Modifying Team Sports to Include Children with Disabilities

Introduction (Morris & Stiehl, 1999)

Games are not sacred, kids are.

Not all games are for everyone, at least not in their traditional configuration.

Introduction (continued)

You can modify any game to include anyone.

Whenever possible, include child with disabilities when making decisions about modifications.

Introduction (continued)

Get input from classmates w/out disabilities.

Give students as many choices as possible.

Introduction (Continued)

Participating with assistance is an acceptable way to participate, especially when the alternative is not participating at all.

Objectives

- Present four models and apply these models to modifying team sports.
    1. *Differentiated Instruction*
    2. *Universal Design for Learning*
    3. *STEP Model*
    4. *Games Design Model*

Differentiated Instruction

- Giving all students in the class different options in how they are presented and receive information and how they demonstrate understanding and knowledge of concepts and content (Tomlinson, 2002).
- Takes into account individual student readiness, interests and learning styles when planning instruction (Gregory & Chapman, 2013)
- Offers several options for learning, and it does not assume that each individual child would need a separate, unique adaption.

Differentiated Instruction (cont.)

- Multiple choices offered in 3 specific areas:
  - **Content** – what student is expected to learn
  - **Process** - how students make sense of concepts and content presented
  - **Product** - how students demonstrate what they have learned

Applying Differentiated Instruction

- *Tag*
  - Content
  - Process
  - Product

Applying Differentiated Instruction

- *Softball*
  - Content
  - Process
  - Product

Universal Design

- Universal design is based on the philosophy that the physical environment and the activities engaged within the environment, should be used by all individuals without adaptations or specially designed equipment (Center for Universal Design [2009] at NC State University).
  - Example - Curb cuts allow you to step into the street whether walking or using a wheelchair, cart, or stroller.

UDL - Applied

- Focus on the needs of all students not just those from a single disability group.
- When teaching a unit on softball using UDL instruction, what would be a single piece of equipment that could be used to (a) maintain the integrity of the game, (b) include all students, and (c) address movement concerns?
- Example is everyone gets two pitches and then everyone gets to hit a ball off a tee if they miss the two pitches.

UDL – Your Turn

- Apply UDL to something related to the following team sports:
  - Soccer
  - Basketball
  - volleyball

STEP Model

- Modification can be made using the STEP acronym (Roibas, Stamatakis & Black, 2011) that represents modifications made to ***S****pace,* ***T****ask,* ***E****quipment*, and ***P****eople*.

- Some find STEP easier to remember and easier to implement compared to UDL and Differentiated Instruction.

Space

- Modifying the area that the activity is being completed.
  - Tag – put hula hoops or poly spots on the floor as safe zones for children who are slow (e.g., autism, ID, physical disability).
  - Volleyball – allow less skilled students to stand closer to net when serving in volleyball.
  - Soccer ????
  - Flag Football ????
  - Softball ????

Task

- Rule changes or additional rules imposed.
  - Soccer ????
  - Flag Football ????
  - Softball ????

Equipment

Equipment can be adapted to increase learning and success for the students. Use the “six S's framework” (Healy & Wong, 2012).

- **Size** – use bigger target when practicing the overhand throw.
- **Sound** - using a piece of carpet under bowling pins to muffle sound for children with autism.
- **Surface** – some children with autism have color preferences
- **Speed** – practice catching using a scarf or balloon
- **Supported** – support ball on tee or hanging from rope
- **Switches** - to make equipment pieces 'work'. This adaptation is primarily used for students with physical disabilities.

Equipment

- Soccer ???
- Basketball ???
- Volleyball ???
- Softball ???
- Tennis ???

People

Due to the social and Communication deficits, an adaptation related to people may also be very beneficial when including a student with autism in modified activities.

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Games Design Model*

Analyze games to determine if any of the following modifications to allow everyone to play safely and successfully:

- Purpose
- Players
- Movements
- Objects
- Organization
- Limits

*Morris & Stiehl, 1999)

Purpose

- Can vary simple focus (e.g., practice/improve one skill) to expecting children to acquire a variety of skills, concepts, and behaviors. Also, you can have different purposes for different children. For example, the purpose of playing a game of soccer for a child with Down syndrome might be improving endurance, while the purpose for a very skilled player is learning strategies.

Players

How many players are in the game or on a team (or even how many teams).

Movements

- Vary the types of movements required for different players.

Objects

- How a child moves in relationship to object
- How the object moves a student
- How object is used to project objects
- How objects are used to gather objects

**allowing different children to use different objects –everyone is successful and challenged.

Limits/Rules

- Make some rules required for certain players
- Not allowing certain movements by certain players
- Make special rules for some players
- Making special team rules

Organization (structure, positions and boundaries)

- For example, in a soccer game set up zones (defensive, midfield, and offensive zones plus left or right side for each). Players only allowed to stay in their zone. This prevents skilled player from dominating game. In turn, you can put a child with a disability in a zone with peer helper against a less skilled classmate.

Soccer (child who uses wheelchair)

- Purpose (improve mobility; improve wheelchair basketball skills)
- Players (team gets extra player)
- Movements (really skilled use opposite foot)
- Objects (no change)
- Organization (zones)
- Limits (skilled players need to be within 5 yards to shoot; only allowed four dribbles and then has to pass)

Volleyball (child who is blind)

- Purpose (improve space awareness and mobility; understand rules of volleyball)
- Players (team gets extra player (peer helper)
- Movements (peer catches ball for child, gives ball to child who then uses serving motion to hit ball back into play)
- Objects (use Nerf ball or volleyball trainer)
- Organization (child rotates out when in front row)
- Limits (child can stand closer to net when serving; no spiking when child is playing)

Softball (child with Down syndrome)

- Purpose
- Players
- Movements
- Objects
- Organization
- Limits

Basketball (child who has autism)

- Purpose
- Players
- Movements
- Objects
- Organization
- Limits

Conclusion

- Any game can be modified for any child.
- Ideally utilize universal design so the modification is for everyone and not just child with disability.
- Think of components of game (space, task, equipment, people) that can be manipulated to accommodate different abilities.