

FAT BURNER SECRETS REVEALED

This report is designed to save you money. By informing you of ingredients or products that may do little or nothing for you. By letting you know the best ingredients for assisting in your weight loss. By helping you determine a good price for fat burning agents and products.

I do not try to fully explain in scientific detail what these agents are, how they work or to quote the studies explaining why they work. I want to keep things simple, easy to read and understand. If you want to track down more detailed information about a particular agent then I will provide some very good links to resources where you can research further. Those links are located at the end of this report.

Most of the information presented in this report targets the average person who does not exercise. What I mean by this is, if you begin exercising (especially the very beneficial weight lifting) you may require and benefit from higher doses of certain vitamins, minerals and amino acids.

For example: Under normal non-exercise conditions, the dosage of amino acids and B vitamins you normally get in your diet or through a supplement complex is very adequate for processing energy. If you start exercising regularly, then additional supplementation could be necessary for the adequate processing of energy. Other factors such as age, insulin resistance, thyroid problems and other conditions can play a role in how much of a particular nutrient is adequate to stimulate fat loss.

I highly recommend better nutrition and an exercise program (as outlined in Weight Loss Simplicity) for those who want to permanently lose fat fast. Most people who attempt to take the short-cut route and lose weight only through pills may find their weight loss is not as great as they had hoped for or after losing a few pounds find it creeping back on.

Which fat burner is right for you?

Just like no single nutrition plan works for every person, no single fat burner pill will have the same effectiveness for everybody. Why? Each person's body type is different and each person's chemical make up is slightly different.

You have to make an honest evaluation of why you think you are overweight. This may even require a visit to the doctor.

If you are a person with an average body build and had no eating disorders and no family history of obesity yet you find yourself overweight. Did you become overweight simply because you became lazy and started leading a sedentary lifestyle and had poor nutrition habits? If so, then you probably would respond quite well to a simple change in your

nutritional habits, exercise and a basic fat burner consisting of the E/C/A stack (Ephedrine/Caffeine/Aspirin).

If on the other hand even in your youth you were plump. Came from an over weight family or possibly even had someone in your family with diabetes or borderline diabetes (representing a sugar imbalance or insulin problem). Then you have to approach your nutritional changes a little differently and the fat burners that are most effective for your body chemistry may be different from the person described in the above paragraph. You may find that "fat burners" like Corosolic Acid (banaba leaf) or Gymnema are best to help regulate your insulin and would be better for you instead of the E/C/A stack.

Fat Burners- In this report I use the term to represent a very broad list for a variety of herbs, vitamins, amino acids, and hormones that in various ways will **assist** you in being more productive at losing weight.

Notice: Please remember, these agents will only **ASSIST** your weight loss. You must always first and foremost be ready to lose weight through proper nutrition and exercise.

No single pill, powder or elixir is the answer to your magical weight loss dreams.

FACT: A person can only lose 1 to 2 pounds of fat a week and permanently keep it off using proper calorie reduction and exercise. Fat burners may increase this rate of fat loss but do not expect miracles of 15 pounds of fat lost in two weeks. The body is not designed to rid itself of fat that fast.

Notice: Some diets and products will claim you can lose 10 pounds or more a week. Even if their claim is true about their product, you will not lose 10 pounds of FAT. You may lose 1 pound of FAT, 1 pound of muscle and 8 pounds of water weight. Or even worse your fad diet will not provide enough calories sending your metabolism into a nose dive (very bad) and your body will start feeding upon itself. You will lose muscle (and weight) as your body scavenges for sources of protein and fuel.

Please read product claims carefully. Almost all products say their results also include a proper nutritional program with exercise. Your body does not want to give up fat. It is a very valuable source of energy that it has stored away for later use.

What is Thermogenesis? Elimination of excess calories by generating heat.

How can I increase thermogenesis within my body?

- Exercise every day
- Increase lean muscle mass (You don't have to become a body builder to do this. Even light training with weights can build some muscle.)
- Proper Nutrition (Keep your metabolism revved up by eating less food more often.)
- Agents, ingredients (herbs, vitamins, etc.) that increase thermogenesis.

Some of the listed agents work through thermogenesis. Others work by affecting various levels of the conversion of food or body fat to energy such as insuring proper insulin function, helping the liver process fats or stimulating a sluggish thyroid.

Please use any thermogenic agents with caution, always starting with low dosages to test your body for any unusual reactions. Some of these agents (like ephedrine) the body can quickly develop a tolerance to if you take them on a regular basis. So the same dosage will be less effective. Do not keep raising the dosage! Take a break, allow your body to empty itself of the chemical by cycling off of the agent. Typically take a break every 3 to 4 weeks, staying off for about a week then resume the on off cycle. Or, only take the agent every other day.

Another effective method to keep from building a tolerance to an ingredient would be to find different fat burners that you have found effective for your body type and then take them on alternate days.

Please consult a doctor before consuming any herb or drug particularly if you have a special condition concerning diabetes, pregnancy, thyroid, kidney etc. or if you are on any prescribed medication. Some of these agents can raise blood pressure or cause thinning of the blood and many other effects to the body.

I urge you to seek comparative advice on these ingredients so you will be a better-informed consumer. Be cautious of commercial sites that rave about the benefits of ingredients and then link you to a product that contains those ingredients. Research further at sites offering neutral or non-commercial advice before purchasing.

The information found in this report is for educational purposes only and is not intended to diagnose or treat any condition. Please research further and consult with qualified Nutritionist, Doctors or other weight loss professionals.

Full List of Ingredients (All of the ingredients listed below may not be useful for weight loss but you will see them promoted as weight loss agents. I have tried to provide information that will help clear up what is most beneficial.)

Details of each agent listed below follows later.

