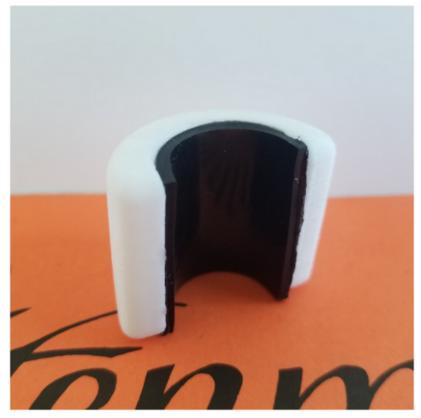
## SAAGAR ARYA FLUTE FINGER RESTS

**APRIL 2020 - PRESENT** 



## **SUMMARY**

In 9th grade, after joining an honor band at Capital University, I started experiencing a slight pain in my fingers while holding the flute for long periods. At the time, my flute instructor, Dr. Guitry, showed me the types of flute rests her colleagues were using but everything seemed to be over \$50 and would mar and scratch my flute. Using knowledge of 3D modeling, printing, and filaments, I began 3D printing using flexible TPU filament, pieces that could be placed on the flute and support my fingers. Yet these 3Dprinted pieces kept sliding on my flute since the 3D-printed surface was slick on the metallic flute. After editing the diameter, I added a thin silicone strip that better clung to the flute and didn't scratch it.

Medium Finished Flute Rest

After listening to feedback from my flute teacher, and Capital University band directors, I created 6 different variations of different thicknesses and grooves. During the COVID-19 lockdown, I was able to use my time to create a shop and product listing on Etsy and began selling them. Through my initial success of 100+ orders and a physical showing at Seattle Fluteworks, I applied for and was granted a provisional patent. After my product continued to do well in the following 8 months, I had made more than enough to hire a patent lawyer and began working towards a utility patent, currently in the late stages of approval. Though these Flute rests were not very technically challenging to create they came with their own challenges. I have to fulfill orders in a timely manner as a commitment to my shipping policy matters to my customers. I have learned to value customer feedback, working with them to customize the design to fit their needs, and keeping track of business expenditures, profits, and reviews. I also acknowledge there are still areas I can improve on like marketing.



Medium Flute Rests & Medium Grooved Flute Rests

## SKILLS LEARNED/ USED

3D Printing/Modelling Partial Material Science Business Management & Customer Service

## FLUTE REST REVIEWS ON ETSY

Elle

Feb 20, 2021



Really polite and helpful seller, and the material feels so nice on my thumb. Doesn't slide around either. Yay!

Marguerita

Jan 6, 2021



I have the 8 mm smooth and grooved thumb rests. It is an excellent product and very innovative. I use the grooved rest for my right hand. It makes it much easier to hold. I have problems with circulation and strength in my hands and I find it really helps. The smooth one is a useful spare. Very polite and helpful seller. Also very quick replies to any messages I sent. It took a few weeks to reach me in the UK but that is to be expected. It was worth the wait.

Urs

May 21, 2021



This was definitely worth the wait! A fine piece of engineering that combines modern technology and personal experience in flute playing. Definitely helps supporting the flute during hot and humid Japanese summers. Thank you, indeed.

John Bridge

Apr 3, 2021



It shipped on time and my experience with the shop was fine. The thumb rest definitely makes holding the flute more comfortable. I am ordering a second one.

Donna

Apr 28, 2022



This is a wonderful innovation for flute players. The cushioning really helps, and the size variety makes it available to people with different size hands and needs. I use the 4mm for a finger rest and the 8 mm for thumb - really helps with my arthritis while playing. Saagar has really gone the extra mile to accommodate different needs. I find the 4mm fits great for the finger rest on my heavy wall flute, but is a bit wide for the regular wall (both have C# trill keys. I know she is working on making ones that work for all flutes with C# trill keys. A truly great product with a very caring and talented vendor.



These rests are fantastic. I was afraid they would be too hard but they provide just the right amount of cushion and resistance. Not as squishy as the "flute gels" I used to use but much more customizable and durable. I ordered several to find the right fit. The 6mm indented one and the 4mm flat one work best for my medium sized adult hands. Thanks Saagar! Thickness: 6mm (Medium)

Finger Groove (Yes/No): Finger Groove



Sean Arawjo Jul 7, 2020



This is a great addition to my flute and makes my left had much more comfortable where the index finger rests. I highly recommend these.

Thickness/Finger Groove: 6mm(Medium)



Geo Yuan Sep 9, 2020



Excellent product, very helpful for my daughter who is in high school.

Thickness: 6mm (Medium)

Finger Groove (Yes/No): No Finger Groove



Amy Dalal May 29, 2020



I have arthritis in my hands. I bought the 8mm and the 6mm thumb rests to make my flute feel bigger and easier to hold. These gadgets work nicely! My hand position is adjusted, so the flute sounds much better.

Thickness/Finger Groove: 8mm(Large, Grooved)



freiadisa Jul 24, 2020



This is such an amazing invention! It not only makes it more comfortable to play the flute, it also helps to relax the hands so they can move freely. I got the medium width without the finger groove, and plan to try the model with a finger groove. Brilliant!

Thickness: 6mm (medium)

Finger Groove (Yes/No): No Finger Groove



Laura Schulkind Apr 29, 2020



I ordered two of the largest. One with finger groove and one without. Both are very comfortable for right thumb. I'm actually blown away by how comfortable it is! If you want the thickest option for right thumb, go with the largest with no groove. It feels very secure even without the groove. The large with groove is not as thick as the groove indents inward. For left hand, I would need to go with the thinnest as the large was too big for me. But I'm happy I have two options for my right thumb! I do recommend before purchasing for left hand that you experiment with placing materials of different thicknesses between your flute and left hand to find the right thickness for you (i.e. stack moleskin pads or 3m foam strips between your hand and flute to get an idea). Excellent product that I plan on using on my flute from now on!

Thickness: 16mm (Large) Finger Groove (Yes/No): No Finger Groove



<u>Tyra H</u> May 6, 2020

This thumb rest is really nice. I used to use 2 layers of padded moleskin on the flute for my right thumb, in order to make my hand position more natural and to make holding the flute more comfortable. I bought one large and one medium. The medium size is just right. The large one, I will probably give to a student. I really love this product; it is more convenient than what I had been using. It slips right on/off and does not scratch the flute. It also stores nicely in my case. I highly recommend it for right hand use. I haven't tried it for left hand yet, but I plan to. Also, order processing and shipping was fast. Overall, I had a great buying experience and will recommend this product to others!

Thickness: 12mm (Medium)



Finger Groove (Yes/No): Finger Groove mangoflute May 3, 2020