

Here is a little insight into how I design/program your strength and conditioning program....

My system is not based on simply just training “today/now”, it is based on a 12 month calendar that works in reverse. I design it with the goal in mind, for “peaking” at the right time to maximize potential for you. My system delivers year-long, training programs designed to properly prepare my athletes for competition. The training methods, program designs and technology I use are trusted, documented and reinforced by decades of experience as well as backed by qualified and certified trainers and strength coaches, who hold degrees including CSCS and Ph.D.'s.

There is a significant the difference between a “workout” and a “training session.” A workout is an isolated bout of exercise, not directed toward a long-term performance goal. A training session, on the other hand, is much more. It is carefully planned, from exercise selection to volume and loading, and designed specifically for your sport. It is focused on the long-term goal of peaking your body for optimal performance during the “in-season”, and the short-term goals at different stages of the year-long sport season. The training session does not stand alone, it’s not a one-off workout, but instead it has a designated and deliberate purpose within the training week, month, season, and year. I do not create workouts—I design entire programs, comprised of individual training sessions focused on your performance goals.

How do I do this? By using the vetted strength and conditioning science of periodization. By breaking the calendar up into “phases,” breaking each phase into “blocks,” and breaking blocks into individual training sessions, I can isolate long and short-term goals and maximize your physiological adaptation to them.



The goal of this paper is to provide some clarity and additional information about the different components in the "calendar" that I design for you.

Before I go further, I should point out one important detail: nothing that I do in terms of programming is unique. There is no secret recipe that I am privy to.... Well, maybe that's not entirely true, I do have a uniqueness to what I do. The information and expertise off which I base my programs is out there—in studies, in peer-reviewed articles, in texts, in practical application—it's just not easily accessed. For those that know me, they know that there is no ego at stake in my programming, I'm not one to promote or boast about my training successes with any athlete, whether it be any of my NFL or NHL guys or any MX athletes. I've helped the best of the best reach the pinnacle of their sport, that is my satisfaction. I like to call what I do, "I am the man behind the curtain" (Wizard of Oz reference - I know what levers to pull and how to help you pull them to make magic). I simply apply sound principles of strength and conditioning science to sport-specific training programs.

The Calendar

The year-long training calendar is organized into three phases. Each phase represents one of the designated periods within the sports season: off-season, in-season, and post-season. By breaking up the calendar year into three phases, I can isolate the training goals within each to target the physiological adaptations needed at specific points in the sports season. Just as the calendar year is divided into phases, each phase is divided into a certain number of weeks of training, called blocks. And just like a training phase is focused on a specific goal (e.g., the goal of the off-season is to prepare the body for the strength and conditioning demands of competition), each block is similarly targeted to develop specific traits within the broader goals of the block.

The most important (and arguably most ancient—see Milo of Croton of the 6th Century) feature in any good strength and conditioning program is progressive overload. The concept is simple: the human body is really good at adapting. If you never change the volume or loading in your training program, you will stop seeing adaptations. This change does not always mean an increase—for example, from a Hypertrophy block to a Strength Capacity block, the work volume decreases as the load increases. And from any block to an Unload block (more on this below), both the volume and load decrease to allow the body a calculated respite from progressive stress.

My programming progressively increases the intensity through every set of a single workout, every workout in a given training week, every week within a block, and every block within a phase. This intentional overload, if followed correctly, will result in maximum physiological readiness at just the right time in your season. It is crucial to be at your physical peak at the most competitive point in your season—and that is precisely what a progressively overloaded program is designed to create.

Foundation/General Physical Preparedness (GPP)

- **Volume: Very High**
 - **Load: n/a**
- The General Physical Preparedness (GPP) Block is geared for novice or detrained athletes. If you have never been involved in a training program, or if you are an experienced athlete coming off an inactive post-season, GPP is the block you will start training on. This block is designed to help you build broad-range capacity within a variety of central movement patterns and develop a better understanding of how your body moves—and how well it doesn't. Moving through the GPP Block will give you a clearer idea of where your strengths and weaknesses are; where your mobility is restricted, which movements are the hardest for your body to perform with perfect form, etc. This information can help guide you toward suitable workout primers and finishers that fit your needs. **Heavily reliant on bodyweight movements, the GPP Block will help you build the coordination, proprioception, and mobility necessary for loaded movements introduced in later blocks.** This is an appetizer" of the coming calendar year.

