

Supplementary material 1a. COD speed and technique modification 6-week training intervention

| Week   | COD Emphasis  | Drills   | Intensity<br>(perceived speed) | Total Distance<br>(m) | Number of Decelerations and CODs |
|--------|---|--|--------------------------------|-----------------------|----------------------------------|
| Week 1 | <ul style="list-style-type: none"> <li>Drills specific to deceleration phase, before adding turn and reacceleration</li> </ul>  | <ol style="list-style-type: none"> <li>10 × 5-m acceleration to deceleration (2 reps a go)</li> <li>12 × 5-m acceleration to side-steps (20-60°) – 5-m exit to deceleration – 2 reps at 20°, 40°, 60°</li> <li>8 × 5-m acceleration to 135° turns – 5-m exit to deceleration</li> <li>2 × Max effort 135° pivot each leg, max effort 60° cut each leg</li> </ol>   | 50-75%                         | 290                   | 29 and 24                        |
| Week 2 | <ul style="list-style-type: none"> <li>Submaximal/ pre-planned emphasising key aspects of technique</li> <li>Progressive increase in COD angle and approach velocity</li> </ul> | <ol style="list-style-type: none"> <li>4 × 5-m acceleration to deceleration</li> <li>4 × 10-m acceleration to deceleration</li> <li>12 × 5-m acceleration to side-steps (45°, 60°, and 80°) – 5-m exit to deceleration</li> <li>8 × 5-m acceleration to 135° turns – 5-m exit to deceleration</li> <li>2 × Combination: 5-m 60° cut, to 180° turn, to 60° cut, to Dec</li> </ol>   | 75%+                           | 300                   | 30 and 26                        |
| Week 3 | <ul style="list-style-type: none"> <li>Pre-planned drill performed maximally</li> <li>Introduction of unanticipated generic stimuli (auditory or visual)</li> </ul>             | <ol style="list-style-type: none"> <li>4 × 5- and 10-m acceleration to deceleration</li> <li>4 × 2.5-10-m acceleration to deceleration- react to coach shout</li> <li>16 × 5-m acceleration to side-steps (45° and 90°) – 5-m exit to deceleration</li> <li>4 × 5-m combined 180° - 2 x 180° per rep</li> <li>3 × 20-m tunnel drill – side-stepping past 4 opponents every 5-m</li> </ol>  | 75-100%                        | 320-350               | 28 and 36                        |
| Week 4 | <ul style="list-style-type: none"> <li>Unanticipated performed submaximally</li> </ul>  | <ol style="list-style-type: none"> <li>4 × 5-15 m unanticipated decelerations – partner stimuli*</li> <li>3 × zig-zag runs (two 45° cuts) – 5-m exit to deceleration (15-m total) – one partner chase</li> <li>3 × zig-zag runs (two 90° cuts) – 5-m exit to deceleration (15-m total) – one partner chase</li> <li>6 × unanticipated 70° cuts (coach body position) – 5-m entry and exit</li> <li>3 × pro-agility (5-m approach to 180°, 5-m reaccelerate to 180°, to 10-m deceleration)</li> </ol>   | 100%                           | 260-300               | 19 and 24                        |
| Week 5 | <ul style="list-style-type: none"> <li>Unanticipated drills performed maximally</li> </ul>  | <ol style="list-style-type: none"> <li>4 × 5-15 m unanticipated decelerations – partner stimuli*</li> <li>3 × zig-zag runs (two 45° cuts) – 5-m exit to deceleration (15-m total) – one partner chase</li> <li>3 × zig-zag runs (two 90° cuts) – 5-m exit to deceleration (15-m total) – one partner chase</li> <li>4 × unanticipated 70° cuts (coach body position) – 5-m entry and exit</li> <li>4 × unanticipated 70° cuts (follow opponent) – 5-m entry and exit*</li> <li>2 × 180° races – two turns every 5-m to 5-m deceleration</li> </ol> | 100%                           | 260-300               | 26 and 28                        |
| Week 6 | <ul style="list-style-type: none"> <li>Introduction of sport specific stimuli – opponent</li> </ul>   | <ol style="list-style-type: none"> <li>4 x 5-15-m unanticipated decelerations – partner stimuli- two decelerations per rep*</li> <li>8 x 5-m acceleration to side steps (45°) – 5-m exit to deceleration</li> <li>4 × Modified L runs – anticipated - (5-m acceleration to 90° cut, 5-m acceleration to 180° turn – 5-m acceleration to 90° cut – to 5-m deceleration</li> <li>6 × X-drill – two cuts/turns in a square – partner follow*</li> </ol>   | 100%                           | 270-330               | 28 and 36                        |

