Teaching Badminton Based on Student Skill Levels

By Jianyu Wang and Jeff Moffit

Helping children and adolescents develop physically active lifestyles is the core of quality physical education programs. Physical educators must teach students skills, knowledge and dispositions needed to live a physically active life. Additionally, the national standards indicate that a physically demonstrates educated person competency in motor skills and movement patterns needed to perform a variety of physical activities (NASPE, 2004). Therefore, physical education teachers must help students develop movement competence in activities and sports so they have the skills to enjoy participation in physical activity.

Badminton has been identified as a lifelong activity. It is an inexpensive sport and everyone – children, seniors, and individuals with disabilities – can reach a level of enjoyment in the game after mastering basic skills and tactics. Individuals can choose to play the game at different levels of intensity; from just maintaining a shuttle rally, to playing a singles or doubles match. Research indicates that badminton not only helps participants develop cardiovascular fitness (Docherty, 1982; Wright, 2007), but also improves bone health (Nordstroem, Pettersson, & Lorentzon, 1998). For these reasons, many schools have included badminton in their physical education curriculum.

In teaching badminton, teachers need to understand how students develop game play ability from a low level to an advanced level. Physical education researchers have urged teachers to pay more attention to changes in students' movement performance (e.g., Chen, Rovegno, Todorovich, & Babiarz, 2003). Effort has been made to understand performance characteristics of badminton game play across students' skill levels (Wang, 2004). Wang's study found that the majority of high school students played games at a low level and during games they used immature forms of strokes, which are different from the strokes such as clear, drop, drive and smash described in badminton books (e.g., Grice, 1996). Wang's findings have revealed the process of skill development in badminton that students most likely go through and the immature strokes beginners frequently use during the game. This knowledge can help teachers both predict what should be taught next in the skill development sequence of badminton, and understand what skills and tactics need to be assessed at different learning stages.

To help students develop competency in badminton, teachers must be able to develop movement tasks that match students' skill levels. After identifying performance characteristics of the students at different skill levels, teachers need to design movement tasks appropriate to students at different learning stages. In the following discussion, performance characteristics of badminton at four different levels are presented and then followed by instructional strategies and drills proposed for students at each skill level. Figure 1 gives a brief explanation of each level.

Level One

Students at Level One frequently have difficulty making contact with the shuttle during practice and games. Most badminton beginners cannot place the shuttle into legal service and game play areas. Although some students at this level are able to make contact, they typically use immature forms of the strokes. One of the immature strokes is called the undifferentiated shot which is executed with an awkward form in a poor body position (Wang, 2004). Another immature stroke is called the cooperative shot which is performed by hitting the shuttle toward an opponent with a relatively slow speed and a high trajectory. With the cooperative shot, the shuttle is typically placed in the center of the court, but it provides an opponent with a good opportunity to smash. In addition, students at this level present little offensive and defensive awareness. For example, they have no intent to place the shuttle away from an opponent and force him/her to move and do not regularly return to their home base after hitting the shuttle to an opponent.

For students at Level One, teachers should help them develop the ability to make contact and place the shuttle into legal game play areas. Making contact is a basic skill in playing badminton and a foundation to develop the strokes of clear, drive, drop, and smash. Without the ability to make contact, it is impossible to apply various offensive tactics in game play. Both poor footwork and eye-hand coordination could affect making contact. Obviously, when students cannot adjust themselves to a proper position, it is difficult for them to make contact and effectively execute

Figure 1: Summary of four levels of student badminton play

Level 1 – Students have difficulty making consistent contact with shuttle and serving into game play area.

Level 2 – Students are able to make contact and play the shuttle into game play area, however they usually use immature forms of the stroke.

Level 3 – Students have the fundamental knowledge and skills of the game, and the ability to make appropriate decisions and select different offensive tactics depending on the situation. Students are now developing the advanced strokes (drive stroke, overhead clear, etc.).

Level 4 – Students are able to use the clear and drive shots during games and begin to score by using basic offensive tactics. They are also able to position themselves in a defensive manner.

a stroke. Therefore, students need to work on their footwork at this level. To facilitate this, teachers can assign tasks that require students to move from the center of the court to different directions and then return to the center.

