

Weightlifting and bodyweight exercises

Building muscle is important to boost confidence, promote positive mental outlook, increase testosterone, add strength and mass to strikes, bulk up to add armor to body to take hits, physically intimidate opponents, improve bone density, improve overall health and recovery times from training.

The bigger the muscles the faster and strong you hit. The larger the body mass the more it act's as protection from hits. The stronger the bones the harder they are to break and the easier they break enemy's bones.

Standard weight training is covered. To prepare for heavy lifting exercises a period known adaption takes place. This is body weight exercises to strengthen core and joints before placing excessive stress on them. This prevents injury and plateauing.

Basic body weight exercises are pushups, pullups, situps, and squats. It is ideal to alternate sets of pushups with sets of pullups. Pushups build chest but mostly the triceps and anterior deltoid. This makes you do straight punches and shoving stronger. Pullups build up the latimus dorsi and teres minor of the the back, the biceps, and probably the posterior deltoid. This makes pulling movements for throws and punches that bend like hooks and uppercuts stronger. Situps build core strength and provide stability for arm movements. Squats condition the legs help overall health. The squats burn extra fat and increase leg and hip flexibility. Squats also cause a secretion of testosterone Making upper body gains in muscle and strength happen faster. Overall health contributes to high energy levels and being able to recover from one training session to be ready for the next.

Alternate sets of pushups and pullups. This combination makes the body tire quicker then usual and saves time making workouts more efficient. After all sets are complete start doing sets of situps and squats. The upper body workouts are to maximize muscle while the core and lower body are to boost stamina and lower body fat percentile. This makes the lower body sets have a cardiovascular effect. This will also reduce the build up of lactic acid in the muscles and make you less sore the next day.

Bodyweight exercises can be done everyday or every other day. Everyday is preferred with a stretching routine added in. Used with karate, leg flexibility to train stances and high kicks is emphasized. Used with aikido, wrist and back flexibility is emphasized to resist wrist locks and deliver them more forcefully, and

to maintain balance or recover when being thrown. Flexible muscles are stronger and joints benefit from resisting dislocations better.

Bodyweight exercises let you learn movements to perfect form before you train with weights. This lets you move correctly without hurting yourself with weights. Form and range of movement are emphasized and allows for flexing and stretching the muscles in a safe and controlled way. You have greater control and can target muscles easier there angle manipulation. Improves balance and builds small supporting muscles that are neglected in weight training. Helps with balancing and stabilizing your core, and allows for fullest range of motion which is also impaired in weight training. Connective tissues strengthen and thicken preparing the body for the intense stress placed on it during weight lifting. Do this first before beginning serious weight lifting program to boost stamina, work out all the small muscles that will hold back pushing huge weight, and protect ligaments from snapping and separating from lifting weights they are not accustomed to. This is important.

Work at home instead of a gym because people there never experience gains and are mostly socializing instead of getting results. Often the equipment you need is unavailable and you have to wait. Gyms are good for cardio or yoga classes where you are lead by an instructor but this is mostly maintenance instead of building the destructive power needed to be a fighter.

Bodyweight Exercises

Diamond pushups

High position increases jodan barai
Middle position increases chudan shutouke.
Low position increases gedan barai tsuki.

Regular pushups

Closer than shoulder spacing increases tricep and inner chest.
Shoulder spacing increases things equally. Chest/back/core/arms.
Wider than shoulder spacing increases outer chest.

Matrix pushups increase medial deltoids.

Superman pushups increase core strength.

Plank pushups increase core and cardio.

Spiderman pushups increase obliques and flexibility in hips.

Yoga pushups increase flexibility in back for wellness and mental calmness.

Challenge yourself by aiming for a record of nonstop regular pullups. Get up to 70-77, then target 300 repetitions. Train for this by doing pushups everyday and then add one a day till you are up to 300.

Undergrip pullups- Increases biceps, adds thickness to back.

Close undergrip pullups- With fists touching works biceps the most.

Overhandgrip pullups- Takes biceps out and works back more.

Wide overhand- widens latimus dorsi, in adolescence widens clavicle.

Ultrawide overhand- Increases cartilage between shoulders to give illusion of width after plates stop growing.

Gi pullups- toss go over horizontal bar and grip fabric. Improves grip strength.

Situps with hands crossed on chest- Easier so you can do more.

Decline situps with hands crossed- Harder and works lower abs better

Hands behind head situps- Harder and places more stress on back

Twisting situps- After situp, twist at top. Works obliques and burns more calories.

Chair situps- Sit in chair and do situp. Allows wider range of movement, works lower abs.

Squats- Keep heels on ground. This works your quadriceps and hamstrings. Improves balance.

Barbell and Weight Plate Exercises

Benchpress
Barbell curl
Dumbbell curls
Latimus pulldowns
Seated rows
Back rows
Upright rows
Chest flys
Back flys
Triceps rope pull down
Overhead triceps extension
Overhead dumbbell extension
Skullcrushers
Preacher curls
Anterior deltoid flys
Wrist curls
Deadlifts
Military press
Pulley ab crunches
Cable twists
Squats
Lying leg curls
Leg extensions
Calf raises
Barbell lunges
Dumbbell lunges

There are countless strategies for maximizing muscle gains since different physical compositions respond differently to training stimulus. Learn your body and train within reason. Do things that are logical and get you results in a quicker way. Focus on consistency and make continual progress even if it is slow. Never fall backwards in your training and plateau. Pick a weight you can easily dominate so that you don't tire and can maximize your time by doing other exercises. By doing this you can always workout safely and pain free giving you encouragement for the next workout. This becomes habit building and forges a lifestyle where you are not spending countless hours struggling to get gains nor skipping workouts because you are sore or dread doing the work. It makes training more like a fun

sport instead of a chore that is boring and dull.

Pick a weight you can easily dominate so that you don't tire and can maximize your time by doing other exercises. Selectively add weight every week to force your body to adapt to greater demands. Use cool down periods to let body heal before resuming lifting program. The body needs light days to heal inbetween heavy days. One option is to use step loading progression. Plan three workouts a week with a rest day inbetween. Each week add a minimal amount of weight for each exercise. 5lbs. a week is ideal but as little as 1lb. or as much as 10lbs. might be more appropriate depending on the exercise and how far off you calculated your planned beginning weights for each exercise. More on choosing specific weights for exercises later and how much to add. Do this for three weeks. On the last week of each month lift lighter than usual or substitute bodyweight versions for some of the exercises. This is to rest the body sufficiently so that it does not suffer the wear and tear from excessive working that leads to plateauing.

Plateauing is when you overwork the body lifting as much as you can. In the beginning huge gains and great success, but then you keep pushing until your body stops getting stronger. You hit a ceiling in your training and can not add more weight. You might even not be able to hit weight levels you previously achieved. Your body is tired and can not continue to keep up this level of intensity. Your weightage starts slipping and if pursued you will sprain or pull something. Now you are injured and have to take days and weeks off training. While healing the gains you made are going to disappear as the muscle begins to atrophy due to inactivity. Something like 4% a week muscle loss. So don't overtrain or lift too heavy. Prevent this with structured routines that encourage to slowly build up size and strength without suffering negative effects like plateauing where you have been curling 100 lbs. for the last 1.5 months without making any progress in size, strength, definition, or stamina.

