

### Dear Friend,

This new year brings countless threats. Crimes and robberies are in increasing rate and preppers face limitations when it comes to obtaining the best personal weapons for selfdefense. How do you prepare for a real SHTF situation when you are forced to defend yourself and your loved ones?

A nuclear bomb might be the most powerful weapon on the planet, but do you really need one to take out a thug trying to get into your home? However, a weapon that you design yourself can be more effective than one you buy.

There are rocky times ahead and that's why, at the beginning of 2017, we've put together this free report on how to make your own handmade self-defense weapons.

Give it a read to discover the basics of weapon design and take the first step to understanding the fundamental parts of a weapon and the technologies available for each part.

P.S.: Remember that sharing is caring, so share this information with any friend, family or acquaintance you think could benefit!

alec Deacon
Survivonedia.com

## **Table of Contents**

DISCLAIMER	3
What Makes a Weapon a Personal Defense Weapon?	5
Fundamental Parts Found in a Personal Defense Weapon	11
The Payload	12
Cutting or slicing	12
Penetrating beneath a surface to deeper layers	13
Crushing or breaking	13
The Delivery System or Propellant	15
Body Power	16
Slings	16
Levers	17
Pistons	17
Springs	17
Flexion	17
Controlled Explosions	18
Electromagnetic Propulsion	18
Target Acquisition	18
User Interface	19
Resources	21
Other Survivopedia Articles About Making Weapons	21
References	21

## **DISCLAIMER**

THE INFORMATION CONTAINED IN "6 Fundamentals of Self-Defense Weaponry" IS MEANT TO SERVE AS A COMPREHENSIVE COLLECTION OF STRATEGIES THAT ARE ONLY RECOMMENDATIONS BY THE AUTHORS, AND READING THIS EBOOK DOES NOT GUARANTEE THAT ONE'S RESULTS WILL EXACTLY MIRROR OUR OWN RESULTS.

THE AUTHOR OF "6 Fundamentals of Self-Defense Weaponry" HAS MADE ALL REASONABLE EFFORTS TO PROVIDE CURRENT AND ACCURATE INFORMATION FOR THE READERS OF THIS COURSE. THE AUTHOR WILL NOT BE HELD LIABLE FOR ANY UNINTENTIONAL ERRORS OR OMISSIONS THAT MAY BE FOUND.

THE MATERIAL IN "6 Fundamentals of Self-Defense Weaponry" MAY INCLUDE INFORMATION, PRODUCTS, OR SERVICES BY THIRD PARTIES. THIRD PARTY MATERIALS COMPRISE OF THE PRODUCTS AND OPINIONS EXPRESSED BY THEIR OWNERS. AS SUCH, THE AUTHORS OF THIS GUIDE DO NOT ASSUME RESPONSIBILITY OR LIABILITY FOR ANY THIRD PARTY MATERIAL OR OPINIONS. THE PUBLICATION OF SUCH THIRD PARTY MATERIALS DOES NOT CONSTITUTE THE AUTHORS' GUARANTEE OF ANY INFORMATION, INSTRUCTION, OPINION, PRODUCTS OR SERVICE CONTAINED WITHIN THE THIRD PARTY MATERIAL.

WHETHER BECAUSE OF THE GENERAL EVOLUTION OF THE INTERNET, OR THE UNFORESEEN CHANGES IN COMPANY POLICY AND EDITORIAL SUBMISSION GUIDELINES, WHAT IS STATED AS FACT AT THE TIME OF THIS WRITING, MAY BECOME OUTDATED OR SIMPLY INAPPLICABLE AT A LATER DATE. THIS MAY APPLY TO THE "6 Fundamentals of Self-Defense Weaponry" AS WELL AS THE VARIOUS SIMILAR COMPANIES THAT WEHAVE REFERENCED IN THIS EBOOK, AND OUR SEVERAL COMPLEMENTARY GUIDES. GREAT EFFORT HAS BEEN EXERTED TO SAFEGUARD THE ACCURACY OF THIS WRITING. OPINIONS REGARDING SIMILAR WEBSITE PLATFORMS HAVE BEEN FORMULATED AS A RESULT OF BOTH PERSONAL EXPERIENCE, AS WELL AS THE WELL DOCUMENTED EXPERIENCES OF OTHERS.