Poor eye-hand coordination may result in a failure to make contact. Some students may not have developed adequate eye-hand coordination by the time they learn to play badminton. Thus, teachers must first help these students develop eye-hand coordination, and simple drills like hitting the shuttle into the air could be used to develop the coordination. In addition, teachers should instruct students how to use the wrist to control the shuttle and place it into the legal game play areas.

During this learning stage, students should be allowed to use a cooperative shot during practice or games. This is because the cooperative shot may serve as a transition before the students are able to execute the mature forms of the strokes such as clear and drive. Since the primary focus of the instruction at this stage is on developing the ability to make contact, students may be assigned drills like rallying the shuttle with a partner and being challenged to maintain the rally as long as possible.

When teachers assign students to play a modified game, they should be allowed to use immature forms of the strokes during games as long as they can hit the shuttle into the legal game play areas. Meanwhile, the "legal service areas" should be enlarged to the entire half court. Additionally, teachers may begin to teach the basic defensive tactics such as regularly returning to home base after hitting the shuttle to an opponent in the game. The following drills may be used to improve making contact:

Drill 1: Students in a ready position stand at the center of the court and move to the front, back, left, and right directions by following teachers' or peers' commands (footwork).

Drill 2: Students hit the shuttle into the air with the racket and count how many bounces they can achieve without losing control in one or two minute(s) (eye-hand coordination).

Drill 3: Students hit the shuttle against the wall and maintain a rally

Figure 2: Badminton Terms

Attacking clear: An offensive stroke hit deep into the opponent's court.

Backcourt: Back third of the court, in the area of the back boundary lines.

Backhand: The stroke used to return balls hit to the left of a right-handed player and to the right of a left-handed player.

Base position: The location in the centre of the court to which a singles player tries to return after each shot; also called "centre position".

Baseline: The back boundary line at each end of the court, parallel to the net.

Carry: An illegal stroke in which the shuttle is not hit, but caught and held on the racket before being released; also called a "sling" or "throw".

Centre line: A line perpendicular to the net that separates the left and right service courts.

Clear: A shot hit deep into the opponent's court.

Drive: A fast and low shot that makes a horizontal flight over the net.

Drop shot: A shot hit softly and with finesse to fall rapidly and close to the net in the opponent's court.

Fault: A violation of the playing rules.

Flick: A quick wrist-and-forearm rotation used to surprise an opponent by changing an apparently soft shot into a faster passing shot.

Forecourt: The front third of the court, between the net and the short service line.

Forehand: The stroke used to return a ball hit to the right of a right-handed player and to the left of a left-

handed player.

Game: The part of a set completed when one player or side has scored enough points to win a single contest.

High clear: A defensive shot hit deep into the opponent's court.

Kill: Fast downward shot that cannot be returned.

Let: A minor violation of the rules allowing a rally to be replayed.

Match: A series of games to determine a winner.

Midcourt: The middle third of the court, halfway between the net and the back boundary line.

Net shot: A shot hit from the forecourt that just clears the net and drops sharply.

Passing shot: A shot which passes the opposing player or team.

Push shot: A gentle shot played by pushing the shuttlecock with a little wrist motion.

Rally: The exchange of shots that decides each point.

Serve: The stroke used to put the shuttlecock into play at the start of each rally; also called a "service".

Service court: The area into which a service must be delivered. Different for singles and doubles.

Set: To choose to extend a game beyond its normal ending score if the score is tied with one point to go.

Smash: A hard-hit overhead shot that forces the shuttle sharply downwards into the opponent's court.

Source: www.badminton-information.com

as long as possible.

Drill 4: Students hit the shuttle to their partners and keep a rally to see how long they can maintain the rally without losing control.

Drill 5: Students play modified doubles games by using any strokes as long as they can play the shuttle into legal game play areas.

Level Two

At Level Two, students are able to make contact and place the shuttle into the legal game play areas. However, they extensively use immature forms of the strokes, such as the cooperative shot and undifferentiated shot. Additionally, many students at this level use another immature stroke called the developmental shot. This shot is performed with an observable intent to perform any of the strokes of clear, drop, drive, and smash, but the execution of the shot exhibits some problems in controlling the trajectory, placement, or power of the shot. Again, use of the developmental shot in game play might be an indispensable transition for badminton beginners.

