep each gourd's seeds separate in case I have a problem with the seed. 5" X 8" is a good size for hard shell seeds. I have some smaller ones I use for the ornamental seeds. I usually don't separate the ornamentals into individual bags but by grower and year.

12. Once the seeds are dry, snap a few to see what they look like on the inside. The inside should look white and fill the cavity in the center. If they look brownish or weak inside, they are not worth keeping. You can also try sprouting a few seeds between wet paper towels in a baggie to see if they will sprout.

13. Good luck and Happy Growing

Are you interested in becoming a grower of Pure Gourd Seeds?

Maybe your Chapter or Gourd Club would become a group of Growers of Pure Gourd Seeds or form a Seed Exchange Club. Maybe you want to just purchase pure seed, isolate and grow pure seed gourds for your personal use.

After the first year you or your club's Ways and Means Committee could sell pure seeds as a fund raiser. If you're interested, please contact Ida Kennedy. You can discuss arrangements to get pure seed to get started and in return share some seed with her. She will email you a variety chart and will provide anyone who is interested in participating a free package of pure seeds to start with for \$1.00 to cover shipping.

Ida Kennedy has been an active member of the Indiana Gourd Society for over 20 years and has been a part of the "Pure Gourd Seed" project for almost as many. Her goal is to get enough others interested to keep the many varieties going that we have spent years propagating.

How to contact Ida Kennedy: email ikennedy5@msn.com or phone her at 219-767-2901

There are many great videos on You Tube showing how to grow, craft and do just about anything with gourds. You can also check out Seed Savers Exchange at www.seedsavers.org to get some valuable tips. 🍷

Pure Gourd Seeds Project – Part 2

Help is needed to preserve pure varieties for the future. *Contributing editor: Ida Kennedy*

Following is my process for growing gourds for Pure Seeds. I am writing this article in mid-July from the state of Indiana. The seed starting and planting process is the same as you have been doing for growing gourds. This year I got my gourd plants in the ground late. It was the first week of June before they got planted, which is a week later than when they are normally put out in my planting zone. Most of my gourd seeds are started in early May in Styrofoam cups in my gourd shed, and they get in the ground by the end of May. I did plant some of my ornamentals directly into the ground mid-June and they seem to be doing fine. Ornamentals don't usually get started indoors because they don't need as much growing time as the hardshell gourds to mature.



The yellow blossoms are the ornamentals. The bees are pollinating them at daybreak.

Watering & fertilizing. We had plenty of rain in June this year so I didn't need to water much, but July has been on the dry side so I have been watering every other day. It is best to have a ground watering system, such as soaker hoses (instead of overhead sprinklers) if possible. You will use less water and reduce the risk of powdery mildew and other diseases that wet leaves are vulnerable to. Watering in the morning is best, giving the plants plenty of time to air dry.

I have been adding a light dose of fertilizer to each watering. I use different kinds; Miracle Grow for vegetables, or any fertilizer for vegetables can be used. 12-12-12 is a good starting fertilizer then go to 4-4-4. Don't use fertilizers with a lot of nitrogen once the plants are established. All you need to do next is be patient and wait for the babies to come.

Hand pollinating. July is the busiest month for pollinating gourds, at least in Indiana where I live. Gourds start putting on male blossoms the end of June and you usually start getting the female blossoms the first week of July. I usually consider July my stay-at-home month as I am expecting new baby gourds to develop. Around 3 in the afternoon, I go out and check for any baby gourds that I think may open that night. I put my little net bag over each female and cover at least one male blossom (or two if available) so I can go back later that evening and pollinate the females. There is no set time that you have to pollinate with the males as long as you do it that evening or early the next morning at sunrise.

How much water is needed?

An inch of water a week is the general recommendation. While it can seem to have rained a lot, check the gauge rather than going by your guessimate. You'll be surprised by results. That's why it is recommended to put a rain gauge in the patch and checking often.

Did you know that too much water can also be a problem? When the vines are very young, and especially if they are thin, the spindly vine can split from too much internal water pressure. Too much water for too long (as in heavy clay or poorly drained areas) can also result in thin shelled gourds. So choosing a well-drained site and planting gourds in well-drained soil is recommended.



This is a male blossom ready to pollinate with, and a couple dried up male blossoms from the prior evening


The main thing is to have the males and females bagged before they are fully open, so they don't get pollinated by insects before you get a chance to cover them. Make sure you put a tag on the females after you pollinate them and be sure to re-cover them. I put the date, the name of the gourd and where I got the seed on a plastic string tag and attach it to the vine near the gourd I pollinated. If it is late at night and the mosquitoes are bad and I want to be done more quickly, I go ahead and pollinate my females, and re-cover them, and then I wait until morning to tag the ones I pollinated the night before. This works well as you can easily locate the female that you bagged the night before when you go out the next morning. Tag the gourd but leave the bag over the pollinated gourd until the petals are curling up and turning brown, usually by the next afternoon. I then remove the net bag and let nature take its course. If the pollination did not take, in a day or so, the little gourd will start to shrivel up and turn brown. I pinch them off when they start to do this. If the

pollination took, the gourd will start increasing in size. It is amazing to watch them grow so quickly.

The bagged white blossom is a female blossom ready to pollinate later in the evening.



