PLYOMETRIC DRILLS

**LOWER BODY**

**PLYOMETRIC DRILLS**

**Jumps in Place**
- Two-Foot Ankle Hop
- Squat Jump
- Jump and Reach
- Double-Leg Tuck Jump
- Split Squat Jump
- Single-Leg Tuck Jump
- Pike Jump

**Standing Jumps**
- Double Leg Vertical Jump
- Jump Over Barrier

**Multiple Hops and Jumps**
- Double Leg Hop
- Double-Leg Zigzag Hop
- Single-Leg Hop
- Front Barrier Hop
- Lateral Barrier Hop

**Box Drills**
- Single-Leg Push-Off
- Alternate-Leg Push-Off
- Lateral Push-Off
- Side-to-Side Push-Off
- Jump to Box
- Squat Box Jump
- Lateral Box Jump
- Jump From Box

**UPPER BODY**

**PLYOMETRIC DRILLS**

**Throws**
- Chest Pass
- Two-Handed Overhead Throw
- Two-handed Side-to-Side Throw
- Power Drop

**Trunk Plyometrics**
- 45 Degree Sit-Up
LOWER BODY PLYOMETRIC DRILLS

JUMPS IN PLACE

Two-Foot Ankle Hop
Direction of Jump: Vertical

Starting Position: Get into a comfortable, upright stance with feet shoulder width apart.

Arm Action: None or double arm

Preparatory Movement: Begin with a Slight Countermovement

Upward Movement: Hop up, with primary motion at the ankle joint

Downward Movement: Land in the starting Position and immediately repeat hop.

Note: This drill should be performed with little horizontal (forward or backward) or lateral movement.

Squat Jump
Direction of Jump: Vertical

Starting Position: Get into a squat position (thighs slightly above parallel with the ground) with feet shoulder-width apart. Interlock fingers and place hands behind head.

Arm Action: None

Preparatory Movement: None

Upward Movement: Explosively jump to maximum height.

Downward Movement: Land in the squat position and immediately repeat the jump.

Jump and reach
Direction of Jump: Vertical

Starting Position: Get into a comfortable, upright stance with feet shoulder-width apart.

Arm Action: Double arm with reach at top of jump

Preparatory Movement: Begin with a countermovement

Upward Movement: Explosively jump up and reach for an object or target

Downward Movement: Land in starting position and immediately repeat jump.

Note: Emphasis is on verticle height with minimal delay between jumps.
**Double-Leg Tuck Jump**  
*Direction of Jump: Vertical*

*Starting Position:* Get into a comfortable, upright stance with feet shoulder-width apart.

*Arm Action:* Double arm

*Preparatory Movement:* Begin with a countermovement

*Upward Movement:* Explosively jump up. Pull the knees to the chest, quickly grasp the knees with both hands and release before landing.

*Downward Movement:* Land in the starting position and immediately repeat the jump.

**Split Squat Jump**  
*Direction of Jump: Vertical*

*Starting Position:* Get into a lunge position with one leg forward (hip and knee joints flexed approximately 90 degrees) and the other behind the midline of the body

*Arm Action:* Double Arm or none

*Preparatory Movement:* Begin with a counter movement.

*Upward Movement:* Explosively jump up, using the arms to assist as needed. Maximum height and power should be emphasized.

*Downward Movement:* When landing, maintain the lunge position (same leg forward) and immediately repeat the jump.

*Note:* after completing a set, rest and switch front legs.

**Cycled Split Squat Jump**  
*Direction of Jump: Vertical*

*Starting Position:* Get into a lunge position with one leg forward (hip and knee joints flexed approximately 90 degrees) and the other behind the midline of the body

*Arm Action:* Double arm or none

*Preparatory Movement:* Begin with a countermovement.

*Upward Movement:* Explosively jump up, using the arms to assist as needed with off the ground, switch the position of the legs. Maximum height and power should be emphasized.

*Downward Movement:* When landing, maintain the lunge position (opposite leg forward) and immediately repeat the jump.

*Note:* Be sure the lunge is not to deep.
**Single Leg Tuck Jump**  
*Direction of Jump:* Vertical

*Starting Position:* Get into a comfortable, upright stance on one foot. The non-jumping leg is held in a stationary position with the knee flexed during the exercise.

*Arm Action:* Double Arm

*Preparatory Movement:* Begin with a countermovement.

*Upward Movement:* Explosively jump up. Pull the knee of the jumping leg to the chest, grasp the knee with both hands, and release before landing.

*Downward Movement:* Land in the starting position and immediately repeat the jump using the same leg.  
- Repeat with the opposite leg after a brief rest.

**Pike Jump**  
*Direction of Jump:* Vertical

*Starting Position:* Get into a comfortable, upright stance with feet shoulder-width apart.

*Arm Action:* Double Arm

*Upward Movement:* Explosively jump up. Keeping the legs straight and together, try and lift them to the front and try and touch the toes with the hands.

*Downward Movement:* Land in the Starting Position and immediately repeat the jump.

