

Freestyle Skydiving Terms and Definitions

Fundamentals

Heading

The direction (a point on the horizon) towards which the freestylist's head or upper torso is facing.

Move

The basic component of freestyle maneuvers. A move has a defined starting point and an ending point and consists of any of the following:

- a change in body position,
- and/or a rotation of the body about one or more axes,
- or balancing in a static position (a pose)

Pose

A move in which a static body position is displayed without changing the orientation of the body with respect to the ground. A pose may change heading (a turning pose).

Sequence

Two or more moves performed in succession.

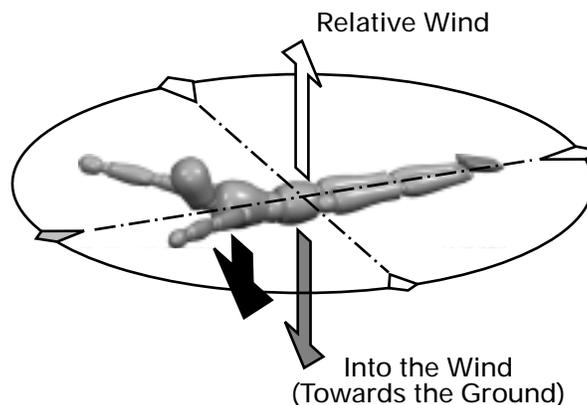
Routine

A sequence of freestyle moves performed during the working time defined for a competition.

Orientations

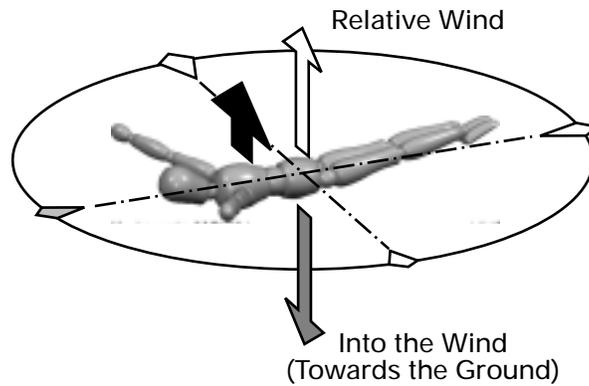
Flat

The torso is horizontal, facing into the relative wind (towards the ground).



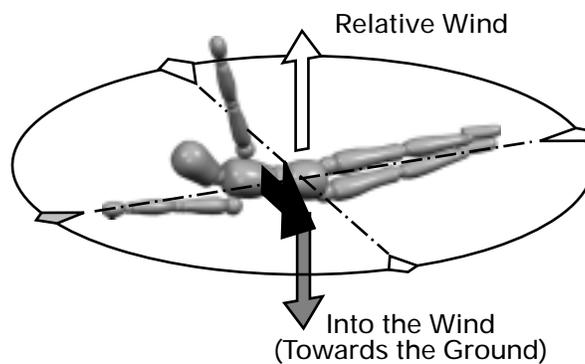
Inverted

The torso is horizontal, on its back, facing away from the relative wind (towards the sky).



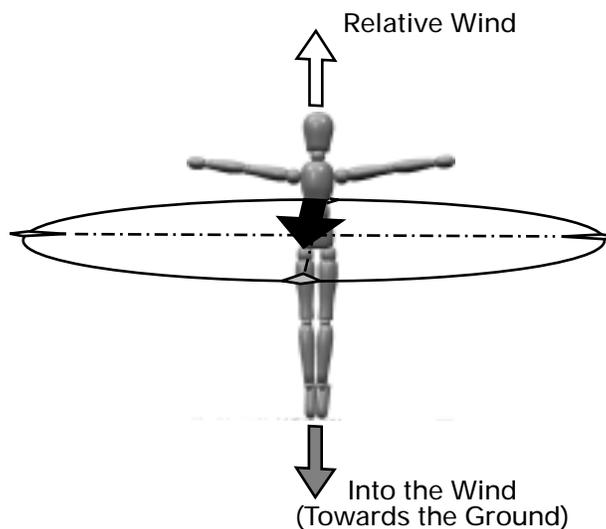
Sideways

The torso is horizontal, on its side, with either side facing into the wind (towards the ground).



