



# Item Adjustments

Do you want to make a figure's head a little bigger, maybe move it to one side or even change a character's facial expression in the middle of an animation? All of that, and much, much more can be done using 'Item Adjustments'. **TOPICS:**

## Accessing Item Adjustments

### Item Popover Overview

#### Adjusting an Item

[Rotating an Item](#)

[Moving an Item](#)

[Scaling an Item](#)

[Flipping an Item](#)

[Bending an Item](#)

[Changing the Opacity of an Item](#)

[Tinting an item](#)

[Blend Modes](#)

[Changing the Z-Order of an Item](#)

[Changing the Width of a Line or Circle Item](#)

[Changing the Colour of Line and Circle Items](#)

[Undoing Item Adjustments](#)

[Resetting Item Adjustments](#)

[Item Adjustment Tween Settings](#)

[Accepting, cancelling and previewing](#)

#### Clearing an Item

#### Substituting an Item

[Removing a Substitution](#)

#### Drawing

#### Assign To

#### Key

#### Allow

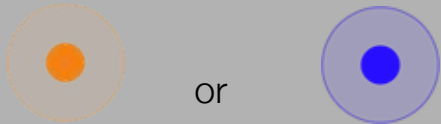




## Accessing Item Adjustments


1.

Make sure that the figure or clone that you wish to modify has been selected by tapping on its anchor point:



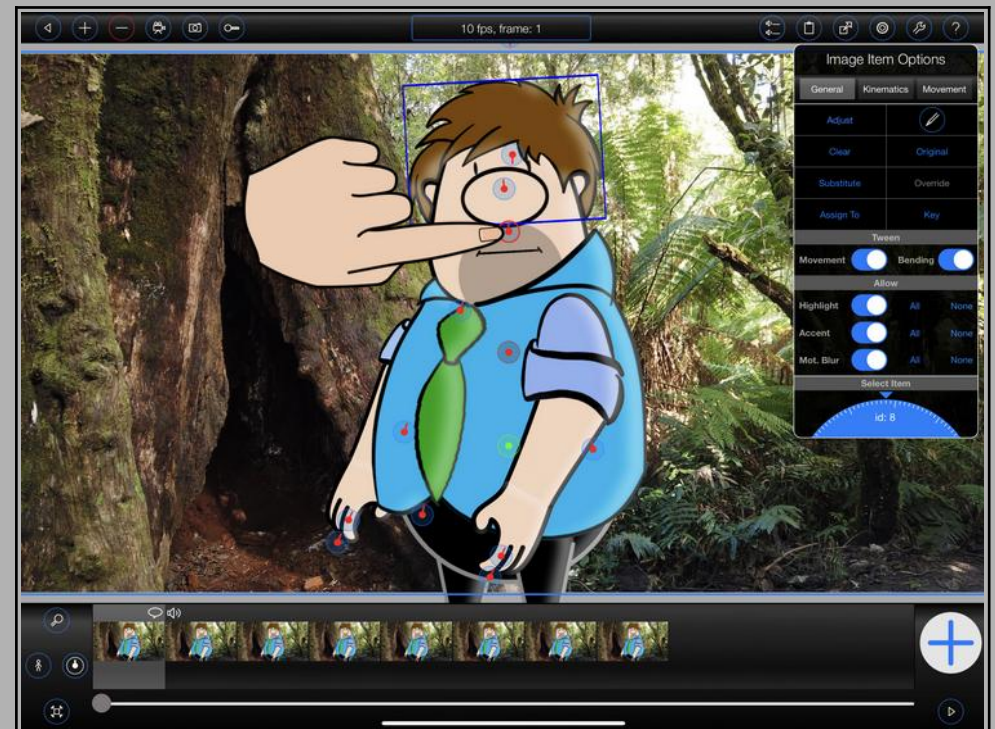
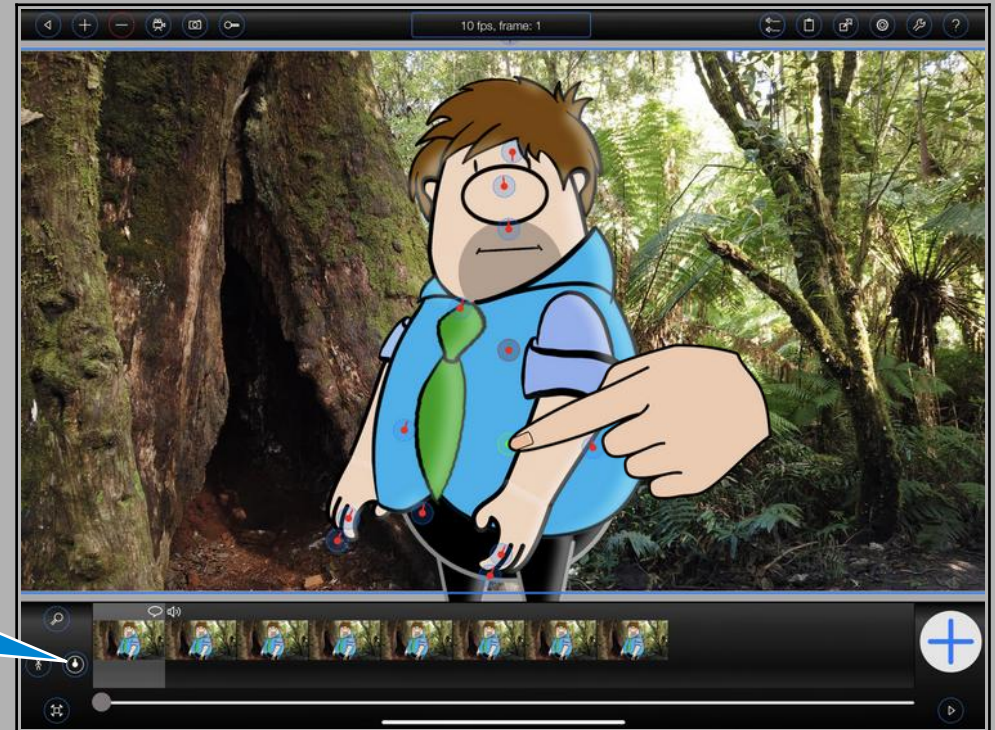
Tap this button to display all of the figure's handles

2.

Select the item (within the figure) that you wish to modify by tapping on its handle. If the handles are not currently visible, or if you'd like to modify a static item, press the  button first (please see above).

**Please note:** You may need to tap twice on bendable items to display the 'Item Options' popover.

Animation Pro will highlight the selected item and display the 'Item Options' popover (see next page for details).





# Item Options Popover Overview (General Category)

The 'Item Options' popover (General category) will show different options based upon the type of item you're adjusting. The example below represents the popover displayed for a bendable image item. All other 'Item Options' popovers will contain a subset of the controls shown on this popover.

Press this button to adjust the selected item.

This allows the item to be manipulated in a variety of ways e.g. moved, scaled, rotated or bent etc. etc.

Press this button to clear/hide the selected item.

Press this button to substitute the item's image, mouth or text with another image, mouth etc.

Assign the item's properties to multiple frames.

Specify whether the selected item should allow highlights, accents and/or motion blur

See the 'Figure Inspector' topic (left) for more details regarding highlights and accents.

See the 'Motion Blur' topic (left) for more details regarding motion blur.

Each item in your figure will have a unique id that will be displayed here.

The title and available options will change based upon the type of item selected.

Press this button to edit the item in the Animation Pro 'Image Creator'.

Press this button to reinstate the item's original image, mouth or text.

Override a lip-synching mouth with an image.

Key the item's properties across multiple frames (see the 'Keyframing' topic, left)

Toggle the tweening of the item's movement (and/or bending, where supported) on or off.

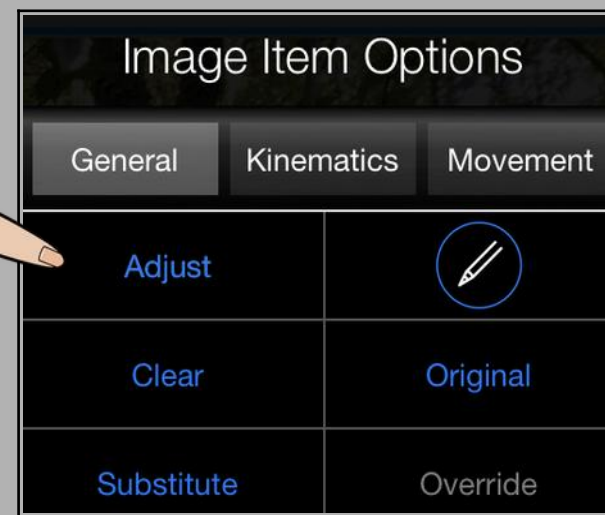
See the 'Tweening' topic (left) for more details.

Rotate to select a different item in the figure.



## Adjusting an Item

Press the 'Adjust' button on the 'Item Options' popover:



This will open the 'Item Adjustment' screen. When the 'Item Adjustment' screen is displayed, all items within the figure that have a z-order higher than the selected item, i.e. that may appear in front of the selected item, will be displayed in a semi-transparent manner (see the arm and leg of the figure, right).

### Please note:

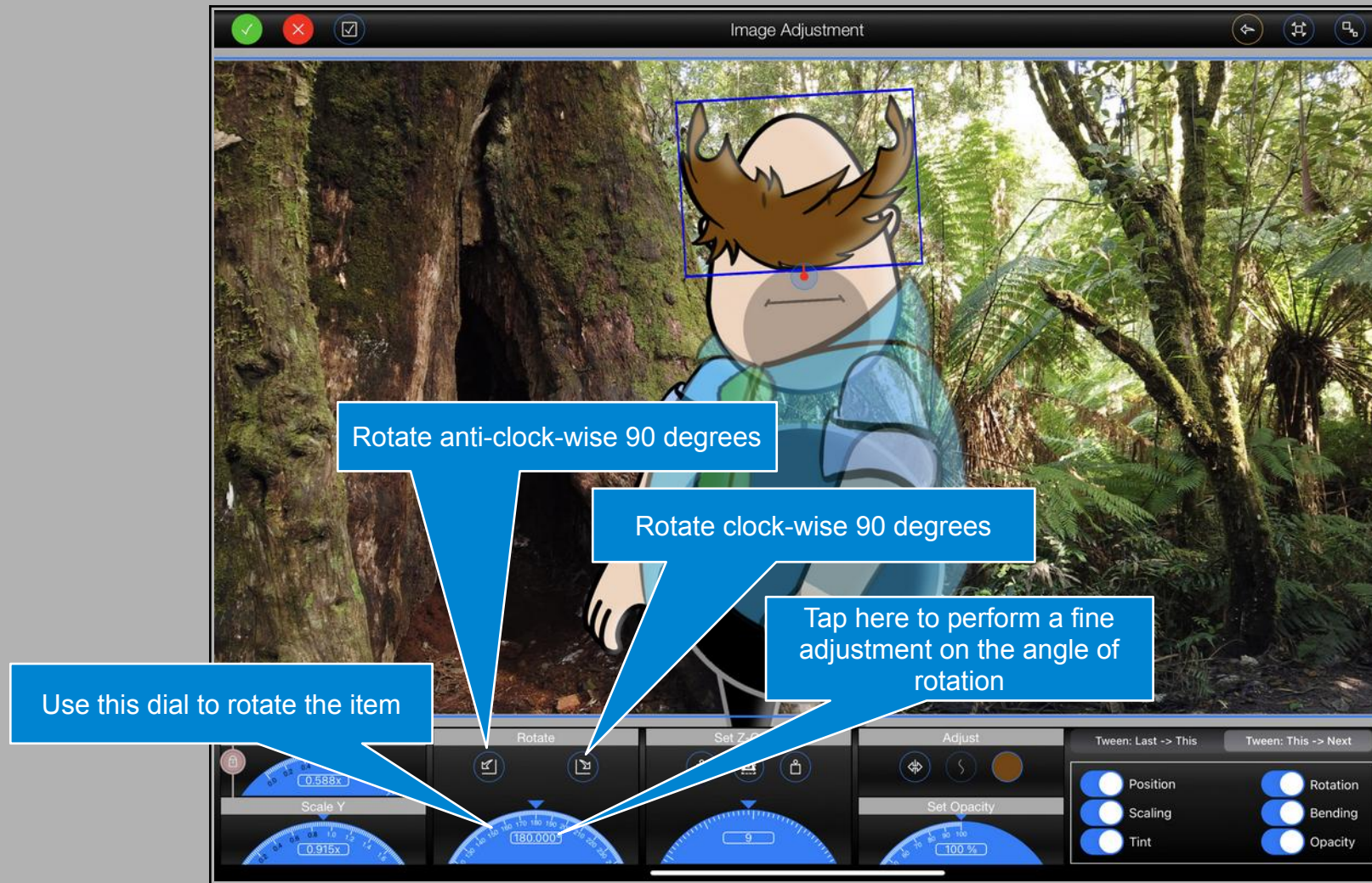
This screen will differ slightly based upon the type of item being adjusted.

