

Harsh's Worksheet (WIP)

Introduction

"Oh god 50000 words I just want abs I didn't want to major in literature where are the Cliffs" shut up, this IS the cliffs. Read it. If you only want to look at a specific section, display the Content right above this part, otherwise, proceed from top to bottom, just like your dad did when he beat you up for eating all of the candy you worthless little

I'm sorry where was I. **For quick guides on specific goals**, you can fast forward to the Diet Cliffs and the Routines sections. They cover the basics in ~10 lines. *However, it is recommended to read the entire guide.*

"JESUS I'M A WOMAN STOP BEING MEAN" oh I'm sorry I didn't know. For your special woman body that does not work on endothermic chemical reactions and protein synthesis like mine does, but on rainbow farts, a special ... *NOOO what are you thinking!* Read this. It's a general guide for getting in shape. The process at the beginning is the same if you're fat, skinny, female, male, a flamingo or a beautiful free-flowing grey asexual spirit.

Two things should be clear:

- **Persistence.** *You need this.* You don't have to stick to the following 100% of the time; but every little bit you slip up detracts from your overall results. The amount of time and effort you put into developing and maintaining your physical fitness is directly proportional to what you will get out of it and the magnitude of the results you will see. Pick something and stick to it, and start immediately.
- **Patience.** *This takes time.* You can lose about 1-2lbs of fat a week, or alternatively build up to .5lbs of muscle as a male, and less as a female. This is not a quick process. You must stick to a routine and diet in order to achieve your goals.

What can we achieve? How do we manage to get in shape and healthier? Well, there are two major points:

- **Muscle development and maintenance.** *You want this.* As long as you do not abuse steroids you will never look "too big". You will gain an a more athletic, active, defined, and healthier look. Muscle mass and strength also makes you less prone to injury, makes daily physical activities easier, and helps prevent many diseases such as obesity, metabolic syndrome, as well as many of the negative effects of aging.[1] [2] Regardless of goals, muscle mass development and maintenance is important for a healthier, better looking body.
- **Fat loss.** *Fat loss is caused by a caloric deficit in a diet.* Too much fat is unhealthy, and looks bad. If you want to look more defined, a six pack, or lose your love handles, you need to lose fat. Calculating your body fat is a more accurate way of gauging progress during a cut. Unlike exercising for muscle development, there is no spot reduction with fat loss; it is not possible to target specific areas [3] [4] [5] [6] . If you do not reduce your caloric intake below what is needed to maintain your current bodyweight, you cannot lose weight.

Generally somewhat less sought after things:

- **Cardiovascular health.** It balances your hormones, makes your brain function well, and makes you perform better, including burning fat and building muscle.
- **Form.** Keeps you injury free and makes you look better.
- **Mental health.** Cardiovascular and resistance training help to alleviate symptoms of depression. [1a] [1b] [3a]
- **General health/staying disease free.** Changing your diet and exercising will prevent many other debilitating diseases.

Diet

The main components of correct dieting are: calorie counting, higher protein and vegetable intake, the correct amount of calories, and eating less processed food.

Energy from a diet comes either from macronutrients (carbs, fat and protein) and essential micronutrients (various vitamins, minerals, water, amino acids, and certain lipids). The difference between the energy needs of the body (TDEE, or Total Daily Energy Expenditure), and the energy content of the diet (Caloric intake) determines whether you are going to lose fat or gain mass. Essential nutrients are needed because the body cannot synthesize them. You want to eat the right amount of energy (measured in calories) while eating a nutritious diet. Most people eat too many calories and not enough essential nutrients.

You must start tracking your intake

Popular tracking applications and websites: myfitnesspal Calorie counter Cronometer Fitday

A very useful website that allows you to get the nutrition of foods is WolframAlpha .

If you don't understand how to read the nutrition label, read this .

Counting calories helps you gauge your diet as well as readjust while you progress towards your goals.

