



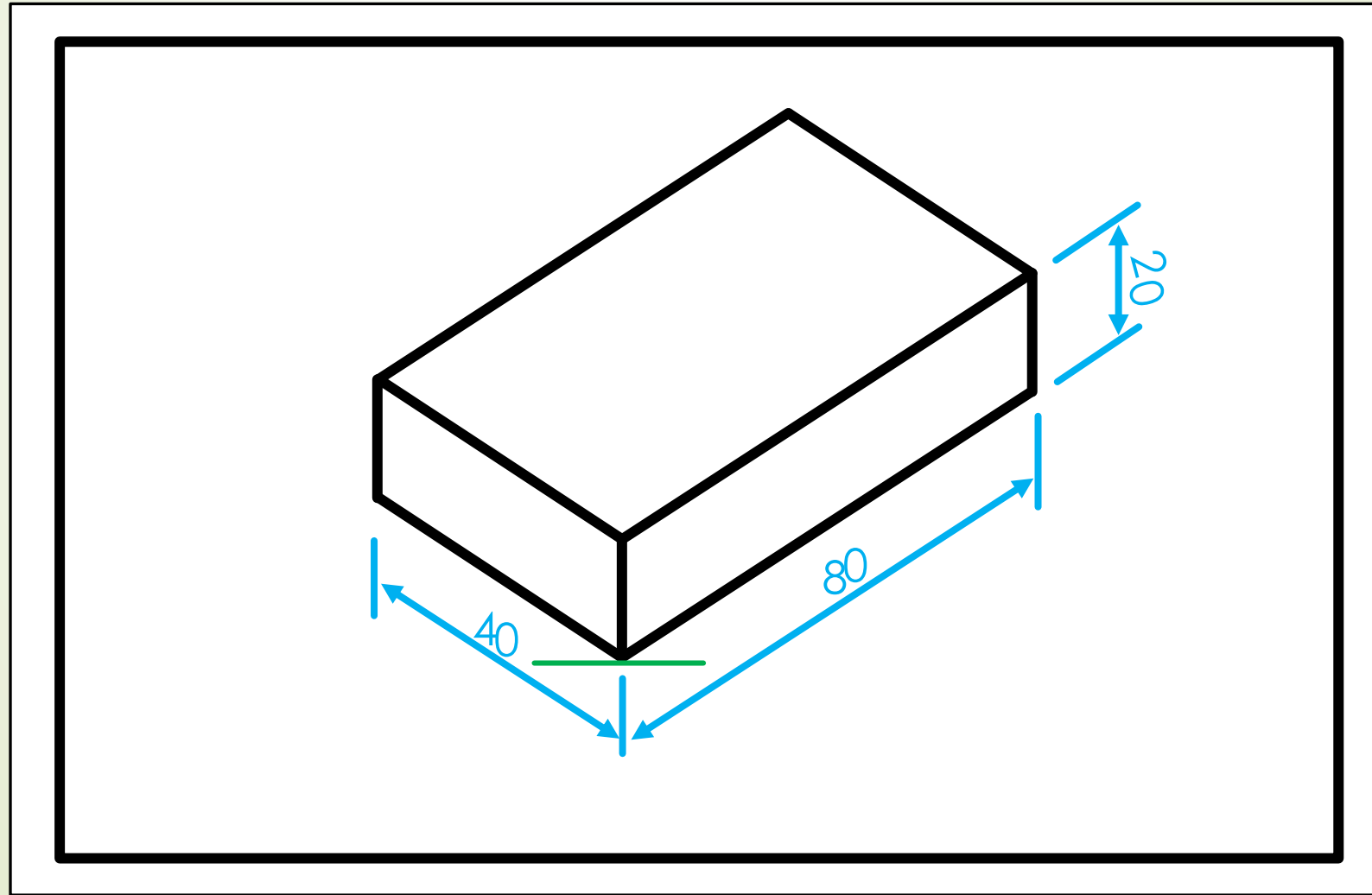
ISOMETRIC DRAWINGS

Drawing Principles

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ISOMETRIC DRAWINGS

- Isometric drawings form part of paper 2.

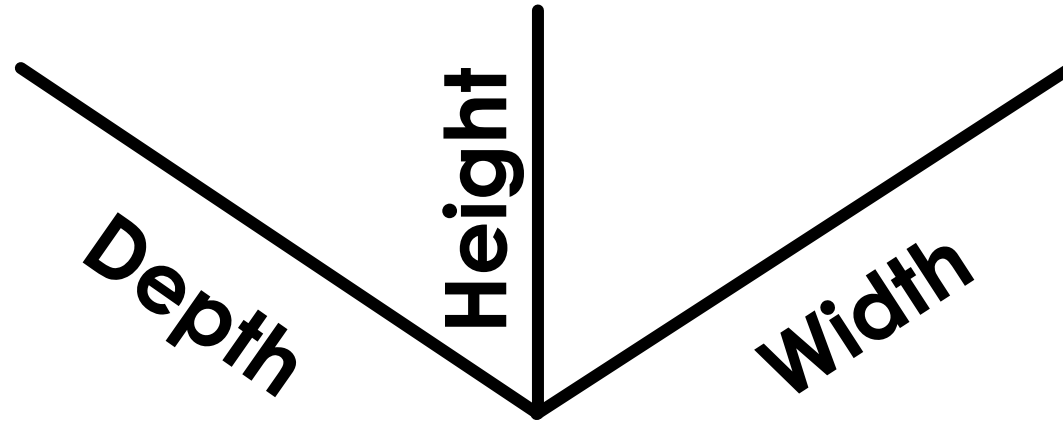


ISOMETRIC DRAWINGS

- Isometric drawings can be seen as a three dimensional drawings or pictorial drawings drawn on a flat, two dimensional surface.

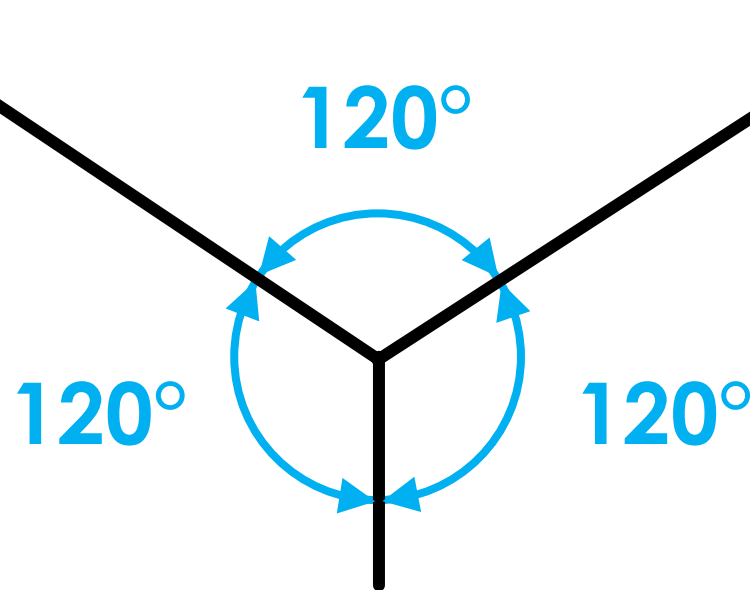
ISOMETRIC DRAWINGS

- Three surfaces of the drawing will be visible, showing the height, depth and width simultaneously.



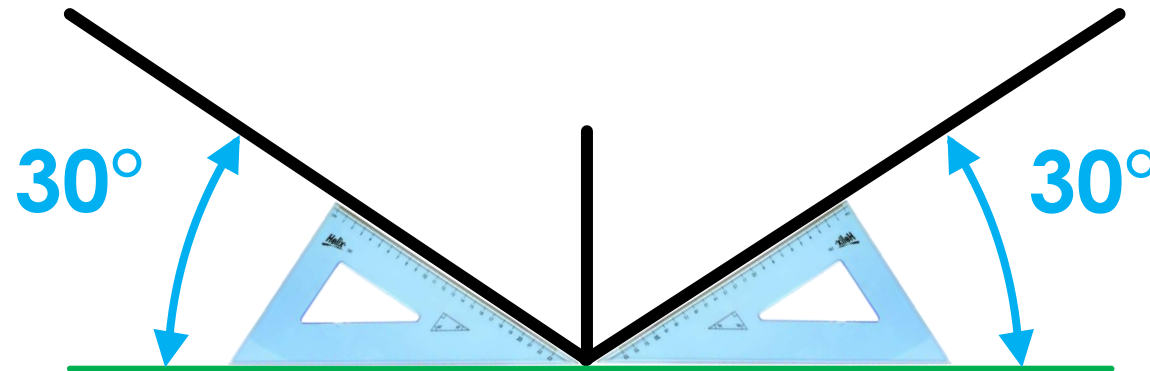
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- The axis of isometric drawings will always be 120° apart from each other.