Time when you are going to lift and focus. Listening to music interferes with this. People listen to music because working out is boring but it takes attention away from what you are doing and makes lifting maximum weight impossible. Music is suitable for cardio machines but that is all.

Depending how tired you are or how difficult the exercise is will affect how much time rest time is needed between sets. For maximum strength 5 minutes is average. For stamina 2.5 minutes is average. The more you overdo it the longer the rest intervals. Benching heavy should top at 7 minutes simply due to time

requires to complete other exercises. Excessive weights might bring superlative results but you have to sacrifice exercises for other muscles groups as time will run longer. Heaviest bench pressing will require rest periods of 10-15 minutes. If you are doing a regular routine and find that you need 10-12 minutes of rest between sets I would be concerned that the routine is not the most practical. Try tweaking it so that you have shorter rest periods. This might involve changing the order of other exercises or lifting lighter or less repetitions.

How much to lift vs. how many sets vs. how many reps?

What is the most weight you can lift for one exercise? This is called your one repetition maximum. Finding this for each exercise is important.

Lift 40-50% of your 1 rep max, 7-12 sets, 12-15 or more reps. Stamina or cardio.
Lift 60% of your 1 rep max, 7 sets, 10 repetitions. This is medium intensity. Use this.

Lift 80% of your max, 5 sets, 5 reps. This is heavy intensity. Focus is more strength.

Lift 95% of your max, 2-3 sets, 2-3 reps. This is ultra high intensity. Rarely use this.

Use 60% for size, strength, and stamina. Stamina is the same as endurance. It determines how many times you can perform an action until you exhaust and muscle fails. The more you can repeat a lift the stronger you are at that weight. If you are easily completing more than 10 reps and it is more like 12-15 you are now more cardio. 18 reps and up is high cardio. Lifting for 10 reps is ideal with an occasional 1-2 rep extra to overload. Overloading is when you can only do 10 then wait 1-5 seconds and do an extra rep or two to damage the muscle. Muscle grows is a response to purposely creating micro tears in the muscle then resting to let it heal, causing it to heal bigger. Overloading can cause extreme gains but don't do it to much. It works for some and other people don't benefit as much. It is considered an advanced training method. If you are advanced then you can do it every set but fatigue then becomes a concern. When size and stamina are not a concern lifting 1-5 increases maximum strength.

Benchpress

Weightlifting version of pushup. This makes you bigger and stronger. Increases breath control and the tensing of the entire body through holding breath as you lift. Progress is measured through percentages of how much you can lift

compared to how much you weigh. Start at least with a 100lbs of weight. Progress weekly until you are hitting your bodyweight. From there work toward 1.5x your bodyweight then 2x your bodyweight. If you are lifting twice your bodyweight you are very strong and pretty much an elite lifter. Anything over 300lbs. is impressive.

Stabilize your body and keep it rigid to prevent barbell sliding all over the place either hurting you or weakening your arms so that further repetitions are not possible or you are unable to lift the maximum weight possible.

Stability is achieved by lying flat on bench and grabbing bar. A slight arch is okay in the lower back. Grip bar with both hands. Take a few practice breaths. grip bar tightly and push off rack. Bring forward and lower to just above the nipple. Breath in as you lower, hold breath and barbell above chest, lift till arms completely straightened, then breath out. At the bottom of the lift you stabilize the core by holding your breath. This contracts the muscles supporting the core and diaphragm making for a tighter more rigid frame. A rigid frame is more stable than a soft non tensed frame. The more stable you are the more you can safely lift.

When pressing the bar with your breathe held your blood pressure increases. This spike in blood pressure cause physiological changes to occur in the brain. The body responds by releasing chemicals in the brain to make you stronger and cope with this intense demand placed on the body. Sick people can not do this because they will have a brain aneurysm, stroke, or heart attack and die. Regular people just get buffer.

Some books tell you to breath during lifting but that is not going to make you stronger. Either it's a commie plot to keep you from becoming to macho or they are worried about legal issues arising from being sued by the family of an old guy that was too sick to perform a safe lift correctly. If you are breathing out on as the lift is going up this is proper for relaxation but all stability is lost and you will struggle with heavy weights. This will make your arms fail and start spasming. You may or may not complete the lift. If this ever happens stop immediately as muscle failure has occurred and further repetitions are pointless.

You can breath as the lift is going up but you have to reduce the weight considerably and this not at all recommended. By reducing weight you are not forcing the body to adapt to the demands required to force hypertrophy to occur.

If you are on a light week then you can reduce weight by 20% and breath out at you push. This can make the training fun as you are deliberately using relaxed breathing in your form meaning that the weight you are pushing is easy for you. When you can breath out at a weight setting that you used to not be able to even budge there is a great sense of achievement.

For more stability plant feet on ground and flex as you push up so wobble is minimized. This makes bench pressing healthier and a fuller body workout. Use ball of foot for connection to ground if you are short. Superset bench pressing with pendlay rows to make efficient use of time and get stronger back. A strong back provides support for bench pressing.

Bench 125lbs. At first to focus on form and learn how to manipulate the bar. Every week add 5lbs. either side of bar. After a month you should be up to 165lbs. Grip the bar tightly as if trying to crush it. This develops gripping strength similar to gi pullups. This is not very heavy on purpose. The light weight allows you to push up fast and forcefully. This adds explosive power to your punches. Force is made from moving fast with resistance. As you add weight you maintain this speed factor and grip ability. It is a weight you can dominate and build from the ground up correctly with no imbalances. Once you are at 165lbs. Either add 5 or 10 pounds total a week until you are up to 200lbs. 200 pound lifts are marginal strength for most men. At this point add 5 pounds total a week until you hit milestones of 1.5x your bodyweight, 300lbs., 2x your bodyweight, and 2.5x your bodyweight. 2.5x your bodyweight would probably put you at the top 1% of lifters in the world. Don't worry how long it takes to get there or if it doesn't happen. Just continue to make progress and maintain and build a stronger body.

Variations

Close grip- These focus the triceps for stronger punches. They make the outer part of arms bigger and harder. If you do too many of these your overall chest muscles suffer as a result. Chest muscles are needed for different karate moves like inside blocks. These do make training grip easier however and a strong grip is needed for all weightlifting. Having a strong grip also strengthens the wrists.

Normal grip

This is the main version. Builds anterior deltoids and middle of pecs. This is takes development of muscle further once you have adapted and mastered pushups.

Adds a ton of size and strength.

Wide grip

Works outer chest. Harder to do. Improves overall appearance of chest and makes pecs strong in different ranges of movement. Doesn't add as much strength as other versions since muscles are forced to work in a mechanically weak position causing total electrical activity levels to drop, lowering recruitment of muscle motor units. Basically brain doesn't send enough information to arms to tell muscles to work. This is for more advanced lifters who need balance in their appearance or function specific where they need to push strong with their arms in a weak position. Martial arts tells us to use good body mechanics so the benefits of overly wide pecs that are very strong in a compromised position are dubious. Might be of more benefit to grapplers or judoka, but most likely wrestlers or even sumo.