Eat more protein

Take your GOAL bodyweight in pounds, [2] [3] [4] [5] [7] and that is how many grams of high-quality[6] [7] protein you want to eat every day, minimum (i.e. if you want to weigh 200lbs, eat 200g of protein each day). These are the reasons why you want to eat more protein:

- It helps lose fat.[8] [9]
- It helps build muscle.[10]

- It provides satiety. [8] [9] [10]
- It supports lean body mass (muscle), making you lose more fat and less muscle on a diet [11] [12] .
- It helps with recovery after exercise [13] and decreases soreness [14] .
- It helps keep off weight, combatting the yoyo diet effect[15] .
- It is neither carbs[16] (which can give some people blood sugar/insulin problems[17]) or fat[18] (which can do just the same [19]).
- They use more energy to process than carbs and fat, so protien is the most diet friendly[20] .

Some common concerns about a higher protien intake:

Higher protien intake in a diet is not unhealthy [21] [22] [23] [24] [25] . The body is able to process more than 30g per meal [26] . Fear of higher protien intake and intake over 30g's per meal are unfounded [27] . You can eat more than 300, 400g of protein per day, and although that is not needed, it may help [28] . These 100, 200 or more grams of protein will seem like a lot, especially since they are high quality sources from meats, egg, and milk protein from animal sources. Most plant sources are inferior [29] [30] .

For every meal, start with a protein base. A protein base can be anything that is mostly protein (usually, about 20g protein and less than 100 kcal per 100g - **read labels**):

- Fish (tuna/salmon canned in water) Most fish is pretty good. Fatty fish is preferred.
- Poultry (frozen skinless, boneless, fat free chicken breast, turkey breast, some deli)
- Lean red meat (Beef, Pork)
- Fat free, low sugar dairy (no-fat cheese, cottage cheese, cottage/quark cheese, and protein powder)
- Egg whites (1 yolk for taste)

Variety helps to alleivate bordeom in the diet.

If you're overweight/wanting to lose fat, try to make meals that have about 10g protein per 100 kcal, or more.

If you are trying to build muscle, consider:

- Fatty meats (Thighs instead of breasts, non-lean cuts of steak, etc)
- Plenty of whole eggs (No , the yolks aren't bad)
- Tofu
- Most dairy (especially cheese, plain yoghurt, cottage cheese, and whole milk)

You can live just fine getting only .6 to .75g/lb, however higher intakes 1-2g/lb may help. Exactly how much it helps over 1g/lb is not known.

Many diets will deal with macronutrient ratios[31] . Your body doesn't care about ratios, it cares how much protein you are getting regardless of total calories[32] [33] [34] [35] [36] [37] .

Eat more vegetables

- Like protein, it is low in calories while providing satiety [38] [39] .
- Higher intake of vegetables help mitigate diseases and illness [40] [41] .
- They are rich in almost every essential micronutrient .
- It helps with bowel movements [42] .

Eat the right amount of calories

- A higher caloric intake is needed to gain muscle [43] [44] [45] [46] [47] .
- A lower caloric intake is needed to lose fat [48] [49] [50] .

Fat loss and muscle gain only occur together if you are a total beginner. Various hormones (especially insulin) and pathways (especially mTor[51]) position your body either in a systemically anabolic [52] [53] [54] or catabolic [55] mode.

Gaining muscle (aka Bulking)

If you want to gain weight, eat > 16 * (your bodyweight) kcal / day.

That means if you're 100 lbs, you should eat 16*100 = 1600 kcal every day. If you're 200 lbs, you should eat 3200/day. If you're 80kg, you should look up on google how to get from real-world sensible European units to bullshit pound units. If you're putting on weight too fast (more than 1lbs/week), eat less. If you're not putting on weight, eat more.

Losing fat (aka Cutting)

To lose fat, eat < 10 * (your bodyweight in lbs) / day.

So if you humongous whale actually managed to bloat up to like 240 pounds, you're at 2400 kcal/day!

If you're, like, really fucking fat, eat less than that. If you move a lot, you're allowed to eat a bit more. Track your weight using your iPhone and adjust.

Maintaining:

To maintain a bodyweight, eat approximately 14-16*bodyweight in lbs/day [56] [57] [58] . Maintaining a lifting routine is important to keep muscle

- The idea that eating after X pm was worse than eating before is a myth.[94] [95] [96]

Around workout nutrition.