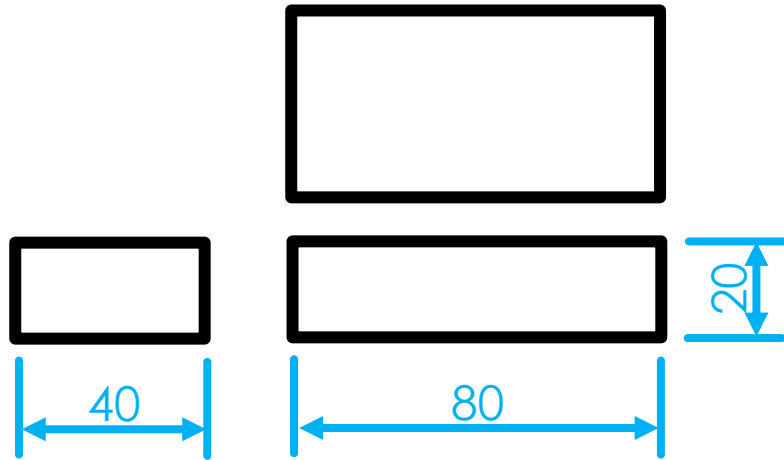
ISOMETRIC DRAWINGS

- ➔ An isometric drawing it will be drawn on 30° .



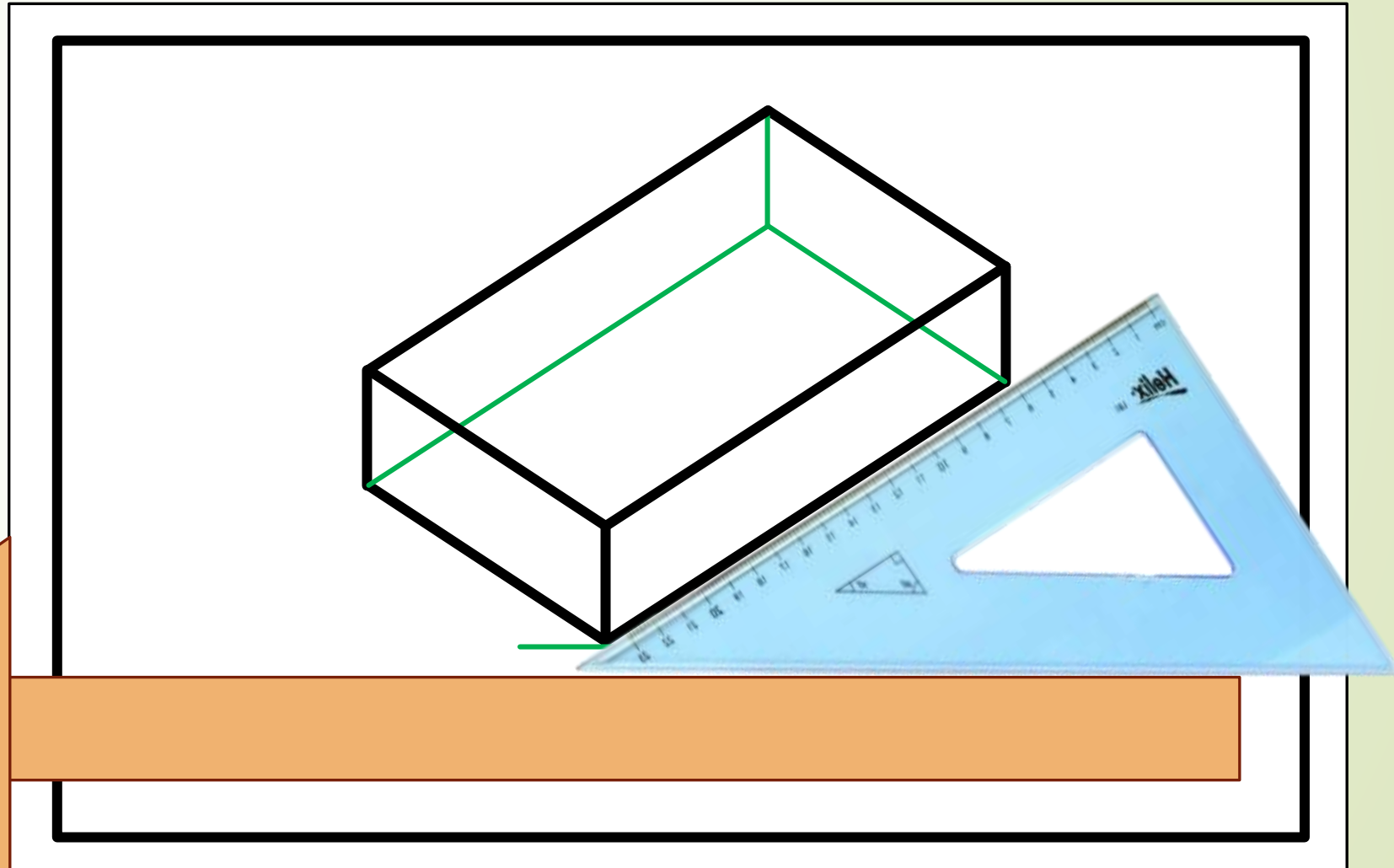
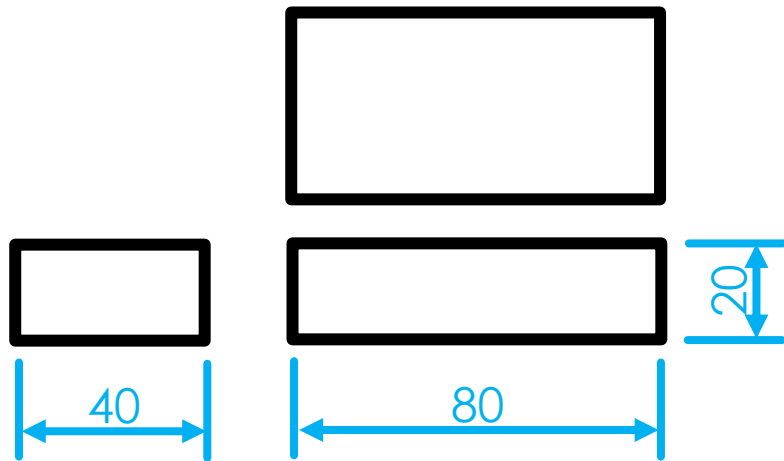
ISOMETRIC DRAWINGS

- The orthographic views will be given in T.A.O.P. and need to be converted into an isometric drawing.



