# Priming

# Introduction

Many see the process of gluing rubbers to a blade as meaningless procedure simply to attach the rubbers. These people will also often find that rubbers take a long to time be 'worn in', meaning it takes quite a number of sessions for the rubber to reach peak performance. This guide will outline some procedures that will help you get the best performance out of your rubber in the least amount of time, and may well give you performance that you did not think possible.

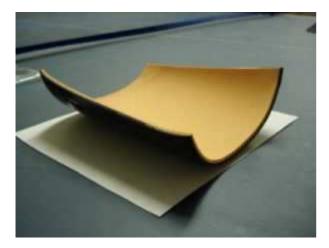
Most rubbers, and in particular Chinese style rubbers tend to have a little bit of a stiff and dead feel, but this improves over time. With a few applications of table tennis glue, as outlined below, the rubber can reach peak performance almost immediately, and in most actually cases play better for the duration of it's lifetime.

The optimum procedure includes a series of applications of both normal glue and speed glue, which has to be done only once. However great improvement can be made with applications of just normal glue too.

# Part1: Priming

## Step 1 - Preparing the rubber

Firstly remove the rubber from the packet and lay it down onto the table. If you have a Chinese rubber please remove the plastic protective film on the topsheet and place a piece of cardboard under it to keep the tacky topsheet from adhering to dust or glue stains. Make sure the cardboard is blank so that the tacky surface of the rubber cannot pull off any bits/ink off, or they'll end on your rubber. If you have European or Japanese style rubbers (non-tacky), then this won't be a problem. Note that sometimes rubbers already curl up a little (as pictured) or sometimes they are flat... it does not matter.



## Step 2 - Preparing the blade

If the blade is brand new, it's best to seal it with some sort of polyurethane (or varnish or shellac) coating. Only a very thin layer should be used, enough to protect the top fibres on the surface, but not too much to affect the feel of the blade. The easiest and most convenient method is to just use hairspray. Almost all hairsprays contain polymer acrylates which is basically what holds your hair in place. When sprayed onto the blade it creates a really thin layer on the surface, which in effect protects it from splintering but won't affect the feel of the blade.

The only wood that probably doesn't need sealing is Hinoki. If you have a hinoki blade then you can skip the sealing.

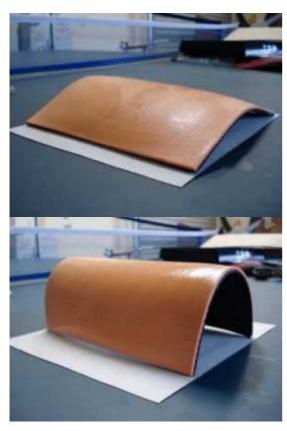
If you have a old blade that's been glued many times, chances are that its got glue stains on it. Although this isn't a major problem its best to clean it all off.

# Step 3 - Applying Glue

3a. Apply a layer of normal glue onto the rubber covering the entire area. Once you applied the first layer, the rubber may have a bit of a dome (curls up) by now, which is fine. Leave it for about 10minutes or until it's touch dry. Apply another layer and wait again. As you can see from the picture, the rubber has flattened out, whereas it was curled before. If it had been flat to start with, it would have curled up.



3b. Place 4-5 layers of speed glue (wait for each layer to be touch dry before putting on the next) on the rubber. Pictured after 2 layers and after 5 layers:

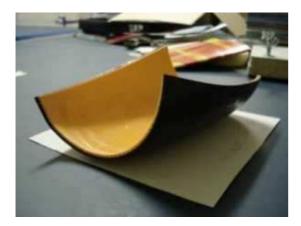


On the 5th layer while the glue is still wet, roll it onto a glass plate and stack about 5kg's of books on it overnight. Pictured rubber put onto the glass, and rubber under books:

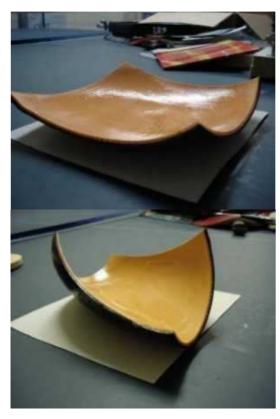


The rubber is already much bigger at this stage. Important Note: Using this many layers of glue can put quite a bit of strain on rubbers, so if you're not confident that the topsheet and sponge are glued together well, use less layers, or at least enough layers to get a decent dome.

