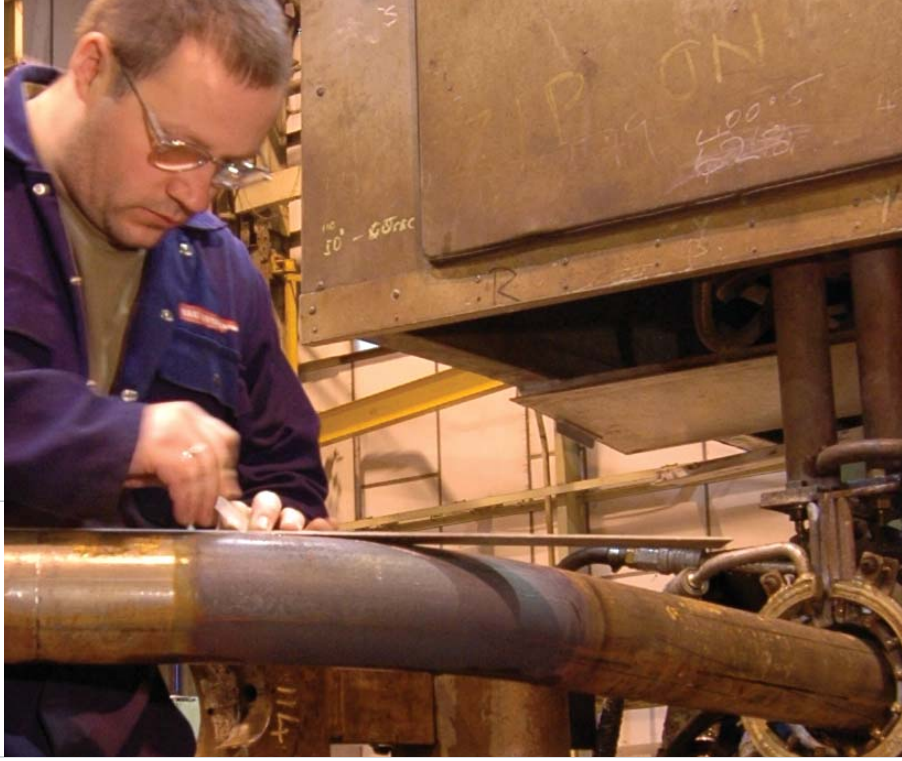

Pipework - Bending

CNC Pipe Bending

Most pipe bends are produced on Schwartze-Wirtz CNC machines. Bend data can be transmitted electronically from the Drawing Office directly to the machines to reduce set-up times and minimise the possibility of transcription error.

The location of pipe fittings, cuts/butts etc are marked during the bend process, thus reducing draw-down times at the fabrication phase.

Schwarz-Wirtz Machine Data

Capacity:	12mm to 57mm OD (CNC 60) 2 off 30mm to 114mm OD (CNC 100) from mid 2005 50mm to 162mm OD (CNC165)
Minimum Bend Radius:2 x OD; 180 degree bend angle facility	
Materials:	Copper to BS EN 12449/51 Copper Nickel - all types including DGS Stainless Steel - all types Steel - all types
Quality Control	All standard requirements for ovality, wall thinning and bend angle.

Induction Bending

BAE SYSTEMS Submarines' Pipe Fabrication Facility produces high-quality bends in carbon steels and alloy steels of up to 24 inch OD. Manufacturing information can be taken from orthographic or isometric drawings and/or templates.

Multiple bends with minimal straight between bends can be accommodated.

Laboratory and Development facilities are available to support the production of unusual or intricate piping configurations or the use of specialist materials.

Production Data

Power Unit:	200kW, 50 Hz
Range:	4 inch to 24 inch OD at 2 x OD minimum bend radius 2 inch NB at 3 x OD minimum bend radius 3 inch NB at 4 x OD minimum bend radius
Materials:	Chrome Molybdenum to BS EN 10216-2, 10217-2 API 5L Carbon Steel Range ASTM A106 Carbon Steel ASTM A355 Chrome Molybdenum A151 4130
Quality Control:	All requirements for ovality, wall thickness and bend angle.