4-Hydroxyisoleucine
5-Hydroxytryptophan (5-HTP)
Apple Cider Vinegar
Aspirin
B vitamins
Caffeine
Capsaicin

Chromium
Coleus Forskolii
Conjugated Linoleic Acid (CLA)
Corosolic Acid (banaba leaf)
Creatine
Dioscorea villosa
Ephedrine
Fenugreek
Green Tea (polyphenols)
Guarana
Guggul
Gymnema
HMB (beta Hydroxy-Methyl-Butyrate)
Hydroxycitric Acid (HCA)
L-Carnitine
Lipotropics
Momordica Charantia (bitter melon)
Morinda citrifolia (Noni)
NADH
Naringin
Pyruvate
Ribose
Synephrine
Taurine
Theobromine (listed under Cocoa Bean)
Theophylline (listed under Cocoa Bean)
Vanadium
Yohimbine Hydrochloride

Some agents listed do not have repeated solid, unbiased human studies that clearly point to its abilities to help you lose weight. Many ingredients are accepted "on faith" that they work or have shown limited effects in the laboratory but these studies have not been applied to humans.

You will easily see in the charts and graphs I have provided for you, three main ingredients listed over and over. These three ingredients are Ephedrine, Caffeine and Aspirin. You may see these ingredients referred to as "the stack" or "E/C/A stack". It is well accepted that these three agents work the best and the reason they are always combined (or stacked together) are because they help each other work better. When one ingredient helps another ingredient work better this relationship is considered **synergistic**.

One other ingredient has been found to extend the abilities of a number of agents or work in a synergistic fashion. It is called **Naringin**. You may begin to see this ingredient appear in more and more formulas but for right now it is only found in a few. Naringin is

mainly found in grapefruit juice and it is the ingredient that imparts the bitter flavor. Some brands of grapefruit juice are using methods to reduce naringin therefore making their juice taste sweeter. Naringin increases the effectiveness of caffeine. Please use caution in drinking grapefruit juice and consuming prescription drugs because naringin has been shown to alter some drug's effectiveness.

One Huge Problem (This will save you money)

Brown Fat- There are 2 main types of fat, white fat and brown fat. Some companies claim certain ingredients will help release the energy stored in brown fat. While there are some animal studies to back this claim up there is one huge problem. Humans have little to zero brown fat in their bodies! Brown fat is found exclusively in animals and mainly in animals that utilize hibernation. **Do not fall for claims made on this basis!**

Simplified Details (for more details or references to laboratory studies please use the links provided at the bottom of this report.)

4-Hydroxyisoleucine This is the isolated active ingredient in fenugreek seeds that actually works. It may help regulate insulin insuring more energy gets to cells and gets used. Do not look for fenugreek seeds in products because you would have to take very large dosages to get the benefits. This product is presently fairly expensive and there are other ingredients that perform about the same function and cost less. With the active ingredient you only need about 250 mg per dose.

5-Hydroxytryptophan (5-HTP) *Griffonia simplicifolia* used more for affecting mood disorders than weight loss as a mild appetite suppressant. The studies for this controversial agent in relieving depression are mixed at best and zero for weight loss. It is not recommended since there are so many other agents that do a better job. Our bodies make 5-HTP from the amino acid L-Tryptophan but taking supplements does not increase 5-HTP.

Apple Cider Vinegar in liquid or pill form there is zero evidence this does anything for you relating to weight loss. Go to the store and buy some for under a dollar and season your food with it. If an apple cider vinegar product works for reducing fat then it is because of other fat burning ingredients included in many of the products.

Aspirin *Salicin, White or Purple Willow Bark, Acetyl-Salicylic Acid*. When combined with ephedrine and caffeine, aspirin taken 3 times a day in dosages of approximately 300 mg helps to form the most potent fat burner available. Doctors now recommend for certain people regular treatments of low dosages, up to 100 mg, of aspirin for other ailments other than weight loss. Regular aspirin can contain 100-400+ mg depending on strength. Constant use of high doses of aspirin may cause internal bleeding. There are plenty of good products that do not contain aspirin.

B Vitamins most all the B Vitamins assist in the processing of energy. A dietary deficiency is not likely unless you are following a strict fad diet that is limiting in variety of foods and multivitamins or B complexes certainly supply enough. Additional supplementation does not tend to assist in the extra burning of calories. Dosages per day; B1 (Thiamin) 1.5 mg, B2 (Riboflavin) 1.7 mg, B5 (Pantothenic Acid) around 5 mg, B8 (Folic Acid) 400 mcg, B12 (Cobalamin) 6 mcg, B3 (Niacin) 20 mg, B6 (Pyridoxine) 2mg,

Certain groups of individuals may be at higher risk for lacking one or more of the B vitamins. Pregnant women need extra B8, vegetarians and the elderly may need extra B12 etc. but a good diet that involves a variety of foods plus a basic multivitamin should insure you get more than the RDA. Although these vitamins are very important and you do not want to be deficient in them; **Weight loss claims from fat burning supplements that say you need their product because it contains any of the B vitamins is unwarranted as long as you eat properly and take a multivitamin.**

Caffeine *Guarana, Guarna Extract, Guarana Seed, Kola Nut, Bissey Nut, Paullinia Cupana, Mate, Yerba Mate, Guaranine.* Caffeine can be found in many sources and you can easily substitute with a cup of coffee, tea or even green tea. One of the benefits of taking caffeine in pill form is no additional calories associated with sugars usually used to sweeten drinks. Acts mainly as a nervous system stimulant and mild appetite suppressant. Combined with ephedrine, it makes the best fat burner stack known. 200 mg 3 times a day.

Caffeine Comparison

The amount of caffeine in some common beverages is as follows:

- Coffee, brewed - 40 to 180 mg. per cup
- Coffee, instant - 30 to 120 mg. per cup
- Cola and other soft drinks, containing caffeine - 36 to 90 mg. per 12 oz
- Tea, brewed American - 20 to 90 mg. per cup
- Tea, brewed imported - 25 to 110 mg. per cup
- Tea, instant - 28 mg. per cup

The product Vivarin contains 200 mg of caffeine

Capsaicin *Cayenne, Capsicum* Capsaicin is the compound that makes peppers hot. Some people can ingest large quantities without adverse gastrointestinal side effects (heartburn). Basically any hot spicy food that causes you to sweat is having a thermogenic effect on your body. Effective dosage can be high, up to 3 grams per day and can cause heartburn in some individuals.