NO PART OF THIS PUBLICATION SHALL BE REPRODUCED OR SOLD BY ANY ELECTRONIC, MECHANICAL OR OTHER MEANS WITHOUT THE WRITTEN PERMISSION OF THE AUTHORS. ANY AND ALL REQUESTS FOR SUCH PERMISSION SHOULD BE SENT BY TO support@survivopedia.com.

COPYRIGHT SURVIVOPEDIA™, "6 Fundamentals of Self-Defense Weaponry"

# Basic Guide to Designing Weapons from Scratch

From self-defense to fighting terrorists, the question of how to build newer and better weapons always presents a challenge.

Invariably, preppers face limitations when it comes to obtaining the best weapons for personal needs, like cost of good quality, lack of sufficient training or limitations on weapon types or accessories because of government oversight. Also, consider social and media intimidation directed at misinforming or preventing people from purchasing what is available for consumer use, and social and media bullying and brainwashing directed at shaping people into electing leaders that will not protect or restore citizens' rights to have unfettered access to suitable weapons

On the other side of the equation, material for making weapons and the ability to innovate is almost limitless. Therefore, if you learn the basics of weapon design, you just might come up with something useful. No matter whether you find a way to design a better knife, or discover a way to make a more accurate gun, it will be in your favor.

You need to learn the basics of weapon design, then you can apply this information to just about any system and have a good chance of finding innovations that will work better from a DIY perspective.

Before you begin any weapons design project, be aware of the local laws. It is up to you to remain within these laws. If you do not like the laws in your area, vote and take constructive part in the governance system to create the changes you want to see.



# What Makes a Weapon a Personal Defense Weapon?

For our purposes, a weapon will be defined as any object used to gain a strategic advantage over a directly threatening hostile individual or group.

An object does not need to kill or cause bodily harm to be called a "weapon". It only has to be capable of doing some kind of direct damage that stops another person from taking action against you.

When it comes to the arena of personal defense, a good quality weapon must have at least six basic features. Let' take them one by one!

#### It must be effective within the limited scope of self-defense.

Consider a situation where you believe that a nuclear bomb is the most powerful weapon on the planet, and a ballpoint pen the weakest. Do you really need a nuclear bomb (as they exist in known modern technology) to take out a thug trying to get into your home?

While you may be enraged enough to lob a nuke, that doesn't mean it is an effective weapon for your situation. Oddly enough, the ballpoint pen will actually make a better weapon against a single attacker. A modified ballpoint pen that can deliver poison or a dart will work even better.

#### A good self-defense weapon puts the element of surprise back on your side.

There is no question that an AK-47 or an AR-15 can be used to deter one person or several from harming you and your loved ones, but the size of these weapons makes them a bit hard to hide.

If you are out in public, carrying these weapons can alert more determined attackers to the fact that you are ready and able to defend yourself. This, in turn, takes away any element of surprise that might have bought you both leverage and a second or two of time.

Because there are limits to legal weapon ownership, but no limit to what criminals can obtain, this can put you at a serious disadvantage. Perhaps we can even say never bring an "assault rifle" to a machine gun fight.

In this situation, you might be better off carrying a concealed handgun because it won't be noticed unless there is a need to use it. At that point, your attacker will have already underestimated you and followed through with an opening action that you have a better chance of defeating.

Even if you have a .45 caliber handgun, you may be overpowered after taking out just one adversary. This is just one area where being able to innovate and design better

weapons will serve you well as a prepper. Being able to pack the power of a machine gun with the selectivity of a conventional rifle into something the size of a handgun would put you well ahead of any attacker.