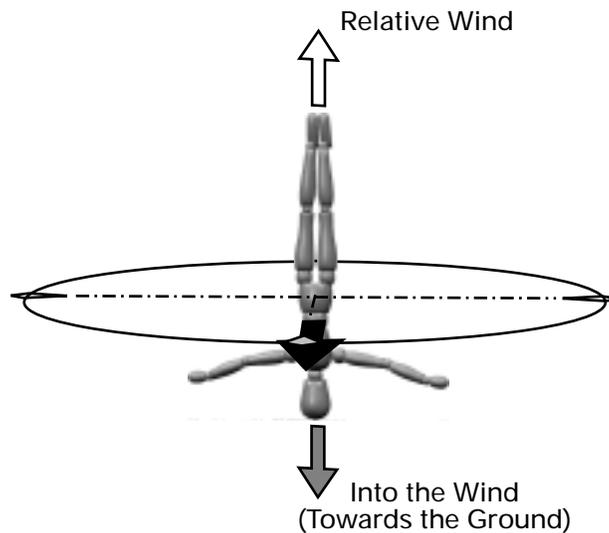
Upright

The torso is vertical with the head up, above the torso.



Head-down

The torso is vertical with the head down, towards the ground.



Body Positions

Layout

The torso is straight, with no bend in the waist. (A slight arch is possible.) The legs are straight and together.



Layout

Stag

The torso is straight, and one leg is straight and in line with the torso. The other leg is forward and the knee bent to place the toe beside the knee of the straight leg. The bent leg is bent at least 90° at the knee. The following variations are possible for the stag position:

Note that an Open vs. Closed Stag depends on the amount of bend in the knee, while a Parallel vs. Turned-out Stag depends on the direction in which the thigh is pointing relative to the torso. A Closed Stag could therefore be either parallel or turned-out, and likewise, an Open Stag could be either parallel or turned-out.

- **Closed Stag**
The toe of the bent leg touches the knee of the straight leg to form a closed triangle.
- **Open Stag**
The toe of the bent leg is forward of the straight leg such that no closed shape is formed. The knee of the bent leg is brought upward toward the chest slightly such that it remains bent at least 90° at the knee.
- **Parallel Stag**
The thigh of the bent leg is in front of the torso, with the knee facing directly forward.
- **Turned-out Stag**
The thigh of the bent leg is turned out to the side, such that the bent leg remains in nearly the same plane as the hips and torso, and the knee is pointing outward to the side.



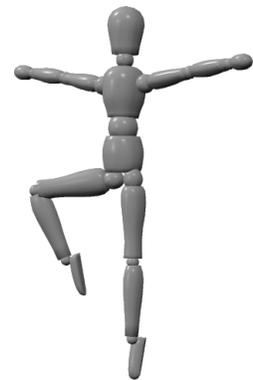
Parallel Closed Stag



Parallel Open Stag



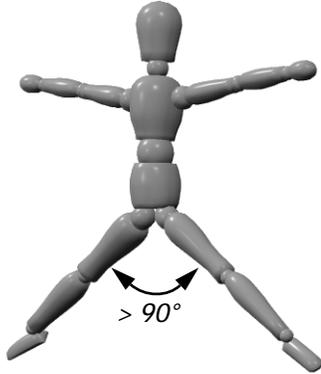
Turned-Out Closed Stag



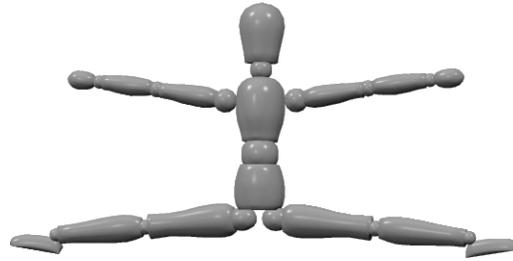
Turned-Out Open Stag

Straddle

The legs are straight and split apart, from side to side, with at least a 90° angle between them. The torso is kept straight, unless otherwise specified. A full straddle, if flexibility permits, has the legs 180° apart.



