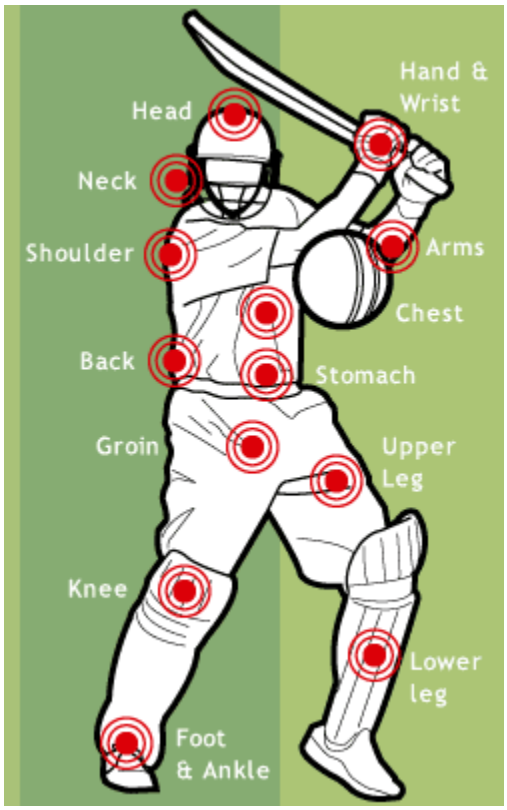
The complete guide to cricket fitness

Collected & Copied from Various Sources for Cricket Lovers by

Abid A. Farooqi (Midwest Gymkhana)



There are not many certainties in club cricket, especially when it comes to making runs and taking wickets. However, one thing you can be sure of is that the fitter you are, the better you will perform on the pitch at the weekend. Cricket fitness, though, can a complicated and difficult subject. You just have to look at the hundreds of personal trainers, fitness books and strange looking equipment available to know it's a confusing world.

I'm here to unpick the facts from snake oil so you don't waste a moment of your precious time on useless training. Plus you get the added benefit of feeling and looking good. So here is the complete course on cricket fitness, including drills:

Part 1: Introduction

- Why get fit for cricket?
- How important is fitness & nutrition to club cricket?
- The fitness requirements of cricket
- Principles of Cricket Fitness: Progressive Overload
- Principles of Cricket Fitness: Specificity
- Principles of Cricket Fitness: Reversibility
- Other Principles of Cricket Fitness
- Match fitness vs gym fitness
- First steps to cricket fitness
- Make fitness training fun
- How to warm up part 1
- How to warm up part 2
- Warm up video

Part 2: Planning

- Goal Setting
- Planning your year

- Rest and recovery
- Off season training
- Pre-season training part 1
- Pre-season training part 2
- In season training

- Customizing your plan
- Planning around your body type
- Planning Q&A

Part 3: Conditioning

- Running technique
- Introduction to interval training

- Off-season conditioning
- Swimming for recovery
- Fielding drills
- Combining nets with conditioning
- Work to rest ratio
- Work capacity

Part 4: Strength, Speed and Power

- Introduction to strength training for cricket
- How strong and powerful to cricketers need to be?
- How fast do cricketers need to be?
- 10 Principles of cricket power
- Core Stability
- 7 Deadly sins of cricket specific core training
- Strength workout for beginners
- Acceleration training
- Circuit Training
- 4 week bodyweight training plan for cricket
- Introduction to speed training
- Introduction to SAQ training
- Drills for running between the wickets
- Drills for skill and fitness

- Plyometrics

Part 6: Position Specific

- Bowlers
- Bowlers part 2
- Bowlers part 3
- Weight Loss for Bowlers
- Wicketkeepers
- Batsmen
- Batsmen part 2
- Batsmen part 3

- Spin Bowlers

Part 7: Injury Prevention

- Injury prevention tips
- Balance training to prevent injury
- Preventing back pain
- Choosing the right boots
- How to stop cramp

Part 8: Other Fitness Tips

- Weight loss
- How to cool down
- Rest times for different training methods
- 5 Reasons to join a gym
- Match fitness vs. gym fitness
- How to choose a gym
- Training for cricket in the gym
- 10 Common training mistakes
- Mike Boyle on cricket fitness
- Training on match days
- Avoiding overtraining
- Fitness for older players

Part 1: Introduction

Fitness training for cricket - good or bad?

Fitness training for cricket is a contentious issue. Should you consider traditional gym work and running to improve your fitness for cricket?

I believe fitness is essential for almost every level of cricketer, but in the interest of balance let's review both sides:

The argument against fitness training

- **Fun** - Fitness training is boring and no fun. Who wants to pound the roads and pound iron in a sweaty gym?
- **Specificity** - Fitness training is highly specific. Runners don't train on a bike because it's not as good as running. The only way to properly get fit for cricket is to play as much cricket as possible.
- **Time** - Cricket is a long game and if you are talented enough you can be playing or practicing almost every day. When do you get time to squeeze in a gym session?
- **Age** - You can't fight the march of time. There is no point in being fit if you are an older player.
- **Bulking Up** - Too much weight training will bulk you up and ruin your timing and technique with big muscles.

The argument for fitness training

- **Performance** - Fitness improves bowling speed, hitting power, reaction times and running speed. It does this for everyone without fail (no matter how old). What's more, even highly trained elite players suffer no loss of performance through bulking up - they are not training for huge bodybuilder muscles and neither should you (for more on the science of fitness of performance see Further Reading).
- **Injury Prevention** - Stronger bones, muscles, ligaments and tendons reduce the risk of injury.
- **Teamwork** - Training in pairs or in a team is great for building camaraderie between teammates. Making training competitive also makes it more fun.

- **Variation** - Playing cricket is the best way to get fit for cricket. That said, the body likes variation. Different activities cross train your body and keep your mind alert.
- **Health** - General fitness makes you feel and look better in the rest of your life too.

So while fitness should not overtake skills or actually playing cricket there really is only one way - from serious player to the park on a Sunday - an organized, specific training programmed.

How important is fitness & nutrition to club cricket?

> "I think all sports evolve at some point where technique and skill level are almost equal and wins and losses are decided purely from a strength and conditioning angle."

The difference with club level sport is that skill and technique can vary much more widely than you see at international level (where fitness is often the only difference between teams).

That means a team that is less fit but has more talent will mostly outplay the fitter and less skilful side.

But that's not the whole story

Conditioning gives the edge

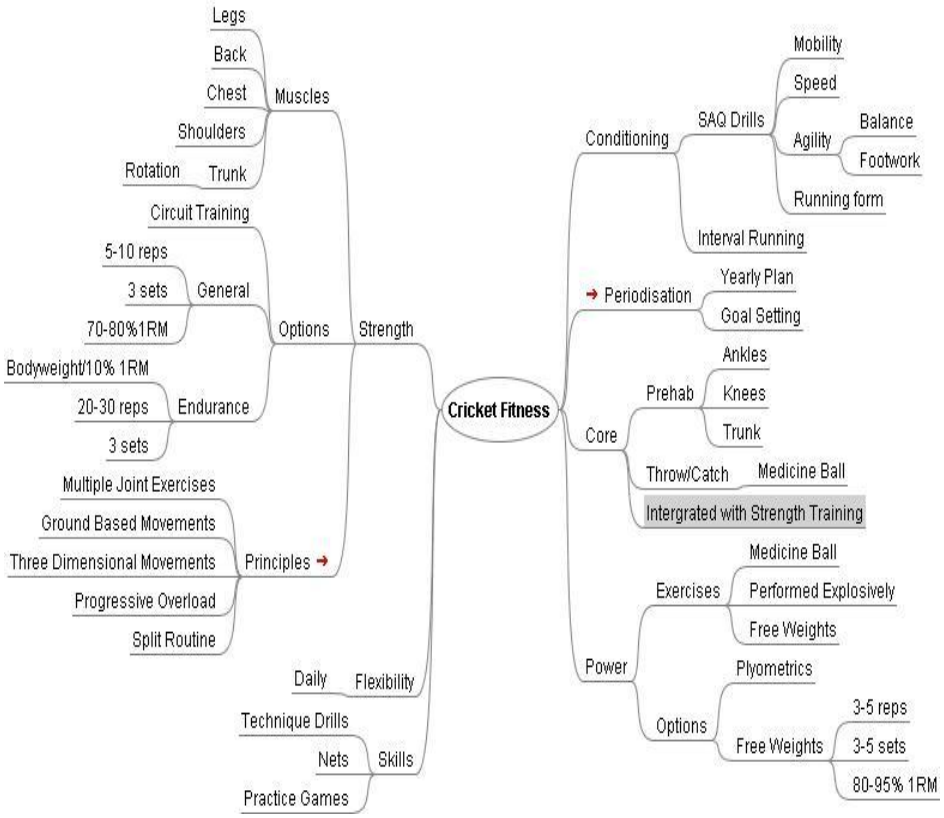
All other things being equal it is your cricket specific conditioning that gives you the edge. For example, in a close game where sides are roughly equal (say, the national stages of the North Gear 2020 Premier League where standards will be high). It would take a very unlucky or mentally unprepared team to lose if they are physically capable of playing hard to the last ball:

- Faster batsmen can steal more runs.
- More powerful players can hit more boundaries.
- Fitter bowlers can maintain pace and accuracy even at the death.
- Less tired fielders have better concentration and reactions.

All the technique in the world is no good if you can't maintain it under fatigue. That's why, even as club cricketers, we should look at our diet and fitness plan on the same level as our technique practice.

Do you need a map to cricket fitness?

Mind maps are a great way to get all your thoughts down in one easy to follow way. As I did one recently for my own cricket fitness plan I thought you might be interested in seeing it too.



What the Ancient Greeks knew about cricket

This is the 2nd in the "Principles of Cricket Fitness" series. To go to Part 1 click here.

Ancient Greece is more famous in sport for the Olympics rather than the smack of leather on willow. These two great endeavors do have an element in common and that's how the Greeks can show cricket the way.

Principle of Cricket Fitness: Progressive Overload

Milo was noted as a great Greek athlete. He became so for his fabled feats of strength, the most famous being his way of keeping fit and strong in between Olympic Games:

> "He would train in the off years by carrying a newborn calf on his back every day until the Olympics took place. By the time the events were to take place he was carrying a four year old cow on his back."

You couldn't find a better example of progressive overload if you tried and in later years this was proved by sport science to be more than just a fable.

So the principle of progressive overload is this:

In order to get fitter and stronger you must regularly increase the demand on your body over time.

In Milo's case, he lifted more weight as the cow got heavier. You don't have to find a cow though.

What you do have to do is find activity that is challenging to your body to allow yourself to get fitter. Going to the gym, sprint training, interval running or training at home is all great examples of this.

But you can't just do the same exercise for the same time/distance/weight and expect to get fitter.

That's where the progressive part comes in.

To keep yourself improving in the middle you need to keep gradually increasing the load. You may set yourself a target of running further, or the same distance faster, lifting a bit more weight or doing a few more press ups than last week.

That's why you need to plan ahead and plan to improve:

- Amount of weight
- Number of repetitions
- Number of sets

- Distance
- Amount of training sessions
- Time

The key here is to be gradual though; progress too fast and you end up overtraining. It's also vital to get plenty of rest to allow the overload part to go ahead while you are recovering.

The Ancient Greeks new this principle worked for their athletes, if you know it too you are on your way to becoming a better cricketer.

Get fit for cricket by playing cricket (almost)

It's been said before and will be said again: The best way to get fit for cricket is by playing cricket.

That, in a nutshell, is the principle of "specificity": Your body adapts to demand put on it in a highly specific way.

It's why runners can't run faster by training on a bike and why cricketers will not get any better at cricket by jogging for miles. It just doesn't happen on the pitch in the same way.

So when given the option, the best form of fitness will always be the closest you can get to actually playing cricket. According to training expert Mike Boyle, most power based team sports (cricket included) have certain actions that are almost identical: sprinting, jumping, changing direction quickly and striking are far more similar than different.

That means there are certain exercises that are not cricket-specific but still highly important for cricketers. After all, if you can run fast you can run fast playing cricket, hockey, football or chasing the bus. This might seem contradictory: Sprint training, core stability, mobility work or lifting weights may not seem to have any use to cricket because the law of specificity. In fact, they are sport specific rather than cricket specific. For example, if you train to run fast, you will be able to steal more quick singles.

So while playing as much as possible is your number one priority. If you want to be the best you can be on the field, find time to improve your sport specificity too.

Cricket fitness isn’t like riding a bike

One of the most frustrating things about fitness training is as soon as you stop your improvements starting to fade. Unlike getting back on a bike, your muscles and lungs do forget.

That's the third training principle: All fitness improvements reverse when training stops.

Luckily the speed at which this happens is quite slow. You can take a couple of days off without worry and even a whole week now and again. Anything beyond this will see a steady decline in your cricket strength, endurance, speed and power.

The obvious answer is to keep training regularly. As little as once a week can lead to improvements if you train in the right way, although more is better (as long as you get sufficient rest).

Balancing Out Cricket Fitness Improvements

The reversibility principle does lead to another headache. A fit cricketer needs to develop a lot of areas to be at the peak of their performance: strength, power, speed, work capacity, agility, balance and technical skills are all part of the equation.

It's impossible to train all these at the same time and make progress on them all.

That means you need to take a 'concentrated' approach to your training: Focus on improving 2-3 key areas at any one time while only maintaining the others (with fewer sessions.

Rotate the areas you focus on regularly to get the best results, but never leave any aspect out.

Unless you want your body to forget that is.

The golden rules of cricket fitness

The world of fitness is ever changing as new research, techniques and fads come to light. Some ideas work brilliantly for cricket and some are a waste of time.

That's why it's important to focus on the constants that have been proven over the years with real cricketers.

We have already talked about the big three principles: Progressive overload, specificity and reversibility. Never train without considering those aspects.

There are other principles too. Perhaps not as set in stone as the big three, but are golden factors to consider for anyone serious about improving their cricket.

- **Recovery**. Rest is vital for good training. Fitness improvements occur between training sessions, not during them. Amount and type of rest have always been an area of debate but everyone agrees on the importance of getting enough.
- **Periodisation**. The idea that your training needs to be split into 'cycles' depending on your goals and the time of year is long established and proven to work. Coaches use different techniques, with some dismissing the approach altogether. A simple way to approach periodsation can be found on my post on planning your training.
- **Fast Twitch Training**. Recent research has begun to back the theory that slow training (like long runs) makes slow athletes. This is because power sports such as cricket require short burst activities that use the fast part of your muscles (fast twitch fibers). If you train the slow twitch part you get better at doing stuff slowly. So train in the way you play: with fast, powerful movements.
- **Kinetic Chain Theory**. This theory makes sense but has been hard to prove. The idea is that your brain controls your body through whole movements and not individual muscles (true). The theory is that in order to train effectively you should forget trying to make individual muscles better/stronger and instead train movements. That way you will be more powerful and faster in the right way.
- **Individual Difference**. Everyone responds to the same training in the same way but at different levels depending on your age, fitness, medical history and genetics. While this is true, there is no need to worry too much about it as long as you are following the progressive overload principle. It's just some people will need less time to get to the same place than others.

Combine these golden rules with the rest of the principles of cricket fitness and you have a rock solid base of knowledge. You can use these ideas to train yourself better and make yourself a golden cricketer.

How is match fitness different from gym fitness?

"Batsmen need to bat under match conditions and bowlers need to bowl under them, something that seems forgotten in the gym-bunny culture. Instead, fitness as measured by pulse-rates and bleep tests, is being confused with being match-fit - being ready to compete with an opponent rather than a dumbbell."

Former England bowler Derek Pringle snarled at England's lack of match preparation in the Telegraph newspaper.
He is right to look for reasons as England failed with both bat and ball. The question I have is this: what's difference between competing with an opponent and competing with a dumbbell? More importantly, how can we as cricketers use this information to our benefit?

Gym culture: The case for the prosecution

One of the fundamental principles of training is called Specific Adaptation to Imposed Demand (SAID). That means if you want to get fit for cricket you need to play cricket. The only thing you get better at doing press ups is doing press ups.
Playing under pressure also teaches you to play under pressure. We have all seen those batsmen who look incredible in the nets only to go into their shell in the middle. The difference is purely psychological and the only way to deal with this is to play in matches.

Gym work also gives players the wrong focus. Rather than training to improve their cricket performance the focus becomes on training to become better at the tests. Lifting more weight or getting a better beep test score becomes an end in itself rather than a means to an end.
That's not to say players should do no training in the gym. It's just that when fitness work becomes the focus rather than playing cricket it leads to poor form on the pitch.

Gym culture: The case for the defense

I'm sure even Derek Pringle would not argue against strength training totally. We know the benefits of regular exercise for health and performance: Fewer injuries, more power, more speed, better concentration, better recovery times and better body composition.
It's all too easy to make this an either/or situation: That cricketers should either play or matches or visit the gym. The fact is that both are important if you are serious about success.

Playing lots of cricket is important to success. The more you bat or bowl under serious competitive elements the better you get at it. But cricket also causes imbalances in our muscles that without fitness training can lead to increased chance of injury. The right fitness work can correct those errors before they become injuries, particularly with bowlers.

Additionally, training itself is a mental challenge. It's tough to keep going to the gym for an extended period and keep improving. You are in competition against yourself and that is just as important when you get on the field. Also, fitness training is something you can control and measure accurately. You can't measure how ready you are to compete as accurately.
Of course, you need to do the right sort of fitness work. With all training that is not specific there will be a certain amount that doesn't cross over to the pitch.

However, some things are universal to almost any sport: sprinting, jumping, changing direction quickly and striking are far more similar than different. After all, if you can run fast you can run fast playing cricket, hockey, football or chasing the bus.
In short, the difference between the gym and matches is the former gets you fit to play, the latter makes you play to get fit.

Fitness for Cricket - First Steps

The fitter you are the better you play (and the more healthy you are), but where do you start in the quest to getting fit for cricket?

Initially the best way is to concentrate on building a baseline of fitness in the gym (In fact, if you aim to play at a serious level this is essential). For example, you could use the basic fitness programmed given to you when you join any gym and see quick improvements (especially if you are just starting out). However, you may want to make your basic gym work specific to building

fitness for cricket. The aim here is to build a foundation of fitness (which can be built on if you desire). It is suitable for anyone wanting to start a programmed of fitness to improve their game or for people returning to training after an injury or long rest period.

Underlying Principles for Cricket Fitness

Before we get to the routine, let's examine the principles it is built on:

- **Overload to Progress**. In order to improve performance, your body needs to be overloaded slightly more than it is used too. That's why lifting heavy weight makes you stronger and running makes you fitter. What this also means is that you constantly need to be reviewing your workout to ensure you are overloading your muscles. They quickly adapt to the stresses of a workout. You also need to rest your body to give it time to adapt.
- **Reverse**. Just as your muscles adapt to increased load, the adaptation will reverse as soon as you stop working out.
- **Specific**. Training is very specific. For example, strength training does not improve endurance. So even at this early stage where the focus is on general fitness we need to consider cricket specific aims. For this reason, all training should be done at a consistent pace with as little rest as possible and exercises must focus on the muscles that you use while playing.
- **Free weights**. Ideally you should use free weights rather than machines for these workouts. However if you are a beginner, using machines is safer and often easier. If you can learn the free weight techniques from your gym then take the chance as free weights give a better overall workout.
- **Periodisation**. While this is a good programmed for any time of the year, if you are planning to build up from this base further the best time to do this is during the off season. In the UK the months from October to December are best, but you can start as early as September.
- **Safety**. This is recommended routine only and you undertake it entirely at your own risk. You are responsibility for your own health and safety. If you are not experienced in the gym a qualified instructor should supervise you. *You must consult a doctor before starting any training programmed*. I am not a doctor and cannot advise you on this.

Quick cricket tip: Make fitness training fun

Top coach Duncan Fletcher is a big advocate of making fitness training both cricket specific and fun.

How does he do it?

Combine fielding drills with fitness training.

For example: 'Ten Catches' where the coach hits high and difficult catches until ten are caught. It's designed to leave you gasping but you will be fitter after a few sessions and it's much more engaging that going on a jog.

So next time you don't feel like doing your fitness training, grab some cricket balls, cones, stumps and a couple of mates and head to the ground (or sports hall) instead.

The complete guide to cricket warm ups

Why do you have to ensure you have a proper warm up before cricket matches and training?

- Warming up increases your flexibility.
- Warming up increases your power.
- Warming up improves you coordination.
- Warming up reduces the risk of injury.

A warm-up is one of the easiest and fastest ways to make a difference to your cricket.

A Complete Warm-Up for Cricket

The warm-up can be split into two parts: General and cricket-specific. If you are warming up for general training (such as weight training or speed training) you can skip the cricket specific part. Otherwise do both.

General

- *5-10 mins of gentle activity* such as jogging or walking (or until you feel warm). This will increase your heart rate and body temperature.

- *5-10 mins of dynamic stretching and core work.* See this video for a dynamic stretching warm up that is perfect for cricket.

Cricket Specific

- *10-20 mins of skill exercises* such as nets, running between the wickets or fielding drills. See my posts on cricket drills and running a net. It's important to maintain a good tempo through this time so as not to let your body cool back down again. Make sure you are always doing something. You can work as a team or in small groups but on a match day finish with a drill the whole team can participate in to build team spirit.
- *Up to 5 mins of a team meeting* lead by the captain. The aim of this is to focus the mind on the task ahead and outline particular tactics.

How to warm up for cricket

Warm ups are not only a great way to prepare your body for play and reduce the chance of injury. They can also be used to improve your game. Mobility, posture and flexibility are key components in cricket fitness. Often they ignored by cricketers, especially at club level. The warm up can bridge this gap.