Chromium *Chromium Picolinate, Chromium Citrate, Chromium Chloride, Chromium Polynicotinate.* These are all different forms of the same mineral but the body is better at absorbing some than others. There is a big fight between the two camps of those who say chromium picolinate is better and those who say chromium polynicotinate is more

absorbable. This mineral helps insulin at regulating blood sugar. The two most popular forms are picolinate and polynicotinate. Recommended dosage per day is 120 mcg. Some fat burner supplements supply as much as 200 mcg and I have seen recommended dosages (for hard training weight lifters) as high as 400 mcg.

Although higher than the recommended serving of chromium may not increase weight loss, it is thought that many people are deficient in this trace mineral. Therefore people who are overweight (or diabetic) may not be getting the full effects of the insulin regulating abilities of this nutrient. A simple multivitamin should help insure you get enough and **buying supplements that supply more may be just a waste of money.**

You may also get chromium from Brewer's Yeast, a source rich in this nutrient often used by vegetarians since it also supplies B12, copper and iron. One ounce of brewer's yeast can supply an easily absorbable 100-200 mcg.

Cocoa Bean Chocolate The ancient magical drink really does contain numerous active compounds that may act as potent fat burners. Do not run out and buy a bunch of chocolate at the store. Once processed and mixed with milk and sugar it will do you no good except to put on fat and maybe help give you a feeling of satisfaction. But here is a breakdown of 4 active ingredients that when isolated and standardized for proper potency may prove effective.

Caffeine See caffeine listed above.

Phenylethylamine (PEA) This is the ingredient that makes you feel good. By promoting a sense of well being, happiness and satisfaction it can help eliminate binge eating or eating due to depression. Remember our bodies are very smart and when depressed many people turn to chocolate possibly to stimulate that feeling of well being. The only problem is store bought chocolate promotes fat storage. This ingredient may be found in some brands just to bring on feelings of satisfaction to help eliminate over eating. It does not directly promote fat loss.

Theobromine Affects humans much like caffeine by acting as a stimulant and mild diuretic. Amounts can vary greatly in different chocolates and beans so the ingredient needs to be standardized.

Theophylline Can stimulate the central nervous system, increase heart rate. Considered a potent stimulant that may cause jitters and other negative side effects much like ephedrine. So people who are sensitive to stimulants of this type may need to avoid it.

The last two ingredients, Theobromine and Theophylline, are somewhat new and may begin to appear in more and more fat burner mixes. Knowledge of their actual fat burner abilities is limited at this point.

Coleus Forskolii *Makandi* The root of this mint plant contains forskolin, a compound found naturally in the body that can affect many aspects of metabolism. Supplementing with forskolin may be a good thing although I do not believe there is solid human evidence for it. It is increasingly appearing in more products. If you want to supplement with it look for standardized extracts of 10-20% forskolin, about 100-300 mg per day.

Conjugated linoleic acid (CLA) there is plenty of fantastic positive data in animal studies but in human studies the results have been mixed on weight loss. Recently, I have been reading very good results from newer human studies from reputable resources. You may benefit the most from this agent the more overweight you are but if the results in the animal studies transfer at all to humans, then this is a great supplement. CLA also appears to target fat loss in the stomach area. CLA, a naturally occurring fatty acid, is obtained in your diet mainly through beef and dairy products. Although in supplements it is mainly derived from vegetable oils. Be sure to look for the brand name Tonalin for quality CLA products. The right dosage of CLA is unclear but it appears an average diet would not supply enough (maybe 1-gram). About 3-6 grams daily should be an appropriate amount.

Corosolic Acid *Banaba Leaf, Glucosol, Regulin.* Helps to regulate blood sugar and insulin. May reduce cravings for carbohydrates and sweets resulting in weight loss over an extended period of time. You will probably see this ingredient listed more often as banaba leaf in diet teas but the two company brand names producing the chemical form are Glucosol and Regulin. 16-48 mg per day divided with meals.

Creatine This supplement is highly effective. But **it does not directly help you to lose weight**. Creatine is necessary (we need about 2 grams per day) in our muscles to process energy. This supplement is proven, in many studies, to help you build additional muscle if you are working out with weights. Additional muscle helps you to burn more calories therefore you will burn additional fat. There is no need to take this supplement unless you are going to lift weights. It also does not increase duration-oriented exercise like aerobic activities. Do not take it just to try and burn extra calories. Creatine is found in meat and fish and you normally get about a gram in an 8 ounce steak. Dosage 2 g per day.

Dioscorea villosa *Mexican/Wild Yam* may have some benefit in regulating blood sugar but no good evidence exist to support this. More likely useful in helping women during the menstrual cycle but there are better ingredients for this.

Ephedrine *Ephedra, Ma Huang, Sida Cordifolia.* Laws in some states and Canada limit the drug ephedrine. You can also find ephedrine in some over-the-counter medications such as asthma bronchial dilators (both inhalants and pill form) and in decongestants. Personally, I took all of these products to alleviate my allergies and mild asthma for years before I became truly aware of the active ingredients. It is considered to be one of the most effective thermogenic agents, it stimulates the nervous system and can raise blood pressure. Recommended dosage for a healthy adult of ephedrine is no more than 100 mg in a 24-hr period. Almost all reputable products deliver no more than 20 mg of ephedrine

in a single serving as recommended. For further information on ephedra visit www.ephedrafacts.com

Fenugreek Typically used in seasoning foods fenugreek is also known for its ability to affect blood sugar and reduce appetite. The only draw back is large quantities are required to obtain results making it unlikely to be used for such purposes. The seeds also act like the popular chitosan and absorb fats. Consumption of 15-20 grams per day is effective in controlling blood sugar, while higher levels (up to 100 grams) may be needed to effectively suppress appetite for weight loss purposes. It is unlikely that any supplement on the market would supply these quantities.