Underhand grip

Weak and unsafe. It works muscles in a different angle than they are used to. Doesn't provide best gains and you have to drop weight considerably. Might be a consideration to break up boredom of lifting or getting stuck in plateaus.

False grip

Compromises grip and unsafe. Doesn't build grip. Mostly an ego lift to prove you are strong and don't need to hold bar safely. This should never be used.

Dumbbell

These are harder so you need to drop weight. Since there isn't a connecting bar balance comes more into play causing body and mind to get slightly confused making you lift less. Without the bar you are able to safely spot yourself with just a bench and no rack.

Incline

This works upper pecs. This is needed for total pectoral development but is mostly aesthetic. Save this until you have years of training and desire a perfectly formed chest. Incidentally the diamond pushup with hands placed in front of head hits same areas. It is probably more important to use that instead of this because varying bodyweight exercises is more important as you are

building the body up as a unit instead of isolating individual groups. This version does not build as much strength as others such as decline and flat. If you want to do incline bench presses try using dumbbells at 70-120lbs. They seem to make more sense and work more areas since they are free floating. Dumbbell versions of barbell exercises are always harder. Depending on the exercise and goals wanted this may be better or worse. Doing incline dumbbell presses give you more freedom of movement and the little imbalances allow you to build both sides of the body evenly. Since you have to drop weight for incline presses anyways it makes sense to switch to dumbbells, they also use a lighter weight. With a lighter weight make the most out of the exercise by hitting more areas to build greater overall strength and uniformity.

Declines

This builds lower pectorals. Complete chests work the upper, lower, and middle chest. The lower pectorals are the largest and can bench press more weight. For this exercise add 20% more than you would the flat bench press. This variation is popular because you can push more weight leading to greater gains and it looks impressive benching a lot of weight. The problem is it only makes you strong in the pressing downward position. Applications are wrestling. Grab opponents shoulders and head and hold him down bent forward at waist. He will fight and swing punches trying to free himself. Due to superior strength from benching declines you can easily hold him statically. Bodybuilders and wrestlers who are huge benefit more from this than average built fighters who rely more on Asian martial art techniques. This is a brute strength move and is used merely to restrain a resisting person. Unless you are hulk like this is impractical training. However if you are active wrestler it makes perfect sense. Karate doesn't benefit, Brazilian jujutsu doesn't benefit, and boxing doesn't benefit. Being taller and having thick lower pectorals gives sense of presence and looks intimidating. People *would* be less inclined to fight you and you may avoid conflict simply from being huge.

Overhandgrip pullups where you push yourself up above the bar like gymnastics work the same muscles. Some people call these pullups muscle ups. There is some functional aspects in this for climbing or scaling walls.

Learn incline and decline variations after mastering flat bench presses. Flat bench pressing by far yields the most combative applications.

Use mainly the normal grip and sometimes the close grip. Close grip takes out the chest and overloads the triceps and anterior deltoids. There is danger of

overtraining the deltoid or triceps with close grip. Use close grip if you have good chest strength but are lacking or wanting more shoulder and tricep size, strength or definition. Do not use close grip if you are already training those muscles with dedicated exercises. Use varying hand spacing in finger width increments from normal out to wide grip to slightly alter your workouts and give a different feel. This hits the muscles from different angles and helps bring different muscle fibers into play causing greater strength and size. Changing it up slightly while staying close to normal grip is beneficial.

Pectoral major, triceps, anterior deltoid are all heavily worked on the positive phase. All back muscles including latimus dorsi, rear deltoids, and biceps are worked to an extent during the negative phase. Legs get slight activation during pushoff and through acting as stabilizers. Deep abdominals get worked acting as stabilizers. The outer abs function as cosmetic muscles but the inner abs that are not visible function as support for your inner organs. By not using weight belts to support the lower back during lifts you rely on your inner abs to protect your spine and make sure it is aligned and does not slip out of place. In essence your deep transversal abdominis acts as a weight lifting belt. Lifting with a belt helps you lift more but creates imbalances. For balanced development never lift more than your weakest muscles involved can support and don't rely on weight training aids that take away from training these important groups. When you go to perform a lift and you are not wearing a belt your overbuilt muscles will try to overcompensate for the under built ones and this causes potential for injury or hernia. Weight belts are intended for power lifters either performing maximum lifts or training for upcoming events. They should not be used by people seeking total strength for fighting arts. They act as too much of a crutch.

Pendlay rows

This works the large muscles of the back. Best exercise to superset with bench presses. A strong back makes it easy to pull things towards you and works with the bicep muscles. Exercises involving pulling work back and biceps. A strong back provides a solid foundation to build a powerful chest. Chest muscles are used with triceps for pushing things away from your body and punching. Understanding this push pull relationship comes into play when discussing things such as breath movement and control. Typically breath in when pulling and breath out when pushing. Only hold breath when you need to make your body hard like when hitting you tense all muscles at the moment of impact or for getting hit and you need a solid stance with tense legs and blocking arms.

Strict form is necessary for rows. Basic is bend over 90 degrees at the waist. Using overhand grip, hold barbell slightly wider than shoulder width. Hold knees slightly bent. Position feet for good stance. Using fast almost jerking motion to yank the bar up to your ribcage. Keep strict form and do not allow the violent pulling motion to break your form. Bar should touch just at the lower of your ribcage or up 1 inch. You may slightly break form when the bar touches but not from the pulling action. Do not rock up and down. Back for back and takes stress of muscles being targeted. To not perform modified good mornings!

To maximize this exercise slowly lower the bar on the way down. The slower the better. Pendlay rows benefit more from slow negative lifting than any other exercise. This exercise is difficult because form is hard to maintain and learn. Doing the lowering part slowly makes the most out of an exercise that isn't very fun or glamorous. Building up the back is important. Using strictest form will get results faster. Stay bent 90 degrees the whole time, do not wiggle or stay angled between 45 and 90 degrees. This changes the way the row is performed and starts doing a different exercise like a low row bringing the trapezius into synergy. We do not want that.

Slowly lower until arms are fully extended, even a slight stretch in the arm sockets, then explode upwards pulling bar directly to ribcage. Breathe in when pulling the slowly exhale while lowering. Learning to breathe correctly while lowering takes practice. Spend one second to pull up and 5 seconds or longer lowering. As soon as bar just reaches bottom pull up quickly. This builds force. When the bar is up try to hold it and flex the latimus. This is difficult to put all of these different aspects together. When the bar comes up it hits ribs, slightly bounces, and then you have to catch it holding it about an inch from body. Lifting slower gives more control but does not build muscle as one would like. Fast movements make muscles bigger over slow movements. Slower movements tend add flexibility, in general. When you catch the bar flex and squeeze your lats and hold as long as possible, at least 5 seconds. This is very very important and often skipped. This is what causes lats to grow wider giving a tapered trapezoidal look. You can feel the lats quivering when flexed letting you know you are doing it right. Slowly lowering the bar also causes the muscles to get bigger.