## A self-defense weapon must be focused enough in target acquisition in order to reduce impact on innocent bystanders.

As far as small, effective weapons go, grenades are certainly easy to conceal and add plenty of surprise to a situation. Now let us look at a situation where someone pulls a gun on you, either in your own home or while you are in public. Let us also say that a family member, or even other innocent people are in the area.

No matter how carefully you aim the grenade, there is a chance that innocent bystanders will be hurt by the shrapnel. Unless you have a well-staged fire zone to throw the grenade into, and an ability to limit damage to bystanders, it won't make for a good personal defense weapon.

In a world where terrorists are running rampant, it can be said that a weapon with too limited an impact has just as harmful an impact on bystanders as one that is too far reaching. For this scenario, let's say you are out in public and a terrorist wearing a suicide bomb vest pulls a gun on you. Even though a grenade won't work in this scenario, a knife or a ballpoint pen won't do much good either.

A rifle, on the other hand might be more suited to stopping this tragedy because it will be possible to shoot the terrorists while he/she is still further away from large numbers of people. This is yet another area where innovation in consumer level self-defense weapons might do far more good than you realize.

## A good self-defense weapon should also be free of interference by others.

This includes free of the cost of ammunition, repair, and legal oversight.

Many people look to guns as classic self-defense weapons because they are effective, reliable, and efficient.

As effective as guns, tasers, and other projectile based systems may be, they also come with a number of prohibitive costs that include:

- the actual cost of the weapon. A good quality handgun from a reputable manufacturer can cost several hundred dollars even before you add on better sights and suitable hand grips.
- The cost of basic training and practice. If you weren't raised in a community where gun ownership is part of the society, then it can be quite expensive to learn how to shoot, store, and manage a gun. In a similar way, if you live in a city or other restrictive area, honing and keeping your skills up can be quite expensive. Aside from paying for time at an indoor range, you may also have to pay for ammunition provided by the facility.
- The cost of advanced courses and situation awareness training. The legal definition of a crime includes having making a specific, knowing decision to commit that act. As such, it should come as no surprise that someone intent on committing a crime will also be as well prepared as possible to carry it out. If you are interested in self-defense, then you must also be prepared with as many skills and strategies as possible. Unless you are in law enforcement or in the military, the cost of that kind of training is very expensive. No matter whether you choose knives, bows and arrows, guns, tasers, or swords, the cost associated with advanced training and practice may well be beyond your budget.
- Weapons, like any other machine, require maintenance and repairs. Contrary to
  popular belief, guns aren't the only weapons on the market that come with a high
  repair and maintenance costs. Bows, knives, and swords can also cost several
  hundred dollars to repair or maintain over time.
- The cost and availability of ammunition. If you remember the scandal surrounding the cost and lack of availability of .22LR ammo? No matter how you look at it, the cost of weapons that launch projectiles can be very expensive. To add insult to injury, ammo scarcity can act as a control point that may make it difficult, if not impossible to use the weapon you bought for self-defense.

• The cost of permits and licenses. While terrorists and criminals who get away with murder and mayhem on a routine basis never worry about these costs, the average prepper has to deal with them along with every other expense on this list.

In these times, you might not always feel comfortable with learning how to make your own weapons and ammunition. At the very least, the basics may come in handy if a social collapse occurs and you wind up having to develop designs that go beyond a crudely fashioned spear made from a sapling and knapped stones.

Even something as simple as understanding what kind of blade shape will be most effective can make the difference between life and death.

### A good weapon will expand your strategy options, not limit them.

In the arena of self-defense, it is very easy to have too many weapons that don't work well at close range, or ones that don't do enough damage to the target regardless of the distance. Avoiding both traps will require a good bit of trial and error. Before you even begin designing a new weapon, take time to study existing weapons and try them out.

While you are studying different weapons, pay careful attention to the basic parts and how they work. Think about how the weapon would work in a building, in a crowded area, or in very close quarters.

