ATHLETICS COACH: SPEED - HURDLING

WELCOME

Hello and welcome to this British Athletics module, Speed: Hurdling.

OBJECTIVES

By the end of this session, you should be able to:

- State the technical requirements for hurdling.
- State the physical preparation requirements for hurdling.
- Use interventions and differentiate.
- Identify feedback-generating options.

INTRODUCTION AND HOMEWORK

This module is designed to introduce you to some theoretical concepts that support your learning from Day 1 and 2.

The homework pack that you have completed will have given you greater insight into some of the aspects of this course. Learning from this will be summarised within this module.

Some of the tasks within this module and the modules to follow will reinforce your previous learning.

ATHLETE-CENTRED DELIVERY

We'll begin with a reminder that all coaching should be athlete-centred.

The needs of the athlete should be placed above the activity, competitions, clubs, parents, and coaches' goals and ambitions.

Each athlete should be treated as an individual with unique needs, interests and goals.

Each athlete should be encouraged to be involved in their own development and empowered to take greater responsibility in it.





BENEFITS OF SESSION PLANNING

Session planning is an important part of supporting your athlete and encouraging progress.

Take a moment to consider your homework from days 1 and 2 and think about what you learnt about the value of profiling, setting goals and delivering from a session plan.

Session plans give the coaching team focus.

It helps the coaching team to become more organised.

It promotes progressive development of the athletes, where the next session builds upon the previous session.

It allows coaches to develop themselves.

Session plans should have clear, process based SMART goals that link to the athlete's needs, as identified in their profile. By profiling the athlete – as you did for your homework – you can better tailor their goals. The term 'Golden thread' can be used to describe the link between the profile, goals, mesocycle and subsequent session activities.

Session plans must be a useful document that respond to the needs of the athlete.

HURDLING TECHNICAL POINTS VIDEO

Watch the video to see the technical points of hurdling.

Technical Points for hurdling

Use a notepad and pen to make notes, or print off the Hurdling technical points sheet (in the 'resources' tab) to make notes on – you'll need them for the next task!

HURDLING TECHNICAL POINTS TASK

Below are the technical points to the correct stage of the whole hurdling movement.

Take off.

- Takes off well in front of the hurdle.
- Knee then heel drives straight at hurdle.
- Fully extends the hip, knee and ankle at take-off.
- Drives forward more than upwards.

Clearance.

- Keeps shoulders ahead of hips.
- Pulls the trail leg knee through fast.
- Keeps the heel close to the buttock.





Recovery.

- Hips are over or beyond the landing foot.
- First stride off the hurdle is aggressive.
- Uses a '1, 2, 3, over' rhythm between hurdles.

FUNDAMENTAL MOVEMENTS AND COORDINATION

Think about the following questions and write down your answers:

Question 1: What fundamental movements underpin hurdling?

Question 2: How is coordination expressed correctly in hurdling?

Question 3: How can fundamental movements and coordination be developed in

Question 4: What is the impact of focusing on fundamental movement and coordination in hurdling?

Correct Answers below:

Answer 1: The fundamental movements hinge, brace, rotate, squat, push/pull and lunge ALL underpin hurdling.

Answer 2: This is how coordination is expressed correctly in hurdling: Drive knee then heel at hurdle; opposite leg and arm for trail leg recovery.

Answer 3: Fundamental movements and coordination can be developed by completing exercises to promote balance, coordination and spatial awareness (such as ladder, cones and hurdle drills). Warm-up or a movement skills unit are also a good place for this.

Answer 4: The impact of focusing on fundamental movement coordination in hurdling is an improved physical ability to perform the technique. For example, practising coordination of driving the lead knee and heel straight at the hurdle and trail leg recovery can help prevent lateral forces and imbalance on landing.

DIFFERENTIATION IN HURDLING

Sometimes adaptations need to be made to ensure that hurdling is truly inclusive. Learn more about how hurdling can be differentiated for a range of needs in training.

STEP stands for **S**pace, **T**ask, **E**quipment and **P**eople. You can differentiate your session by altering some or all of these 4 principles.





Space. Where will the activity happen? You can increase or decrease the area used, or change distances.

Task. What is happening? You can change the activity rules, the number of repetitions or level.

Equipment. What will you use? You can change the amount or the level of the equipment, size of the target, the height and the arrangement of the equipment.

People. Who is involved? You can create teams, designate leaders, or ask people to work alone or with a buddy.

How STEP can be applied to a Coaching Session

APPLYING ADAPTATIONS

This is Joe. He is taller than average height and physically advanced for his age. Which adaptations would you use for Joe when hurdling?