The active ingredient in fenugreek seeds that is actually useful has been isolated and is called 4-hydroxyisoleucine (see 4-hydroxyisoleucine listed above for details)

Green Tea polyphenol, catechins The active compounds in green tea are the polyphenols of which various catechins make up the largest portion. There is some pretty good evidence that green tea has a direct effect on weight loss. Look for extracts standardized to at least 60% polyphenols 125-500 mg per day. This equals approx. 4-10 cups of green tea.

Guarana (see caffeine) Guarana seeds contains twice as much caffeine as coffee beans so companies use it as a cheaper source of caffeine.

Guggul gum guggul, guggulu, guggulsterones, guggulipids, from the mukul myrrh tree If you take this make sure your supplement says guggulipids as gum guggul and guggulu may contain unwanted impurities. Presently there is not enough lab evidence to suggest this supplement is warranted for weight loss but further studies are being made. It has been used in India in Ayurvedic medicine for many years to stimulate thyroid production. If you have low thyroid output you may benefit from this chemical. Guggulsterones are becoming increasingly popular in body building supplements to encourage every ounce of fat loss possible. Dosage is 200-800 mg daily.

Gymnema Sylvestre Gurmarbooti, gurmar, periploca of the woods, meshasringi Helps to regulate blood sugar and insulin. May reduce cravings for carbohydrates and sweets resulting in weight loss over an extended period of time. Known as the "sugar destroyer" is may also reduce the taste of sweetness on your tongue. Caution: Certain medications, including antidepressants (St. John's wort) and salicylates (white willow and aspirin) can enhance the blood sugar-lowering effects of gymnema sylvestre, whereas certain stimulants such as ephedra (Ma Huang) may reduce its effectiveness. Dosage uncertain but 400 mg per day helped diabetics and so those who are simply overweight should require less.

Hydroxycitric Acid (HCA) Garcinia Cambogia, Citrin, CitriMax This popular weight loss ingredient actually does not have enough evidence to support it being used as the main ingredient. There is some evidence it may block conversion of simple sugars into fats but does not work directly on dietary fats. HCA may be limited to working as an

appetite suppressant and weight loss aid mainly if you are consuming large quantities of carbohydrates (mainly simple sugars like bread, potatoes, candy etc.) One other case against it is the high dosages used in the studies are considerably less than what is offered in a lot of commercial products. Dosages to look for are a minimum of 750 mg of Garcinia Cambogia standardized to contain at least 50% HCA 3 times per day.

HMB (beta Hydroxy-Methyl-Butyrate) Like creatine listed above this supplement is safe and proven for muscle recovery. So indirectly it can help you lose fat but mainly if you are going to be exercising. HMB helps to keep your muscles from breaking down during exercise (both short duration and endurance exercise). There are some indications it does help metabolize fat. Dosage is about 1 gram per day while not working out and 3 grams per day during intensive workouts.

L-Carnitine is an amino acid easily produced from a variety of other common nutrients (lysine, methionine, vitamin C, iron, niacin and vitamin B6) within the body. L-Carnitine is needed to release energy from fat. In situations of high energy needs the body can become temporarily deficient. There is no evidence that larger doses help with additional fat loss and the body produces all it needs. Even strict vegetarian diets or extremely low calorie diets do not tend to lack in L-Carnitine. You can be assured of getting plenty by taking an amino acid complex or consuming plenty of protein. If you wish you can supplement with 2-6 grams per day.

(Acetyl-L-Carnitine) is very similar and some people suggest more effective. Although you are not likely to notice any difference the recommended dosage is lower, 500-750 mg per day.

Lipotropics in general, are substances that prevent an abnormal accumulation of fat in the liver (fat solvers). Besides improving fat metabolism, lipotropics will also aid in the metabolism of fat-soluble nutrients and aid the liver in its other metabolic functions such as the processing of hormones, estrogen, sulfa drugs, glucose, and glycogen.

The average person should get plenty through their diet and there is no real evidence that additional supplementation increases weight loss but if you wish to supplement, find a good multivitamin/B vitamin complex that supplies these nutrients. **There should be no need to waste money buying special "lipotropic" products for weight loss.**

4 lipotropics listed below:

Choline aids in emulsifying cholesterol so that it doesn't settle on arterial walls. Lecithin or Phosphatidylcholine is the best way to supplement although the body can make choline from the amino acid methionine. The average diet supplies the RDA dosage per day approx 400-900 mg. Additional supplementation should not be required unless you are an athlete then you may want to look at 1-5 grams per day.

Betaine (TMG) (trimethylglycine) Methyl groups can deactivate harmful substances in the body and convert them to helpful substances. Both betaine citrate and

betaine aspartate are good supplements to look for. Betaine is not an essential nutrient, and thus no deficiency state exists.

Inositol metabolizes fats and cholesterol and aids in transporting fat in the blood system. Thus it is an aid in the redistribution of body fat. No real deficiency state exists although in clinical treatments doctors have prescribed high dosages of 1 gram or more.

Methionine is an amino acid that reduces fat and aids in lowering cholesterol. It can be substituted for choline, which aids in reducing liver fat. Methionine seems to act as a catalyst for choline and inositol thus speeding up their function. It is an essential amino acid and requirements vary according to body weight, approximately 800–1,000 mg of methionine per day. An amount easily obtained by most diets.

Momordica Charantia *Karela, bitter melon, bitter gourd, carilla plant, wild cucumber, African cucumber, Kuguazi* is a common vegetable eaten by many throughout the world, Bitter Melon grows on a vine, is cousin of the squash and hates cold weather. The vine resembles that of the tomato. Instead of round red fruit, however, the bitter melon has green cucumber shaped fruit. It's called "bitter" for taste, "melon" for looks. There is some evidence to suggest bitter melon works to stabilize insulin or lower blood sugars. It is presently unclear as to which chemicals or combination of chemicals in this plant are responsible for it's actions. Further studies are being conducted. Dosage very uncertain possibly between 5-100 ml per day.