Basically, have some protein and carbs 1-3 hours before, and some protein and carbs 0-1.5 hours after[97] . It does not need to be immediate [98] [99] . In fact, protein post workout is not needed assuming you are not lifting fasted [100] [101] [102] [103] [104] [105] [106] [107] . You can follow this protocol if you need exact numbers. Regular food is just fine [108] if not superior to supplements like whey protien [109] If you cannot stomach anything around workouts, get a whey shake and a carb source like banana.

Even while dieting to lose fat, you want to eat protein and carbs around workouts [110] eating some before will allow you to train harder, and you want to eat afterwards. Working out induces both protein synthesis and breakdown. To inhibit this some carbs and a good serving of protein are sufficient.

Exercise

Lifting heavy weights

Everybody should do resistance training:

- Supports lean mass over fat [111] [112] .
- Helps with losing fat[113] [114] .
- Helps with building muscle[115].
- Keeps your metabolism running, even while you rest [116] and more than cardio by itself[117] .
- If done correctly, makes you stronger and healthier,[118] [119] improves your posture[120] and prevents injuries[121] especially falls and fractures. It does this by strengthening bones,[122] [123] making it important for the elderly, and for women[124] .
- It helps prevent the yoyo dieting effect[125] .

The three key components of weightlifting

- **Aim for balance** - work the legs, the front, the back, the core, the limbs; push and pull, flex and extend. I don't think much of excessively focusing on certain bodyparts. A balanced body is a healthy and attractive body.
- **Train progressively**[126] [127] [128] - you have to increase the weight over time or nothing will happen. As a beginner, you want to add weight to your exercises every week at least. If you do not add weight over time, your body is not going to adapt. Track your lifts to see your progress.
- **Stay safe and injury free**[129] - educate yourself on proper form, watch videos, make videos of yourself and show them around. Bad lifting can hurt you. See here for some reference cards. If you want a deeper understanding of the main lifts, I highly recommending reading Starting Strength.

Generally, you want to take a balanced selection of mostly multi-joint (compound), full-body exercises three times a week. Progressively load (add weight) at least once a week. Later on, you may add some assistance exercises for specific purposes. Focus on the compound exercises, being able to lift heavy at 5-8 reps[130] with ever increasing weight.

Routines

No matter your goals, you could start out with one of these:

- Starting Strength aka SS - Minimalist and a classic. This one has worked countless times already.
- Generally, *reading this book is a very very very very good idea*, and 95% of the stupid questions that you'll come up with when beginning to train would be best answered by doing so. Granted, SS is full of stupid things about how you have to eat a cow and a half every day and how you have to do one and only specific form of squat forever, but if you read it as one of many useful sources instead of a bible, you will learn so much useful stuff and get super swole super quick I promise!!!
- Believe me, any question regarding your first weeks in the gym, your first routine and so on - they are probably explained in detail in this book. Also, check the extensive wiki, and here to answer all of your questions)

Alternative programs:

- Lyle McDonalds generic beginner programs
- Arthur Jones' beginner program
- Reg Parks beginners 5x5
- Kristas beginner workout (focused towards females)
- Stripped 5x5

Even if you pick one of these, reading SS is usually going to be a good idea.

Any workout regimen that works the full body 2-3x per week[131] with low reps[132] , few sets[133] [134] of heavy compound movements (Squats, Bench Press, Rows, Overhead Press and Deadlifts) with added weight periodically is generally optimum for **beginners** (<1 year experience of lifting). Nothing will give you as much results as a correctly applied beginner/intermediate(1-2 years of lifting) routine.

Intermediate Routines:

Once you do not gain anymore on the starting routines, switch to an intermediate program like the following. These focus on the major lifts with slower, but more manageable progressions.

- Madcow 5x5 (3 days/week) - this is a full body general strength/powerlifting program aimed at the intermediate lifter. There is a stripped version here .
- Jim Wendlers 5/3/1 (3 or 4 days/week) - this is a rather typical powerlifting/athleticism program. You can find the answers to common 5/3/1 questions here .
- Joe DeFrancos Badass (3 days/week) - Bodybuilding/Athleticism
- The Texas Method (read: Practical Programming)

Advanced routines are customized splits that focus on specific goals of an advanced lifter. At this stage, learning how to make a balanced split routine is up to the lifter's goals (strength, body proportions, athletic ability etc...)