I have talked about warming up before, but I want to extend that further, turning the warm up from a necessary evil (as some see it) to a vital element in moving your muscles and nervous system from normal life to peak cricket performance.

Think of your warm up as a ramp to the top of your game. Without it you are struggling to get to the top.

The Complete Cricket Warm Up

Basics

Before you begin make sure you have an area of around 22 yards or so to warm up in. Other kit that is useful if you can get it is a medicine ball, a cricket bat, a few of balls and a reaction ball. Make the warm up as long as possible that time allows. Ensure a 5 minute warm up at the very least. A 15 minute or longer warm up is much more beneficial. You can mix and match any of

the parts of the warm up depending on time but remember the idea is to activate your entire cricket playing muscles with slowly increasing intensity. So always start slow and build up.

Part 1. Gentle activity

Begin by walking up and down your marked area:

- Walk forwards
- Walk backwards
- Walk sideways
- Walking lunge
- Hurdle walk
- Russian walk
- Tiptoe walk

Part 2. Core Stability and balance

Perform the following body weight movements:

- Squat
- Single Leg Squat
- Side Lunge (with floor touch)
- Back Lunge and twist
- Star Jumps

Holding a medicine ball or cricket bat do the following:

- Behind head twist
- Woodchopper
- Draw a figure of eight
- Standing chest press
- Twist pass or pull shot

Place a ball down and jog up to it, pick it up in the normal fielding technique then roll it to the other end in one smooth, balanced movement. Repeat with your other hand. The repeat by picking up the ball on the inside of your foot both left and right handed.

Part 3. Mobility and flexibility

Jogging up and down now, complete the following:

- Arm Rolls
- Hugs
- Ankle flicks
- Small skips
- Inside thigh kicks
- Knee lifts
- Knee across
- Lateral slides
- Carioca
- Bum kicks
- Sideways heel flicks

Then find someone or something to lean on to complete these mobility exercises:

- Leg out
- Leg Forward
- Knee across

Part 4. Sprints

When you are feeling warm complete 5 sprints over the 22 yard area, jog back for recovery:

- Sprint 1: Standing Start
- Sprint 2: Sideways Start
- Sprint 3: Backwards Start
- Sprint 4: Lying Start
- Sprint 5: Walking Start

You can involve a ball to make this a fielding drill with a pickup and return throw.

Part 5. Cricket Skills

By this point you should be warm enough to perform some cricket fielding, throwing and catching drills at a good intensity. Specialists can also work on their own skills.

Batsmen can have a net or do batting drills (although no drills on match day). Bowlers can mark out their run and try hitting a target without a batsman as a distraction. Wicketkeepers can either work with the bowlers or find someone to throw them balls.

How to warm up for cricket: The video

http://www.pitchvision.com/cricket-warm-up-video

This 2 minute video has been created to help with your cricket warm ups. You can see more on warming up for cricket here and here.

It's worth noting there are many warmer up exercises you could do before going out onto the pitch. This is just a selection that hopefully gives you the idea that you move from walking movements up to full sprints by the end. The idea is to increase your heart rate, get your nervous system ready for the first ball and improve the range of motion of your joints (especially hips and shoulders). After a 10-15 minute warm up like this you should be ready to practice some real cricket skills like throwing, catching, batting and bowling.

Turn your cricket dreams into reality

Do you have a cricket dream? Perhaps it is to play internationally or maybe it’s just to get more runs than last year in you club side. One of the most effective ways of improving your motivation and focusing the mind on any task is by goal setting.

Cricket is no different. Goal setting is a powerful tool to becoming a better player.

It helped Richard Had lee achieve the incredible double feat of 1179 runs and 117 wickets in county cricket in 1984.

While you may or may not have the talent of Hadlee, you can still use his techniques to improve your cricket skills, fitness and mental approach.

Part 2: Planning

How to make goal setting work for you

Goal setting is a simple process but needs to be individual. You can't rely on other peoples goals so you must set your own. Ideally this is done between a cricketer and coach. There is a method making your goal setting work properly. To do this, all goals must meet certain criteria. Without these, your performance will not improve.

- **Specific** - All goals must have a specific target to aim at. A long term specific goal may be to get into the first team or score 800 runs in a season. A shorter term specific goal may be to get a certain number of runs in a game.
- **Challenging** - A goal cannot be too easy or difficult or you will soon lose interest. A good goal is something that can be achieved, but is difficult enough to motivate. It is a good idea to get someone else to help you set challenging goals as you can often under- or overestimate your own cricket ability.
- **Measurable** - To monitor your progress a target must measured regularly. You could set your target at a certain average, and you keep track throughout the season, constantly working out what figures you need to keep that average within target. Measurable goals can also be subjective. For example, improvement of bowling action by coaches analysis.
- **Self Controlled** - Keep goals individual to you. Your goals should be achieved by you and not depend on anyone else for success. If you have to depend on others you may lose motivation if you think they are not pulling their weight.
- **Time Related** - Make sure your goal has an end point, or at least a review point where performance can be evaluated and the goal can be re-set if needed. Without this you may lose focus and energy.

- **Flexible -** No target should be set in stone. You may progress faster than you planned, or an injury may set you back. You should be prepared to alter your goals to keep them specific, challenging and realistic to you.

6 Steps to setting your cricket goals

Once you know the basic rules of setting goals you can go about setting your own. Here is how:

1. **Assessment -** Begin by building a profile of you as a player. Identify the areas you are strong at and the areas you would like to improve. This should include not only your technical skills (like off break or cover drive) but also physical fitness and mental approach.
2. **Set a long term goal -** Next you should work out an individual goal to work towards in the long term (like getting into the first team). This may be over a season or several seasons.
3. **Assess again -** Once you have set your long term goal you should refer back to your assessment. Use it to create a second profile about someone who has achieved your goal. This is where you are aiming to get.
4. **Set your subgoals -** Compare your profiles and identify the differences. You can easily see which areas need the most work and set a series of smaller goals under you long term goal. Note them all down.
5. **Set your training -** You can now base your training plan around these goals.
6. **Monitor -** You should constantly monitor the progress of all these goals. Write down your goal and subgoals and review them as often as you can, noting your progress in each area. This way you can scale down training in areas you are progressing fast or step up training in areas that are not working as well as planned.

A full year cricket fitness plan: Your free cut out and keep guide

Planning your cricket fitness training is a difficult balance.

On one hand you know the benefits of strength, speed and endurance on your game. On the other hand you don't want to waste time training elements that have little crossover to the cricket pitch.

That's where the Pitch Vision Academy Fitness Plan comes in.

The spreadsheet outlines what kind of training is best for what time of year allowing you to focus on the important stuff at the right time. In sport science this is known as periodisation. However the terms are not crucial, the training is.

How the Free Pitch Vision Academy Fitness Plan works

Your year is split into several 3-6 week periods called cycles. The name of the cycle is your focus for those weeks. For example, on a strength cycle your main aim is to improve your strength while maintaining other fitness elements.

Breaking it down further I have adapted the ideas of Vern Gambetta in that each cycle has 1-3 major training methods and 1-3 minor methods. You base your workouts around these methods depending how much time you have to train.

As everyone has different needs, time to train and equipment to use I have not included individual workouts. You will be able to get those shortly in our member section: Pitch Vision Academy.

What I have included is a rough guide to each training method so you can get started planning individual workouts yourself. You can also hand the spreadsheet to a qualified fitness professional or trainer to help you plan the workouts. Or use an off-the-shelf workout like Strong lifts 5x5 or Turbulence Training (both can be used at certain times of the year).

Here are some general principles to help with building your workouts:

- The principles of cricket fitness
- The principles of cricket power
- The principles of interval and speed training
- The principles of ply metrics training
- The principles of strength training

Limitations of the Pitch Vision Academy Fitness Plan

The main limitation of the plan is by design: It is a general guideline to what training to do when, not a series of workouts.

That aside, the other main limitation is that I only have done plans for the UK (Northern Hemisphere), India and Australia (Southern Hemisphere). This is where I need your help.

If you live in a country that is not covered by this plan, please email me and let me know when your competitive season is. I can then extend the plan to include the whole world.

I am especially interested to hear from you if you are in West Indies, Bangladesh and Pakistan but if your country is not covered just get in touch.

How resting can improve your cricket

It might seem odd, but one of the most important factors in your cricket performance is the amount of rest you get.

If you get too much rest your body responds by putting on weight, losing strength and making your skills rusty. Meanwhile too little rest leads to overtraining and an equal drop. It's a delicate balance to get right but one that is vital if you want to improve your game.

The rules of resting

Resting comes in a couple of different forms. Let me break them down a little for you:

- **Between games: 12 hours**. You would have to be pretty fit (or good at hiding in the field) to play more than 2 days in a row. It is quite possible to play more days, as there are rests periods build into games when you are not batting or grazing at fine leg. If you play at weekends make Monday a day of active rest (see below).
- **Between skills sessions: 4 hours**. You can train cricket skills almost every day if you like because recovery time is quick. Nevertheless it is vital to warm up and cool down at every session. You can even do fitness and skills sessions on the same day if you have the time, fitness levels and inclination. In the ideal world you will have no more than 4-6 skills session’s in-season or preseason (per week) but time may not allow more than 1 or 2.

- **Between fitness workouts: 24 hours**. Fitness sessions (or high intensity skill work) have longer recovery times so the general rule is to rest at least 24 hours between workouts. The exception is between running sessions and strength sessions. As there is little crossover you can easily alternate running days with strength days. You can also do a split routine allowing you to strength train up to 4 times a week if you desire (but no more than twice a week in season).
- **Between heavy sessions: 48 hours**. Heavy sessions are the hard stuff like heavy weights, ply metrics and intense interval sprint training. These are very effective at making you stronger and faster but they also take a lot of recovery time. Don't rush back to doing anything more than active rest after these sessions. Never, ever play a game the day after heavy training: It's the perfect recipe for injury.

What does active rest mean?

So we know having rest days are vital to recovery and injury prevention and we also know how often to take them. But a rest day doesn't mean a do anything day. It's important to remain active on recovery days, just at low intensities. Active rest options include going for a walk or on a bike ride, having a swim, playing with family, housework or a spot of yoga. Anything to get you moving. More on cricket fitness soon, so subscribe for free updates.

Barbells in the winter: The simple guide to off season training for cricket

What does a cricketer do when the season draws to a close?

If he or she is serious about improving, they probably hit the gym. Let's face it, there is not much else to do when the cricket finishes.

There is no practice for a while and you may not play a winter sport. The time is perfect for a few months of focusing on getting stronger, fitter and faster. The benefits are well documented.

The off season is a good time to do this because you can go back to the basics.

Keep it Simple

Fitness can be a complex area sometimes and there is something attractive about stripping things right back to basics for a while. It's a principle that has served coaches in the US system since the 1970's and one that still is still popular today:

> "Select your fundamental exercises, get good at performing them and, get strong by adding five pounds [or 2.5kg] per week. So beautiful and so simple. Our new athletes (those that have never trained with us before) will use the most basic program we have ever implemented. The emphasis will be on developing a solid technical base from which to expand." Michael Boyle.

As is more often the case than not, Boyle is right.

When it comes to strength and power training, there is nothing simpler than a barbell, some weights and the principle of progressive overload.

Using a simple system like this when you are out of season enables you to:

- Improve strength
- Improve body composition (less fat, leaner muscle)
- Build a base of fitness on which to build more specific skills

The biggest benefit is that **you can do it very quickly**. This is important as when you restart your cricket training you want to have reached your aims for strength, body composition and health before you begin specializing again.

The secret is to focus on a handful of exercises that are most effective. Not all exercises are made the same. The core of a simple program is based on no more than 4 'big' exercises with a bit of support.

Combine this with a solid diet and you have a great plan.

You will notice none of the benefits I mention include making you 'bulky'. We don't want that as cricketers so we build in ways to stop this happening. More on this later.

What does a simple off season plan look like?

There are many ways to improve your cricket fitness. This is a simple method but you will need certain it's of equipment as a minimum requirement. If you can't get these, you will have to try something else for you're off season training.

- An Olympic barbell
- Plates
- A squat rack or power rack
- A bench
- A trap bar
- An adjustable dumbbell
- A chin up bar
- A dip bar

These are serious bits of kit. You could buy the lot yourself and set it up in your garage/shed. You could also join a proper gym. Once you have access to these you can move onto the plan itself.

There are quite a few plans around based on the original Bill Starr simple system in his 1976 book. The most comprehensive for beginners (those who can't squat 1.5x their body weight) is the Strong Lifts 5x5.

I have recommended it before and have no problem doing so again. Mehdi's system is simple and effective for cricketers.

It's based on the squat: An exercise that works to get you strong very quickly. You could not squat three times a week in season (or even in pre season training) as it would end up fatiguing you for cricket. That's not a problem when no cricket is being played.

You might find the sore legs a problem initially, but it's perfectly natural while your body adapts!

It's also based on 5 reps per set for the big exercises. This builds strength more quickly than it builds size. By the time you finish the programmed and start back at cricket training you will have developed impressive strength but will have not had the time to get bulky.

All that and the eBook for the programmed is 100% free.

Adapting 5x5

Strong Lifts 5x5 is such a good program I am happy to recommend it without changes. That said if you are looking to be safer with some exercises I would make a couple of small changes:

- Substitute the squat with the front squat
- Substitute the deadlight with the trap bar deadlight
- Substitute the barbell rows with one arm rows or inverted rows

While the original exercises are excellent and safe when done correctly, the replacements are less difficult to get wrong and therefore easier for beginners where technique is all important to prevent injury.

If you have access to someone who can coach you correctly, you should not fear the original exercises because they are safe when done with good form.

Limitations of barbell training for cricket

No one system of fitness is perfect for everyone because we are all different. Where are the limits to 5x5 barbell training?

- **Strength focus**. Strength built on dysfunction can cause injury. You need to be able to perform basic movements like full squats and lunges well before getting under the bar. As Gray Cook said recently, there was a time with old time strongmen where no one would learn any exercise until they had the stability and mobility to perform a Turkish get-up with 100lb.
- **High technical demand**. It's not easy to squat, deadlight and bench press. They take practice and if done wrong can cause injury. The older you are the harder it gets to learn these lifts. That certainly does not mean you should ignore barbell training. However, approach with caution if you have no qualified coach to teach you.
- **No account for imbalances.** We are not perfectly balanced from left to right sides but barbell training can't take this into account because we are locked in to using both arms and both legs. As you know, this may lead to injury so always train out imbalances before starting barbell training.
- **Nothing lasts forever**. Like any plan, there will be a time where you stop progressing and it will be time to change. Even if this does not happen, you don't want to focus on barbell strength alone

for too long. It has many benefits but there are more cricket specific ways to train as you get closer to the start of the season.

All that aside, I love the simplicity of barbell strength training in the off season. It gives cricketers a chance to really push forward and improve strength, power and speed when there is no cricket to play. As with any plan, it must be entered into with caution and ideally with a proper screen but for me, in winter, the benefits far outweigh the costs.

How to work out your cricket pre-season training

The key to this phase is building your plan around the physical needs of cricket. Although cricket seems to be a fairly relaxed game it does require the body to have:

- Motor skills (or technique)
- Speed
- Power
- Endurance
- Strength

Keeping technique separate, cricketers generally need to have speed (running between the wickets, bowlers run ups) or have fast access to powerful movements (bowling, throwing, and hitting a ball). Endurance is also needed to be able to do this while tired (batting after a long fielding session for example).

Phase 1. Build a base

At the beginning of your preseason training you will have just come back from a training break or you may be planning your preseason training for the first time. Either way, you will need to build up a base of fitness before doing anything else. Here the focus is on general improvements rather than being cricket specific. You can read my base building programmed for cricket fitness here. This period should last around 8-12 weeks depending on how fit you are.

Phase 2. Specific training

Once we have a broad fitness base we can start to become more specific and begin to bring skills training back in as the winter progresses. While each programmed is personalized, all players can rotate their specific training around broad goals:

1. Work Capacity
2. Strength
3. Speed and Power

While there is some crossover, the reason for doing the goals in this order is so you reach your peak in the fitness and skills at the start of the season.

How hard to work?

You now have a basic outline of your year, with a detailed weekly breakdown of your preseason preparation. But how hard should you work to get results? Again, this is very specific to each cricketer. Some people have more time and some people get results more quickly. The basic principles always apply though:

- **Work as hard as possible** - This does not mean you should run a marathon every week or lift the heaviest weight you can. Instead push yourself within the programmed. For example, if you are in the gym and you have to do 10 reps then do this with the heaviest weight you can manage for 10 reps (with good technique).
- If you are losing technique when you train (either with cricket skills or fitness), you are training yourself to make mistakes or get an injury. As a general rule you should always train to the maximum without losing technique.
- An exception to this is when you have a sound technique. Once you know your technique is good you can train beyond good technique in order to improve your conditioning in that area. This is for advanced trainers only and must have a spotter as the risk of injury is greatly increased once technique is lost.
- **Overload** - Aim to improve on something each session: lift more weight, run faster, do more reps or throw more accurately. Generally speaking you should be looking to increase the volume (e.g. number of sets/reps) and intensity (e.g. size of the weight lifted) of your workouts the closer you get to the season (see below for the exception).
- **Rest** - Make sure you have adequate time to rest in your programmed: Take at least 1 day a week off from all exercise and build in the correct rest time between sets in the gym/nets.

- **Recover -** Your body improves faster if you take a recovery week around once a month. This is done by simply following the same programmed as before but decreasing the volume and intensity to make it easier. Also, in the few weeks before the season begins you should cut the volume and intensity back gradually to taper off towards maintaining rather than improving.

Bringing your cricket fitness plans together

Cricket is a game that needs you to be fast and strong. If you have been following my pre-season training programmed you will have been building up to this workout.

This 'speed-strength' workout is the most crickets specific, and is best to do just before the season begin, with perhaps some carry over into the new season depending how you feel. As always, never begin any exercise programmed without knowing and understanding your health history. If you are in any doubt that you can safely perform exercise, contact your doctor before starting.

Weekly Workout Schedule

Monday: Cricket Skills and Interval Running

Tuesday: Off

Wednesday: SAQ

Thursday: Strength Circuits

Friday: Off

Saturday: Cricket Skills and Interval Running

Sunday: Off

- Always warm up, stretch and cool down.
- You can add an extra interval running session if your fitness allows.
- You may have more skills sessions in your week. If so, simply ensure you do one of the other workouts on the same day.

Strength Circuits

Although the circuit I have posted is aimed at fast bowlers, it can be used by any player with little or no adaptation.

- Complete the entire circuit twice, each exercise at a time.
- Work for 30s at each exercise station then rest for 30s
- Complete all the exercises at a good pace, focusing on maintaining posture
- Also consider a cricket skills circuit

A week in the summer of a busy and successful club cricketer

Ty wrote to me recently asking:

"In the winter I worked hard on improving my strength and fitness. Now it's the season, I have games on Saturdays and Sundays as well as skills training on Tuesdays and Thursdays. I'm not

quite sure how often to go to the gym. Adding school and work to the equation, there's less time. But how often do you think I should be working on my fitness in the season?"

It's a common question. I'm sure time is an issue for most players at club level. It certainly is for me. Here is how I would like to see a player with little time structure their week during the summer.

Principles of summer fitness training for club cricket

Before we look at a typical week, let's look at the essential elements that go into club cricket training.

- Put cricket first. Cricket is the reason you improved your fitness in the off season so focus on cricket training and playing above fitness training. As we will see below, this means still working hard on your fitness, but putting it into the bigger picture to avoid being too fatigued to play at your best.
- If you can't improve, maintain. Traditionally science has viewed the in-season period as 'maintenance': A time to maintain fitness levels while not tiring you out for games. This is a solid strategy but has limitations. You can improve your fitness with some clever planning and enough time. However, if you can't make the time you can and should still maintain current levels.
- Always do something. While 3-4 fitness sessions per week is the ideal, even one 15 minute training session a week is enough to maintain fitness levels. Time is not a reason to avoid training.
- Plan ahead. By putting your season into 4-6 weeks blocks with a focus on a particular element of fitness you can improve it. For example, if you want to improve strength spend 4 weeks going to the gym 3-4 times and lifting high weights for low reps. if you want to improve your endurance do some interval training and gym complexes for 6 weeks. Don't try to improve both though, you will be unlikely to have the time and neither will improve if you compromise.
- Get enough rest. Recovery time is important in season. If you train on Friday night you may be sore for Saturday's game. Keep the intense training for earlier in the week and have at least 1 day off from all cricket and fitness work.

How to structure your week for the best cricket performance

Saturday

Saturday is usually game day. A swim or gentle few minutes on an exercise bike might wake your system up in the morning. Otherwise focus on the match. Get the right fuel ready, make sure you have a cougar like warm up and cool down after you have batted or been in the field with some gentle activity and static stretching.

Sunday

If you have no game you can take Sunday as a rest day. You can also get in a heavy weight lifting session or interval training session if you have no game. This will give you maximum recovery time as both sessions tend cause high levels of fatigue. If you are playing, avoid any intense work and repeat your Saturday routine. As Sundays tend to be less important matches you also have to option of doing a light resistance workout in the morning. Generally this will be a few bodyweight exercises or complexes in the gym. Keep it to around 15-20 minutes and you should not have much of a performance drop during the game.

Monday

Monday is weight lifting day. Most players with most goals would benefit from doing strength training on a Monday. This could be heavy weights for strength (if that is your plan), circuit training, complexes or bodyweight work. Whatever you choose, take 40-60 minutes to work on non-cricket specific fitness (that is to say, not skills drills, even high intensity). If you don't have that sort of time, you can still get a lot done in 15 minutes. If you are strength training on Sunday and Monday, make sure you are using a split routine of some kind (like a push-pull or upper-lower split) to give your muscles time to recover.