Morinda citrifolia (Noni) typically known as Noni Juice in a variety of forms. **Do not waste your money on products that promote this as the main ingredient for weight loss.** There is no evidence that suggests it will help you lose weight.

Naringin may not directly affect weight loss but it will extend the affect of other ingredients like caffeine. Essentially making the agent more potent. Naringin also has been shown to affect many prescription drugs. Please use caution with this ingredient. Dosage of 50-200 mg per day.

NADH *nicotinamide adenine dinucleotide* this compound is required for the metabolic process of energy production. It is found in meat and poultry and may increase energy levels through supplementation. Although not as expensive as pyruvate it can cost \$2-15 dollars per day for the recommended dosages of approx. 2-15 mg per day.

Pyruvate usually combined with calcium but also combined with sodium, potassium or magnesium to stabilize the compound. There is little doubt that this supplement works for weight loss. The main problem is cost. Most studies used large quantities 25-40 grams per day and most supplements sold commercially only supply about 250-1500 mg per day (a huge difference). **There is no evidence to support these small, commercial dosages are beneficial to weight loss.** There have been a couple of studies that used lower dosages around 6-10 grams a day with positive results when combined with exercise. Prices may change but just to supply your body with 20 grams of pyruvate a day would cost on average around \$16.00 dollars. Even if the lower dosage of 10 grams

a day was effective it would still cost you around \$8.00 dollars a day for this single supplement. If you can afford the price and stand the possible gastrointestinal side effects of gas, bloating and diarrhea such large dosages may cause, then by all means help yourself.

Ribose can assist with energy production and can become depleted during long bouts of exercise over periods of days. Supplementation should not be necessary for the average exercising individual but the athlete who exercises hard nearly every day may benefit. Dosage per day 3-10 grams.

Synephrine *Citrus Aurantium, Bitter Orange, green orange, sour orange, Zhi Shi.* It is a mild stimulant and appetite suppressant though the scientific data on humans is poor to limited. Synephrine is chemically similar to ephedrine but may not have the negative central nervous effects of ephedra or caffeine, so it may be a good alternative to those seeking thermogenesis without ephedrine although it may not be as effective. Synephrine may raise blood pressure. Dosages to look for are approximately 200-600 mg of citrus aurantium that have been standardized to contain 3-6% synephrine or about 4-20 mg of synephrine.

Taurine is a conditionally essential amino acid meaning there are certain times of mental and physical stress when the body does not produce enough. As the second most abundant amino acid in the body it plays a large variety of rolls. There are no solid studies backing claims of increased energy or muscle increase from supplementation. It has been found that sometimes, strict vegetarians and diabetics can be lacking in taurine, which is mostly found in red meat, dairy, fish and poultry. Energy drinks may have between 50 and 100 mg and various clinical studies have used 500mg up to 6 grams.

Vanadium *Vanadyl (Vanadyl Sulfate), Vanadate* A trace mineral recently discovered to be essential although no RDA has been established yet. Some multivitamins may not contain it but it is thought we only need about 10 mcg per day. Your normal daily diet should supply enough, 10-30 mcg. This mineral may help metabolize carbohydrates and regulate blood glucose (vanadium mimics insulin). Vanadyl Sulfate is probably the best form and bodybuilders will consume daily dosages as high 50 mg per day, but remember this is a trace mineral and consuming to much could lead to a toxic buildup.

Yohimbine Hydrochloride (HCL) *Yohimbe, Yohimbe Bark, Quebracho* may aid in the direct loss of body fat. Also may prevent arteries from becoming clogged. There is more evidence that suggest it is better used for erectile dysfunction in men rather than weight loss. That is the reason why you will see yohimbine included in "male formulas" more often than just in weight loss products. May also raise blood pressure. Dosage of 1-5 mg daily.

The Best Ingredients for Weight Loss

The **E/C/A/ stack** (Ephedrine/Caffeine/Aspirin)- Combine with Naringin to extend the effectiveness.

Ephedrine/Caffeine

Ephedrine

Caffeine

Conjugated Linoleic Acid (CLA)

Green Tea

Capsaicin

Pyruvate- Effective in large dosages (but very expensive) the quantities found presently in products are unlikely to be useful as a fat burner.

Corosolic Acid (banaba leaf)

Gymnema

Mid-range ingredients for weight loss (some ingredients have limited or mixed data but may provide some assistance)

Synephrine

NADH

Coleus Forskolii

Hydroxycitric Acid (HCA)

Aspirin

Guggul

Naringin

4-Hydroxyisoleucine

Theobromine and Theophylline (listed under Cocoa)

The least effective or worthless ingredients for weight loss

5-Hydroxytryptophan (5-HTP)

Dioscorea villosa (Mexican/Wild Yam)

Morinda citrifolia (Noni)

Yohimbine Hydrochloride (HCL)

Fenugreek

Apple Cider Vinegar

Pyruvate Yes, I also included it in the most effective list because it is proven to work. The only problem is no one I have found yet sells it in large enough doses to be of use.

What is the best Brand?

No single brand that I have found contains the complete mix of the best and mid-range ingredients. They each have slightly different combinations of ingredients to help set them apart.

E/C/A Stack

The E/C/A stack is a proven winner but it can be very powerful and have strong effects on the body. I think that for most people it is safe to take as long as you follow the directions and do not abuse this combination. For more information on ephedra visit www.ephedrafacts.com As with any chemical some people are more sensitive than others and if you have not tried this combination then proceed with caution.

The reason you will find the same approximate dosages in most fat burners is because there is a certain ratio that has been proven to be the most effective and increasing the dosage does not make it better. 20 mg of ephedrine, 200 mg of caffeine and 300 mg of aspirin per dose three times a day. There is only one brand that has the patent for the exact formula used in the clinical trials (it is called ECA Stack by NutraSport). Other brands mimic this formula by using the herbal equivalents. If aspirin bothers you then look for the herbal equivalent, willow bark or look for one that does not contain it. The ephedrine/caffeine stack by itself is potent.