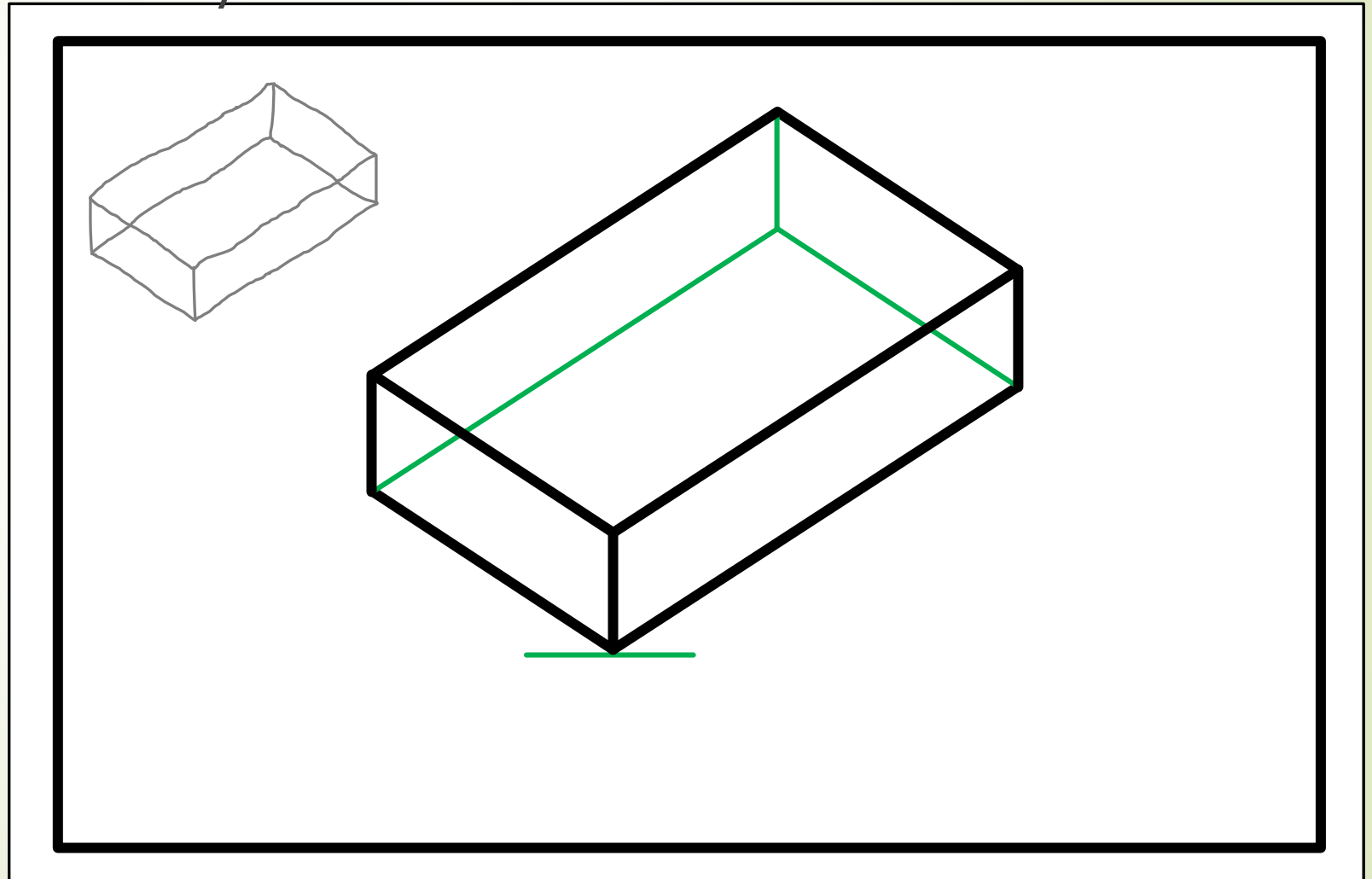
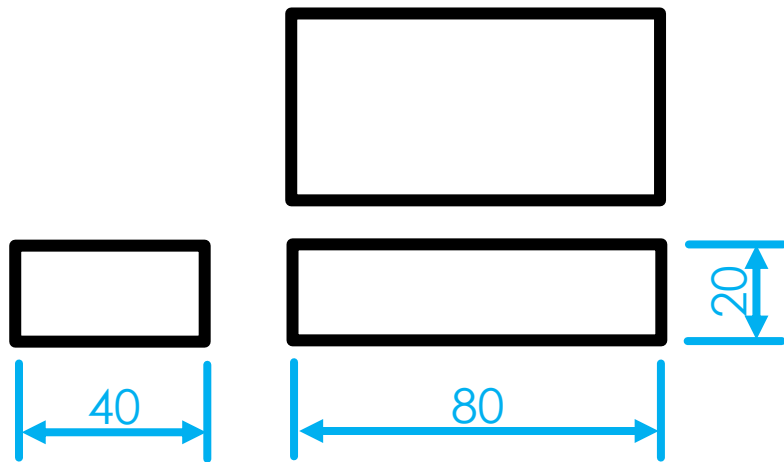
ISOMETRIC DRAWINGS - HINTS

- Always use your 30° set square and T-square to draw parallel isometric lines



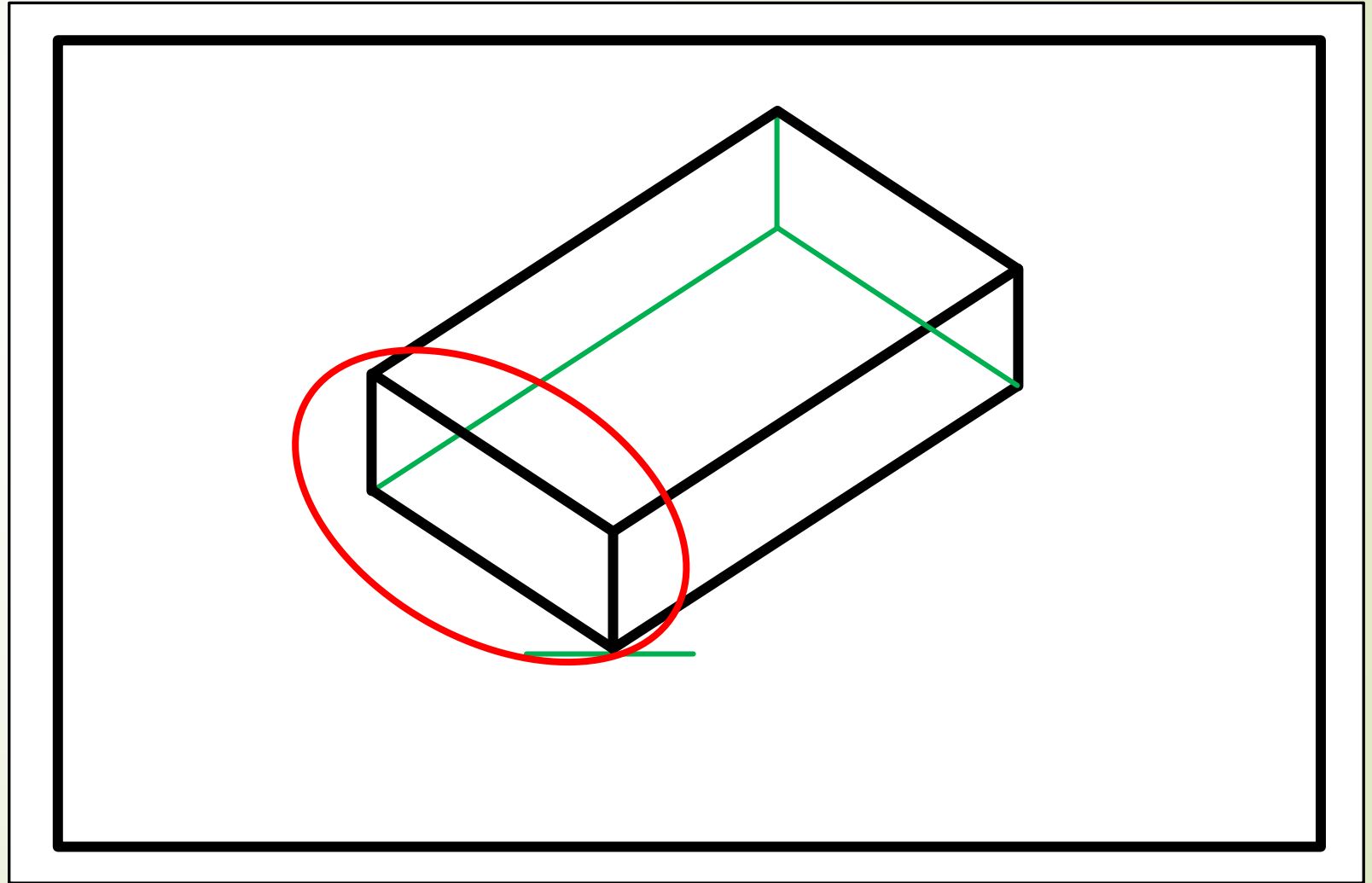
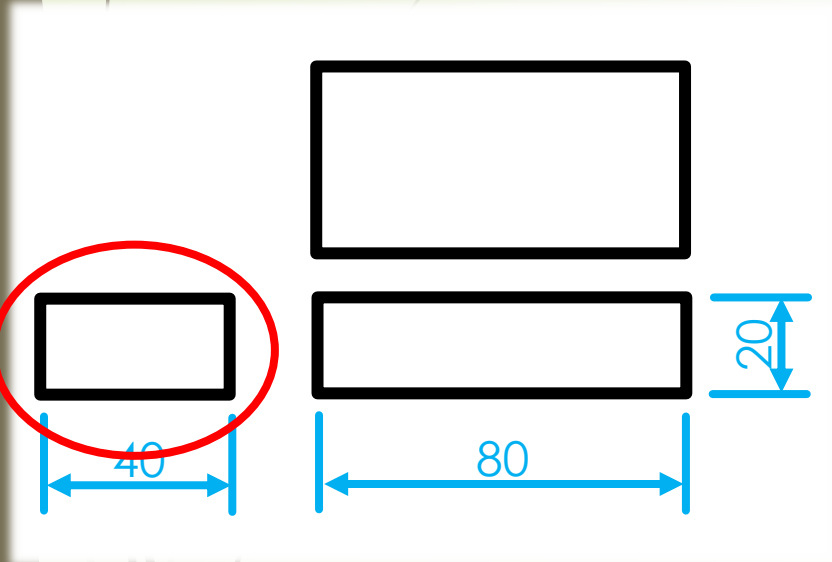
ISOMETRIC DRAWINGS - HINTS

- Draw a free hand image on how you see the drawing before you start.