Tuesday-Friday

The rest of the week depends on how much time you have, your fitness goals and when you training usually happen. Aim for at least 1 fitness session per week. Research has shown that this is enough to maintain basic strength or endurance. 3-4 sessions work best if you are looking to improve an aspect of your fitness. You can do skills training and fitness training on the same day. If time is an issue, push to do more fitness work in your club training sessions. You can do bodyweight training, running between the wickets and fitness based fielding drills during a typical training session.

Remember you can get a lot done in 15 minutes at home if you don't have time to go for a run or hit the gym.

I find following a strength workout with an endurance type workout works well as you can train while still recovering. You can also integrate different fitness types into one session. Do remember to have at least one rest day though. It's important to be fully recovered from one workout before starting the next one. Although that doesn't always mean taking a rest day after every session. I usually take rest days on Tuesday and Friday. This is because I do heavy weights on Sunday and Monday (in a push-pull split).

I still then have time for another gym session and a run and am fully recovered for Saturday's league match. I vary this through the season but I always take Friday's off to ensure I'm fired up for the game. You may have to do things differently to fit everything in, but stick to the basic principles outlined here and you can improve even in season.

The perfect cricket fitness workout

There are a million ways to get fit for cricket and improve your game so the perfect workout for you will be totally different from the next person. What do you need to consider when deciding how to get fit for cricket?

- What your individual goals are.
- How fit, strong and mobile you are.
- What time of year it is.
- How much training and playing experience you have.
- Your age, weight and size.
- Your injury and health history.
- What you enjoy doing.
- Your motivation levels.

Where do you start with such complicated variables? A lot of the information you either know yourself or can get from going through the harrow drive cricket fitness archives. I would also recommend getting the advice of a cricket fitness expert. You might struggle to find one in a commercial gym, but you can always contact me directly.

Finally, don't let a worry about getting the perfect workout stop you from training altogether. It's far better to be training regularly in an imperfect way that you enjoy and can stay motivated with than doing nothing at all.

If you know your body type, you can improve your cricket

It sounds like one of those crazy fad diets, but body type training is grounded in science and growing in popularity.

Until we have genetic profiling, it's the best we can manage for personalized eating and training for cricket. You see you will react to different foods and training methods in different ways depending on your body type.

The wrong sort of training or eating can scupper your plans to become a fitter, healthier and better player without you even realizing it.

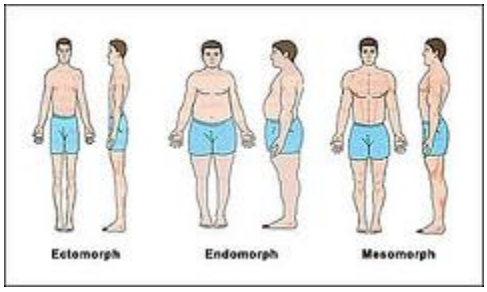
Fortunately, it's quite easy to work out your own body type and adjust your training and eating to match your needs.

How to determine your body type

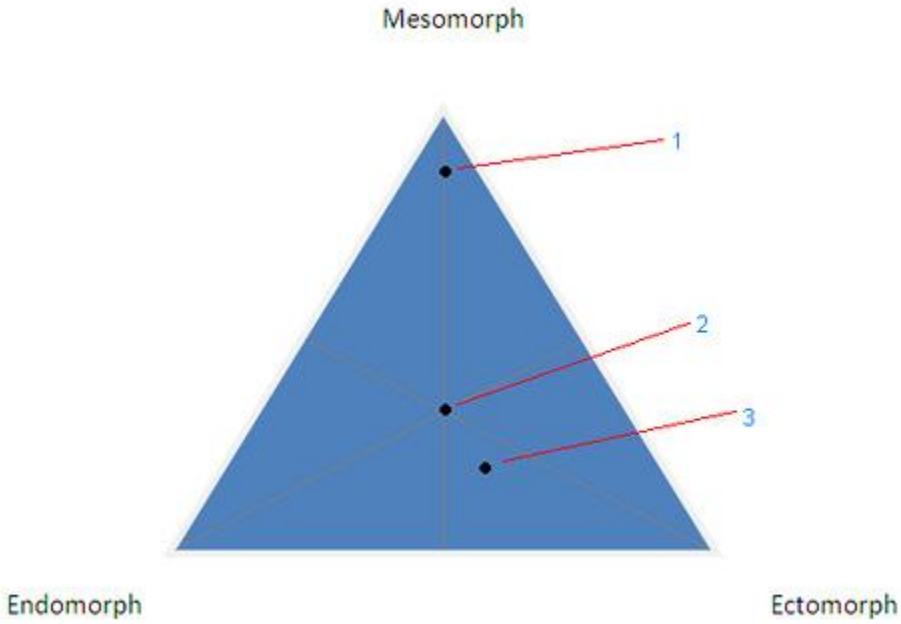
Broadly speaking there are three body types:

- **Endomorph**. Finds it easy to put on fat. Have wide features especially the waist.
- **Mesomorph**. Finds it easy to put on muscle. Wide shoulders and a narrow waist. Generally considered to be athletic.

- **Ectomorph**. Finds it hard to put either fat or muscle. Often called skinny with long, thin limbs. Here are some pictures:



Most people do not fit exactly into on category or another. As you can see from the diagram below, you can be at one extreme or be nearer the centre with a crossover of body type.



The person on the diagram numbered 1 is an almost 'pure' mesomorph. Person number 2 shows equality between all three traits. Person number 3 is mainly an ectomorph but shows some traits of an endomorph.

Think of it as a sliding scale. You will be somewhere on the scale, most likely nearer one type than another.

According to nutrition expert John Berardi, a very simple way to decide which type is closest to you is to ask: **If I didn't train and ate how I liked, how would I look?**

Answer that and you know your genetic body type.

How to eat to your body type

Different body types have different responses to food.

Eating the 'wrong' way will make life difficult for you. For example, if you are an endomorph that eats a lot of pasta, potatoes and rice (high in carbohydrates) you will be carrying more fat than an echo- or mesomorph. This, as you know, is detrimental to performance.

So, after you have got the basics down, you can adjust to your needs:

- **Endomorph**. Mainly get carbohydrates from fruit and vegetable sources. Save all starchy carbohydrates (bread, pasta, potatoes, corn, rice, quinoa, beans, and legumes) for after exercise. Eat plenty of lean protein and fat from whole food sources (nuts, meat, fish and dairy).
- **Mesomorph**. Eat a roughly equal balance of lean protein (30%), carbohydrate (40%) and fat (30%) from whole food sources. Save most of your carbohydrates for breakfast or after exercise.
- **Ectomorph**. Get about half of your food from all carbohydrate sources (especially starchy carbs) eaten at every meal. Split the rest between lean protein and fat. You can eat more calories than the other body types.

Adjusting the way you eat will see you meet your goals more quickly.

For example, most ectomorphs struggle to gain strength, speed and power. To balance this out, eating more carbohydrates will give you more fuel to train. Your hormonal response will most likely prevent you putting on useless fat instead of useful muscle.

It's important to remember that whatever your body type some universal principles apply: Eat plenty of vegetables, stick with lean protein, have whole foods not stuff from a packet and have the odd 'cheat'. You can read about those here.

How to train to your body type

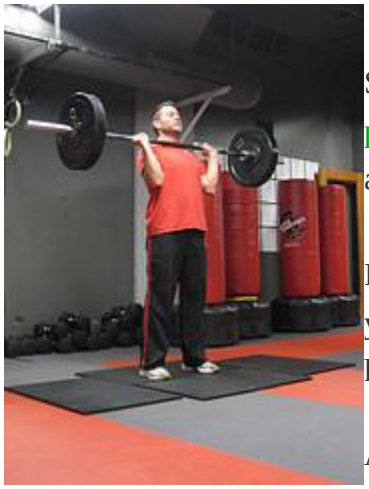
Just as we respond differently to food, we also respond differently to exercise. Training for cricket needs to have maximum effect. We don't want to waste time doing work we don't need or even overtraining.

Follow these principles to avoid issues:

- **Endomorph**. You can train harder than any other body type. That's good because you need to work harder to get results. A combination of strength, skill and endurance training is possible for you and can help you get stronger, have more work capacity and deal with body composition (as you are naturally liable to hold fat as well as muscle).
- **Mesomorph**. You are the middle of the three types when it comes to training. You can't go as hard as an endomorph but can go harder than an ectomorph. That said, you will naturally get faster results than any other body type even if you do not train as hard. You can benefit more from focusing on one goal at a time.
- **Ectomorph**. You are very easy to overtrain. Any intense work like speed training or Olympic lifting must be followed by plenty of rest. You usually have naturally good endurance but are less good at explosive stuff. Focus your training on improving the latter while mixing in lots of recovery days.

Remember these are general guidelines. You know your body better than I can so always be careful when taking general advice. It's important to get the basics right first. However, if you are looking to go to the next level then body type is a simple but effective strategy to get the best from yourself.

Q&A: The Pitch Vision Academy cricket fitness plan



Since I posted version 2 of the Pitch Vision Academy cricket fitness plan, a few questions have come up, mostly via email. I want to answer those questions today.

If you are using the plan and need to understand a little more about it you can leave your question here. I'll answer anything you need to know.

Anyway, on with the questions:

Q: What type of exercises can I use for bodyweight training?

A: There are a wide variety of exercises using your body only. The trick with these is to pick exercises that can work the whole body when they are put together. You can split it into movements like this:

- Power: polymeric press ups, jump squats, scissors jumps.
- Pushing: press ups (several variations), dips, handstand press ups.
- Pulling: chin ups, inverted rows.
- Knee dominant: squats (several variations), single leg squats, lunges.
- Hip Dominant: cook hip lift, glute bridges, and single leg deadlights.
- Core: Planks, side planks, crunch variations, leg raises
- Full body: burpees, crawling.

There are many more, some more focused on mobility, others on strength but the key is to do 1-3 exercises from each movement so your whole body is covered.

If you want a complete program, turbulence training follows this approach and has a complete bodyweight section that you can do almost anywhere.

Q: How is interval running different from acceleration training?

A: Simply, interval training is mainly designed for developing sport specific endurance (or work capacity). A full explanation is here. Acceleration training is a type of speed work designed to improve your ability to get to top speed quickly.

Both these will improve with general training, particularly strength and mobility. However, specific acceleration training can easily be done in a field with a few cones or markers.

Its best done in pairs so you can examine your sprint technique. Mark out a short distance (10-15m or so). Set yourself at the start line. On a cue from your partner, aim to cover the distance as fast as possible, accelerating through the second marker.

It's important to get a full recovery so leave at least 2 minutes between attempts.

Variations on this include:

- Changing start position (lying, sideways, backwards, walking in)
- Wearing batting equipment
- Racing others
- Adding a ball as a cue (i.e. Try to catch it on the second bounce)

Make it a game and they can be a lot of fun, especially when the competitive side comes out!

Keep acceleration sessions short but intense with 5 sets of sprints. Always do they at the start of a training session (after warming up) but you can integrate it in to other training types if you want?

Q: What is steady state running and how does it differ from interval training?

A: Steady state running is simply jogging. So if you were to go on a jog you would want to run about 15-20 minutes nonstop (after a suitable warm up) this helps with reduction of body fat and increases in aerobic capacity. It's not very specific or efficient to do this so it is reserved for the deep off season when the least specific work is done.

This type of training can also include 'long intervals' where you run for 5-10 minutes and walk/jog for 2-3 minutes.

Most cricket endurance training is done via the various shorter interval methods as it is more specific. The main difference between the two types is rest. With steady state you never stop, even if you just drop to walking pace. With intervals you stop between sets.

Q: Can you give me an example circuit session/simple set/super set workout for fast bowlers?

A: I have lumped all these into one question to make it easier to answer.

First, let me explain each method:

- Circuit training is a good way of improving all round fitness and is very time efficient. Typically you move between 5-8 exercises with no rest. After the last exercise you rest for 1-2 minutes and repeat for a given number of 'circuits'.

- Simple set training is the classic gym weights workout. You pick you exercises, how many times you want to lift the weight (rep) and how many times you want to repeat the lift (set). The classic example is the Strong lifts 5x5.
- Super set training is a variation on simple set. You still have exercises in sets and reps but you pair two different (usually opposite) exercises together and do them without rest. This saves time and gives a slightly different effect.

I'm reserving the actual workouts for the Pitch Vision Academy. This is because there are too many variables (equipment, time available) to be able to cover it all in one article. The fitness section is written by a first class county strength and conditioning coach and will give you position specific workouts.

You can do all these training types with dumbbells or a barbell. Mix in some bodyweight stuff if you like but still stick to the exercises based on movements:

- Power
- Pushing
- Pulling
- Knee dominant
- Hip Dominant
- Core
- Full body

If you want sample exercises for this I recommend the excellent Men's Health Book of Power Training which has over 300 pages of exercises to put into circuits, simple or super sets, sorted by movement type. It's a brilliant resource.

Q: I don’t have access to a fitness trainer, can I still do Olympic lifts?

A: Olympic lifting (OL) is a very good way of developing speed, strength and power for cricket. You are moving weights with great speed and coordination which translates well to batting, bowling and fielding.

The problem is that they are very hard to learn. It's dangerous to do OL without proper coaching so forget about attempting power cleans or snatches without a coach. That said you can still get a great deal of benefits by using the safer OL variations.

Variations are a single part of full OL, so are safer but still allow you to perform explosive movements and get the benefits. You can safely perform the following moves without a coach (although you may want a training partner to watch your form):

- Squat jump (with and without weight)
- Hang jump shrug
- Clean pull
- High pull

All cricketers serious about improving their fitness should have some variation in there as the power generation benefits are very applicable to cricket. For explanations and pictures of these take a look at the Men's Health Book of Power Training.

That's all the questions about the cricket fitness plan for now. If you have any yourself you can post them here

Part 3: Conditioning

Is your running slowing you down?

Think back to your coaching sessions when you were younger. No doubt you were painstakingly taught the correct bowling action, the forward defensive and many other complicated techniques.

What about being taught how to run?

Most cricketers are never coached about running because it's assumed everyone already knows how, but running technique is a skill that needs to be practiced. Top class runners spend many hours developing their technique to improve speed and reduce the risk of injury. Can you as a cricketer learn from this? You can if you have ever:

- Suffered a knee, ankle or hip injury from overuse.
- Been run out.
- Been fielding and not quite got to the ball as it trickles over the boundary rope.

If that sounds like you, consider spending some time grooving your running technique as well as you cover drive.

If you are following the SAQ cricket training plan you will already be doing this.

If not make sure you set some time aside during your warm ups to do some technique drills.

Interval training: The fast way to more cricket endurance

What is interval training and how can it make you a better player? Back in 2006 I answered that question with a post about the best way to run to cricket success. To summaries my stance then (and now): I love interval running for the following reasons:

- It's cricket specific because it reflects the stop-start nature of the game.
- You can the same fitness results in less time.
- You can integrate it with fielding drills.
- It speeds up your metabolism which is good for fat burning.
- It's a flexible system that can be adapted to your needs.
- It's less boring than running round the streets for hours.

Interval training comes in quite a few different formats that are designed to train different energy systems (something I talk about more here). In order to best use the method you need to know how it fits your needs.

How much interval training do I need?

If your goal is improved endurance above all other factors (speed, strength, power and the like) then you will do more interval training than if you are simply trying to maintain your current levels. Already fit players looking to improve further can do energy system work almost every day (alternating between interval runs and other methods).

You can maintain current levels with 1-2 interval runs per week. If you are unfit I would still advice 2-3 interval sessions a week but start at a slow pace and build up the intensity. The disclaimer is, as always, that you should consult your doctor before embarking on a training program.

It's best to do some kind of interval work all year round whatever your goal. Simply change the number and length of sessions depending on your goals.

What does an interval training session look like?

The basic structure of an interval training session is always the same:

1. Warm up beforehand.
2. Run for distance or time then rest for time. Repeat.
3. Cool down and stretch afterwards.

The interesting part is how much you should run how much you should rest and how hard you should run. Again, this depends on your goal. In the table below I outline the work/rest/intensity ratio for the goal you have.

Generally cricketers should focus on work capacity, pure speed and ATP-PC work as these are the most specific. Mix up the sessions as much as you can while keeping the overall goal in mind at all times.

Cricket Interval Training

Goal	Distance	Intensity	Rest	Sets
ET	100-200m	60-70%	30-90s	10-20
IT	30-80m	80-90%	30-120s	10-20

Goal	Distance	Intensity	Rest	Sets
Speed	20-40m	90-95%	2-4m	5-10
ATP-PC	20-80m	95-100%	2-5m	5-10

Key ET = Extensive Tempo, general work capacity IT = Intensive Tempo, general work capacity (1 IT workout to every 3 ET workouts) ATP-PC = Cricket Specific interval training **Notes**

- Intensity can be self analyzed. Most people can roughly judge what percentage speed they are running at compared to maximum. The alternative is to test before starting the plan. Then calculate times.
- To make to workouts more cricket specific batsman can wear pads, carry a bat and run the distance between wickets including turning correctly. Bowlers can perform a shadow bowl after every interval.
- Fielding drills can be factored in. There are some excellent drills in the SAQ cricket book for conditioning.

How long should I rest between workouts?

Rest time means recovery time. It is as important as the training itself. As a rule the more intense the session the longer break you need before the next session. Extensive tempo training can be performed again 8-12 hours later. Intensive tempo work needs 36-48 hours recovery. ATP-PC and speed work can take up to 72 hours to recover due to high neural demand.

It's a good idea not to do any interval running on the day before or the day of a match unless it is very low intensity. This will stop you feeling physically drained when you are on the field.

You can still train while you are resting between interval sessions. Strength training is a good option (although not after a very intense speed workout). Always listen to your body first.

Finally, this information is not gospel. Everyone responds in broadly similar ways to training but there are many individual differences. You may need to start at a lower intensity or do fewer sets for example. As long as you are progressing by gradually improving each session you have nothing to worry about. There are no prizes for being a hero and getting injured.

Cricket, aerobic fitness and running in the winter

I'm not a big fan of jogging in the winter to improve your cricket fitness.

I have talked about using more specific methods in the past. What type of workouts can you do to improve your fitness in a cricket specific way? Especially during the winter when you are not doing fielding drills. Here are a few examples that you can use as general conditioning workouts. Remember that these are designed to allow you to build a base to become more specific as you get close to the season. You would also need to factor in some resistance training. You need to mix things up as much as you can to stop your body adapting over time to different demands. So use different training methods, footwear and surfaces.

I'll being doing some of these workouts as part of my off season training this autumn and testing how much fitter I get as a result (or to put my lab coat on, to see how much my VO2Max improves).

- **100m Intervals** - The simple staple of any conditioning plan. Run 100m on flat ground at a high intensity (not sprinting), rest for 30 seconds and repeat. To progress, increase the pace every week but keep the number of sets the same (up to 18 sets). For variation you can alter the distance, bust start with 100m as its simple.
- **5m/3m Intervals** - This is as close to jogging as you should get, and is a good way to get back into aerobic training. Run non-stop at a good intensity for 5 minutes then walk or jog 3 minutes. Repeat up to 5 sets.
- **Cross Training** -I'm not a fan of using bikes, swimming or rowing to improve cricket fitness as the crossover is much lower than running. However, if you are just beginning a fitness program or want some training that is less intense on the joints then use cross training. Try heading to the gym and doing 5 minutes on each machine for 15-30 minutes total.
- **Circuit Training** - You can use circuits of exercises to up your heart rate and maintain your strength. This is especially true if you have access to weights, a sandbag or other heavy items but you can use bodyweight just as effectively. Try 6-8 exercises for 30 seconds and a 1:1 work to rest ratio.
- **High Intensity Training** - This is the hardest workout on the list so should really only be used sparingly (say 1 high intensity workout per 4 standard workouts). Quality is more important than quantity and you should really go for it. Sprint for 15 seconds, Run at a good intensity (80%) for 15 seconds then Walk for 15 seconds. Repeat as many times as you can. A good measure of fitness is when you can do 15 sets.

As with any workout, make sure you get the OK from your doctor (especially the last one). I'm not a doctor and you take this advice at your own risk. The last workout is particularly intense so doesn't be a hero. Please feel free to contact me with any questions.

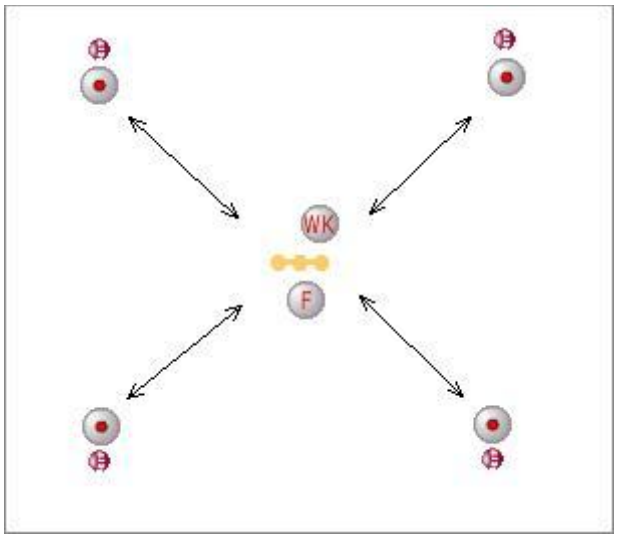
Cricket fielding drills week: Fitness

This post is part of the Cricket Fielding Drills Week series. To go to part one click here.

Sometimes it's very difficult to stay motivated when trying to get fit for cricket. You want to improve your fitness, but fitness drills can seem very far detached from getting more runs and wickets. To find a balance you can combine fielding drills with fitness training.