How to make the E/C/A stack more effective

Take it 30 minutes before you work out so you can exercise more intensely and burn extra fat. Don't take it every day. Take it every other day and on the days you don't take it use a secondary set of ingredients that are different from the E/C/A stack. If you do take it every day be sure to take a break for one week out every month.

Special Vitamin Section

The following are some vitamins and minerals you want to be sure to get enough of to help fight fatigue and to keep your body supplied with the proper nutrients so you can lose weight. If you become deficient in one or more of these nutrients then feelings of tiredness can set in or your body will not be able to function properly to burn fat.

Four Fatigue Fighters Doctors have found that many people who experience fatigue are usually deficient in one or more of these nutrients. Just being tired is no symptom showing you lack any of these nutrients. Make sure you are getting enough sleep first and foremost.

1. Iron
2. Magnesium
3. Potassium
4. Vitamin C

Dieter's Deficiencies Doctors have discovered that people who are overweight or on low calorie diets may lack some of the following nutrients. Simply because you are overweight or dieting does not guarantee you are lacking any one or more of these nutrients.

1. Calcium
2. Chromium
3. Copper
4. Iron
5. Magnesium
6. Vitamin A
7. Vitamin C
8. Vitamin E
9. Zinc

Special Section: Carbohydrate and Fat Blockers

Carbohydrates

Carbs are the fuel that your body prefers to use. When people go on low carb diets it affects their brains too. This is why you may become irritable, tired, and depressed. Your body craves carbs and you are going to eventually "crash and burn".

People will binge on foods that give quick carb jolts. These carb jolts come in the form of simple carbs or simple sugars that your body can break down quickly to satisfy that craving. Foods like candy, ice cream, and pizza. Your body is not stupid and knows where to go to get what it wants.

Use low carb diets intelligently. Do not try to stay on them for extended periods. If you find low carb dieting works for you, then utilize them for maybe 2 or 3 week stretches. But when you go off of them continue to exert good nutritional control. This is why it is highly recommended for any diet to take a break one or two days a week to reward yourself and to keep your brain and body happy.

Two highly effective Fat and Carb Blockers are Chitosan and Phaseolamin

Chitosan Known for years, is a marine fiber. Until recently it was required to take the product 30-60 minutes before you ate. Now new developments allow you to take it just before you eat. The brand name chitosan to look for is **Liposan Ultra**. It can bind 5 times more fat than regular chitosan and dissolves instantly in the stomach.

Phaseolamin (Phaseolus vulgaris) An effective new carb blocker is derived from the kidney bean. One brand name to look for is Phase 2 although many products simply list the ingredient as phaseolamin (extract of northern white kidney bean). A 500 mg dose can block dozens of calories.

Products to look for containing these ingredients:

Carb Cutter (Health and Nutrition Systems) Does not contain Liposan Ultra but does have phaseolamin and several other ingredients for assisting the transportation and utilization of sugars.

The next 3 Brands contain Liposan Ultra:

OptiBlock (SlimSense)

LipoSpa (Nutramerica)

(Natrol) Fat Intercept and Ultra Chitosan

What to look for in an online auction or while making any fat burner purchase?

If you are not familiar with the brand you are buying, make sure they list the following:

1. Ingredients
2. Quantity of ingredients per serving
3. Recommended serving and number of servings per day
4. Quantity of pills per bottle

Buyer Be Aware!

I have seen bottles of Stacker 2 (a reputable product) on eBay that are very inexpensive. The only problem is the bottle only contains 30 pills! At the recommended dosage of 2 or 3 pills, several times a day, at best these bottles will only last a week or two. Make sure they list everything you need and pay attention to everything!

Standardized: Learn to read the label

If you look at the label on a bottle that contains the herbal equivalent of ephedrine, caffeine and aspirin you may see something like the following.

Ma Huang 250 mg (standardized to 6% ephedrine) 20 mg

What does this mean? This means the manufacturer used the herb Ma Huang to supply the active ingredient ephedrine rather than using the chemical drug ephedrine. The Ma Huang was manufactured so that 6% of the 250-mg is ephedrine. Or 20 mg of the 250 mg of Ma Huang is ephedrine.

One problem with labels is there is no standardization for labeling supplements or herbs. You have to take the manufacturer's word that it contains what it says it does. This is

one reason to use reputable popular brands that have a lot to lose if it is found out they do not supply what the label says.

If the label says 250 mg of Ma Huang and nothing else, then you have no idea how much of the active ingredient ephedrine is actually in the 250 mg. You could be getting practically no ephedrine or getting way too much to be considered safe.

Your safest bet is to look for herbal ingredients that list the standardization of the active ingredient.

One other way to tell if you are getting a proper dose of ephedrine is if they list the ingredient as an alkaloid. In other words you may see listed on the label Ephedra alkaloids 20 mg supplied as Ma Huang

What is a good price to pay for a fat burner?

Of course this can easily vary because some companies use inferior ingredients or don't even put the ingredients in. Try to stick with trusted brand names. You may pay a little more but you are more assured of accurate quality. Another factor is some ingredients are flat out more expensive to produce such as Pyruvate, CLA, 4-hydroxyisoleucine.

Average pricing for brand name products seems to be between .20 cents and .33 cents per pill.

Easily determine a good price for fat burners by first checking for ingredients you want. If they list a bunch of amino acids and vitamins then you probably do not want it if you already take a multivitamin/amino acid complex (more does not mean better). Then check for quantity (based on mg, mcg, etc.) of the ingredients per serving. If the quantity of ingredients between two nearly identical fat burners is the same then price comparison is really easy. Pay attention to their serving size. If one brand says take 2 pills 3 times a day and another brand says take 6 pills 3 times a day, you really need to double check the quantity of ingredients per serving. Next, find out the cost per pill.