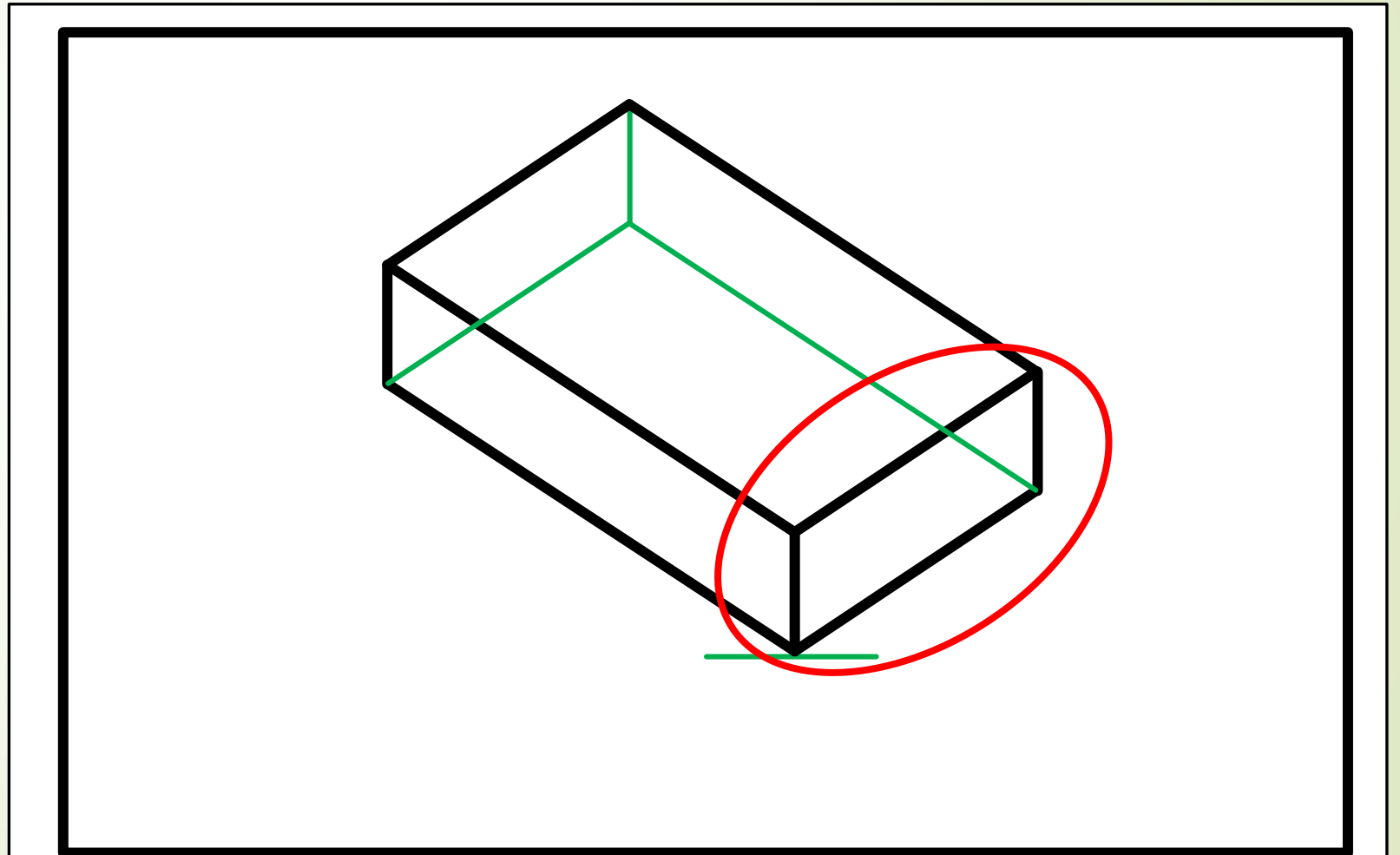
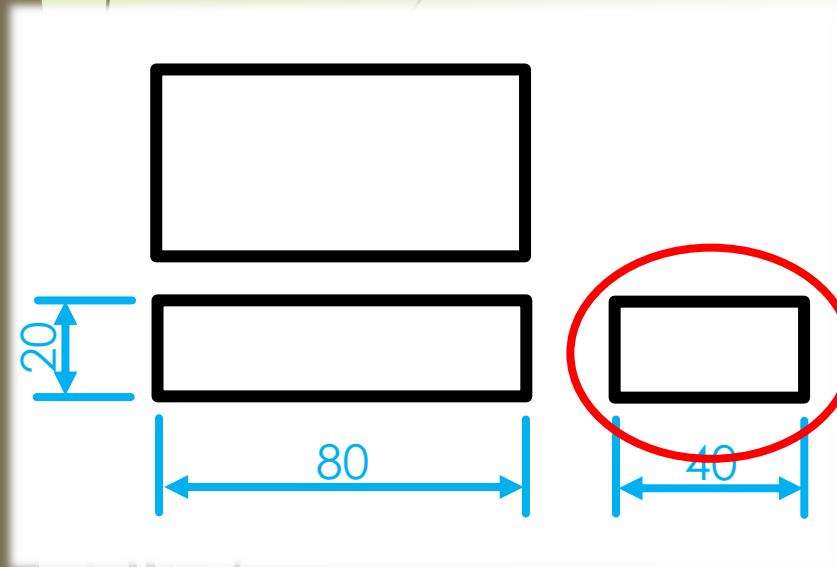
ISOMETRIC DRAWINGS - HINTS

- If the left view is provided, draw the left view to the left of the front view.



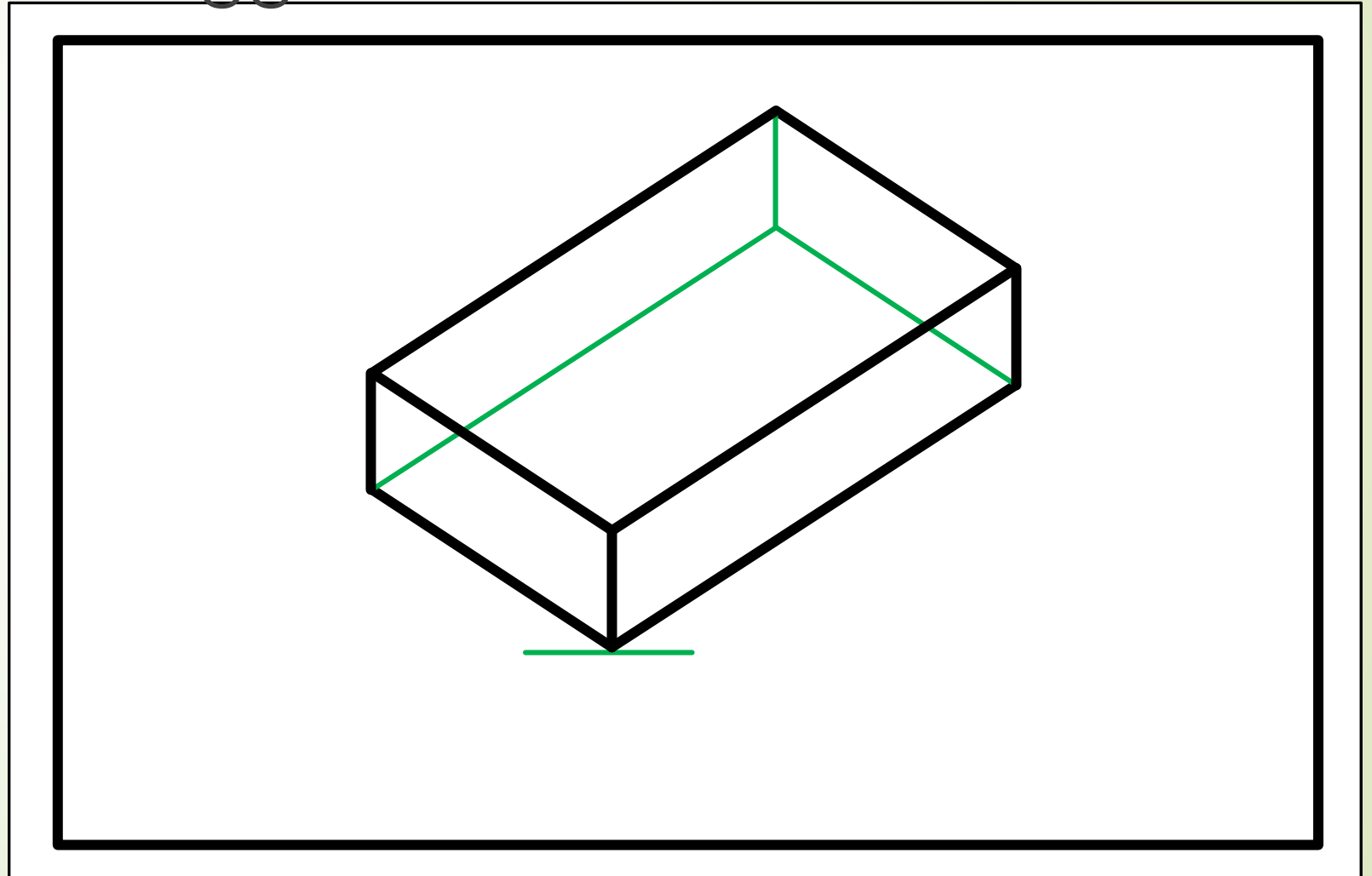
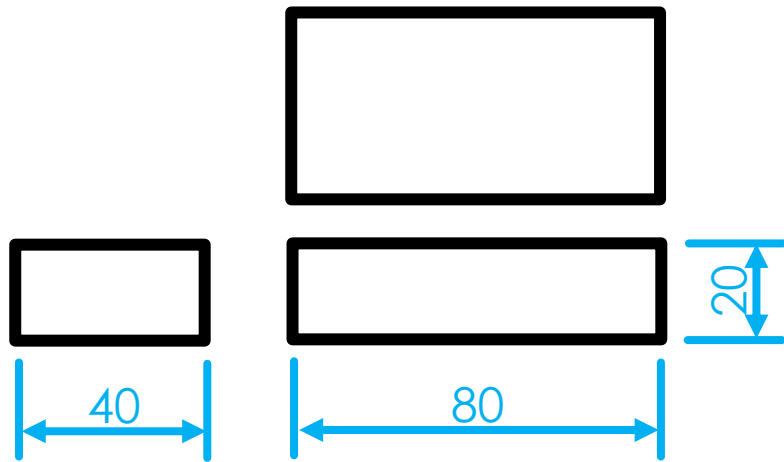
ISOMETRIC DRAWINGS - HINTS