Some options may be disabled for clones – please see the 'Clones' topic (left) for more details.



## Rotating an Item

Rotate the item using the controls shown below:



**Please note:** Line and circle items cannot be rotated.



## Moving an Item

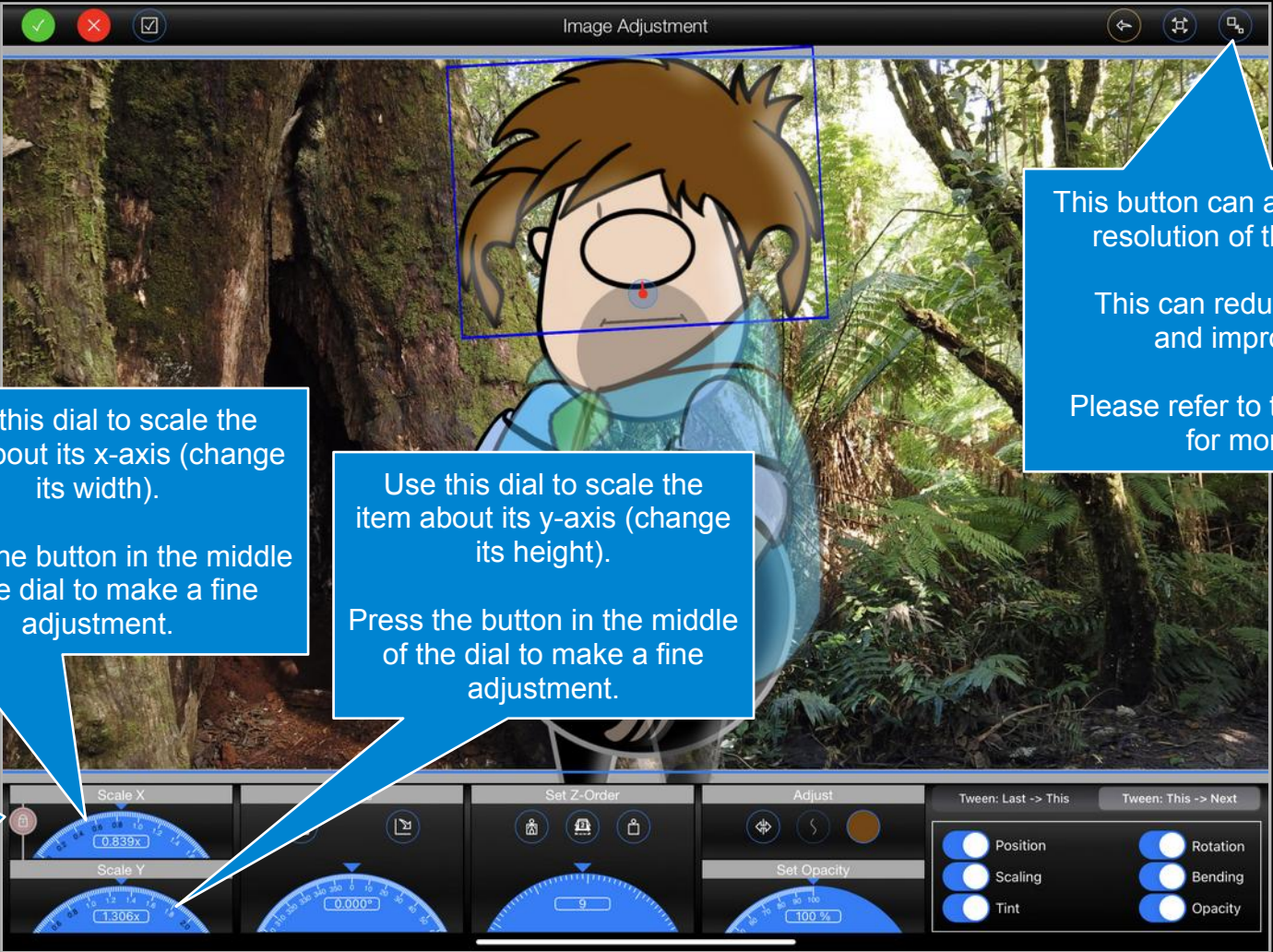
Use one finger to drag the selected item around:



**Please note:** Item handles will always remain in their original positions. Line and circle items may not be moved.

## Scaling an Item

Use the 'Scale X' and 'Scale Y' dials (bottom-left corner) to shrink or enlarge an item. By default, the two dials will be 'locked' such that scaling an item about its X-Axis also scales it about its the Y-Axis (and vice-versa). To scale each axis independently, tap on the 'Lock' button as shown below:



The screenshot shows the 'Image Adjustment' interface. At the top, there are three status icons: a green checkmark, a red X, and a blue checkmark. Below these is a large preview window showing a cartoon character with brown hair and a blue shirt, positioned in a forest. A blue rectangular selection box is around the character. Below the preview, there are several control panels. On the left, there are two circular dials for 'Scale X' and 'Scale Y'. The 'Scale X' dial is set to 0.839x and the 'Scale Y' dial is set to 1.306x. To the right of these dials is a 'Set Z-Order' panel with three icons. Further right is an 'Adjust' panel with a color wheel and a 'Set Opacity' panel with a slider set to 100%. On the far right, there are two columns of toggle switches for 'Tween: Last -> This' and 'Tween: This -> Next'. The first column has toggles for Position, Scaling, and Tint. The second column has toggles for Rotation, Bending, and Opacity. All these toggles are currently turned on. Four blue callout boxes provide instructions: 1. A box pointing to the 'Lock' button (a small padlock icon) says: 'Press to lock/unlock dual axis scaling. When locked, x-axis adjustments will automatically adjust the y-axis and vice-versa.' 2. A box pointing to the 'Scale X' dial says: 'Use this dial to scale the item about its x-axis (change its width). Press the button in the middle of the dial to make a fine adjustment.' 3. A box pointing to the 'Scale Y' dial says: 'Use this dial to scale the item about its y-axis (change its height). Press the button in the middle of the dial to make a fine adjustment.' 4. A box pointing to the top-right corner of the preview window says: 'This button can also be used to lower the resolution of the underlying image. This can reduce memory utilisation and improve performance. Please refer to the 'Memory' topic (left) for more information.'

Use this dial to scale the item about its x-axis (change its width).  
Press the button in the middle of the dial to make a fine adjustment.

Use this dial to scale the item about its y-axis (change its height).  
Press the button in the middle of the dial to make a fine adjustment.


Press to lock/unlock dual axis scaling. When locked, x-axis adjustments will automatically adjust the y-axis and vice-versa.

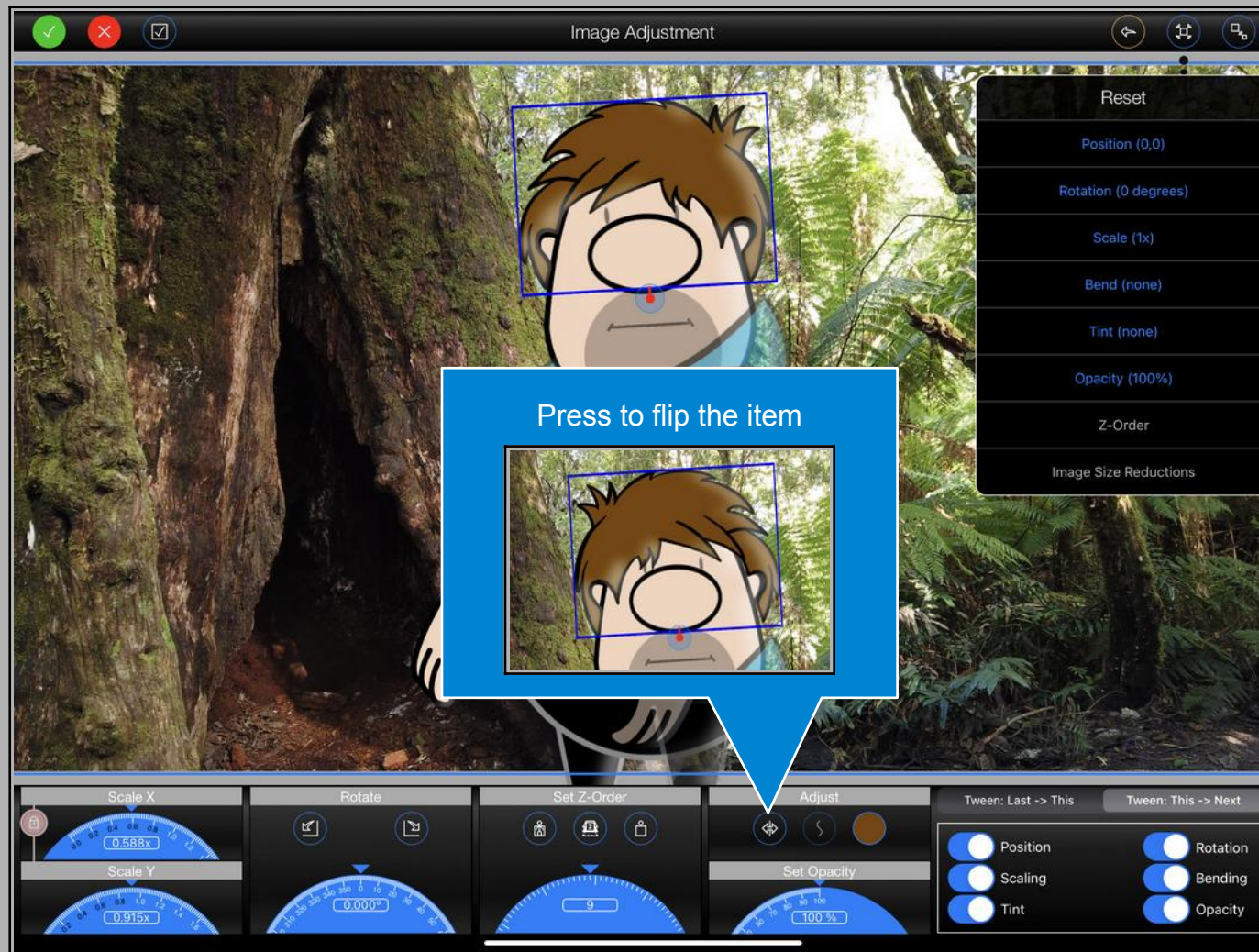
This button can also be used to lower the resolution of the underlying image.  
This can reduce memory utilisation and improve performance.  
Please refer to the 'Memory' topic (left) for more information.