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|---|--|---|--|--|--|
|   |  | 5. 2 × 180° races – two turns at any point across 10-m distance – partner lead* |  |  |  |
| <b>Additional information:</b> <ol style="list-style-type: none"> <li>30-60 seconds' rest provided between 100% effort reps. 2 minutes' rest provide between exercises</li> <li>All CODs and decelerations to be performed with the aim of modified braking and COD strategy</li> <li>Feedback to be provided to each player after each rep regarding braking strategy/ COD technique</li> </ol> <p>Key: * = Alternate between leading and reacting / attacking and defending; COD = Change of direction; PFC = Penultimate foot contact; Dec: Deceleration</p> |  |   |  |  |  |

**Supplementary material 1b. Jump-landing warm-up drills performed during COD speed and technique modification training intervention**

| <b>Week</b>   | <b>Warm-up jump-landing plyometric drills</b>  |
|---------------|--|
| <b>Week 1</b> | <p>Jump-landing: 10-m of:</p> <ol style="list-style-type: none"> <li>1. Bilateral broad jump</li> <li>2. Bilateral broad jump – zig-zag</li> <li>3. Bilateral broad jump - lateral</li> <li>4. Single-leg hop and hold – forwards</li> <li>5. Single-leg hop and hold – zig-zag</li> <li>6. Single-leg cutting push off action and hold</li> </ol>   |
| <b>Week 2</b> | <p>Jump-landing: 10-m of:</p> <ol style="list-style-type: none"> <li>1. Bilateral broad jump</li> <li>2. Bilateral broad jump – zig-zag</li> <li>3. Bilateral broad jump - lateral</li> <li>4. Single-leg hop and hold – forwards</li> <li>5. Single-leg hop and hold – zig-zag</li> <li>6. Single-leg cutting push off action and hold</li> </ol>   |
| <b>Week 3</b> | <p>Jump-landing: 12-m of:</p> <ol style="list-style-type: none"> <li>1. Bilateral broad jump (reactive in pairs)</li> <li>2. Bilateral broad jump – zig-zag</li> <li>3. Bilateral broad jump - lateral</li> <li>4. Single-leg hop and hold – forwards</li> <li>5. Single-leg hop and hold – zig-zag</li> <li>6. Single-leg cutting push off action and hold</li> </ol>                           |
| <b>Week 4</b> | <p>Jump-landing: 12-m of:</p> <ol style="list-style-type: none"> <li>1. Bilateral broad jump (reactive in pairs)</li> <li>2. Forward tuck-jumps</li> <li>3. Zig-zag tuck-jumps</li> <li>4. Single-leg hop and hold – forwards</li> <li>5. Single-leg hop and hold – zig-zag</li> <li>6. Single-leg cutting push off action continuous</li> </ol>   |
| <b>Week 5</b> | <p>Jump-landing: 12-m of:</p> <ol style="list-style-type: none"> <li>1. Bilateral broad jump (reactive in pairs)</li> <li>2. Forward tuck-jumps</li> <li>3. Zig-zag tuck-jumps</li> <li>4. Single-leg hop and hold – forwards – double hop</li> <li>5. Single-leg hop and hold – zig-zag</li> <li>6. Single-leg cutting push off action continuous</li> <li>7. Crossover hop and hold</li> </ol> |
| <b>Week 6</b> | <p>Jump-landing: 12-m of:</p> <ol style="list-style-type: none"> <li>1. Bilateral broad jump (reactive in pairs)</li> <li>2. Forward tuck-jumps</li> <li>3. Zig-zag tuck-jumps</li> <li>4. Single-leg hop and hold – forwards – double hop</li> <li>5. Single-leg hop and hold – zig-zag</li> <li>6. Single-leg cutting push off action continuous</li> <li>7. Crossover hop and hold</li> </ol> |