

101 FITNESS DRILLS FOR RUGBY LEAGUE

© Tim Rodgers 1993

All rights reserved. No part of this book may be reproduced in any form without the written consent of the author.

ISBN 0 – 646 – 15130 - 4

About the author;

Tim Rogers has a degree in Sports Science and is a certified Strength and Conditioning Coach. He has worked as a conditioner for the South Sydney Rugby League Club as well as working as a fitness consultant in a number of sports including cycling, soccer and track and field.

ACKNOWLEDGEMENTS

The author would like to thank the following people in particular for their guidance and contributions to this book:

Paul Batman, Peter Corcoran OAM, Tony Piddle, Ray Rich, Tony Rich, Tracey Fielder, Andrew Richardson and Peter Calvitto for the illustrations.

The following people I thank for their support and guidance throughout – Dr Peter Abernethy, John Argell, Colin Berwick, Richard Beesley, Tanya Blundell, Scott Campbell, Mark Carroll, Tom Cockings, Kyle Connor, Frank Curry, Matt Fuller, Rod Gorman, Peter Johnston, Greg Keenan, David Keir, David Lyons, Bob Manns, Peter McDonalds, Henry Morris, Martin Sanders, the late Bruce Walsh, Lyn Watson, Dr Bruce Wilson, all the guys from Uni and my family.

For Lizzy and Darrell

The ARL appreciates the author's permission to reprint this publication - 2006

Contents

	PAGE
ACKNOWLEDGEMENTS.....	1
FOREWORD	3
CHAPTER 1	
Planning a Training Program.....	5
CHAPTER 2.	
Organising a Training Session.....	10
CHAPTER 3.	
Fitness Testing.....	15
CHAPTER 4.	
Fitness for Kids.....	18
CHAPTER 5.	
Aerobic Endurance	22
CHAPTER 6.	
Anaerobic Endurance.....	29
CHAPTER 7.	
Agility.....	36
CHAPTER 8.	
Power	43
CHAPTER 9.	
Speed	52
CHAPTER 10.	
Maintenance Training.....	61
CHAPTER 11.	
Weight Training	66
CHAPTER 12.	
Warm Ups and Cool Downs	73
SAMPLE TRAINING PROGRAMS	78
GLOSSARY	81
APPENDIX	82
BIBLIOGRAPHY	83

Foreword

THE FITNESS DEMANDS OF RUGBY LEAGUE

‘A
Successful
Rugby
League
player
must
develop
the fitness
characteris-
tics
that the
game
requires’

Rugby League is a very intense, physically demanding sport, made up, at the senior level, of two very exhausting halves. In a game of Rugby League, a player will become involved in bursts of high intensity work with short recovery periods. These work periods may include running the ball, chasing an attacker and tackling. The recovery period is the time between performing these activities, where lower intensity activities are carried out. The length of the recovery will vary, depending on what is happening in the play.

A successful Rugby League player must develop the fitness characteristics that Rugby League requires. These characteristics are aerobic and anaerobic endurance, agility, power and speed. The players who develop these areas will be able to cope with the physical demands of the sport and perform the tasks involved both efficiently and effectively.

In a game of Rugby League, aerobic endurance is very important. Players who have good aerobic endurance are able to recover from intense bursts of activity quickly. As the speed of Rugby League has increased in recent years, the ability to recover quickly has become very important. A player will also have better concentration and maintain a higher level of skill for the entire game. This will allow the players to perform to their best for the entire game and be of more value to the team. Aerobic endurance will be discussed in greater detail in Chapter 5.

A player must also have good anaerobic endurance. Players who run for an extended period, such as chasing a kick and then running the ball, will call on their anaerobic endurance. Faster play-the-balls and the greater distance the defensive line is from the play-the-balls have increased the importance of anaerobic endurance. Anaerobic endurance will be discussed in greater detail in Chapters 6.

For a Rugby League player agility is essential. Agility allows a player to change direction quickly, react to an opponent, and out-maneuver the opposition. Agility is required in defence when a player adjusts their position in the defensive line. Agility will be discussed in greater depth in Chapter 7.

Power has become a major component of Rugby League for players in all positions. A player must be able to withstand the heavy body contact experienced in tackling and running the ball. Activities such as jumping for a ball, tackling, breaking tackles and sprinting require power. There are two chapters in this book that discuss resistance training for power.

Speed is another fitness characteristic important in Rugby League. In recent years, the importance of speed in all positions has become greater. Activities such as sprinting with the ball, sprinting after an opponent and chasing a kick require speed. This area will be covered in Chapter 9.

In addition to developing these fitness characteristics, they must be maintained throughout the entire season if players are to perform at their best. This type of training, known as maintenance training, will be discussed in greater depth in Chapter 10.

Important points to remember;

- Rugby League has many important physical demands.
- These demands are known as aerobic and anaerobic endurance, agility, power and speed.
- All of these demands need to be developed to achieve the highest level of fitness.

T raining

PLANNING A TRAINING PROGRAM

‘Proper
Planning
of
training
is
essential for
peak
performance



properly planned training program will allow a player to develop and maintain the many different fitness characteristics needed to play Rugby League. These characteristics, as stated in Chapter 1, are aerobic and anaerobic endurance, agility, power and speed. Proper planning of training is essential for peak performance.

ORGANISATION

The first step that must be made in designing a training program is to identify the pre-season and season proper. The season proper is determined by the organisation in charge of the competition. A season will last anywhere from eight to 26 weeks. The time a team sets aside for pre-season training will vary depending on the time available and competition level. Teams over 16 years need to set aside from eight to 16 weeks for pre-season training. Younger teams need to set aside from 5 to 8 weeks. It is in this period that the bulk of fitness training will occur.

The next decision concerns how much time should be spent on training each week. This will depend on the age of the players, the level of competition and the time available to the players for training. Teams should allow at least two to three hours a week, divided into two, 60 to 90 minute sessions. Teams with players under the age of 16 needs less time for training and have shorter sessions.

Finally, you will need to address the question of what facilities are available to your team. This will normally depend on the club's financial situation. This book is written for the club that has minimal equipment and facilities and requiring as little as a stopwatch and field markers.

THE TRAINING PROGRAM.

An effective and efficient training program should be divided into three phases. The first phase is the preparation phase and lasts from four to eight weeks. The second phase, known as pre-competition, should be carried out over four to eight weeks also. The pre-competition phase should lead up to the first competition game. The third phase is the season proper.

N.B. Preparation and pre-competition phases for younger teams are outlined in Chapter 4.

1. Preparation.

The preparation phase of training is very important. It is in this time that the coach gets an understanding of the fitness level of the team. Poor or inadequate training in this period may result in the players not achieving peak fitness and therefore, not play to their best.

The first fitness characteristic that must be addressed is aerobic endurance. A Rugby League player with good aerobic endurance has better concentration, keeps weight under control, recovers faster between efforts on the field and can continue to perform for 80 minutes.

Two to four weeks should be set aside to develop aerobic endurance. The length of time a team spends on this area will depend on the level of competition, time available to the players for training and the length of the season.

Once a good level of aerobic endurance has been achieved, the emphasis of training should shift to anaerobic endurance to allow a player to carry out sustained periods of intense activity, such as defending for long periods, chasing a kick and moving from attack to defence very quickly.

The development of anaerobic endurance should commence in the latter part of the preparation phase. Two to four weeks need to be set aside to develop anaerobic endurance.

Late in the preparation phase, agility training can commence. Acceleration and deceleration, change of direction, sideways movement and the ability to get off the ground quickly are skills that are important for the Rugby League player. Developing agility at this point in the training program will help to make ballwork training more effective. Agility training must continue through to the beginning of the season.

In addition to the fitness training that will take place, time must be devoted to skills training. Basic skills such as tackling, passing, kicking and catching, need to be practiced and improved. Younger teams should have a greater emphasis on skills than fitness. Even experienced players ought to spend time brushing up on even the simplest skills involved in the game. REMEMBER, fitness training is in addition to, not instead of, skills training.

2. Pre-Competition.

The pre-competition phase will commence at least four weeks before the start of the season proper. Fitness training, in this phase, becomes more intense and moves from basic, to more specific activities.

Drills to increase power can begin to be introduced early in the pre-competition phase. A player with greater power has increased speed, can break tackles and can tackle more effectively. Power drills are very intense and must not be overused. Power training should continue through to the start of the season. N.B. Weight training, to increase strength and power, is discussed in Chapter 11.

At least four weeks before the beginning of the season, start training to increase a player's speed. Speed is important to any Rugby League player, regardless of position and will make a player more effective in both attack and defence. Speed training will continue through to the beginning of the season.

During the pre competition phase, skills training should switch from individual and group skills to ballwork and team tactics. The time spent on fitness will decrease and the time spent on skills and tactics will increase.

Developing the fitness characteristics of Rugby League is carried out in a specific order. Developing aerobic and anaerobic endurance early in the program, agility, power and speed later in the program will lead to a higher level of overall fitness. The development of each area has a positive effect on the next. This order of training is to be followed closely.

3. Season Proper

During the season proper, the coach or trainer must try to maintain the level of fitness already achieved. This must be done to allow the team to perform to their potential throughout the competition.

Drills that are similar in action and intensity to the game, and do not reduce the time that should be spent on skills training, should be implemented. This type of training is known as maintenance training.

During the week, training sessions must be placed so the players are fresh for the game, on the weekend. Longer, harder sessions should be carried out early in the week and shorter sessions carried out later in the week.

Important points to remember;

- Proper planning of pre season training will achieve greater levels of fitness.
- The five fitness characteristics should be developed in a specific order; aerobic endurance, anaerobic endurance, agility, power and speed.
- Specific periods of time must be spent on each fitness characteristic to develop them fully.
- The training program should be broken into three phases; preparation, pre-competition and season proper.
- Training should be carried out throughout the season, to maintain fitness levels.

T raining

ORGANISING A TRAINING SESSION

‘The
coach or
trainer
should go
into every
training
session
knowing
exactly what
activities they
are going to
undertake’



properly designed training session will allow for both fitness and skill training to be carried out. Time should be set aside for both forms of training, as well as warming up and cooling down. Much younger players need to spend more time on developing skills. As players mature, the time spent on fitness should increase. The area of children's fitness will be discussed in Chapter 4.

The following sessions are designed for players 16 and over. A 90 minute session is used as a model. These sessions outline the time spent on different areas and in what order they should be carried out.

EARLY

Activity	Time
Warm up	10 min
Skills	40 min
Aerobic Endurance	35 min
Cool Down	5 min

LATE PREPARATION

Activity	Time
Warm Up	10 min
Agility	5 min
Skills	40 min
Anaerobic Endurance	30 min
Cool Down	5 min

EARLY PRE COMPETITION

Activity	Time
Warm up	10 min
Skills/Ballwork	40 min
Agility/Power/Speed	15 min
Anaerobic Endurance	20 min
Cool Down	5 min

LATE PRE COMPETITION

Activity	Time
Warm Up	10 min
Ballwork	50 min
Agility/Power/Speed	25 min
Cool Down	5 min

IN SEASON

EARLY IN WEEK

Activity	Time
Warm Up	10 min
Ballwork	25 min
Maintenance	20 min
Cool Down	5 min

LATE IN WEEK

Activity	Time
Warm Up	10 min
Maintenance	15 min
Ballwork	30 min
Cool Down	5 min

NB These sessions are only 60 minutes long. This is to allow the players to be fresh for the game and therefore perform better.

The times that are outlined in this Chapter involve activity only. Any address given by the coach should occur before or after the training session. Any comments the coach makes must not interrupt the activities that are occurring.

SESSION PLANS

The coach or trainer must go into each session knowing exactly what activities are going to be undertaken. A session plan should be designed to help guide the coach or trainer and will help keep the session flowing smoothly. These plans can be used for both fitness and skills training.

Important information is to be included on each plan. First the date, training phase and the aim of the session; next the design of the session should be included. All of the drills that are to be used - any diagrams and the time each drill will take, is recorded. Finally, an evaluation of the session should be included. This gives the coach a chance to decide if the session was of value and whether it will be used again in the future.

An example of a session plan can be seen on the following page. A blank session plan sheet is provided in the Appendix.

SAMPLE SESSION PLAN FORM

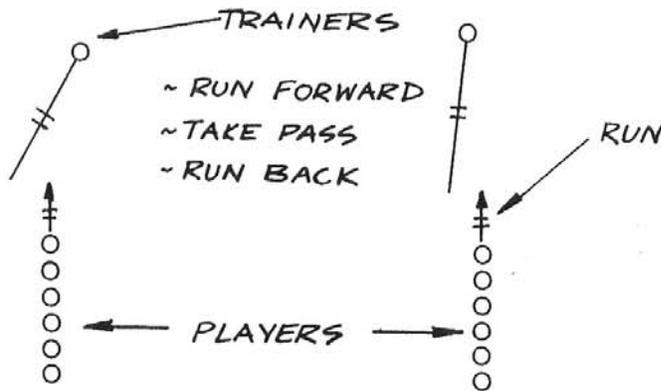
Phase PREPARATION Week No. 2
 Date 16/2/92

Session Aim - DEVELOP AEROBIC ENDURANCE - TRAINER
- PRACTICE BALL HANDLING ~ COACH

- Drills
- 1) WARM-UP ~ 'BAD HANDS' 10 MIN
 ~ 'STRETCHING'
 - 2) SKILLS - SEE COACH 45 MIN
 - 3) TIMED INTERVALS 3 x 2 MIN RUN, 3 MIN REST, LIMIT 600m
 45 MIN 3 x 3 MIN RUN, 4 1/2 MIN REST, " 800m
 3 x 2 MIN RUN, 3 MIN REST, " 600m

Diagrams

'BAD HANDS'



Evaluation _____

Important points to remember;

- Set time aside in each session to develop skills and fitness. The time spent on each area will vary throughout the pre-season and season proper.
- Training sessions should only involve training. Any address by the coach to the players is to occur before or after the session.
- The coach should have a plan of what is to occur in each training session.

Fitness

FITNESS TESTING

‘The
Aim of
testing
players is
to monitor
individual
improvements’

It is common practice for trainers to promote fitness tests to assess the progress of their athletes. Simple tests can be carried out on any Rugby League team, using minimal equipment. All that is required with the following tests is a stopwatch, tape measure and field markers. Fitness testing gives the coach or trainer a reference to how the training program is progressing and how individuals are responding to training. Test results are a guide only to a player's fitness and not to their skill level. Low scores in fitness tests should not be used to determine if a player is selected. They should help to demonstrate that certain areas of fitness need to be improved.

TEST PROCEDURES

The following are a sample of simple tests that a coach can use on his players.

1. Aerobic endurance - 15 minute run Test.

Using a track that has a known distance, such as a 400 metre running track, the players run as far as possible in 15 minutes.

This test is carried out at the beginning of the preparation phase and again after the aerobic endurance training has concluded, two to four weeks later.

2. Anaerobic endurance - Shuttle Test.

The players start by lying flat on their backs, at one end of a 10 metre track. On the command "go", the players jump to their feet, sprint forward to the other end of the track and hit the ground on their chest. They immediately jump up and run backwards to the start and go down onto their backs again. This counts as one shuttle. This is repeated as many times as possible for 60 seconds.

The shuttle test should be carried out before the first anaerobic endurance training session and repeated two to four weeks later.

3. Agility - 5-0-5 Test.

A five metre track is set out. The players sprint forward to the end of the five metre track and back to the start. The tester does not say "go", as the stopwatch is started when the player begins to move.

Carry this test out on two occasions. The first should be before the first agility training session and again just before the start of the season.

4. Power - Five double legged hop Test.

Each player begins with their feet parallel and shoulder width apart. They take five jumps, using the technique outlined in Drill 54, attempting to get as much distance as possible.

This test is performed at the beginning and the end of the pre-competition phase.

5. Speed - 10 metre sprint Test.

This simple test involves the players sprinting as fast as possible over a 10 metre course. The players begin from a standing start.

The 10 metre sprint test is undertaken before the first sprint session and again just before the season begins.

Recording the Results.

Each player is to be informed of their test results as soon as possible. They should be made aware of the units in which the results are recorded. These units are as follows;

1. ***Aerobic Endurance*** - Metres run in 15 minutes.
2. ***Anaerobic Endurance*** - Number of shuttles run in 60 seconds.
3. ***Agility*** - Time, in seconds, in which the test is performed.
4. ***Power*** - Distance, in metres, covered in five jumps.
5. ***Speed*** - Time, in seconds, in which the test is performed.

Player's results are not to be compared with the results of others. The aim of testing players is to monitor individual improvements.

Important points to remember;

- Fitness tests give an indication as to how a player is responding to training.
- The results of a fitness test should not be used as a selection criterion.
- Players are to be informed of how they went in the test as soon as possible.

Fitness

***FITNESS FOR
KIDS***

‘The
Most
important
thing about
fitness for
kids is that
it is
enjoyable’

The majority of the drills and information in this book has been aimed at players who are 16 years or over. However many players are younger. How then, should a coach go about improving the fitness of younger players? A number of factors must be considered in developing a training program for these players. Some of these factors include age, maturation, skill level and time.