Straddle



Full Straddle (Chinese Splits)

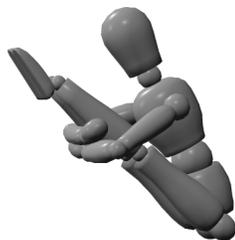
Pike

The torso is bent forward at the waist such that the angle between the torso and thighs is less than 90°. The legs are kept straight and unless otherwise specified, the legs are also kept together. The following variations are possible for the pike position:

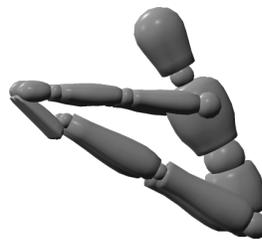
- **Open Pike**
The arms are extended outward to the sides, away from the legs.
- **Closed Pike**
The arms or hands are placed around the legs, touching them, to hold them close to the torso.
- **Jackknife**
The arms are straight and the hands are extended towards the toes, touching the toes with the fingertips.
- **Straddle Pike**
The legs are straddled apart and the waist is piked at the same time.



Open Pike



Closed Pike



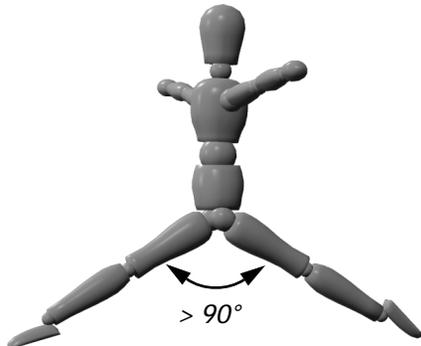
Jackknife



Straddle Pike

Split

The legs are straight and split apart from front to back, with at least a 90° angle between them. The full splits, if flexibility permits, have the legs 180° apart.



Split



Full Split

Tuck

The torso is bent forward at the waist and the legs are together and bent at the knees. The following variations are possible for the tuck position:

- **Medium Tuck**

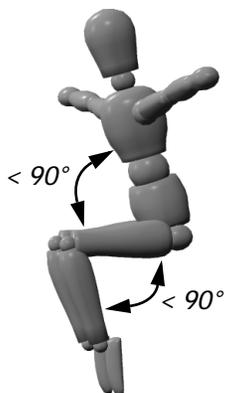
The angle between the torso and thighs is less than 90° , and the angle between the upper and lower leg is less than 90° . The medium tuck is implied when referring to a tuck position, unless otherwise specified.

- **Tight Tuck**

The legs are bent towards the torso as much as possible such that the thighs are touching the chest, and the heels are touching the seat.

- **Loose Tuck**

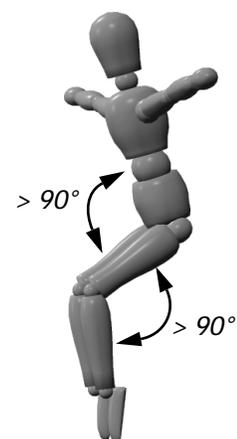
The body is less bent than a medium tuck such that the angles between the torso and thighs and between the upper and lower legs are greater than 90° .



Medium Tuck



Tight Tuck



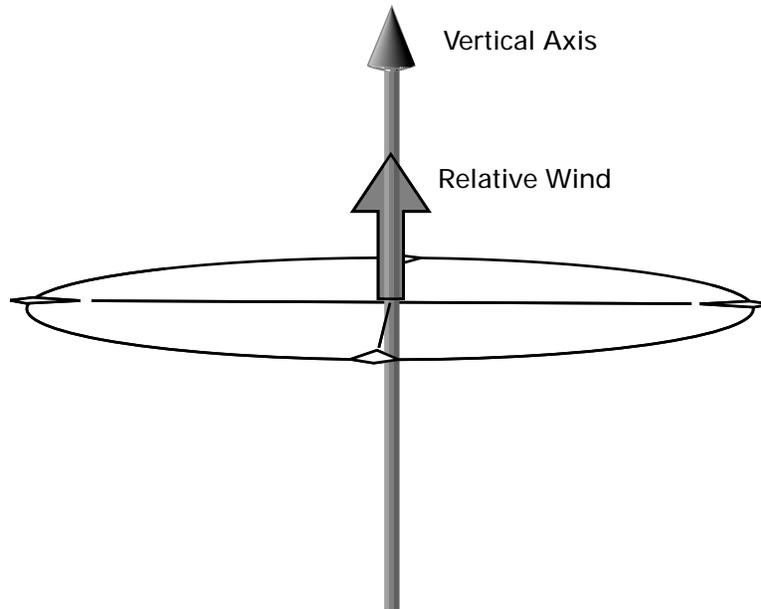
Loose Tuck

Axes of Rotation

Earth Axes (these axes stay fixed relative to the ground/relative wind):