Cardio

Pick something you can stick to and that does not injure you. Similar to weight training, safety, persistence and progression are key. I recommend taking up a sport. Any type of cardiovascular fitness is helpful, even dancing [135] . Mixing it up is just as effective as focusing on one,[136] and more fun. Alternatively, get something more structured, like couch 2 5k or fartlek . Doing cardio in a fasted state provides no benefit, contrary to popular belief.[137]



You should do some cardio both when trying to lose fat, and when trying to build muscle.

- Helps stabilize hormone levels (increasing testosterone[138] and increasing insulin sensitivity[139])
- Improves working capacity[140] and recovery[141]
- Helps the body fuel calories away from the fat cells[142] and into the muscle[143]
- Helps with weight maintenance/preventing the yo-yo effect[144]
- Keeps you healthy[145] , protecting your brain from the detrimental effects of aging, and improves sexual health.
- Burns calories[146] - not too much but a significant amount. If you do a lot of cardio, you can and should compensate by eating a bit more. For burning fat alone, LISS (low intensity steady state) cardio (e.g. take a 1.5 hour walk), or HITT (High intensity training) cardio (Sprinting bursts with jogging recovery periods) [147] . LISS is recommended if one is focusing on heavy lifts. HITT is intense if properly done, and will require longer resting periods. It will cut your progress on goals like strength during a bulk, but can help with sparing muscle and losing fat during a cut. Like with resistance training, pick whatever you will stick with and can be performed safely.

Cardio is neither required for burning fat[148] , nor prohibited when building muscle[149] . Resistance training is the most important for looking pretty. For general health, cardio is essential.

If you are looing for a structure cardiovascular routine, you can do barbell complexes. Search google for variations. They are the big compound movements, but done with much lighter weight in a circuit. They help with form as well as provide a very efficient cardiovascular workout.

Calisthenics provide the same effects of weight lifting but not to the same degree. They provide both a cardiovascular and resistance workout. If you cannot afford a gym membership, it is advisable to start a balanced bodyweight routine until you can afford a gym membership. Worth checking out are Ross Enamait and Pavel Tsatsouline .

Posture and Flexibility

- There are two reasons you would want to stretch:

1. Because you have a posture issue you would like to correct..
2. You want to be generally more mobile for a sport / weight training / general health.

If you do not have a posture issue and your mobility is up to par with your standards, you generally do not need to stretch. Although flexibility is always useful for becoming better at lifting weights.

Common postural deficiencies are usually fixed by a combination of stretches, strength work and consciously maintaining proper posture.

If you would like some mobility work to perform better, check out this site run by a PhD Physical Therapist out in SoCal.

Supplements

Most supplements are useless, there are a few notable exceptions. Always put diet, training and rest before supplementation.

Notable things you might think about:

- Fish Oil .[150] [151] [152] [153] [154] [155] . If you don't eat much fatty fish (salmon, mackerel, ...), you are most likely deficient in omega-3 fatty acids (EPA/DHA; ignore ALA as your body has to convert it). It may help you be smarter, mitigate illness, reduce the risk of disease [156] , improves mood [157] , helps with fat loss and you recovery. A total intake of EPA/DHA of 1-3 grams per day is suggested.
- Vitamin D .[158] [159] [160] [161] [162] Most people are deficient in Vitamin D. Vitamin D is involved in pretty much everything. It helps your bones, prevents cancers, and raises testosterone levels [163] [164] . Positioning from vitamin D requires intakes higher than 10000 IU/day [165] [166] [167] . Buy it in Vitamin D3 form (Cholecalciferol). Taking one 5000IU capsule a day is sufficient. Take it with meals or with your fish oil.
- Protein powder. If you cannot easily get enough protein from food due to time constraints, get some cheap whey , casein , or milk protein . Which

type you get doesn't matter[168] [169] [170] . These are quite convenient, and almost as nutrient rich as regular food. Whole food sources of protein are equivalent or better compared to whey or BCAAs /Amino Acids.

- Magnesium , folate, fiber, zinc , vitamin C: most people are not getting as many of these as they should. Depending on how your diet is, consider supplementing these while you adjust your diet.

Conveniently, all of these are pretty cheap. Fish Oil and Vitamin D are two things everybody should supplement. Everything else is optional.