**Please note:** Item handles will always remain in their original positions.



## Flipping an Item




Press the  button to flip the item:



**Please note:** Line and circle items may not be flipped.



## Bending an Item

1. Press the  button to enter 'bend mode'. Blue bend handles, , will be displayed.
2. Drag the bend handles to bend the item.
3. Press the  button again to exit 'bend mode'.



**Please note:** Lines, circles and bendable items may not be bent via the 'Item Adjustment' screen.



## Changing the Opacity of an Item

Use the 'Opacity' dial to change the opacity of an item:



Use this dial to change the opacity of an item

Tap here to perform a fine adjustment on the level of opacity



## Tinting an Item

Press the  button to tint an item:





Animation Pro will display an 'Item Tint' popover:

The screenshot displays the 'Image Adjustment' interface in Animation Pro. A cartoon character with green hair and glasses is positioned over a forest background. The 'Item Tint' popover is open, showing a color gradient bar, a blend mode dropdown set to 'Multiply', and a strength dial set to 100%. The interface also includes a bottom toolbar with 'Scale X', 'Scale Y', and 'Rotate' controls, and a 'Tween' section with toggles for Position, Scaling, Tint, Rotation, Bending, and Opacity. Several callouts provide instructions on how to use these features.

Touch any point on the colour gradient to choose a lighter version of the currently selected tint colour

Slide your finger around the colour switch to select a tint colour

Tap here to toggle between the colour switch and RGB (red, green and blue) dials

Select a blend mode from this list - see next page for blend mode details.

Rotate the dial to set the strength of the tint. Press the button to perform a fine adjustment of the percentage.

Scale X: 0.588x  
Scale Y: 0.915x  
Rotate: 0.000°

Tween: Last -> This | Tween: This -> Next

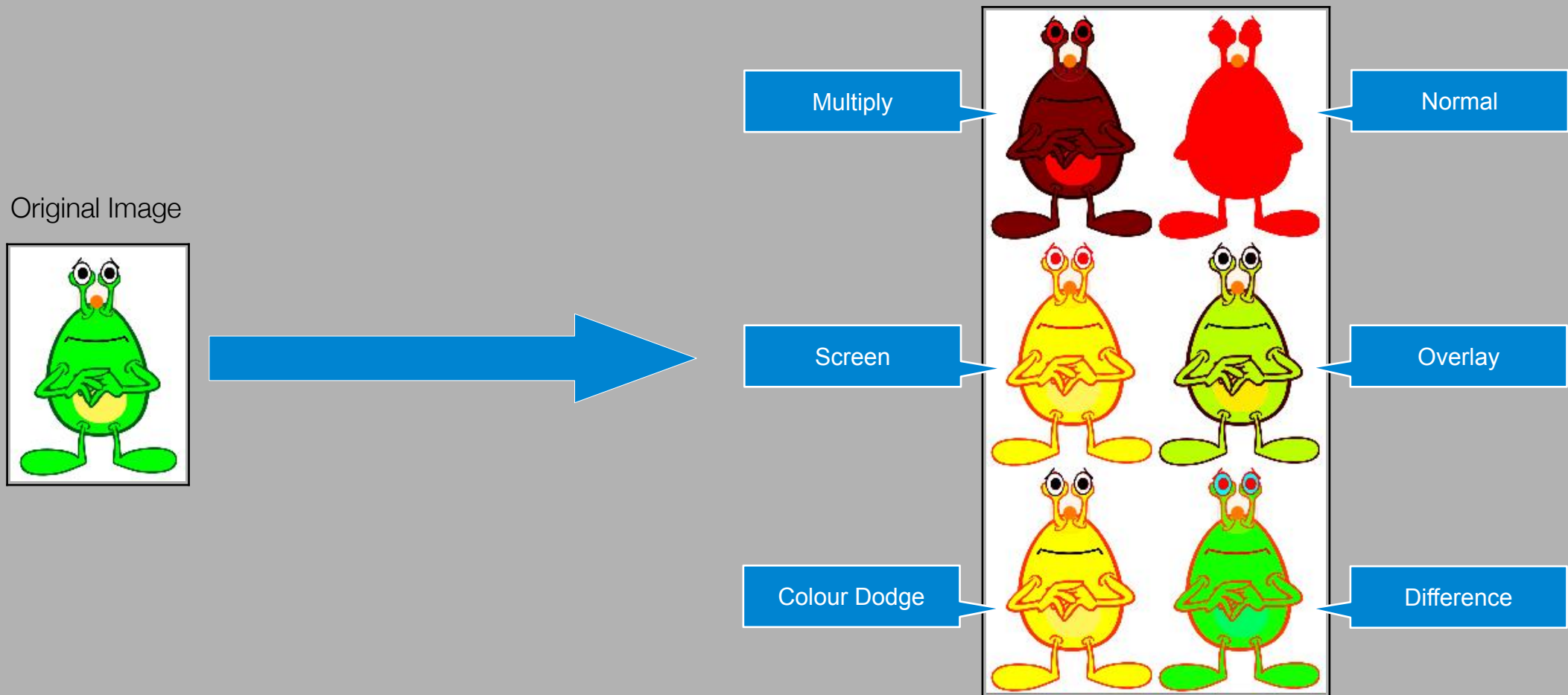
- Position
- Scaling
- Tint
- Rotation
- Bending
- Opacity



## Blend Modes

When tinting an item, the selected tint colour is blended with the existing colours in the item. The way in which the tint colour is blended is based upon a 'Blend Mode'.

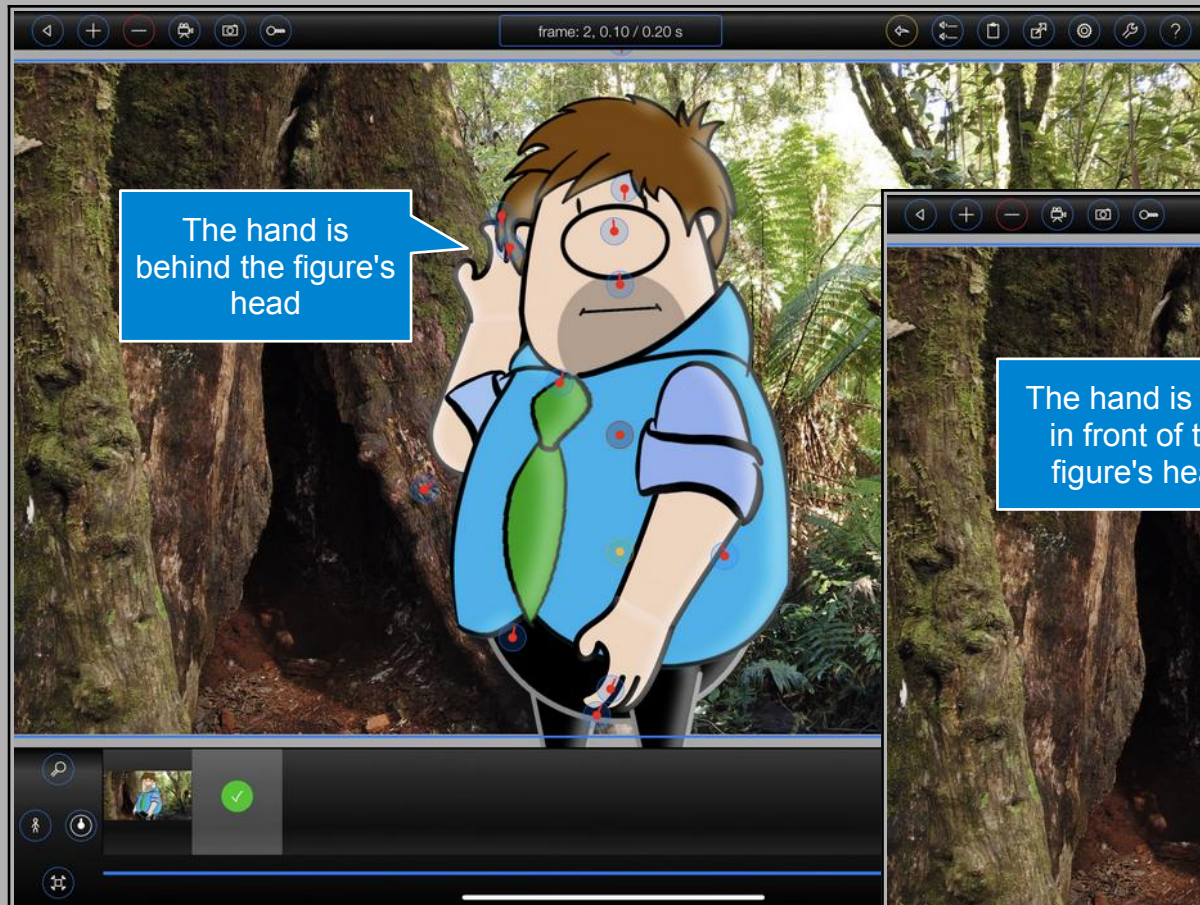
Here are few different blend mode examples (where red has been applied as a tint colour):