The most important thing about fitness for kids is that it must be enjoyable. Kids don't like endless training that is physically draining. Fitness training, when it is required, must emphasise fun and learning and be in very small doses.

Teams with much younger players - aged under 10, should concentrate on learning the skills of Rugby League. Developing the basic skills, such as tackling, catching, passing and kicking are of primary importance. Four to six weeks should be set aside for pre-season training. Active and enjoyable skills training will develop sufficient levels of fitness and help children learn to play. Improved skills will further enhance a child's confidence and enjoyment of the game.

Teams, with players aged 10 to 12, should commence some fitness training. Five to eight weeks is set aside for pre-season training. Skill development is still of primary importance for players of this age. The majority of training time should be devoted to improving basic skills. Players are still at the age where superior skills, not superior fitness, wins games. Active skills training will provide the stimulus for basic fitness levels. Some fitness training needs to be included to improve agility, power and speed. Ten minutes per session is sufficient time to spend on these areas. This type of training should not be, in any way, fatiguing. Training that is tiring is more likely to turn young players from the game.

Variations in the training load need to be outlined. First of all, the number of repetitions should be reduced. The distance or time each drill is run can be decreased. This is to allow for the player's lower level of physical maturation. For example, if the coach was to use Tag Sprints (Drill 78) for fitness, only five repetitions, over 5 to 10 metres, would be carried out. Finally, carry the drills out in a fun atmosphere. This will increase the interest of the kids. For example, agility drills can be run in relay form, speed drills are run with the ball in the player's possession, and easier jumps (no's 48 to 53) conducted as races. All this is very simple, yet will be of benefit to the players and help maintain the young player's interest in the game.

When the players in a team have reached the age of 13 to 15, their training can be very similar to older players. The amount of training is reduced however. Aerobic endurance drills are over shorter distances and for shorter periods of time. For example, L.S.D runs (Drill 1) would be for a maximum of 20 minutes. A smaller number of reps, shorter distances and shorter time periods would be used for anaerobic endurance training. For instance, a track interval session (Drill 19) may include two 150 metre runs and three 200 metre runs. The up-and-down drill (no 26) may not involve hitting the ground. Long rest periods would be allowed for agility, power and speed training. This is to ensure that good running technique is maintained. Of a 60 minute training session, up to 20 minutes should be devoted to developing and maintaining fitness.

Teams with players younger than 16 have a pre-season that is five to eight weeks long, evenly divided into preparation and pre-competition phases. Remember that skill development is of primary importance for younger players. As young players get older, their bodies will mature. They will become bigger, stronger and faster and can endure an increased training load.

Following these simple guidelines will help to improve player's performance in the short term and be of major benefit to them in the future. They will also assist in keeping a young players interest in playing Rugby League.

[Drills that are appropriate for improving children's fitness are marked with an asterix.]

Important points to remember;

- The emphasis of training for younger players should be on developing skills.
- The training load for children should be reduced according to their level of maturation.
- Training for kids under 10 will involve skill development only.
- Training for kids aged 10 to 12 will involve activities to increase agility, power and speed. Approximately 10 minutes is set aside for fitness in each session.
- Training for kids aged 13 to 15 should cover all aspects of fitness. Twenty minutes is set aside for fitness development in each session.
- All training activities should have an element of fun.

Key to following figures

	Sprint
	Hard Run
	Run
	Sideways
	Backwards
	Step
	Pass
	Kick
	Hit the Ground
	Marker
	Player

Endurance

***AEROBIC
ENDURANCE***

‘A

Player with
good
aerobic
endurance
can keep
performing
for the
entire
game’

The aerobic energy system provides energy for continuous, low intensity activities such as running or swimming. Aerobic endurance refers to the ability to perform tasks such as these for an extended period of time. Aerobic endurance is very important to the Rugby League player who, with good aerobic fitness, can keep performing for the entire game. Their concentration will be better over a long period of play.

The player's weight is kept under control and their rate of recovery from intense activities is faster, thus allowing them to perform more work on the field.

Aerobic fitness is the first fitness characteristic to be developed. Improving a player's aerobic endurance early in the training program allows them to tolerate harder training later in the program.

Most aerobic training sessions require only an open area and a stopwatch as equipment. Other landmarks such as steps and hills, as well as field markers, can be used in an aerobic training session.

Two to four weeks of training should be spent on developing aerobic endurance. The first few training sessions use lower intensity, longer duration drills (such as No. 1 to 8). As the fitness level improves, more intense aerobic endurance drills need to be undertaken (such as No. 9 to 18).

Important points to remember;

- Aerobic endurance will improve a player's rate of recovery and concentration, and allow the player to keep going to the end of each half.
- Aerobic endurance must be developed over a two to four week period.
- It is the first fitness characteristic that is developed.

AEROBIC ENDURANCE DRILLS

N.B * Indicates this drill is suitable for kids aged 13 to 15.

+ Indicates this drill is suitable for in-season training.

*1. L.S.D (Long Slow Distance)**

- The players jog for 20 minutes, or greater, at a comfortable pace and on a set course.

Training Load

Time: 20 to 50 minutes.

Distance: 5 to 10 km.

Intensity: Very low

2. FOLLOW THE LEADER *

- The players jog in a large group.
- One member of the group is selected to determine the running pace as well as the course the group will take.
- The leader is changed every three to five minutes.

Training Load

Time: 20 to 45 minutes

Distance: 4 to 9 km

Intensity: Low

3. OUT AND BACK RUNS *

- A running course is designed in which the players run "out" for the first half of the run, and the other half "back" to the start.
- An ideal place to stage such a run is a long beach or riverbank.

Training Load

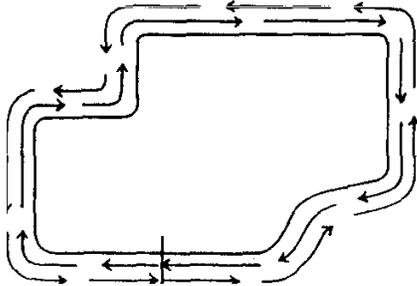
Time: 30 to 50 minutes

Distance: 5 to 10 km

Intensity: Low.

4. PURSUITS *

- Two groups are organised.
- Each group sets off on the run at the same time, in opposite directions, on the same course.
- The aim of this drill is for each team to try and beat the other one back to the start.



Training Load

Time: 20 to 40 minutes

Distance: 4 to 8km

Intensity: Medium,

5. HANDICAP RUNS

- The players run over a course of set distance.
- The slower runners in the team set off first and the faster runners later, so that the players finish fairly close together.
- This type of run will bring out the competitive nature of the players and better performances will result.

Training Load

Time: 20 to 40 minutes

Distance: 4 to 8km

Intensity: Medium

6. FARTLEK *

- The players run at a comfortable pace on a set course.
- Short bursts of speed, lasting from 15 seconds to 30 seconds, are included at 1 to 3 minute intervals.

Training Load

Time: 15 to 30 minutes

Distance: 4 to 8km

Intensity: Medium to high

7. VITA PARCOUR RUNS *

- A Vita Parcour run involves a variety of exercises with intervals of running between them.
- The exercises may include agility activities (such as shuttles) and/or muscle endurance activities (such as step ups and push ups). There should be lots of running involved.
- An example of a Vita Parcour run is;

100 metre run > 10 tuck Jumps > 200 metre run > 50 half sit-ups > 100 metre run > 6* 1 Om shuttles > 200 metre run > 100 step-ups > 100 metre run > 50 push-ups > 200 metre run > 20 burpees > 400 metre run > return to start.

Training Load.

Time: 20 to 30 minutes.

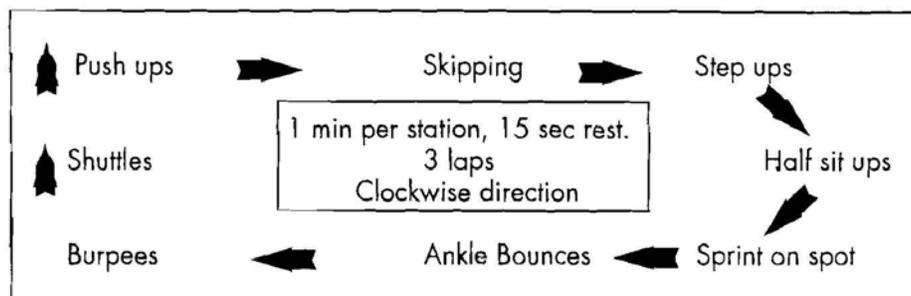
Intensity: Medium to high.

No. of Exercises: 5 or more.

8. CIRCUITS *

- Circuits are very similar to Vita Parcour runs; however, the emphasis shifts from running to the exercises.
- A number of different exercises are performed over a set period of time, with a set period of time for rest.
- The players do as many repetitions as possible on each exercise in the set time.

An example of a circuit is shown below;



Training Load

Time: 20 to 30 minutes.

Stations: 6 to 12.

Work Time Period: 30 seconds to 2 minutes.

Rest Time Period: 10 to 30 seconds.

9. *TEMPO RUNS* *

- A Tempo Run is conducted over a set distance.
- The players run the course as fast as possible.

Training Load

Distance: 4 to 6km

Intensity: High

10. *HILL CIRCUITS*

- This drill requires a course that involves very hilly terrain.
- The players run the course as many times as possible in a set time.
- Facilities near the course will allow the undertaking of skills or ballwork training.

Training Load

Time: 20 to 30 minutes

Distance: 4 to 6km

Intensity: High

11. *STAIR CIRCUITS*

- The concept of this drill, very similar to the Hill Circuit, uses stairs to increase the difficulty of the activity.
- Again, facilities nearby will allow the group to undertake skills or ballwork training.

Training Load

Time: 20 to 30 minutes.

Distance: 3 to 4km.

Intensity: High.

12. *TRACK INTERVALS* *

- The players complete a number of intervals by running over various distances on a 400 metre track, with a set rest period between each interval.
- A variety of different workouts can be devised.
- An example of a track interval session would be;

1) 2*600 metres, 2 minutes recovery

2) 2*800 metres, 2 minutes recovery

3) 2*1000 metres, 3 minutes recovery

4) 2* 1500 metres, 3 minutes recovery

Training Load

Distance: 600 to 1500 metres per rep. Reps: 3 to 8

Total Distance: No more than 6000 metres per training session.

Work to Rest ratio (W:R): Shorter reps have work to rest ratio of up to 1:2 longer reps have work to rest ratio of down to 1:0.5. (N.B. For an explanation of Work to

Rest ratio, consult the glossary).

*13. FIELD INTERVALS **

- This drill involves the players running intervals, in surroundings away from a track or oval, with a set rest period between each interval.
- Parks or bush land are examples where field intervals can be carried out.
- Facilities nearby will allow the group to undertake skills or ballwork training.

Training Load

Time: 2 to 5 minutes per rep

Distance: Approximately 500 to 1000 metres, depending on terrain.

Reps: 3 to 8

W: R: 1:0.5 to 2.

14. TIMED INTERVALS

- Instead of running over a set distance, the players run intervals for a set period of time, with a set period of rest between each interval.
- A minimal distance should be set for each rep, to stop players from running too slowly.
- An example of such a work out is;

1) 4*2 min run; 1 min rest.

2) 4*3 min run; 2 min rest.

Training Load

Time: 2 to 8 min

Reps: 3 to 9.

W: R: 1: 0.5 to 2.

*15. HILLS **

- The players run up a long, gradually sloping hill for a set interval.
- The rest period involves players jogging back to the bottom of the slope.
- Any slope used in this drill should not be too steep, as this can lead to bad running form.
- Facilities nearby will allow the team to carry out skills or ballwork training.

Training Load.

Distance: 500 to 1000 metres

Time: 2 to 5 minutes

Reps: 3 to 6

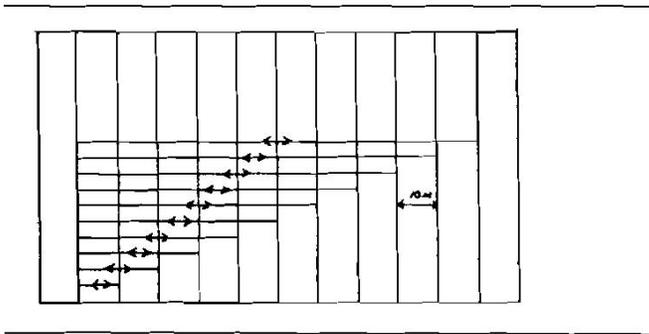
Rest: Jog recovery.

16. UP AND DOWN THE CLOCK

- Up and down the clock is a specific interval training session.
 - The session involves the players running the following intervals:
 - 200 metres hard, followed by 200 metres easy,
 - 400 metres hard, followed by 200 metres easy,
 - 600 metres hard, followed by 200 metres easy,
 - 800 metres hard, followed by 200 metres easy,
 - 600 metres hard, followed by 200 metres easy,
 - 400 metres hard, followed by 200 metres easy,
 - 200 metres hard to finish.
- Only one repetition of this workout is required.

17. SUPER SHUTTLES +

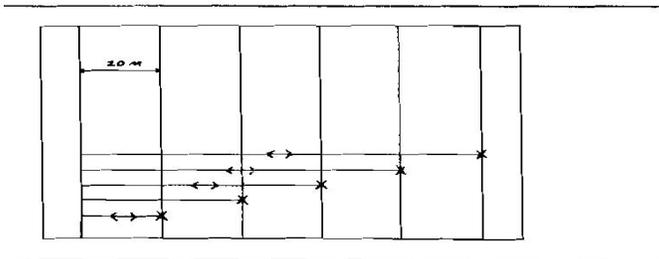
- The players, start from the goal line, and run to every line on the field (i.e 10, 20 metre etc) and then back to the goal line.
- The total distance for the shuttle is 1 100 metres.



Training Load
Reps: 4 to 6
W: R: 1:2

18. HIT THE GROUND SHUTTLES +

- The players, starting at the goal line, run to the 20 metre line, hit the ground, and then return to the goal line.
- They repeat this to the 40, 60, 80 and 100 metre lines.
- The total distance of each shuttle is 600 metre.



Training Load
Reps: 4 to 6
W: R: 1:2

Endurance

ANAEROBIC ENDURANCE

‘When a player becomes involved in the play for an extended period, anaerobic endurance becomes important’



anaerobic endurance refers to a player's ability to perform high intensity activities for an extended period. Energy for this type of activity (up to 60 seconds) comes from the long term anaerobic energy system. When a Rugby League player becomes involved in the play for an extended period, anaerobic endurance becomes important.

An example occurs when a player is moving forward and back (up to six times) in defence and then turns to chase a long kick. As this type of activity occurs often in a game, the importance of anaerobic endurance is emphasised.

Anaerobic endurance training should begin at the completion of aerobic endurance training. This will be towards the end of the preparation phase. This allows the players to tolerate the increased intensity. In other words, the team can be trained harder. It should be pointed out that this type of training is *very* fatiguing. It is important to provide plenty of water for the players and to realise that the players become very tired towards the end of the session.

Anaerobic endurance training is carried out over a period of two to four weeks. Training should begin with longer, simpler drills, (such as No. 19 to 25). Once the player's tolerance to the training has improved, the training should shift gradually to drills that are shorter and harder (such as No. 26 to 32).

Important points to remember;

- Anaerobic endurance training will allow players to perform at a high intensity for extended periods.
- Two to four weeks of training is set aside to develop anaerobic endurance.

ANAEROBIC ENDURANCE DRILLS.

N.B. * Indicates this drill is suitable for kids aged 13 to 15.

+ Indicates this drill is suitable for in-season training.

*19. TRACK INTERVALS **

- This drill involves the players running over a set distance on a 400 metre track with a set rest period between each interval.
- An example of such a workout is;

1) 3* 100 metres, 30 sec recovery

2) 3*200 metres, 1 min recovery

3) 3*300 metres, 2 min recovery

Training Load

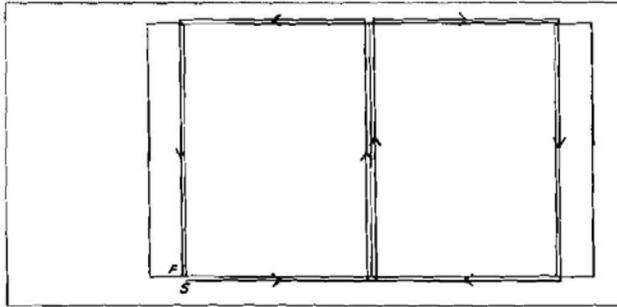
Distance: 150 to 400 metres

Reps: 6 to 10

W: R 1:3

20. LINE RUNS * +

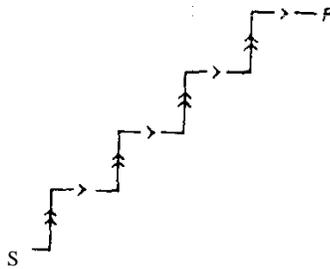
- The players start this drill at the corner of the goal line and touch line.
- They run, in single file, up the touch line and along the halfway line, up the touch line to the far goal line and along the goal line.
- The players then return to where they started, along the same course.