Just moving the bar up and down is good for strength but this is more of a mass building exercise to provide a stable base for bench pressing. You do not want to just go through the motions mindlessly lifting. It takes time to perfect all these little nuances, similar to kata. Sometimes if you are tired you can cheat a little and lower it regular speed stopping at multiple spots along the way but this is not

good. Stopping and holding at 3 or 5 spots for a few seconds makes any exercise harder. The purpose of doing that is to be strong at those specific spots. On this exercise we don't want that. We want to build a bigger back and increase pulling speed and strength. We want to grab someone and violently yank them towards us then smack them or yank them towards us, turn and push them to ground. We don't want to build the strength to statically hold them at these specific individual spots from us. If you after holding the bar and your lats tire so much that when you lower the bar you feel it traveling to fast, stop and hold it at a point, then lower slowly, or drop and hold, drop and hold.

This is an exercise where you can overload and punish the back as much as you can. The only important thing is keeping the best form possible. Half of this exercise is performing the other half is working and striving to perfect the form of it so future training is easier. It is a very difficult and technical lift.

The weight range for this exercise is 60-175 pounds. You can go as high as 230 pounds but this is not intended for powerlifting and involves the use of static holds, fast dynamic speed lifts during the positive phase, and extremely slow lifts during the negative phase. This centers around technique more than weight.

Use a light weight to start and gradually add weight once you can maintain good form. Once you can lifting heavier add as many sets of reps as you can. Due to the requirements of building strong chest and arms the back gets neglected so anything you can do to increase back workloads is acceptable. Do sets of 10,15,or 20. Lift in a way so that you are training it to remember to pull in the same way again and again. If you can do 10 repetitions you can probably do 12 or 15 since the back has tremendous energy reserves and capacity for work. That is why so many tricks are required to get it to grow. It would be absurd to apply this many technical details to every exercise. The back is just one of those areas we really need to be picky about how the lifts are performed. While sets of 10 is ideal for general improvement for all exercises is safe to add more for this specific exercise since we are lifting a lot less then are max and then compensating by using an incredibly difficult form.

Do a set of 10 to warm up. Then maybe a set of 12. Then 15. Then another 15. Try overloading and see where you can only do so many as a set then only two more max without breaking form. Once good form can not be maintained immediately stop. Lifting past this point will teach incorrect muscle memory. To get serious about actual strength do dumbbell rows pulling 100lbs. with one arm.

Whether you do slow negatives or all that other stuff or not doesn't matter. With one arm dumbbell rows you only need to hit the lats for a split second then lower semi mindlessly pumping your arm back and forth. Use Pendlay rows for size and shape then harden it with one arm rows.

Works latimus dorsi, teres minor, posterior deltoids, and bicep.

Bicep curls

Biceps must be developed for strong pulling, uppercutting and choke holds. The biceps get worked during any back or pulling exercise but they still need special attention to develop properly.

Do a half your sets. During the last few sets add an extra rep or two to burn out the bicep and make sure muscle failure is reached. Reaching muscle failure is important because it forces your muscles to grow. Muscles only grow when they are forced to perform work they are not accustomed to. If you never reach muscle failure the body thinks it is strong enough and doesn't do anything. If you reach muscle failure the body freaks out and tries to overcompensate by building bigger stronger muscles. Aim for muscle failure on all your sets and try overloading the last few sets for superb gains.

There are probably hundreds of variations of bicep curls. Find one or ones you like. These are the best ones I know.

Barbell curls

Builds bigger arms and you lift most weight. This version is required. Grip bar tightly. Can roll wrist to improve grip even more and cause tighter contraction at elbow.

Dumbbell curls

Improves peak of bicep and improves definition. These are required. Do these at end of workout to fully burn out your arms and make your biceps look very aesthetic and pleasing. Without these, barbell curls just explode your arms and make them look all pudgy like footballs. Gross.

Seated dumbbell curls

These are hard, use 25lbs. Seat in an angled back bench and let arms hang straight down. Use good form. This helps you get past plateaus. It works different muscle fibers teaching them to grow and begin to start working when doing your regular curls, thereby making you stronger since more muscle fibers are working than normal. These suck and only do them if you have to. If you are stuck in your training and can't lift more or get bigger arms these are required.

Cable curls

These make no sense and are virtually worthless. Use these if injured or trying to heal after an accident and need rehabilitation to learn how to move the arm again. Not as good for blasting past plateaus but a hell of a lot easier and nicer. Maybe an option for exceptional lifters with impressive bicep development who have no trouble getting gains or bicep junkies and have extra time at end of their workouts. Finish workout by doing giant sets of 40-50 to burn off lactic acid.

Preacher curls

These aren't bad. Helps develop head of biceps and build big arms. Combines some aspects of both barbell and dumbbell curls. Due to the close hand spacing the bicep is targeted in an unusual way that cuts inside the inner part of the arm and diagonally recruiting a different combination of muscle fibers. Fun to do and makes like more enjoyable. Since a barbell or dumbbell is not involved balance is not an issue and form is not very strict. Just make sure to keep your forearms on the pad. You can pile a ton of weight on the stack and use leverage to get heavier lifts, kinda like cheating. Grunting here helps. Should make you lift at least 15lbs. more than barbell versions. Higher weights make for greater gains.

Ez curl bar

Takes pressure off wrists. This may make the wrists develop slower. All curling exercise place stress on wrists causing them to thicken ligaments and develop stronger gripping power. However the bar is held at a v angle and with less pressure on wrists you can focus and crushing the grip harder forcing a stronger grip on every repetitions. This may help wrist and grip strength more.

Hammer curls

Tends to cause arm to sway. This makes the anterior deltoid work a little more than other curling versions. All curling versions work the biceps and front or anterior deltoid so form is stressed to prevent the deltoid from doing too much of the work. With this however even keeping elbows tucked and all that you are holding the dumbbell in a way where the weighted end is unbalanced and that is going to kick your arm up a little. This definitely improves grip and peak of bicep. A suitable alternate if you want a different feeling during bicep training or have a desire to work the bicep from different angles to maximize motor unit recruitment. This helps prevent plateauing before it begins. Also helps to create not only strong function muscles but also good looking, balanced, well proportioned and aesthetic looking bodies.

Works biceps, anterior deltoids, forearms, and finger flexors for gripping strength.

Lat pulldowns

The pulldown to the front is more effective than the one to the back. Pulldowns mimic pullups and work same muscles. Working the back from different angles helps make it stronger. Doing this in between and allows you to rest other muscles while working out others.

Range is 135-210 pounds. Form varies. Strict form may not be the best approach. Strict form holds the body slightly leaned back. You pull towards chest and stop when shoulder blades prevent further reach. Holding upper body erect motion less you make slow controlled movements holding bar when at chest for a slight pause then starting over without leaning forward. A less rigid form starts sitting almost up and uses a slight assist to lean back into place. This mimics a more natural rowing motion and lets you pull heavier plates on the carriage by pulling quicker and less controlled. You don't want to use excessive rocking motion since that makes inertia move the weight carriage instead of your muscles and takes tension of the working groups. Anything and ever exercise you can add for the back helps maximize workout efficiency and shorten times. You get more done in less time.