- If the right view is provided, draw the right view to the right of the front view.



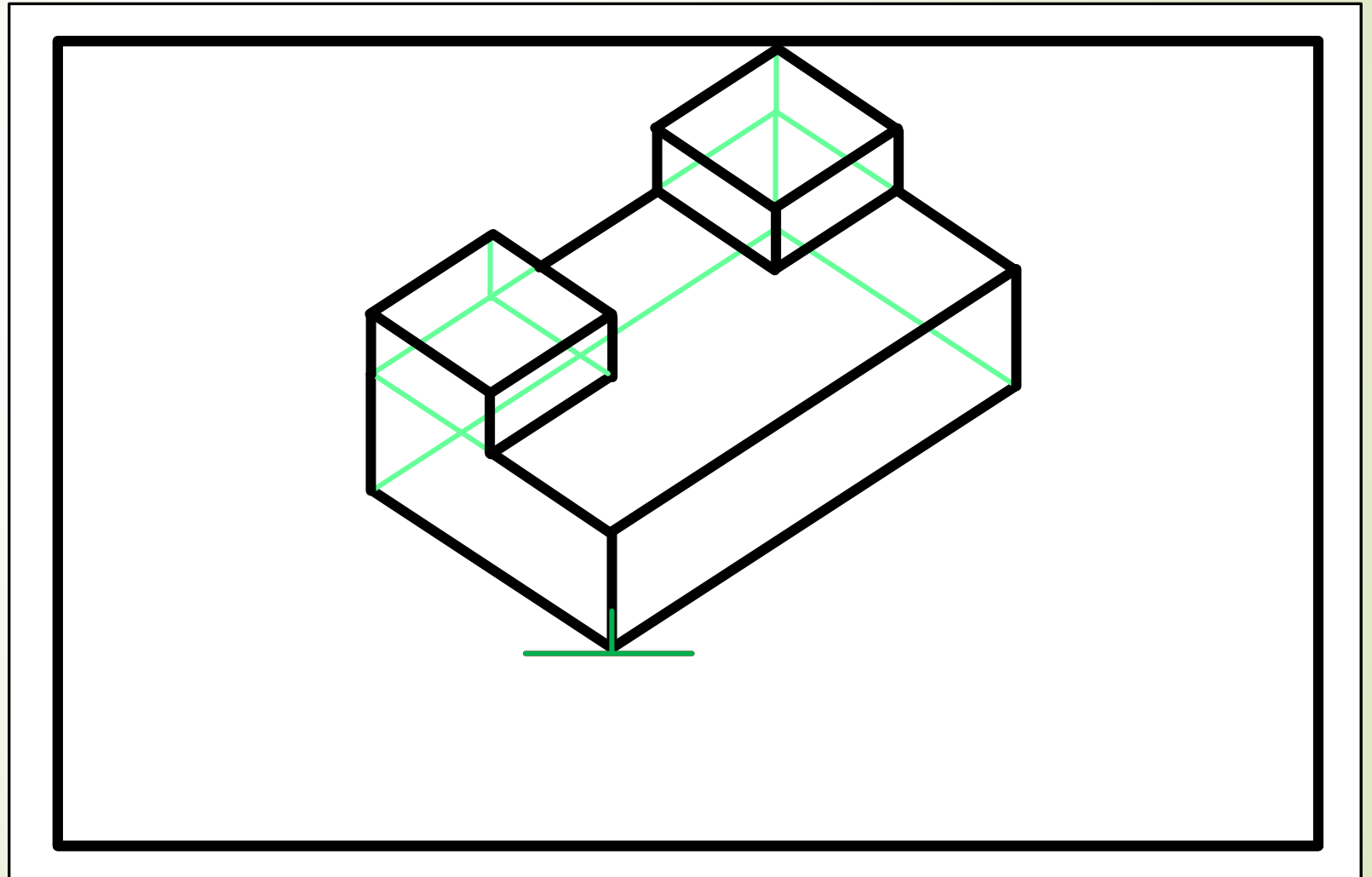
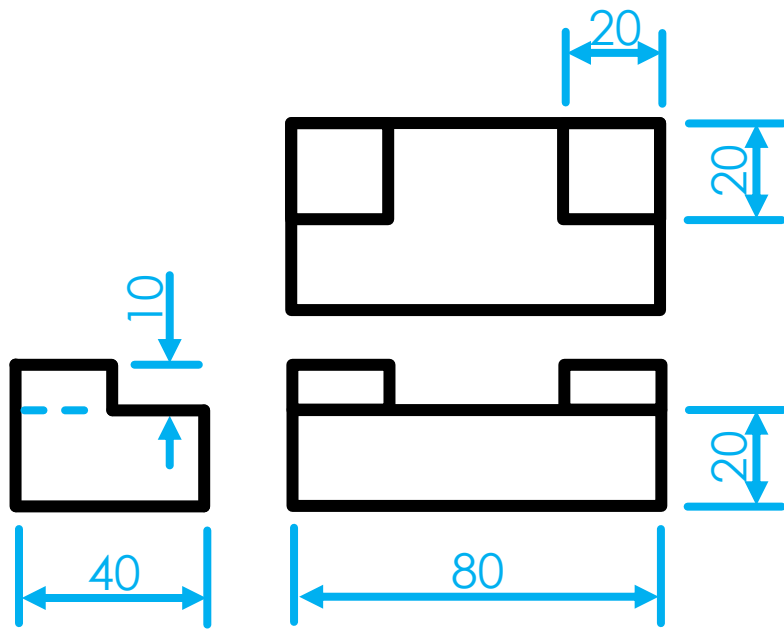
ISOMETRIC DRAWINGS - HINTS

- Always start the isometric drawing from the base as if using the biggest block and then draw it upwards.