Training Load
Reps: 4 to 8
W: R: 1:2

21. SPRINT AND SLIDE * +

- Field markers are set 10 metres apart, with each hat at right angles to the previous one (see diagram below). The entire course is 100 metres long.
- The players start by sprinting to the first hat and then sliding to the next.
- They repeat this procedure for the entire course.

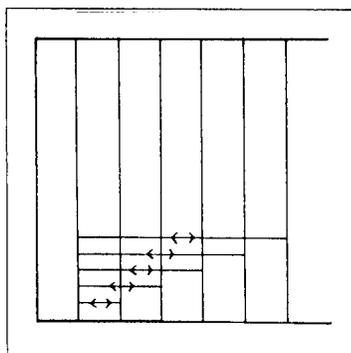


Training Load
Reps: 4 to 10
W: R: 1:2

(N.B. For an explanation of the term SLIDE, consult the glossary).

22. SHUTTLES * +

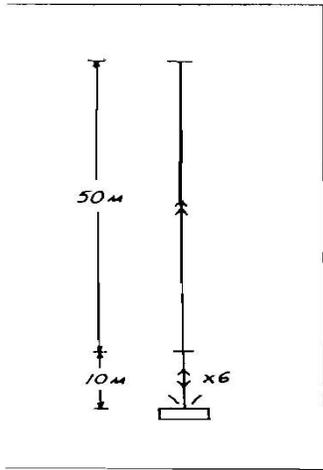
- The players, starting at the goal line, run to the 10 metre line and return.
- This is repeated to every line, up to the halfway.
- One repetition of this drill is 300 metres.



Training Load
Reps: 6 to 12
W: R: 1:3

23. TACKLE AND CHASE +

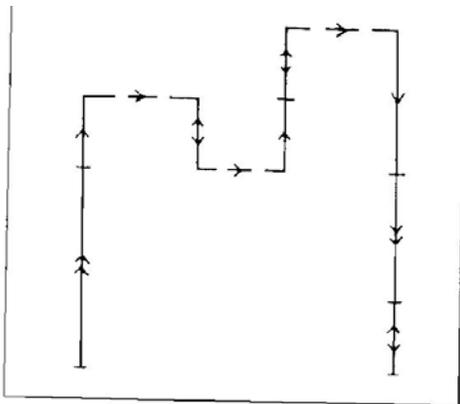
- This drill requires tackling bags.
- The players start at a mark that is 10 metres from the tackling bag.
- They run forward, tackle the bag, get up and run backwards to the start. This is repeated five times.
- After performing the fifth tackle, the players turn and sprint 50 metres.
- The drill is performed in groups of four players, to allow adequate rest.



Training Load
Reps: 3 to 6
W: R: 1:3

24. FIELD MOVEMENT DRILLS * +

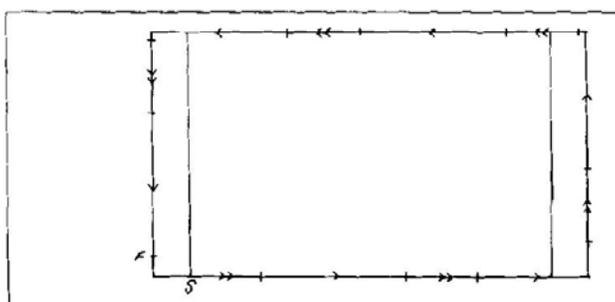
- The players perform drills that require them to sprint, jog, slide, change direction and run backwards, to mimic the movements that occur in the game.
- An example of such a drill is shown below.



Training Load
Time: 30 to 45 seconds per drill.
Reps: 5 to 10
W: R: 1:2

25. SPRINT JOGS.

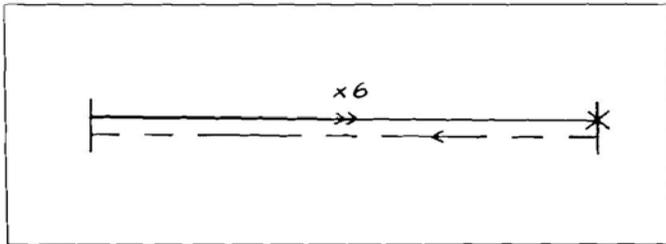
- Markers are set out along the edge of the field at 20, then 40 metre intervals.
- The players sprint to the first marker (20 metres), then jog to the next (40 metres).
- This is continued around the field.



Training Load
Laps: 2 to 6
Rest between laps: 2
minutes.

26. UPS AND DOWNS * +

- The players start by sprinting forward 10 metres and then hitting the ground.
- They then jump up and run backwards to the start.
- This is repeated as many times as possible in the set time.



Training Load

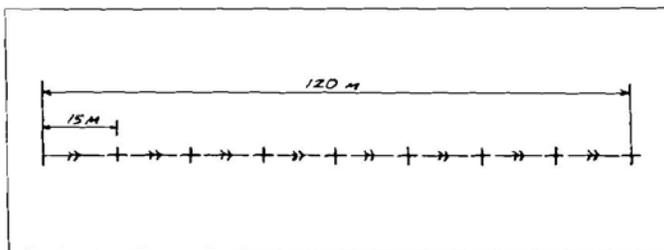
Time: 30 to 45 seconds per rep

Reps: 3 to 6

W: R; The rest should start at a ratio of 1:3 and become less as the player's fitness improves.

27. BACK DOWNS * +

- A 120 metre track is set out, with field markers at 15 metre intervals.
- The players sprint to the first marker and go down onto their backs.
- They then jump up and continue, repeating this procedure at every marker



Training Load

Reps: 5 to 10

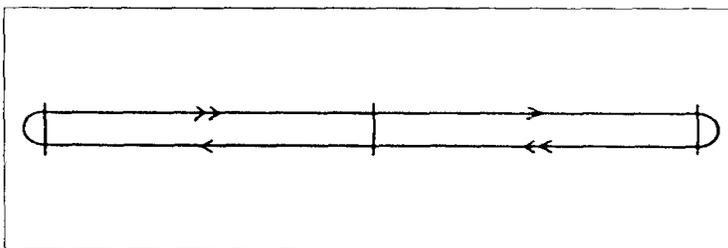
W: R: 1:2

28. SUICIDE SPRINTS +

A 100 metre track is set out, with a marker at the 50 metre point.

The players sprint to this marker and then jog to the end of the track.

They have 30 seconds to complete the sprint and be ready for the next one.



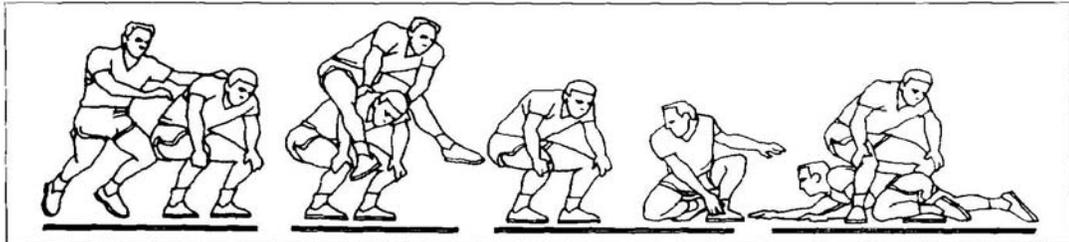
Training Load

Reps: 10 to 20

Rest: Jog to far end of track.

29. UNDERS AND OVERS *

- The players are divided into pairs.
- One player stands with legs apart, elbows resting on knees and legs bent.
- The other player leap frogs over their partner, then turns and crawls back between their legs.
- This is repeated as many times as possible in a set time.



Training Load

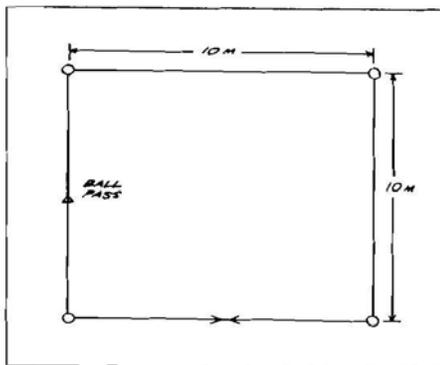
Time: 30 seconds per rep

Reps: 4 to 6

W: R: 1:1

30. CORNERS * +

- The players are divided into groups of four.
- A square, 10 metres by 10 metres is set out, with a player on each corner. Each player passes the ball to the left, then runs to the corner on their right and back to the where they started before the ball is passed around the square.
- Once the drill has been performed, the direction is reversed.



Training Load

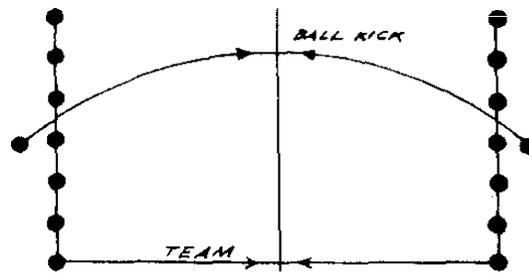
Time: 30 seconds per rep.

Reps: 4 to 8

W: R: 1:2

31. KICK AND CHASE +

- Two people stand a comfortable kicking distance apart.
- The players all stand behind one person
- The ball is kicked from one person to the other and the team chases, forming a defensive line around each.
- Once the line has been set up, the person returns the kicks and repeats drill.



Training Load
Reps: 5 to 1
W: R: 1:2

32. MAD BALL +

- Players are divided into groups of four, with one group defending against another group. The group with the ball attempts to run the length of the field, simply by continually passing, backing up and keeping the ball "alive".
- The team in defence tries to stop the other team, by continually getting back in defence to stop the ball movement.
- There can be moderate body contact in this drill and the play is to be mistake free.

Training Load
Reps: 3 to 6
Distance: Length of field
W: R: 1:3

Agility

‘Agility
training
takes on
many
different
forms’



Agility in Rugby League is a very important fitness characteristic. Decelerating and accelerating, stepping, swerving and getting up off the grounds are all examples of agility. Like the other physical characteristics, agility can be improved through constant and consistent training. Agility activities require energy from the short term (0 to 12 seconds) anaerobic energy system.

This energy system is easily depleted. Adequate rest between drills and between workouts needs to be included in the training program.

Agility training takes many different forms. In defence, specific movements need to be made, such as running forward, stopping and running backwards as well as sliding left or right to cover gaps. Players must also be able to react to an opponents movements. The ability to get to one's feet quickly after making a tackle is also important. In attack, a player requires agility to beat an opponent, in support and getting up to play the ball.

Agility development begins late in the Preparation phase and continues to the start of the season. At least five weeks of agility training is required. Early drills should be low intensity and follow a set series of movements (such as No. 33 to 41). These drills also help to reduce the risk of joint injury. As the season draws closer, the drills require more decision making and reacting to the movements of others (such as No. 42 to 47). Agility work is carried out in conjunction with power and speed training.

Important points to remember;

- Agility training involves using different actions that are important in the playing of Rugby League.
- At least five weeks of agility training is required.
- Agility training helps to reduce the risk of joint injury.
- Adequate rest must be allowed between activities.

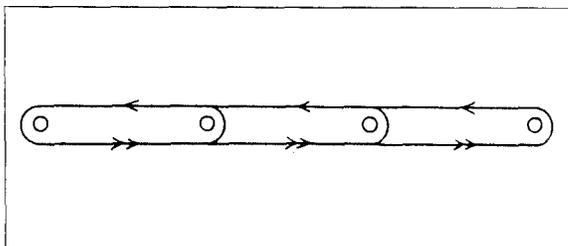
AGILITY DRILLS

N.B. * Indicates this drill is suitable for kids.

+ Indicates this drill is suitable for in-season training.

33. SINGLE FILE RUNS *

- Four markers are set out 4 metres apart, with an end marker used as the starting position.
- The players run forward to the first marker and backwards to the start.
- This is repeated for the second and third markers, carrying the ball in both hands.



Training Load

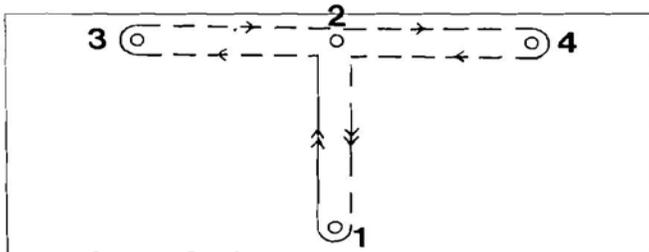
Groups of five perform the drill continuously for 30 seconds

Sets: 1 to 3

Rest: 30 seconds between each set.

34. *T RUNS* *

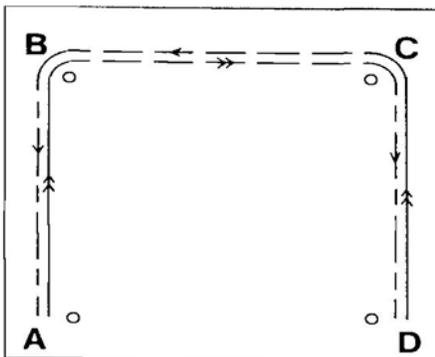
- Four markers are set up in a T formation (see diagram).
- The players beginning at marker no. 1, sprint forward to the second, slide across to no. 3, slide back to no. 4, slide again to no. 2 and then run backwards to the starting point.
- This drill is performed with the ball in two hands.



Training Load
Same as Drill 33.

35. *SQUARES* *

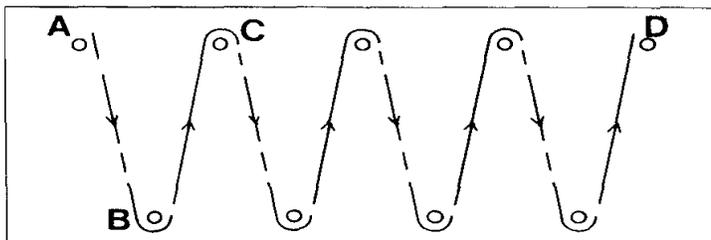
- A square, five metres by five metres, is set out (see diagram), with the players beginning at A.
- The players sprint to B, slide across to C and then sprint backwards to D.
- When all the players in the group have completed the drill, it is repeated in the opposite direction.
- This drill is performed with the ball carried in both hands.



Training Load
Groups of five are used.
Reps: 5 to 10 each way
Rest: 10 to 30 seconds.

36. *DOUBLE W* *

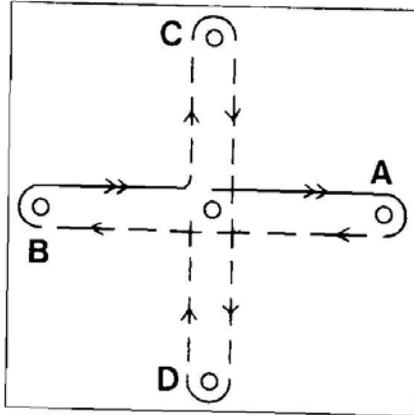
- Nine markers are set out to form a double W (see diagram), with each marker six metres apart.
- The players begin at marker A and run backwards to B, then forward to C and so on to the last marker, D.
- The players then walk back to the start and repeat the drill.



Training Load
Reps: 3 to 6
Rest: Walk recovery

37. CROSSES *

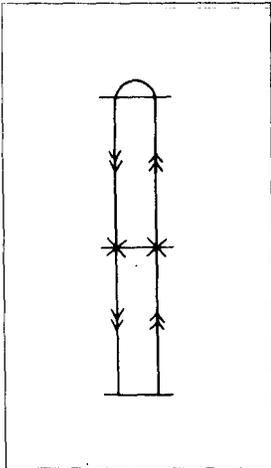
- Four markers are set out to form a cross, with another marker placed in the centre. Each marker is five metres from the centre.
- The players start at the centre and sprint forward to A, backwards to B and then back to the centre.
- They then immediately slide to C, across to D and back to the centre. This is done with the ball carried in both hands.



Training Load
Same as Drill 33.

38. SPRINT, HIT, SPRINT *

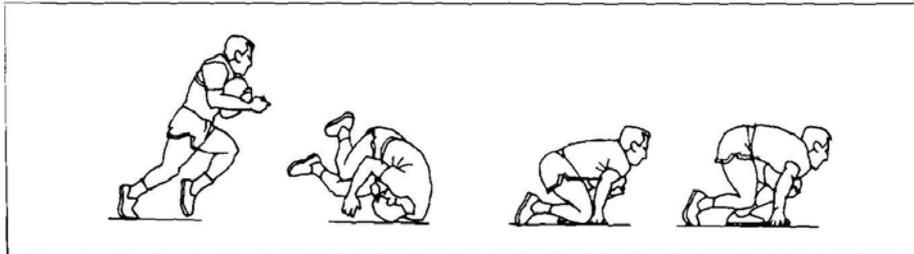
- Three markers are set up, 3 metres apart.
- Starting at an end marker, the players sprint to the middle marker and hit the ground, jump up, then sprint to the third marker.
- They immediately turn and repeat the drill.