**STANDING JUMPS**

**Double Leg Vertical Jump**  
*Direction of Jump:* Vertical

*Starting Position:* Get into a comfortable, upright stance with feet shoulder-width apart.

*Arm Action:* Double Arm

*Upward Movement:* Explosively jump up, using both arms to assist, and reach for a target or just up to the ceiling.

*Downward Movement:* Land in the starting position and repeat the jump. Allow recovery time between jumps.
Jump over Barrier
*Direction of Jump:* Horizontal and Vertical

*Equipment:* a barrier such as a cone or hurdle

*Starting position:* Get into a comfortable, upright stance with feet shoulder-width apart.

*Arm Action:* Double Arm

*Upward Movement:* Jump over a barrier with both legs, using primarily hip and knee flexion to clear the barrier. Keep knees and feet together without lateral deviation.

*Downward Movement:* Land in the starting position and repeat the jump

MULTIPLE HOPS AND JUMPS

Double-Leg Hop
*Direction of Jump:* Horizontal and Vertical

*Starting Position:* Get into a comfortable, upright stance with feet shoulder-width apart.

*Arm Action:* Double Arm

*Upward Movement:* Jump as far forward as possible.

*Downward Movement:* Land in the starting position and immediately repeat the hop.

Double-Leg Zigzag Hop
*Direction of Jump:* Diagonal

*Equipment:* Place about 10 Hurdles about 18-24 inches apart in a zigzag pattern.

*Starting Position:* Get into a comfortable, upright stance with feet shoulder-width apart. Stand on the outside of the first hurdle. Elbows should be flexed 90 degrees and held at the sides of the body.

*Arm Action:* Double Arm

*Upward Movement:* Jump from the outside of the first hurdle to the outside of the second, keeping the shoulders perpendicular.

Single-Leg Hop
*Direction of Jump:* Horizontal and Vertical

*Starting Position:* Get into a comfortable, upright stance on one foot. the no jumping leg is held in a stationary position with the knee flexed during the exercise.

*Arm Action:* Double Arm

*Upward Movement:* Explosively jump forward, using both arms to assist.
*Downward Movement:* Land in the starting position and immediately repeat the hop using the same leg.
- Repeat with the opposite leg after a brief rest.

**Front Barrier Hop**
*Direction of Jump:* Horizontal and Vertical

*Equipment:* Two barriers such as two cone or two hurdles.

*Starting Position:* Facing the first barrier, get into a comfortable, upright stance with feet shoulder-width apart.

*Arm Action:* Double Arm

*Upward Movement:* Jump over the first barrier with both legs, using primarily hip and knee flexion to clear the barrier. Keep knees and feet together without lateral deviation.

*Downward Movement:* Land in the starting position and immediately repeat the jump over a second barrier

*Note:* Intensity level can be increased by progressively increasing the height of the barrier (i.e. from cone to hurdle) or by performing the hops with one leg only.

**Lateral Barrier Hop**
*Direction of Jump:* Lateral and Vertical

*Equipment:* Barriers (cones or hurdles)

*Arm Action:* Double Arm

*Upward Movement:* Jump over the barrier with both legs, using primarily hip and knee flexion to clear the barrier. Keep knees and feet together.

*Downward Movement:* Land on the opposite of the barrier and immediately repeat jump to the starting side.

*Note:* Intensity level of the lateral barrier hop can be increased by increasing the height of the barrier (i.e. from a cone to a hurdle) or by performing the hops with one leg only.

**BOX DRILLS**

**Single-Leg Push-Off**
*Direction of Jump:* Vertical

*Equipment:* Plyometric box, 6-18 inches high

*Starting Position:* Stand facing the plyometric box with one foot on the ground and one foot on the box. The heel of the foot on the box should be near the box’s closest edge.

*Arm Action:* Double arm
Preparatory Movement: None

Upward Movement: Jump up using the foot on the box to push off.

Downward Movement: Land with the same foot on the box; this foot should land just before the ground foot. Immediately repeat the movement.

Note: Intensity can be increased by increasing the height of the box.

Alternate-Leg Push-Off
Direction of Jump: Vertical

Equipment: Plyometric box 6-18 inches high

Starting Position: Stand facing the plyometric box with one foot on the ground and one foot on the plyometric box. The heel of the foot on the box should be near the box’s closest edge.

Arm Action: Double arm

Upward Movement: Jump up using the foot on the box to push off.

Downward Movement: Land with the opposite foot on the box; this foot should land just before the ground foot. Immediately repeat the movement, reversing the feet each repetition.

Note: Intensity can be increased by increasing the height of the box.

Lateral Push-Off
Direction of Jump: Vertical

Equipment: Plyometric Box

Starting Position: Stand to one side of the plyometric box with one foot on the ground and one foot on the box. The inside of the foot on the box should be near the box’s closest edge.

Arm Action: Double Arm

Upward Movement: Jump up using the foot on the box to push off.