The exceptional supplements proven to work:

- Creatine will help a bit with strength and is safe [171] [172] [173] [174] . Monohydrate is the cheapest and most effective [175] [176] . Dose at 5g (1tsp) every day, at any time. No need to load or cycle [177] [178] [179] [180] . See here if you want a deeper understanding of the biochemical workings.
- Ephedrine [181] , and especially the ephedrine + caffeine combo (EC Stack), helps with losing fat. Go here , and for more advanced info here . **Ephedrine may be illegal in your country and/or dangerous to your health if taken incorrectly or with a pre-existing condition. Do your research.** For people in the US, you cannot buy Ephedrine directly - most people get it through the over-the-counter medicine Bronkaid.
- Illegal drugs, like steroids for muscle gains and fat loss, and clenbuterol/albutero/lt3 and DNP , are of unquestionable effectivity, allowing their consents to gain mass, strength and cut fat way quicker than the natural trainee, even without training themselves at all [182] . **It is advised to not ingest these supplements without proper research, understanding the risks they pose legally and health-wise. Extensive resources on anabolic steroids can be found here .**
- A multivitamin /mineral supplement is not as important as people believe it to be. The dosages of the ingredients are of negligible effect and are not as bioavailable as through food. Get your nutrients through your food.
- Lastly, stay away from pre-workout supplements, they are at best useless, at worst bad. You do not need the extra energy, especially if you are a teenager. They are also a waste of money. Use caffeine if you need more energy as it increases blood flow [183] like most pre-workout supplements do. Caffeine stimulates the nervous system, preparing it for training, while increasing aerobic endurance and strength.

FAQ's

Diet FAQ:

"I am a VEGETARIAN! WHAT DO I DO?"

Your main problems are protein, and to a lesser extent, some minerals and meat. If you just do not eat meat, you can do fine getting lots of dairy/protein powder, eggs, and some tofu. If you're a vegan, it will be more difficult to provide adequate protein. Read up on pea, hemp, lentil and soy protein and see what your chances are; the evidence is fairly clear that milk proteins are just better for our goals than these[184] [185] [186] .

All questions concerning specific food.

Basically, check: does it help you hit your protein targets? Does it help you hit your calorie targets (by keeping you full for its calories)? Is it unprocessed, nutrient rich food? Has your personal experience with it been good? If yes, go for it. If not, it shouldn't be a staple food.

Any question focusing on Insulin! Glycaemic Index!

Insulin is vastly misunderstood[187] . It is one of several key players, not the only culprit; it only mediates what your diet and exercise do. There are alternative pathways that are just as important. If you try to shape your body by controlling insulin, the body will just use another pathway to bring you to where you should be.

Insulin, or various foods and their effects on insulin, are often blamed for obesity. This is in part because on a mixed diet, insulin is the hormone that mostly regulates bodyfat storage. Insulin resistance is a common and dangerous symptom of obesity. However, on a carb free diet, the body will not simply waste nutrients either, and other pathways will be used to get fat if you eat enough. Insulin resistance is caused by eating excess fat alternatively to excess carbs, as well. Most people that are fat today got fat by eating carbs and fat combined; but that only means that they ate a lot of fat and carbs, not that combining fat and carbs, or eating carbs at all, makes you fat.

Insulin also causes satiety, prevents muscle catabolism, increases free testosterone levels. A healthy, exercising and well-eating individual will be able to control their blood sugar and insulin levels quite well.

Current insulin levels are usually a symptom of what you are doing, not a cause of what is happening to you.

For a more in depth answer (quoting Anonymous):

"The hormones insulin and glucagon work antagonistically (insulin encourages lipogenesis and discourages lipolysis, glucagon does the opposite) to keep the blood glucose concentration constant. As the blood glucose concentration decreases, glucagon secretion increases and fat is released from adipocytes so that it can be used for energy and to increase glucose levels. As the glucose concentration increases, insulin secretion increases, and glucose is removed from the blood to be stored in adipocytes. If you eat maintenance calories, the end result is one of balance - there will be no net fat gain or fat loss. If you eat above maintenance then insulin wins and the extra energy is stored as fat (or used for muscle). If you eat below maintenance then glucagon wins and there will be a net loss of fat. There is no way around this mechanism, this system is pretty much infallible by necessity.