Training Load
Groups of 2 to 4.
Reps: 10 to 20
Rest: 20 seconds

39. SPRINT, ROLL, SPRINT *

- The some markers are used as in Drill 38, however the players do a commando roll, instead of hitting the ground.
- A commando roll involves bending at the knees, and hips and rolling over the left or right shoulder and then bouncing back to the feet
- This drill is performed with the ball.



Training Load
Same as Drill 38.

40. UP AND BACK * +

- This drill is similar to Drill 26, with the markers set only five metres apart.
- The players perform the drill one at a time as a relay.

Training Load

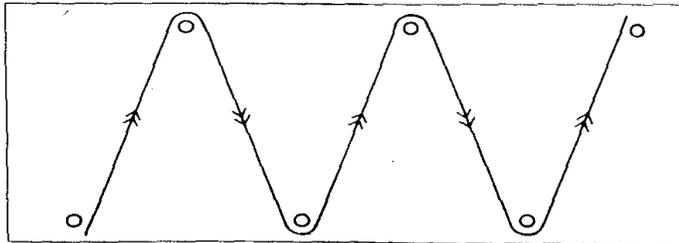
Groups of five are used in this drill.

Reps: 3 to 6

W: R: 1:4

41. ZIG ZAGS *+

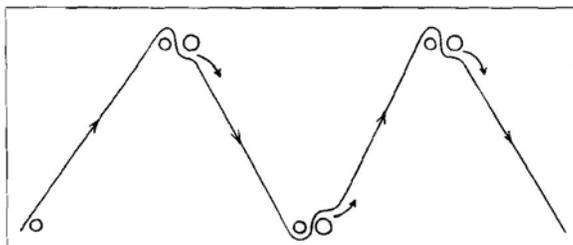
- Six markers are set out in zig zag formation.
- The players run from marker to marker, stepping off the outside foot to change direction.
- The course should not have turns that are too tight.
- This drill can be performed with the ball carried in two hands.



Training Load
Reps: 5 to 10
Rest: Jog recovery

42. ZIG ZAG with PRESSURE *+

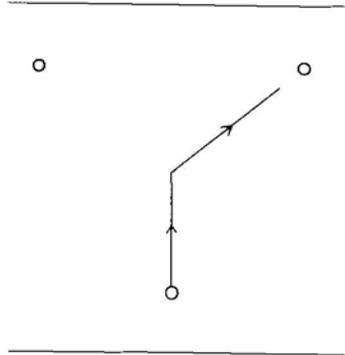
- At each of the markers used in Drill 41, a defender is placed.
- The aim is for the player to step around the defenders off the left and right foot, and for the defender to react to the attacker's movements.
- These drills can be performed with the attacker carrying the ball.



Training Load
Two groups are used in this drill.
Reps: 5 to 10
Rest: Walk recovery

43. RUN AND STEP * +

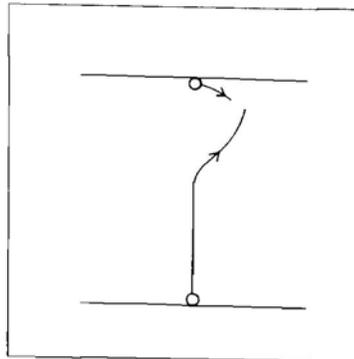
- Three markers are set out in a triangle.
- The player, starting at one of the corners, runs in a line directly between the other two markers (see diagram).
- The coach, at any time will shout "left" or "right" and the player moves immediately in that direction.



Training Load
Same as Drill 33

44. ONE ON ONE * +

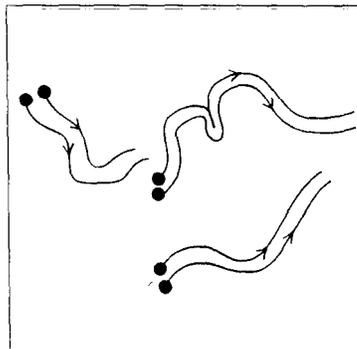
- The players are divided into pairs.
- One of the players, the defender, stands at one end of a 10 metre zone, and the other player, the attacker, stands at the other end of the zone.
- The attacker runs towards the other end of the zone, and tries to step around, i.e. avoid, the defender.
- The roles are then reversed.



Training Load
Reps: 5 to 10 reps as both
defender and attacker.
Rest: Walk recovery

45. SHADOWS * +

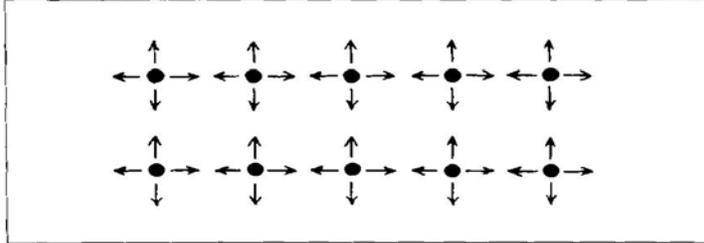
- The players are divided into pairs.
- One player stands a metre behind the other.
- The front player runs all over the field, continually changing speed and direction.
- The rear player must try to stay close to the front player to "shadow" his every movement.



Training Load
Time: 30 seconds per rep
Reps: 4 to 6 reps each.
Rest: 60 seconds

46. THE DIRECTION DRILL +

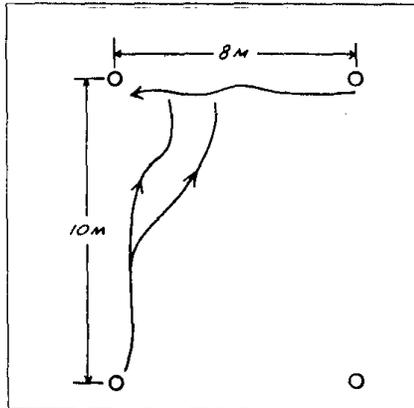
- Two rows of players, spaced one metre apart are set out.
- The coach or trainer points in one of five directions; forward, sideways, left, right or down (hit the ground), and the players must react by moving in that direction.
- In addition, the players must shout the direction in which they are moving.



Training Load
Reps: 1 to 2
Time: 60 to 120 seconds
W:R: 1:1

47. CUT OFFS * +

- A rectangle, 10 metres by 8 metres, is set out, with the players divided into two groups, standing at opposite corners of the playing area (see diagram).
- The first player in one group, carrying the ball, runs towards the other end of the playing area and tries to avoid being caught by an opponent from the other group.
- A player is considered caught if their opponent can tag them with both hands.
- After performing the drill, the two players change roles.



Training Load
Reps: 10 to 20
Rest: Walk recovery

P ower

‘Power
is important
for
sprinting
short
distances,
tackling,
breaking
tackles and
jumping’

Power is very important, even vital, to the Rugby League player. Power is important for sprinting short distances, tackling, breaking tackles and jumping. Developing power will give a player an advantage when, later in the training program, speed training commences. The energy for power activities comes from the short term anaerobic energy system. Players require a good aerobic endurance base to be able to recover quickly from these intense efforts .

Two forms of power training are covered in this book. The first form is gym training, and is covered in greater detail, in Chapter 11.

The second form of power training is simply called Power. This form of training requires minimal equipment and can be carried out on the field. Power training commences at the beginning of the pre-competition phase and continues till the start of the season. Only a small number of drills and repetitions should be carried out in each session. Training must begin with very simple activities (such as No. 48 to 57). As the players improve, more intense drills can be undertaken (such as No. 58 to 66).

Drills for power are carried out in conjunction with training for agility and speed. It is important to allow adequate rest when carrying out power drills. This will lead to far better results.

Important points to remember;

- Power gives a player more speed, the ability to tackle harder, break tackles and jump for the ball.
- At least four weeks of power training is carried out.
- Power training is very intense and must begin with small training loads and lots of rest.

POWER DRILLS

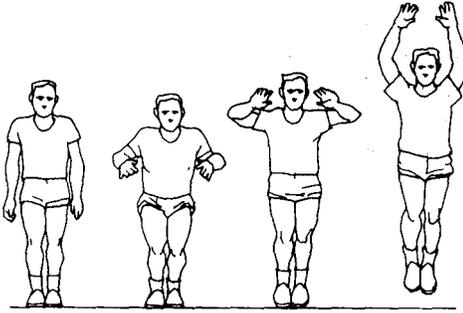
A Brief Note on Plyometrics

The first 10 drills are known as Plyometrics. Plyometrics is the scientific name for any exercise that involves a series of repeated bounds, jumps, pushes or hops that utilises a player's body weight to increase power. In this chapter, Plyometrics will simply be called Jumps. A power training program should begin with the easier, less intense jumps (such as No. 48 to 53), before moving on to more intense exercises (such as No. 54 to 57).

Due to their intensity, it is very important not to overuse jumping exercises. This will lead to heavy fatigue and possibly muscle and joint damage. If jumps are to be used, it is important that they be done *on* a forgiving surface, such as gym mats, sand or soft grass/earth. Keep the number of repetitions in a session under 40. Allow plenty of recovery between jumping exercises.

48. ANKLE BOUNDS *

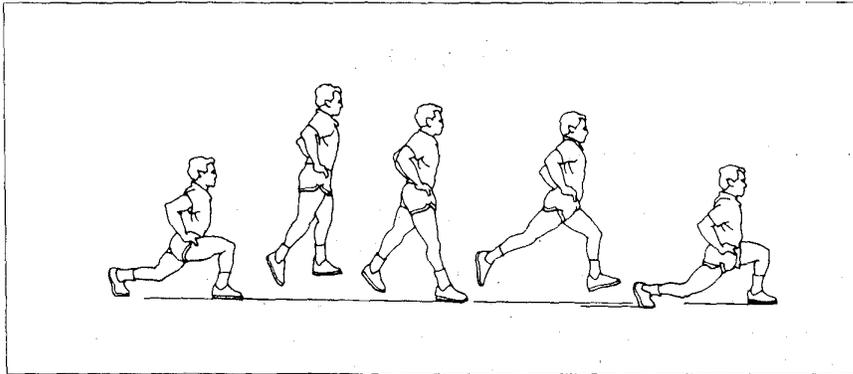
- The players stand with feet parallel, and shoulder-width apart.
- They jump up as high as possible, pushing 'up off the toes and keeping the legs straight.



Training Load
Sets: 3 to 6
Reps: 10 to 20
Rest: 90 seconds

49. ALTERNATE SPLIT JUMPS *

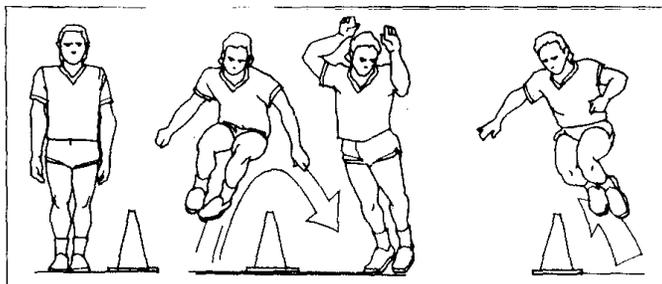
- The players start with one leg bent forward at the knee to the front of the body, and the other leg bent behind the body (see diagram).
- To perform the exercise, the players jump up into the air as high as possible.
- While in the air, the legs change positions, with the back leg moving forward and vice versa. The hands are placed on the hips throughout the performance of the drill.



Training Load
Sets: 3 to 6
Rest: 90 second
Reps: 4 to 8

50. LATERAL JUMPS

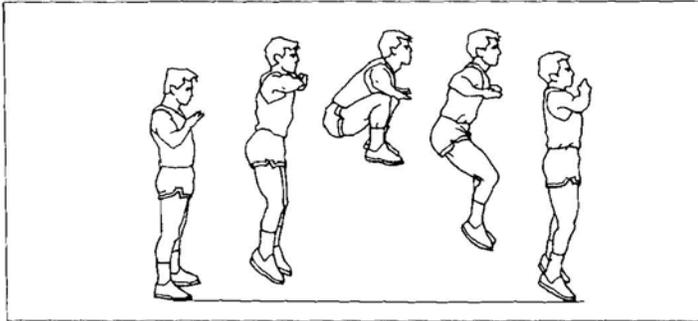
- An obstacle, such as a tackling bag or witch's hat is used in this drill.
- The player stands, with feet parallel, shoulder width apart, and the side of the obstacle.
- The players bend at the knee and hip and then jump up and over the obstacle, i.e side to side.



Training Load
Sets: 3 to 6
Rest: 90 seconds
Reps: 5 to 15

51. TUCK JUMPS *

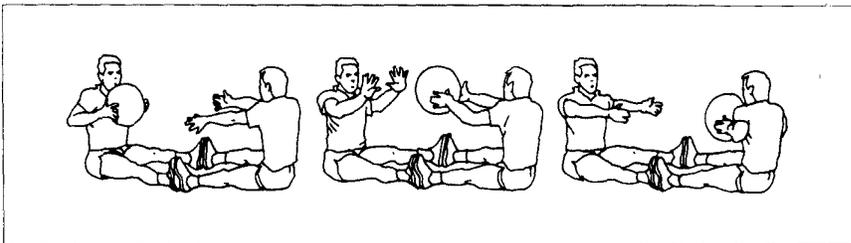
- The players stand erect with feet parallel and shoulder width apart.
- They bend at the hip and knee and then jump into the air as high as possible, bringing the knees up to the chest.
- The arms are kept across the chest throughout the drill.



Training Load
Sets: 3 to 6
Rest: 90 seconds
Reps: 5 to 10

52. CHEST THROW *

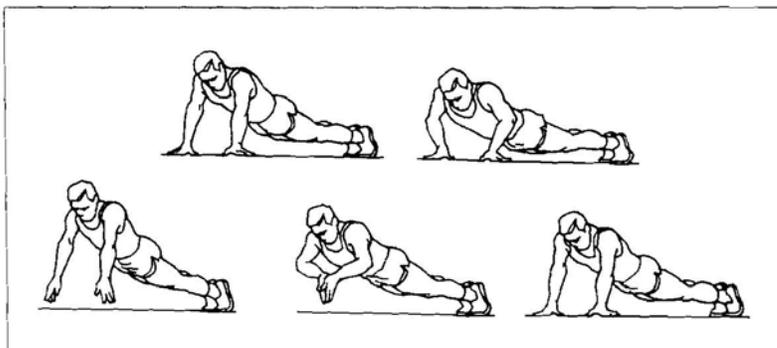
- A weighted object such as a medicine ball is required for this drill.
- Two players sit opposite one another, with their feet touching.
- One of the players holds the object to the chest and then throws it to the partner, in a fashion similar to a basketball pass.
- The other player catches the object and immediately throws the object back to the partner.
- After each pass, the player keeps his arms out straight, in preparation for the next pass



Training Load
Sets: 2 to 4
Rest: 2 minutes
Reps: 10 to 40

53. CLAP PUSH-UPS

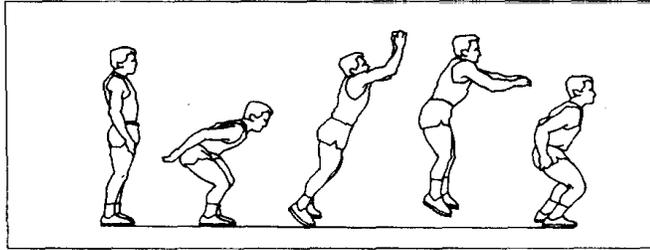
- The players assume a position similar to a normal push-up, with the feet a little wider apart and the arms straight.
- They bend their arms and push themselves up as fast and as far as possible, lifting them into the air, and attempt to perform a clap whilst in the air.



Training Load
Sets: 2 to 4
Rest: 2 min
Reps: 4 to 8

54. DOUBLE LEGGED HOPS +

- The players start with the feet parallel and shoulder width apart.
- They bend at the knee and hips and then jump forward, trying to get as much distance as possible with each repetition.
- The arms should be swung forward on each repetition to gain greater distance.



Training Load

Sets: 2 to 4

Rest: 1 to 3 min depending on number of reps.

Reps: 1 to 5

55. ZIG ZAG JUMPS +

- A line of markers is set out at 2 metre intervals.
- The players start at the side of the first marker, with feet parallel and shoulder width apart.
- They jump from side to side, moving between the markers.