- 1. Cones to denote rhythm between barriers
- 2. Higher barrier height
- 3. Longer distances between barriers
- 4. Lower barrier height
- 5. Shorter distances between barriers

Depending on the goal, these can all be correct. For example, even though Joe is tall, he may need the hurdles to be moved closer together if there is a strong tailwind, as it can be challenging for a tall athlete to practise simulating a strong tailwind.

Make sure you consider the session goals and conditions when making any adaptations.

RECOGNISING MISMATCHES IN HURDLING

Let's see how well you know the technical points for running over obstacles.

Decide whether the movement described is a 'Match' or 'Mismatch'.

- Drives forwards more than upwards
- Hips are behind the landing foot
- First stride off the hurdle used to recover balance
- Keeps the head level throughout the run
- Pulls the trail leg knee through fast.
- Keeps the heel close to the buttock
- Takes two long and one short take-off strides between hurdles
- Keeps shoulders ahead of hips





INTERVENTIONS

Interventions can be **short term** and **long term**. Short term interventions take place within the session through differentiation and feedback. Long term interventions need sustained changes in areas such as physical prep, technical development or lifestyle adaptations.

Coaching styles are a short-term intervention.

There are 3 coaching styles commonly used, which may be useful in different situations.

Telling. Coach-centred and coach led, heavy on command and instruction. This is useful in some situations where safety is paramount or time short.

Showing. Emphasis on demonstration, coach led, coach and athlete centred. Useful with practical skills, with novices and with younger athletes.

Involving. Uses self-discovery and questioning to raise awareness. Athlete led and athlete-centred – the athlete makes decisions. Use this whenever possible as it maximises learning and retention.

Teaching methods are a short-term intervention.

Once it has been established during practise that an athlete can't achieve a movement, there are 4 main teaching methods that can be used as an intervention.

Chaining. Demonstrate and explain the whole movement, and then demonstrate and explain parts 1 and 2. Then let the athlete practice until ready, and add part 3 to parts 1 and 2. The whole skill can eventually be learnt using this method.

Shaping. Make the activity harder or easier. Demonstrate a simplified technique after showing the whole skill. Then practise the simplified technique. Gradually build in additional components to shape the full skill.

Whole Part Whole. The whole action is performed. The elements that need practice are isolated. After practising the 'part' the 'whole' is practised again.

Guided Discovery. Outline the objective, set the rules that the athletes work within. Allow exploration and the athletes to identify what they have learnt. The coach may drop in hints and clues at appropriate times throughout the exercise. Then recap and summarise.

Feedback is a short-term intervention.

There are two categories of feedback, both are useful to highlight areas for improvement and also successes.

Intrinsic. Feedback that comes from within – the feeling of your joints and muscles for example.

Extrinsic. Feedback received externally – From others or watching videos for example.





Long term interventions are often used to underpin short term interventions.

For example; Strength and Flexibility. Developing Strength and/or Flexibility allows the body to get into and hold the shapes required for the technique of a particular event. Physical preparation and the shapes that can be achieved underpin the ability to undertake a technical movement.

Links. There may or may not be a relationship between short and long term interventions, depending on what is trying to be achieved.

Interventions in Practice Video

PHYSICAL PREPARATION FOR HURDLING

The most effective physical preparation for hurdling includes **any** training that addresses the physical fitness elements required to perform hurdles. However, some activities will be more suitable than others, although they are all equally important, and the athlete must be able to perform the movement correctly before loading.

Some examples of physical preparation for hurdling are:

Squats, Lunge, Jumping, Medball push throws, Medball pull throws, Medball sling, Deadlift with dumbbells, plank, skipping.

A good range of activities, especially those that focus on the parts of the body most used in hurdling like the trunk and lower body, will provide a solid foundation of physical preparation. These activities also reinforce the fundamental movements but should only be undertaken if the athlete is physically capable of performing the task.

REFLECTION

As you complete the self-reflection either make notes for your own records, take a screen shot, print the screen or print off a sheet from the resources tab to fill in.

This will allow you to keep track of your progress and identify areas for focus in future.

Score yourself from 1 (an area needing much development) to 10 (a great strength).

- Athlete-centred delivery.
- Points for technical hurdles.
- Fundamental movements.
- Differentiating.
- Interventions.
- Feedback.
- Physical preparation.

Type one thing that you'd like to apply in your next coaching session.





CONGRATULATIONS!

Congratulations! You have now completed this British Athletics module, Speed: Hurdling.

You should now be able to:

- State the technical requirements for Hurdling.
- State the physical preparation requirements for Hurdling.
- Apply interventions and differentiation.
- Identify feedback-generating options.

When you're ready, please begin the next module on the course, **Speed: Relays, starts and acceleration.**

Thank you and goodbye.