Muscles worked latimus dorsi, teres minor, posterior deltoid, erector spinae slightly, and biceps.

Seated rows

If you really want to bulk the back seated rows ignore form and allow you to concentrate on pulling heaviest loads. You can use overhand grip or underhand grip to hit the bicep a little harder. A mixed approach between grips and hand spacing every set might add for more challenge and muscle confusion. Do a regular set with shoulder width spacing and an overhand grip. Then do an under hand grip. Then do a wide grip. Do some sets fast and some slow on the negative phase. Mix in static holds in three positions as you are resetting but pull strongly on the positive phase. Hold the bar for a few seconds before releasing on some and immediately on others.

Set 1- Regular row.

Set 2- Underhand row.

Set 3- Wide grip row.

Set 4- Regular row and hold at top, then slowly lower. As soon as bar is reset explode up.

Set 5- Underhand row hold at top longer and flex lats. Stop at 3 positions and hold on way down. At bottom explode up.

This approach differs from pendlay strategy because we are sitting in a biometric machine that corrects our form and line of pull. Since we don't have to worry about biometrics the goal here is getting jacked not perfecting form. Pulling hard and holding through all the different phases is to boost performance and work the back through as many ways as possible. The body has to adapt to many different stimuli causes hypertrophy and fat loss. Testosterone levels are elevated and stamina is increased. We will experience bigger muscles greater performance next time by being able to easily add more weight and try new configurations to pull bar. Or more stamina by being able to add more sets by being able to do 7,9,10, even 12. Using an underhand grip almost reminds us of preacher curls even though our back is pulling.

Works latimus dorsi, teres minor, posterior deltoids, and biceps.

Upright rows

This makes the the large muscles on the upper back, the trapesius, bigger and stronger. Large trapesius muscles maybe mostly aesthetic but they do provide a larger surface to rest barbells on neck for squats. There are two basic upright rows of note, the close grip and regular grip. The close grip works inner traps and the normal grip works the outer traps. The way the shoulder is attached to the clavicle, trapesius muscles do play a role in shoulder rotation and lifting the arms overhead. In bujitsu slashing the upper back cutting into these muscles can prevent the opponent from being able to lift his sword overhead to guard or perform a kesa giri, in other words certain death.

Close grip

Use overhand grip and grab middle of bar placing fists touching each other. Standing erect holding the bar, pull up to at least nipple line, or even better hands directly under chin with wrists bent. This strains wrists, don't do this if you have bad wrists. Possible to lift bar even higher being just above head. The higher you lift the more wrists bend. The stronger you are at that weight the higher and easier it is to lift. Ridiculously large range of motion, this keeps you flexible and from becoming to stiff from bulking up. Being big and strong is great but it impairs certain martial art applications and abilities and makes you rigid thus susceptible to joint attacks. This exercise also hits the biceps in a minor way as all rows do. After main biceps work use this to burn the deltoids making for much improved definition and striation. Intermix rows with curls for better back and bicep growth.

Normal grip

This makes outer traps bigger. Guys with big neck muscles look strong. This intimidates opponents into avoiding conflicts with you. If you look strong people will find easier targets. This evens out development with inner trap development. Having high peaks on your back without spreading it out to the outer traps looks funny. Instead of a subtle roll off there is a sharp drop off. Its a glaring omission and one that could provoke attack instead of prevent it. This works the traps, teres minor, various back muscles, biceps, anterior deltoid

Chest flys

This makes chest protrude more and look more meaty. It adds head to the pecs. Since this movement involves the bringing of arms to together from a spread position doing this exercise makes the chest strong from that position. Possible moves to benefit from this are in blocks, hooks, palm up shuto uke, or some sort of crushing or squeezing attack such as from a shomen sword strike where you squeeze chest muscles in this way to make cut strong.

Lay on bench holding arms outstretched at sides with slight bend in them to protect elbow joint with dumbbells held in underhand grip.

Breathe correctly and relaxed as you bring arms together in an arcing motion. Breathe out as you bring arms to together, breathe in as you swing arms apart. When lifting up make sure you don't arms don't bend inward. When lowering make sure your arms don't bend and end pointing 90 degrees in a bench press position. Lowering is difficult so weights must be light to maintain form. Practice form with 30lb.weights then move up to 50lb. once you have a feel for the exercise and the correct form. Don't lower arms so much that to raise them back up you are forced to break form making it look like a messed up bench press.

The secret to gains in this exercise is squeezing and holding your chest flexed at the top. This causes the peak of pecs to grow. Since this is considered a shaping exercise the longer you hold the better. Additionally holding it flexed in this position teaches the body to be muscularly strong in this way. For karate applications you in block and shuto become much stronger. It's why to train certain stances you have to hold them for long periods.

Since tension is on biceps use this exercise after other curls or rows. If you do this first your main exercises will suffer. If bicep training was extreme you may have trouble keeping form and this exercise will suffer. Structure your workouts with different intensities or perform exercises on different days. Since this is mostly a chest exercise save biceps training for biceps/back days and this for triceps/chest days. Muscles worked on this are mid pecs, biceps, and anterior deltoid.

Back flys

This targets the rear deltoids in a very direct way making it the most effective way to train them. After doing a back routine finish with this to make posterior

deltoids very big and strong. Rear deltoids are responsible for rear elbow attacks.

Stand with feet touching side by side holding dumbbells in each hand. Lean forward and bend knee to assume form. Get into position by leaning forward 90 degrees while using bend in knees for keeping balance and maintaining correct line of pull.

Keep arm slightly bent throughout all phases of lifting. Keeping arms in unbendable arm arc arms apart stopping when arms are at top of movement. This exercise is to be done vigorously with no slow negatives or static holds. The closest to any of this may be finding a rhythm where you lower weights and then violently swing arms stopping at top then lowering quickly but not as fast as coming up. Lift fast up then slow, slow down then lift up fast again as soon as it just about it at bottom. Do not hold and pause at various spots going down. The lowering down slow is not so much for gains brought on by slow negatives but just to time it right to do another fast lift and to pace ones self and breathe without getting overly exhausted. This exercise can be rushed if placed at end of workout and lifter is tired. Look in mirror or reflective window to watch your form. Make sure you are standing correctly and head is looking up. Looking up forces more strain on rhombus and trapezius. It pinches the muscle and encourage it to get bigger. Looking down is considered bad form and you take pressure off upper back causing it to not grow due to lack of electrical recruitment of motor units. You must keep head up or rhomboids will not be activated.

Train with enthusiasm and imagine using the movement to throw a rear elbow attack. When standing use this to elbow smash an attacker standing behind you in the jaw.

Trains posterior deltoid, teres minor, rhomboids, and biceps.

Triceps rope pulldown

Grab donkey rope and pull down keeping elbows locked at sides. At full extension flex and hold to make triceps burn. others say never lockout joints particularly the triceps, rubbish. Under resistance a flexed muscle is taught to enlarge. The muscle undergoes more micro tearing and heals larger as a result. This is a particularly good exercise to use a static hold. Weight does not have to be excessive. This is used at end of workout after all heavy pressing exercises have been performed. It is a finishing exercise to make sure the arms are completely

exhausted. Building up the triceps using this makes bench pressing easier. Builds punching power.