## Changing the Z-Order of an Item

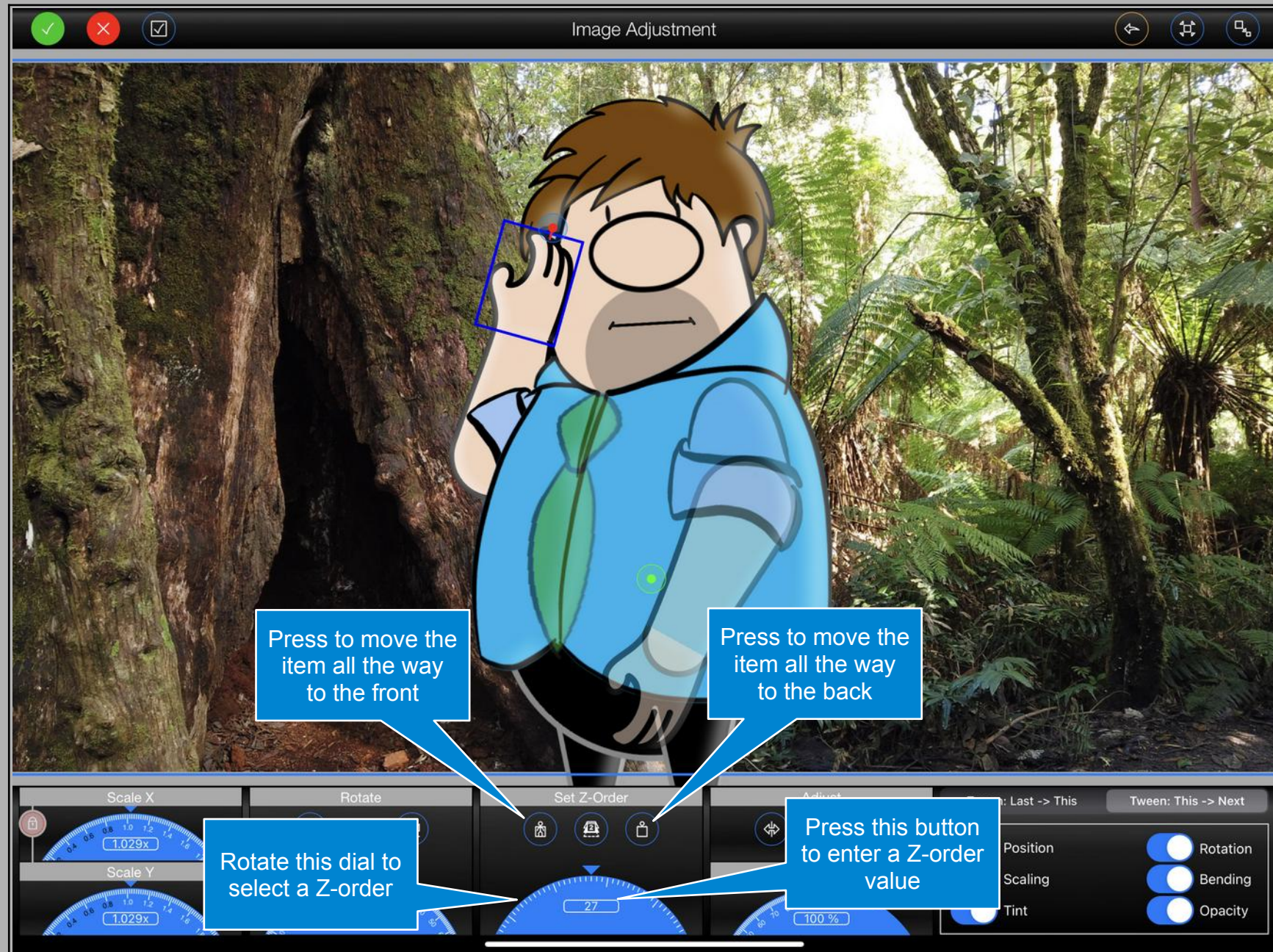
Each item in a figure has a z-order that defines its relative position (from back to front) within the figure. An item with a z-order of zero will be all the way to the back. The item with the largest z-order will be at the front.

Sometimes it can be useful to rearrange the z-orders of the items in a figure whilst animating; for example, to move a figure's hand from behind their head to in front of their head as shown below:






You can adjust the z-order of an item using the controls on the Item Adjustment screen as shown below:





By default, the Item Adjustment screen makes all items in front of the selected item transparent. This is done so that you can see the changes that you're actually making to the item. It can however, make z-order adjustments a little tricky.

So Animation Pro provides a  button on the Item Adjustment screen that will display the items in the same manner as the Figure Editor, that is, items above the selected item will be opaque and those below will be transparent. The z-order of each item will also be displayed as shown below:






## Changing the Width of a Line or Circle Item

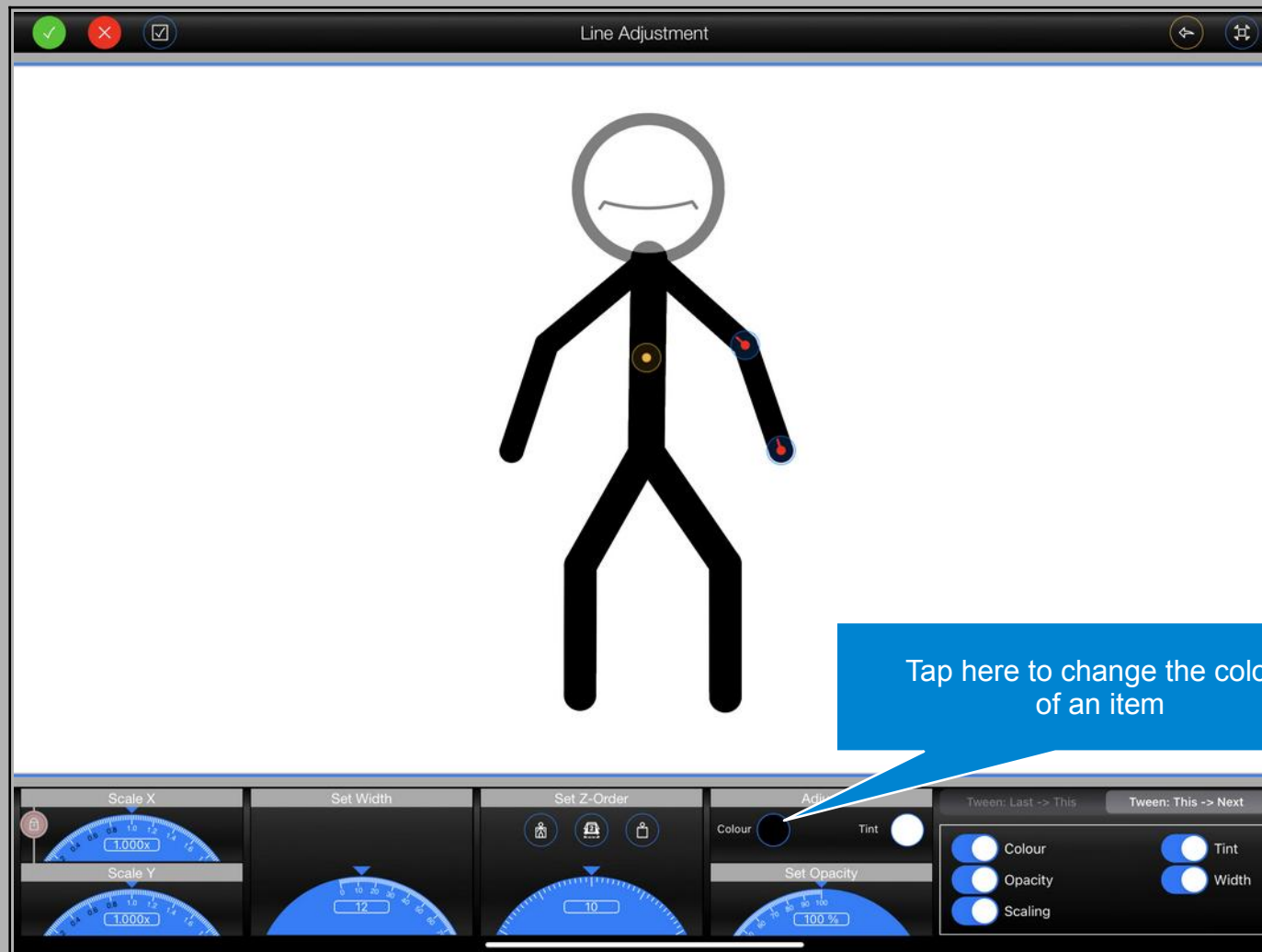
Change the width of a line or circle item using the controls shown below:



**Please note:** This adjustment applies to line and circle items only.

## Changing the Colour of Line and Circle Items

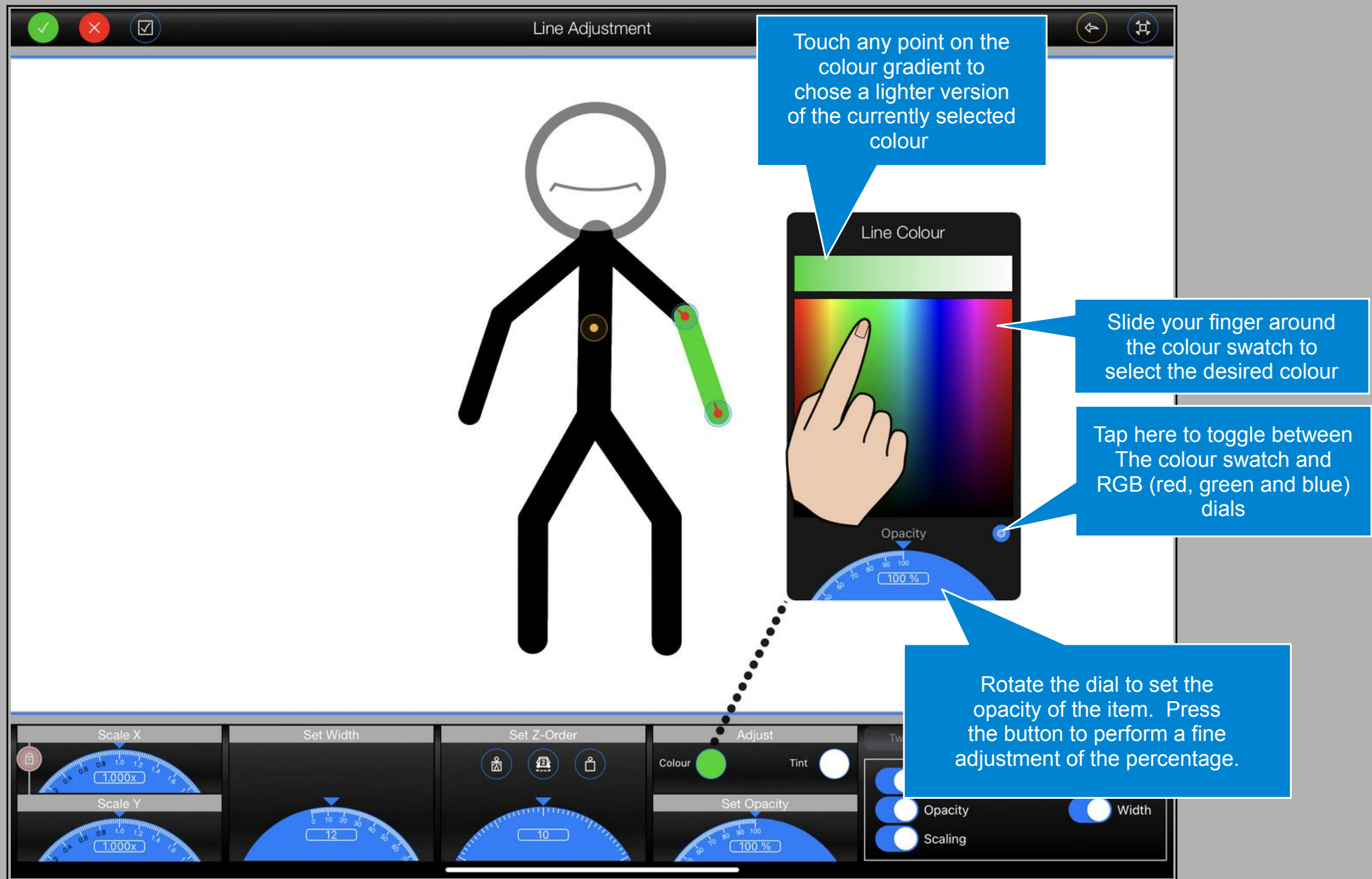
Press the  button to change the colour of a line or the outline of a circle:



**Please note:** This adjustment applies to line and circle items only.



Animation Pro will display an 'Item Colour' popover:



When adjusting the colour of a circle, it is also possible to set its fill colour as shown below:

The image shows a software interface for adjusting a circle's properties. The main workspace displays a stick figure with a yellow circular head. Two red pins are on the head's outline, and a yellow dot is on its body. A callout points to the head with the text: "Tap here to change the colour of an item".

