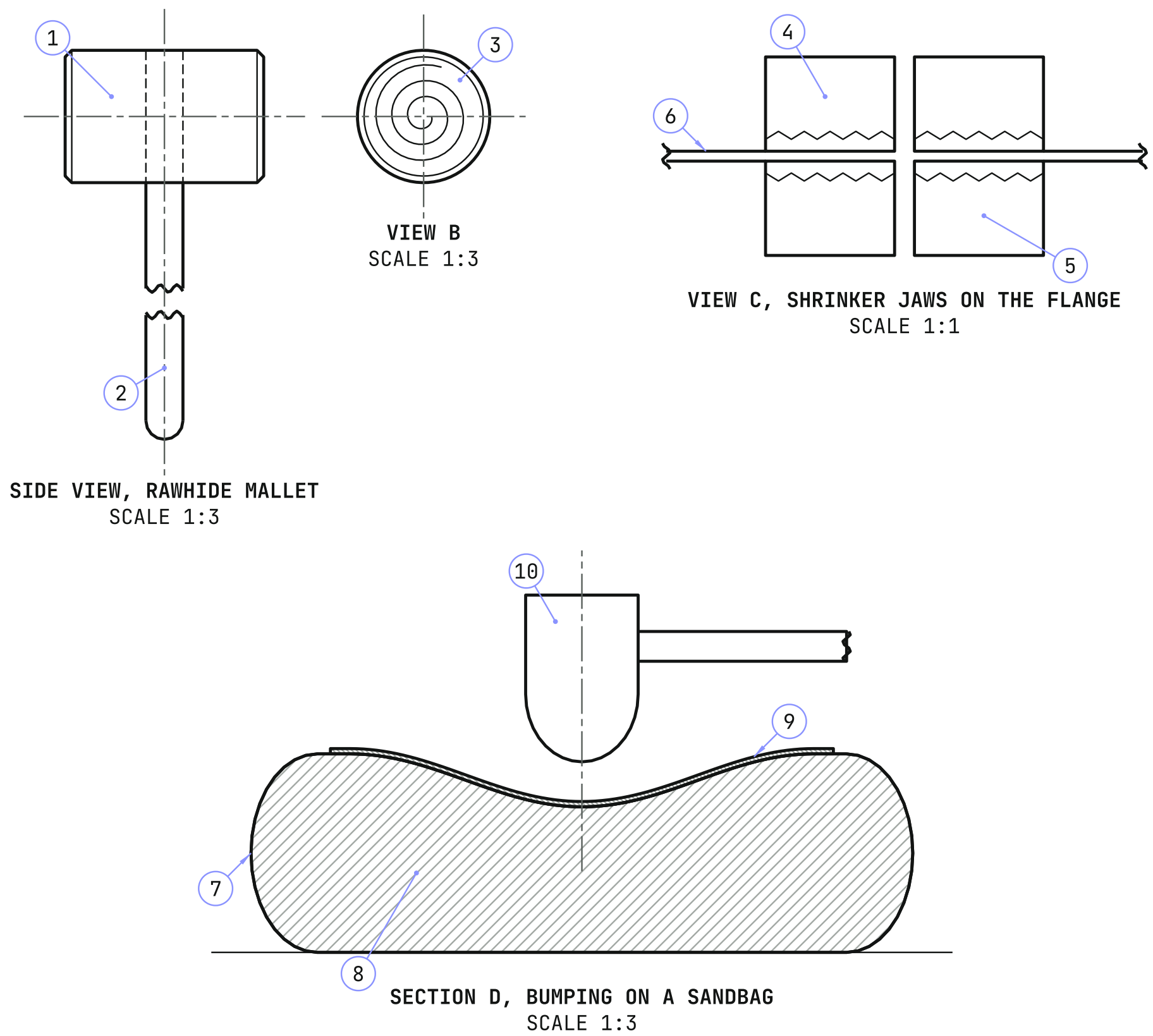
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Hand Forming Tools

Hand forming tools curve, bump, shrink and stretch sheet where a brake or a slip roll cannot reach.



SHRINKER CAPACITY	
SHEET	**GAUGE (IN)**
MILD STEEL	18 GA (0.048)
ALUMINUM	16 GA

MALLET FACES	
FACE	**USE**
RAWHIDE	FORMING
PLASTIC	FORMING
RUBBER	LIGHT WORK

NOTES

1. SOFT-FACED MALLETS FORM WITHOUT MARRING THE SHEET.
2. SHRINK THE FLANGE: IT CURVES TO THE INSIDE.
3. STRETCH THE FLANGE: IT CURVES TO THE OUTSIDE.
4. BUMP ON THE SANDBAG WITH LIGHT GLANCING BLOWS.
5. SEVERE FORMING: ANNEALED SHEET.

10	BUMPING MALLET
9	SHEET
8	SAND
7	SANDBAG
6	FLANGE
5	LOWER JAWS
4	UPPER JAWS
3	FACE, ROLLED RAWHIDE
2	HANDLE
1	MALLET HEAD, RAWHIDE
ITEM	**DESCRIPTION**
TOOLS, HAND FORMING	
SHEET 1 OF 1	
DWG TAP-TG-099	REV A
SCALE 1:3	

Types

Tool	What it is	Use
Rawhide mallet	Head of rolled hide on a wooden handle	General forming of aluminum without marks
Plastic-faced mallet	Replaceable plastic faces on a metal or wooden head	Forming and flattening; faces changed when worn
Rubber mallet	Solid rubber head	Light work and setting parts in place
Bumping mallet	Round or teardrop face	Dishes and compound curves on a sandbag
Sandbag	Canvas or leather bag filled with sand	Support for bumping
Stakes and dollies	Steel shapes held in a vise or in the hand	Backing the sheet while it is shaped
Form block and V-block	Hardwood or metal block cut to the contour	Ribs, flanges and curved angles
Shrinker and stretcher	Pairs of gripping jaws worked by a lever	Curving flanges and angles

What to check when buying

Check	What to look for
Mallet faces	Rawhide, plastic or rubber, with no metal edge that can touch the sheet
Face condition	Smooth and clean; trim or replace a face that is chipped or has grit in it
Sandbag	Strong canvas or leather with tight seams, filled firm with clean sand
Stakes and dollies	Polished faces free of nicks; any mark on a face prints on the sheet
Shrinker and stretcher capacity	Commonly 18 gauge, 0.048 in (1.22 mm) mild steel and 16 gauge aluminum; check the plate
Shrinker and stretcher jaws	Replaceable jaw sets that close square and grip without slipping
Mounting	Bench or vise mounting that stays still under the lever

Educational reference only, not approved data. Always consult the applicable SRM, AMM, or AC 43.13-1B and your certifying authority.

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Accessories

Item	What it is for
Templates and radius gauges	Checking the contour while forming
Spare jaw sets	Replacing worn shrinker and stretcher jaws
Spare mallet faces	Replacing worn plastic faces
Files and abrasive pads	Smoothing jaw marks and edges
Bench vise with soft jaws	Holding stakes, form blocks and parts

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