Weight intensity varies with training already performed. Using single giant sets of 40-100 simply to cardio burn or remove lactic acid is not recommended. This move builds two of the three tricep heads so we want to actually build and tone muscle, not waste energy in by treating this as a cardio exercise. 5 sets at least of 10-20 repetitions is better, 10-14 repetitions being ideal. Good form and control as you power the rope down and hold is desired. Don't let elbows flare out or muscle angle is inappropriate and the heads are not targeted correctly.

Start at 40 lbs. and add minimal weight each week. We want to micro load so that we are very slowly pulling more weight each training interval. The gains come from how we manipulate the rope not adding a ton of weight. By grabbing the rope just above the hand rests we are building a strong grip. Do not rest hands on the rest unless fatigue occurs and you must finish sets. Play with pulling rope down fast, holding for different times, smoothly resetting, then pulling down again. Do not hold at different spots going down or coming out. We want smooth movement down, hold, smooth movement up. Pausing at different spots trains incorrect muscle memory and makes punches choppy. Think gyaku tsuki. Hit hard with full extension then smooth rechambering. This is also how kata is sometimes performed. Punch out, hold, then smooth coming back so your arm does not flare away from ribs.

Grabbing the rope is difficult since we are not cheating by using the rests so a strong grip is necessary. Squeeze the rope like you are trying to crush it. This builds biceps brachialis or the forearms, making aikido stronger for wrist locks and tegatana. Between holding the rope and using static holds we are punishing the triceps a lot. Find the right combination of weight and time to hold down so you can reach muscle failure at the end of each set doing 10-14 reps and be able to complete at least 5 sets, 3 sets if time is limited. Keep weight the same each week and practice training the body to be able to handle the exercise better and better. This will mean that if you stopped at 10 reps and could do 12, you now find 14 reps easy. When this occurs add 5 lbs. Next training session. Ideally adding 2.5lbs. Or even 1.25lbs. each week will allow use to increase intensity without putting too much demand on our bodies to adapt. When ever we add too much weight we have to break form and use hand rests and eliminate static holds. This ruins our training goals. In the beginning we might be able to move 60lbs with bad form and a little practice clean 70lbs no problem but we are not

getting the most out of this exercise. Your main triceps training should be from bench pressing and focus should be adding weight to that exercise. This is only to target the triceps afterwards and so the should be spent from pressing. If we are strong enough to move the rope easily we have not reached muscle failure in our main sets and are training wrong.

Key points to remember are:

1. Use as supplemental exercise to bench pressing after reaching muscle failure.
2. Grab rope to train grip so fist becomes harder during punches.
3. Use static holds to force long and short heads of triceps to grow and enlarge.
4. Use correct weight to achieve muscle failure every set with 10-12 reps.
5. Keep elbows in and locked down so we do not train our punches to fly sideways.
6. Add a little each week so that we are lifting more without body even noticing.

Works long and short heads of triceps.

Overhead rope extension

This works all three parts of the triceps, the long, short, and medial heads. This is a good supplemental exercise for rounding out complete tricep development. Machines vary a lot. It seems the more expensive and commercial quality the machine is the more you can lift due to where leverage and pulley points are. What is 90lbs on one machine is 140lbs on another. Yikes! This makes it hard to measure progress or train with any assurance we are staying in our training range.

Strategy- use this on off or lift days to break from heavy bench pressing to let our bodies heal. Find a machine we know and trust. Pile weight on and go for maximum intensity. Do 7 sets with 10 reps each. Reach failure on each set. Achieve full dynamic extension of triceps and reset. Power through sets and rest.

This exercise is closest to dumbbell overhead extension. Because we can use this when breaking from our bench pressing routines we can avoid over fatigue and plateauing on the bench press. This exercise allows us to train the triceps from different angles using different body position and supporting muscles. If we overwork synergistic muscles used to bench press they will not be ready for another bench pressing session so we must use this exercise. It works like this: bench pressing uses arms, shoulders, chest, and then back for support. When one

of this supporting groups have not recovered our ability to push maximum bench press weight is halted.

Don't let the rope pull your arms backward damaging your shoulder blades. Keep upper arms held at 45° angle upward from body. Bend arms only. At top wrists can be pronated if needed to move excessive weights. If doing this on certain sets or repetitions take care how it affects your body. If used to strain against max loads maybe hold at top and lock arm position. This mimics jodan oitsuki. Make sure that tension is kept in triceps and deltoids. Do not let tension migrate to shoulder blades dislocating or popping them. Upper chest may flex during pronation after elbows flare from wrists turning. Pull, flex chest as wrists turn, then lock arms is the order. Holding this position while locking arms and flexing chest will make you, bigger, stronger, and increase the muscles needed for bench pressing. Again this hits different used parts of the triceps and pectorals that are neglected from bench pressing. Bench press up to three times a week. When you are sore and need a light day use this for active recovery. Or if you are using step progression use this on your fourth week.

Overhead triceps extension

Sit on a bench and grab a dumbbell. Holding it with both hands carefully bring it up in front of your face and bend arms to bring it behind your head. Use the plate end to rest your hands or to assist your grip, do not simply grab middle of dumbbell handle. Support is needed for this exercise. Straighten arms to lift weight overhead and stop when arms are straight, do not lock out arms. Locking out arms takes tension off triceps instead of other versions where it intensifies it. Locking out also is too time consuming interfering with the rhythm needed to complete repetitions. If using force to blast the weight up and arms are straightened then a slight lockout occurs. This is ok since you are not deliberately using a static hold or achieving one. You don't have to fully straighten arms nor do you need to fully lower the weight. Most exercises do benefit from a full range of motion though. Lifting up fully tends to cause more trapezius involvement at the top range. Full range done safely promotes flexibility and strength of all involved muscles. Shorter ranges isolate the triceps making it easier to fatigue. Triceps get a lot of work so a balanced approach seems more sensible. This gives underworked trapezius muscles a chance to grow as well.

Practice safely with lighter weights until you can control heavier weights without hurting yourself or damaging your shoulders and ligaments. Having the weight

behind your head can damage you if it's too heavy for or you do not have required joint mobility in shoulder to perform this safely. After practicing and having well oiled shoulder joints allows for safe completion of the exercise. Consider doing upper body exercises that build the body using compound movements or use multiple muscle groups involving the shoulder. Medial flys, upright rows, any upper body presses, and chest flys are all good. Build strength and flexibility in shoulder to prevent it from harm. The rotor cuff socket is very easy to tear. This is aikido must be practiced with caution. Almost every single if not all moves pose a threat to tearing the rotor socket cuff of you training partner. This is referred to as a shoulder dislocation.

Also eat a healthy diet involving omegas 3's and use supplement it with food high in glucosamine and chondroitin for healthy joints. Fish high in oil and small fish with edible spines bones such as sardines are excellent choices. Sardines are gross but lemon pepper mackerel are not bad as a healthy snack and are cheap and provide high source of protein which is essential in building muscle.

Use a 50lb,70lb, or 90lb weight or ranges within for this. This is considered a heavy exercise. If superior in this 115lb or more is not unreasonable.