By the time you complete your study, you should have a list of weapons that will work well within arm's length, some that will work several feet away, and others that will work up to or beyond 100 yards away. No matter which one you plan to build, think about how existing devices limited defensive and offensive strategies, and think about how you can change the fundamental parts of the weapon to better suit your needs.

## The best self-defense weapon is one that you have, and can actually use effectively and efficiently.

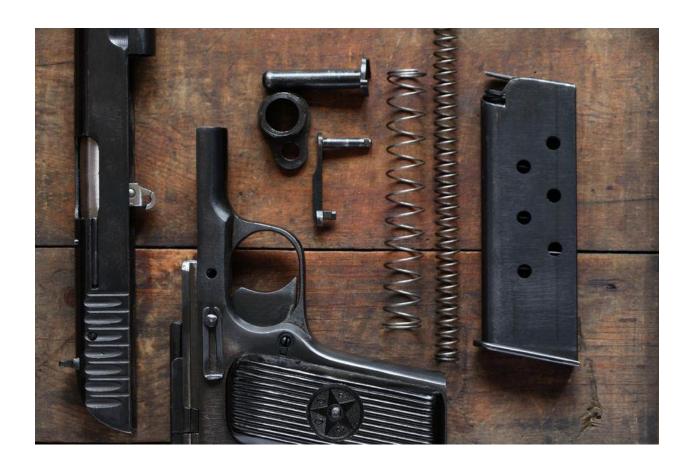
Over the years, considerable controversy has emerged over the "Top 5" guns, knives, tasers, crossbows, swords, and other weapons. People in the military, law enforcement,

or other walks of life are always more than happy to share their experiences with any given weapon.

For every testimonial shared, you are sure to find dozens that had a similar experience, and just as many others that had differing outcomes. If you actually go out and try these different weapons, you will more than likely find yourself agreeing with some people, but not all of them.

From that perspective, the best self-defense weapon isn't one that you heard about, and should aim to acquire. Rather, it will have the following features:

- It should be a weapon that you are comfortable using. Just because a .45 caliber semi-automatic has plenty of stopping power, that doesn't mean you should give up a lower caliber revolver that you feel comfortable with. In a similar fashion, if you feel more comfortable wielding a knife at close ranges, it doesn't make much sense to draw a gun just because you have it on hand.
- Your personal defense weapons should fit your needs, budget, and comfort levels. In a stressful, life threatening encounter with a criminal or terrorist, a weapon that you are uncomfortable with can cause you to freeze up, miss the target, or lose complete control of the weapon and the situation.
- A personal defense weapon should be something you feel comfortable carrying at all times. Remember, even a ballpoint pen can kill at close range in numerous ways. Never underestimate the simplicity of a device just because it looks harmless, or others don't see it for what it is. Within some limits, a weapon that you design yourself can truly be more effective and more efficient than anything you might buy based on the beliefs of others.



# Fundamental Parts Found in a Personal Defense Weapon

From fists to guns and nuclear bombs, every weapon known to humanity has some fundamental parts. If one of these parts is mismatched in terms of scope or capacity, the overall effectiveness of the weapon will suffer.

When designing your own weapons, it is very important to develop your plans with all of these parts in mind. By making sure that the parts all match up, you will reduce the risk of the weapon failing while increasing the chance that it will work properly in a time of need.

## The Payload

This is what actually reaches the attacker or adversary. It is designed to inflict certain kinds of damage in order to stop the other person from reaching you or causing you further harm. Different payloads have varying effects.

Before you design the rest of the weapon, it is absolutely necessary to understand what the payload will be and how it will work. Here are some options to consider:

### **Cutting or slicing**

Payloads that cut or slice must, at a minimum, cut through skin and flesh. If the adversary is wearing armor, then the weapon must be able to cut through it without breaking the blade. In a similar fashion, if you are aiming to cut past the skin and muscle, the weapon may have to cut through bone or cartilage.