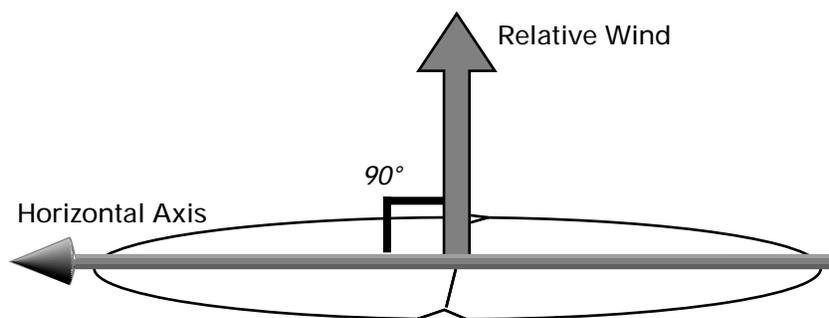
Vertical Axis

The axis parallel to the relative wind (and pointing from the ground to the sky once the direction of falling is straight down, after terminal velocity is achieved).



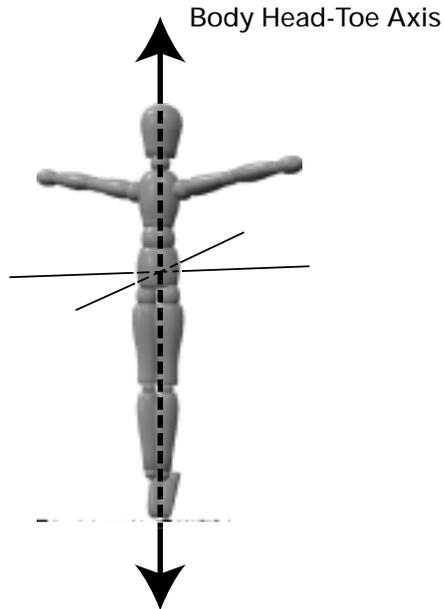
Horizontal Axis

An axis perpendicular (90°) to the relative wind (pointing to the horizon once terminal velocity is achieved). It may have any heading (pointing towards any desired point on the horizon).

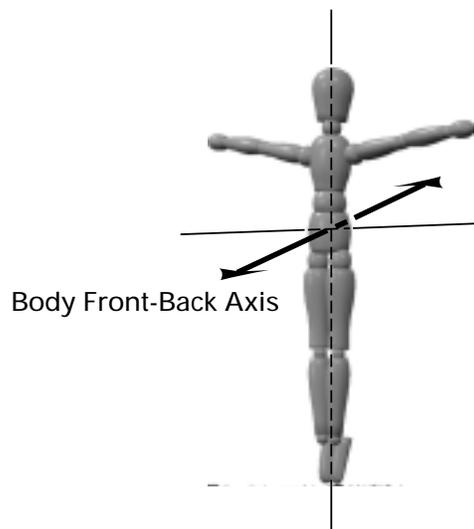


Body Axes (these axes stay fixed relative to the freestylist's body):**Body Head-Toe Axis**

The body head-toe axis oriented lengthwise through the freestylist's torso, pointing from head to toe.

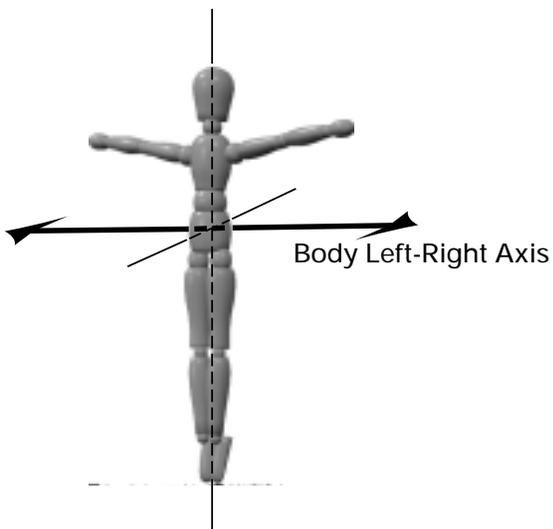
**Body Front-Back Axis**

The axis pointing forwards and backwards through the freestylist's belly, pointing from front to back.