This works the triceps, the trapezius, anterior deltoids and rhomboids.

Extension bar

This is similar to the last exercise. I think use less weight starting at 40lbs and go up to 75. Minimum would be two 10lbs on either side max would be one 35 lb one either side. I don't think I have ever seen a 45 lb on either side though I'm sure it is possible to lift that much. I might have seen it somewhere in media but I can not remember. It would have to have been a magazine and a serious bodybuilder. There are way better ways to lift heavy than this.

This is more limited to isolation so even a slight lock out would be bad form. Due to holding the knurled grip in a hammerfist you can not rotate the shoulders or pronate the fists. Boo. You could try using the straight part of the bar for lifting bit I don't think that is a good idea. You still would have limits on rotation plus the bar is slippery chrome and would swing throwing balance off. That would be annoying and interfere with concentration to much, and is just silly. Focus on lifting overhead stopping short of full extension. Isolate the triceps as much as possible. I don't think this is as good as the dumbbell version but people seem to

like it. It doesn't matter how you train as long as you get results.
Works the triceps.

Skullcrushers

This is used after benchpressing to hammer triceps and make for bigger arms and heavier lifts. Grab a weighted barbell or ez curl bar and sit on bench with bar on thighs. Bend arms bringing bar just in front of skull. Lay backwards and avoid crushing skull with bar. I know right? bent arms straight to lift bar. Bend arms to lower bar. That's it. Isolation training of the triceps after bench pressing is done to make sure triceps are fully exhausted. Pretty much everything is done with arms so having strong ones makes sense. Squeeze the bar as hard as you can to develop your grip. Mentally think about how hard you are squeezing and focus on making your grip as hard as possible and keeping it. Anytime you grab a barbell or dumbbell try to train your grip. This is very popular exercise and gives good results. This works triceps.

Preacher curls

Builds thicker fore arms, wrists and biceps. Particularly useful for aikido. Strong wrists, forearms, and shoulders are required for aikido. 95lbs to 115lbs is good. Cheat using leverage and make bigger forearms. The pulling bar forces more fore arm development so exploit this to get strong grips and blocks. Also builds head of biceps.

Anterior deltoid flys

Grab a dumbbell using overhand grip and swing it upwards arms straight. Builds up the anterior deltoids creating more definition. When you are held in ikkyo or being wrist grabbed strong deltoids and pecs help you power opponents off. This saves you from having to use pure aikido and project opponents forward. If in ikkyo use strength in shoulder to prevent being led and taken down. Train shoulder to protect itself from being compromised and attacked. Learn how to use your body to neutralize attacks. The ikkyo arm bar will attempt to move the ball and socket joint of shoulder from it's proper orientation. Weight training gives a feel for when something is out of alignment and how to correct it. Him pulling my arm out of my socket tells me to prevent this and squeeze shoulder joint back into place using my muscularity of my shoulder. This gives me back my balance and brings my power back to my center line. I now have my balance and my power back.

Countering from this point is easy because I have rendered his aikido useless. An underhand grip builds the upper chest. Use overhand grip instead to striate anterior deltoids.

Wrist curls

Sit on end of bench with 40lb barbell on thighs. Grip tightly and curl. Go fast or slow. Faster lets more reps and it kinda easier to ignore the burn. Holding and flexing burns more and harder to ignore the pain because you have to consciously notice it. The best I figure it flex fast and hold release fast and repeat. Do 40 reps then switch grip and repeat. Do this after curling to improve grip strength. This fatigues the grip past complete failure. As a result you will not be able to grab anything heavy so actually do after all exercises since you will not be able to hold the bar with any type of legitimacy. Plenty of sets of this are good, work until you can no longer hold the bar.

Wrist rolls are the best single wrist exercise. Do wrist rolls on off days while watching tv.

Deadlifting

This teaches you to transfer power from lower body to upper body, and releases large amounts of testosterone. This works the erector spinae as well as the complete erectors that run up and down your spine. Aikido whines about posture since leaning forward in sword battle gets you killed. A sword would smack you in the head. But since none of them use swords or sword fights who cares? Do they even know why they repeat the mantras they do? Either teach kenjutsu or give it up. Bad posture in the sense of leaning forward directly applies stronger leverage to your holds. If you want a good posture and straight back deadlift instead of practicing cat stances with a straight back and holding the pose. There are strict forms and stricter forms. Strict form prevents injury. Stricter forms makes your ass bigger. A bigger ass makes kicks stronger.

Military presses

Overhead version of the bench press. Still works the arms and shoulders but takes pecs out. To the front builds really strong deltoids. To the back builds really strong trapezius. You can lift more to the back since trapezius are very strong muscles.

Weighted crunches

Hold a weight plate or medicine ball on chest while doing crunches. This makes core strong. A stronger core improves balance and capacity to perform most barbell exercises. Using a barbell instead of machine weights on certain lifts introduces an element of wobble and your body compensates for this with small corrective movements. Your core is most responsible for stabilizing the body so that whatever the legs and arms are doing it's coming from a strong center. Having a weak gut is bad. Crunch and hold.

Pulley ab crunches

Use an overhead pulley rope. Grab it and kneel down facing away from machine apparatus. Crunch down and hold a second before returning up. This is complicated maneuver to accomplish and keeping form is difficult. To prevent arms from tiring hold fists to either side of head near the back. This helps with form. On the last few crunches you can hold the flexed position longer and try to fatigue abs. Do not over strain and get hernia. Hernias happen when you abs are weak and organs protrude pushing into a compromised abdominal muscle that is supposed to hold it in place. Complete sets and then do cable twists.

Cable twists

This works the obliques. This helps improve hip rotation for gyakutsuki. Take a modified zenkutsu or whatever. Suddenly twist quickly to the side and hold pulling arms to the side and locking them. Hold for 15 seconds or longer. I think 25 seconds. Actively flex the obliques to activate deep muscle fibers. Turn back to starting position ridiculously slowly keeping tension on working oblique and stopping all the way whenever where ever still flexing oblique.

Squats

Improves kicks and stances. Squats release large amounts of testosterone. Barbell squats train all muscles of legs as well as deep abdominals, the traverse abdominis.

Form matters. Doing full range is better. Heels down is a must for hamstring recruitment. If heels up then lean and isolate the quadriceps, put on more weight, and even eliminate the back extension.

Squats can push big numbers. Who cares. Start slow and progressively load for

zero plateau and superior results in more categories. Improve power, strength, size, flexibility and stamina using better science.

Before starting training learn correct form. View yourself in front of a mirror. Do a barbell squat and look for problems. Fix problems and decide what your leg goals are and what you show squat for. I wanted stronger kicks and more testosterone so I could bench heavy the next day.