Knives, swords, spears, and arrows are examples of payloads that are designed to cut or slice. You can choose from straight edges or serrated edges, as well as sharp, angular points, curved points, or chisel points. Thinner blades will always be weaker, but able penetrate further through materials that are susceptible to them.

In addition, the thinness of the cutting edge will be largely determined by the material used for the blade. For example, an obsidian blade may be sharper than a stainless steel one, however the latter material is less likely to break under strain.

Today, there are newly emerging polymers that weigh less, and work just as well, if not better than metals. They also have the advantage of being harder to detect, do not require sharpening, and require very little maintenance.

If you decide to design a knife using these polymers, it might be worth your while to consider a multi-function blade. In this case, I would recommend a curved tip (I find these better for both precision and deep structure cutting) and then a serrated portion towards the back.

You can always use this knife for sawing through underbrush or other items that do not respond well to a straight edge. Needless to say, if you need to build some kind of trap or snare for the sake of personal defense, this serrated edge will be of more value than you might realize at this time.

### Penetrating beneath a surface to deeper layers

Knives, spear tips and other payloads with blades are often limited in the depth they can achieve. This is why some projectiles, such as bullets, are designed to penetrate much deeper.

There are dozens of different bullet designs on the market. Some take advantage of a narrow form and sharp point to cut through surface layers while others are thicker and longer so that they can push past bone and armor.

If you are going to design your own bullets, you should have a good understanding of which materials will break through to the target. You will also need to decide what you want the bullet to do once it reaches the target.

For example, even though all bullets will deform or flatten, others will explode and send shrapnel into other areas within the target.

## Crushing or breaking

Payloads designed to crush or break something are usually blunt and heavy. If they do have sharper parts, they may be in the form of thick spikes that will use the weight of the projectile to rip and tear. Maces, clubs, nunchaka, flails, and to some extent, axes all fall into this category.

To the modern prepper, weapons designed to crush or break through armor or bones may seem like the least important or personal self-defense.

Nevertheless, if they are built correctly, they can do a lot of damage with a degree of efficiency that rivals sharp edged weapons. They are also ideal for use in traps and as part of zone of fire defense systems.

- When developing these weapons, it is important to know how much force must be used to crush the target. Invariably, a heavier weapon will require less force, but it will be harder to carry. You can, to some extent, compensate for weapon weight by using chains or other devices that allow you add momentum to the payload.
- burning there are two kinds of burns that you can focus on in terms of payload delivery. First, you can build devices that deliver flames. Alternatively, you can deliver chemical sprays that cause similar damage. As someone interested in personal defense using DIY weapons, these are truly some of my favorites. Push pens and many other innocuous variations of household items can be used to create these weapons. Even though smaller versions will not kill, they will inflict plenty of damage. Given the number and variety of chemicals that can be used in these weapons, it also makes it harder to control ammunition and availability.
- systemic disruption As with weapons that deliver a payload that burns or irritates, systemic disruption weapons can also deliver two possible payload types. First, stun guns and rail guns deliver high voltages that disable the attacker temporarily. If the weapon is powerful enough, they can also kill. Second, you can also use chemical systemic disruption systems. Neurotoxins found in insect sprays can disrupt humans and also any animals that might be used against you for attack purposes. While stun guns can take a bit of work to devise, you may find that miniature delivery systems for insect sprays will meet your needs.
- explosions in terms of modern technology, there aren't many explosive devices that offer suitable control for use as a weapon for self-defense. If you are interested in using some kind of explosive, you will be better off combining it with some other payload such as a bullet. I also don't recommend the use of poison gases for personal self-defense because you can easily fall victim to these gases or hurt other innocent people that are exposed to them.
- infliction of illness Overall, trying to infect someone with a disease before they
  kill you in an attack is not going to give fast enough results. That being said,
  tetanus and many other diseases can infect wounds and cause long term

- disability or even death. If you are interested in inflicting this kind of long term damage over time, there are many disease bearing organisms that can be carried on just about any weapon that can break the skin.
- poisoning no discussion on DIY cold weapons used for personal self-defense
  would be complete without discussion poisons. Even without a visit to the local
  department store, there are all kinds of poisons in nature that can disable in a
  matter of seconds and kill in a matter of moments. From snake and frog venoms
  to toxic mushrooms and plants, your choices are truly endless.

