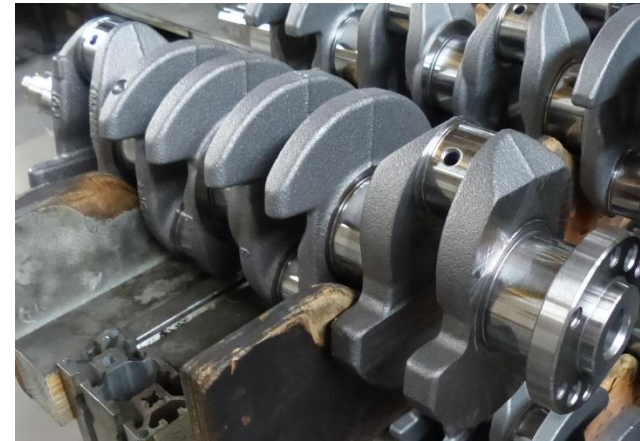


Subject to prior Sale we offer by Order of OPEL:

Machining Line for 4-Cylinder Crankshafts

including HELLER, BOEHRINGER, NILES, NAXOS-UNION and other Machinery



The Line includes the following Machinery and Equipment:

OP	Unit	Make	Machine	YoM	Operation
10	Transfer machine	Mauser	Transfer-Line	1991	Balancing, end milling, base milling, center bore drilling of the crankshaft
20	Milling machine	Heller	RFK 20-2-800	2001	Web Milling
20	Crane	Heller	Jib crane	2001	Crane to tool changing
33	CNC Turning machine	Heyligenstaedt	5U/850	1992	Turning pin and main bearing 1
33	CNC Turning machine	Niles	N20	1999	Turning pin and main bearing 1

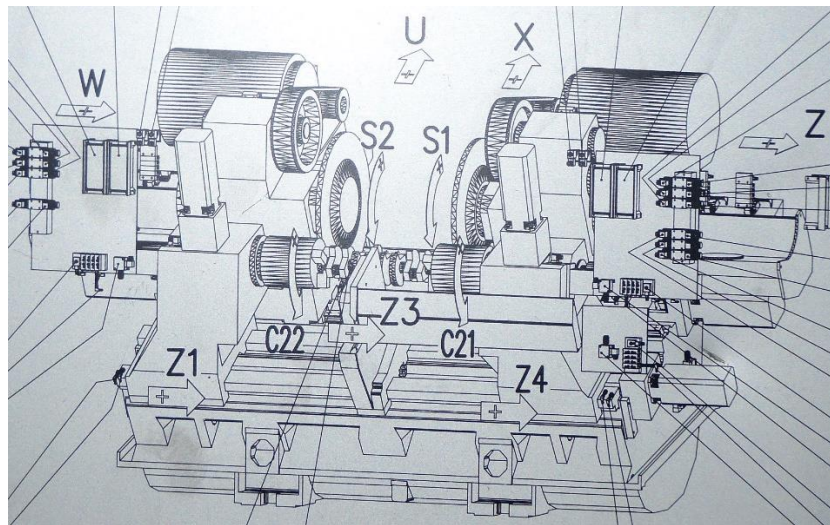
36	CNC Turning machine	Niles	N20	1995	Turning flanges
36	CNC Turning machine	Niles	N20NL1000	1995	Turning flanges
40	CNC Turning machine	Boehringer	VDF 315 DR-4	1996	Turning main bearing 2,3,4,5
40	CNC Turning machine	Boehringer	VDF 315 DR-4	1991	Turning main bearing 2,3,4,5
40	Optical measuring machine	Marposs	OPTOQSET	2011	Optical measuring of crankshafts
40	Crane	Schäfer	Jib crane	1996	Crane to tool changing
40	Crane	DEMAG	Jib crane	1992	Crane to tool changing
50	CNC milling machine	Heller	RFK 20-2-1250	1999	Milling pins
50	CNC milling machine	Heller	RFK 20-2-800	2000	Milling pins
50	Crane	DEMAG	Jib crane	1992	Crane to tool changing
70	Rolling Machine	Hegenscheidt	7893	2000	Rolling undercuts for main bearings and pins
70	Rolling Machine	Hegenscheidt	7893	2000	Rolling undercuts for main bearings and pins
80	Transfer machine	Excello	Oil-Bore Transfer	1991	Drilling the oil holes
110	Transfer machine	Excello	Transfer-Line	1991	Drilling pin and flange bore, turning the undercut and the shoulder, reaming flange bore, drill the bores for flywheel, milling hexagon and keyway
120	Grinding Machine	Schautdt	PS 51 600	2001	Grinding flange
120	Grinding Machine	Schautdt	PS 51 600	2001	Grinding flange
130	Grinding Machine	Naxos	KBO 400 C	1996	Grinding pin bearing 1,4