To find out the cost per pill, simply take the total quantity of pills in the bottle (30, 60, 90 etc.) and divide by the total cost. Don't forget to include shipping and handling if it applies. For example:

Lets assume the ingredients are the same in the following two products.

Product #1: \$29.95 divided by 90 pills equals .33 cents per pill

Product #2: \$39.95 divided by 120 pills equals .33 cents per pill

The two prices listed above are actually equal on a per pill basis. But lets say the first product only requires 1 pill 3 times per day to equal 500 mg and the second product requires 3 pills 3 times per day to equal 500 mg.

Here is how to find out the cost per serving and per day.

Product #1: .33 cents multiplied by 1 equals .33 cents per serving (1 pill) or .33 cents multiplied by 3 for .99 cents per day.

Product #2: .33 cents multiplied by 3 equals .99 cents per serving (3 pills) or .99 cents multiplied by 3 for \$2.97 per day.

Obviously it is much cheaper to pay .99 cents per day for Product #1 as opposed to \$2.97 per day for Product #2.

How to save \$399.60 dollars a year on the best fat burner

The best fat burner presently known is the combination of ephedrine and caffeine (you can include aspirin). You can buy these two ingredients cheaply if you purchase them individually instead of buying a brand name that contains these 2 active ingredients.

You can go into most any well stocked nutrition store such as GNC or Vitamin World and buy a bottle of ephedrine (Ma Huang) and you can also buy the caffeine (I use the brand Vivarin). Be sure to look for the proper dosage of ephedrine, which would be no more than 20 mg per serving to be safe.

Here is the formula I used to arrive at saving \$399.60 a year.

Savings obtained by individually purchasing the active ingredients to the best fat burner presently known. Of course actual prices may vary.

The Nutrasport product E/C/A Stack contains 3 active ingredients, ephedrine alkaloids 20 mg, caffeine 200 mg, acetylsalicylic (aspirin) 324 mg. SRP \$44.50 for 120 pills based on their web site www.ecastack.com Serving size is 2 capsules 3 times a day. \$44.50 divided by 120 equals .37 cents per pill. (\$2.22 per day) (\$66.60 per 30 day month) (\$799.20 per 12 months). Of course you would not actually use the product every day for a year and Nutrasport does not recommend that you do.

Now the prices of the same individual active ingredients purchased separately.

Stacker Pure Ephedrine pills- SRP at Powerhouse-supplements.com \$11.95 for 60 pills. 1 serving equals 20 mg of ephedrine (from Ma Huang) 3 servings per day for optimum fat burning with caffeine. \$11.95 divided by 60 equals .20 cents per serving (.60 cents per day) (\$18.00 per 30 day month) (\$216.00 for 12 months)

Vivarin Caffeine pills- SRP at Drugstore.com was \$11.49 for 80 pills. 1 serving equals 200 mg. 3 servings per day for optimum fat burning combined with ephedrine. \$11.49

divided by 80 equals .14 cents per serving (.42 cents per day) (\$12.60 per 30 day month) (\$151.20 for 12 months)

Rite Aid Aspirin- SRP at Drugstore.com \$2.49 for 100 pills. 1 serving equals 1 tablet at 325 mg, 3 servings per day combined with ephedrine and caffeine for optimum fat burning effects. \$2.49 divided by 100 pills equals .03 cents per serving (.09 cents per day) (2.70 per 30 day month) (\$32.40 for 12 months)

The following chart shows cost per year if taken every day (not recommended)

Caffeine	\$151.20	Nutrasport ECA Stack	\$799.20
Ephedrine	\$216.00		
Aspirin	\$ 32.40		
Total	\$399.60	Total Difference =	399.60

I recently bought a box of Vivarin with 80 tablets for \$6.50 this equals .08 cents per pill and a bottle of Ma Huang with 90 capsules for \$9.99 this equals .11 cents per pill. Both together would be .19 cents per pill. If I took 3 servings a day (.57 cents) this would cost me \$208.00 a year.

If you want the best fat burner and want to save hundreds of dollars a year then that is what I recommend. You can also buy most of the other ingredients known for weight loss separately also. Ingredients like Green Tea, Capsaicin (Cayenne), Synephrine (Citrus Aurantium), HCA etc.

Daily "Recipe" for maximum fat burning

Drink plenty of water, exercise for 30 minutes and eat small nutritional meals 5 or 6 times a day.

Every day consume the following:

- Multivitamin.
- Amino Acid complex or protein drink.
- Green Tea either as an enjoyable drink, at least 4 cups per day or in pill form.
- CLA This product is not cheap and not recommended if on a budget.
- Other beneficial dietary fats (good fats) like Flax seed oil that contains Omega 3 fatty acids.

Every other day consume the following:

- A product containing the E/C/A combination.

On days you are not taking the E/C/A stack try the following:

- Substitute with a product that contains synephrine
- Capsaicin/Cayenne pills
- A product affecting insulin that contains banaba leaf and/or gymnema.
- Possibly a product with guggulsterones for your thyroid.
- HCA

I would not recommend suddenly starting all of these products at once. If you have never consumed any of them then you do not know how your body will react. If you do become mildly ill from gas or diarrhea then you would know which product to discontinue. Try one product for a while and if everything goes okay then add another. You did not suddenly become overweight overnight and taking some time to insure your health and lose weight in the same fashion you put it on (a little at a time) is a good thing.

No reputable product exists that will magically melt dozens of pounds of fat off your body in just a few weeks. Learn good nutrition habits, exercise and you will get to where you want to be.

Metabolism Boosting Foods

I have said it before and I will continue to say it. The best thing you can do to keep your metabolism revved up is to exercise, add muscle to your body and to eat 5 to 6 small nutritious meals a day.

Now I know many of you will never exercise and this is unfortunate because the health benefits you gain is truly a long list. But, I also know the one thing everybody must do everyday is to eat. Making simple, wise choices will speed you on your way to losing weight.