At this learning stage, teachers need to help students refine immature forms of the strokes. Although students at Level Two may be allowed to continue to use developmental shots in practice and games, they should no longer use the cooperative shot and undifferentiated shot. Students at this level are ready to develop the clear stroke because the movement structure of the clear is similar to the structure of the cooperative shot and developmental shot. It would be easy for students to learn the clear after they are able to perform a cooperative shot or developmental shot.

For students at Level Two, the instructional emphasis should be on teaching the clear shot. A clear refers to a shot hit with a high trajectory and the shuttle lands in the back court. There are four basic forms of clear: (1) forehand overhead clear, (2) forehand underhand clear, (3) backhand overhead clear, and (4) backhand underhand clear. While teaching the clear, teachers should emphasize hitting the shuttle high and deep to the back areas of the court by using arm backswing and trunk rotation. Teachers may teach students the clear in an order of forehand overhead clear, forehand underhand clear, backhand overhead clear and finally backhand underhand clear.

During this stage, students need to

develop their awareness of offensives and defensive tactics. Teachers may start to teach students a basic offensive tactic that emphasizes placing the shuttle away from opponents and forcing them to move during the game. It is crucial for teachers to integrate the offensive and defensive tactics into the drills. For example, while assigning students to practice the clear with a partner, teachers may challenge students to hit the shuttle to the left or right corners of the court and force the partners to move back and forth. Meanwhile, students should be required to return to the center of the court after hitting the shuttle to their partners. This drill will help the students understand that placing the shuttle away from an opponent may lead to scoring in the game. The following drills could be used to develop the clear:

Drill 1: Students practice the forehand overhead clear with a partner by hitting the shuttle to the areas close to the baseline and maintaining a rally as long as possible.

Drill 2: Working with a partner, students practice the forehand overhead clear and attempt to increase the accuracy of the placement of the clear. Student A first tries to hit the shuttle to the right corner of the back court and then to the left corner after student B returns the shot. Students need to force the partners to move back and forth by changing the placements.

Drill 3: Students are divided into small groups (three or four students per group) and perform a clear relay. The group members line up at the back boundary line of the court facing the net and another group stands in the same place on the other side of the court. The first student starts with a forehand underhand clear over the net, and then he/she will quickly move back to the end of the group and wait for the next turn. A student from other side of the net will hit the shuttle back with a clear and then move to the back to wait for the turn. The students are challenged to maintain a rally as long as possible.

This drill can also be practiced in a competitive way. The students are required to hit the shuttle into the right or left corners to force their opponents to move and miss the shot. A group will win the race when it scores 15 points first.

Drill 4: Students play modified doubles games in which students are encouraged to use the different types of the clear to change shuttle placements and force opponents to move in response.

Level Three

The primary characteristic of students at performance Level Three is that they increasingly use forehand clears although they still use the developmental shot in games. At this learning stage, students are ready to learn the drive stroke. A drive is a shot hit with a flat trajectory and is a forceful stroke that gives an opponent little time to return the shot. Because of the fact that students at this level are able to perform the forehand overhead clear, which is similar to the drive, they may master the drive stroke quickly with better control of the power and angle.

Teachers must continue addressing offensive tactics at this learning stage. Students need to know that another offensive tactic they can use in the game is to win points by using forceful strokes such as the drive. The key in this tactic is that they have to hit the shuttle fast and give opponents no time to return the shot. Students at this level should be able to make appropriate decisions and select different offensive tactics based on game situations and opponents' weakness. In a game, they should use the two basic offensive tactics to score by changing the placement of shots and using a forceful shot.

To help students develop tactics awareness, teachers must design drills in which offensive tactics are properly integrated. A rally drill where students are not required to change placement of the shuttle should not be used at this stage because this type of drill may result in playing badminton games cooperatively instead of competitively. The following drills may be used to improve the clear and drive:

Drill 1: Students practice the drive with a partner. One student stands at the center of the court in a ready position while another student at the other side of the net tosses the shuttle for the partner to perform a drive shot. **Drill 2:** Working with a partner, students alternately use a clear or drive to force the partner to move in response.

Drill 3: Students practice the clear and/or drive with a partner. One student always uses the drive as an offensive stroke and the other student only uses forehand underhand clear for defense and the students maintain a rally as long as possible.