130	Grinding Machine	Danobat	R2 600 NC	1996	Angle Approach Grinding
130	Grinding Machine	Danobat	R2 600 NC	1996	Angle Approach Grinding
140	Grinding Machine	Naxos	RMB O 400 C	1996	Grinding main bearings
140	Grinding Machine	Naxos	RMB O 500	1992	Grinding main bearings
145	intermediate Storage	GSA	6617 VK 11-3	1999	Buffer Magazine
150	Grinding Machine	Naxos	KBO 500 CNC S	1992	Grinding the pin bearing 1,4
160	Grinding Machine	Naxos	KBO 400 C	1996	Grinding the pin bearing 2,3
160	Grinding Machine	Naxos	KBO 500 CNC S	1992	Grinding the pin bearing 2,3
160	Optical measuring machine	Marposs	OPTOQSET	2011	Optical measuring of crankshafts
170	Rolling Machine	Hegenscheidt	7794	1992	Rolling and turning the thrustface
180	Balancing machine	Schenck	M752 V200	2001	Balancing
180	Balancing machine	Schenck	M752 V201	2001	Balancing
180	Balancing machine	Schenck	300 EBTk	1992	Balancing of crankshafts
190	Finsihing machine	Supfina	Superfinishing	2008	Finishing the thrustface
190	Finsihing machine	Grieshaber	Superfinishing	1992	Finishing the main and pin bearings
190	Surface roughness tester	Hommel Etamic	T8000	95/09	Surface roughness testing on main, pin bearings and thrustface Measuring unit replacement
200	Washing machine	Wache	Washer	1991	Washing the crankshafts
210	Measuring machine	Marposs	M110	1991	100% EOL Measuring machine
36B	Laser marker	Fibro GSA	Laser Marking	2008	Laser marker

OP 10 MAUSER facing and centering of crankshaft blanks



OP 20 HELLER RFK-20-2-800 CNC Turn-Broaching Machine



OP 33 + OP 36 NILES N-20 (2 of) and HEYLIGENSTAEDT 5-U-850 and CNC Lathes



OP 40 VDF BOEHRINGER 315-DR-4 CNC CNC Turning-Broaching Machine



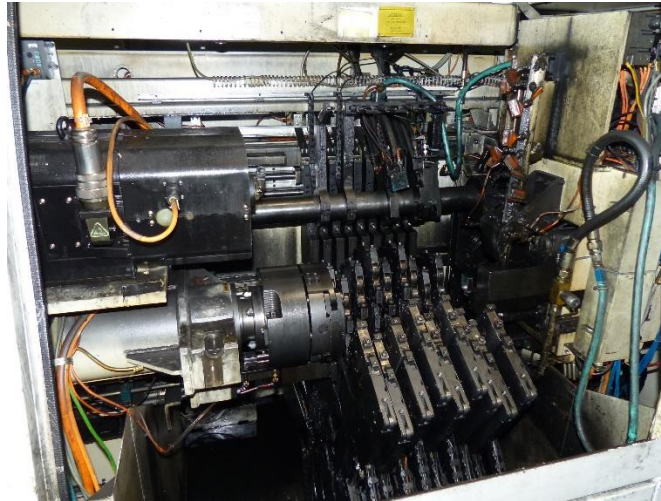
OP 40 + OP 160 MARPOSS Optical Shaft Measuring System