At the bottom is a control panel with several sections: "Scale X" and "Scale Y" (dials at 1.000x), "Set Width" (dial at 6), "Set Z-Order" (dial at 11), and "Adjust" (a yellow circle). A dotted line connects the "Adjust" circle to a callout: "Tap here to change the colour of an item". To the right of "Adjust" is a "Set Opacity" dial at 100%.

On the right side, a "Circle Colour" panel is shown. It has two tabs: "Outline" and "Fill". A callout points to the "Fill" tab: "Select whether you'd like to adjust the outline or fill colour". Below the tabs is a color gradient bar. A callout points to it: "Touch any point on the colour gradient to chose a lighter version of the currently selected colour". A hand icon is shown touching the gradient. Another callout points to the hand: "Slide your finger around the colour swatch to select the desired colour". Below the gradient is a toggle switch. A callout points to it: "Tap here to toggle between the colour swatch and RGB (red, green and blue) dials". At the bottom of the panel is an "Item Opacity" dial at 100%. A callout points to it: "Rotate this dial to set the opacity of the item." Below the dial is a button. A callout points to it: "Press the button to perform a fine adjustment."

At the bottom right of the control panel is a "Tween" section with two buttons: "Last -> This" and "This -> Next". Below these are four toggle switches: "Colour", "Opacity", "Scaling", "Tint", and "Width".



## Undoing Item Adjustments

Press the  button to undo an item adjustment. Animation Pro will display an 'Undo' menu:





## Resetting Item Adjustments

Press the  button to reset an item adjustment. Animation Pro will display a 'Reset' menu:





## Item Adjustment Tween Settings

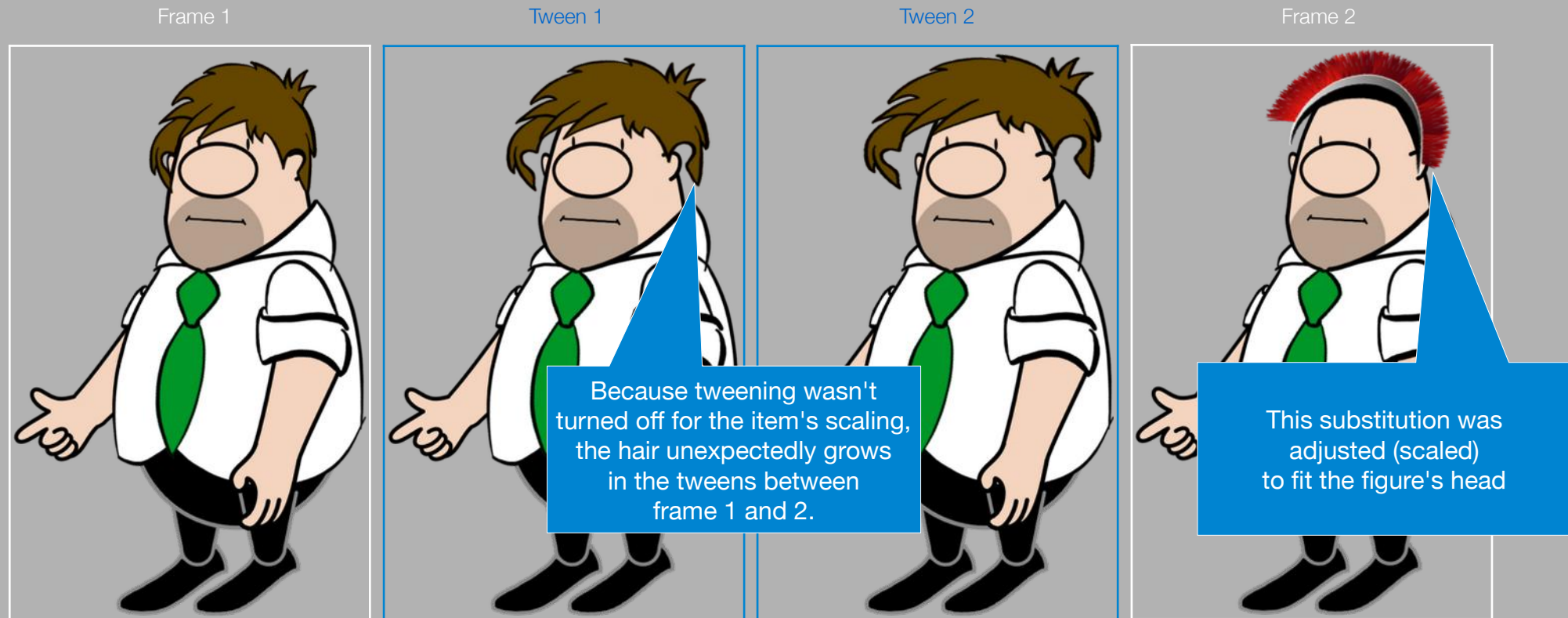
Tap the switches (bottom-right) to turn the various 'tween' settings on or off:



Select the 'tween' settings that you wish to adjust i.e. from the previous frame to the current frame or the current frame to the next frame.

Tap on these switches to turn the 'tween' settings on or off

Generally speaking, Animation Pro's tween settings will apply to any tweens inserted between the currently selected frame and the next frame in your project. Often, however, item adjustments need to be made to address alignment etc. issues caused by item substitutions. In these cases, it is often necessary to turn off tweening both before and after the current frame to prevent unexpected transitions, as shown below:

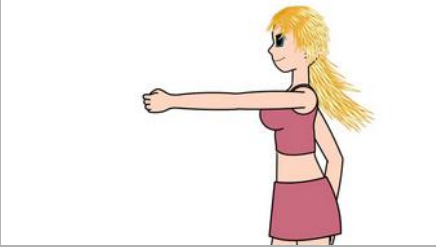
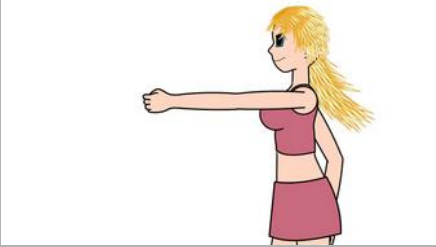
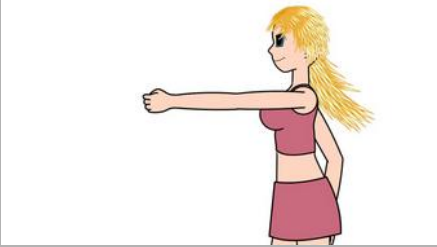
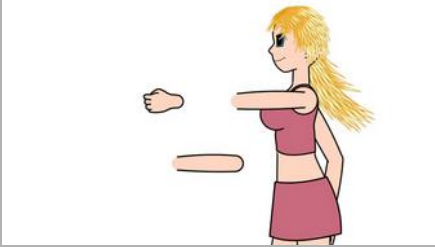
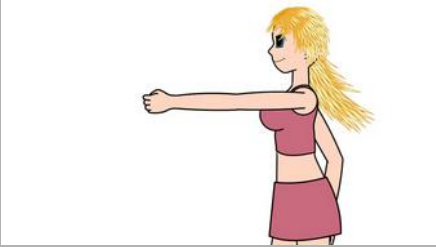
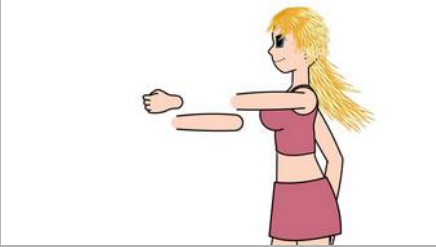
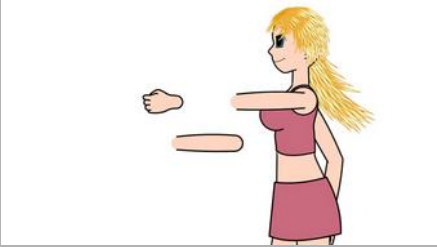
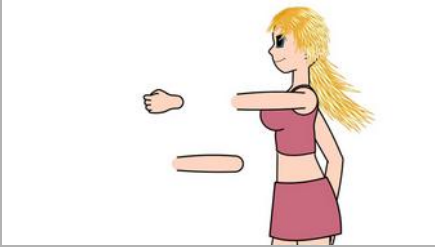
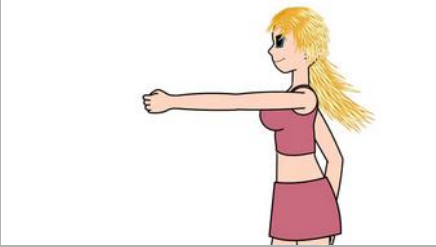
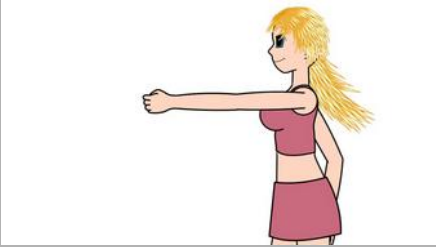
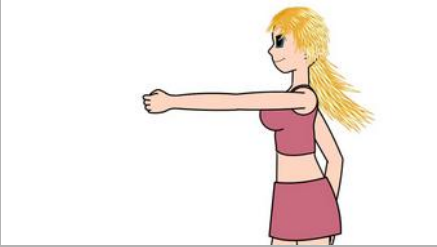
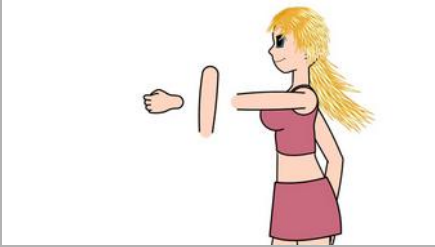
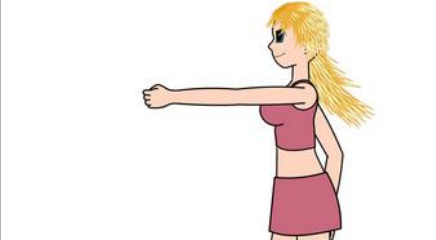
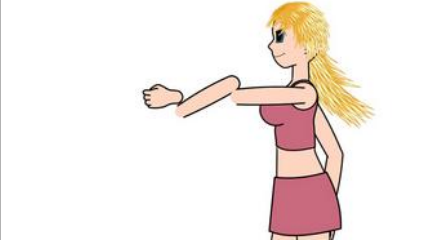
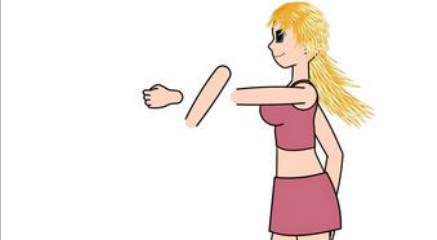
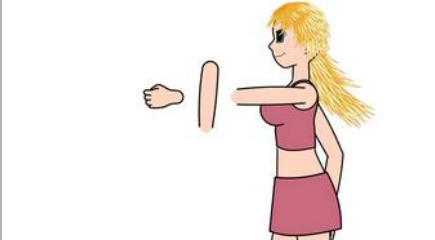


The tween settings (at the bottom-right corner of the Item Adjustment screen) thus allow you to specify which tween settings you wish to adjust i.e. 'Tween: Last -> This' (the previous to the current frame) and/or 'Tween: This -> Next' (the current frame to the next frame).