I have already posted some fielding fitness drills here that you can try, but you can never have too many, so here are some more. These drills work well as part of a well planned fitness program and in a properly run cricket training session:

1. 4 Corner Ball Drill

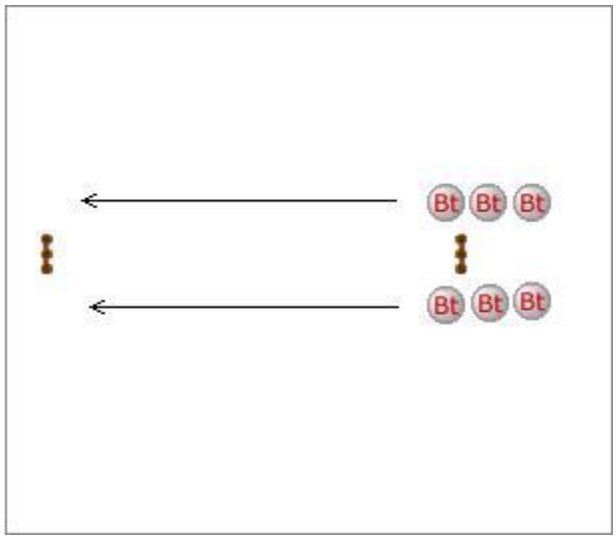


Place 4 balls in a square with a stump in the middle. Starting in the middle the fielder runs to a corner, picks up and returns the ball to the keeper then runs back to the stumps. Repeat for each ball then rest by putting the balls back. Do three sets.

Variations

- Don't use a ball, instead pad up and run to the marker and back as if you were running two quickly.
- Don't have a keeper, simply shy at the stump.

2. Batter's Race Drill

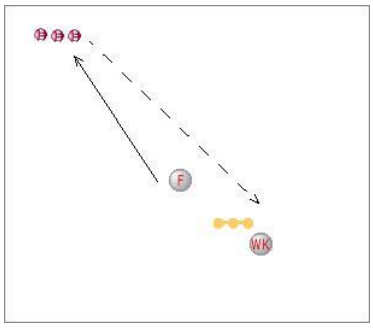


Mark out an area of 22 yards and split into 2 teams (ideally padded up with bats). On the shout of 'go' the first batsman in each team sprints to the other marker, grounding their bat as if taking a quick single. As soon as the batsman crossed the line the next batsman can run. Whichever team finishes first is the winner.

Variations

- Run a two instead of a quick single.
- Turn it into a fielding competition by having a ball fed out that needs to be chased and returned.

3. Chase and Throw Drill

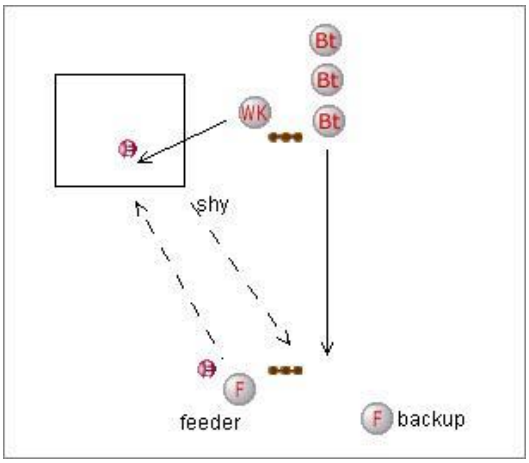


Place three or four balls some distance away from the stumps. The fielder begins facing the stumps. On the call, they turn, sprint, field the ball and return it to the keeper then jog back. Repeat for all the balls then swap with the keeper. Do three sets.

Variations

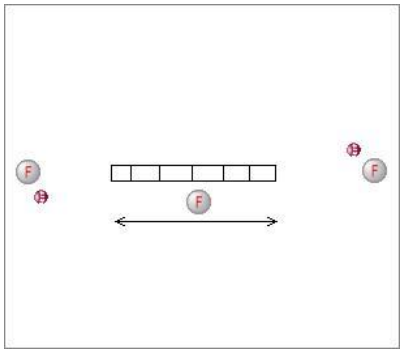
- The fielder/keeper begins in a lying down position.
- Use more balls.
- Have the ball fed out so it is moving.

4. Shy Drill



On cue the feeder rolls the ball into the marked area. The wicketkeeper (or fielder) runs from behind the stumps and has a shy at the stump at the other end. Meanwhile, the batsman is attempting to make his ground after running as the ball is fed. Repeat for all batsmen.

5. Ladder Catch and Throw Drills



Using an agility ladder or mini hurdles, the fielder runs from one end to the other focusing on speed and good running technique. That the end of the ladder the fielder takes a catch fed to them returns it and runs back down the ladder in the opposite direction. Repeat five times. Do three sets.

Variations

- Try doing backwards running, two footed jumps or sidesteps.
- Make the return a shy at the stumps.
- Move the feeder to the middle of the ladder instead of the end and complete the catch/return in the middle of the drill.

- Add a 10m sprint at the end of the ladder before the catch/return
- Add several cones in a curved shape after the ladder to simulate running around the boundary (you can have two ladders and two boundaries to square it off if you like).
- Add an extra ladder in line with a feeder in the middle. After completing the first ladder the feeder rolls the ball out away from the ladder the sets off on the second ladder. The first fielder fields the ball and throws it to the feeder that has completed the ladder drill.
- Use a heavier ball to catch and return (but counter balance with a tennis ball and normal ball on a 3:2:1 ratio).

Here's a quick way to combine nets with fitness

Time to train is always a problem for club players. So why not combine your usual net time with time to improve your fitness?

Twice the results in half the time.

Hopefully you are already incorporating drills to improve your fielding skill and fitness. But you can go a step further by putting some conditioning work into net practice.

Bowler Combination Net

Agree beforehand with the other bowlers that you will take turns to bowl a full over each rather than one at a time. After you're over, jog away from the net to do some speed work for a few minutes.

This can take the form of SAQ drills, fielding practice or simple interval runs. Make sure you have at least 2 minutes active rest (walking around) after this burst before you bowl your next over. Repeat as many times as you can.

Batsmen Combination Net

Once you warmed up and padded up and ready to go in next, do a few interval sprints over 22 yards. It's best to focus more on running technique at this point so as not to exhaust yourself too much.

When your bat has finished, do some more intense interval sprints. Keep them as close to 'real life' as possible. So for example, run a quick single, take 30-60 seconds rest and then run a three with 30 seconds rest and so on. Every 6 sprints take a longer 2 minute rest to represent the end of the over. You are looking to do 8-12 'over's' of interval work after your bat.

Subscribe for free to get even more cricket fitness tips.

Why you should care about work to rest ratio

I spend a lot of time talking about working hard, but in many ways rest is just as important for players who want to improve their cricket.

Specifically, I'm talking about the demands cricket makes on your body during a game. To make your practice worthwhile you need to reflect these demands in practice: Your work to rest ratio.

Cricket is a stop-start game which means there is a high period of rest to each period of work. The exact ratio can vary depending on factors like where you are fielding, what you bowl, who is bowling or how much running between the wickets you are doing. As a general rule of thumb, the work to rest ratio is usually somewhere between 1:2 and 1:3. That is to say, for each 30 seconds of work you do, you should rest for between 1 minute and 1m 30s.

The clear solution to this is to use interval based training or SAQ cricket training to reflect this ratio, while long runs or swims have much less value to your cricket performance. So when you

are thinking about how to improve your cricket fitness, speed and conditioning remember your work to rest ratio. It will save you a lot of wasted effort.

Why good cricketers care about 'work capacity'

Cricket is one of the longest lasting sports, yet the skills are all explosive: Bowling, throwing, running between the wickets and the like. In between these bursts you are generally standing still or walking and recovering.

That makes your work capacity far more important and cricket specific than your jogging endurance. Work capacity is your body's ability to repeatedly perform then recover from short term intense activity. This activity is the basis of batting, bowling and fielding. It's a lack of capacity that is the cause of why you get tired when you have been on the field for a while and not because you don't have enough stamina.

How does this relate to your cricket training?

The answer is to include fitness work in your training that improves your recovery time (such as shuttle interval work) and to work on your power with medicine ball work and ply metrics. In short, stuff you can do at the start of club training sessions just as easily as you can do in your own time. A combination of the two will do far more for your cricket than jogging 10k ever will.

Part 4: Strength, Speed and Power

Get the upper hand: How you can use strength training to get more runs and wickets

Alwyn Cosgrove put it perfectly recently when he said that any sport where men outperform women proves that strength is a vital factor to success. Research and practical experience has shown that the right strength training can:

- Prevent injury
- Increase running speed

- Increase bowling speed
- Increase throwing distance
- Reduce the effects of fatigue
- Improve bat speed
- Help with technique
- Help with concentration

In short, get you more runs and wickets on a regular basis. What strength training will not do is make you too stiff or bulky to play. If done correctly anyone can benefit from strength training. Even fewer than 18's (although there are certain things to avoid if you are still growing).

However, as a commenter recently pointed out, any training is only as good as the context it is in. There must be as much crossover to the cricket pitch as possible or we are all wasting our time.

How to use strength training to improve your cricket

While there are many methods to improving your strength for cricket, the principles remain the same. Firstly let's get out terms right. I consider strength training to be any kind of training that requires you to move your body against a resistance with the aim of increasing strength, power or speed. This resistance could be anything from traditional barbells/dumbbells to bodyweight, medicine balls, resistance bands, sandbags, kettle bells, other people or just rocks from the garden. Most things work if done right.

How much strength training is right?

Like all fitness questions, the answer to how much strength training is 'it depends'.

Cricketers get the best benefits from strength training 2-4 times a week. Total training time can vary a little more but 1-3 hours split between those sessions seem to work best. The fitter you are the more you can do. If you are just starting aim for the lower end at first and build it up. This is the principle of progression in action.

Generally speaking you will want to do more strength work in the winter and less in the summer. This will give you sufficient recovery time during the season so your workouts don't impinge on your cricket skills work or games. This is a basic form of what coaches call periodisation.

What sort of strength training is best for cricket?

The best strength training is the type that gives greatest crossover to the pitch in both performance (speed, power) and injury prevention. This is generally referred to as functional training. While this is an area of great debate in the strength coach world, there are some generally agreed areas.

- **Multi Joint**. Exercises that involve the whole body have a greater crossover (more functional) because they more closely emulate what you do on the pitch. They are also more time efficient as you are training several muscles at once. Variations of squats, deadlights, bench pressing and rowing are all examples.
- **Explosive movements**. Cricket requires you to move fast so generally your training should be fast. That may mean less weight moved more explosively but it will give you a better result on the pitch. For a couple of exceptions, see below.
- **Progressive overload**. Click here for more details on progressing your strength training.

You can read more about applying these principles in my complete guide. Subject to more debate and differing views are these areas:

- **Core work**. The core is a tricky concept. I have struggled with it myself as the principles above often don't apply. Core work is more about the muscles that stabiles while other muscles are moving. You should not ignore your core though as most coaches now accept. Have a look at my post here for some details.
- **Corrective Exercises**. A very modern approach to injury prevention is for strength training to include non-functional exercises taken from the world of rehabilitation to correct movements that may cause injury in the future. While I am still to be convinced (much of the science is beyond my current understanding) I can see some logic to making sure you can move through a full range of motion with equal strength on both sides of your body. There is research showing such imbalances can increase the risk of injury. Personally, I use certain simple exercises in my warm up to cover possible issues.

What to avoid while you are strength training for cricket

- **Bodybuilding**. Most exercises and techniques designed around bodybuilding are not needed by cricketers. For example, you would not diet and train to drop your body fat to below safe levels, you certainly would not want to take steroids and most single joint training is unnecessary.

- **Machines**. Free weights are generally better than machines. Machines lock you into a fixed single plane of movement. That just doesn't happen on the pitch.
- **Incorrect technique**. Weight training needs to be done correctly to ensure the risk of injury is low. Take the time to learn the technique for lifts.

How strong should a cricketer be?

"I think if you are going to train, you need a goal. If we are going to train for strength, we need to know what strong is. The four-minute mile is a great example. In 1957 Roger Bannister broke the four-minute mile. On that day he broke a twelve year old record. By the end of 1957 sixteen runners had also broken the four-minute mile. It's amazing what someone will do once they have seen that it is possible. Twelve years to break the record and sixteen followers in one year."

Strength coach Michael Boyle tells us how strong he thinks strong is. I have come across a few mentions recently to testing for strength but have never found any references to how strong coaches think cricketers should be. Boyle's standards are pretty high (as you would expect) but a good template to work from for club players who want to know what to aim for. I have adapted these standards for club cricket. Disclaimer: This is not researched data, it's my own standards based on what I have seen in adult men cricketers. It is not supposed to be a programmed. Use this information for reference only.

- Single Leg Squat: 10 reps each leg with 5kg dumbbells
- Bench Press: 1RM equivalent to 1x bodyweight (a 12 stone male should be able to bench 75kg for 1 rep)
- Hang Clean: 1RM equivalent to 1x bodyweight
- Chin Up: 1RM equivalent to 0.5x bodyweight
- Front Squat: 1RM equivalent to 1.25x bodyweight

- Overhead Dumbbell Press: 25% of Bench Press on each dumbbell (total weight 50% of Bench Press)

1RM (One Rep Max) means the most weight you can lift for 1 repetition only before you fail. It's hard to test this but you can work it out from higher repetitions. There is a calculator here. In summary, when testing strength, Boyle says:

> The key is well-rounded strength, not impressive performance on a "pet" lift.

How fast should a cricketer be?

Yesterday I mentioned some standards for cricketer's strength. I have also had a request for how fast a cricketer should be so I'm borrowing some norms from the ECB:

Adult Cricketer Speed Test

Run three runs on a normal length cricket pitch with a bat but no other equipment (pads, gloves etc.). Have someone with a stopwatch time you.

Times:

- Poor: Greater than 10.7 seconds
- Good: 9.7-10.2 seconds
- Excellent: Less than 9.2 seconds

Seeing as the weather is improving outside, get out there and tell me your best times!

10 Principles of cricket power

The more powerful you are the faster you can run, the harder you can strike a ball and the faster you can bowl.

These are the three reasons I got excited when I started reading The Path to Athletic Power by Boyd Eply. In the book the successful strength coach outlines his '10 principles' built on scientific proof and years of experience. But can they work for cricket?

The 10 principles were built for the American power sports that Boyd coaches after all. As baseball features as a prominent example in the book and cricket is a similar game in terms of fitness requirement I thought I would adapt the 10 principles to cricket.

10 Principles of Cricket Power

1. **Ground Based Activities**. The theory here is that as you play cricket standing up, you should train standing up. This is because running, throwing, playing a shot and bowling are all initiated by applying force against the ground. So it makes sense to drop as many training activities that require you to sit or lie down.
2. **Multiple Joint Actions**. Cricket skills require a great deal of coordination. You can train this by picking exercises that use more than one joint. For example, squats require the use of knees, hips, ankles and even shoulders and arms to hold the bar. A leg extension just requires the knees to move.
3. **Three Dimensional Movements**. You may have noticed that cricket is played in 3D (no, really it is). This means your training should reflect that by training with free weights where possible because free weight also train you on three planes whereas machines are designed to train only in two (with the cams, seats and pulleys taking the strain from the third).
4. **Train Explosively**. Speed and power come from how quickly your muscles can work. Your muscles work faster if they are trained with explosive fast movements rather than slower strength based exercises. This means exercises like the clean and plyometrics are vital to cricketers.
5. **Progressive Overload**. To improve you need to keep progressing your workouts. More reps leads to greater muscle endurance and size, more weight leads to greater strength and power. While cricketers shouldn't ignore the former, the latter should be your ultimate goal.

6. **Periodisation.** Have a look at my post on planning your year for more on this. For me, a periodised approach is vital to all players.
7. **Split Routine**. Splitting your weight training routine over several days (rather than training your whole body every time) gives you time to recover so you can train harder.
8. **Hard-Easy System**. This is linked back to periodisation. The concept is simple: You can't train at full effort every time or you will burn out. This means some days training within you.
9. **Train Specifically**. To get the best out of yourself on the cricket field your training need be as close to the real thing as possible. That means exercises that train your body to be fast and powerful, not long runs (unless you are a distance runner as well as a cricketer).
10. **Interval Training**. Leading on from specific training, your work and rest should simulate the demands of cricket. That means short periods of intense activity followed by long periods of active rest, just like you get when batting, bowling or fielding.

5 simple exercises to help you unravel the mystery of core training for cricket

Nobody knows what the core is.

Is it your abs? Your deep musculature? Your lower back? Your shoulders? Your bum?

Try and find common textbook definition and you fail. Everyone has an idea what the core is, but it's hard to find agreement on what *exactly* it is.

Add to this, the ability of the core area to do more than one thing and no wonder there is so much myth and confusion around core training to improve cricket.

So let's get back to basics.

Defining the core

Before we can move onto core exercises that are the most functional for cricket, we need to know both what the core is and what it does while we are playing cricket.

Let's keep it simple and call the core the muscles at the centre of our body. Some can be seen, like the 6 pack muscles of the rectus abdomens. Some are deep underneath, unseen and require more careful development.

More importantly, what are they doing when you are playing cricket?

- Allowing you to transfer energy from the ground to bat or ball.
- Stabilizing your posture when you run, throw, bowl, bat or catch.

A strong core for cricket means the ability to both stabilize and transfer force. This prevents injury (especially in the lower back area) and allows you to produce more power (through bat speed or ball speed) with the same amount of muscle.

So the hype is right, the core is important. Even if we are not in agreement as to what it is.

You core can also do other things, like flex to allow you to do sit ups. Just because you can, doesn't mean you should. The core muscles don't flex when you play cricket so we can discount most exercises like sit ups and crunches.

But what can we do to improve core performance?

Core Exercises for Cricket

There are literally hundreds of exercises from very skilled trainers to develop the core to both stabilize and transfer power. Not even the experts agree what the best ones are. But I'm going to make an attempt from a cricketer's viewpoint.

As a side note, all resistance training is also core training. However, there are some elements that traditional resistance training does not cover. That's why many trainers recommend starting or finishing your workouts with some core specific work.

Planks: Hold the position for 20-30 seconds. Brace your stomach muscles.

Medicine ball squat: Using a medicine ball 'activates' the core muscles more effectively.

Cook hip lift: This teaches you the important movement of extending your hip using your glutei (bum) muscle while keeping your lower back out of it.

Medicine ball throws: Teaches you to use your whole body to generate power, passing energy through the centre of your body efficiently.

T-pushups: notice how the shoulders and hips stay in line by 'stacking' the feet. You can also hold the T position for a count of 20-30 seconds.

These 5 exercises can be performed outside a gym in a group training session as well as during a gym session. As always, take professional advice before starting a training program. All the exercises can be safely performed by anyone over the age of 12 under supervision. There are many more options, especially in a gym with barbells, dumbbells and cable machines. These should get you started though.

7 Deadly sins of cricket specific core training

I'm increasingly becoming a fan of core training. Not as some odd gimmick for gyms to use their Swiss balls, but as a way of teaching yourself to generate more speed and power for cricket.

That means doing core (or trunk or pillar) training in the right way: A way that allows you to transfer power from the "toes to the fingertips".

It's a way that we as cricketers can learn from the world of baseball.

In this excellent article on core training for baseball, John Doyle debunks the myths around core fitness. Replace baseball with cricket and the principles are almost identical.

Read the article in full for the explanations:

1. Only Training The Rectus Abdominals
2. Not Having Constant Variety
3. Staying On The Floor
4. Not Focusing On Specific Movement Patterns, Not Muscles.
5. Lack of Torso Flexibility
6. Not Including Rotation Work
7. Never Using Low Rep Work

As a cricketer, if you are not ensuring you have core training as part of your plan then you are missing a large part of the jigsaw for power, speed and coordination.

Acceleration is the most desired trait of a good cricketer (after skill)

It makes sense to be fast.

The quicker you can run the more singles you can steal (or save in the field). The faster your arm moves when fast bowling, the quicker the ball comes out. The faster your bat moves through the strike zone the better you time the ball.

Acceleration is useless without technique, but when the two are combined you become a significantly more formidable player.

What is cricket acceleration?

Cricketers are not sprinters but both types of athletes need acceleration. The difference is in the type of speed. Sprinters react to a single sound (the starter's gun), run in a straight line and hit top speed. They don't throw or hit a ball and they only sprint once.

It's rare during a cricket match for a player to accelerate over more than 30 yards (27m). Fielding and batting involve reacting to a number of possible things (not just a gun) and quickly changing direction. Players need to perform in multiple bursts of speed. Also, upper body acceleration is more important for fast bowlers and batsmen because the faster your arms accelerate the better.

That means cricket speed can be broken into several components including reactions, agility and work capacity. It's not a skill in itself, but a combination of other factors.

However, acceleration is the key to both running speed and skill execution (bowling action, playing shots).

How to improve your acceleration

We are really talking about two different elements when comes to cricket acceleration. First is running speed second is upper body speed. Fortunately there is quite a lot of crossover between the two and all players can benefit from both. That means you can combine them. Here is how:

1. **Increase force production**. Before you can even think about better speed, you need to be strong. The more weight you can lift the more force you can produce and the faster you will be able to move. Combine squat/deadlight variations (double and single leg) with upper body pushing and pulling movements. Get strong first.
2. **Increase mobility**. The more mobile your hips, ankles, upper back and shoulders are, the more force you can produce. This is because of the way levers work. Improve that range of motion through dynamic mobility exercises: As a minimum before every workout and training session.
3. **Increase stability**. Your lower back needs to be stable while the rest of the body is performing your skill at speed. This will prevent injury and improve technique. Make sure you include core stability training all year round.