OP 50 HELLER RFK 20-2-1250 and RFK-20-2-800 CNC Turn-Broaching Machine



OP 70 HEGENSCHIEDT 7893 Crankshaft Rolling Machine (2 of)



OP 80 + 110 EX-CELL-O Transfer Line for Oil-hole-drilling and turning + milling operations



OP 120 SCHAUDT PS 51 S 600 CNC Angle-Approach Grinder



OP 130 NAXOS KBO 400 Pin Grinders and DANOBAT R2-600 Angle-Approach Grinders (2 of)



OP 140 NAXOS-UNION RMBO 400C and 500C Main-Bearing Grinders



OP 150 + 160 NAXOS-UNION KBO 400 and 500C Pin-Grinders (2 of)

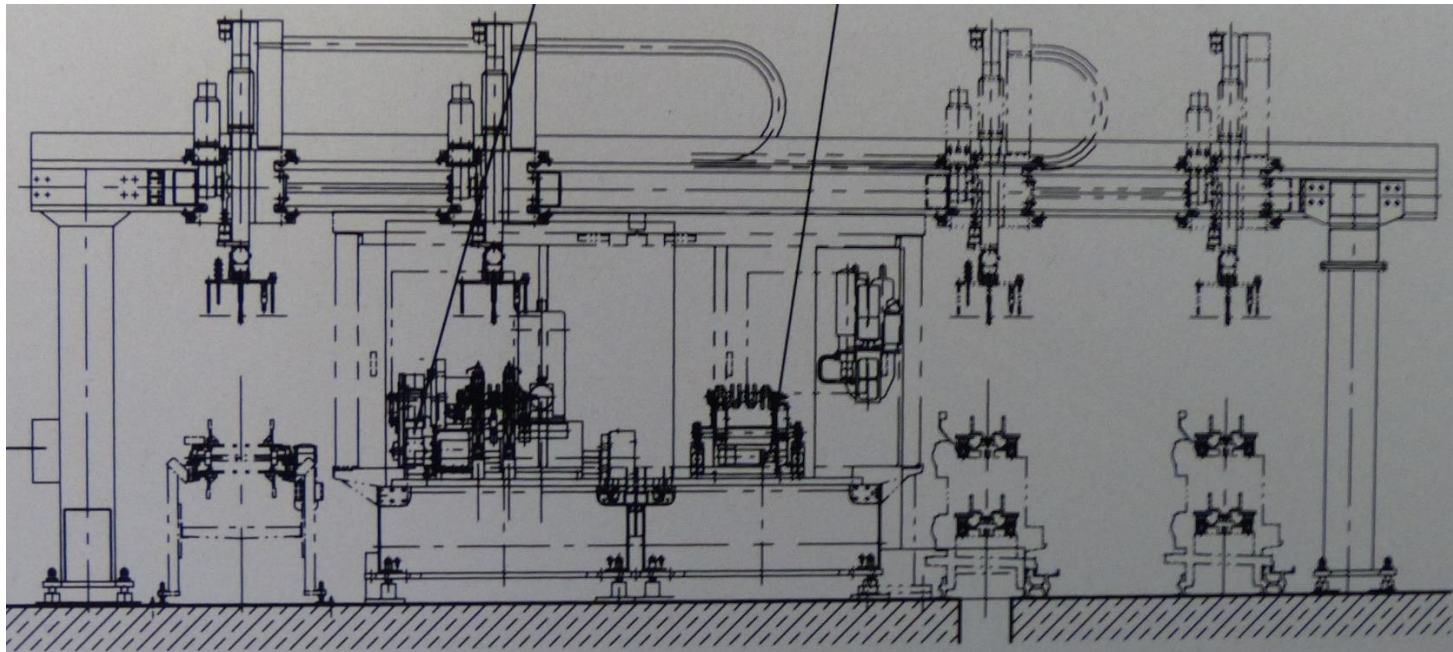
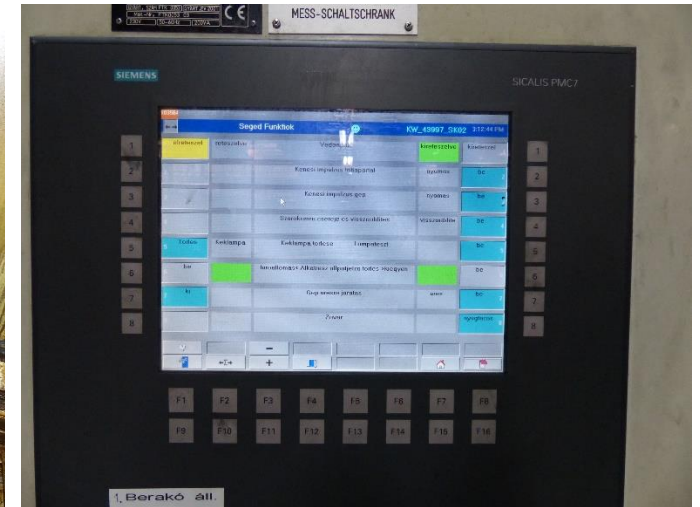