As I've said before, the only hormones that can directly cause or prevent obesity are ones which affect the amount of energy you take in (leptin, for example) or the amount of energy you spend (by increasing activity or by increasing metabolism). Under normal circumstances (i.e., in the absence of metabolic disorders and in the absence of a caloric surplus or deficit) insulin and glucagon will perfectly balance each other and you will not gain or lose any fat."

High-GI food has been wrongly implicated of being fattening:[188] [189] [190] [191] [192] and low-GI diets have been wrongly thought to be more

filling.[193] [194] [195] This is wrong and stems from the fact that researchers used to use highly processed food to represent high-GI food, and less processed food to represent low-GI food. Even the GI - insulin connection is way more complex than carbophobics usually think.[196]

General ketogenic diets/Atkins.

First, refer to the general principles of dieting . If your keto diet fits in there, its gonna work.

Some people claim that ketosis is inherently better than a carb based or carb inclusive diet. The evidence however is fairly conclusive: while many people consume too many carbs and need to cut back on them, and while some people simply feel better on a low carb or even ketogenic diet, feeling less hunger and less bloat, others do not. Many report adverse reactions to keto and low carb, and on average, ketogenic diets do not burn more fat or spare muscle better than non ketogenic diets.[197] [198] [199] Any claimed benefit of ketogenic diets that would work for everyone is mostly mediated by the higher protein content in comparison to regular diets. One may also eat a low fat, high carb, high protein diet and benefit from it [200] .

For the wrong idea that low carb is inherently better than moderate or high carb, refer to the chapter on macronutrient ratios. Experiment a bit, and see what fits your lifestyle.

Specific nutrients

HFCS![201] Fructose![202] [203] Saturated Fats![204] [205] [206] [207] [208] Vegetable Fats!

You could almost take the chapter on Insulin and replace the word Insulin with fructose/SFA, and you have your answer.

Anything is bad in excess, and has some purpose used in moderation. Usually, you will get an excess of certain things if you eat too much overprocessed, modern food. You will get appropriate, healthy amounts of nutrients if you eat unprocessed food.

"Why aren't you advocating (Cyclical) Ketogenic Diets/Paleo diets/Zone Diet/This Crazy Stuff My Favourite Bodybuilder Does?"

Because they are just one way to achieve the general, supervening principles outlined in the general diet chapter. Where they diverge from said chapter, they are wrong, where they agree, they are redundant, where they cover different topics, they are just personal preferences.

"Isn't excess protein bad?"

No. Read this again.

Diet Soda/Aspartame.

These don't cause cancer.[209] They also don't directly contribute to obesity.[210] They do not raise insulin or blood sugar significantly.[211] They have close to 0 calories and not many bioavailable nutrients, and that is pretty much what they contribute to your fat loss diet; nothing good, nothing bad. There is a lot of un-substantiated myths about diet soda .

The only thing that can be said about them is that they might keep you in a habit of preferring sweet food. But generally speaking, unless you really need the calories, they are a lot more healthy than their sugar filled alternatives[212] [213] .

"I've stopped losing weight!" / "I've regained 20lbs over the weekend!"

In the short term, water deposits will contribute way more to what the scale shows than fat loss or gains. Coincidentally, stress levels cause water retention, so getting all panicky over the scale weight is a good way to downward spiral into an eating disorder.

If you ARE plateauing, or even gaining weight for two or so weeks, first, check if you are actually still eating a calorie deficit (less than 13, 14*bw cal/day). Science has shown time and time again that people are awfully bad at estimating their food intake.

If you find out you're not eating a deficit anymore - adjust your calories.

If you are still eating a sure deficit, maybe its time to take some time off and relax. Try eating at maintenance calories, and generally taking things easy for a while (one or more days, up to two weeks). This will readjust various hormones, normalize water levels and restart fat loss.

"Clean" food

Brown vs. White Rice, Sweet Potatos vs. Regular Potatoes, Organic vs. Conventional, "Clean" eating vs. Mixed diets...

This is mostly down to taste preferences. The nutritional differences between the alternatives are negligible.

Generally speaking, if you eat lots of the protein foods mentioned above, lots of vegetables, maybe supplement some vitamin D and fish oil your nutrients covered.

"Is supplement X any good?"

Probably not. Read the general chapter on supplements. You can try and check here .