4. **Improve technique**. Technical errors can slow you down. Learn how to run between the wickets and chase a ball by taking a leaf from sprint training. Also ensure your bowling and batting techniques give you room to move quickly.
5. **Increase elasticity**. The faster your muscles are able to contract and relax like an elastic band the quicker you can accelerate. Use plyometrics to improve the lower body and medicine ball work combined with polymeric press ups for upper body speed.
6. **Lower body fat**. If muscle and strength allow you to go faster, fat slows you down because it is dead weight. Batsmen and spinners are able to get away with more fat that fast bowlers but everyone can benefit from low body fat. Focus mainly on healthy nutrition, plenty of sleep and regular training. That way excess fat will be lost without having to go on a 'diet'.
7. **Build up intensity**. When you are first learning to accelerate it feels a little 'out of control' to move fast. So over time, increase the intensity. Once basic strength and technique is sound you can start to challenge yourself with SAQ style techniques such as being pulled on an elastic rope or using a lighter ball/bat to move your speed beyond what you consider to be 100%.

Acceleration training is not a standalone element of you cricket fitness. You can and should combine it with strength, mobility, stability and technical work. This will not only save you time, it will teach you muscle memory to combine acceleration skills with cricket specific skills.

Example circuits for cricket fitness

Cricket and circuit training are a good fit, especially for amateur players with less time on their hands to train. This is because circuits develop strength, mobility and stamina at the same time. Here are some example circuits you can add into your own training.

Base Building Circuit

This is a good circuit to do if you want to build up a base of general fitness. Start here before moving onto more advanced circuits. Do 30 seconds work on each exercise, rest for 30 seconds between each exercise. After a full circuit take 2 minutes rest then repeat. Do 2-3 sets. Use a light weight or just body weight to begin with, building up the weight as you get stronger. To build up fitness make sure you gradually progress by increasing the work time, weight, number of exercises or number of sets.

- Press Ups

- Squats
- Pull Ups
- Hang Pulls
- Lunge
- Pallof Press

Conditioning Circuit

Based on the SAQ method, this circuit is designed to build cardio conditioning rather more than strength. You will need mini-hurdles, an agility ladder, a cricket bat, cones and some space to run in. If you want to make it more cricket specific you could have a set of stumps and some balls to hand too. Mark out each drill to immediately follow the next one like an assault course. Complete the drills as quickly as possible (30-60 seconds) then rest for 2 minutes. Repeat for 2-5 sets. Build up the time as you get fitter.

- Agility Ladder Run
- Zig Zag Run (10m)
- Curved Run (like round the boundary)
- Sprint With Bat (run a quick 2)
- Hurdle Jumps
- Side Steps
- Sprint Finish (5m)

These are just example workouts. Circuit training is powerful because it is so flexible, so if you want to change things around it's easy to do. If you want to design your own circuit you can use these as a template to work from.

Free 4 week bodyweight training plan for cricket

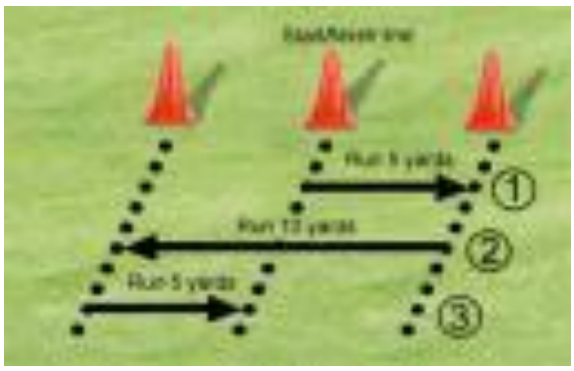
Yesterday we talked about how you can add bodyweight training to give yourself a boost on the cricket pitch.

Today you can extend that to a 4 week programmed. You can get the free Harrow drive 4 weeks Bodyweight Turbulence Training Plan by clicking here.

This plan has been developed by Turbulence Training mastermind Craig Ballantyne. The guy really knows his stuff when it comes to fitness. The great thing is, this workout is just as effective for recreational cricketers who want to lose a bit of weight, be fitter on the pitch and reduce their risk of injury. Like I mentioned yesterday, a bodyweight plan is really just the beginning of an athletic development plan but it's the easiest to do by far and has proven results.

If you have never done any cricket strength and conditioning training before, or you just want to mix things up a little this free 4 week plan is a great place to start. Get the free pdf and start getting fit for cricket?

Speed training for cricket



Questions:

- What do you do if you want to turn a comfortably run 2 into a well run 3?
- How do you reach those chases to the boundary to save a certain 4?
- How do you get more power into your delivery stride?

Answer:

- You train yourself for speed. Or to be more specific, you train to accelerate quickly, maintain the speed over distance and decelerate quickly.

Thatï¿½s where speed training for cricket comes in.

Speed Training for Cricket

Disclaimer: Fitness for cricket is not just about speed. You need a good basic condition before you embark on a speed training programmed as outlined here so don't just wade in as you may get injured or suffer health problems.

You should also check with your doctor before using any training programmed. Your health is entirely your responsibility. I have a sport and fitness degree, but Iï¿½m not a doctor.

This programmed should be undertaken in the off-season as part of a general fitness plan. It is particularly useful between December-March (UK season) but can be used as early as October.

Speed Training Components

Improving speed is a combination of different components. Each one needs attention to make a complete programmed:

- **Strength/Power**. The basic explosive element.
- **Sprinting Technique**. Both in batting equipment and out.
- **Speed Endurance**. The ability to maintain speed over distance.
- **Agility** ï¿½ how quickly you can twist, turn, and change direction at speed: Great for running between the wickets and turning to chase in the field.

4 Week Speed Training Programmed

Remember: This programmed assumes you have been doing regular general training (at least 3-4 times a week) for 2 months or more.

All workouts must include a complete warm up and cool down.

In a week you should split your training time between 2-3 Strength/Power sessions and 1 session each of Running Technique, Speed Endurance and Agility.

Donï¿½t do 2 sessions on the same day.

a. Strength/Power

For the best Strength/Power results I recommend a Polymeric Circuit (unless you are under 16) although a normal circuit or a sprinter weight training programmed also works well.

b. Sprinting Technique

This sprinting technique programmed at a Sport Fitness Advisor gives you a series of drills to perform to improve your basic technique. Consider doing these drills in batting pads.

The idea here is not to go all out for speed, but to train your muscles memory to the right action when doing full speed training.

c. Speed Endurance

For Speed Endurance, place 2 markers 40m apart. Sprint between them and rest for 90 seconds. Repeat 2 more times than rest for 5 minutes. Do this set twice more.

In week 2, increase the distance to 50m and week 3, 60m.

To make this more interesting you can work in pairs with a ball. Do the sprint but at the end add a pickup and throw to the stumps. Keep score of how many hits each person gets.

Another Speed Endurance Drill is the Fan Drill. Lay out 5 markers in a semi-circle 10m from a centre point. Starting at the centre point, sprint to the first marker and back. Then sprint to the second marker and so on. Take 90 seconds rest and repeat. You can add fielding skills here too. In later weeks, increase the distance.

d. Agility

There are some great agility drills to be found at fitness4cricket and EATS. Again you are trying to train your legs and lower body muscle memory to cope with fast turns and twisting.

The secret of SAQ cricket training

So you are convinced SAQ is an essential part for your cricket training. But you haven't bought the book yet.

Why not? It rocks.

Still I'm a generous guy and I'm sure Alan Pearson, the SAQ guru, won't mind if I give away an SAQ secret.

The SAQ Secret: A flexible training session.

In my own training programmers I recommend SAQ, particularly pre-season. So here is a typical session that I would run. For a proper breakdown you really need to buy the book. A session is broken down into 7 Phases. Depending on your goals, you can spend more time on one session and less time on another. Typically a session will last about 90 minutes in total, but it can be more or less.

1. **Dynamic Flex** (or warm up)
2. **Running Form** - Drills to develop correct running technique
3. **Innervations** - Drills to develop fast feet, agility and balance
4. **Accumulation of Potential** - Speed circuit training
5. **Explosion** - Drills to develop speed and power
6. **Expression of Potential** - Competitive team games based around speed, agility and quickness
7. **Warm Down**

Cricket drills for running between the wickets

There are many practice drills to improve your running between the wickets. The best drills are hard work, great practice and good fun.

Here are some to try. I welcome your feedback for any other cricket drills that you have found to work.

Run Outs

This drill combines competition, running skills, fielding skills and fitness.

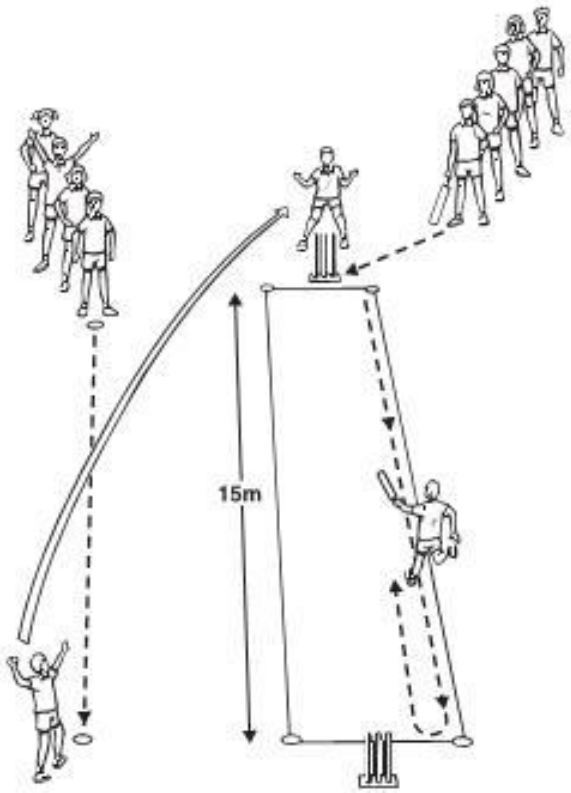
Split into teams (6 maximum per team): One group bats and one group fields.

The game is played on a normal length wicket with stumps at the strikers end. A ball is placed at mid on level with the non-strikers end. The first batter takes a normal stance at the strikers end while the fielders wait in line at short cover. One of the fielders is wicketkeeper.

On the coaches call of yes the batter runs 2 runs while the fielder runs to the ball and returns it to the keeper. If the batsman is run out the fielding team gets a point. If the batsman makes his ground the batting team gets a point.

Once all the batters have had a go, swap teams.

Repeat for all batters and the team with most points wins.



Relays

For senior players this drill is mainly fitness practice but for players learning the game it teaches the fundamentals of running between the wickets.

Have a relay race over a normal wickets length. Each player must have a cricket bat (and other equipment if possible). All players must run a three. If a player does not slide his bat into his ground he must go to the back to run again.

The first team to complete their runs wins.

Continuous Cricket

This drill is designed to improve run judgment. Setup a practice game with pairs of batters. Everyone else fields as normal.

- Each batting pair gets 2 over's, then swap pairs.
- A batter must run from every ball they hit.

- A batter is out if he does not call clearly.
- If a batter is out they lose 4 runs and change ends.
- Whichever pair has the most runs wins.

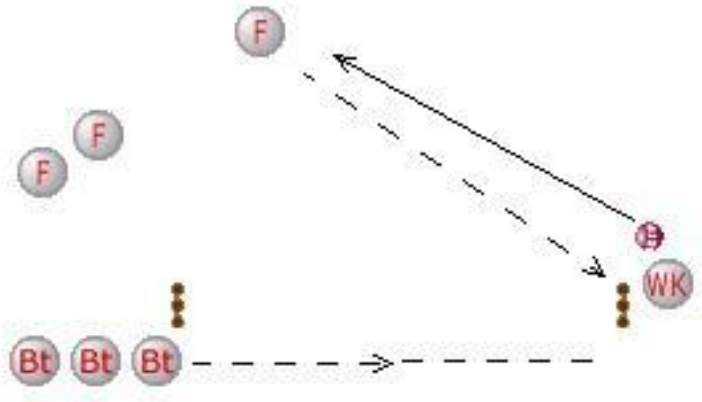
To simplify this drill you can forget about batsmen playing shots and instead have the coach roll the ball into the outfield from the strikers end and the batsmen call as they would in the game.

Alternatively, you could make it a quick single only game - not allowing shots that pass the inner ring of fielders (the ball goes dead).

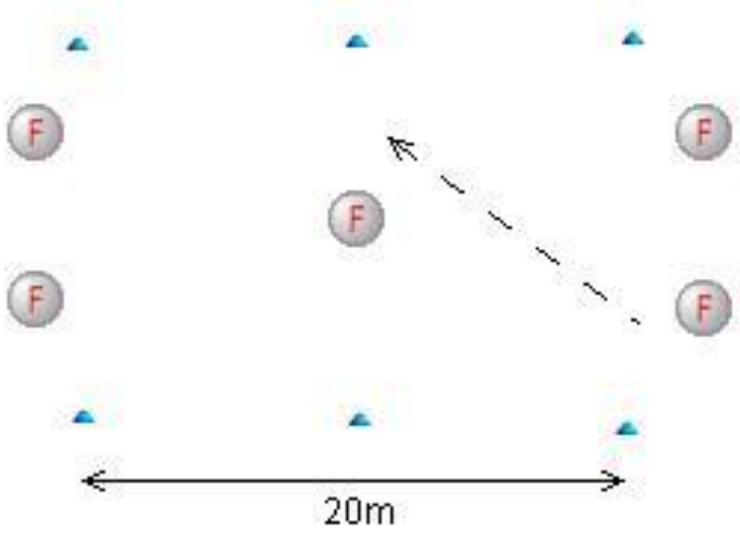
As another alternative, set up the game to practice a single shot (pull, forward defensive, etc) and the batters still have to run every time the ball is hit.

Cricket fielding drills for skill and fitness

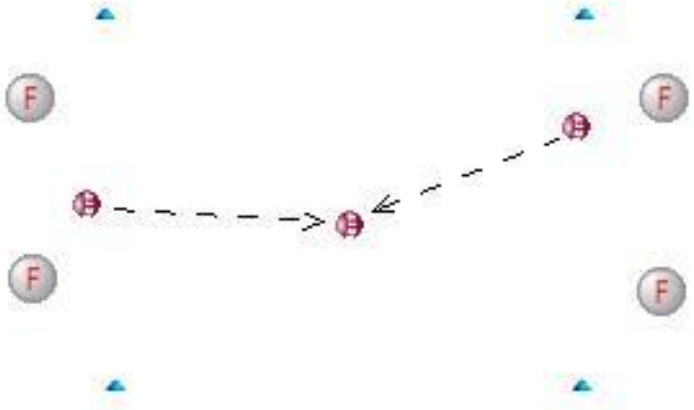
Cricket is a game that requires a lot of skills practice. If you can combine this practice with a workout that will get you fitter and more able to perform when tired then your game will improve. There are a great many fielding drills that can help you do this. Here are a few suggestions. **1. Throw vs. Run** This is a good drill for competitive types. Split into 2 team ï¿½ throwers and runners. The ball is rolled out by the wicketkeeper and the fielder attempts to run out the batsman before he can make his ground.



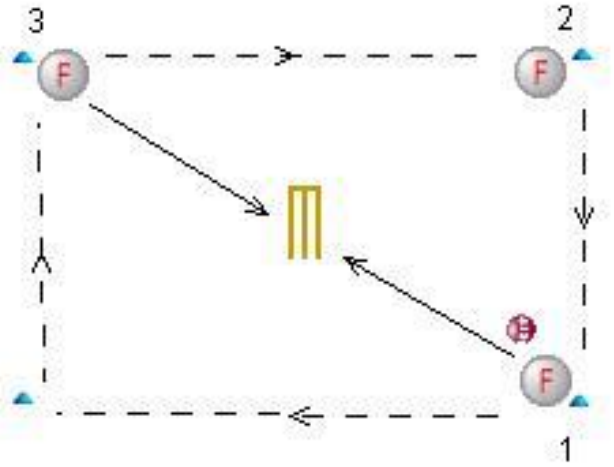
2. Team Interception Split into 3 teams. The teams on each side try to get the ball across the middle. The middle person or team attempts to stop the ball from passing through. With large teams, the middle team can split into 2 and face in opposite directions. For added complexity, use more than one ball.



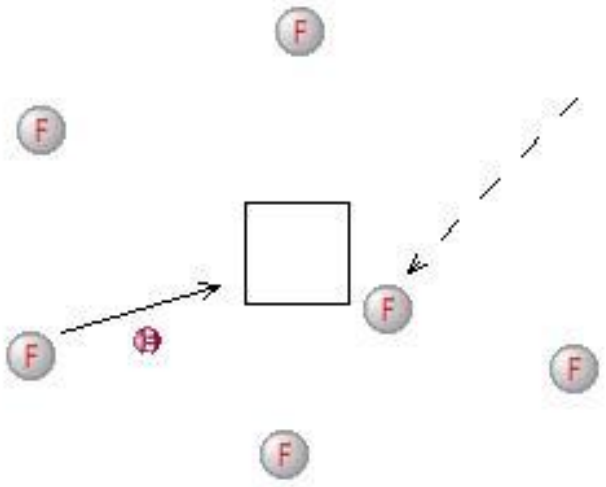
3. Crossfire This is a game for throwing accuracy and backing up skills. Place a ball in-between 2 teams as a jack. Using another ball, the teams attempt to hit the ball across their opponentï¿½s boundary.



4. Backup and Throw 3 players attempt to throw down a single stump. Player 1 throws at the stump and moves clockwise to the next cone. Player 2 moves clockwise to replace player 1. Player 3 fields the ball, attempts to throw down the stump and move to replace player 2. Repeat this. To make this more complex, increase the number of people in the loop.

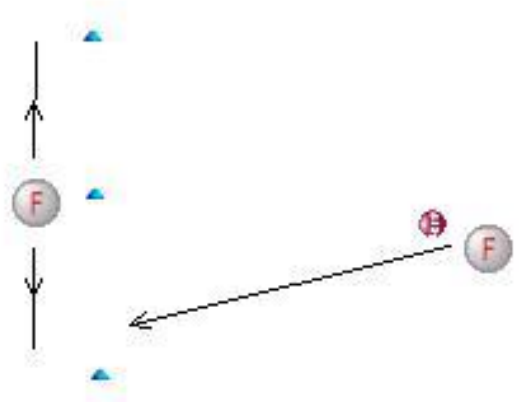


5. Surprise Catches The centre player rolls the ball to anyone in the circle and runs to change places with another player. The new player must run in and catch the ball before it lands in the target area in the middle.



6. Pressure Catches The ball is hit or thrown inside the 2 outside cones as wide as possible. The player at the middle cone must field the ball and return it before running back to the middle cone.

Do this in sets of 6 with just enough time for the fielder to get back before the next ball is delivered.



Cricket specific plyometrics

As you know, plyometrics are an excellent way to improve your cricket fitness: Be it sprinting a quick single or exploding into your bowling action.

Typically cricket plyometrics is used in the off season as a way of developing speed and power. Note that plyometrics need good technique, fitness levels and plenty of rest after sessions.

Cricket Polymeric Drills

As specificity is vital in cricket training, using drills that closely reflect cricket movements is also important. I strongly recommend you pick up a copy of the excellent SAQ Cricket for some great ideas. To give you a taster, here are 2 drills you can add to your own polymeric training.

- **Fielding drop and attack**. Place a cricket ball 20-40 yards away from you and stand on a box or chair. Have a partner behind the box waiting. Drop (don't jump) from the box, land and immediately sprint to the ball, returning it to the waiting partner. Repeat 10 times then rest for 3 minutes. Do 2-3 sets.

- **Ladder Jumps**. Using an an agility ladder, jump double footed between each rung. Have a partner feed a ball to you at the beginning and end which you catch and return. Do 2 sets of 2 reps with a 2 minute recovery.

  It's worth noting that although you don't need any equipment, to do things better you could do with a couple of things: A medicine ball, agility ladder and well cushioned trainers.

Part 6: Position Specific

Fitness tips for bowlers

I wouldn't like to be a bowler.

It looks too much like hard work to me. All that running in, slamming your front foot down with forces ten times your own weight on your knee only to watch a fancy-dan batsman casually smash you through the covers. Then you have to do it all again. Lucky for me there are plenty of people who do like bowling, but in order prevent injury and bowl better you need to be fit. Ian Canaway of Cricket secrets agrees:

> *"Aim to try and run 3 times a week to keep your cardiovascular system in top condition and to improve your stamina. South African fast bowler Makhaya Ntini, is well known for running 10Km every morning, even on match days!"*

While this is solid advice, we don't quite have the whole story. For example while running is great exercise for all cricket players and especially bowlers, there is more than one sort of running. You have to be, in the words of Vern Gambetta, 'game fit'.

> *"There is no question that in sports like [cricket] that having a good aerobic capacity will help with recovery between intense bouts of exercise. You raise that aerobic capacity not by distance running but by doing interval [training]. Just because a player runs six or eight miles in the course of the game does not mean that they should run six miles continuously in training. Look at how they accomplish that distance in a game. A great majority of it is walking or slow jogging! However it is during the quick bursts and the explosive actions that the games are won or lost."*

In other words your running must be as specific to bowling as possible. This means interval training is the best method for bowlers to improve their cricket endurance.

Interval Training For Bowlers Here is an example of how you can use interval training to boost your performance:

1. Warm up.
2. Mark out your normal full run up.
3. Run the distance at normal run up speed for 6 reps, jumping at the end but not completing your full action.
4. Walk back as recovery.
5. Rest for 2 minutes and repeat.
6. Do this for 8-10 sets of 6 reps.
7. Cool down.

This is a great basis for developing bowling specific fitness.