Eliminate fried and fatty foods (Skip restaurant and machine-vended foods)

Eat more lean protein (chicken, fish, and turkey)

Consume more fruits and vegetables

Replace all your processed (white bleached flour) grains with whole grains (brown rice and whole wheat)

Complex Carbohydrates and High Fiber Foods

Whole grain cereal, whole-wheat bread, brown rice, and oatmeal.

They work by keeping insulin levels low after eating.

When your insulin spikes or increases sharply (like it will after eating sugary foods or simple carbs) your body signals it is time to store fat. To store fat, your body slows down your metabolism.

Skipping meals (like many dieters do) has the same effect. Your metabolism will slow down and prepare your body to store fat. This is where the YO-YO effect comes from when dieters begin eating again and rapidly gain weight.

Lean Protein

Chicken, turkey, lean beef, lean pork (avoid hamburger and most pork products).

Your body works harder to break down the protein in meat than it does carbohydrates or fats.

Good Fats

Fish (Tuna, Salmon), Flax Seed Oil, Hemp Seed Oil

Works by increasing the Omega-3 fatty acids, which can decrease the hormone leptin.

Leptin influences metabolism. Increased Leptin can trigger your metabolism to slow down.

Metabolic Herbs and Spices

Spicy peppers like Jalapeno, Habanero and Cayenne contain Capsaicin

Capsaicin works by speeding up your heart rate.

A single spicy meal may boost your metabolism by 25% last for as long as 3 hours and may help you burn hundreds of extra calories. (Don't go to a Mexican restaurant and expect to get skinny. Many Mexican dishes especially in restaurants are high in fat).

Caffeine

Works by speeding up your heart rate.

Green Tea (The active ingredient is called EGCG)

Revs up your brain and nervous system.

Cocoa

A blend of ingredients thought to make you feel good and raise metabolism

Kicken Coffee Recipe

One cup of coffee

One heaping spoon of baking cocoa mixed in

(If you are brave a few dashes of hot sauce will put you over the top)

Sweeten to taste (remember to limit sugars for maximum weight loss)

Fat Attack: A 6 Step Simple Nutrition Guide

Good Nutrition like everything else does not have to be complicated, simple is better. Follow these simple rules for 2 to 3 months and you will be amazed at the results.

1. Revise your Cupboard.

Simple Rule: If Man Made it Don't Eat It.

If it is not in your house you can't eat it. Rid your kitchen of processed foods and snacks. Do not fall for marketing that claim low-fat, low-sugar, low-carbohydrate. Too many companies manipulate labels and they are hard to figure out. Keep your cupboard simple. Chicken, tuna, vegetables (fresh, frozen and canned are fine), fresh fruits, and complex carbohydrates consisting of whole wheat, brown rice, yams, oatmeal (not the processed quick cook kind). Use plenty of herbs and spices so your meals don't get boring.

2. Handy Gauge

Simple Rule: Use Your Hand to Gauge How Much to Eat.

Do not count calories, weigh food or other methods that make eating difficult. A fist or palm sized amount of lean protein along with a fist-sized amount of a complex carb (brown rice, oatmeal, and whole wheat) and fist sized serving of vegetable or fruit.

3. Eat Less More Often.

Simple Rule: Eat every 3 hours.

Eating nutritious smaller meals and snacks every few hours will keep your metabolism high all day long with a steady supply of energy. Do not eat out, take all your food to work.

4. Water Yourself

Simple Rule: Drink twice as often as you eat.

Water makes everything in our bodies work better. This cannot be understated. The first thing you should do every morning when you get up is drink a glass of water.

5. Friendly Fats

Simple Rule: Friendly Fats Fight Fat.

Consume friendly fats (2 to 5 tbsp.) 2 times a day. Reduce bad fats found in meat, cheese, butter, margarine, shortening and whole milk. Eliminate fried foods and snacks. Your friendly fats are linolenic acid (omega-3) and linoleic acid (omega-6) found in fish and some nuts. The easiest and best way to consume these friendly fats is to buy Flax Seed Oil, Hemp Seed Oil or Udo's Choice Perfected Oil Blend. Do not cook with these oils but mix them with food you are ready to eat. You can also add CLA supplements to your diet.

6. Nutrients

Simple Rule: Mother Nature Provides the Best Fat Fighters

Take a multivitamin and be sure to get plenty of Calcium through low-fat dairy sources. Consume 1 gram of protein per pound of body weight (one chicken breast can have 40-45 grams of protein). Consume 35 grams of fiber a day (good sources are bran, brown rice, beans and green vegetables).

Nutrition and weight loss can be simple.

Increase the speed of your fat loss by exercising 30 minutes a day or for 1 hour every other day. Please add a weight lifting routine. To learn more, read Weight Loss Simplicity at <http://weightlosssimplicity.tripod.com>

Links

Here are the links to follow if you care to research further: (Sorry, this version does not contain live links. You must open your browser, then type in the url location.)

www.ms-se.com Journal of Medicine & Science in Sports and Exercise.

www.ajcn.org The American Journal of Clinical Nutrition.

<http://medlineplus.gov> information from the world's largest medical library, the National Library of Medicine at the National Institutes of Health (NIH).

International Journal of Obesity <http://www.nature.com/ijo/> You have to pay for a subscription.

www.supplementwatch.com good commercial site with paid and free information.

www.jama.org

<http://www.obesityresearch.org>

www.wholehealthmd.com

www.gnc.com commercial site but good free information on ingredients if you use the search function. Their search function uses information from www.healthnotes.com

Understanding supplements <http://www.cfsan.fda.gov/~dms/ds-savvy.html>

Dietary Supplements: An advertising guide for industry

<http://www.ftc.gov/bcp/online/pubs/buspubs/dietsupp.htm>

You can find information on the functions and potential benefits of vitamins and minerals, as well as upper safe limits for nutrients at the National Academy of Sciences Web site at: <http://www.iom.edu/iom/iomhome.nsf/Pages/FNB+Reports>