Body Left-Right Axis

The axis oriented sideways through the freestylist's hips, pointing from left to right.

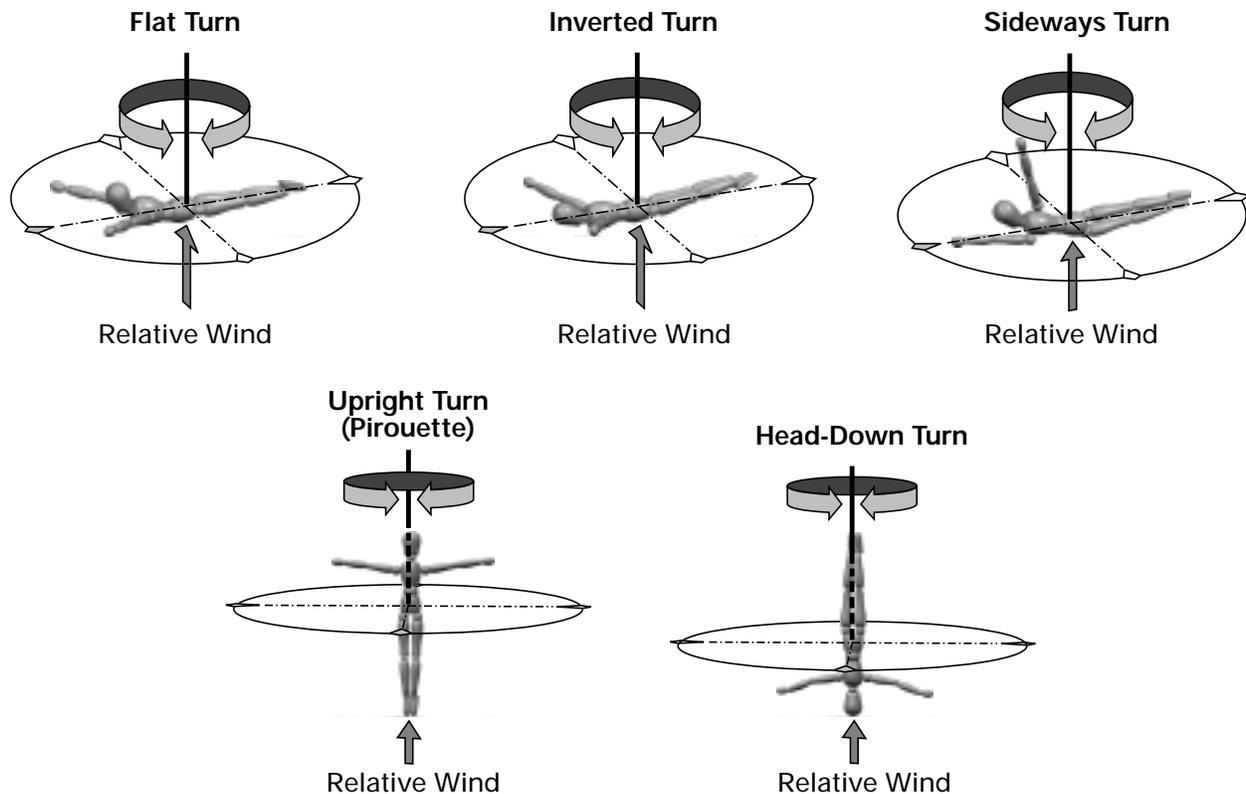


Basic Rotational Actions

Turn

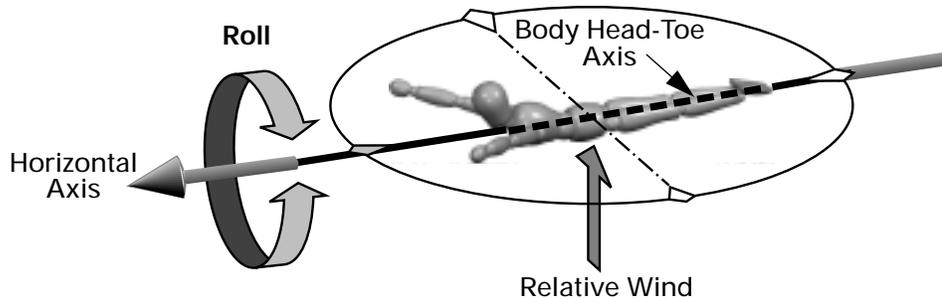
A rotation about the vertical axis such that the heading is changing. A turn may be performed while the body is in any orientation, but is always about whichever body axis is aligned with the vertical axis. The following variations on a turn are possible:

- **Flat Turn**
A turn while the torso is flat.
- **Inverted Turn**
A turn while the torso is inverted.
- **Sideways Turn**
A turn while the torso is sideways.
- **Upright Turn (Pirouette)**
A turn while the torso is upright.
- **Head-Down Turn**
A turn while the torso is head-down.



Roll

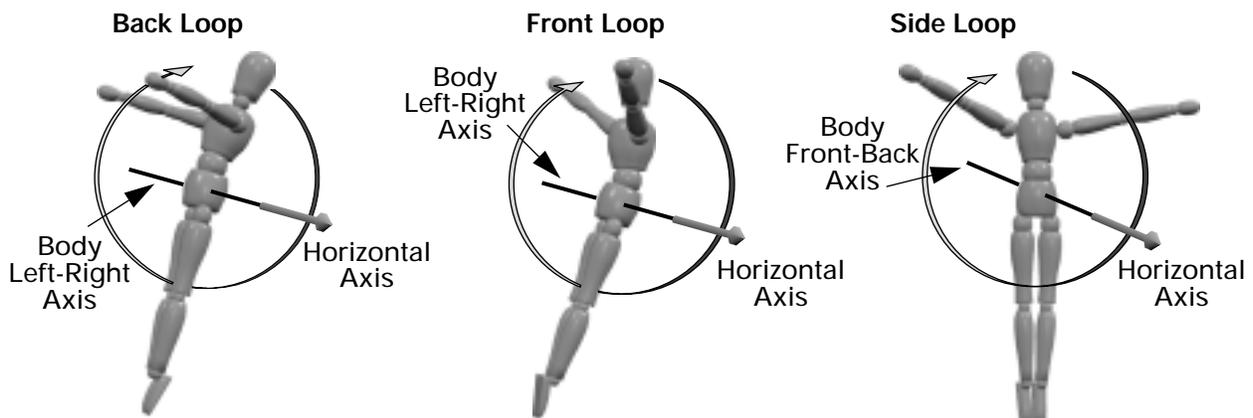
A rotation about the body long axis when aligned with the horizontal axis (for example rotations about the body long axis to and from flat, sideways or inverted positions).



Loop

A “head-over-heels” rotation around the horizontal axis, initiated about either the body left-right axis or the body front-back axis when aligned with the horizontal axis. The body goes through an upright position and a head-down position during the course of the loop. A loop is considered complete when the head has travelled 360° around the horizontal axis from the point at which it started, and need not start in an exact upright or flat position. The following variations on a loop are possible:

- **Back Loop**
The rotation is initiated about the body left-right axis with the torso travelling backwards.
- **Front Loop**
The rotation is initiated about the body left-right axis with the torso travelling forwards.
- **Side Loop**
The rotation is initiated about the body front-back axis with the torso travelling sideways to either side.

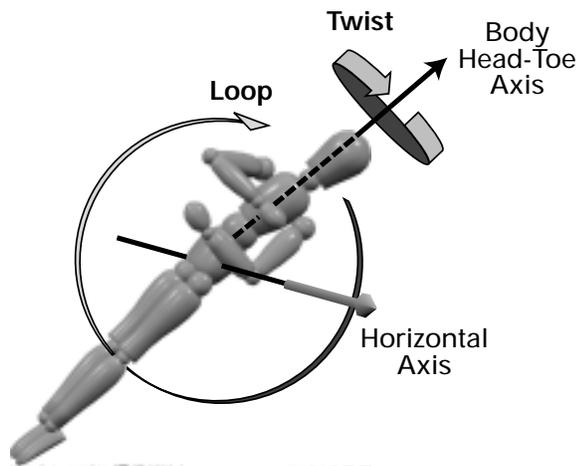


Note that loops are referred to by the direction in which the loop is initiated, since in the case of twisting loops, the direction in which the loop completes may be different from the direction at the start.