3c. In the morning when you peel the rubber off the glass plate. There should be a reverse dome instead of the kebab the night before.



This next stage is crucial as the rubbers size will not stay that way permanently. Repeat step 3b with the 4-5 layers of speed glue again and leave it for 3 hours onto the glass plate (for best result Overnight is the best). Pictured after another 5 layers, and after putting onto the glass plate for a second time.



Next apply a thick layers of glue to the blade and spread it uniformly across the surface. Once this is done leave it to dry.



# Step 4 – Putting the rubber onto your bat

Once the blade and rubber has dried completely, align the rubber from the bottom and roll (with a bottle or roller) it upwards onto the blade very gently. If you roll it hard it will stretch the rubber and alter its characteristics. Once it's glued onto the racket. Roll it a few more times just to make sure there are no air bubbles. Use a sharp blade to cut the rubber and finally place it in a clamp for about an hour.

Note: Cut SPARINGLY meaning leave excess/overhang just to make sure as some rubbers tend to shrink a few mm's back when they've calmed down over a few days. This won't happen if you've been patient. I find that if you rush and hurry up the whole process. Then it normally shrinks back but in return, the rubber is faster, softer and springier, but it's not at the pinnacle as when you follow the instructions exactly.



# Part 2 – Priming using Normal Gluing

Below is a series of steps that should be followed to give you a long lasting solid gluing. This is only for the players that don't like, or choose not to use speed glue and prefer to keep their racket unglued and ready to play at any time.

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If the blade is brand new, it's best to seal it with some sort of polyurethane (or varnish or shellac) coating. Only a very thin layer should be used, enough to protect the top fibres on the surface, but not too much to affect the feel of the blade. The easiest and most convenient method is to just use hairspray. Most almost all hairsprays contain polymer acrylates which is basically what holds your hair in place. When sprayed onto the blade it creates a really thin layer on the surface, which in effect protects it from splintering but won't affect the feel of the blade.

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If you have a old blade that's been glued many times, chances are that its got glue stains on it. Although this isn't a major problem its best to clean it all off.

# Step 3 - Applying Glue

Apply a layer of normal glue onto the rubber covering the entire area. Its best to apply layers that aren't too thin or thick but just right. Once you applied the first layer, the rubber may have a dome (curls up) by now, which is fine. Leave it for about 30minutes so the dome goes down. Note: sometimes this is longer for different rubbers. Repeat this gluing procedure at least 3 times. Then leave it for 2 hours so most of the glue effect and dome evaporates.

Next apply a thick layers of glue to the blade and spread it uniformly across the surface. Once this is done leave it to dry.

## Step 4 - Putting it all together

Once the blade and rubber has dried completely, align the rubber from the bottom and roll (with a bottle or roller) it upwards onto the blade very gently. If you roll it hard it will stretch the rubber and alter its characteristics. Once it's glued onto the racket. Roll it a few more times just to make sure there are no air bubbles. Use a sharp blade to cut the rubber and finally place it in a clamp for about an hour.

# Part 3 - Speed Gluing

Below is a few steps that should be followed if you wish speed glue effectively and have a considerable effect on your rubbers.

Types of glues:

1. Normal glue - Minimal speed glue effect, gives very good adhesion for sticking new rubbers on. Also great for long pips to give a solid gluing.

2. Speed glue - Each speed glue has a slight difference in composition which makes it perform in a different way. It's impossible to name them all and list their characteristics. So basically, if it isn't normal glue or long life glue, then it's speed glue.

3. Long life Speed glue - These glues, commonly (and incorrectly) referred to as 'water based glues', have entered the market for a few years now with varying success. They provide the user with close to 4 days of the glue effect without the hassle of gluing every 3 hours. These glues can take up to 12 hours to dry before they can be attached onto the blade. They smell a little really peculiar, some with a distinct fruity type smell. Butterfly Millennium Chack, Donic Enduro, Yasaka Pro-Life and Tibhar Rapid Clean Deluxe belong to this category and provide a long life speed glue effect. As far as I know they are also all made in the same factory in Belgium, and the difference between them is not huge.