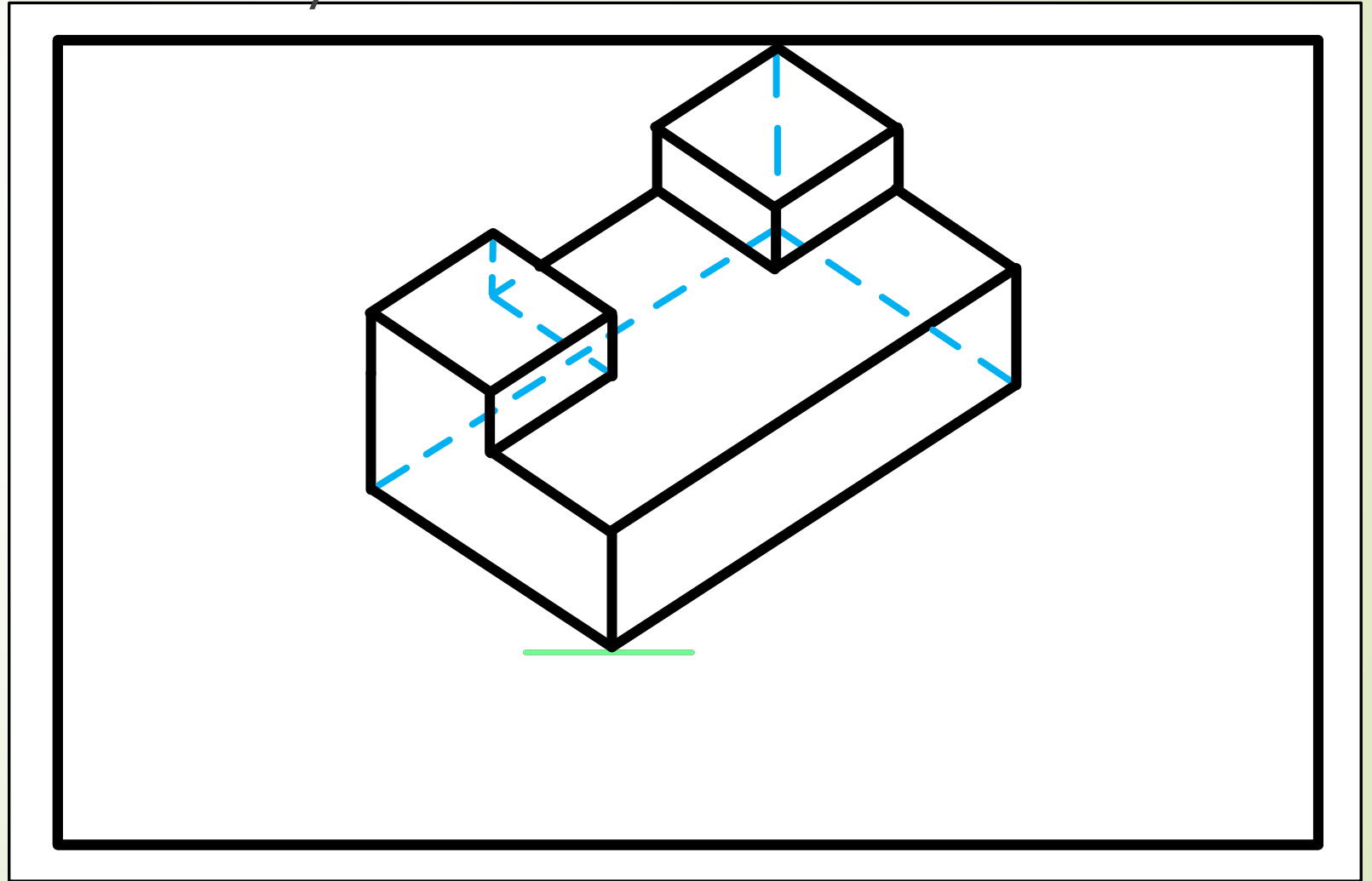
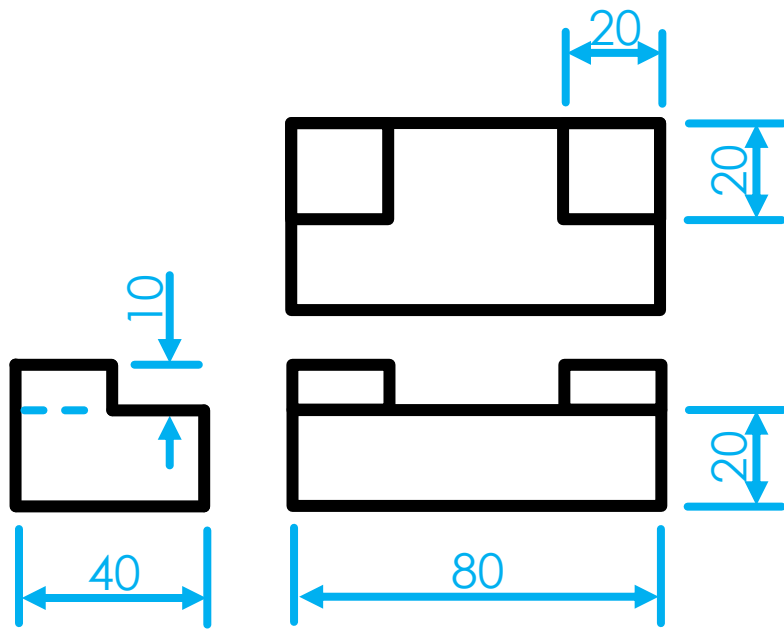
ISOMETRIC DRAWINGS

- Start from the **bottom** and build the object to the **top**.



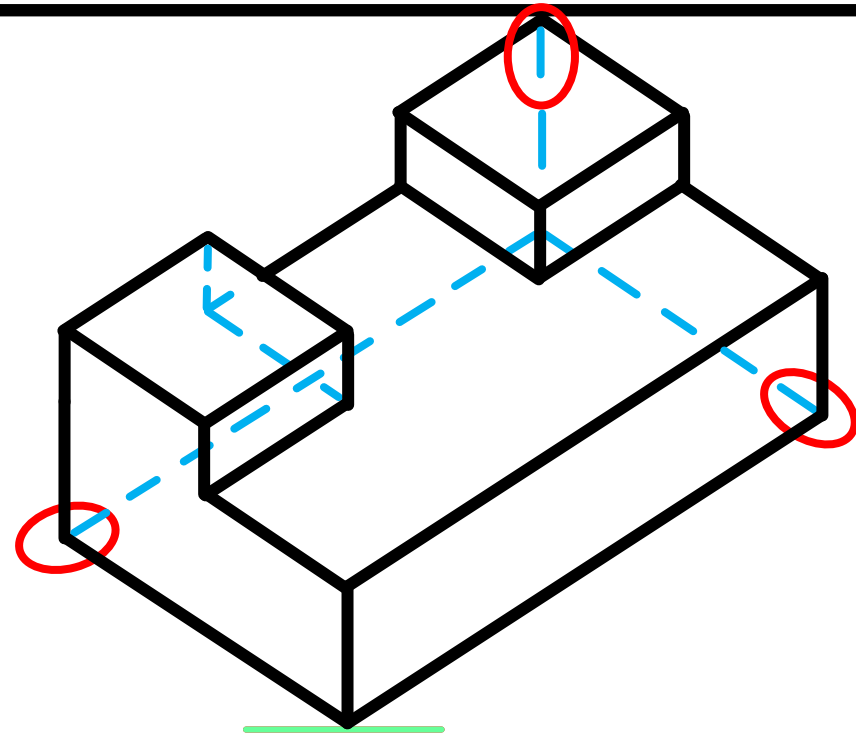
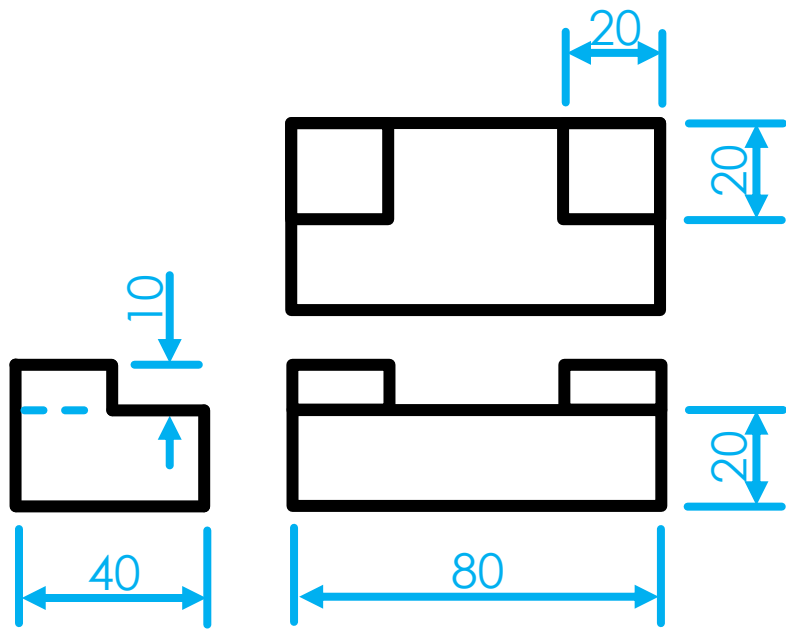
ISOMETRIC DRAWINGS

- Show only hidden detail if required or when necessary for clarity.



