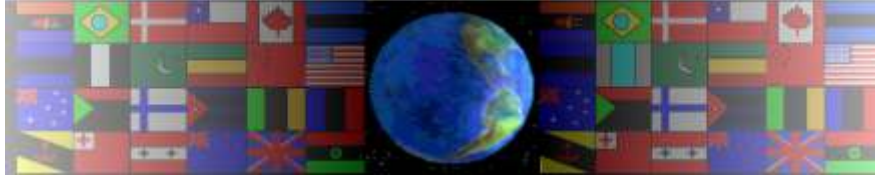


BRAZING WITH OXYACETYLENE

V.Ryan © 2000 - 2011

On behalf of The World Association of Technology Teachers

W.A.T.T.



World Association of Technology Teachers

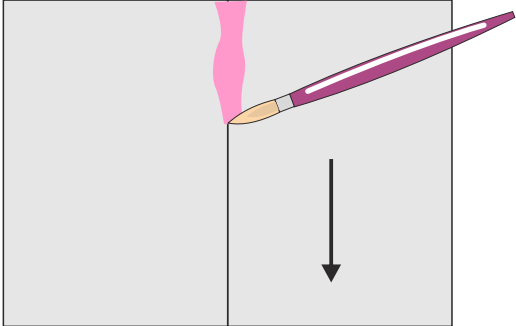
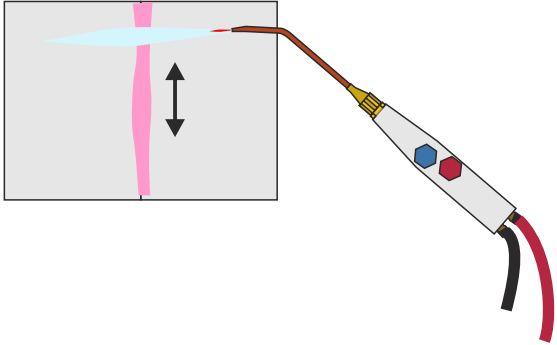
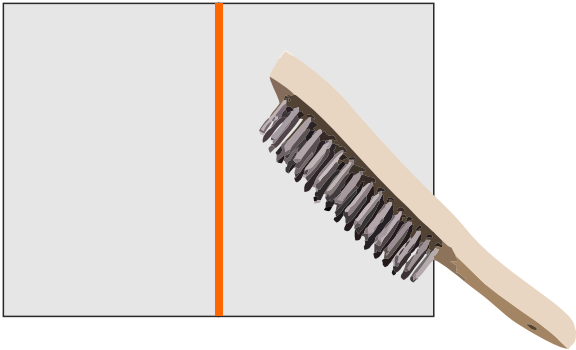
This exercise can be printed and used by teachers and students. It is recommended that you view the website (www.technologystudent.com) before attempting the design sheet .

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The table below should show the stages involved in welding steel plates, arranged at an angle of 90 degrees. Complete the table by adding the missing text / descriptions and sketches.

STAGE DESCRIPTION	SKETCH
<p>1. <i>The two pieces of steel are cleaned with emery cloth, removing grease and dirt. Flux is applied to the joint. This protects the area to be brazed, preventing oxidation (oxidation will prevent the 'solder' from flowing along the joint).</i></p>	 A sketch showing two vertical steel plates joined at a 90-degree angle. A brush with a wooden handle and metal bristles is shown applying a pink substance (flux) to the joint. A downward-pointing arrow indicates the direction of the brush stroke.
<p>2.</p>	 A sketch of an oxyacetylene torch with a blue flame directed at the joint of two steel plates. A vertical double-headed arrow indicates the vertical movement of the torch along the joint. The torch has a grey body with blue and red adjustment knobs and red and black gas hoses.
<p>3. <i>The flame is focussed at one end of the joint, raising the temperature of the steel to 'red heat'. Brazing rod is fed into the joint. The molten brazing rod follows the heat of the flame, as the torch proceeds along the joint, until the brazing is complete.</i></p>	
<p>4.</p>	 A sketch showing the joint of two steel plates with a vertical orange line representing the brazed seam. A brush with a wooden handle and metal bristles is shown cleaning the surface of the steel plates.