Drill 4: This is a drive relay. The format of the drill is similar to the clear relay, but students only use the drive instead of the clear during the relay.

Drill 5: Students play modified doubles games in which students are encouraged to use the clear and drive to win points and regularly return to home base during the games.

Level Four

Students at Level Four are advanced beginners. They are able to use the clear and drive during games and begin to score by using basic offensive tactics, which are to place the shuttle away from opponents and to use the forceful shot. They demonstrate awareness of defending their space by regularly returning to the home base. However, not many students at this level are able to actually use the strokes of drop and smash in the games. One possible reason is that these students may not feel confident enough to execute advanced strokes in game situations. Students often wait for their opponents to make mistakes to win points rather than trying to score by using aggressive play.

During this learning stage. students are ready to learn the drop and smash to enrich the offense. A drop is a soft shot that barely clears the net and lands in the forecourt. A smash refers to a powerful overhead shot with a steep downward trajectory. In order to effectively execute the drop and smash strokes, students must have better control of power, angle, and placement of the strokes. In practicing the smash, students should use trunk rotation to generate more power. For the drop, students should understand how to use the wrist to control the power and angle.

For tactic instruction, teachers should teach students to read the opponents' weakness and select appropriate strokes to implement different offensive tactics in games. For example, students need to know that they could attack the weak side of their opponents (the left side for the right-handed players) by utilizing the smash and drive. They can also score by alternately using the drop and clear to force opponents to move up and back in the court. Teachers should encourage students at this level to actively score by using different offensive tactics.

The following drills can be used to improve game play ability among students at Level Four:

Drill 1: Students practice the drop with a partner. One student stands at the center of the court in a ready position, while another student at the other side of the net tosses the shuttle for the partner to perform a drop shot. Drill 2: Working with a partner, students practice the drop and clear. Students first perform a drop and then a clear after the shuttle is returned by a partner and keep a rally sustained as long as possible. **Drill 3:** Working with a partner, students practice the smash. One student stands at the center of the court in a ready position, while another student at the other side of the net feeds the shuttle to the partner to perform a smash.

Drill 4: Students try to place the



shuttle into different locations with varied strokes of the clear, drive, drop and smash. Meanwhile, they need to return to the center of the court after making each shot. **Drill 5:** Students play modified doubles games in which they are encouraged to use the good forms of strokes and all of the offensive tactics learned.

Conclusion

In summary, if an intended outcome of physical education is the enjoyment of physical activity over a lifespan, and the primary goal of a badminton unit is to develop the ability to play a functional game of badminton, then teachers must teach the skills and knowledge needed to enjoy the game play. The instructional approach introduced in this article emphasizes development of game play ability based on students' skill levels. Teachers may use station instruction (or task teaching) to challenge students differently when there is a wide range of badminton skill levels in classes. This will prevent students from becoming bored and will help them achieve a high success rate in practice. Additionally, teachers must be aware of that the approach presented here could be used along with other instructional approaches to maximize student learning in badminton.

References

Chen, W., Rovegno, I., Todorovich, J., & Babiarz, M. (2003). Third grade children's movement responses to dribbling tasks presented by accomplished teachers. *Journal of Teaching in Physical Education*, 22, 450-466.

Docherty, D. (1982). A comparison of heart rate responses in racquet games. *British Journal of Sports Medicine*, 16(2), 96-100.

Grice, T. (1996). *Badminton: Steps to success*. Champaign, IL: Human Kinetics.

National Association for Sport and Physical Education. (2004). *Moving into the future: National standards for physical education* (2nd ed.). Reston, VA: Author.

Nordstroem, P., Pettersson, U., & Lorentzon, R. (1998). Type of physical activity, muscle strength, and pubertal stage as determinants of bone mineral density and bone area in adolescent boys. *Journal of Bone and Mineral research*, 13, 1141-1148.

Wang, J. (2004). Developmental trends for badminton game play across skill levels: An exploratory study. Unpublished doctoral dissertation, University of South Carolina, Columbia.

Wright, I. (2007). Enjoy the benefits of badminton! National Health Service Trusts Association. Retrieved from http:www. apcgt.co.uk/whatsnew_writght26.html on December 6, 2007.

JianyuWang and Jeff Moffit are associate professors at California State University, Bakersfield.