Twist

A rotation about the body long axis when combined with a loop. A single, or full twist is defined to be a 360° rotation about the body long axis.

The amount of twist that may be considered performed for a loop is the amount of twisting rotation completed after a 360° looping rotation has been performed, when measured from the point at which the twist was first initiated. (Twists may be initiated at any position in the loop.)



Common Move Elements

Switch

A change in position of the legs, from a pose on one leg to the same pose on the other leg, in which the left and right legs trade positions by coming together and crossing in a scissoring motion. The new position is a mirror image of the original position, and the torso does not change heading during a simple switch move.

Examples include a Tee Switch, Inverted Tee Switch, Daffy Switch, Compass Switch.

Swivel

A 180° rotation of the torso at the hips, from a pose on one leg to the same pose on the other leg, while keeping the legs apart and moving through a straddle position that ends in the mirror image of the initial pose, facing 180° away from the initial heading. The legs move as little as possible, and remain in the same plane as the torso while the torso swivels over the legs to change the heading. A swivel move starts and ends in the same pose, but on the opposite heading.

Examples include a Daffy Swivel, Compass Swivel, Tee Swivel.

Reverse

A change in position of the legs in which the left and right legs trade positions by pivoting outward, circling away from each other as they move to their new positions. The new position is a mirror image of the original position. The torso does not change heading during a simple reverse move. A reverse move starts and ends in the same pose.

Examples include a Daffy Reverse, Compass Reverse, Tee Reverse.

Illusion

A swivel move in which the beginning and ending poses are different. The torso rotates 180° and may also tilt up from a flat position to an upright position. The legs move as little as possible. The final pose is on the opposite heading as the initial pose. (An illusion becomes an inversion when played in reverse.)

Examples include a Daffy Illusion (Tee to Daffy), Compass Illusion (Tee to Compass), Arabesque Illusion (Compass to Arabesque).

Inversion

A swivel move in the opposite direction as an Illusion, for the same pair of beginning and ending poses. The torso rotates 180° and may also tilt down from an upright position to a flat position. The legs move as little as possible. The final pose is on the opposite heading as the initial pose. (An inversion becomes an illusion when played in reverse.)

Examples include a Daffy Inversion (Daffy to Tee), Compass Inversion (Compass to Tee), Arabesque Inversion (Arabesque to Compass).

Fundamental Moves and Move Classes

Tee

The torso is flat. One leg is straight and horizontal, in line with the torso. The other leg is straight and pointed downward.

Daffy

The torso is upright. The legs are as straight as possible and split evenly front and back. The shoulders face squarely towards the front leg.

Compass

The torso is upright. One leg is straight down, in line with the torso. The other leg is straight and to the front (or side, for a turned-out Compass), raised at least to the horizontal level.

Seated Poses

The class of poses in which the torso is in a seated position, bent at the waist, the back is generally pointed into the wind.

Standups

The broad class of poses in which the torso is generally upright and one or both legs are pointing generally downward.

Headstands

The class of poses in which the torso is head-down.

Loop Reverses

The class of moves in which a front (or back) loop stops its rotation, changes the looping direction without changing heading, and transitions to a back (or front) loop.

Twisting Back Loops

The class of moves in which a twisting rotation (of a quarter twist or more) is performed after initiating a back loop. The layout position is implied unless another position is specified.

Examples include Back Half Twist, Back Full, Back Double, Back Stag Full, etc.

Twisting Front Loops

The class of moves in which a twisting rotation (of a quarter twist or more) is performed after initiating a front loop. The layout position is implied unless another position is specified. Examples include Back Half Twist, Back Full, Back Double.

Examples include Front Half Twist, Front Full, Front 1-1/2 Twist, etc.

Twisting Side Loops

The class of moves in which a twisting rotation (of a quarter twist or more) is performed after initiating a side loop. The layout position is implied unless another position is specified.

Examples include Side Half Twist, Side Full, etc.

Solo Loops

Single (360°) looping rotations that begin and end in static poses.

Standup Loops

Loops that end in a standup pose. (The loop may be part of a sequence of loops, but only the last one is considered a standup loop.)