Downward Movement: Land with the same foot on the box; this foot should land just before the ground foot. Immediately repeat the movement

Note: Intensity can be increased by increasing the height of the box.
**Side to side Push-Off**

*Direction of Jump:* Vertical

*Equipment:* Plyometric box

*Starting Position:* Stand to one side of the box with one foot on the ground and one foot on the box. The inside of the foot on the box should be near the box’s closest edge

*Arm Action:* Double Arm

*Upward Movement:* Jump up and over the box to push off.

*Downward Movement:* Land with the opposite foot on the opposite side of the top of the box; this foot should land just before the ground foot. Immediately repeat the movement to the opposite side.

*Note:* Intensity can be increased by increasing the height of the box.

**Jump to Box**

*Direction of Jump:* Vertical and slightly horizontal

*Equipment:* Plyometric box

*Starting Position:* Facing the plyometric box get into a comfortable, upright stance with feet shoulder-width apart.

*Arm Action:* Double arm

*Preparatory Movement:* Begin with a counter movement.

*Upward Movement:* Jump onto the top of the box using both legs

*Downward Movement:* Land on both feet in a half squat position, step down and repeat.

*Note:* Intensity can be increased by increasing the height of the box.

**Squat Box Jump**

*Direction of Jump:* Vertical and slightly horizontal

*Equipment:* Plyometric box

*Starting Position:* Facing the plyometric box with hands clasped behind head, get into a comfortable, upright stance with feet shoulder-width apart.

*Preparatory Movement:* Begin with a counter movement.

*Upward Movement:* Jump onto the top of the box using both legs.

*Downward movement:* Land on both feet in a half squat position, step down from box and repeat.

*Note:* Intensity can be increased by increasing the height of the box.
**Lateral Box Jump**  
*Direction of Jump:* Vertical and slightly horizontal  

*Equipment:* Plyometric box  

*Starting Position:* Stand to on side of the box; get into a comfortable, upright stance with feet shoulder-width apart.  

*Arm Action:* Double Arm  

*Upward Movement:* Jump onto the top of the box using both legs.  

*Downward Movement:* Land on both feet in a half squat position, step down from the box and repeat in the opposite direction.  

*Note:* Intensity can be increased by increasing the height of the box.

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**UPPER BODY PLYOMETRICS**  
*A medicine ball will be needed for the following drills. Weight of ball can vary between exercises generally 5-10lbs.*

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**Throws**

**Chest Pass**  
*Direction of Throw:* Forward  

*Starting Position:* Get into a comfortable, upright stance with feet shoulder-width apart; face a wall or partner approximately 10ft away. Raise the ball to chest level with the elbows flexed.  

*Preparatory Movement:* Begin with a counter movement (a countermovement for a plyometric throw would be moving the arms slightly backwards before the actual throw)  

*Arm Action:* Use both arms, to throw the ball to the wall or partner by extending the elbows. When the partner returns the ball or the ball comes back from the wall, catch it, return to the starting position, and immediately repeat the movement.  

*Note:* intensity may be increased by increasing the weight of the ball.

**Two-Handed Overhead Throw**  
*Direction of Throw:* Forward  

*Starting Position:* Get to a comfortable, upright stance with feet shoulder-width apart; face the wall or partner approximately 10ft away. Raise the ball overhead.  

*Preparatory Movement:* Begin with a counter movement (a countermovement for a plyometric throw would be moving the arms slightly backwards before the actual throw)
Arm Action: Using both arms, throw the ball to the wall or partner, keeping the elbows extended. When the partner returns the ball or the ball comes back from the wall, catch it, return to the starting position, and immediately repeat the Throw.

Note: intensity may be increased by increasing the weight of the ball.

Two-Handed Side-to-Side Throw
Direction of Throw: Forward and diagonal
Starting Position: Feet shoulder-width apart; face the wall or partner about 10ft away. Raise the ball in both hands to a position over one shoulder with the elbows flexed.

Preparatory Movement: Begin with a counter movement (a countermovement for a plyometric throw would be moving the arms slightly backwards before the actual throw)

Arm Action: Using both arms throw the ball to the wall or partner by extending the elbows. When the partner returns the ball catch the ball over the opposite shoulder and immediately repeat the throw.

Preparatory Movement: Begin with a counter movement (a countermovement for a plyometric throw would be moving the arms slightly backwards before the actual throw)

Power Drop
Direction of Throw: Upward
Starting Position: Lie supine on the ground with elbows extended and both shoulders in approximately 90 degrees of flexion; head should be near the partners feet. The partner should be standing over with the medicine ball held above the athletes arms.

Arm Action: When the partner drops the ball, catch it using both arms and immediately throw the ball back up to the partner.

TRUNK PLYOMETRICS

45 Degree Sit-Up
Starting Position: Sit on the ground with the trunk at an approximately 45 degree angle. The partner should be in front with the medicine ball.

Preparatory Movement: The partner throws the ball to your outstretched hands.

Downward Action: Once the partner throws the ball, catch it using both arms, allow minimal trunk extension, and immediately return the ball to the partner.

Note: The force used to return the ball to the partner should come predominantly from the abdominal muscles.