Variations

- Increase the number of sets, distance or pace.
- If you are in season or coming up to season you can actually bowl in the nets with a ball. If you do this remember to have lots of spare balls and don't share a net with other bowlers unless you are all doing the same 10x6 pattern. (Side note: Wicketkeepers love to practice with bowlers so if you are really bowling ask your keeper if he wants to come along too.)
- Add fielding drills between sets to accurately simulate bowling an over then doing some fielding

Improve your bowling and throwing with stable shoulders

One of the hot athletic fitness topics of the moment is how to prevent injury and increase power in throwing.

As cricketers we should all be interested in that, especially bowlers whose shoulders regularly get quite a beating. Both benefits come from improving the stability and mobility of your shoulder muscles as part of an overall training programmed:

> "I do believe in developing and maintaining comprehensive shoulder mobility and stability. And in my book, that includes pressing overhead with the barbell (doesn't have to be heavy and should include behind the neck work), dumbbells and headstand/handstand work."

Don't worry, I'm not asking you to stand on your head to get you to throw better but there are some practical things you can do.

Training in isolation

One theory in vogue amongst coaches and personal trainers is to isolate each of the 4 muscles in your shoulder and train them for strength and flexibility separately. This may be useful in rehabilitation programmers after injury, but for cricketers there is no transfer of increased isolated strength/flexibility to better throwing or reduction in injuries. It also takes a lot of time do all the exercises. Time that amateur players simply don't have.

Throwing from the feet up

As Tracy Fober suggests in that quote above, shoulder stability and mobility is better developed using the whole body. This is because throwing and bowling are activities that involve a kinetic chain of muscles. That is to say, the movement begins when you plant your feet on the ground then is stabilized by your leg, trunk and chest muscles and travels through your shoulders and arms to the end of your fingers when you let go of the ball. That means all cricketers who throw and bowl need to work their whole body in similar ways: From the feet upward. What does this involve?

- **Cricket balls**. It's the most specific way to improve after all, so try and do some throwing or bowling a couple of times a week outside of match days. If throwing makes sure you throw from a range of distances and avoid throwing or bowling in practice if you are feeling sore.
- **Heavier balls**. The trick here is to throw something slightly heavier than a cricket ball for a few throws followed by something lighter than a cricket ball and finally a cricket ball itself. The ratio is around 5:2:1 for best results. You don't want to be lugging super heavy or super light balls.
- **Train your whole body**. A training programmed for cricket involves whole body strength exercises to ensure a strong kinetic chain, exercises that work every major muscle to prevent muscular imbalance, core stability work and balance work. The latter 2 can be covered by a complete warm up routine. All these are all vital components of a strong, powerful shoulder and action

- **Warm up well**. The warm up is vital to not only get your heart and lungs ready to play or train; it is also the best time for you to develop your core stability, balance and mobility.

Double jointed

Mobility too, is a key factor. This is because the more mobile your shoulder is the greater the range of motion it can move through, which makes your throw more powerful too. Mobility is not the same as flexibility though. So static stretching (that's when you stretch but don't move) is not beneficial. Instead you can build shoulder, leg, hip and trunk mobility into your warm up by ensuring a full range of dynamic stretches is included. Certainly before every cricket session and I would recommend doing it every day if possible or before every workout if not. So you can see how simple it can be to get better at throwing or bowling. A well planned cricket fitness programmed combined with a couple of extra drills on practice days can see you in good stead for years of chucking that ball about.

What happens to your body during a bowling spell?

Debate still rages about fitness training for cricket.

Many former pros still wonder why current player hit the gym. There argument (in many cases a sound one) is that there is little crossover to the pitch.

As we know, it all depends what you do in the gym. Cricketers are not bodybuilders and need to train for the specific demands of the game for both injury prevention and improving performance.

In order to know what these demands are, we need to look at what happens on the pitch. This is an exercise I have done previously for batsmen, now it's the turn of the bowlers.

The physiology of bowling

Imagine standing at the top of your run waiting to bowl the first ball of the first over. As you start your run the muscles in your body respond to the commands of your brain and begin to contract.

As you jump into your action you store up power in your muscles. They stretch and contract in exactly the right sequence for you to propel the ball to the other end at pace. You follow though, applying the brakes as you watch the batsman's response.

Then you walk back to your mark to do it all again the next ball.

What is happening during all this is your body is drawing on energy from various stores. Just like the batsmen, the amount of activity per ball demands a high power output over a short period. Something that puts a strain on the same systems: Mainly the ATP-CP system which is described in the link above.

As your spell gets longer, despite a few minutes rest between over’s, you begin to tire.

Yet your reserves of glycogen (the natural fuel of your body) are still not depleted. You are not running a marathon and you are getting lots of rest. Why are you starting to flag?

One theory is that your subconscious brain is taking over earlier than it needs to in order to protect you from overdoing it. This 'Central Governor' explanation states than the body has a natural buffer that makes you feel tired so you can always keep something in reserve for emergencies.

It's that feeling you get when you are putting everything into it, yet your body is not allowing you to bowl at pace any longer. It also explains why some bowlers are able to get a second wind when they take a wicket: There is more in the tank; it just can't be accessed unless your subconscious lets you in.

According to some research, this effect is more pronounced in the type of muscle contractions bowlers do with every delivery know as eccentric.

The better your muscles are at these eccentric contractions, the longer it will take before you start to get fatigued and lose pace.

Training for bowling

If the Central Governor Theory is correct, then the best way to train for bowling is to improve the eccentric strength of your muscles.

The main way to do this is simply by doing a lot of bowling. That's what bowlers talk about when they refer to being match fit: The have bowled enough to overload the eccentric strength of their muscles. This is something that can't be recreated in the gym.

However, gym training can add to this by strengthening the muscles further. If can also strengthen the muscles that are not used as much in bowling to help prevent left to right side imbalances in the body which can cause injury.

Fitness training can also improve your ability to recover from repeated bouts of intense exercise such as a fast bowling spell, keep your body composition favorable (more lean muscle, less useless fat) and improve the efficiency of your heart and lungs.

With all that in mind, what kind of fitness work should bowlers do?

- Net bowling in 6 ball over’s with 2-3 minutes rest between over’s.
- Interval training of various distances and speeds.
- Plyometrics.
- Medicine ball throws and catches.
- Olympic lifts or their variations in the 3-5 repetition range with 2-3 minutes rest.
- Core stabilizing exercises.
- Strength training in the 3-8 repetition range at a fast tempo with up to 2 minutes rest.
- Individualized 'rehabilitation' exercises to iron out left to right side imbalances (once identified).

Greg Chappell recommends combining this kind of fitness work with skills practice to help the body associate fitness with cricket. I have never seen any evidence that this works, but it could be a more convenient way to structure fitness training for bowlers with limited time.

8 Ways for fast bowlers to get more stamina and less belly fat

Mohammed emailed me recently with a question.

> "I'm fast bowler; however my stamina is very low. After 3 or 4 over's I get tired quickly. Can you please tell me the exercises and nutrition that I should take in order to improve my stamina and reduce my belly?"

This is a common question, especially with bowlers. Not having the capacity to bowl at your best must be frustrating. It certainly is for the rest of the team.

What is fast bowling stamina? '

Stamina' in bowling terms is really a your ability to repeat your bowling action many times without loss of technique, speed or accuracy. In short the more stamina you have the longer it takes to get tired and the less effect that tiredness has on your bowling speed and accuracy. Here are 8 ways you can develop this.

1. **Bowl as much as you can**. There is nothing more specific to cricket than playing cricket. Whenever you get the chance then bowl. You can head down the nets on your own with some old balls and something to use as a target if there is no one around to train with you. Bowl in over's with a few minutes rest between if you can to make things more realistic or play as many games as possible. Every time you hit the nets try and bowl a few more over's before you have a rest. Always bowl at top speed too; a shorter intensive burst is more beneficial than going through the motions for longer.
2. **Train while you are tired**. Every now and again, do some bowling when you are physically tired, perhaps at the end of a training session or workout. This will teach you to bowl with intensity even when you feel the tiredness coming on. It's important not to do this too often or on your own. Train with another bowler or batter who can watch your technique and let you know when it starts to go. As soon as your action fails you, stop for the day.

3. **Run to build work capacity**. Running is the next best thing to bowling for increasing your stamina. I'm not averse to rowing either but running should be your number one method. Use interval training to build up your lung capacity and ability to hold off the buildup of lactic acid. Intervals are also better for reducing your body fat without causing loss of strength. Long, slow runs are not only a bit boring for most cricketers, but they reduce your ability to bowl quickly by turning fast powerful muscle fibers into slow fibers for, you guessed it, slow jogging.
4. **Use the winter wisely**. Off-season training is the time when you can make the most improvements. If cricket is your main (or only sport) and you have a long winter ahead then use it to develop you endurance through lots of running and some cross training. Most winter sports will also get you fit so consider taking up a game you enjoy playing. If you play all year round consider taking a break of 2-3 months from cricket to really focus on developing your fitness. The short-term loss in games will turn into a long-term gain.
5. **Eat more lean protein and good fat**. We tend to eat lots of protein but it's usually high in saturated fat. Go for lean options like tuna, chicken, turkey or lean cuts of beef and combine it with a balance of fats from sources like avocados, mixed nuts and olive oil. Research has found this fills you up quicker allowing you to lose weight while having a positive effect on your health.
6. **Eat more vegetables**. Vegetables give you energy and contain essential nutrients for health. Eat at least a portion of veg with every meal, preferably every 2-3 hours. This will fill you up more meaning you will lose excess fat but still provide you with enough energy for everyday living.
7. **Eat less carbohydrate**. Carbs have always been associated with energy but generally we eat too much for playing cricket, after all it's a power sport not a marathon. High carb food like crisps, chocolate, bread and pasta should really only be eaten once a day at most if you are trying to lose weight and build stamina. Carbs are not the enemy though. Make sure you keep your energy levels up during and after hard training or playing with some carbs combined with protein. Hard training isn't 3 or 4 over's in the nets though. It's weight lifting or interval training at high intensity.
8. **Strength train**. Combine your running and cricket sessions with strength training of some kind at least twice a week. This will keep your strength and power levels high and make sure you only lose fat, not muscle while building endurance. Lift with heavy weight and low reps if you can to counter balance the endurance training. Avoid high reps and low weights but bodyweight training is a good compromise if you are not keen on going to the gym.

Example Cricket Specific Conditioning Drills

This post is part 2 of the wicketkeeper training session series. To go to part 1 click here.

Strength Glovework Drill – Start in the normal crouch position. Use a partner to throw a ball to you for a simple catch. Return the throw and return to the crouch position as quickly as possible. Repeat for 20 reps and rest for 2 minutes. Do this 6 times. You can add a weighted vest if you are well conditioned.

Agility Glovework Drill – Place 2 cones 5m apart. Use a partner to throw you a ball. You return the ball, sidestep as quickly as possible to touch a cone then return to the middle for the next throw. Repeat for the other side. Complete at least 10 reps at maximum pace then rest for 2-3 minutes. As variations you can use ladder footwork drills finishing with a catch or even dive and catch.

Reaction Glovework Drill – Stand between 2 crash mats. Use 2 partners with a different colored ball each. Both partners throw the ball over the crash mats but one partner calls out the color to catch. You need to catch the right color ball.

Speeds Glovework Drill – Start in a normal position from some stumps. Wearing a speed resistor belt, start in the crouch position and run to the stumps to take an outfield throw as quickly as possible. A partner holds the cord tense to try and hold you back. This will improve your leg strength and sprinting speed. You can vary this by having a faster person run in front of you tied to a bungee cord instead, or using a weighted sled.

Explosive Power Glovework Drill – Using a crash mat, get a partner to throw the ball to you for a diving catch. Quickly return the ball and move to the other side of the mat to take a diving catch the other way. Concentrate on a good powerful jump and quick movement between takes.

Alternative Explosive Power Drills – You can also use mini hurdles 2ft apart. 2 footed jump over the hurdles trying to gain as much height as possible. After you have finished the last hurdle jump have a partner throw a ball so you have to jump to get it. You can do the jumps facing forwards or sideways. Also try a side to side jump with the hurdles in a zigzag pattern. The trick with these power drills is to do no more than 80 ‘contacts’ in a session (that is to say a 2 footed

jump is 2 contacts). Also, if you choose power drills, make sure you have 48 hours rest after the session to recover.

Batsmen

What muscles are used in a cricket shot?

What muscles do you need to train to be able to bat more powerfully and with better timing?

I always thought I knew the answer to that question and could reel off a list of muscle groups involved in every shot. But now I'm happy to admit that I was wrong.

Hitting a ball with a cricket bat is not about what muscles you use and the strength of each individual muscle. It's about generating power through correct coordination and timing.

That's why as cricketers we need to train movements, not muscles: It's the most accurate way to reflect sports performance.

When you translate this into designing an exercise plan it means focusing your attention on exercises that are the most functional for your needs. For example. If you want more power than do whole body power exercises with weights, weighted bats/balls or a medicine ball.

Train the movements and the muscles in playing shots look after themselves.

Better batting is all in the hips

If you have ever seen TV coverage of top class cricket you know how well the super slow motion cameras are for seeing the grace and power of a great shot.

You can also see how the power of your shot doesn't start with the upper body. It begins on the ground with your feet providing a stable position and is generated from your hips, through your trunk, arms, hands and finally the bat in a chain reaction. Sports science calls this the kinetic

chain, and it's the secret to hitting the ball with better timing and power. This means your legs; hips and trunk are three of the most vital tools you have in scoring runs.

How to use your hips to generate more power

1. **Strength trains your legs.** The stronger your legs, the more force you can apply to the ground. The more you apply force, the more it can come back through your body. If you want to get technical that's Newton's Third Law in action.
2. **Work on your mobility**. The wider the range of motion your hips can move through, the more force you can generate. Modern living (sitting at a PC, watching TV) tends to reduce this mobility. To compensate you can include a range of dynamic stretches into your cricket warm up.
3. **Coordinate yourself**. Batting drills allow your body to learn the timing of moving your muscles in the correct sequence for each shot. It's not something you can do easily during a normal net, so make some time to drill a few shots until you get the feel for it.
4. **Get to the core**. Medicine balls and weighted cricket bats are good to get your core muscles working to transfer the power from your legs and hips to your arms and bat. In order to be as specific as possible, focus on power both power and stability. You can find some ideas here, or get in touch with me for more information.

What happens in your body when you score a hundred run?

What are the physical requirements of a batsman batting through an innings to score a 100 runs?

As a batsman or coach, knowing which energy systems are at work in your body can help you plan your training more specifically for your cricket. This will help you get to that elusive 100 more often.

Before the game

Before we look at what happens out in the middle while you are getting to three figures, we need to know a few basics about how our body stores this energy. Any movement, including playing cricket, requires energy to move our muscles. This energy is fuelled by food. Everything we eat is broken down and stored in our body ready to be used as fuel. When required to generate

energy our cells kick off a series of reaction to release the fuel and supply our muscles with energy. The main source of energy for our muscles is called glycogen. Glycogen is easy for our muscles to break down and use quickly as energy. The best way to restore glycogen is from foods with carbohydrates such as vegetables, fruit and quinoa.

Our body can also use fat as an energy source once glycogen has been depleted. This is done by our cells breaking stored fat (triglycerides) into glycerol and free fatty acids (FFA) which can be used to give our muscles energy.

Finally, protein can be used for energy. It is the least used option for the body as it takes a longer chain reaction to convert stored protein (amino acids) to energy. Before play starts you will have plenty of all three sources of energy available to you. You will have eaten right all week and apart from warming up you will have done little to drain your reserves of glycogen, FFA or amino acids.

Heading out into the middle

Now imagine you have strapped on your pads and you are heading out to the middle to start your innings. With your internal fuel tanks primed and ready your body is already working to give you energy. But it can't do much without a way of converting fuel into energy. That essential element is called ATP (adenosine triphosphate). ATP drives the production of energy to move your body. The trouble is that cells contain only enough to provide a second or two before the body needs to start getting it from elsewhere. Here is how you do it:

1. **Up to 10 seconds**: ATP-CP system: The body takes up the waste from the initial use of ATP (this is called ADP), pinches a bit of an enzyme called creative phosphate (CP) and remakes ATP. This only lasts a few seconds before the CP store is also depleted. In cricketing terms it supplies enough energy for you to play a shot and run a quick single or two if you are quick. The good news is that after a short rest your CP store returns to normal allowing you to use it for your next shot.
2. **Up to 3 minutes**: Glycolytic (or ALA) system: If you are running more than a quick single your cells need to find ATP from somewhere else as all your CP is gone. The fastest way to get this is to take some glycogen (remember that stuff?) and break it down into ATP and Lactic Acid (LA). LA is what makes your muscles feel like they burn. Lucky for batters, this system is not used as often as the ATP-CP system because it really only starts to be used after 5-10 seconds of intense activity. Running a three or four would be a good example of this system in action.

3. **Beyond 3 minutes**: Aerobic system: After a few minutes our body is able to catch up with itself and start using oxygen from plain old breathing to create ATP. This is done by a complex process called oxidative phosphorylation. This can be fuelled by carbohydrate (glycogen which is the bodies preferred source), fat (FFA and triglycerides) or protein (amino acids). Batsmen use this system more than any other in the middle but at a very low level indeed (walking, standing still). This means while important, it does not need to be highly trained in the same way it would be in, say, a long distance runner.

Breaking down your innings

So how much do batsmen use each system during an innings lasting a couple of hours?

There is little research into it, but from experience I would say that the aerobic system has by far the largest use but only at a low level so needs little if any training. The Glycolytic system is the least used with barely any activity in the 10 second to 3 minute range. The most important system is ATP-CP because it is used at the most important times that are to say when you are running hard and hitting the ball. In an average hundred then, you will need to have an efficient ATP-CP system to both supply you with quick energy and recover your ATP and CP store quickly for the next bout of activity. Modern strength coaches refer to this recovery time as work capacity.

Training to score a hundred

What will your training look like if you are to get the greatest crossover to the pitch? Ideally most of your work will come from activities that train both your ATP-CP system (1-10 seconds of activity) and improve your recovery time. The number one way to do this is to actually play cricket. Examples you can do in training are:

- Strength training in the 3-8 repetition range with 30-120 seconds rest between sets
- Sprint training over 10-30 meters with 1-3 minutes rest between sprints
- Interval training over 15-60 meters with 30-60 seconds rest
- High intensity fielding drills
- Practice matches

Some of these methods may seem odd if you have been taught that cricket as a sport uses aerobic systems so therefore it would seem like jogging or CV machines are best to improve your fitness.

I believe that is dogma from a time when we didn't fully understand the requirements of cricket. Analyzing the importance of the systems in use and training in the same way is a far superior method in my mind.

How 2 workouts a week can make you a better spinner?

Thanks mainly to Shane Warne, strength and fitness is not the first this you associate with successful spin bowling.

It's reported that Warney's idea of a balanced diet is a cheeseburger in each hand. Sadly for you and almost every other spinner in the world, you are not as good as the great Aussie leggie. So you need to make the most of what you do have with a fitness plan that makes you better.

Being fit as a spinner has a number of proven benefits that can be gleaned from just 2-3 workouts a week:

- Fewer injuries as your muscles and ligaments are stronger
- Faster recovery from injury
- Longer spells as you tire less quickly
- More turn through stronger wrists and fingers
- More power and speed in throwing, running and hitting
- Less body fat and better body composition
- Better concentration
- Calmer under pressure

Playing and training, while a critical element, won't give you all these benefits. So in addition to your games make sure you are working out in some way.

What makes a good spinners workout?

Everyone has their own individual needs when it comes to planning their fitness training, but a good training plan for spin bowling should aim to include the following elements:

1. General metabolic work (such as interval runs, swimming or circuit training)
2. Shoulder strengthening and injury prevention

3. Explosive power training (like plyometrics, medicine ball throws or Olympic lifts)
4. Mobility and flexibility work

Alternatives like traditional weight lifting with compound exercises or playing other sports will also help you be fitter and stronger. There is no need to do specific wrist or finger training, just bowl a lot and train a couple of times a week.

What would a typical session look like?

You would not go far wrong following the layout in the Turbulence Training free 4 week bodyweight training plan.

Whatever methods you choose to get yourself fitter, remember the basic principles of fitness training and stick at it.

While you may never take hundreds of Test wickets, you will do better in your own games.

Part 7: Injury Prevention

How to protect yourself from the 4 most common cricket injuries

Sports scientists know a lot about how cricketers get injured, but oddly there is no study on the prevention of injury.

That's left up to the coaches and players themselves.

You could turn to a gym to organize an injury prevention training plan, but often commercial gyms have little understanding of the needs of cricketers.

Looking at the research itself, I have picked out the 4 most common preventable areas of injury and come up with a few suggestions of how to keep you away from these injuries. I have used these strategies for many years and can count the number of injuries I have sustained since the early 1990s as just 1 (and that was getting hit by a ball).

1. Running injuries

Hamstring pulls are common, especially in club cricket where many players spent their week sitting down at school, college or work. This causes an imbalance between the hamstrings (underused) and the hip flexing muscles (overused when sitting).

To rebalance this, you must train your hamstrings to move efficiently while you are running, jogging and sprinting (hip extension). Strengthen your hamstrings in the gym with exercises like single leg deadlights and reverse lunges.

Additionally (and as a bare minimum if you are not training) make sure your pre game warm up includes hip extension 'activation' work. Exercises like cook hip lifts and glutei bridges will wake up the muscles involved in hip extension before you play (or even during play if you like).

One thing your hamstrings do not do much when playing cricket is flexing your knee. For that reason it's best to avoid hamstring curl machines that isolate the muscles in a non-specific movement pattern.

2. Throwing injuries

Both throwing and bowling involve a lot of work from the muscles in your shoulders. This is particularly true of the stabilizing muscles such as the rotator cuff. Normal life and even effective strength training do not allow these muscles to be strengthened enough.

