

## Oil filtering machines



### CF 1

A filtering trolley used for filling machines and hydraulic systems with oil, as well as for sucking and filtering of oil from tanks of presses, machines and hydraulic systems.

- electric drive 400 V, 0.55 kW,
- pump 39 l/min,
- filter 30 µm (25 and 10 µm also available),
- suction filter 90 µm,
- weight 58 kg.

## Deburring machines (pipe finishing)



### S 01, S 02

Machines designed to finish pipe ends after cutting (external and internal burr removal).

parameters	S 01	S 02
maximum pipe diameter [mm]	42	75
voltage [V]	230	400
power [kW]	0.18	0.37
weight [kg]	28	65

## Bending machines for hydraulic pipes



### M 18

User friendly, manually operated tool developed to bend hydraulic pipes with outside diameter ranging from 6 to 18 mm. Designed for small workshops. Bending rollers included in a set. Mounted in a vice. Weight 6 kg.

picture	bending roller	min. bending radius R [mm]	pipe O.D. [mm]
	6-8	32.75	6x1
		33.75	8x1
	10-12	35	10x1
		36	12x1.5
	14	36	14x1.5
	15	43.5	15x1.5
	16	43.5	16x1.5
	18	51	18x2

# MACHINES AND ACCESSORIES - hose assembly production

## Bending machines for hydraulic pipes



Bending machines for hydraulic pipes with diameter range 6 ÷ 42 mm (pipe wall thickness up to 4 mm). Adjusted to bending tools (ordered separately).

### CM 42 (CMS 42)

Manual bending machine with two-stage hydraulic pump. The CMS 42 version is equipped with a steel base and a box for tools. Weight 40 kg (CMS 42 - 48 kg).

### C 42

A bending machine equipped with electric drive for hydraulic system (400 V, 1.1 kW). A limit switch facilitates series production. Weight 100 kg.

## Bending tools

A set of bending tools CUC42MSET for machines: C 42, CMS 42, CM 42, MINI CENTER, CENTER JUNIOR. The set consists of bending rollers for metric hydraulic pipes of outside diameter 6, 8, 10, 12, 14, 15, 16, 18, 20, 22, 25, 28, 30, 32, 35, 38 and 42 mm. Single parts of the set and tools for pipes in inch-sizes are also available (check the table below).

picture	roller code	pipe O.D [mm]	min. bending radius R [mm]	bending angle	A [mm]	B [mm]	
	set of bending tools for metric hydraulic pipes RCUC42MSET						
	OP-RCUC42M06	6	15	170°	60	70	
	OP-RCUC42M08	8	16.5	170°	60	70	
	OP-RCUC42M10	10	27.5	170°	70	115	
	OP-RCUC42M12	12	32.7	170°	80	120	
	OP-RCUC42M14	14	46	170°	110	180	
	OP-RCUC42M15	15	46	170°	110	180	
	OP-RCUC42M16	16	48	170°	110	180	
	OP-RCUC42M18	18	48	170°	110	190	
	OP-RCUC42M20	20	66	160°	140	230	
	OP-RCUC42M22	22	66	160°	140	240	
	OP-RCUC42M25	25	81.5	160°	170	270	
	OP-RCUC42M28	28	81	160°	180	300	
	OP-RCUC42M30	30	98.5	150°	220	300	
	OP-RCUC42M32	32	101	150°	220	300	
	OP-RCUC42M35	35	125.5	120°	250	440	
	OP-RCUC42M38	38	116	120°	250	440	
	OP-RCUC42M42	42	126	120°	250	440	
	set of bending tools for imperial hydraulic pipes						
	OP-RCUC42P01	1/8"	27.5	170°	70	115	
	OP-RCUC42P02	1/4"	46	170°	110	180	
	OP-RCUC42P06	3/8"	48	170°	110	180	
	OP-RCUC42P08	1/2"	66	160°	140	240	
	OP-RCUC42P12	3/4"	81	160°	180	300	
	OP-RCUC42P16	1"	125	120°	250	440	
	OP-RCUC42P20	1 1/4"	126	120°	250	440	

## Hydraulic pipe bending machines



### C 50 ES

Semi-automatic device designed to bend hydraulic pipes with electrically powered hydraulic pump. Design and principle of operation are based on bending a pipe around bending rollers. Electronic control panel allows high precision bending. Upon pressing "START" button on control panel, the machine starts bending a pipe by pre-determined angle with no interference from operator. Version with double foot-operated pedal with safety switch available as an option. Bending rollers around which pipes are bent to be ordered separately (18 sizes).