**Furthermore, Animation Pro will automatically detect whether item adjustments are being made following a substitution and will display a prompt, asking if you would like the tween settings to be adjusted automatically.**



The following table shows the effects of turning the various 'Item Adjustment Tween' switches off and on, for a figure's arm, in frame one of an animation with two 'twens':

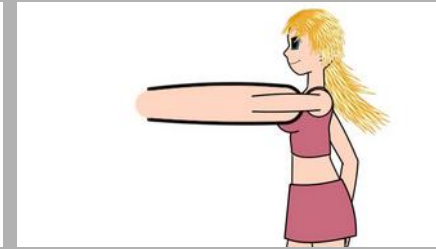
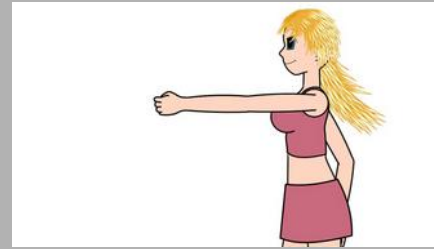
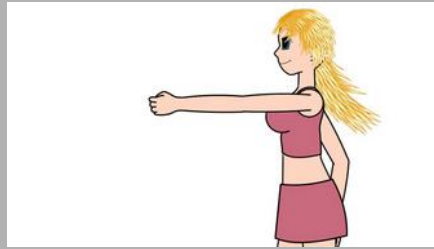
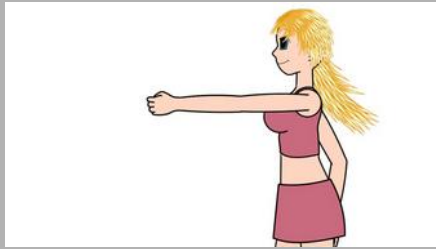
	Frame 1	TWEENS		Frame 2
Tween Offset OFF				
Tween Offset ON				
Tween Rotation OFF				
Tween Rotation ON				

Frame 1

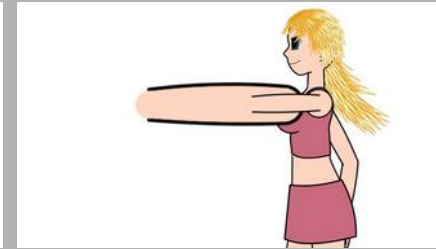
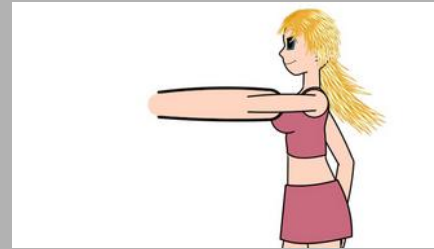
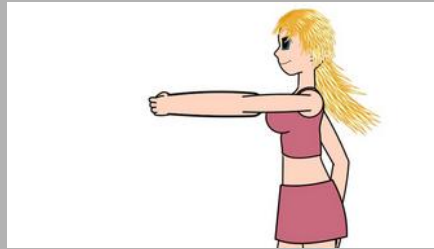
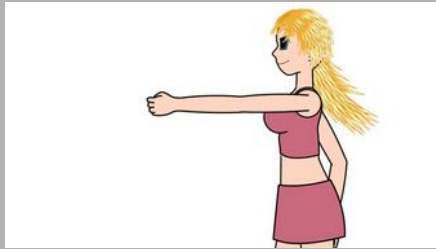
TWEENS

Frame 2

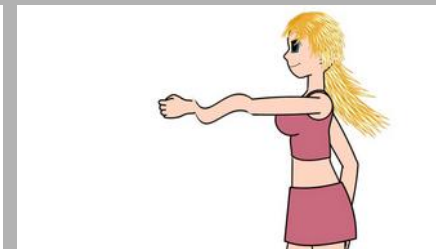
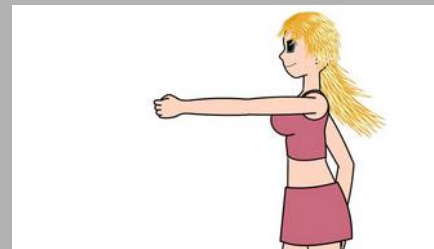
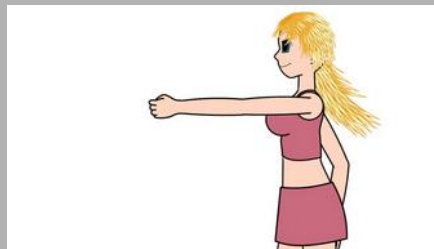
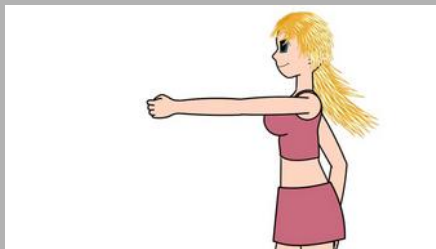
Tween Scaling OFF



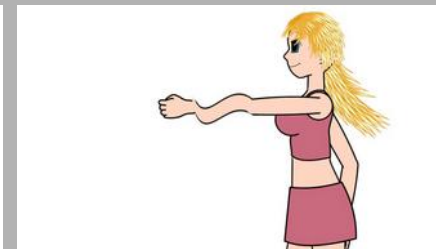
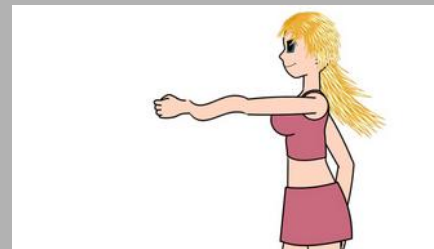
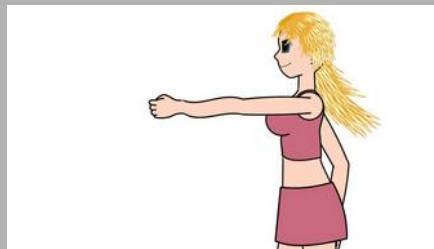
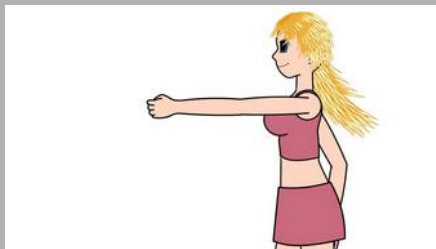
Tween Scaling ON



Tween Bending OFF



Tween Bending ON



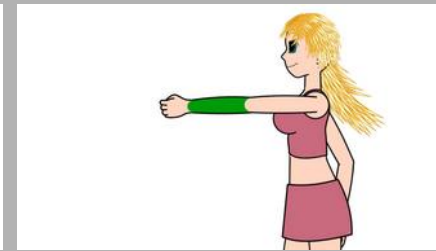
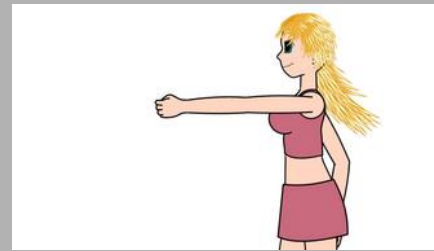
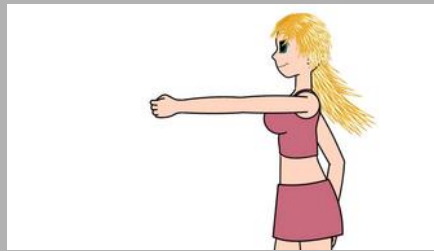
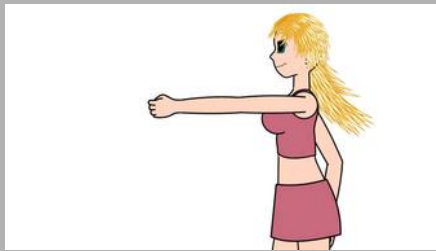


Frame 1

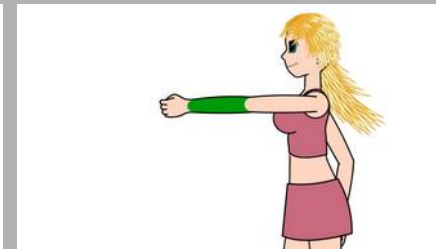
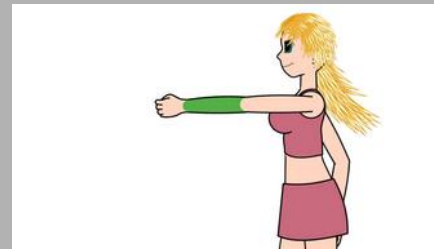
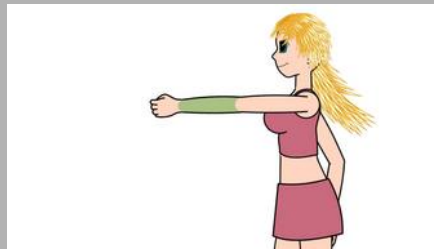
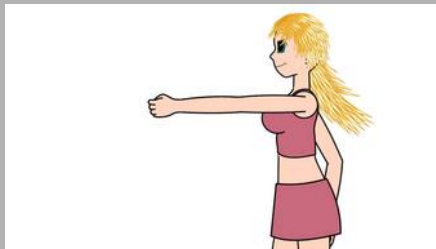
TWEENS

Frame 2

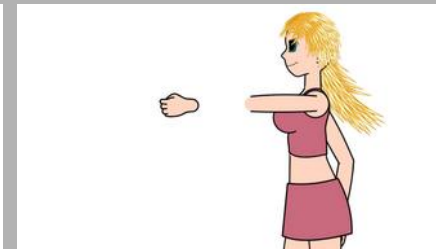
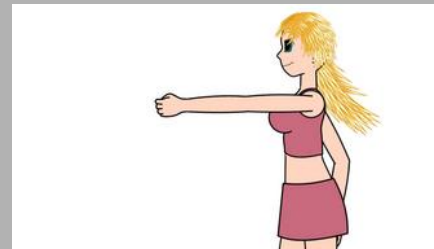
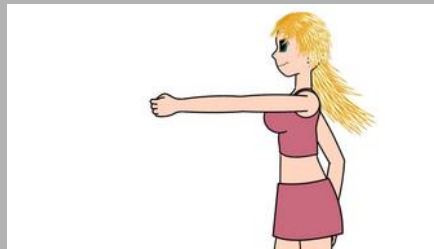
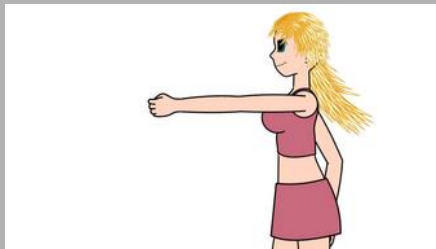
Tween Tint OFF