The GPP block was also designed to make you really tired. The reasoning behind this? You won't buy into a training program unless you can tell right from the get-go that it is challenging. I know my athletes — they are competitors. They do not shy away from a challenge, but rather welcome any opportunity to rise up. The sheer volume (reps x sets) in the GPP block is tough enough to challenge any athlete, novice or advanced.

Hypertrophy (HYP)

- **Volume: High**
- **Load: Moderate**

Hypertrophy builds on the movement patterns established during GPP, adding load to increase the physiological demand on the body. This block is designed to help build new lean muscle tissue while increasing neuromuscular efficiency and your body's capacity to gain strength. **Adding moderate loading to the good movement patterns cemented during GPP, while keeping the volume of work high, the Hypertrophy Block allows athletes to learn how to start recruiting more muscle fibers in compound movements.** Reps stay in the 8-12 range to maximize muscle fiber growth without mitigating gains in strength by moving into higher-repetition muscular endurance protocols. Training on a Hypertrophy Block will help create and solidify the connections your brain makes with your muscles while strength training; it will increase your muscle tissue's capacity to build strength within those pathways; and it will increase the size of individual muscle fibers. If you start to notice the sleeve of your t-shirts getting a little tight, fear not: that's normal. As you progress through your periodized calendar (sleep enough and eat enough to support your goals, but not too much), in addition to your sport practice and conditioning, the increase in lean muscle should coincide with a decrease in body fat, which will mitigate any initial increases in size.

Strength Capacity (STC)

- **Volume: Low to Moderate**
- **Load: Moderate to High**

Once muscles have been primed for increased strength during Hypertrophy, it's time for Strength Capacity. Lower in volume but higher in load than Hypertrophy, this block is designed to help athletes establish a good strength foundation in key structural lifts: the bench press, the back squat, and the hang clean. During Strength Capacity, the work volume stays at around 5 reps. This provides enough time under tension to maximize the number of muscle fibers recruited during any given movement, while keeping the load high enough to stimulate a strength response. **The Strength Capacity Block is, therefore, tiring—but it is an essential bridge from the high-volume demand of Hypertrophy to the high-load demand of the Strength block.** This block is especially great for endurance athletes, or athletes wanting to train not solely for either hypertrophy or strength.

Strength (STR)

- **Volume: Low**
- **Load: High**

The Strength Block follows Strength Capacity and builds on it, kicking up the loading considerably. This is when athletes will feel their lifts start to get heavy. **The Strength block develops the potential for maximum recruitment of muscle fibers during a movement, setting the stage for quicker and more powerful strength feats in later blocks.** Athletes will continue to build low-velocity strength by increasing the force production demanded from muscle fibers during each lift. But while the loads are heavy, the volume is light and the rest periods between movements are long—so athletes should not be exhausted by the end of the workout. Leaving a sweaty mess on the gym floor may feel productive, but may actually hinder what the Strength Block is trying to achieve.

Max Strength (MST)

- **Volume: Very Low**
- **Load: Very High**
- **Velocity: Low**

As you can guess by its name, Max Strength brings the heaviest loading in the periodized training calendar. Designed to maximize force production and muscle fiber recruitment in structural lifts, Max Strength builds on the preceding strength blocks to peak athlete strength in low-velocity movements. Repetitions decrease to just a few during this block, in order for athletes to max out their loads in any given lift. It is important for athletes to maintain control over the bar during each movement, and get adequate rest between lifts to ensure safety as loads get heavy. **The best time to recalibrate your strength numbers is at the end of the Max Strength Block.** Why? It's best to increase the loading throughout the block, so the final day of your final week of Max Strength should be the day that your loads are the highest—and therefore the most accurate, in terms of recalibration data. For example, calibrating your strength numbers based off your hang clean 5RM will not yield as accurate results as calibrations based off a true 1RM in the movement. And because your body is best prepared to handle the heaviest loads at the end of the Max Strength Block, it is the best time to fine-tune your calibrations. The program/system always includes at least one of the 3 main movements used to calibrate the entire program in the last week of Max Strength, and sets you up for success in bumping up those RM numbers to recalibrate the next block of your program.