The answer is to ensure you are using 'prehab' style exercises for these stabilizing muscles. These exercises do not need weight (the muscles are small and easy to overload). Add a simple YTLW circuit and wall slides to your warm up before matches, training and gym sessions.

3. Back injuries

Bowlers are most likely to get lower back problems through overuse, even if they have a good strong action. The simple way to prevent overuse problems is to make sure you stick to the fast bowling guidelines laid down by the ECB, even if you are over the age of 19.

If you have a mixed action and you get a lot of back injuries you may want to consider changing your action to front or side on. Mixing them up has been shown to increase the chance of injury.

Also, the stronger the muscles of your back and truck (that hold your spine in a healthy position) the less chance of injury. However, the core does not move or produce power itself so exercises should focus on stabilizing. Good old fashioned press ups and planks are useful exercises to include in training sessions. As they only require bodyweight you can also include them in skill sessions.

Avoid lumbar flexion exercises like crunches and sit ups. They have been shown by back experts to exhibit a large amount of force on the lower back while doing them. This can weaken the back for when you bowl. It can also lead to poor posture which is another indicator of back related injury in athletes.

4. Lower limb injuries

Apart from hamstrings (mentioned above) there are a number of other possible issues, especially for bowlers. Hips and ankles need to be both strong and mobile. Knees need to be strong and stable.

Before you train or hit the gym it's important to do some work to make sure you have a full range of movement in both your hips and ankles. This can be done easily in the warm up with ankle mobility exercises and a dynamic warm up.

Knees are easier. Stability in the knee is created by strength in the muscles and ligaments around the joint. To increase the strength of these make sure you are strength training with exercises like single leg squats.

This exercise is very useful as it trains all the stabilizing muscles around the knee as well as the prime mover muscles.

In many ways these techniques are simple extensions of rehabilitation methods that have been used for years by physics. However, include the right 'prehab' stuff in your warm ups and the right key exercises in your training and you may not need to be in rehab again.

Balance your cricket fitness to prevent injury

Most people know they should exercise to both improve cricket performance and reduce the risk of injury. The problem is that often exercising can just be reinforcing the imbalances in your body and *doing more harm than good*.

This study from 1991 shows the risks. Athletes with significant differences in strength and flexibility from one side of the body to the other have a higher risk of injury.

Traditional training routines for sport fail to take this fact into account meaning they could be making no difference to your injury risk. This is because there is usually too much work on the front of the body (the mirror muscles) and a focus on double limb training (squats, chin ups and the like).

How do you redress the balance?

The first step is to find out if you have a significant imbalance. You can do this alone if you invest in Gray Cook's book Athletic Body in Balance. It contains a movement screen you can do. You can also get a qualified trainer to test you.

If you find an imbalance the answer can be simple: Train the weaker side harder then retest to see if it worked.

Train Unilaterally

Usually this means doing unilateral training (single leg or single arm exercises). You train both sides, but you train the weaker side 2-3 times more than the stronger side.

These exercises can be:

- Strength based such as single leg squats or single arm rows
- Power based such as plyometrics with correct landing technique
- Mobility based such as rotational squats
- Flexibility based such as hip flexor stretches

You should not need to do this training for all time. Once the balance is redressed you can go back to training both sides equally. Although, single limb work is always good as it teaches better balance and coordination as well as being more cricket specific.

This technique of redressing the balance is not a training system in itself. However, when you make it part of an overall plan you will not only be less likely to be injured, you will also perform better.

7 Ways cricketers can stop lower back pain

Back pain is surprisingly common. Yet in many cases it can be reversed easily, so why suffer?

My job involves a lot of sitting down: writing and travelling are big parts of my life. Combined with regular years of playing/coaching and a body in the 30's and you get a high risk of back trouble. It's true I have had the odd bout of taking anti-inflammatory pills for an ache over the years, but in recent times I have learned some simple ways to prevent it.

Here is what I have discovered.

1. Examine your technique

I don't bowl myself, but I have seen the figures from the ECB for bowling injuries. By far the biggest cause of back pain in bowlers is a mixed action. That is when your hips and shoulders are not in line when you enter your delivery stride.

The reason this is bad for the back is that your lumbar spine is not designed to twist. It can twist a little but repeatedly asking it to do so (such as when you bowl a spell) will eventually causes an ache that perhaps grows to a full stress fracture.

Ideally you will have a coach who can help realign your body to a front on, mid way or side on action. If you don't have access to a coach you may want to consider an online cricket coach such as you can get at Pitch Vision Academy.

2. Stretch your hips

Very often with back pain, the symptom is not the cause.

I see players, even at professional level; stretch their lower back when warming up. As we already know, the back is not designed to stretch. It's the equivalent of picking at a scab: Feels good but not the right thing to do.

Instead, take a look at your hips. Modern lifestyles of inactivity and sitting in daily life lead to inflexible hips with your lower back taking up the strain of reduced range of motion. So the answer is simple: Stretch your hips, not your back. Strong lifts has an excellent guide on hip mobility here. You can do this stretching every day without fear and should at the very least be doing it before any physical activity (cricket included).

3. Strengthen your core

The muscles in your back and stomach area that can't be seen (even if you have a six pack) act as stabilizers for your back. They hold the spine in a healthy position and work on a subconscious level. That means you can't strengthen them with crunches.

Instead, focus on the body awareness that will help your body hold the spin in place. Yoga can teach you the basics of body awareness as can a corrective exercise plan designed by a qualified sports medicine practitioner.

Combine this with core stabilizing exercises like planks and side bridges and you begin to bulletproof your back.

As Gray Cook says, the focus is not on creating more power from the core, but learning how it can stabilize your back while movement is occurring.

4. Warm your muscles

It's common in England when the season starts in April to be less than warm. It's also common to see club players, on the first day of the season, getting out of their cars after months of inactivity and going out to bowl or bat.

I'm sure it's similar all over the world. No wonder the back starts to complain.

It's essential to warm up before play in any conditions, especially the cold of the English spring. Build up to the big stuff by warming up for a few minutes.

The same applies to any heavy or long lasting activity. A few minutes of dynamic stretching will make all the difference.

5. Stand up

As we know from our hips, modern living is hard on the body. We sit down to drive, sit down and hunch over the computer and even sit down on the machines in the gym!

If you spend a lot of time sitting, just standing up will do your back the world of good. Once an hour or so, get up and do something: get a drink, walk around, do a couple of static stretches then get back to sitting. It should only take 1 minute.

The same also applies if you are on your feet all day. Take a few minutes every couple of hours to sit or lie down. Your back needs the variety.

6. Get a massage

Everyone gets knots in their muscles through daily use, even if they don't play cricket. Massaging the soft tissue can work them out, restore full function to your muscles and reduce pain.

You can get a professional to do it, or even do it yourself with a foam roller.

7. Move your butt!

Physical trainer Keith Scott deals with a lot of clients with back pain. He claims 99% of his clients have weak glutei muscles. Sitting all day shuts them off and cause the hamstrings to take up the slack which puts pressure on the back again.

The simple solution to this is to reactivate the glutei muscles in two ways. First, as part of your warm up include movements like glutei bridges. Second, in the gym train your glutes directly with exercises like single and double leg deadlights.

I know from my own experience that this stuff works to reduce the pain when it comes. Get into the good habits and you may save yourself from injury too.

Boot camp: The inside track on cricket footwear

You probably under-appreciate your feet.

During a hard game you can be on them for 2-3 hours at a time, working with your ankles and legs to keep you upright, balanced and performing to your best. **Every step you run generates a force that is 2.5x your body weight through your foot. If you are a fast bowler the impact at the point of delivery jumps up to 9x**.

They take a lot. Yet many players give only short consideration to the boots they wear.

It's time that changed.

What do you look for in a good cricket boot?

That is harder to answer than you might think. The reason for this is that there is a difference between what sport sciences thinks is best and what shoe manufacturers make.

The science of feet

There is little doubt that the best way for our feet to function is barefoot. That may seem a surprise to those who have been brought up on the common knowledge of more cushioning and more support.

But people have been around a lot longer than trainers have. **We are designed by nature to be able to walk, run, hunt and gather without shoes**. Our feet have an incredibly thick skin and amazing feedback system that works with the support muscles in our legs and hips to allow for heavy impacts and excellent balance.

Various studies have backed this up:

- Runners with old shoes are less likely to be injured than runners with newer shoes.
- The more cushioning in your shoe, the more likely the injury.
- The thicker and harder the sole of your shoe, the worse your balance becomes.

You can read about all these studies in a long article by Dr. Froncioni, an orthopedic surgeon (worth reading though).

On top of this, injury rates in fast bowlers continue to increase despite increases in cushioning and support in their shoes. I have also seen anecdotal evidence with basketball players that the more support the shoe gives your ankle, the weaker and less flexible the ankle becomes.

Despite this evidence, walking into any shop that sells trainers or cricket boots shows you the opposite: More support and more cushioning.

Where does that leave our poor feet in all this?

It's a personal thing. Most of us can't play barefoot after years of conditioning our feet to be in shoes. We have to find a compromise. **The more we can do to minimize the risk of injury with our footwear the better**.

Cut

Cut is how high the boot goes up your ankle. With cricket shoes the two options are high cut bowling boots and shoe cut boots for batting and fielding.

Fast bowlers are the main users of bowling boots as they are designed to support the ankle. As we are not bowling in bare feet, the chance of slipping in medium cut boots and socks is higher, so this is sensible.

But we already know that this can reduce the range of motion of your ankle, another injury risk.

To overcome this, **make sure you are warming up before and cooling down after play/training with 5 minutes of ankle mobility**. Here is a great video that explains how.

Also a bit of gentle bowling and fielding in bare feet will work wonders. Just make sure the ground is safe from stones/glass/other stuff that hurts.

Spikes

Unless you are a fast bowler, the spike in your boots is a matter of preference. There are 4 main options:

- Full spike
- Half spike (where the spikes are just at the front)
- Rubbers (with no spikes, just rubber molded grips)
- Adjustable (can add or remove spikes and replace with rubber)

Fast bowlers need a full spike for the extra stability. Always wear them unless you are prevented from doing so by playing on artificial surfaces.

Other players can go with whatever option is most comfortable. The more spikes you have the more grip you have in the surface which is a double edged sword. On one hand you are less

likely to slip and fall on the other hand you may get your foot caught in the ground and turn your ankle or knee.

Generally the softer the surface the more useful spikes become, the harder the surface the less you need them.

Cushioning

As we know, most cushioning is probably doing more harm than good. For this reason it's best to avoid manufacturer named cushioning technology like Gel and Air. **A simple shoe with as thin a sole as possible is statistically superior: You are less likely to get injured**.

If you do buy something with lots of cushioning try and 'break it in' before using it for a full game.

Protection

It's out of fashion at the moment, but the final consideration is how much protection your boot gives you from impact. If you face 90mph Yorkers a toe protector is a sensible consideration. However, they do increase the weight of the boot making sprinting a little harder.

Other tips

- Wear older boots, and break in new ones slowly.
- Go barefoot as often as you can in normal life.
- Consider wearing barefoot style training shoes like 'Nike Free' in the gym or nets.
- Remember to mobilize your ankles in your warm ups.
- There is no one perfect shoe. Experiment until you find something comfortable for you.

In the future manufacturers may come up with something better for cricket. Shoes are already appearing that more accurately mimic the feet but there is nothing for cricket yet, specifically fast bowlers who have the highest risk.

Until then, experimentation and compromise are the only solution.

Cramping your style: How to stop cramp

Are you a cramper? If you have ever cramped up on the cricket pitch you know how annoyingly distracting the pain can be from batting, bowling and fielding.

From experience I know it can put you off enough to get you out or prevent you from bowling.

Science is well aware of the issue. We know that some people are more inclined to exercise related cramps than others. But that is about as far as the facts go. The rest is theory based on incomplete information, despite reams of research.

Where does that leave the cricketing cramper?

Let's take a look at the ideas and see if we can come up with some simple steps to follow.

What is cramp?

Cramp is the pain you feel when a specific muscle unconsciously contracts. You have no control over when it happens but it always happens during or just after playing cricket (or other exercise).

While you are cramping you can barely use that muscle, if at all. Even after the cramp has gone (and sometimes they can last for several minutes) the muscle can feel sore.

Some people cramp more than others.

What causes cramp?

Traditionally, cramp has been thought to be caused by loss of salt and/or potassium through sweating. While you do lose electrolytes when you sweat, there is a debate among scientists as to whether this is enough to cause the problem.

Nobody knows for sure.

There is one other theory. It's a complex one that says the when the nervous system that controls a particular muscle gets tired it also gets confused and contracts more than it should.

This second theory explains why cramp is more common in certain muscles. Muscles that span 2 joints spend too much time contracted (for example gripping the bat). They get fatigued which kicks off the reflex of cramping.

But again, it's never been proven beyond doubt.

Preventing cramp

Nobody knows enough about cramp to give an absolute answer to preventing them. Here a few things you could try:

- Drink water at about 500ml per hour.
- Drink a sports drink at the same rate to replace lost electrolytes.
- Avoid drinking too much of anything to prevent diluting your electrolyte levels.
- Eat a banana for the potassium.
- Stretch every day and certainly after exercise or playing.

Cramp varies from person to person. Some things work for some people and not for others. Experiment with how much you drink (don't overdo it as this can be highly dangerous) and what you eat.

Part 8: Other Fitness Tips

5 Ways to lose weight in time for the cricket season

Cricketers, more than any sportsman, enjoy their food. After all, the game is built around lunch and tea. So it's no surprise that most players will be carrying a little extra weight after the excesses of Christmas.

Don't panic, you can lose those pounds before the summer arrives.

1. **Set a goal**. Just aiming to lose weight is not a goal. Set yourself a specific target of how much you want to lose in how long. Make it realistic, it takes time to lose weight, especially when you first start. If you are really going for it you might want to get your body fat percentage done (most gyms will do this for you) as this is a far more accurate measure of how fast you are than your scales weight.
2. **Burn more than you eat**. Everyone loses weight if they eat fewer calories than they use. Sign up to an online weight tracker like fitday and fill it in honestly every day. Aim to burn around 500 calories more than you eat every day for guaranteed weight loss. (NB. It's also important to get enough protein even when you are eating a bit less, so make sure you have at least 1g of protein per kg in body weight).
3. **Lift weights**. Strength training reduces your risk of injury on the cricket pitch, makes you a more powerful player and boosts your metabolism far more than sitting on a stationary bike. It's a great time to start working on your strength for the start of the season and if you weight train 3 times a week the fat will come off in plenty of time for April.
4. **Run in intervals**. Running in short, fast bursts is more cricket specific and better at burning fat than long, slow training. If you can fit it in, take 10-20 minutes, 2-3 times a week to go on an interval run. Ideally this is done on grass, but anywhere will do.
5. **Play Cricket**. Preseason nets may have already started for you. If not, then you can always pay for some coaching to get yourself started. Make sure your club net is well run and includes some elements of fitness drills as well as skills training. Fitness drills are fun these days, great for weight loss and leave you feeling tired but invigorated.

Weight loss is a huge topic and there is a lot of snake oil offering instant results. Avoid that and stick to these 5 tips to get you started.

If you need any more specific advice or have any feedback please drop me an email.

Cooling down after cricket

If you have ever hung around after an international cricket match you will see a strange sight: The players will get themselves back onto the field to do even more exercises and stretching.

They are cooling down. You have probably heard about cooling down before but never done it yourself.

In fact, as high performance players prove, the cool down is an essential part of improving your cricket.

Why is cooling down so important?

Cooling down after a game helps your body return to normal after the stresses of batting, bowling and fielding. This speeds up your recovery time for the next game.

When you exercise, you body suffers damage (even when you don't get an injury) and builds up a waste product called lactic acid.

When this happens, your muscles start to feel sore.

Muscle soreness is not only annoying, it stops you performing at your best, increases your risk of injury and may even stop you training.

Cooling down reduces the amount of soreness you feel by gently removing the buildup of lactic acid and provides your muscles with nutrients to help them repair themselves, allowing you to recover more quickly.

Think of it as a gentle wind down instead of a sudden stop.

So before you jump in the shower after training or a game, make sure you spend a few minutes recovering.

What makes a good cricket cool down?

A good cool down need not take long. The pros may take half an hour or more over it but you can take far less time.

At the end of a training session, innings or game does the following:

- **Gentle Warm Down**. 5-10mins. I find a gentle walk or slow jog around the outfield does the job
- **Static Stretch**. 5-15mins. Pick a few stretches that are static (i.e. you don't move during them) and concentrate on relaxing the muscles as you stretch for at least 30s per stretch.
- **Refuel**. Have some water or an isotonic sports drink, you can have a healthy meal (low fat, pasta, rice or potato based) or you can snack on food that gives instant energy (like bananas).

The important 6%: How to be fit for cricket when it counts

On average, cricketers spend 94-96% of their time in the middle standing or walking, something most players capable of without training. But it's the 4-6% you need to be training for if you want to play your best. The trick is to get your training to reflect cricket: short duration bursts of very intense activity with a long recovery time.

However, cricket also requires different physical skills and to train each skill requires adjustments to the amount of time you recover for.

Below is a table that gives you the recovery times for each training method based on your particular goal. Use this table to adjust your own training to ensure you are working in the 4-6% range that cricket requires

Rest Times for Cricket Training

Goal	Method	Btwn Sets	Btwn Workouts
Strength	Weights	60-90s	40-60h
Speed	Sprints	3-5m	30-40h
Power	Weights	2-3m	48-72h
Agility	SAQ Drills	2-3m	36-48h
Endurance	Intervals	30-60s	8-30h

For more on the fundamentals of each skill please look at my complete guide to cricket fitness.

What about jogging to get for for cricket?

You will notice I did not mention long, slow jogging as a method here. If you are a regular reader you will know that this is because slow running simply does not represent the key 4-6% that we need to train. Some might argue that we need to jog to develop the 94-96% part of the game. In my view you would have to be very unfit to have to train yourself to stand and walk. Research has also shown that slow running slows you down. Not something you want when running a quick single.

Can fielding drills get me fit?

I have mentioned the power of fielding drills to get you fit in the past. They directly train the 4-6% in a perfectly specific way for fielding. The key to drills is to know what you are training for when you do them. You have 3 options:

- **Speed/Agility**. When training for speed/agility you need to ensure the distances covered are relatively short (20-40m) and the skill performed in the drill is simple to allow fielders to concentrate on running at full pace. The more direction changes the less straight speed and more agility is required. Recovery time for each person should be long (2m+) but a well designed drill can allow for this. A good rule of thumb should be that each player feels fully recovered before repeating the drill.
- **Endurance (or work capacity)**. Compared to speed drills, these are done at below full speed and over longer distances (100m+). Due to the distance required the drill will usually have a run followed by a skill element followed by another run. Sudden direction changes should be minimal and recovery time should be much shorter (30-60s). Players should still be out of breath when repeating the skill.
- **Technique**. Technical drills should be much lower on intensity. Here the focus is improving the skill itself (throwing, catching, pickup, etc). There should be a large focus on the actual skill with very little emphasis on fitness. This method is the type used with younger players in group coaching sessions the most.

While the first 2 methods will improve your fitness (speed, agility or endurance) for all skills it is still highly specific to fielding. If you also bat and/or bowl then you should not rely on fielding

drills alone to get you fit. To really finish off your training ensure you are playing lots of practice games too as this will be the most specific way to get fit for cricket.

5 reasons for a cricketer to join a bodybuilding gym

I just joined an ‘Old school' bodybuilding/power lifting gym and it's one of the best decisions I have made for my game.

A spit and sawdust gym might not seem an obvious place to start improving your performance in the middle. In the few short weeks I have been there I can say it has had nothing but a positive effect. Here is why:

1. **Equipment**. Unlike most gyms, these types of gyms have plenty of equipment that is best for your game: Free weights. There is little in the way of cardio equipment to slow you down, just heavy stuff you can lift up to improve your speed and power.
2. **Motivation**. The guys in my new gym are strong and they look it. I can't think of anything more motivating to be able to walk into a gym like that knowing you can lift a good amount of weight for your size. Sure it might take some time, especially if you are a beginner but it's a challenge and the competitive minded love that.
3. **Advice**. Go to the right gym and you can get some incredible advice from people who have been training all their adult life. Need technical tips or ways to improve your strength? Some of the people you meet in the gym have amazingly deep knowledge. A word of caution though, some advice can be misinformed. Always check your source before adapting your training.
4. **Testosterone**. OK this one is for the boys (although girls you should be going to these gyms too). A good weight workout with free weights is one heck of a manly pursuit. You feel great and ready for anything after a new personal best on the squat.
5. **Results**. The best reason for using a gym like this is simple though. If you go regularly you will get stronger and faster more quickly than any other way. And we know the stronger and faster you are the better you will be at cricket.

How is match fitness different from gym fitness?

> "Batsmen need to bat under match conditions and bowlers need to bowl under them, something that seems forgotten in the gym-bunny culture. Instead, fitness as measured by pulse-rates and bleep tests, is being confused with being match-fit - being ready to compete with an opponent rather than a dumbbell."

Former England bowler Derek Pringle snarled at England's lack of match preparation in the Telegraph newspaper.
He is right to look for reasons as England failed with both bat and ball. The question I have is this: what's difference between competing with an opponent and competing with a dumbbell? More importantly, how can we as cricketers use this information to our benefit?

Gym culture: The case for the prosecution

One of the fundamental principles of training is called Specific Adaptation to Imposed Demand (SAID). That means if you want to get fit for cricket you need to play cricket. The only thing you get better at doing press ups is doing press ups.
Playing under pressure also teaches you to play under pressure. We have all seen those batsmen who look incredible in the nets only to go into their shell in the middle. The difference is purely psychological and the only way to deal with this is to play in matches.