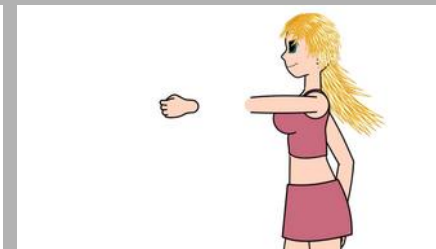
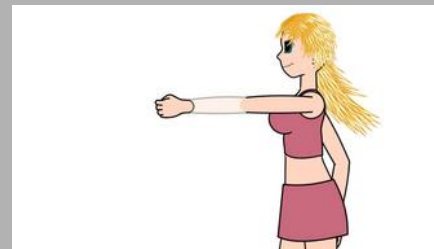
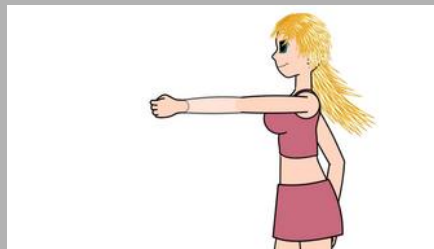
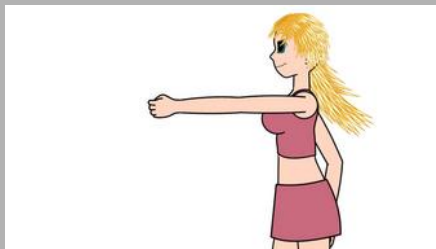
Tween Tint ON\*



Tween Opacity OFF



Tween Opacity ON



For more information, please see the 'Tweening' topic (left).

## Accepting, Cancelling and Previewing

The screenshot displays an animation software interface. At the top left, three circular buttons are visible: a green checkmark, a red 'X', and a blue square with a white checkmark. Blue callout boxes point to these buttons with the following text:

- Accept all of the changes and return to the animation screen.** (points to the green checkmark button)
- Cancel all of the changes and return to the animation screen.** (points to the red 'X' button)
- Preview the current frame** (points to the blue square button)

The main canvas shows a cartoon character with white hair and a blue shirt, positioned in a lush green forest. A blue rectangular selection box is around the character's head, and a green dot is on the character's chest.

The bottom panel contains several control sections:

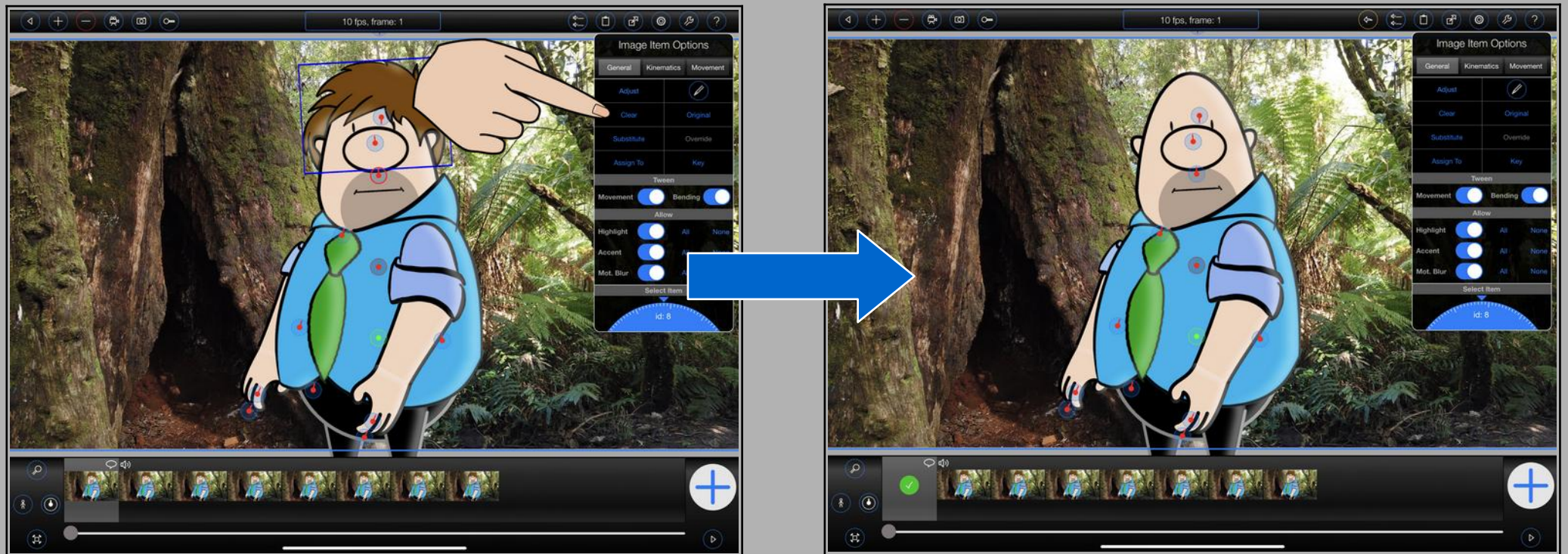
- Scale X:** A dial showing 0.588x.
- Scale Y:** A dial showing 0.915x.
- Rotate:** A dial showing 0.000°.
- Set Z-Order:** A dial showing 9.
- Adjust:** Includes a 'Set Opacity' dial showing 100%.
- Tweening:** Two tabs, 'Last -> This' and 'This -> Next', with a list of properties: Position, Scaling, Tint, Rotation, Bending, and Opacity, each with a toggle switch.



## Clearing an Item

Select the 'Clear' option on the 'Item Options' popover.

This will 'hide' the selected item. To show it again, open the 'Item Options' popover and select 'Original'.



## Substituting an Item

Item images can be substituted with other images, mouths with other mouths. To perform a substitution:

1.  
Select the 'Substitute' option on the 'Item Options' popover:

2.  
Select a replacement image or mouth (image selection shown in example, below):

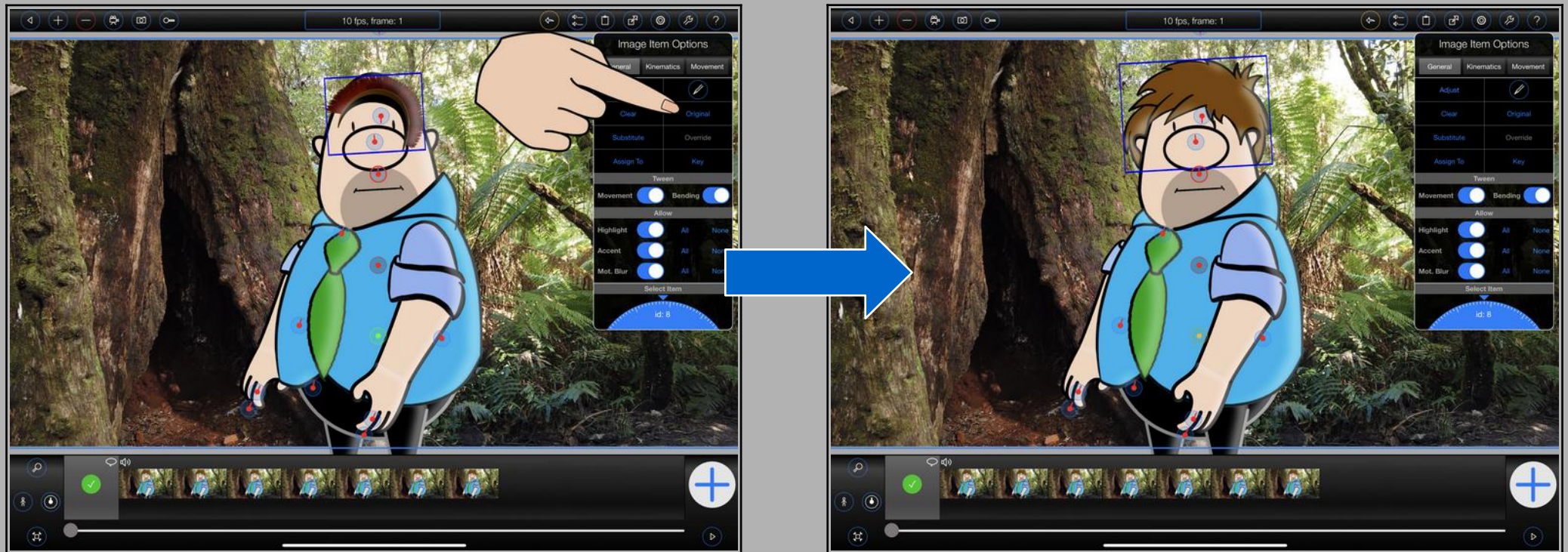


**Please note:** When figures, containing substitutions, are saved from the Animation Pro animation screen, the original images will be replaced with the substitutions in the saved figures.



## Removing a Substitution

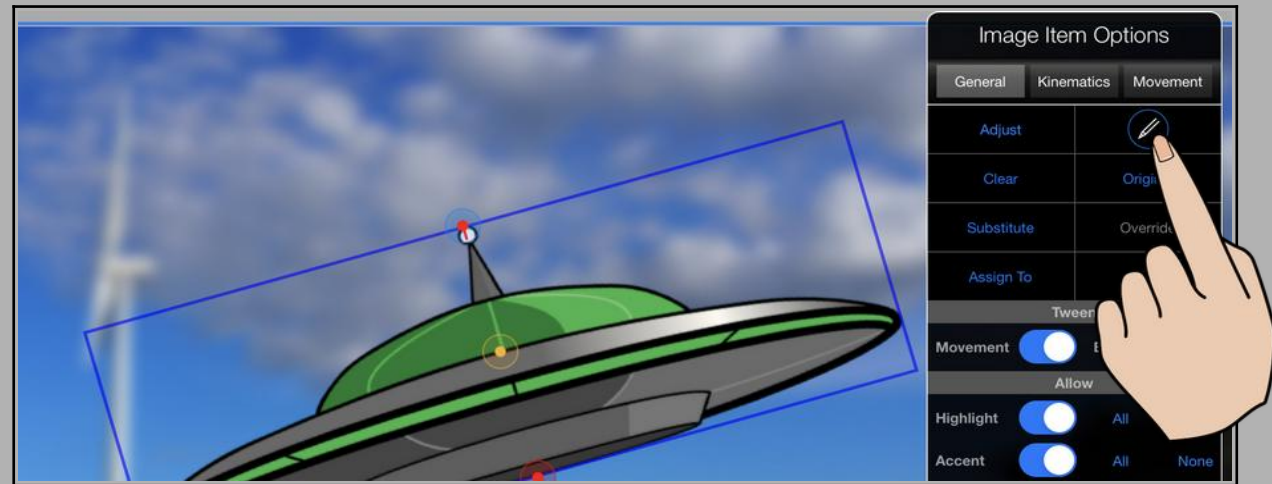
To remove a substitution (i.e. reinstate the original item), select the 'Original' option from the 'Item Options' popover:



This option may also be used to reinstate an item that had previously been cleared.