Power (POW)

- **Volume: Low to Moderate**
- **Load: Moderate**
- **Velocity: Moderate (with control)**

You have to learn how to produce force before you can learn to produce force quickly. While the preceding strength blocks will increase the number of muscle fibers being recruited for a movement, the Power Block is designed to increase the rate at which those fibers are recruited—also called the rate of force development, or RFD. **The Power Block increases your muscles' RFD through moderate loading at moderate volumes.** Each repetition should be executed with control and precision, but with a focus on speed of movement. The Power Block helps to change an athlete's entire performance in his or her sport. In almost every scenario, the athlete that can get to the ball fastest, or get off the line fastest, or jump the highest or farthest will be the most successful. And the Power Block is designed to do exactly that: develop the speed within the strength of established movement patterns to give the athlete on the program a competitive edge.

Speed (SPD)

- **Volume: Low to Moderate**
- **Load: Low**
- **Velocity: High**

The Speed Block is important for activating the fast-twitch muscles fibers so essential to performance across all sports. The volume and loading are both slightly lower than that of the Power Block, and the goal is to move the bar as quickly as possible with control. Why? **The Speed Block is designed to help athletes translate the strength and power built in the weight room into functional speed on game day.** The Speed Block also tapers in its loading, introducing the highest loads in the first week and gradually decreasing throughout the block. The loading taper allows for the speed of movement to progressively increase (in an inverse relationship to load values), resulting in better transfer to practical application. This transfer of strength into speed is crucial for athletic development because it demands the application of all training objectives at once: strength, power, endurance, speed, proprioception, agility, etc. By utilizing speed training in the weight room, athletes will be better able to translate the strength and power developed in the gym into real-world competition.

But remember: The Speed Block is only valuable if and only if all the other blocks were done first. Each block builds on the previous one—and Speed is a great example of how one block fuels the next. Building maximal RFD during a Power block allows for more velocity during ballistic medicine ball throws and proprioceptive movements introduced in the Speed Block, which directly impacts game-day performance. Think of it as the maraschino cherry on top of a banana split: is the cherry the dessert itself, or rather does it complete the dessert?

Muscular Endurance (END)

- **Volume: High**
- **Load: Low**

The Muscular Endurance Block is designed to help the endurance athletes go the distance. As such, only athletes in sports that require high levels of muscular endurance (wrestling, swimming, cross country, marathon, triathlon, cycling, mx, etc.) will see these blocks in their designed training program. When you lift lighter weights for many reps (with very short rest intervals between movements), your muscles will feel the "burn" of lactic acid buildup in the bloodstream during a set. **By training strategically on this block, athletes will increase their muscles' ability to "buffer" this acidic buildup, helping them endure longer bouts of exercise at higher levels of intensity.** Essentially, training for muscular endurance helps athletes compete for longer distances at higher speeds. Endurance athletes will see this block more frequently nearing the start of their competitive season or endurance event, to help create maximum training transfer from the weight room to the mat, pool, field, or course.

Unload

- **Volume: Low to Moderate**
- **Load: Low to Moderate**

Ah, the Unload Block! Usually lasting only one week, the Unload is like the bridge of a song: a welcome, and sometimes necessary, break from the routine. During an Unload Block, athletes can expect to continue moving through proper movement patterns under load, only that load is greatly decreased compared to other blocks. Athletes should leave the weight room feeling like they've still got something in the tank—and while that may not fly during a Max Strength Block, the goals of the Unload week are different. Strategically placed throughout the year-long sport season, "Unload" weeks are akin to active rest in the weight room. Athletes will still retain the strength and power developed in other blocks, but will get a much-needed rest from the demands of high-volume, high-load phases. Unloading gives the body enough time to rest and recover from periods of high stress, which is essential for continuing to improve athletic performance without risking injury or overtraining. **The Unload Block also allows for new adaptations to occur—the rest gives the body a chance to relax from its stressed state during an intense training period, letting post-training adaptations fully take root.**

The Takeaway

This is just a snapshot, a general overview of what the programs look like. The order of blocks, their nomenclature, their length within the calendar year, and how often the cycles of blocks are repeated: these are all variables that can be adjusted to yield the desired result. And my system does just that. The science is here—it is up to you to get the most out of each and every training session.