"I want the quickest way to lose weight that is not completely idiotic!"

The quickest legal way is something called PSMF by Lyle McDonald. The quickest way, period, is adding illegal drugs to your exercise+diet combo. I do not really know much about drugs, but googling clenbuterol + DNP + Cytomel/T3 is probably where you would start. **Just remember that drugs may be illegal in your country and are most definitely dangerous.**

Alcohol?

Some is fine, an excess isn't.[214]

Exercise FAQ

Soreness/DOMS

If you have horrible DOMS right now:

Proper diet and rest is necessary to eliminate DOMS. Many new lifters experience DOMS for the first 2 weeks.

If you stop training for a while, you will get DOMS again, so keep training[215] .

DOMS is not important for muscle growth. Lifting sufficiently heavy weights is all that is needed.

I want to train more often!

If you want to train more often, your intensity is too low in the gym, increase weight or decrease rest periods.

You grow while you recover. As a guideline, if your lifts are steadily improving (while gaining weight) or maintaining (while losing weight), you are doing good. If not, readjust your routine and diet accordingly.

Recovery / Sleep!

Recovery is about a bunch of factors. Your brain, your mind, your individual muscles and joints, the body as a whole all need recovery from training.

Sleep enough, reduce stress, eat enough, choose a sensible routine. That's the main factors.

Sleeping is a vital aspect of muscle building. You cannot fully recover without getting enough sleep, along with it filling a plethora of other detrimental needs for your health. Get 8-9 hours per night. Avoid any more than 11 hours sleep as it provides a negative hormonal environment within the body. Read here for more info.

I have social anxiety and/ or I'm afraid people will judge me because I'm really weak/ fat. Is it safe for me to go to the gym?

Everyone at the gym is focused on their own workout and will not care what you are doing or how much you are lifting. Just follow basic etiquette and the gym's rules and no one will bother you.

"How can I get prevent calluses on my hands?"

Watch this or do this .

"All I care about is abs! How many crunches must I do?"

You cannot target fat loss by doing specific exercises.[216] [217] [218] Visible abs are a consequence of losing overall bodyfat so that the stomach fat gets low enough, revealing the ligament structure crossing the rectus abdominis.[219] You can have visible abs without ever working out. You will usually see your abs around 12%, though it varies from person to person.

The real reason you train your abs is to maintain correct posture and strength distribution through your body, especially when lifting weights.

"I want exercises to reduce fat on a specific part of my body!"

There are none.[220] [221] [222] Read the guide from start to finish.

For some reason, I want to start with Olympic Weightlifting!

http://www.pendlay.com/A-Training-System-for-Beginning-Olympic-Weightlifters_df_90.html

Kids and Barbells

It is safe for kids to lift, although there are a few minor concerns [223] [224] .

Warming up

Warm up properly for each compound exercise. Warming up is done to prepare the muscles and joints to get your CNS fired up to move some heavy weight.

Read this for more info. Basically, you want to at least do 3 warmup sets for each compound exercise. It should look something like this:

- 12 reps of the empty bar to in-grain the movement pattern.
- 5 reps at 50% of the starting weight of the first work set
- 4 reps at 70%
- 2 reps of 90%
- Max sets

So, if your first work set is 200 pounds for 8 reps, you would do 1x12 bar, 100x5, 140x3, 180x2 and then 200x8.

SS is imbalanced, dangerous, and sucks!

If done properly, it is not dangerous. For an beginner, it is very useful to learn the basics of working out and making your first gains. Most people arguing that SS is imbalanced and low volume haven't read the book, which explains when and how to add assistance exercises like chinups and back extensions to the

routine. Hell, it even discusses abs and curls.

I guess you can also add face pulls (on bench days; 3x15 or so) if you feel like protecting your shoulders.

HIIT/Tabata

Unless you are training for a specific sport and your trainer tells you to, don't do it.[225] . The hype around HIIT for general fitness stems from a misunderstanding of some the preliminary research. Generally, standard cardio is just more effective AND efficient for burning fat[226] while maintaining muscle. LISS is better for health, performance/endurance and fat burning capabilities,[227] and will not interfere with your recovery as much.[228]

Two topics are brought up again and again when it comes to HIIT: EPOC/afterburn, which is negligible with HIIT[229] ; and Vo2max, which most anybody gets wrong.[230] [231] .