ISOMETRIC DRAWINGS

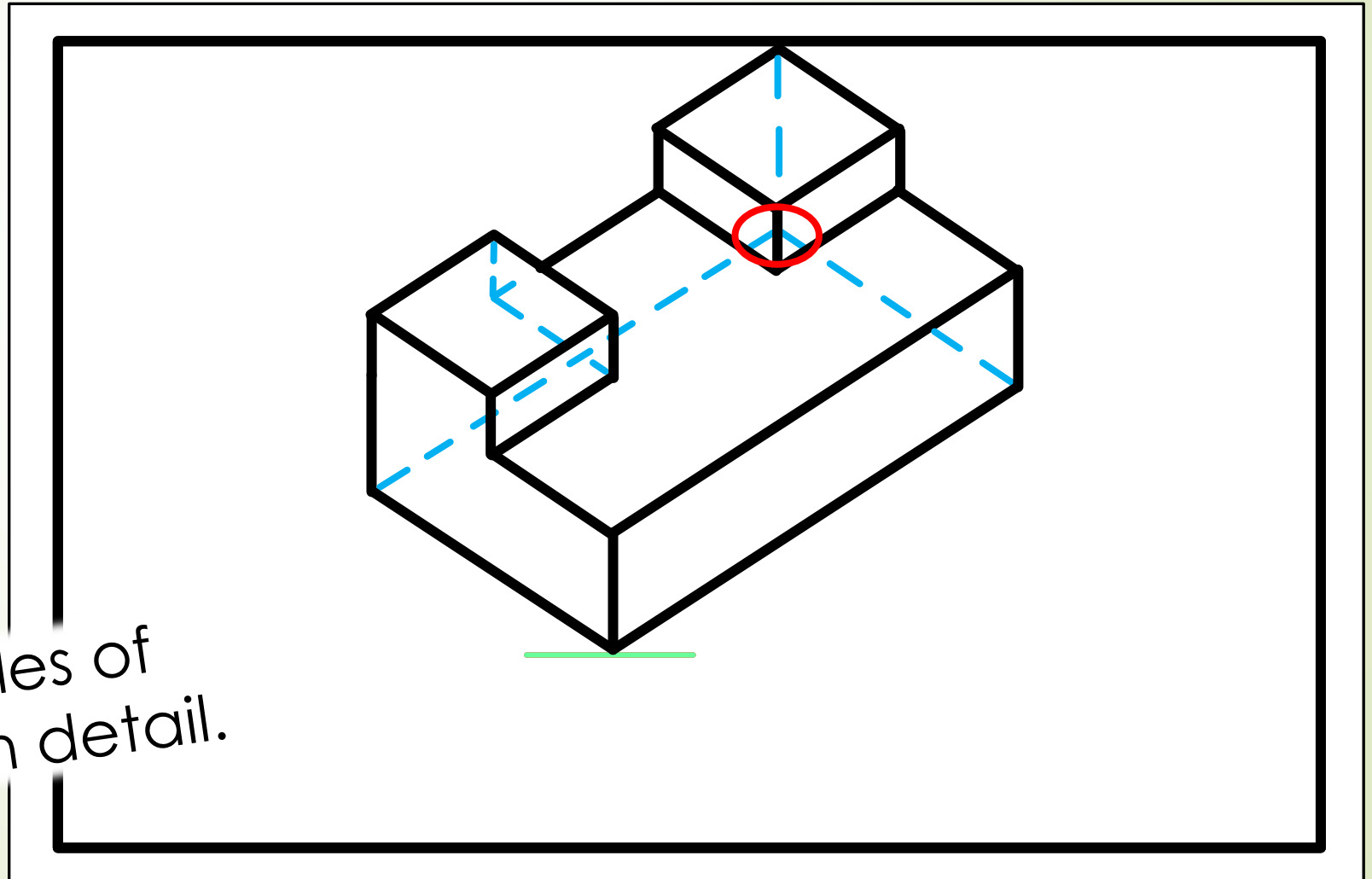
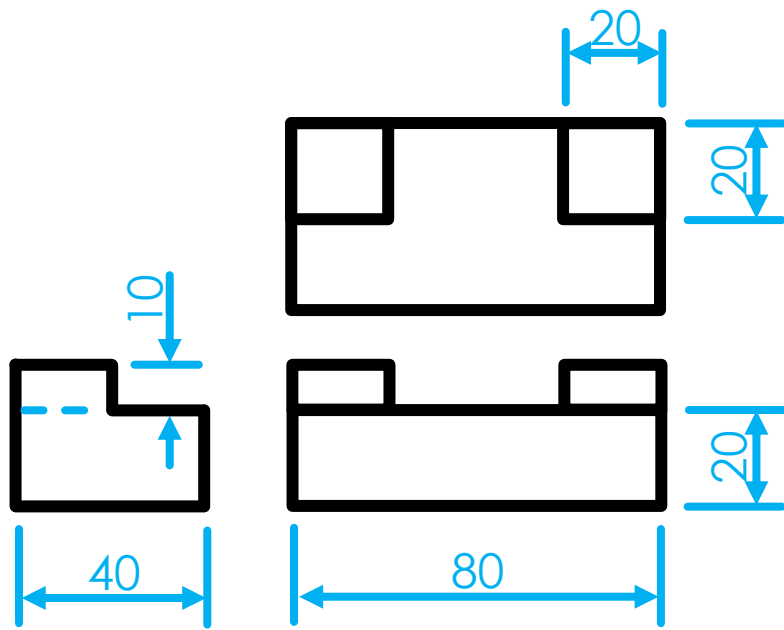
- Hidden detail lines should start in the corners



Principles of hidden detail.