Several other payload types can be enhanced by adding poisons.

For example, polymer blades may be built to hold reservoirs or channels that can be used to release poison once the skin is breached. Modified ballpoint pens, arrows, spears, swords, and arrows can all be dipped in poison to make them even more effective.

## The Delivery System or Propellant

Once you know what you will be sending out to an attacker, the next step is to decide how you will deliver the payload. Regardless of the system that you use, it must move fast enough to deliver the payload, and it must also provide enough force to land the payload in the intended location.

For example, if you have a bullet and throw it at someone as you would throw a spear, it will do very little damage.

No matter how strong you are, your body cannot provide enough force to cause the bullet to break the attackers skin let alone delve deep into the body. In general, increased speed also equates to increased force. It also shortens the amount of time for the attacker to take actions to counteract or avoid the payload.

Delivery systems can be as simple as using your own body or as complex as using magnets to accelerate projectiles as they move towards the target. Here are some systems that you can consider in relation to a payload of your choosing:

## **Body Power**

From punching to stabbing, chopping, or thrusting, body power is something that only time, lack of practice, and disease can take away from you. That being said, even if you are in excellent physical shape, you will not have enough power to deliver the kinds of payloads that may be needed to resolve a situation.

If at all possible, try to enhance body power with other delivery methods. For example, if you are going to design a knife, try to adding a spring behind the tang so that there is increased thrusting power on impact.

Needless to say, this knife design would also require considerable modification to the handle so that the blade can move freely without falling out of the handle.

## Slings

Chains, rope, or other items are ideal to use with stones and other blunt objects. They can also be used with spears and knives. In particular, the atlatl (spear launcher), kestros (essentially a heavy dart thrown with the assistance of a sling), and monkey fists are all weapons that take advantage of swinging a projectile in order to send it a further distance with more force.

Siege engines are some of the most fascinating devices based on slings. While it is not practical or feasible to lug a siege engine around for personal self-defense, you may be able to take advantage of twisted ropes to launch smaller payloads over shorter distances. In this case, you might be able to use something as simple as rope, a reel, and a nail as the basis for the delivery system.

Darts, knives, stones, and even poison bearing payloads can be launched using twisted rope slings. Just bear in mind that even a smaller twisted rope delivery system may be a bit cumbersome to carry. You will more than likely need to look to some of the more durable polymers on the market in order to reduce both the size and weight of the device without sacrificing strength.

#### Levers

In the absence of more complex systems, lever action rifles may be your best option for launching bullets. You may also want to see if you can add some kind of plate that can be used to spin the bullet before it is fired. This will reduce the need for longer barrels and larger guns that might not work well in close quarters.

#### **Pistons**

One of the easiest ways to propel an object is to push it with another one. Piston driven systems can use air or oil to push a piston, which will then have enough force to push the payload further and faster than using other methods.

Once again, high performance polymers may make it possible to build lighter and more efficient weapons. Given the precision associated with pistons and enclosing chambers, you might need a 3D printer or other tools that will enable you to get suitable tolerances between the parts.

## **Springs**

At first glance, springs may seem either too strong or too weak. You can arrange weaker springs around each other to deliver combined force, and also use levers and rope systems to arm springs that may be too hard to move with body power. Darts, spears, and rocks, and BB's can all be delivered using systems based on springs.

#### **Flexion**

Bows used to launch arrows and bolts have been used for thousands of years. They are still powerful self defense weapons that can be built with relative ease. Just remember that if you are going to use a flexion based delivery system for self-defense, you will need a good bit of space to work in.