Harvesting mature gourds. The next step will be to feed and nourish your plants until the frost kills them. You should allow the gourds to remain in place until the stem that connects the gourd to the vine is brown and dried. Once that happens, cut them off the vine and put them on something to keep them off the ground. If you intend to keep any seed that you hand pollinated, do not let the gourds freeze hard. I keep mine in my gourd shed where the temperature doesn't go below 45-50 degrees. I let them set at least a month to mature and then the

seeds can be removed, cleaned, and dried for future usage. I will put together another article for the next issue of the AGS magazine. If you have any questions, please feel to contact me at ikennedy5@msn.com. 

This is what half my gourd garden looks like. I have 2 other small plots. I hope everyone's gourds are doing well. Mine have really taken off in the last couple weeks.

Ida Kennedy



Folsom Gourd Artists Present

20/20 Vision of Gourds Festival

June 4th – June 7th, 2020

MACC Gallery 10191 Mills Station Road, Rancho Cordova, CA 95670

CALL FOR TEACHERS

Class dates Thursday, Friday, Saturday June 4, 5, 6, 2020. Most classes will be on the 2nd floor of the gallery, accessible by elevator or stairs. Some will be outside under a roof.

With your proposal, please include

- Your contact information, high resolution photo of your project on CD, Flash Drive, or email attachment.
- There will be a Friday night reception, for which we solicit examples of your art for exhibit.
- Also we would be grateful for a donation of your art for raffle.

CALL FOR VENDORS AND ARTISTS

- The gallery is located near freeway access and a Regional Transit Station. The Gallery has excellent lighting and security system, free admittance and free parking.
- Vendor Fees for Saturday June 6 & Sunday June 7:
\$50.00 for 10'x10' space
\$30.00 for 6' table space
Table rental \$5.00 each.

For more information contact Janice.2020visionofgourds@gmail.com
Show Chairman: Barbara Cody, 530-795-2828, Barbara.2020visionsofgourds@gmail.com

Pure Gourd Seeds Project – Fall/Winter 2019

Contributing editor: Ida Kennedy

This year has been a real summer-sault in growing gourds. The Spring was wet and cool again, then we got a hot, dry spell, then the bugs started attacking. Actually, my garden did pretty well until the end



Top: Mexican Bottle

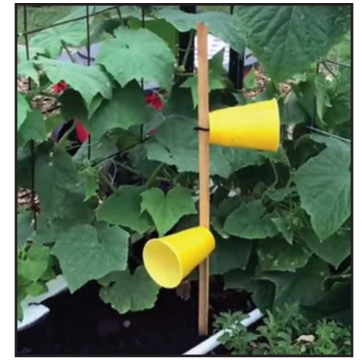
Middle: Long Handle Dippers

Bottom: Baby Bottle

of July, then a lot of my plants started getting a virus. I tried to spray them to stop it around mid- August, but I think I waited too long. Next year I plan on spraying for virus' before they even start to show up. I have been talking to other growers and a lot of them are having the same problem as I did this year. One grower I talked to said he contacts the Purdue Extension office in Indiana each Spring and gets their advice on what type of virus' they expect in the current season and what to use to help prevent it. He is one of the few growers I talked to that had good results since following Purdue's advice.

Quality vs Quantity. I was able to manage the bug problem pretty well. I planted a marigold plant in every hill and then put 1 or 2 gourd plants in the same hill. As the plants grew, I let the healthiest plant grow and cut off the weaker one. You don't get as many gourds this way but I am more concerned about getting a few good seed gourds. This also helps with the pollination process. I put a circular wire hog panel fencing, about 24" diameter x 48" high, around each plant. When it starts to vine, I wind the vines around the fence in a circular direction. It doesn't matter which direction you go in, but keep going in the same direction so your vines won't get tangled up too much. This also makes hand pollinating easier and more accurate. The plants can be put closer together and kept from intertwining to help reduce cross pollination.

Homemade Cucumber Beetle Traps. This year I made some insect sticky traps to set out to catch unwelcome visitors. To make the traps, I ordered yellow 12 oz plastic cups and Tangle Trap Sticky Coating on the internet.



To make the traps I first put a couple holes in the bottom of the cup and threaded a pipe cleaner (or zip tie) thru the holes to attach the cup to a wooden stake. Next, I painted the sticky coating on the inside bottom of the cup, and stuck a cotton swab or cotton ball in the bottom of the cup. To attract the beetles, put 5 or 6 drops of clove oil on the cotton swab. Last step is to coat the inside and outside of the cup with the Sticky Coating. I placed the traps by my trellis' and this worked very well. I will definitely use this method again to catch unwanted visitors.



You can look this up on Youtube.com and look up "Easy DIY Cucumber Beetle Trap." It will show you how to make a Cucumber Beetle trap like this.

End of the Growing Season. It's mid- October now. The frost just killed my plants a day or so ago. For Indiana, it is not unusual to have frosty nights this time of the year. I will be picking my gourds soon and putting them in my shed so they don't freeze solid. I hope to get the seeds harvested by December. There is still a lot of work to do with the seeds. I need to let them sit and mature for a short time, then remove, dry, and test the seeds for next season. I will store the seeds in foil bags until I need to package them.

If anyone would like to get involved with growing gourds for the seed so we can keep the different varieties going, please contact me. Ida Kennedy ikennedy@msn.com 219-767-2901. 🌱