## Drawing

Select the  option on the 'Image Options' popover:



This will open the 'Animation Drawing View':



It is possible to draw upon (modify) any image item in a figure whilst animating.

For detailed information, please refer to the 'Drawing' topic (left).



## Assign To

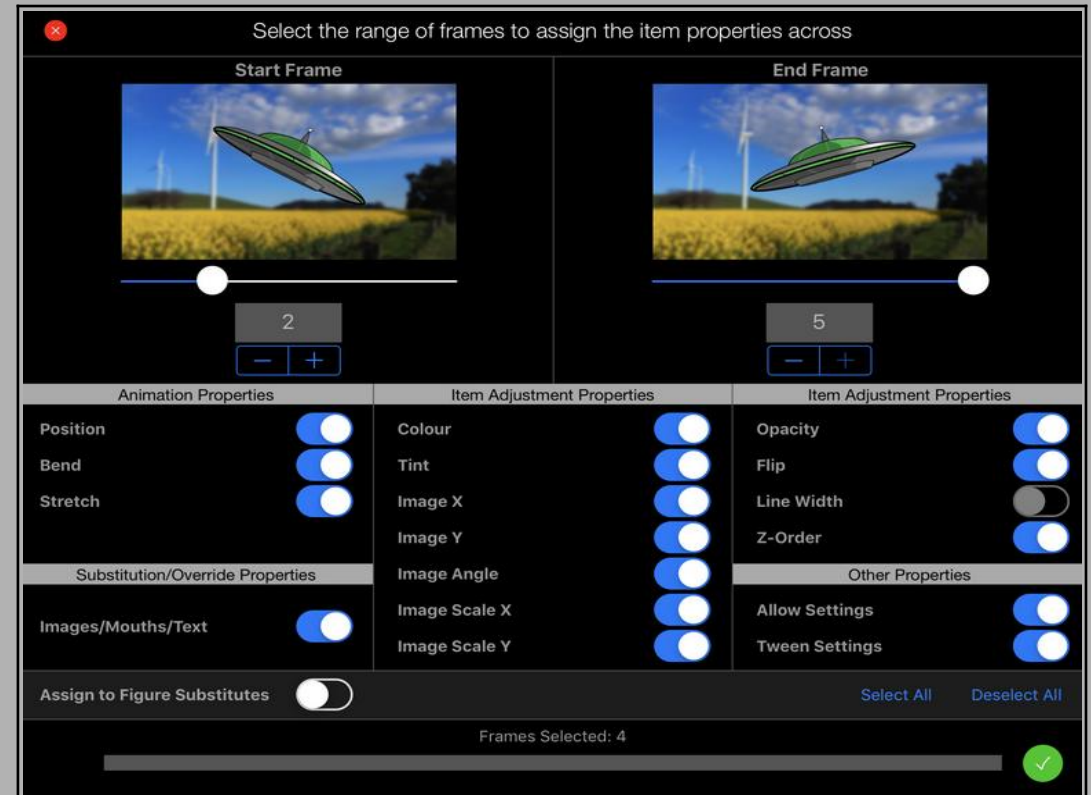
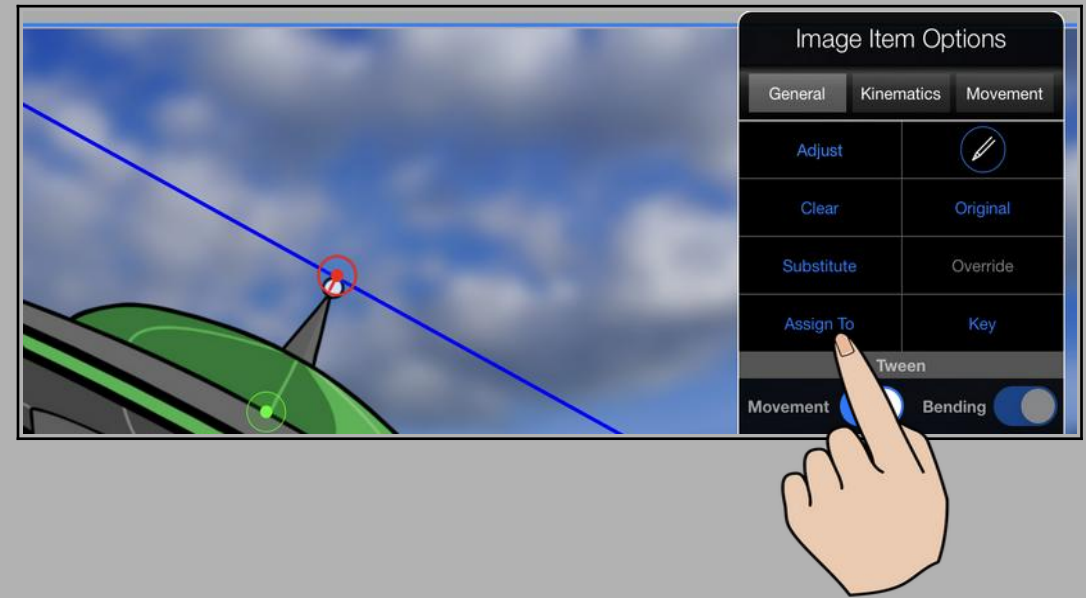
If you've adjusted the properties of an item and wish to replicate one or more of those properties across a number of frames then:

1. Press the 'Assign To' button
2. Use the sliders and steppers to select the start and end frame in your animation
3. Select which item properties you'd like to replicate across the selected frames

Animation Pro will modify all of the selected frames to set the selected properties of the item identical to that of the currently selected item.

### Please note:

Any changes made to frames will not be reversed if this process is cancelled midway.

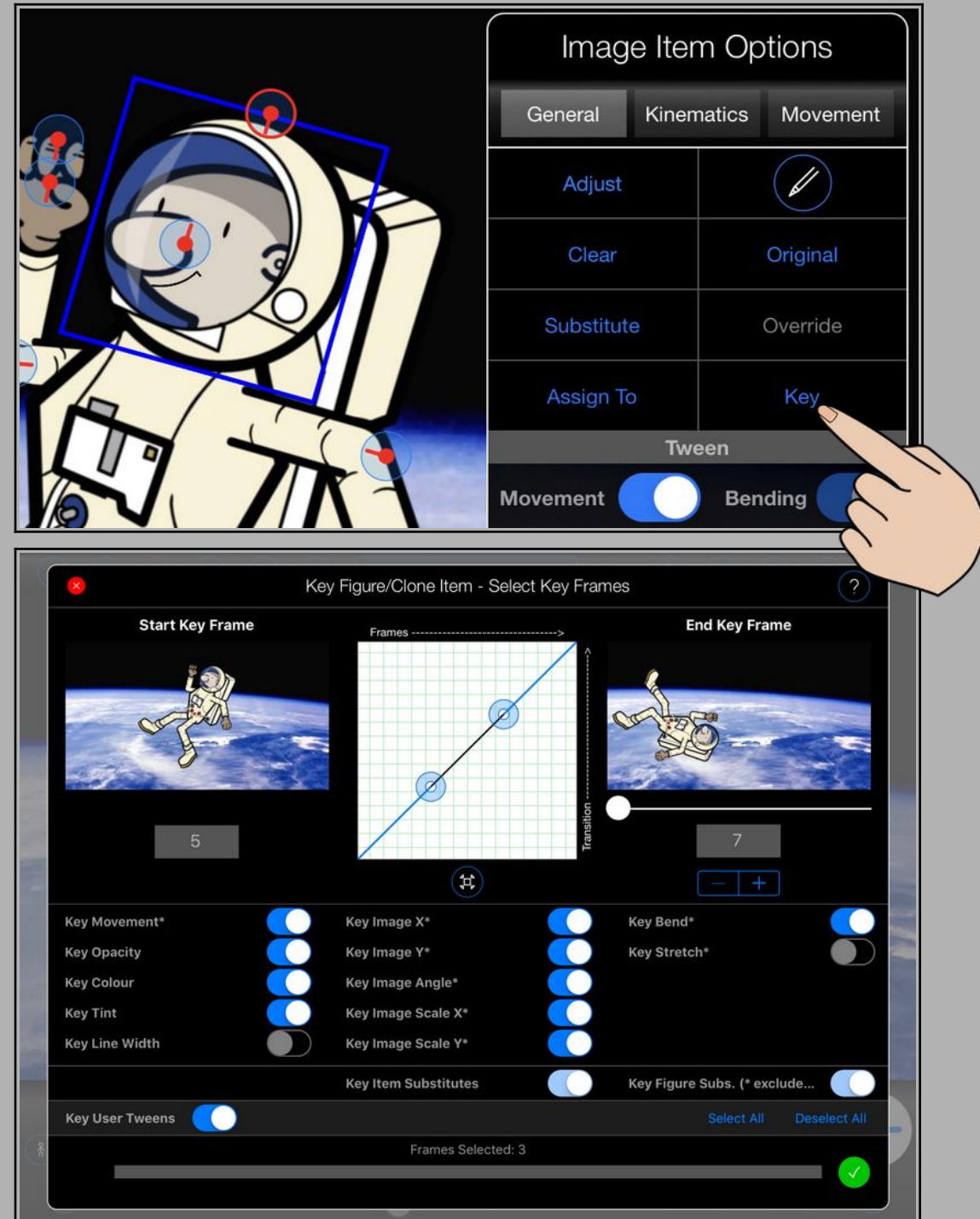


## Key

It is possible to 'key' the properties of an individual item in a figure across multiple frames to produce smooth transitions:

1. Press the 'Key' button
2. Select the end key frame and the properties that should be 'keyed' and then press the green tick button.

For more information, please refer to the 'Keyframing' topic, left.





## Allow

The 'Item Options' popover may be used to control which items, in a figure, allow (i.e. accept or participate in) highlighting, accents and motion blur.

The screenshot shows the 'Image Item Options' popover with three tabs: 'General', 'Kinematics', and 'Movement'. The 'General' tab is active. It contains buttons for 'Adjust', 'Clear', 'Substitute', 'Assign To', 'Original', 'Override', and 'Key'. Below these is a 'Tween' section with 'Movement' and 'Bending' toggle switches, both of which are turned on. The 'Allow' section has three rows: 'Highlight', 'Accent', and 'Mot. Blur'. Each row has a toggle switch (all three are turned on) and two buttons: 'All' and 'None'. The 'All' buttons are highlighted in blue. Below the 'Allow' section is a 'Select Item' section with a semi-circular slider and the text 'id: 8'.

Use the 3 switches to specify whether the selected item (in the figure) should allow either highlights, accents or motion blur.

Press the 'All' buttons to quickly turn on (i.e. allow) each effect for all items in the selected figure.

Press the 'None' buttons to quickly turn off (i.e. disallow) each effect for all items in the selected figure.

Please see the next page for an example...

## Example:

