Draw a Plant Stem: Leaf-Node Joints and Taper Construction

Original task 1 / independent drawing and calculation

Task 1

Axis length 100 mm, base width 8 mm, top width 4 mm, nodes at 20, 50, and 75 percent. Calculate node positions and interpolated widths, then describe the drawing.

Keep the original task measurements. Use the full drawing sheet in this PDF for a response needing more room; use the stated paper size when a task specifies larger paper.

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Original task 2 / independent drawing and calculation

Task 2

Axis length 80 mm, base width 5 mm, top width 2 mm, nodes at 30, 60, and 90 percent. Calculate and describe the drawing.

Keep the original task measurements. Use the full drawing sheet in this PDF for a response needing more room; use the stated paper size when a task specifies larger paper.

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Original task 3 / independent drawing and calculation

Task 3

Axis length 150 mm, base width 9 mm, top width 3 mm, nodes at 10, 40, and 70 percent. Calculate and describe the drawing.

Keep the original task measurements. Use the full drawing sheet in this PDF for a response needing more room; use the stated paper size when a task specifies larger paper.

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Original task 4 / independent drawing and calculation

Task 4

Axis length 60 mm, base width 4 mm, top width 1 mm, nodes at 35, 65, and 85 percent. Calculate and describe the drawing.

Keep the original task measurements. Use the full drawing sheet in this PDF for a response needing more room; use the stated paper size when a task specifies larger paper.

Full drawing sheet / reusable blank workspace

Reusable full drawing sheet for Tasks 1 to 4. Print another copy when needed. Keep all original task measurements; if a task specifies larger paper, use that paper size.

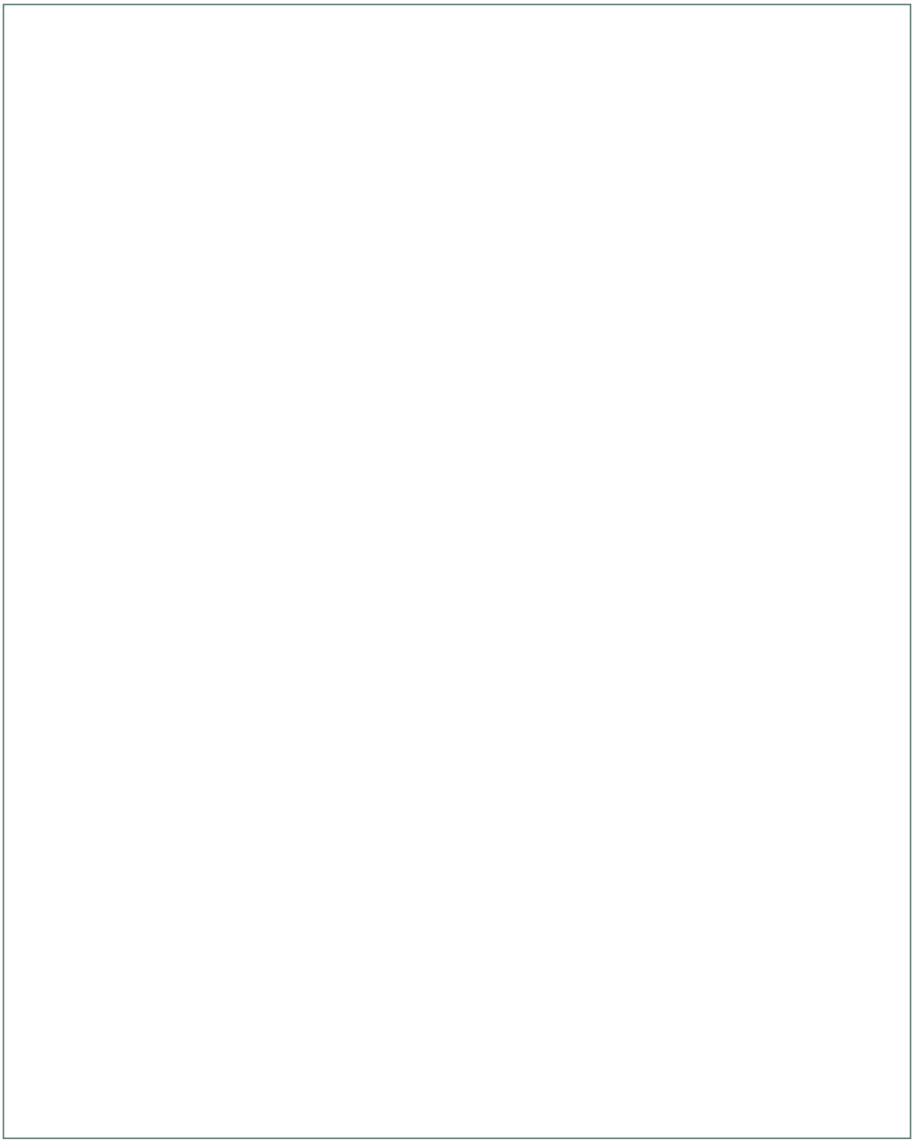
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Task 1 / practice

Stem construction / all labelled mm dimensions print 1:1 / selected classroom study

Calculate three axis positions and three interpolated widths on the original task. Mark light perpendicular locating ticks before adding the final shorter upward joint marks. Record: position / width / angle.

Blank work field / nominal 120 x 150 mm / printed 1:1



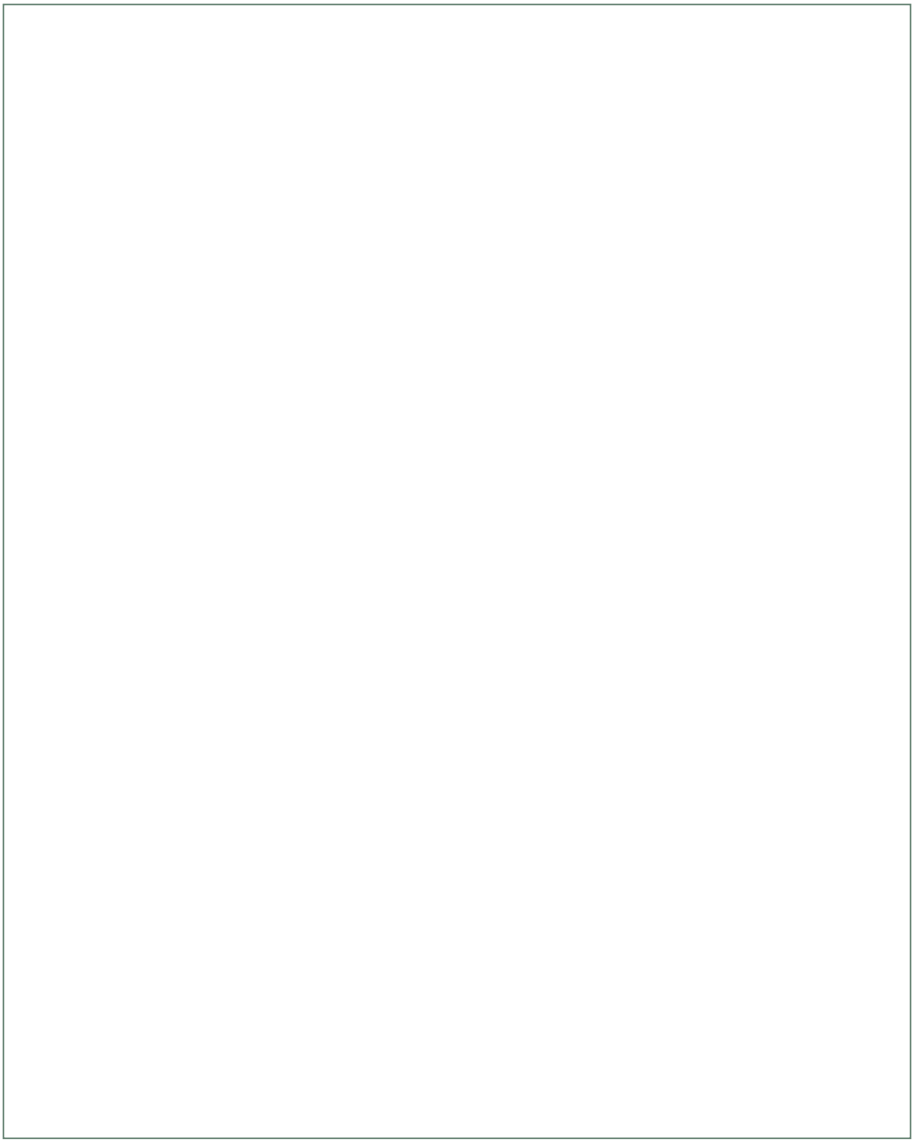
Draw a Plant Stem: Leaf-Node Joints and Taper Construction

Task 2 / practice

Stem construction / all labelled mm dimensions print 1:1 / selected classroom study

Calculate three axis positions and three interpolated widths on the original task. Mark light perpendicular locating ticks before adding the final shorter upward joint marks. Record: position / width / angle.