- bending:  $\varnothing 6 \div 50$  mm (wall thickness 3 mm),
- powered by: 400 V, 50 Hz, 1.1 kW,
- max. bending angle: 180°,
- 90° bending time: 6 s,
- bending angle tolerance:  $\pm 1^\circ$ ,
- control: electronic,
- weight: 173 kg,
- optionally powered by: 220 V.

## Bending rollers

Set of bending rollers - OP-RCUC50DSET designed for OP-RC50ES machine. Consists of 18 sets of bending rollers. Rollers are available separately as well.

picture	code	pipe O.D. [mm]	min. bending radius R [mm]	
	OP-RCUC50DSET	set of bending rollers (18 pcs)		
	bending rollers (sold separately)			
	OP-RCUC50D06	6	20	
	OP-RCUC50D08	8	22	
	OP-RCUC50D10	10	25	
	OP-RCUC50D12	12	25	
	OP-RCUC50D14	14	35	
	OP-RCUC50D15	15	35	
	OP-RCUC50D16	16	40	
	OP-RCUC50D18	18	40	
	OP-RCUC50D20	20	50	
	OP-RCUC50D22	22	50	
	OP-RCUC50D25	25	65	
	OP-RCUC50D28	28	75	
	OP-RCUC50D30	30	90	
	OP-RCUC50D32	32	90	
	OP-RCUC50D35	35	95	
	OP-RCUC50D38	38	95	
OP-RCUC50D42	42	115		
OP-RCUC50D50	50	135		

## Multifunctional machines for hydraulic pipe processing



OP-RMC

### MINI CENTER

A multifunctional machine designed to process hydraulic pipes 6 ÷ 42 mm (wall thickness to 4 mm).

Functions:

- bending,
- deburring,
- pre-assembly of cutting rings DIN 2353,
- pipe flaring JIC 37°.

Electric drive 230 V, 1.7 kW.

Weight 183 kg.

**Adjusted to tools for bending, DIN 2353 rings assembly and flaring (ordered separately).**



OP-RCJ

### CENTER JUNIOR

A multifunctional machine designed to process hydraulic pipes 6 ÷ 42 mm (wall thickness to 4 mm). Functions:

- cutting (to 100 mm),
- bending,
- deburring,
- pre-assembly of cutting rings DIN 2353,
- pipe flaring JIC 37°.

Equipped with a small compressor for pipe cleaning.

Electric drive 230 V, 4.6 kW.

Air-operated 220 l/min.

Weight 262 kg.

**Adjusted to tools for bending, DIN 2353 rings assembly and flaring (ordered separately).**

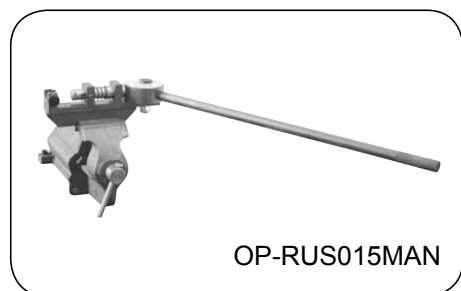
## Tools for DIN 2353 rings assembly and for pipe flaring (JIC 37°)



Tools for MINI CENTER, CENTER JUNIOR, US 01, US 02, US-FL/01, US-FL/01MAN machines.