"Is resistance training routine X good?"

The parameters of successful training routines are more or less well known[232] [233] [234] [235] .

Crossfit/Insanity/p90x/Convict Conditioning/current internet hype workout

They may have their uses, but they are not optimal towards the goals of most trainees.

Rest between sets

Usually, you should rest as long as you need for your body to feel ready to complete the next set. This could mean a 1 minute rest, or a 10 minute rest. Shorter rests don't help muscle gains. [236] [237] Although 3-5 minutes are best for strength gains. [238] [239] [240] [241] [242]

If you want to train for endurance rests should be shorter.

"Is exercise X good/bad?"

When choosing exercises, consider:

Can you do it safely, and in good form?

Can you progress (add more weight over time)?

Does it hit the intended muscles?

If you can answer "yes" three times, chances are it's a good exercise. Every exercise can injure you if done wrong, and most every exercise will keep you healthy if you do it right. Exercises I usually see done wrong which I don't recommend, either because I don't think learning proper form is efficient, or because the movement itself has some biomechanic problem, are: leg raises and situps (target the hip flexors, not the abs), freeweight pullovers or flies, and triceps kickbacks and overhead extensions (stupid path of resistance + superior compound alternatives), back extension lever machines (in contrast to the quite healthy back extension bench, the resisting machine may fuck your back), barbell rows (good movement, but usually done wrong), good mornings (more dangerous than the just as, or even more, useful romanian deadlift)

Some exercises which are often done wrong have gotten an undeservedly bad rap about it: upright rows (row with a wide grip, elbows not higher than the shoulders), bench press (keep the shoulder blades pinched together and down, don't use too wide of a grip, don't touch too high).

Bodybuilding FAQ's:

"You need high reps/high volume for muscular hypertrophy!"

You don't.[243] Strength training causes hypertrophy in every fiber type.[244] So-called sarcoplasmic hypertrophy is greatly limited in extend:[245] in the end, you need to get stronger.[246] [247] [248] and for that, you need the low-moderate rep range.[249] Some high rep work on top to round it off won't hurt, but the focus should be in the 5-8 range; although you can grow on anything, as long as it improves the weight you can lift for ~1-20 reps.

Rep range selection depends in large part on exercise selection. You can't do snatches for high reps, and you can't do strict lateral raises for low reps. Generally speaking, you want to do technical/power work and maximal strength lifts for low reps, your main exercises (bench press, squats ...) for moderate reps (5-8) and your assistance exercises for high reps (8-20).

For more advanced trainees, specification, doing more work below 5rm, and more work above 8rm, becomes more and more important,[250] but as a beginner, you can for a while stay in this rep range.[251]

An exception to this rule are steroids. With steroids, you can grow on literally anything.

Bodypart Splits/"I need to dedicate a whole day to my chest to work it from every angle and give it enough volume!"

No you don't. Too much volume[252] and too low frequency[253] are hurtful for hypertrophy. Try to hit every bodypart with about around 2 times a week with 30-60 reps each, split across 3 or 4 workouts a week.[254] [255] [256] [257] Look at the routines I linked to in the exercise chapter.

"I don't care about strength, I only want to get bigger!"

Size comes from food. Ensuring that size is muscle comes from lifting weights that are heavy enough to stimulate growth.[258] [259]

"You need isolation exercises for a balanced physique!"/"You need compound exercises for a balanced physique!"

No. Read [260] again.

"I hurt myself while lifting, what should I do?"

Depends on the severity. See here. If the pain doesn't go away, you should see your doctor.

Contributors:

harsh, or the trip !.ImGayqHTs, on 4chans /fit/.

Tuna has also helped me out.

Clerisy also did a lot of things.

Quadrasaurus-Rex involuntarily contributed parts, too (for now, only the part about abs).

Brotein cleaned up grammar, made the sticky more succinct and organized (1/5/12). Went from 22 pages to about 18 pages, while making navigating the sticky according to goal easier. (1/6/12) Created thread on /fit/, added bodyweight exercises, how-to make a routine, resources for cardiovascular programs, and fixed minor grammatical/spelling errors.

I also wish to thank anonymous for sucking all of the dicks. HmMMM dicks.