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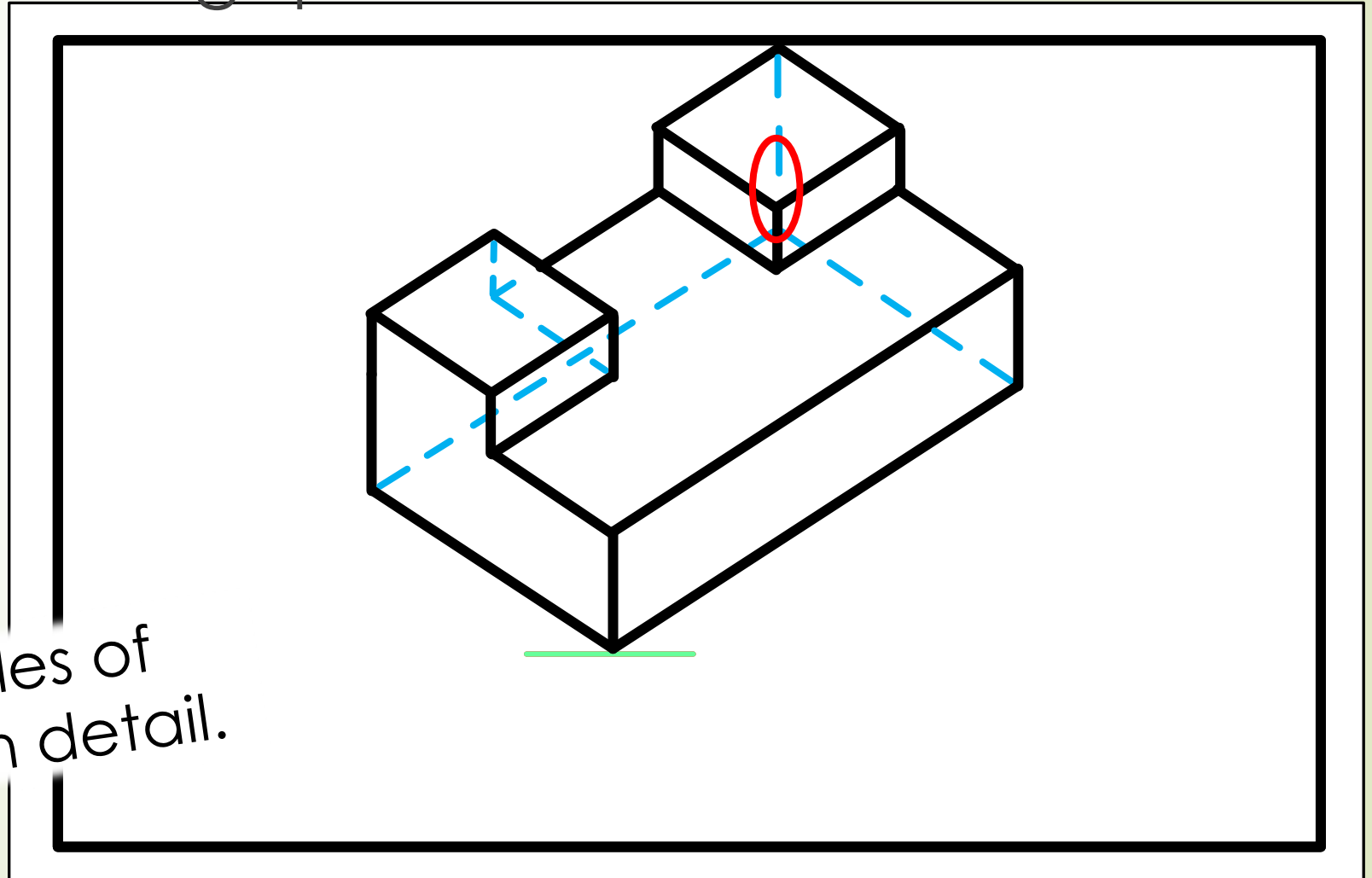
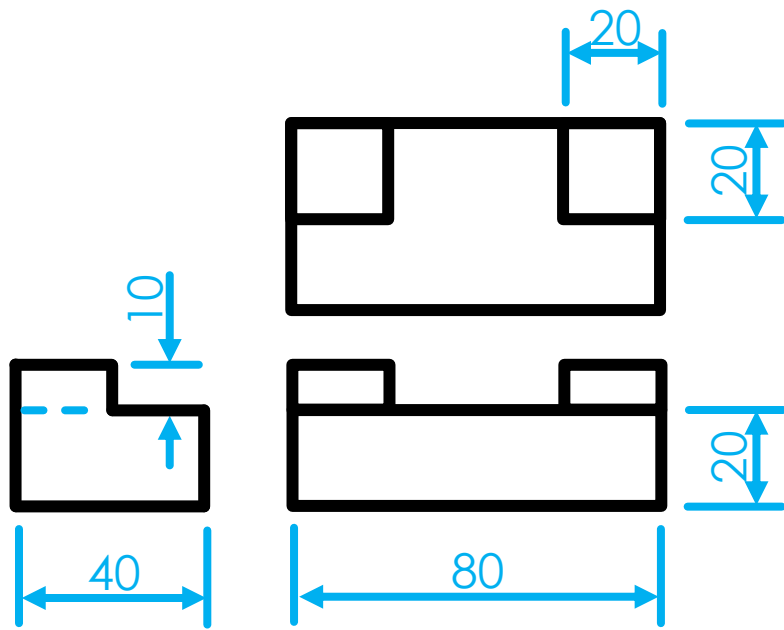
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Principles of hidden detail.

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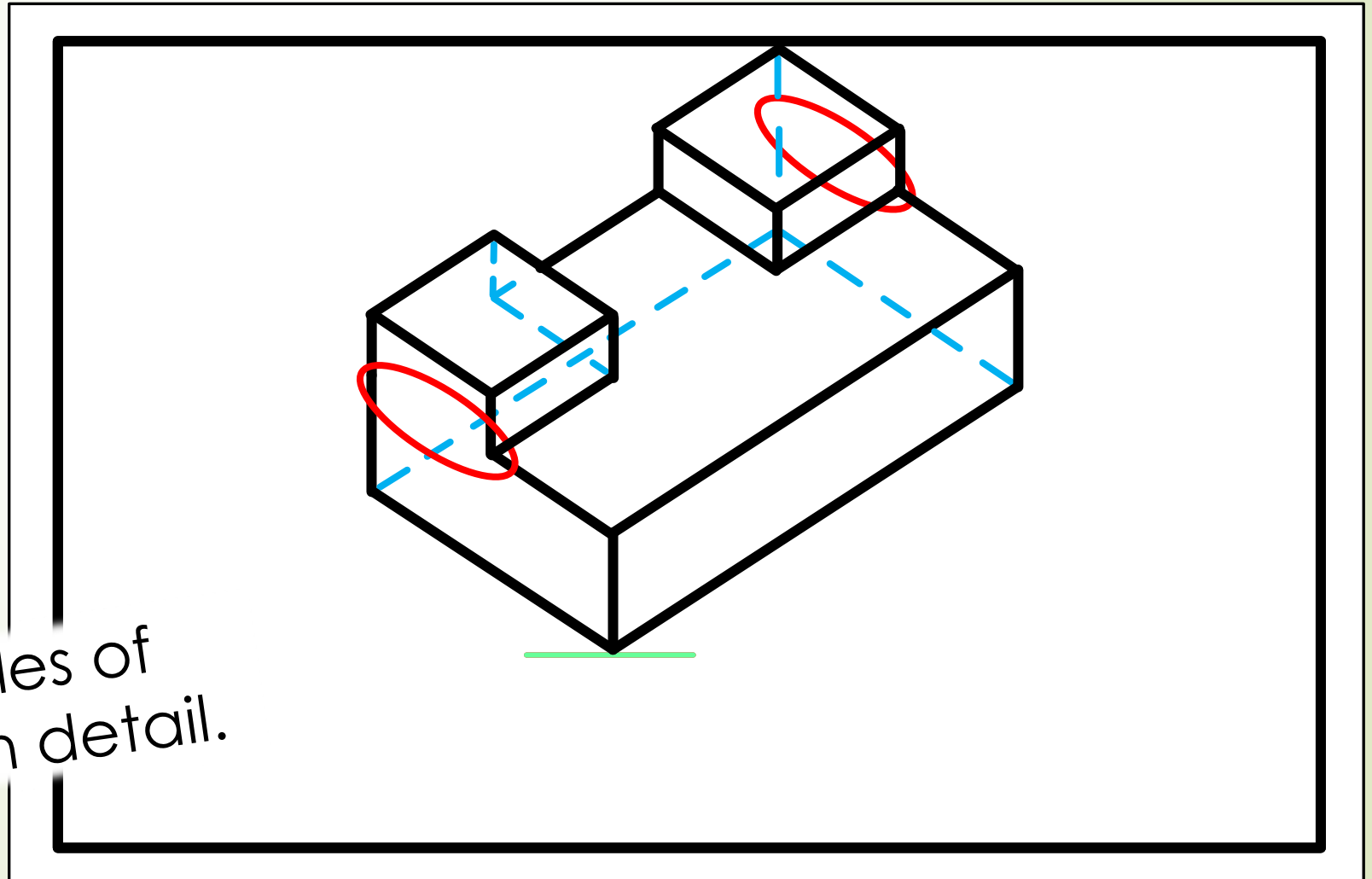
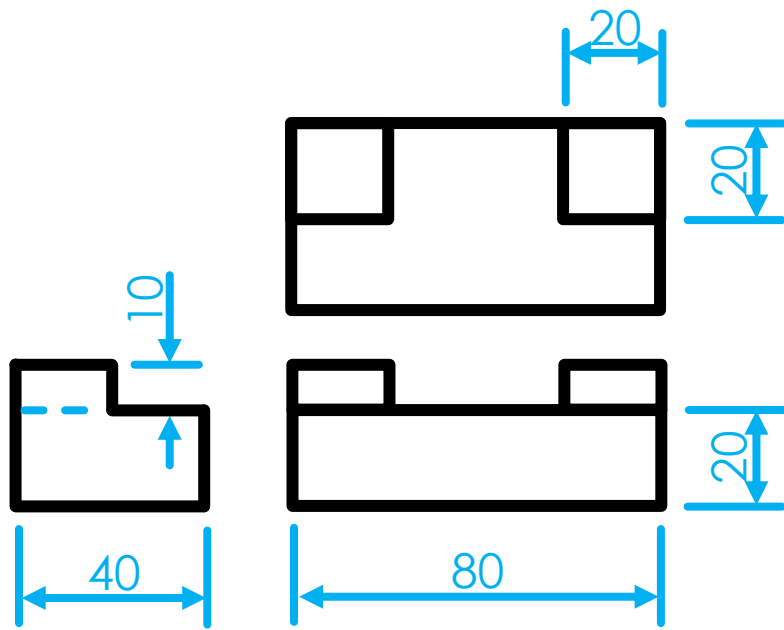
- Extending a solid line towards hidden detail, always leave a gap.



Principles of hidden detail.

ISOMETRIC DRAWINGS

- Castings don't show a seam between elevated parts.



Principles of hidden detail.