#### **Gluing techniques:**

Everyone glues differently so there are many methods of gluing around. I'll just list the 2 that I think are the most effective. These apply to the normal speed glue only:

#### Technique 1.

Apply the glue evenly on to the rubber. Wait until a layer is touch dry before adding the next layer. The more glue and layers, the more effect. On the rubber wait until a layer is touch dry before adding the next layer.

dried, put a thin layer on your blade, wait for it to be touch dry, and just attach to your blade and clamp it for a few minutes as usual.

#### Technique 2.

Apply the glue onto the rubber, and while its still wet place and clamp the rubber sponge side down onto a glass plate. By doing this the fumes of the glue are trapped and can only permeate through the sponge. This method allows maximum glue effect with minimal glue usage. The only downside is that it takes longer then the above method. Leave the rubber on the glass plate for about 10-15 minutes, when you peel it off there should be a considerable dome. If your not happy with the results, then do it again until you get the desired effect.

# Part 4: Removing Glue

This section is intended for those that speed glue quite often and have to deal with glue build up. After about 10 layers of glue the additional layers don't penetrate the sponge as well thus not giving you the optimum glue effect. The ideal solution to this is to buy a new rubber. More commonly though it's quite easy to remove the glue build up so you have a fresh sponge to work with again.

## 1. Using speed glue to remove glue.

If you have a rubber which has a fairly medium to hard sponge, then this method is ok. Basically apply a layer of speed glue onto the build up and spread it around very thoroughly. Doing this sort of dissolves the glue already present on the sponge. About 2 minutes after the application you can start to rub the glue off the sponge with your fingers. Do it gently and take your time. If the glue starts to harden up again, use a additional layer of glue. If your careful, there should be no damage and the rubber will be immaculate. More commonly if you rush, you can expect to take bits of sponge off and end up with a mess.

I do not recommend this method with soft rubbers as it will most likely destroy them.

TIP: If you use long lasting speed glue to do this, everything becomes easier as that type of glue stays semi solid for much longer making the whole process easier. Only downside is that it's a waste of precious glue.

# 2. Orange Oil

This method basically involves the use of Orange Oil which is basically a air freshener that can be found in your local supermarkets. The key ingredient that makes it work is citric acid. If you find any other air fresheners that contain this, it should work. The Orange Power that I've been using for that last 3 years comes in a orange bottle with a purple spray twist top on it and it sells under the name "Orange Power".

The method is basically the same, spray on 2 layers of the stuff onto the sponge and wait around 5 minutes for it to be touch dry. The glue build up should be dissolved and semi-solid. You can easily rub the excess build up off compared to method 1. If you take too long and the build up hardens. Then spray another layer.

This method works on any rubbers and works very well with super soft rubbers that are prone to damage. The only downside is that it may tint your sponge a slight orange and it may smell like oranges which isn't such a bad thing.

## 3. Miscellaneous Methods

Eucalyptus oil, WD40 (Grease remover), Ironing, dry rubbing with thumb. These are all methods I have heard of but they don't work as good.

Eucalyptus oil - This stuff absolutely reeks and leaves a terrible smell to everything. No doubt it works but the smell alone is enough to set anyone off.

WD40 - A sworn method of a select few, but I have yet to try it myself

Ironing - Basically placing a A4 sheet of paper on the sponge, and then proceed to iron it until the glue melts and is collected on the A4 paper. I've tried it once and it doesn't work for me. All I was left with was a pile of molten rubber and paper stuck to the sponge.

Dry rubbing with thumb - some hardcore players out there reckon they can remove glue just by peeling it or rubbing it away without the aid of solvents. This is possible with extremely hard sponges that are damage resistant. Chinese blue sponges also allow this method to work quite easily. Be aware that trying this method on any other sponge is most likely to cost you a new rubber.