Gym work also gives players the wrong focus. Rather than training to improve their cricket performance the focus becomes on training to become better at the tests. Lifting more weight or getting a better beep test score becomes an end in itself rather than a means to an end.
That's not to say players should do no training in the gym. It's just that when fitness work becomes the focus rather than playing cricket it leads to poor form on the pitch.

Gym culture: The case for the defense

I'm sure even Derek Pringle would not argue against strength training totally. We know the benefits of regular exercise for health and performance: Fewer injuries, more power, more speed, better concentration, better recovery times and better body composition.
It's all too easy to make this an either/or situation: That cricketers should either play or matches or visit the gym. The fact is that both are important if you are serious about success.

Playing lots of cricket is important to success. The more you bat or bowl under serious competitive elements the better you get at it. But cricket also causes imbalances in our muscles that without fitness training can lead to increased chance of injury. The right fitness work can correct those errors before they become injuries, particularly with bowlers.

Additionally, training itself is a mental challenge. It's tough to keep going to the gym for an extended period and keep improving. You are in competition against yourself and that is just as important when you get on the field. Also, fitness training is something you can control and measure accurately. You can't measure how ready you are to compete as accurately.
Of course, you need to do the right sort of fitness work. With all training that is not specific there will be a certain amount that doesn't cross over to the pitch.

However, some things are universal to almost any sport: sprinting, jumping, changing direction quickly and striking are far more similar than different. After all, if you can run fast you can run fast playing cricket, hockey, football or chasing the bus.
In short, the difference between the gym and matches is the former gets you fit to play, the latter makes you play to get fit.

7 questions you should ask while choosing a gym

What image does the word gym conjure up for you?

A hi-tech, confusing torture chamber filled with beautiful bodies?

A sawdust covered floor where massive muscle marys are taking turns to swap pumping iron and pumping steroids?

Perhaps.

Or maybe it's somewhere that you can get fit for cricket. You already know that I think a gym is an essential place for almost all cricketers, so what is the ideal gym for cricketers to go to?

If the truth be told, the answer will be different for individual players. Everyone has different requirements and facilities available to them.

All I hope to do is show you the options and help you decide what works best for you.

But before we get to the 7 things to look for, let's take an overview of the gym world:

Types of gym

Essentially there are 3 types of gym:

- **Luxurious**. These gyms are the places that give you everything: Fitness, pampering and excellent service. Usually part of a chain, they often have lots of extras like a spa, pool and grooming. The gyms tend to be based on weight loss rather than strength and conditioning, but often there are excellent instructors.
- **Hardcore**. The hardcore gyms tend to go for bodybuilders, power lifters and other serious trainers. They are independently run and have great free weight facilities and hardly any running machines. My local Spit & Sawdust gym has 1 stationary bike for example. The instructor quality is more varied.
- **In-between**. Most gyms are somewhere between these 2 extremes. Some start out as hardcore and expand, some try to appeal to everyone. Each one will be slightly different.

What should cricketers look for in a gym?

Now you know the 3 types, you can go to your local gyms armed with the following questions:

1. **How far is it from my house?** If you have to go out of your way to get to the gym you are less likely to go. Choose somewhere that is conveniently near your house or work. I'm lucky that I have two gyms within walking distance. That would be ideal.
2. **What are the opening hours?** We all have busy lives. It's no good joining a gym that will be closed when you can go. It's also pointless paying extra for a gym with long opening hours if you know you will always be there a 5pm.
3. **What is the staff like?** Do the instructors have an awareness of the specific requirements of cricket or are they trying to fit you into their mould? Ask what sport training they have done with others and what kind of training they think is best for you. Find out how friendly and prepared to help the instructors are by chatting to them.
4. **Is it clean and safe?** Look around for equipment that is out of order and make sure you check the changing rooms. If the place is dirty and unsafe steer clear, but that doesn't mean avoid a gym if it is a bit rough round the edges. Many excellent independent gyms run on a shoestring.
5. **What are the members like?** Take some time to talk to the people working out. Are they friendly and interested? What is the general atmosphere like? If you don't feel comfortable you won't go back even if you join.
6. **What equipment do they have?** As a cricketer you will not have much need for stationary bikes or rowing machines, although treadmills can be handy. Do they have a few light weights only or are you amazed by the size of the squat rack? Ideally you will be looking for a good range of free weights or weight machines.
7. **How much is it?** Luxurious gyms cost a lot more but you get plenty of facilities. You might like to have a spa or masseuse on hand, in which case paying more is sensible, but don't pay for things that you are not going to use.

How to get cricket specific in the gym

If you have ever been to a gym to improve your cricket fitness you have probably been frustrated by the lack of cricket specific knowledge the instructors have.

Fortunately, designing your own workout is not as hard as it seems.

While I would always recommend you work with a personal trainer who understands your own individual needs, it's not always realistic. So instead you can adapt this excellent strength training program.

It's designed to work your whole body including your core and will improve your cricket strength and power by building on many of the 10 principles of cricket power. (See your doctor before embarking on any exercise program.)

The idea is simple: Pick 6-9 exercises, minimum of 1 from each group. Do 3-5 sets of 5-10 reps of each exercise and do the workout 2-3 times a week:

1. Quick Lift
2. Squatting
3. Center Body Pulling
4. Pressing
5. Upper Body Pulling
6. Rotational Work
7. Abdominals

For demonstrations of the exercises, take a look at exrx.net

Ideally you will pick exercises that are single leg (such as lunges), single arm (dumbbell bench press) and do plenty of rotational work. These are the most cricket specific parts of the workout. You can vary the sets, reps and exercises as much as you like.

It's a straightforward planning method that is proven to give results, especially as part of your pre-season preparation. To avoid getting stale, change the workout around after 4-6 weeks.

As always, warming up and cooling down are vital and so is making sure you do interval running for speed and endurance work.

10 common cricket training mistakes

You can separate cricketers into two groups: Those who train and those who don't. Both groups make some common mistakes.

Ideally, I would love to see everyone training in some way or another. But even the die-hard non-practices, can do some simple things to improve their game.

It's all about knowing what to avoid.

1. **Not warming up**. The warm up is not only about injury prevention. A good warm up improves your performance by mobilizing your key muscles so they can be used both more quickly, powerfully and with better timing. That means a good 15-20 minute warm up is vital before every session or match if you want to get the best from your skills.
2. **Warming up badly**. Almost as bad as not warming up, a bad warm up can slow you down and cause injury. That means making sure you warm up for long enough before you pick up a bat or ball and don't do any static stretching (as it reduces performance).
3. **Playing without a goal**. Going to nets or a game without a goal is not a very effective approach. It's far better to know what you are aiming for. In tests, the people who did the best were those who set goals compared to those who just tried their best.
4. **Avoiding fitness**. In the UK most people equate fitness training with boredom or pain. Neither needs to be true, despite what PE teachers might have put you through as a school kid. Good fitness training is both enjoyable and vital for your game.
5. **Being too specific**. Cricket is a game of skill, but just practicing cricket skills will not improve your general sport skills. That means vital factors like speed, agility, power and mobility are left to deteriorate, and with it your cricket ability.
6. **Not being specific enough**. It's vital to develop both cricket and general sport skills. It's counterproductive to train in ways that are not related to cricket at all. So leave the long, slow paced runs alone and keep heavy weight lifting to an absolute minimum.
7. **Not drinking enough**. Dehydration is a major cause of performance loss. However, hardly anyone drinks enough in training or play. It can be difficult to do, but aim to drink a small amount every 30 minutes during play with 1-3 liters in a day.
8. **Staying the same**. Different times of the year call for different approaches to training. If you train the same all the time your body and mind will get used to the training and you stop

improving. Also, you may be putting too little or too much strain on your body without a parodied approach.

9. **Doing too much**. Younger club players can easily play cricket every day in the summer. Older players can be playing 3 times a week, going to the gym and training with the team. It's almost as easy to do too much as too little. So make sure you have a rest at least once a week.
10. **Giving up after failure**. If you drop a catch in the slips you may tell yourself you are a bad slip fielder, if you are not getting results quickly in the gym you pack it in. In fact, failure is an indicator you are learning. Good players keep trying.

9 Ways to improve your cricket fitness

Recently I was lucky enough to speak to Michael Boyle, one of the foremost experts sport strength and conditioning in America.

Michael was kind enough to give me a series of tips for cricketers at any level who want to improve their game by being stronger, faster and more powerful.

1. **Train for speed and power**. Cricket is a sport built on fast, powerful movements. Michael was quick to point out that this is what you need to train: "Long runs won't help with cricket. Neither will the light weights and lots of reps crap. Train like a speed and power athlete."
2. **Workout at least twice a week**. Recreational cricketers often have limits on their training time. Outside of skills practice Michael recommends two total body workouts per week. This will give you the most bangs for your buck even when you don't have a moment to spare.
3. **Don't avoid 'functional' training**. For Michael, Functional training is not about balls and bands and balance: "It's about concepts that make sense". He explains these concepts in his book with the basic idea that all training is based on the way your body is used during competition.
4. **Eat for endurance**. Michael is also quick to put aside the need for cricketers to develop endurance for long days in the field. "Train for speed and power. Eat for duration." That means looking at how well you are fuelling yourself: "Check out John Berardi's stuff and look into Cytofuse."
5. **You can never have enough speed or power**. I have never heard a commentator say a player is too fast or powerful for cricket. It's an excellent aim to become the best at both in your club. This is an idea Michael believes in too: "The most important factor in sports in strength, second is speed. Most people don't have enough of either."

6. **Beware of CNS fatigue**. Central nervous system fatigue may occur in athletes who have been training hard for 2 years or more. Put simply, no matter how hard you train improvements don't come. If you are in this situation Michael has simple advice: "I think less will be more for some experienced trainees."
7. **Bowling isn't done with the arms**. "Bowling is done with the legs and core, not the arms." He tells me. Power is certainly from the ground up (just try throwing a ball in a canoe if you don't believe that) then is transferred through the core. That means inefficient legs, trunk and shoulders means slower bowling. Again the answer is simple: "The key is to train the lower body."
8. **Use a medicine ball**. Michael calls medicine ball training plyometrics for the upper body. A med ball is a worthwhile investment for anyone who throws or bowls to prevent injury and improve power. You can get a DVD on training with a med ball from Michael's site.
9. **Stand out from the crowd**. Michael has worked with baseball players and boxers whose sport has no culture of fitness training. His advice is to keep educating. That means standing out from the crowd: Warming up and cooling down even if nobody else will and making time for fitness in between games.

   This is sound advice from a coach who comes from outside of cricket but with a spotless reputation. Michael has many years experience of getting the best from athletes in a range of sports.

Now you can train on match days too

How do you feel about training on match days?

For many club players the only warm up they do is smoking a cigarette and the only cool down is raising a pint to their lips.

But many others would like to make more of match days without dropping in performance. Here are 7 things you can do on the day of a match that will have a positive impact.

1. **Go for a swim**. Gentle, low impact exercise first thing in the morning is a great way to wake you up and prepare for a hard afternoon in the field. The important part here is to work hard enough to get your systems firing, but not so hard to kill yourself. The ideal is 15-20 mins but that can vary depending on your fitness. Don't go running though.

2. **Work on technique**. Traditionally technique work involves having a net. Ask yourself if this works for you – especially if there is no coach available. Without someone to help you develop you can't improve your technique. Instead you could work on your running technique through running drills. This will improve your speed in the middle.
3. **Improve timing**. A net is a great way to work on timing (or rhythm for bowler). I always like to have some sort of practice before going out, even if it is just this timing drill. That way your muscle memory is already firing and you can play shots right from the start rather than having to get used to the feel again.
4. **Warm up and cool down**. This one is a no brainer. Warm ups are proven to have a huge impact on performance if done correctly. So get yourself ready for play with at least 15 minutes of warming up. A reduced warm up if you are taking the field 2nd is also highly recommended. The cool down is also vital for recovery.
5. **Develop mental strength**. If you are waiting to bat you can spend time developing your mental strength. Simple imagery techniques and self talk work especially well at putting you in a confident frame of mind. You can even do this work on the pitch, especially if you are grazing at fine leg.
6. **Take out your frustration**. If you are batsmen who has got out you will probably be a bit peeved. If you are batting second you don't have any way to vent this apart from maybe shouting at the dressing room wall. Instead, why not use that aggression to have a workout? You can use bodyweight exercises or (if really organized) have some dumb bells in your car ready for you to pump out all the excess energy.
7. **Do a mental review**. The best players are able to go over their performances and pick out the good stuff to recall and the bad stuff to work on. Take a few minutes when you have a chance to sit down with a pen and review every detail of the game. You will find areas you are pleased with that you can use for imagery recall and areas to improve that you can work into your yearly plan.

Do you worry about training too hard?

Commitment, desire and hard work.

These are all valuable traits in a cricketer. Look at Steve Harmison. After a nightmare in the first Ashes Test he put in extra hours to sort out his action.

It stands to reason that he should do this. After all, the harder you train the more results you will get.

To a point anyway.

You see it's very easy to overstrain if your cricket commitment gets the better of you.

For most club players, this isn't a problem. They don't train much, if at all. It isn't that they are not committed to winning on the day of the game, it's just that does carry over into the week.

But for a few, especially younger players with ambitions of turning professional, there can be no time to rest at all: Several games a week, training sessions and fitness work can build up.

Before you know it you have trained too hard and it's reducing your performance.

Know the signs of overtraining

If you training hard at the moment then ask yourself if you are overtraining.

You might feel tired all the time, you can't train as hard as you used to or you constantly have a cold.

More than 2 hours a day with no rest days in a week is too much. You owe it to yourself to take at least one day a week as a rest day, and take the time to work in weeks in your training when you are not pushing yourself (just cut back on the intensity for a few days).

If you are worried about overtraining and your performance has dropped recently then the answer is simple: It's time to take a rest to recover.

Cricket fitness for older players

Cricket is a great game because you can continue to play it long after you have had to give up other sports. International players can go on well into their 30s (or 40s) and many club players are still turning out in their 60s.

The older you get the harder it can be to maintain your own high standards and the more you need strategies and tips to keep playing at your best.

This week I will be covering these tactics in detail to help you continue to perform at as high a standard as you can muster as you move from talented youngster to hardened campaigner.

What is an older player? Anyone who has passed the first flush of cricketing youth can benefit from this series. At the more youthful end you will probably be in your late 20s and the sky's the limit at the other end. The older you are the more you can benefit.

Here are the topics:

The importance of eating well
what are the risks of getting older?
Mobility and balance
When to retire from cricket

If you enjoyed this series, subscribe for more free cricket tips.

Improve your cricket stamina

Everyone who has played cricket has felt that 'heavy leg' feeling. You want to keep going, but the body just doesn't give you the same after a long innings, bowling spell or session in the field. While no one can stave off the feeling forever, there is a really simple way to get more stamina. And it doesn't require you to spend hours in the gym staring at a screen as you run on a treadmill like a rat in a science experiment. But be warned: While it's fast and simple it certainly isn't easy.

The method

This method is based on the well-established idea that cricket is a stop-start game so your training needs to be stop-start too.

But, you need to cram in more work in less time because you can't reflect bowling a 10 over spell of batting for an hour very easily.

It can be done at home or in the gym, with a barbell, dumbbell or anything that you can hold and lift up that has weight (small children perhaps not recommended)

So, you pick an exercise from:

- Squat
- Dead lift
- Bench Press
- Shoulder Press

Pick a relatively light weight (if you know it, about 30% of your 1RM) and perform 10 reps.

Rest for 30 seconds.
Repeat for 5 sets.
Sounds pretty easy, right?
It isn't.

The first set is OK. The second is hard. The third is a struggle. The forth is pain and the fifth is suffering.

With such a short rest time, your muscles won't have time to recover from the last set, making each one harder until each rep is like you are suddenly 80 years old. Or 8 years old. Except people of those ages won't curse as much as you.

The beauty is the simplicity.

You can do the movements anywhere, even after a heavy lifting session in the gym or training session at the cricket club.

In can be done during the season to bump up your stamina if you are not playing much, or in the off season as part of a fat loss or conditioning plan.

The only hard part is actually doing it.

But if you do you will feel the effects on the park with increased stamina and work capacity. And who doesn't want to be a bit fitter?

For more conditioning and fitness tips enroll on the online coaching course: ***Strength and Conditioning for Cricket at all Levels*** *by county strength coach Rob Ahmun.*

1. Squatting

Believe the hype about squats you hear from your strength training obsessed friends.

Squats are the fastest way build strength in the legs and strength means more power with less injuries. They are also a powerful way to improve mobility in the hips.

But squats are misunderstood. Meathead gym rats insist they only count if you have a bar on your back and at least 3 plates on either side. Bad personal trainers, meanwhile, insist anything bigger than a pink dumbbell will blow you up to the size of a house.

The truth is that squat is a powerful and flexible exercise that is adaptable to your needs as a cricketer. It's just a matter of picking the right squatting tool for the job.

The main types are:

- Barbell back squat. Used mainly in the winter to build up strength with low reps.
- Barbell front squat. A more difficult version of the back squat that focuses on core strength. I admit I prefer this version to the back squat even though you can't squat as much weight.
- Goblet squat. An easy way to start squatting. Teaches you the correct technique of "sitting back" and getting your thighs low.

- Bodyweight squat. Best used for conditioning as part of a bodyweight circuit or similar. It can also be put into a warm up.
- Split Squat. A more cricket specific version of the squat as it builds strength on one leg. You can go heavy with a barbell, train the core more with a dumbbell or kettlebell, or just use bodyweight.
- Single Leg Squat. A way to learn body awareness (which prevents injury). To squat this way well you need to be both stable and mobile as you move your body.

And, er, there is not much cricketing reason to squat on a BOSU ball or Swiss ball; unless you are a clown during the week that is.

2. Deadlifting

The deadlight is for the hips what the squat is for the knees; more strength, mobility and stability. It's one of the most natural movements we do: bending down and picking something off the floor. Despite that, it's rarely trained to be strong and efficient.

I think this, again, is due to the bad image of deadlights. It's not just for bodybuilders and power lifters bending the bar with huge weights. Heck, even granddads have to bend down to pick stuff up.

For cricket the best variations are:

- Barbell Dead lift. Hard to learn with proper technique but when mastered can strengthen the muscles in your lower back, bum and hamstrings.
- Trap Bar Dead lift. Less popular but slightly better version of the barbell deadlight. It's better because it's much harder to do with poor technique so there is less injury risk. Go heavy with good form and low reps.
- Stiff Leg Dead lift. A simple way to overload the critical 'hip extension' movement that we see in running, so good for injury prevention. Is better done as a single leg exercise (the movement is closer to running). Can be done with dumbbell, barbell or kettlebell.

It's tough to train the deadlight movement without any equipment at all, but you can train hip extension without dead lifting. If you have no access to equipment try the cook hip lift.

The single leg, straight leg deadlight done without weight can also be used as a way to groove the movement if you throw it into a warm up or light session.

3. Pulling

I'm not talking about going to bars and chatting up lovelies here. Pulling exercises improve your cricket.

The right choices of exercise will stabiles your shoulders. This allows you to generate more power throwing, bowling and striking the ball. Strong back and shoulder muscles also prevent injury.

Then there is the added benefit of bicep hypertrophy or, as we sport scientists call it, providing a couple of tickets to the gun show. That one is for the ladies rather than the runs and wickets.

The best upper body pulling exercises for cricketers are:

- Chin ups/pull ups. Hard to do but the king of horizontal pulling exercises. If you can't do one unassisted use one of these assistance tricks until you can. If you can, crank them out at least once a week. You shoulders will love you forever.
- Rows. Rows train the movement of vertical pulling. This is important for overall shoulder health, and also to balance out the more popular pressing movements we talk about later. You can row in a number of ways: with a barbell for compound strength, with a seated machine for scapular retraction, with a dumbbell or kettlebell to focus on one arm, with a suspension trainer for increased core strength or as barbell inverted rows. Each has slightly different benefits, but any variation will do.

  Like dead lifting, training pulling without any equipment is impossible. You either need something of a suitable weight to pull, or something of a suitable height to pull your body towards. An overhanging tree branch might be enough, but you do need something.

4. Pushing

And if we pull stuff, we have to push stuff to balance it out. So while upper body pushing is the least applicable to cricket skills, it's just as vital to make sure we don't have any imbalances between the front and back.

(The more imbalance you have, the greater the risk of injury).

It's important to remember that balance thing for another reason too. It's much easier to do pushing exercises (you can do push ups anywhere) and most men like the results of bigger chesticles to look at in the mirror (c'mon admit it).

Those two facts mean you focus too much on pushing, leading to the dreaded imbalance.

So while important, you need to tread carefully with these exercises:

- Bench press. When done correctly, bench pressing is a solid exercise for building all round strength and shoulder stability. Vary the methods often between barbells, dumbbells, grip position and incline, but don't try and cover every angle in one go.
- Push up. Push ups are not as good for sheer strength as the bench press, but are superior in many other ways. Push ups strengthen the core because you have to keep your stomach braced while doing them.
- Overhead press. Pressing above your head is not strictly vital but for complete balance you can throw a few sets in if they don't hurt (they can do if you have a bum shoulder). Use a barbell with a higher weight and low reps for strength and dumbbells with a neutral grip as a variation.

I've thrown out a lot of variations in this article. That's because there are a lot of exercises to choose from. But the important thing to remember is that the exercises are probably the last thing you look at when picking up an exercise programmed. They are the final pieces in a bigger jigsaw that is based on goals, available equipment and the time of year.

But when you drill down to the detail, picking these exercises over more traditional bodybuilding style isolation moves with save you time in the gym and yield better results on the pitch.