Training Load

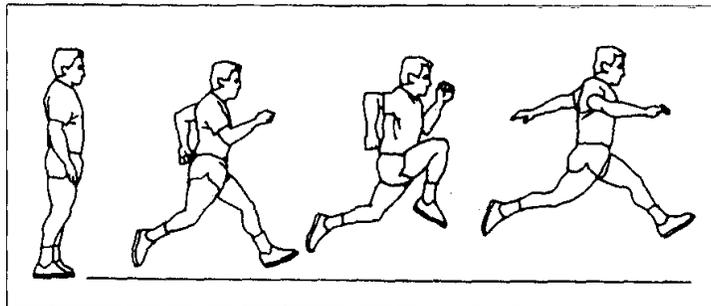
Sets: 3 to 6

Reps: 4 to 8

Rest: 2 minutes

56. BOUNDING +

- The players start with the feet together.
- They take very long powerful jumps that are similar to running strides. The knee is driven up as high as possible and the arms are swung back and forth vigorously to gain extra distance.
- Each bound should be as far as possible



Training Load

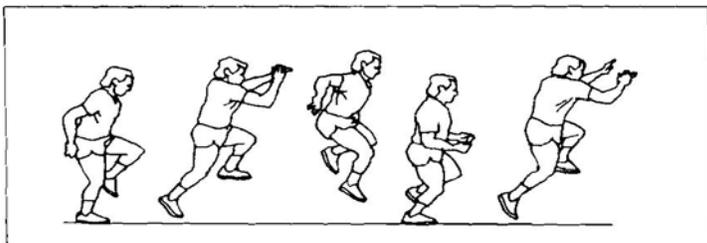
Sets: 3 to 6

Reps: 3 to 6

Rest: 2 minutes

57. ONE LEGGED HOPS +

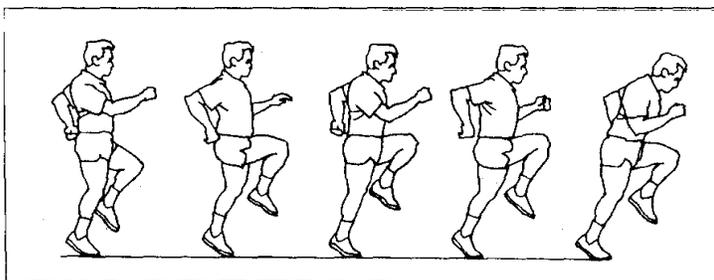
- The players start with the feet parallel and shoulder width apart.
- From this position they jump forward onto one leg and perform a series of hops.
- The aim is to hop as far as possible.
- The players should change the "hopping" leg every set.



Training Load
Sets: 2 to 3 on each leg.
Reps: 3 to 6
Rest: 2 minutes

58. LEG BLASTS

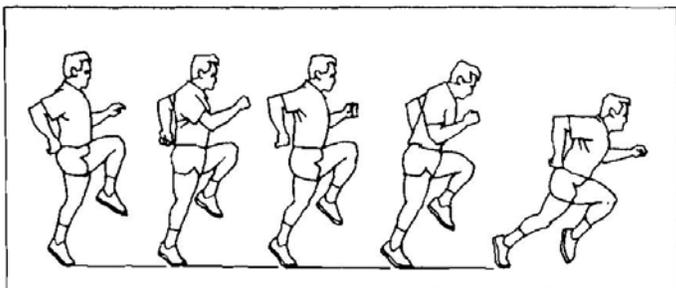
- This drill requires either a sand pit or extremely soft ground.
- The player starts by running on the quickly spot, bringing the knees up as high as possible.
- They move forward slowly, still moving the feet as fast as possible.



Training Load
Distance: Up to 10 metres
Reps: 5 to 15
Rest: 30 seconds

59. TAKEOFFS

- This drill is also performed on a soft surface, and begins exactly the same as Drill 58. However, the knees are not brought up as high.
- After four or five quick sprinting steps on the spot, the players undertake a short sprint of 5 to 10 metre

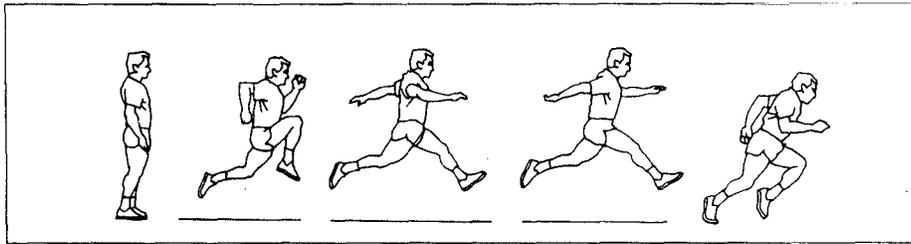


Training Load
Distance: Up to 10 metres.
Reps: 5 to 10
Rest: 30 seconds

60. BOUND AND SPRINT

The players perform two quick bounds (See Drill 56), on a soft surface such as sand or thick grass.

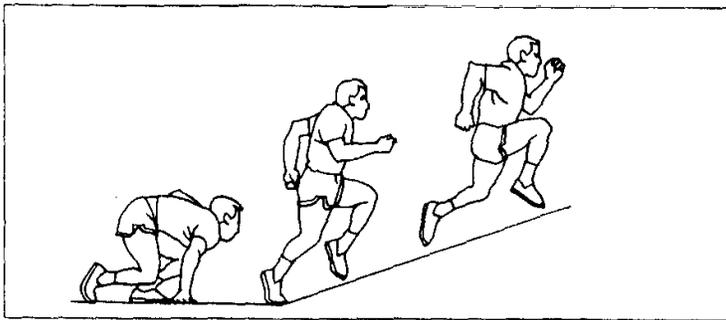
After performing the second bound, the players sprint forward for two or three strides.



Training Load
Distance: Up to 10 metres
Reps: 3 to 6
Rest: 45 to 60 seconds

61. UPHILL RUNS * +

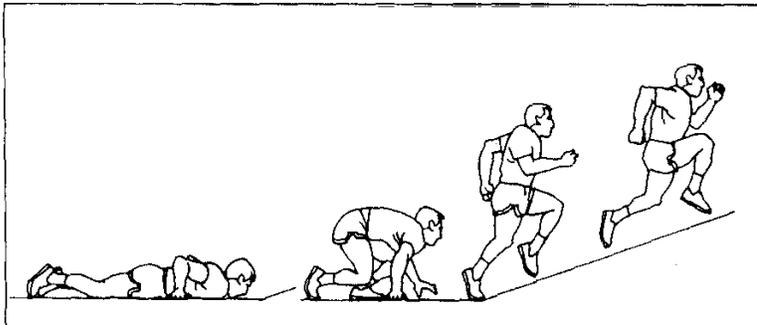
- A very slight slope is required for this drill.
- The slope should not be too great as this will lead to bad running form. The players start at the base of the slope.
- On the command "GO", the players perform a very short sprint up the hill. Leg movement is as fast as possible.



Training Load
Distance: Up to 10 metres.
Reps: 5 to 15
Rest: Walk recovery.

62. UPHILL RUNS with STOMACH STARTS *

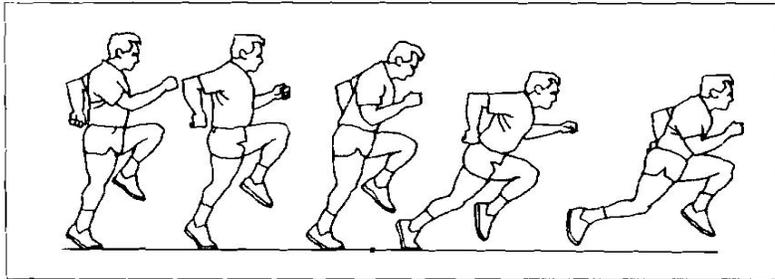
- The players start by lying on their stomachs, while at the base of the slope.
- From this position, they move as quickly as possible onto their feet and into a short sprint up the slope.



Training Load
Same as Drill 62

63. HIGH KNEE STARTS * +

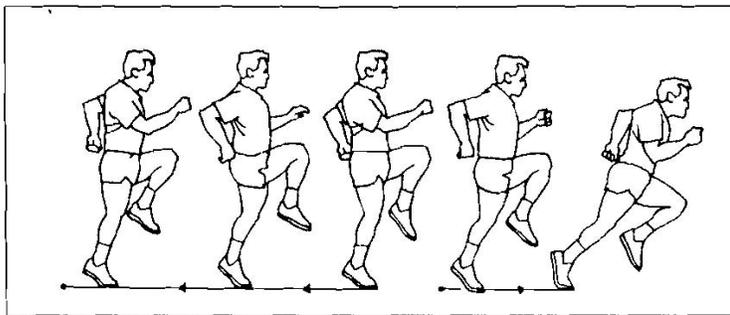
- The players are positioned 3 metres behind the starting line.
- They begin by running forward very slowly, bringing the knees up as high as possible.
- Once they reach the starting line, they sprint forward for 10 metres.



Training Load
Distance: 13 metres
Reps: 5 to 15
Rest: Walk recovery

64. BACKWARD-FORWARD SPRINTS * +

- The players are positioned 3 metres in front of the starting line.
- They begin by bringing the knees up as high as possible and run slowly backwards to the starting line.
- When they get to the starting line, they immediately change direction and sprint forward for 10 metres.



Training Load
Distance: 10 metres
Reps: 5 to 15
Rest: 30 seconds

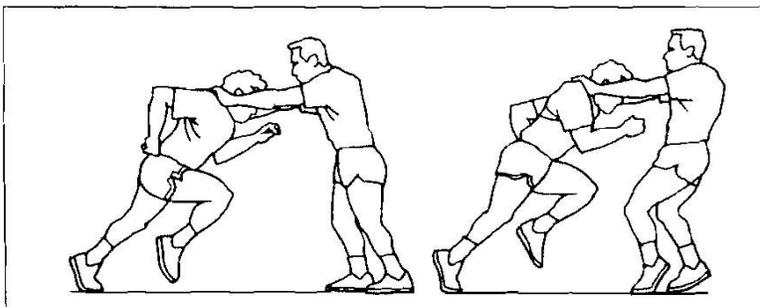
65. PARTNER SPRINTS * +

The players are divided into pairs.

One player puts both hands on the shoulders of the other to provide a resistance.

On the command "GO", the leaning player sprints forward, driving the legs as hard as possible. The partner, maintaining a moderate resistance, jogs backward slowly.

If the player finds it difficult to sprint forward, less resistance is applied. After each sprint, the players switch roles.



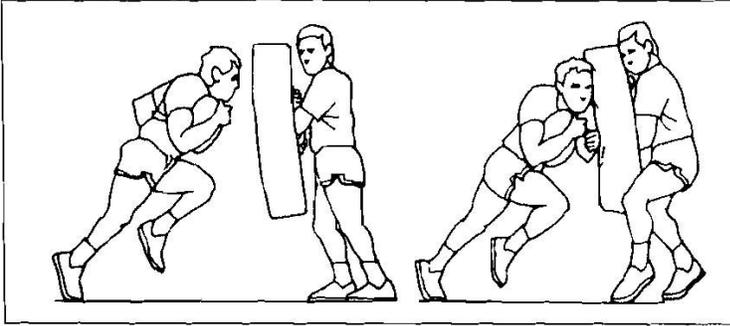
Training Load
Distance: 10 metres
Reps: 5 to 15
W:R: 1:1 or greater

66. *POWER HITS* +

This drill requires hit, or bump pads.

One player holds the pad. Another player, standing 2 metres away and holding a ball, sprints into the pad, and continues driving the legs for another three or four strides.

The player holding the pad applies a heavy resistance onto the player running.



Training Load

Distance: 4 to 6 metres

Reps: 5 to 15

W:R: 1:3

S peed

‘Players in
all positions
require a
high level of
speed’

S

peed over a very short distance is one of the biggest assets any Rugby League player can possess. Players in all positions require a high level of speed. Players require speed to carry out attacking moves, chase down opposition attackers and when constantly adjusting their positions. Any improvement in a player's speed will increase their effectiveness in both attack and defence. Speed requires the short term anaerobic system to provide energy. Maximal effort and adequate rest are required to get the best results. It is also important to train players to run quickly when fatigued, as they are often called on to do towards the end of each half.

At least four weeks of speed training should be undertaken, after aerobic and anaerobic endurance have been developed. This will allow for quicker recovery and a greater workload can be tolerated. Speed training is carried out in conjunction with agility and power drills.

Speed training should commence with very simple drills to improve technique (such as No. 67 to 70). Next, come general speed drills (such as No. 71 to 77). Finally, drills that are similar to the game should be undertaken (such as No. 78 to 86). This will allow the players to improve their speed - specific to the needs of Rugby League.

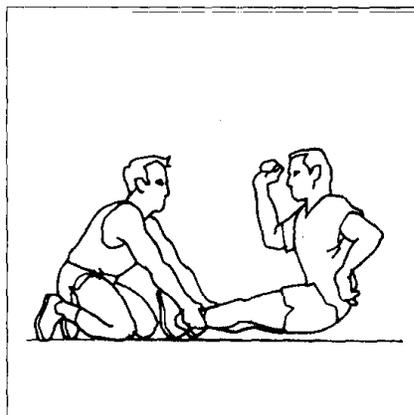
Important points to remember;

- Speed in attack and defence is important for all Rugby League players.
- Speed training should be carried out after the development of aerobic and ,anaerobic endurance, so greater amounts of training can be tolerated.
- Speed training commences at least four weeks before the season begins.

SPEED TRAINING DRILLS

*67. ARM SWINGS **

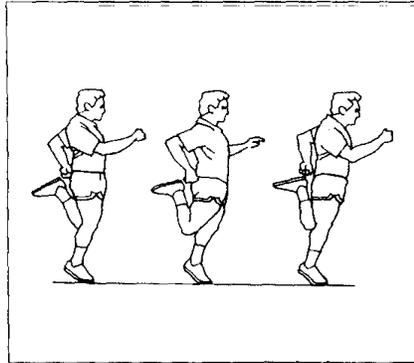
- One player sits on the ground, with legs out straight and feet together, and held by another player. The elbows are bent at right angles.
- The player arms are swung vigorously in a forward-backward motion. The arms should not swing across the body.
- When done correctly, the player's buttocks bounce off the ground.



Training Load
Time: 10 seconds per rep
Reps: 2 to 4
W:R: 1:1

68. TAIL KICKS * +

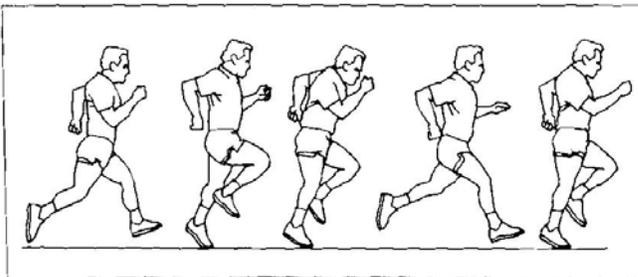
- In this drill, the players run slowly forward, bringing their heels up to meet their buttocks as quickly as possible.



Training Load
Distance: 10 to 20 metres per rep
Reps: 2 to 4
Rest: Walk recovery

69. SPEED SPURTS +

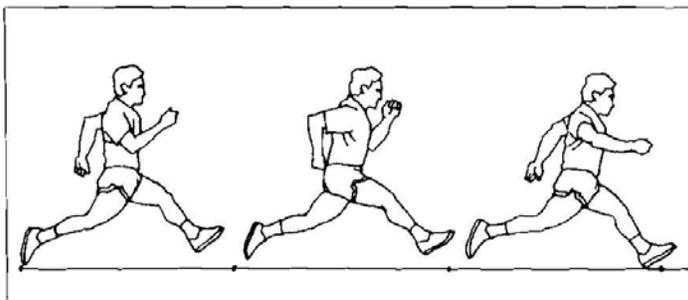
- A course of 20 to 30 metres is set out, with markers at 5 metre intervals.
- The players jog to the first marker and sprint on the spot, as fast as possible, for 2 seconds.
- This is repeated at each of the markers on the course.



Training Load
Reps: 4 to 8
No of Spurts: 4 to 6 depending on distance
Rest: Walk recovery

70. STRIDES * +

- Markers are set out at 1 metre intervals.
- The players take one stride between each marker, as quickly as possible.
- As they perfect this drill, the markers are pulled slightly wider.
- The markers should go no wider than 2.5 metres apart, as this may lead to over-striding.



Training Load
Reps: Up to 12 Strides:
15 to 20
Rest: 60 seconds

71. SPRINTS *

- This drill involves the players sprinting over a variety of distances. Each sprint should be at maximum effort, with adequate rest allowed between reps.
- Some drills are to include carrying the ball.
- A sample workout would be;

- 1) 6*20 metres; walk recovery
- 2) 6*40 metres; walk recovery
- 3) 2*60 metres; 45 seconds recovery
- 4) 2*80 metres; 60 seconds recovery

Training Load

Reps: 6 to 20

Distances: 5 to 80 metres

Rest: Walk recovery or greater, depending on intensity of the training session

72. ACCELERATION SPRINTS * +

- Acceleration runs are especially good for warming up and recovery.
- The players start each rep slowly, and increase the pace until they are running at full pace, near the end of each run.
- An example of an acceleration sprint session is;

- 1) 3*40 metres, jog recovery
- 2) 3*80 metres, jog recovery
- 3) 3*100 metres, jog recovery

Training Load

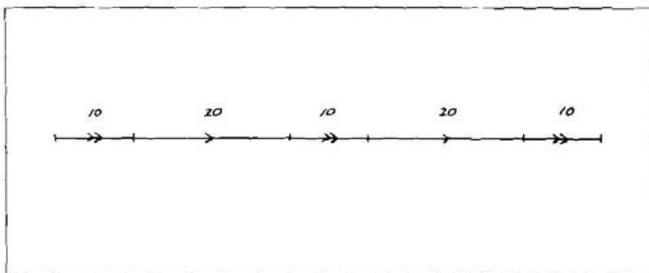
Reps: 5 to 10

Rest: Jog recovery

Distance: 40 to 100 metres

73. WIND SPRINTS *

- In this drill, the players perform a series of sprints, with a jog between each sprint.
- A player, for example, may run over a 100 metre course, with 10 metre sprint and 20 metre jog intervals in between.