Start light at 135lbs which is an Olympic bar and a 45lb. weight on either side. Learn and master correct form so you don't mess up your knees or back. Place feet in correct position using correct spacing. Squat all the way down to 135°. At bottom feet may turn out, that's okay. Practice being in this low position and how you are going to perform the lift. There is the top and bottom parts of lift. You want to be strong in both. You don't want to be weak where you have to use bouncing momentum to bounce up. When going down and bouncing up using the muscles elastic nature to assist you, you are eliminating the hardest hardest parts of the squat and not going to force your body to adapt and get stronger. When fully squatted just stay there. This is the low position. Straighten legs and stand up, it's hard. You are squatting from a static position instead of bouncing up. It's like lifting dead weight. Anything wrong with your biomechanics will be revealed here. This is used to find what needs to be worked on, strengthen, corrected, or further training needed.

When in low position learn to be comfortable. Hips need to be flexible to squat low, be able to stay in this position, and stand up at will. Stay in this position and let the hip tendons slowly stretch. Hip development is critical for safe lifting. Flexible hips provide stability. Bad hips prevent the transfer of power to lift. Once your hips are flexible enough to squat low training can begin without danger of hyperflexing the spine. Train legs and hips for flexibility. This improves range of kicks and therefore power.

Squat down past 135°. Carefully time rise to be after bouncing can occur but almost immediately. Spring upwards trying to reach top as fast as possible to build force. Most powerful technique locks legs at top and makes weights jiggle on shoulders. Lifting fast builds more muscle and trains legs for speed. This makes kicks faster and stronger. Repetitions should be continuous. Up down up down no pause. Complete 10 repetitions.

Time your rest intervals to be no more than 2.5 minutes if lifting heavy and no more than 60 seconds if lifting light. Lift light with smallest rest periods to make legs fully fatigue. Lifting heavy takes to long and leads to plateauing. Lifting for

sports specific functions differs from bodybuilding that uses different approaches. In the beginning work on developing your form. At 135lbs. Lift 15 reps rest 1 minute no more and then go again. This builds stamina. Stamina allows you to recover quicker inbetween sets. Add 10 lbs a week until you are up to 165 lbs. At this point maintain good form and power.

Strategy

Week 1- 135lbs, 15 reps, 7 sets

Week 2- 145lbs, 15 reps, 7 sets

Week 3- 155lbs, 15 reps, 7 sets

Week 4- 165lbs, 15 reps, 7 sets

After first month add 5lbs a week. This is 20lbs a month. That is 240lbs a year. Starting second month at 165lbs plus 20lbs x 11 months equals 385lbs. This is with explosive force, minimal recovery times, and full range of movement. Do seated calf raises after for total leg workout. Then do decline twisting situps. Rest 10 minutes and do pulley crunches followed by cable twists. 20 minutes squats, 15 minutes calves, 15 minutes situps, 15 minutes pulley crunches, 15 minutes cable twists. The squats are main exercise but do the additional calf raises as well. With the main leg exercise done you can take time to finish rest of exercises in a leisurely. Legs might be weak after so situps might suffer. Compensate by pulling up strongly with abs and using momentum twisting sharply at top. Rest or proceed directly to pulley crunches. Finish with cable twists. Ideally this would take 1 hour 20 minutes but take 1 hour 30-45 minutes if needed. Skip declines if necessary. The cable exercises work all abs. Try to move from one station to the next in a precise and judicious manner. If there are no cable machines do declines and use medicine ball twists with same static holds and slow negatives but faster. Use 40lb medicine with arms bent. If that's too heavy use 25lb. medicine ball with arms straight and work way up. This works obliques but does not train hip rotation the same.

Lying leg curls

Makes hamstrings stronger. Useful for returning wave kick and hook kicks. Hamstrings as used to stop weight when doing squats. Training individual leg muscles of quadriceps, hamstrings, and calf muscles improves ability to train legs

using squats. Curl legs and flex and hold at top. Slowly release sometimes stopping at three point on way down.

Leg extensions

This increases contraction at knee making snap kicks quicker stronger and more controlled. Bang these up and hold or drop. Bring them down normal or slow but not fast. Pointing toe straight is overall development, pointing in is outer head, pointing toe out makes the classic french cyclist look.

Calf extensions

Seated are best for adding mass. Set up so that Achilles tendon is stretched to maximum. Perform extension and forcefully with speed flex and hold for 10-15 seconds. Rest 30 seconds, no more than 45 and go again. This will hurt but it does not matter. You will still be strong enough to sets no matter how hurt. This pain is a combination of lactic acid build up and electrical activity in the muscle fiber motor unit receptors. Lactic acid is simple fatigue. Electrical activity is caused by signals from the brain sending current through nerves. When too many signals are sent the area receiving them it responds by creating a burning sensation. That's the electricity creating heat to the point it builds up causing pain. Electricity creates heat and works the same way in human bodies. The human body evolved to protect itself from damage by having a limit to how much electrical information can be received to a individual muscle. Once it reaches a certain threshold the nerve receptors send signals back to brain telling it that something is wrong and that excessive heat is being generated. This acts as an early warning system. The silly body is warning us that we are working out hard and it thinks that we are in danger of causing permanent harm but it is only half right. We are deliberately causing tiny tears in our muscles so that they heal bigger. When our muscle tears the body thinks that our muscle is too small or weak. To prevent it from tearing again under the same work load it knows to either make our muscle thicker, hypertrophy, or make the muscle fiber split into multiple fibers, hyperplasia. Then the muscle biggens through hypertrophy.

Calf muscles are said to be hardest muscles to add mass so they need to be treated in a strong way to encourage growth. Calf extensions make squats easier and add poundage.

Seated calf extensions give the greatest range of flexibility making all manner of stances, seiza, shiko knee walking, and other martial art training easier. When

just seating you are stretching your Achilles lengthening it. This makes zenkutsu training easier since your heel will stay down now. Your cat stance will be lower, back more erect, front leg will guard groin better and be more to the front. This helps correct a lot of form issues with a variety of stance and balance problems. When flexed and held this helps shiko walking in aikido (which trains the adductors and abductors), and makes sitting in seiza more comfortable.

Lunges

This works the quadriceps and hamstrings. Dumbbells are easier to control. Doing lunges increases hip flexibility and makes deep stances easier to perform and adds height to kicks. Hold dumbbells in hands at sides and focus on balance. Take deep steps and walk forward but not deeper than zenkutsu. Do not point knee forward. Stretch inner thigh and hold for a second trying not to bounce. Keep knee just above ground without touching it. Hold deep long stretches moving forward. Doing in place will not increase flexibility. Using barbells or bending arms to hold dumbbells at shoulders introduces instability and not recommended. Use this more for mobility.

Body conditioning

This differs from simple weight lifting exercises. This is the secret of martial arts. The outcome is your opponents bones break and yours don't. Your opponents strikes wound but yours kills. Akin to a heavyweight boxer hands being legally recognized as lethal weapons. Government is over reaching and want to regulate everything. They are scum. It's easy to regulate boxers as lethal weapons since they are in a professional capacity. Non sports martial artists are not in a easily labeled fighting class governed by some state commission so it's hard to rank and evaluate their capabilities. As such propaganda is put out discouraging new fighters from engaging in bone conditioning. It's touted as old wives tales or something similar. Medical evidence proves this phenomenon to be scientific but industry doctors are dismissive and lie to prevent people from training correctly. They allow for makiwara but shudder at other forms of training. In short they know it works but don't want you to do it because they want you weak.