Blank work field / nominal 120 x 150 mm / printed 1:1



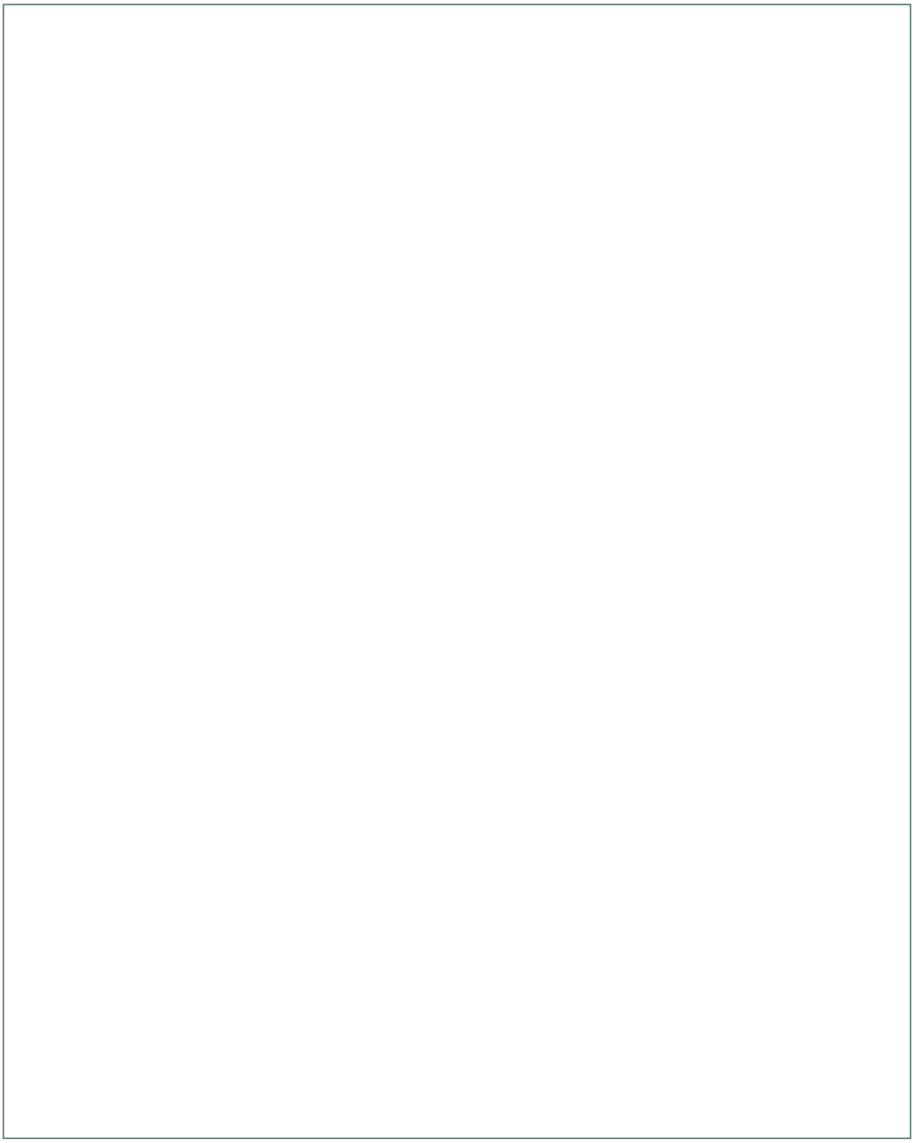
Draw a Plant Stem: Leaf-Node Joints and Taper Construction

Task 3 / practice

Stem construction / all labelled mm dimensions print 1:1 / selected classroom study

Calculate three axis positions and three interpolated widths on the original task. Mark light perpendicular locating ticks before adding the final shorter upward joint marks. Record: position / width / angle.

Blank work field / nominal 120 x 150 mm / printed 1:1



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Task 4 / practice

Stem construction / all labelled mm dimensions print 1:1 / selected classroom study

Calculate three axis positions and three interpolated widths on the original task. Mark light perpendicular locating ticks before adding the final shorter upward joint marks. Record: position / width / angle.

Blank work field / nominal 120 x 150 mm / printed 1:1