Training Load

Distances: 40 to 100 metres.

Reps: 4 to 6

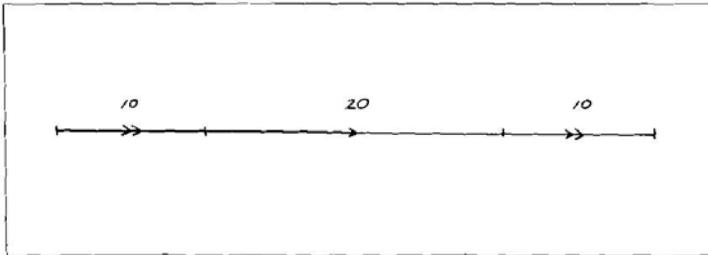
Rest: Walk recovery

Sprint Distance: 5 to 20 metres

Jog Distance: 15 to 40 metres.

74. HOLLOW SPRINTS *

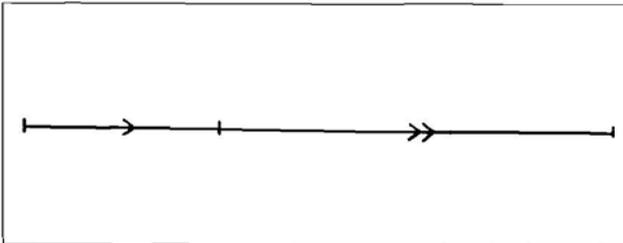
- A hollow sprint rep has three phases.
- First, the players sprint for 5 to 10 metres.
- For the next 15 to 20 metres, they run with no effort, or "cruise". There should be no conscious effort to slow down.
- For the final phase the players sprint another 5 to 10 metres.



Training Load
Reps: 6 to 12
Distances: 25 to 40 metres
Rest: Walk recovery

75. TRANSITION SPRINTS * +

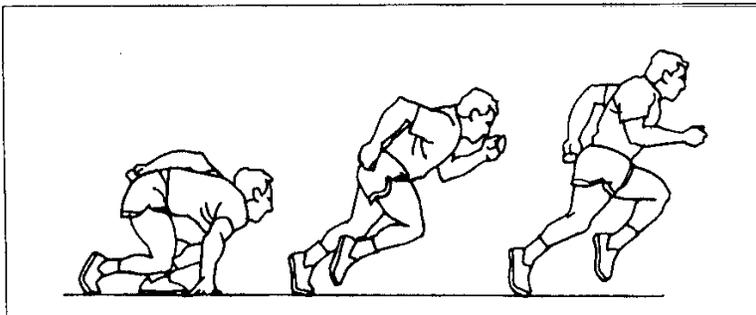
- Three markers are set at pre-determined intervals.
- The players jog from the first to the second marker and then sprint to the third.
- This can be performed with the ball in the player's possession.
- A variation is to have the players change direction as they begin to sprint.



Training Load
Reps: 5 to 20
Distance of jog: 5 to 15 metres
Distance of sprint: 10 to 30 metres
Rest: 45 seconds

76. THREE POINT START *

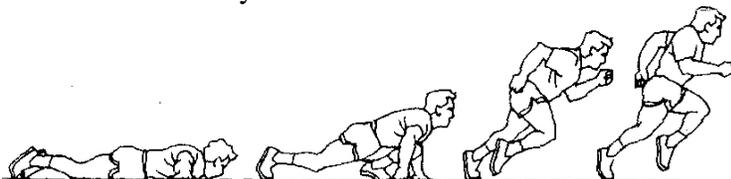
- To perform a Three Point Start, one leg is placed in front of the other - 30cm apart and slightly spread.
- If the left leg is the rear leg, then the left hand is placed on the ground, and the other arm is positioned above and behind the body.
- On the command "Go", and with the above example in mind, the player drives forward with the left leg and right arm, moving into a sprint over a short distance.



Training Load
Reps: 10 to 20
Distances: 5 to 15 metres.
Rest: Walk recovery

77. CHEST STARTS * +

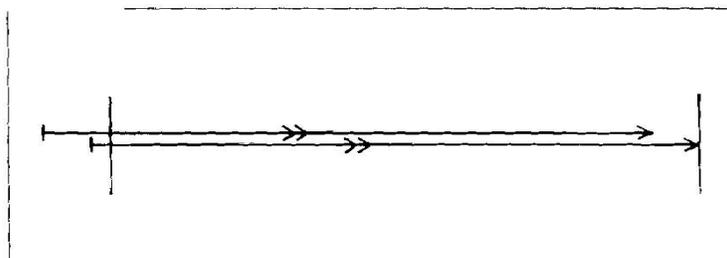
- The players start face down on the ground, with arms out to the side. On the command "Go", the players jump up and sprints in the direction they are facing.
- This drill can be varied by having the players facing the opposite direction to which they will run



Training Load
Same as for Drill 75

78. TAG SPRINTS * +

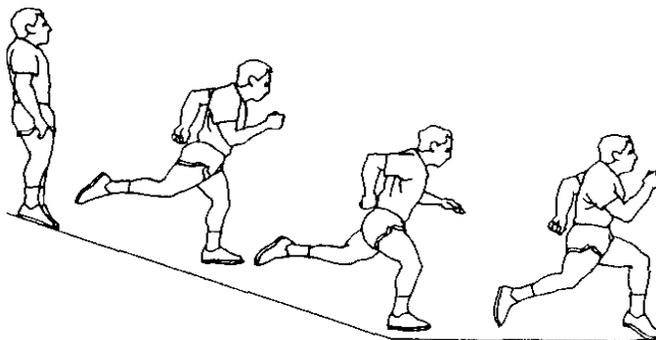
- The players are divided into pairs, with one player standing 1 metre behind the other.
- The players sprint over a short distance, with the rear player trying to "tag" the front player, by a two-handed simultaneous tag.
- After each repetition, the players switch roles.
- This drill can be done with the front player carrying the ball.



Training Load
Reps: 5 to 20
Distance: 5 to 40 metres
Rest: Walk recovery

79. DOWNHILL SPRINTS +

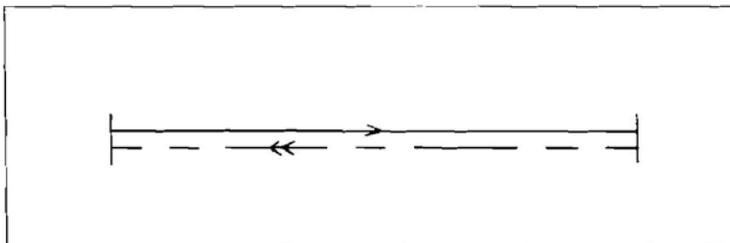
- A short, gentle slope that leads onto flat ground is required for this drill. The players sprint as fast as possible down the slope, finishing each run on the flat.
- The slope should not be too steep, as this will lead to bad running form.
- There should be facilities nearby to perform skills or ballwork training.



Training Load
Reps: 5 to 15
Distance: 20 to 30 metres
(50% of each run on the slope
and 50% on the flat)
Rest: 60 seconds

80. BACKWARDS SPRINTING

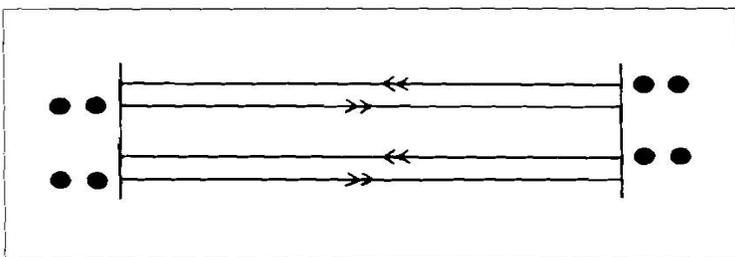
- Set out a 10 metre course.
- The players begin by jogging forward over the 10 metres.
- Once they have reached the 10 metre mark, they sprint backward as quickly as possible to the start.
- The players should lean slightly forward as they run backwards to allow them to change direction quicker.



Training Load
Reps: 4 to 8
Rest: 10 seconds rest between each rep.

81. SHUTTLE RELAYS *

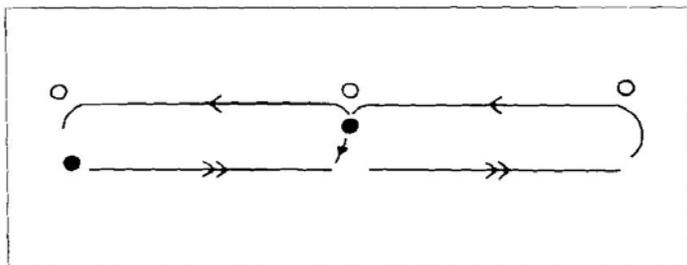
- The players are divided into groups of four.
- Two players from each team stand 10 to 20 metres apart.
- The first runner sprints to the other end and tags the next runner on the team.
- That runner runs back to the start to tag the next runner, and so on. The relay continues for 30 seconds.



Training Load
Sets: 2 to 4
Rest: 60 seconds between reps

82. HIT UPS * +

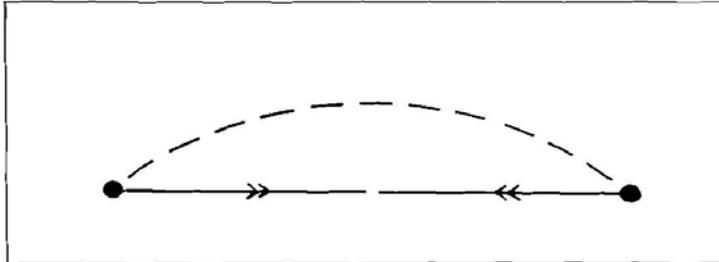
- Three markers are set 5 metres apart.
- A player stands at the second marker. A pass is "popped" to another player running as quickly as possible from the first marker. The runner continues to the third marker,
- This player jogs back to the second marker and prepares to pop a pass for the next runner. The first player jogs back to the first marker and waits for a turn to run.
- This drill is performed continuously for 2 minutes.



Training Load
Sets: 1 to 3
Rest: 2 minutes

83. *CATCH AND CARRY* * +

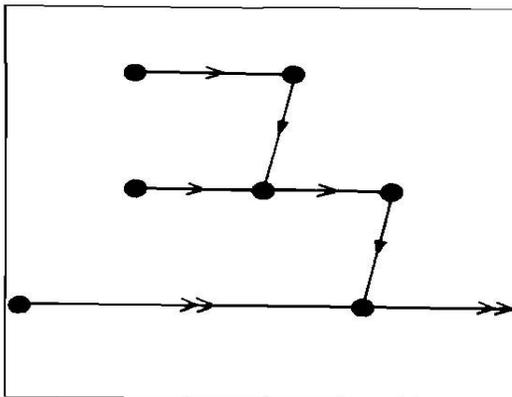
- The players are divided into groups of five.
- One player kicks the ball and then chases it.
- A second player fields the ball and sprints back with it, until met by the kicker.
- This player becomes the kicker and another member of the group becomes the receiver.
- This drill is performed continuously for 2 minutes.



Training Load
Sets: 1 to 3
Rest: 60 seconds between each set

84. *CHAIN PASSES* +

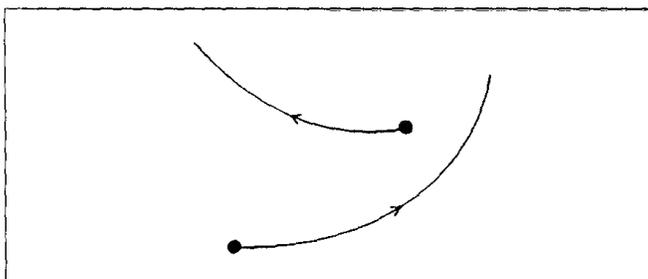
- The players are in groups of three, spread across the field, with the third player standing further back from the others.
- The players jog forward and the ball is passed from the first to the middle player.
- The third player then runs "onto the ball" at full pace. After each rep the roles are swapped around.



Training Load
Sets: 1 to 3
Rest: 60 seconds between each set

85. *ARCS* * +

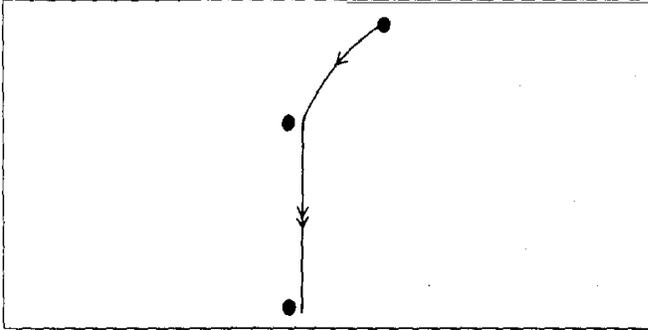
- The players sprint along an arc, going either left to right or right to left.
- While running the arc, the players inside arm should swing across the body and they should lean into the curve.
- This drill can be done with or without the ball.



Training Load
Reps: 4 to 8
Distance: 20 to 30 metres
Rest: Walk Recovery

86. *CUT AND RUN* * +

- The players run along an arc and then turn to sprint up the field. This drill should be run both left to right and right to left.
- A variation of this drill is to place a defender at the point where the players straighten up.
- This drill can be done with or without the ball.



Training Load

Reps: 4 to 8

Distance: 20 to 30 metres (50% of the run on the arc, 50% on the straight)

Rest: Walk recovery

T raining

***MAINTENANCE
TRAINING***

‘Main-
tenance
training
allows
players to
hold a high
level of
fitness’

Maintenance training refers to the training that is carried out during the season proper to maintain a high fitness level. The various fitness characteristics that Rugby League players require must be maintained for the duration of the season to be of any benefit. Maintenance training differs from preseason training in many ways. Pre season training follows a structured sequence. Certain fitness characteristics are developed at certain times.

Maintenance training must, however, meet all physical demands for an extended period. Training in the season proper varies each week. The performance in each game, the oppositions playing style, injuries and fatigue must be taken into account. Pre-season training is only concerned with preparing for the upcoming season. The coach is not concerned about games at that time as none are taking place.

During the season, the team must be prepared for every game. Players cannot be made tired before a game due to overtraining. Each week, the coach must provide enough activity to allow the players to sustain their fitness and also be fresh for the game. To achieve this, it is suggested that harder training sessions be carried out early in the week, easier sessions closer to the game and the training load decrease as the season continues.

Drills to maintain fitness throughout the season proper will vary in many ways. Maintenance drills must challenge several of the physical demands of the game and meet the needs of the team. For example, if the coach feels that more speed is required, then this form of training is emphasised. Some maintenance training drills can be used in the pre season.

Any drill, outlined earlier in the book, that could be used effectively for maintenance training has been marked with a cross, (+).

Important points to remember;

- Maintenance training allows a player to hold a high level of fitness throughout the season.
- Harder training sessions should be carried out early in the week with easier sessions later in the week.
- Maintenance training must be specific to the needs of the team.

MAINTENANCE TRAINING DRILLS

87. SMALL SIDED GRAB *

- a. The players are divided into teams of four to six.
- b. The two teams play grab football against each other. Grab is a variation of touch football, in which a player is considered tackled when an opponent can place two hands on them simultaneously. There are no scrums and no kicking involved. The winner is the team that scores the most tries.
- c. A large playing area can be used to increase the intensity of the workout.
- d. Grab football gives the players an opportunity to work on their communication and basic skills.

Training Load

Time: 10 to 40 minutes

Area: Up to a half a field.

88. BRITISH BULLDOG *

- A large playing zone is set out.
- One player is chosen as "in".
- The players try to get to the other side of the playing zone without being touched by the player who is "in".
- This drill is more effective if it is played in small groups, with a large playing area.

Training Load

Time: 5 to 15 minutes

Area: Up to half a field

89. MAINTENANCE CIRCUITS

- The players are divided into five groups.
- At five different stations, the players perform a drill that will stress one of the five fitness characteristics that have been outlined.
- An example of this type of circuit would be;

- 1) Zig Zags - 2) Hit the Ground Shuttle - 3) Transition Sprints - 4) Unders and Overs - 5) Power Hits

Training Load

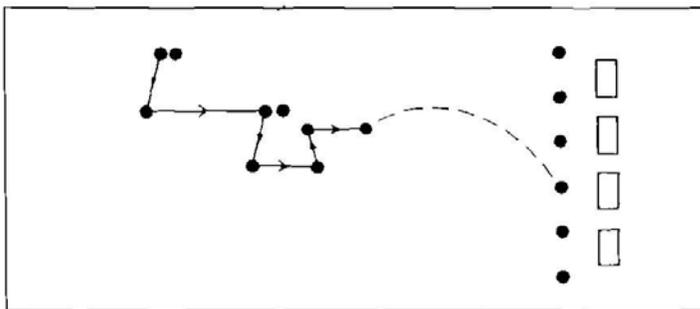
Time: 20 to 40 minutes

Time per station: 60 seconds to 3 minutes

Rest between stations: 30 to 60 seconds

90. BALLWORK AND BAGS

- a. The players start at one end of the field. At the other end are four or more tackling bags.
- b. The players perform a set of six plays, including the kick and chase, which will bring them to the other end of the field.
- c. Here the players perform six tackles on the tackling bags, moving forward in one line and back over 10 metres.
- d. As there are fewer bags than players, the players must nominate who going to perform a tackle.
- e. The bags can be moved around to vary the tackler order.

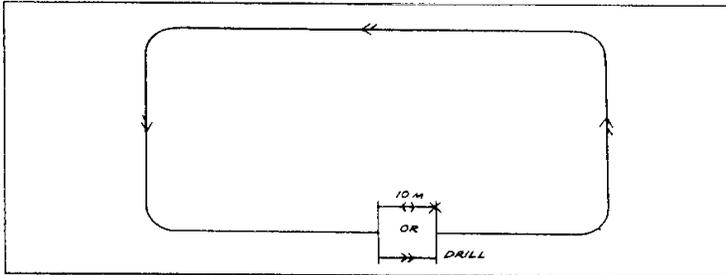


Training Load

Time: 20 to 40 minutes

91. HIT, CRUISE, SPRINT

- The players begin by performing the Hit the Ground drill (No 26). They then run a hard 400 metres around the field.
- As soon as the players finish the 400 metres, they perform one of the sprint drills outlined in the book. They then run another 400 metres at a lower intensity.
- Only one repetition of each sprint drill is performed.



Training Load
Reps: 4 to 8
Rest: 60 seconds

92. REPEAT SPRINTS

- This drill involves a large number of brief, intense efforts, with a moderate intensity activity in between each effort.
- An example of a repeat sprint workout would be;

- 1) 10 metre sprints with 30 metres running between * 5 then 60 seconds rest.
- 2) 20 metre sprint with 60 metres running in between, * 5 then 60 seconds rest.
- 3) 30 metre run, then perform Up and Back drill (No 40) twice * 5 then 90 seconds rest.

- The periods of work and rest are similar in length and intensity to a game.

Training Load

No of stations: 3 to 5

Rest between stations: 60 seconds or more between each station

93. SPRINTS WITH THE BALL *

- Two or more different sprint drills are undertaken.
- Each drill should require the players to carry the ball. (such as Drills 71, 75, 78, 82-86).
- This drill should be carried out late in the week.
- The following is an example of this type of workout;

- 1) 4*20 metre sprint with ball, jog recovery
- 2) 4* Hit Ups, jog recovery
- 3) 4* Arcs, jog recovery

Training Load

Drills: 2 or more

Reps: No more than 15 repetitions in total

Rest between reps: As per Training Load for that drill.

Rest between drills: 60 seconds to 2 minutes

94. OTHER SPORTS

As the season goes on, training can become tedious. Playing other sports, such as basketball, soccer and indoor cricket, will provide an effective fitness session and also add some variety to training.

Training Load

Time: 20 to 40 minutes

T raining

WEIGHT TRAINING

‘W eight
training for
Rugby
League
must be
specific to
the
demands of
the game’

In recent years, weight training has become an important factor in the fitness training of Rugby League players. Players, coaches and trainers have found it to be an effective method of increasing size, strength and power and, therefore, improving performance. Weight training for Rugby League must be specific to the demands of the game; and develop the muscles that are used in the game; along with those that are susceptible to injury.

Weight training for Rugby League ought to begin around the age of 16. Until this age, players should concentrate on developing fitness and, more importantly skills. Weight training plays a more important role as players get older. *

To achieve the best results from weights, a few exercises that will strengthen as many muscles as possible should be used. A player or coach should set aside 60 minutes for a weight training session. Ideally, two or three training sessions are undertaken each week.

Before the training program is discussed, it should be pointed out that weight training does not mean body building. Weight training for Rugby League is carried out to improve strength, power and, to a lesser extent, size. Training to achieve these goals differs. Weight training for Rugby League and body building may use similar lifts - however, their paths diverge in many ways.

**(N.B. This program has been included for the use of players interested in performing weight training. If an individual player is interested in weight training, this program can be passed onto them by the coach. It is assumed that training will take place in a commercial gymnasium. It is not suggested that clubs purchase the required equipment to undertake the program on a large scale.)*

THE TRAINING PROGRAM

Weight training should commence at least 12 weeks before the season. Two different programs are undertaken; the first lasting eight weeks and the second, four weeks. The aim of the first program is to increase size and to help prepare the body for the more intense training load in the second program. The second program is designed to increase strength and power.

Players who have never used weights before, should start out slowly, learn the lifts properly and use a light weight. The weight that is lifted should increase slightly with each session. With each lift, it should not be possible to perform more repetitions than the number that has been prescribed. For example, a player may be able to perform eight repetitions of a bench press, but should not be able to perform a ninth.

Program One

<i>EXERCISE</i>	<i>SETS</i>	<i>REPS</i>	<i>REST</i>
Squats	4	8 to 10	90 sec
Bench Press	4	8 to 10	90 sec
Seated Row	4	8 to 10	90 sec
Leg Curl	4	8 to 10	90 sec
Crunches	4	25	60 sec
Back Extension	4	15	60 sec

Program Two

<i>EXERCISE</i>	<i>SETS</i>	<i>REPS</i>	<i>REST</i>
Power Clean	4	3 to 5	180 sec
Speed Squats	4	6 to 8	180 sec
Bench Press	4	6 to 8	180 sec
Seated Row	4	6 to 8	1 80 sec
Leg Curl	4	6 to 8	180 sec
Crunches	3	30	60 sec

N.B. In the second program, the players must try to lift the weight as fast as possible. With the exception of the power clean, the weight to be lifted should be reduced, to allow very quick movements. A player would perform this type of weight training at the same time as the team is conducting speed and power training.

Training with a partner is also very important, as this is much safer than training alone. If the player is tired or sore, an extra days rest must be allowed. This will reduce the risk of injury or heavy fatigue.

Some of the exercises that are used in these two programs may be varied, such an Incline Press for Bench Press. It is important to keep the number of sets, reps and rest the same if any exercise is changed.

During the season, the same programs are followed. However each program is only 2 weeks in duration.

Important points to remember;

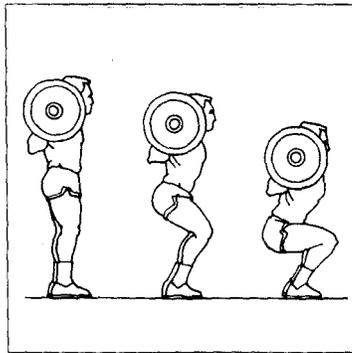
- Weight training for Rugby League is used to' increase size, strength and power.
- Weight training for Rugby League is different to body building.
- Only a small number of exercises, which work as much muscle mass as possible are required.
- A beginner should take time to learn the exercises well.

THE LIFTS

The following diagrams and explanations of technique will give the player a better understanding of the lifts included in the program. If you are in any doubt, seek the guidance of a qualified strength coach or trainer

1. SQUATS AND SPEED SQUATS

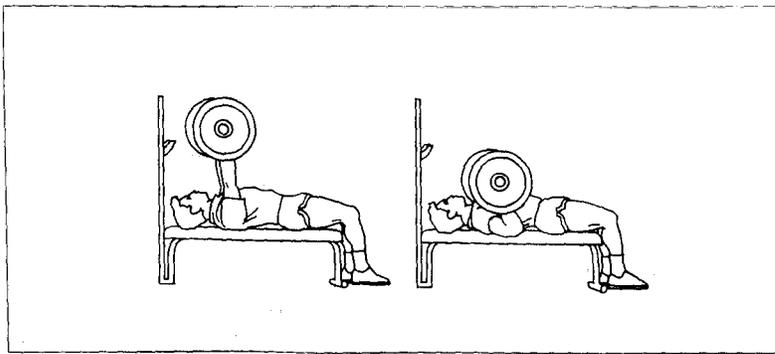
- a. The bar is placed across the player's shoulders, behind the neck, with the hands placed along the bar at slightly wider than shoulder-width.
- b. The player stands with feet at shoulder-width and the toes pointing slightly out.
- c. The bar is lowered slowly, by bending at the hip and knee.
- d. Once the thigh becomes parallel with the floor, the player pushes back up to the starting position in a controlled manner.
- e. The player should never go beyond a position where the thigh is parallel to the ground, as this may lead to knee problems.
- f. For a speed squat, the player does not descend quite as far.
- g. On the ascent, the player tries to lift the bar as quickly as possible, while still maintaining control, and push up onto the toes.
- h. Training with a spotter will minimise the chances of injury from overexertion.
- i. On the descent, the player should breath in and try to minimise forward lean by keeping the head up and keeping the hips under the bar. On the ascent, breath out.



N.B. The breathing technique outlined for the squat, applies to all of the exercises in this program.

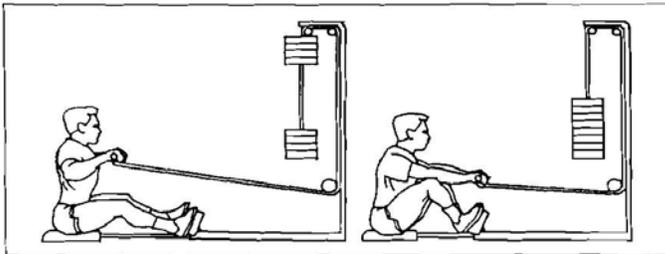
b. BENCH PRESS

- The player lies on the bench, eyes directly under the bar. The grip is slightly wider than shoulder-width and evenly spaced on both sides.
- The bar is lifted from the rack and held at arm's length, directly above the chest.
- The player slowly lowers the bar over the chest, until it is nearly touching the sternum and then pushes it back to the starting point.
- While performing the bench press, the player keeps their back flat, either by contracting the stomach during the lift phase, or by placing the feet on the end of the bench before lifting.
- The bar must not be bounced off the chest as this can lead to rib cage damage.
- The use of a spotter is very important and strongly encouraged.



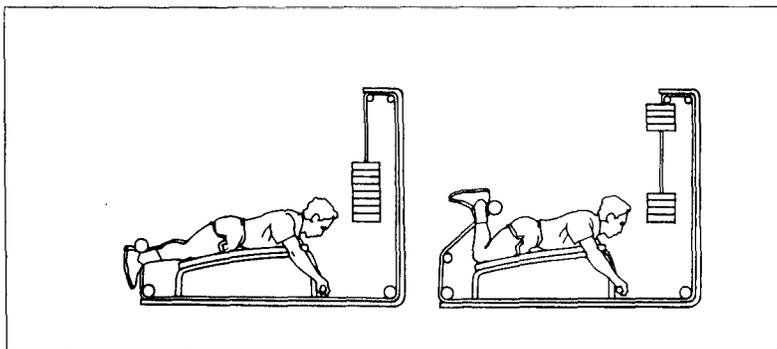
- *SEATED ROW*

- A seated row machine is required for this exercise.
- The player starts by taking the handle in both hands. The arms are held straight out in front of the body. The hips are kept as rigid as possible. From the starting position, the player lifts the weight by pulling their hands in towards the stomach, in a rowing fashion.
- The shoulder blades should be brought together and the chest pushed out.
- Then slowly lower the weight.



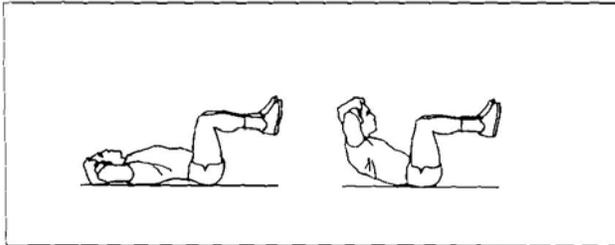
d. *LEG CURL*

- A leg curl machine is required for this exercise.
- The player lies face down on the bench. Placing the ankles underneath the lifting pads and keeping the ankle bent at right angles.
- The exercise is performed by curling the foot back towards the buttocks. The player should feel a "squeeze" on the back of the thigh.
- The weight is then lowered very slowly.
- It is important to ensure that the pads do not roll up the leg (ie towards the knee) as the lift is performed.



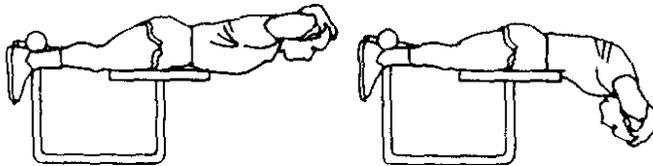
e. CRUNCHES

- The player lies on their back, with feet off the ground and the knees bent. The hands are held to the side of the head.
- To perform the crunch, the player simply curls the upper body towards the knees before being lowered to the starting position.
- If the exercise is easy, a weight is added to the player's chest.



f. BACK EXTENSIONS

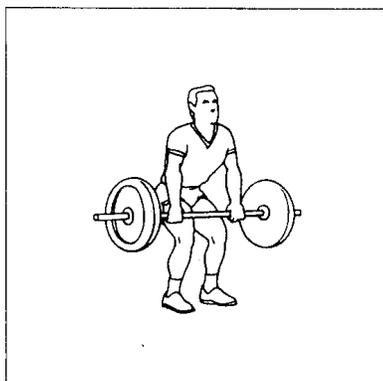
- A back extension bench is required to perform this exercise.
- The player lies on the bench, with hips supported and torso suspended. The feet are used to support the body (see diagram).
- The player starts lowering his torso, by curling the spine. They then return to the starting position.
- The player's body does not ascend beyond being parallel with the ground. Coming up any higher may cause lower back problems.



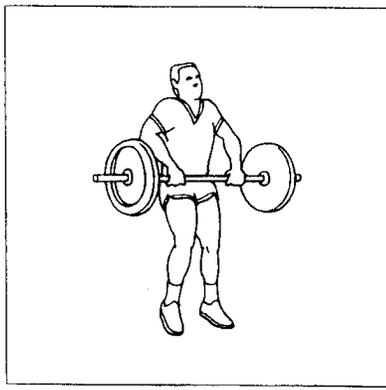
g. POWER CLEAN



To start, the bar is positioned on the ground. The player grips it, with hands at shoulder width, and the palms facing the body. The back is kept flat and the thighs are parallel to the ground. The bar is close to the shins.



In the first part of the movement, the player begins to lift the bar. The knees begin to straighten, while the back remains flat and at the same angle. The bar should brush the lower legs as it is lifted.

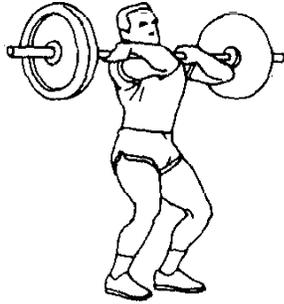


In the second phase of the movement, the hips begin to straighten, bringing the bar to just below hip level.

The player starts to shrug the shoulders and rise onto the toes.

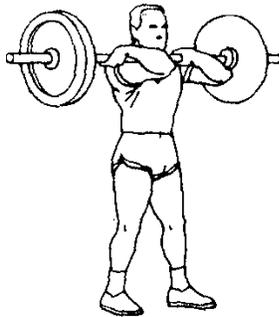
With the third part of the lift, the player continues to go up on the toes.

The bar is pulled up the body by pushing the elbows up and out to the side.



Once the bar has been pulled up the body to mid chest, the player must bring the body weight underneath the bar. This is done by bending at the hip and knee, so the body is lowered and by quickly rotating the elbows, underneath the bar.

This movement must be done very rapidly if the lift is to be successful.



Finally the player simply straightens the hip and knees so that they are standing upright.

To lower the bar, the same movements are simply done in reverse.

The first few workouts should be taken very slowly, using light weights, until good technique is mastered. Then the speed of the lift and the weight that is lifted should be increased.

- Due to the difficulty of this lift, consulting a qualified strength coach for guidance is strongly recommended.

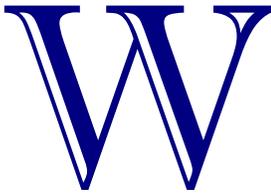
Important Points to Remember

- Performing these lifts with the proper technique will achieve the best results.
- Guidance from a qualified strength coach is strongly recommended.
- The player should breath in as the weight is lifted and breath in as it is lowered.