code	description
OP-RUNIBSET	set of metric pre-assembling sockets 6 ÷ 42 mm DIN 2353 (20 pcs.)
OP-RUNIP1SET	set of metric pre-assembling plates 6 ÷ 42 mm DIN 2353 (16 pcs.)
OP-RUNIP2SET	set of metric pre-assembling plates DIN 2353 (20 pcs.) for US 02
OP-RPA02	box for DIN 2353 rings mounting tools
OP-RUNISFLSET	set of metric tools for flaring 6 ÷ 42 mm (17 pcs.)
OP-RUSFLBL	flaring block 37°
OP-RPA01	box for flaring tools

## Assembly machines for DIN 2353 rings



### US 015MAN

Hand operated tool for pre-assembling of DIN 2353 cutting rings on hydraulic pipes in outside diameter range  $6 \div 15$  mm. Assembled in a vice. Weight 12 kg.

**Adjusted to assembly cones and back-up plates for assembly of cutting rings (ordered separately).**

code	description
OP-RUNIB015SET	Set of metric assembly cones $6 \div 15$ mm (10 pcs.)
OP-RUNIP015SET	Set of metric back-up plates $6 \div 15$ mm (6 pcs.)

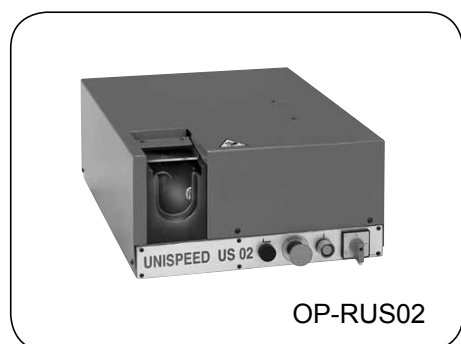


### US 01

Machines for pre-assembling of DIN 2353 cutting rings on hydraulic pipes. Pneumatic drive maximum 6 bar, manual system for setting assembly pressure.

Very easy to operate - starts with one press of the button and no further interference is needed for quick and precise performance. Weight 42 kg.

**Adjusted to assembly tools for cutting rings (ordered separately).**



### US 02

Machines for pre-assembling of DIN 2353 cutting rings on hydraulic pipes. The electric drive of hydraulic system (400 V, 0.75 kW), automatic system for setting assembly pressure.

Very easy to operate - starts with one press of the button and no further interference is needed for quick and precise performance. Weight 54 kg.

**Adjusted to assembly tools for cutting rings (ordered separately).**

## Machines for DIN 2353 rings assembly and pipe flaring (JIC 37°)



### US-FL/01, US-FL/01MAN

Machines for pre-assembling of DIN 2353 cutting rings on hydraulic pipes and for flaring of the pipe ends (JIC 37° connecting system).

The US-FL/01 version has the electric drive of hydraulic system (400 V, 0.75 W), manual system for setting operation pressure.

Very easy to operate - starts with one press of the button and no further interference is needed for quick and precise performance.

US-FL/01MAN version - manual drive of hydraulic pump.

Weight US-FL/01 - 58 kg.

Weight US-FL/01MAN - 38 kg

**Adjusted to flaring tools and assembly tools for cuttings rings (ordered separately).**

## Pipe flaring machine (ORFS 90° / JIC 37°)



### US-FL 9037 ECO

Machine designed for flaring of pipe ends - 90° (ORFS) and 37° (JIC). Process takes place automatically upon pressing "START" button on control panel. The machine employs cold orbital flaring which ensures smooth wall surface. Flaring by use of special tools adjusted to diameter of pipes to be processed.

Tools (flaring mandrel, dies) to be ordered separately.

- pipe flaring (ORFS 90°):  $\text{Ø } 6 \div 38 \times 5 \text{ mm}$ ,
- pipe flaring (JIC 37°):  $\text{Ø } 6 \div 42 \times 4 \text{ mm}$ ,
- powered by: 400 V, 50 Hz, 2.3 kW,
- weight: 425 kg,
- optionally powered by 220 V.

## Tools for pipe flaring (ORFS 90° / JIC 37°)

Tools designed for pipe flaring on OP-RUS-FL9037ECO machine.