## **Controlled Explosions**

Guns and other devices that rely on controlled explosions work best in terms of delivering a payload quickly and with plenty of force.

If you plan to build devices based on controlled explosion, you will need experience in metal working as well as suitable materials. While polymers can also be of help here, there are still many parts to consider.

Overall, try experimenting with other delivery systems before trying to enhance these designs; especially if your goal is to create a completely untraceable DIY self defense weapon.

## **Electromagnetic Propulsion**

Many of these delivery systems are based on capacitors, magnets, and other simple electronic parts. That being said, building a small, safe, effective device can be challenging. Of all the delivery options, electromagnetic propulsion offers the greatest in terms of flexibility.

Among other things, you might be able to adjust the energy emitted by the device to work better in close settings, and then ramp up the power if you need to hit something at a greater distance. If there is one single weapon that has the potential to be effective at close ranges and longer distances, stun guns, tasers, and other weapons in this class are likely to be best to work with.

## **Target Acquisition**

No matter how much power a weapon has to deliver a payload, it won't be of much use if there is no reliable way to aim the weapon. Target acquisition can cover a wide range of skills and devices. For example, if you are going to stab or cut, then you need good eye to hand coordination.

Unfortunately, this part of a weapon is always the most susceptible to human error, illness, and anything else that influences your ability to aim a weapon. Here are some

things you should consider when designing modules that will help you hit the target with as much accuracy as possible:

- an adversary will always be on the move as they progress with their plans. If you are hiding and using laser or other guided sights, you will still need to predict where the target will be when/if the payload intersects with it.
- Adding a measurement scale can help you gauge the speed of your adversaries
  movement and also reduce the risk of your eyes being tricked by low lighting or
  conflicting background colors.
- Make sure that you include lenses that make it possible to zoom in or out on the target.

## **User Interface**

Have you ever looked at a knife or gun that seemed perfect for your needs? Then, when you picked it up, did you find out that the handle or grips were too small or large? Just about every weapon you ever use will be more or less useful to you based on how well it fits in your hand.

Fortunately, this is one of the easiest parts of a DIY weapon to customize for your personal needs. Here are some things that you always try to build into each user interface:

- you should be able to hold the weapon without parts of it rubbing or pinching.
   For example, if you build a knife, the handle should protect your hands from the blade. It should also fit comfortably without sliding around in your hand.
- The interface should fit your hand well so that you do not wind up dropping it.
- Try to build an interface that can be used in either hand. At the very least, if your dominant hand is injured, you will have a better chance of effectively using the weapon with your other hand.

• Use straps and other devices to keep the weapon in your hand even if your fingers lose the ability to grip. These straps can also be used if you have a disability and need other modifications that enable you to use the weapon.

As you browse websites or stores that sell weapons, it is very easy to be fooled into thinking you can build a DIY weapon by following in the footsteps of other designers.

Even if you purchase a knife or some other weapon as a model, detailed planning is still critical to building a good quality, useful weapon for self-defense.

In Part One of this report, we built a foundation of understanding the most fundamental parts of a weapon and the technologies available for each part. As simple as this may seem, you may find yourself going back to this section many times as you begin to design your own weapons and build them.

Never forget that the basics are always where you will return to solve problems as well as where you will go to explore new innovations and ideas.

Stay tuned for Part Two and further details on materials, design steps, and assembly.

## Resources

## Other Survivopedia Articles About Making Weapons

**DIY Cold Weapons to Use when Your Ammo Ends** 

**4 Deadly And Easy-To-Make Weapons** 

**DIY Knives for Off-Grid Survival** 

5 DIY Survival Tools To Make From Scratch

5 Little-Known Cold Weapons For Your Defense

**Survival Defense When Guns Are Not Allowed** 

**DIY Project: How To Make A Clothespin Gun** 

DIY Project: Two Ways To Make A Pen Gun

## References

http://www.siege-engine.com/TorsionAndFrames.shtml