W arm-ups

WARM-UPS AND COOL DOWNS

‘Warm-ups and cool downs help the player to perform better, recover faster and avoid injury’



warming up and cooling down is important in training and competing in any sport. Warm-ups prepare the players physically for the activity that is to come, decrease the chances of injury and assist in getting the players in the right frame of mind to train or play. Cool downs reduce the risk of injury and speed recovery. Warming up and cooling down will only take 10 to 15 minutes per session - possibly the most beneficial training time.

WARM-UPS

The main aim of the warm up is to increase the player's body temperature. At least five minutes should be set aside for activities which will be at an intensity that will build up a light sweat. Jogging, running, simple ball drills and upper body exercises should be included.

Stretching is also an important part of warming up. A variety of exercises that stretch the hamstring, quadricep, calf, adductor, lower back, chest, shoulder and neck muscles are needed. Stretching will help prevent injuries and allow the players to perform explosive activities quickly. While a team is stretching the coach can explain what is going to take place during the session. Stretching should not involve bouncing, bending forward from the hips, resting on the knees, excessive arching of the spine or twisting the knee backwards. Each stretch should last 10 to 15 seconds.

COOL DOWNS

The cool down should include very light activity, such as slow jogging or walking and lots of stretching. The cool down allows a player to recover quicker and also avoid injury. This period also gives the coach an opportunity to give his players any final information they may need. Only a few minutes need to be set aside for a cool down.

Important points to remember;

10 to 15 minutes needs to be set aside for warm-ups and cool downs.

Warm ups and cool downs help players to perform better, recover faster and avoid injury.

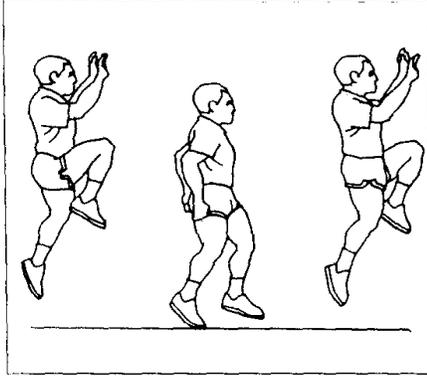
DRILLS FOR WARMING UP

95. SKIPPING

Skipping is a very simple exercise that warms and loosens those muscles around the hips, knees and ankles.

The players skip by bringing one knee up as high as possible and pushing off the ground with the other foot.

Between each jump, they take a very short skip step.



Training Load

Reps: 2 to 4

Distance: across the field.

96. THE 10 METRE DRILL

Markers are set out at 10 metre intervals along the side of the field.

Between each marker, the players perform a different activity.

For example, they may jog to the first marker, run backwards to the second, run sideways to the third and then do 10 push-ups.

Training Load

Reps: 2 to 6

Distance: 30 to 100 metres

97. RUN-THROUGHS

Run-throughs involve the players doing a series of runs, beginning at a slow pace and building up to nearly full pace.

Run-throughs are a good warm up for agility, power and speed training.

Training Load

Distance: 40 to 100 metres

Reps: 5 to 10

Rest: Jog recovery

98. TAG BALL

A playing zone of 10 metres by 10 metres is set out.

The players are divided into two teams. The aim is for one team to tag all the members of the opposing team with the ball.

A player is tagged if touched with the ball.

A player on the team with the ball cannot run when in possession. If the ball is dropped, possession is lost.

When all the players on one team are tagged, the other team has possession and the drill starts again.

The number of players on each team should be kept low, up to 6 at the most, to ensure all the players are active throughout the warm-up.

Training Load

Time: 5 to 10 minutes

99. INSIDE PASSES

The players are divided into groups of three.

The players take it in turn to run onto an inside pass as they run across the field.

An inside pass involves a player moving around the back of the player in possession and running onto a pass. Each pass is in the opposite direction to the previous one.

The players should be communicating as they would on the field.

Training Load

Reps: Up to 10 crossings of the field.

100. SPREAD THE BALL

The players are divided into groups of 3 or 4, spread 5 metres apart. The ball is passed along the line and back, as the players run across the field.

With every crossing of the field, the pace increases slightly.

The ball should be passed along the line as quickly as possible.

Training Load

Same as for Drill 99.

101. BAD HANDS

The players are divided into small groups; each with a ball.

One player, the passer, stands facing the rest of the group, who are standing in a line. The first player in the group runs towards the passer, who throws the ball to the side, above or to the feet.

The player must catch the ball and throw it back to the passer.

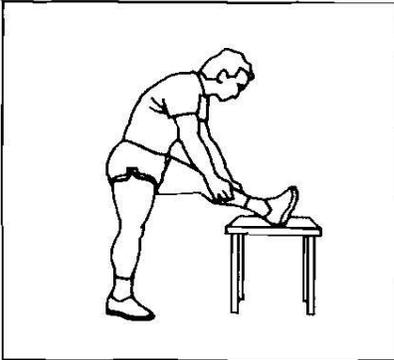
They then run to the end of the line and the next player runs through. The drill is conducted at a fast pace.

Training Load

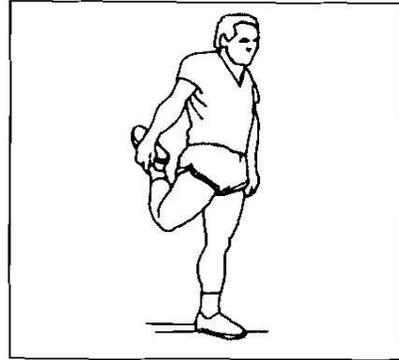
Time: 2 to 4 minutes

STRETCHES

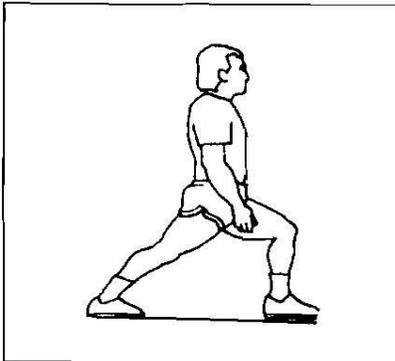
1) Hamstrings



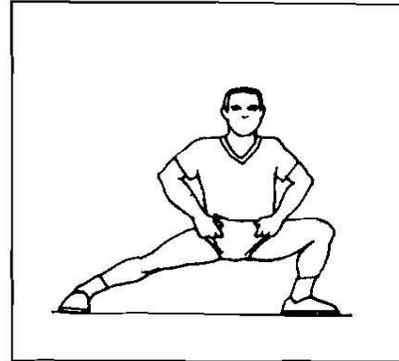
2) Quads



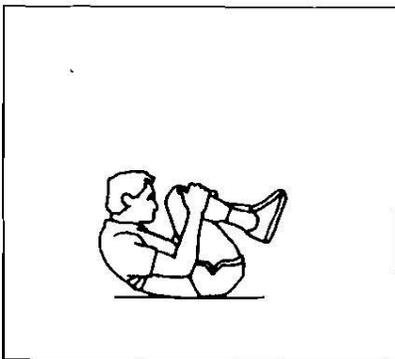
3) Calves



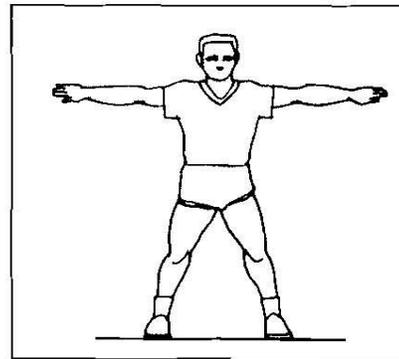
4) Adductors



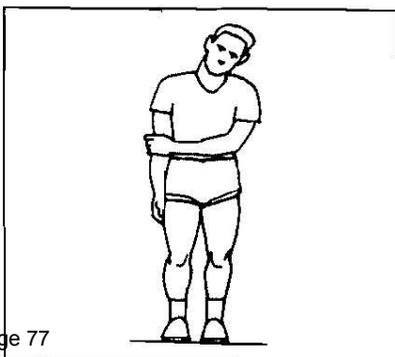
5) Lower Back



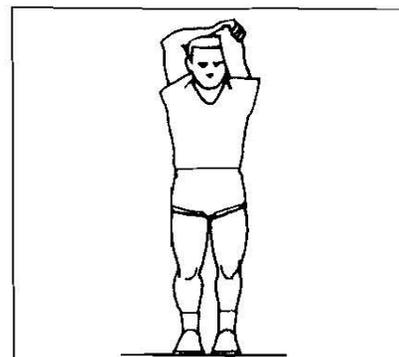
6) Chest



7) Shoulders



8) Neck



SAMPLE TRAINING PROGRAMS

To give coaches or trainers a better understanding of how to use the information in this book, three sample training programs have been included. The first program is aimed at a team that is aged 10 to 12 years. The second program is aimed at players aged 13 to 15 years. The third program is for a team that is 16 years or older.

Program 1

The pre-season starts 6 weeks before the season proper. Two training sessions of 30 to 45 minutes are carried out each week.

Preparation Phase

Week 1 to 3.

Skills training only.

Pre-Competition Phase

Week 4.

Session 1. Agility Drills 34 and 41, run as relay races.

Session 2. Agility Drill 45; Speed Drills 71 run as a race.

Week 5.

Session 1. Power Drills 61 and 62; Maintenance Drill 87.

Session 2. Agility Drill 45; Power Drill 65; Speed Drill 80

Week 6.

Session I. Maintenance Drills 87 and 88.

Session 2. Skills Training.

Up to 10 minutes per session is set aside for fitness training. Efficient rest should be allowed between each repetition. The drills should be organised so that they are enjoyable and not tiring.

Program 2.

The pre-season begins 8 weeks before the beginning of the season proper. Training each week comprises two, 60 minute sessions.

Preparation Phase.

Week 1.

Session 1. Aerobic Endurance Drill 1.

Session 2. Aerobic Endurance Drill 7.

Week 2.

Session 1. Aerobic Endurance Drill 9.

Session 2. Aerobic Endurance Drill 16.

Week 3.

Session 1. Anaerobic Endurance Drills 19 and 24.

Session 2. Anaerobic Endurance Drill 25.

Week 4.

Session 1. Agility Drills 35 and 36; Anaerobic Endurance Drill 25.

Session 2. Agility Drill 34 and 41; Anaerobic Endurance Drill 26.

*Pre-Competition Phase.***Week 5.**

Session 1. Agility Drill 37; Power Drills 50 and 51; Speed Drill 67 and 68.

Session 2. Agility Drill 35; Power Drills 48 and 51; Speed Drill 71.

Week 6.

Session 1. Agility Drill 44; Power Drill 61; Speed Drill 71.

Session 2. Agility Drill 45; Power Drill 64; Speed Drill 80 and 81.

Week 7.

Session 1. Agility Drill 45; Speed Drill 83; Maintenance Drill 87.

Session 2. Agility Drill 47; Power Drill 65; Speed Drill 87.

Week 8.

Session 1. Maintenance Drill 94; Speed Drill 85.

Session 2. Ballwork only.

Up to 20 minutes is spent on fitness training in each session. The distance of each drill and number of repetitions is reduced to allow for the lower physical maturity of the players. As the season comes closer, the rest between speed and agility drills should be shortened or become a jog recovery. This will keep the players more active and make training even more specific to the demands of Rugby League. Once the season proper has begun, maintenance training is undertaken.

Program 3.

This program begins 12 weeks before the start of the season proper. Two training sessions are carried out each week, each lasting 90 minutes.

Preparation Phase.**Week 1.**

Session 1. Aerobic Endurance Drill 1.

Session 2. Aerobic Endurance Drill 4.

Week 2.

Session 1. Aerobic Endurance Drill 8.

Session 2. Aerobic Endurance Drill 12

Week 3.

Session 1. Aerobic Endurance Drill 17.

Session 2. Aerobic Endurance Drill 18.

Week 4.

Session 1. Anaerobic Endurance Drill 19

Session 2. Anaerobic Endurance Drills 20 and 24.

Week 5.

Session 1. Anaerobic Endurance Drills 24 and 25.

Session 2. Anaerobic Endurance Drills 25 and 28.

Pre Competition Phase.**Week 6.**

Session 1. Agility Drill 33; Anaerobic Endurance Drill 32.

Session 2. Agility Drill 35; Anaerobic Endurance Drill 24.

Week 7.

Session 1. Agility Drill 38 and 39; Power Drills 48 and 50.

Session 2. Agility Drill 38; Power Drills 50 and 51.

Week 8.

Session 1. Agility Drills 41 and 42; Power Drills 49 and 52; Speed Drill 67.

Session 2. Agility Drill 42; Power Drill 54; Speed Drill 70.

Week 9.

Session 1. Agility Drill 44; Power Drill 56; Speed Drill 71.

Session 2. Power Drills 56 and 60; Speed Drills 71 and 75.

Week 10.

Session 1. Agility Drill 45; Power Drills 56 and 60; Speed Drill 78.

Session 2. Agility Drill 47; Speed Drill 82; Maintenance Drill 87.

Week 11.

Session 1. Agility Drill 46; Power Drills 65 and 66; Speed Drills 82 and 83.

Session 2. Power Drill 66, Speed Drills 84 and 85, Maintenance Drill 88.

Week 12.

Session 1. Maintenance Drill 90.

Session 2. Ballwork only.

The length of time spent on fitness training each session will vary depending on the part of the pre-season in which the team is. As little as 20 minutes and as many as 45 minutes is spent on fitness training. As the season gets closer, more time should be spent on ballwork training. Fitness training becomes more intense and includes the use of the ball to a greater extent. The rest period between repetitions for speed and agility drills becomes shorter or involves a jog recovery. Once the season has begun, maintenance training is undertaken.

GLOSSARY

Adductors: The muscle group on the inside of the thigh.

Aerobic energy system: The aerobic energy system provides energy for continuous activities, such as running at a low to moderate intensity.

Long term anaerobic energy system: Also known as the Lactic Acid energy system. It provides energy for intense activities of up to 60 seconds in duration

Short term anaerobic energy system: Is also known as the ATP-PC system, which provides energy for short duration activities (0 to 12 seconds) that are carried out at maximum intensity.

Ballwork: Practicing the play that occurs on the field. Also known as "Game Play".

Calves: The muscle group at the rear of the lower leg.

Grab Football: A minor game of Rugby League. The player is considered held when an opponent places two hands on them, simultaneously. No scrums or kicking take place.

Hamstrings: The muscle group at the rear of the thigh.

Hit the Ground: Players run to a mark and drop to the ground on their chests. They then jump to their feet to continue the drill.

Maintenance Training: Training that is designed to maintain the player's fitness level throughout the season.

Plyometrics: Also known as Jumps. Exercises that involve repeated jumps, hops, bounds and pushes, designed to increase power.

Pre-Season: The time period before the season, when the majority of fitness training occurs.

Quads: The muscle group on the front of the thigh.

Repetition: A single performance of any exercise.

Sets: A specific number of repetitions, of any exercise.

Slide: Taking large, skipping-like steps to the side.

Work to Rest Ratio: A comparison in which the length of the rest period depends on the length of time taken to perform the drill. For example, if a drill takes 30 seconds to complete, and the work-to-rest ratio is 1:2, the rest period, between repetitions is 60 seconds ...or twice 30 seconds.

BIBLIOGRAPHY

- Abernethy, P, Batman, P, & Schell, J. (1987). The first physiological assessment of South Sydney Rugby League players. Unpublished.
- Carr, G. (1989). Fundamentals of track and field. Leisure Press, Champaign III, 10-17.
- Chu, D. (1984). Plyometric exercise. National Strength and Conditioning Association Journal. January, 57-62.
- Fleck, S., & Kraemer, W (1987). Designing resistance training programs. Human Kinetics, Champaign Ill. 61-67.
- Garhammer, J. (1984). Power clean; A kinesiological evaluation. National Strength and Conditioning Association Journal. June-July, 40-44.
- Giles, K. (1989). Winter Fitness. Sun Books, Drummoyne NSW, 94-102
- Leelarthapien, B., & Schell, J. (1990) Physical fitness assessment in exercise and sport. Leelar Biomediscience, Matraville NSW, 3.86-3.88.
- O'Bompa, T. (1990). Theory & methodology of training. Kendall/Hall, Dubuque IA, 123-127.
- O'Connor, D. (1992). A test of anaerobic glycolytic capacity and agility for Rugby League and Touch Football. Sports Coach Oct - Dec 1992. F 12.
- O'Shea, P (1985). The parallel squat. National Strength and Conditioning Association Journal. Feb-March, 4-7.
- Pyke, F., & Rushall, B. (1990). Training for sport and fitness. Macmillian, Melbourne Aus, 287-290.
- Reilly, T., Secher, N., Snell, P, & Williams, C. (1990). The Physiology of Sport. E & FN Spon, Torquay Eng, 411-418.
- Shields, T. (1993). A Scientific Approach to Resistance Training. Fitlink Coorporoo DC, 15,19-20.