OP 170 HEGENSCHIEDT 7794 Rolling Machine



OP 180 SCHENCK Balancing Units (2 of full-automatic) and ReWork Station

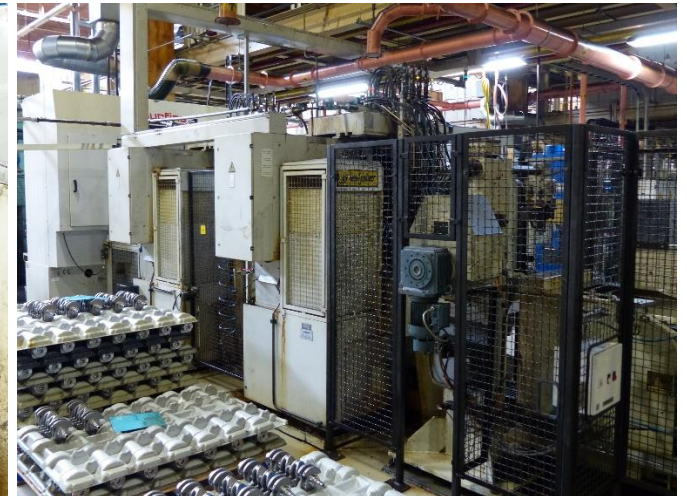
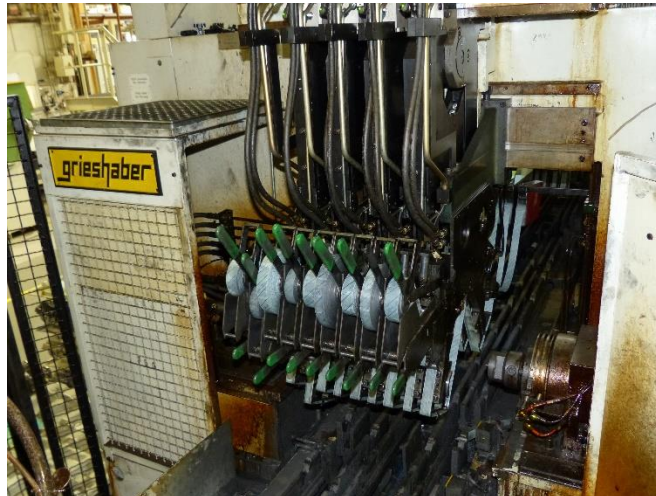




SCHECK / FLOTT ReWork Station



OP 190 SUPFINA 720-1 and GRIESHABER SFM 320 Superfinishing Machines

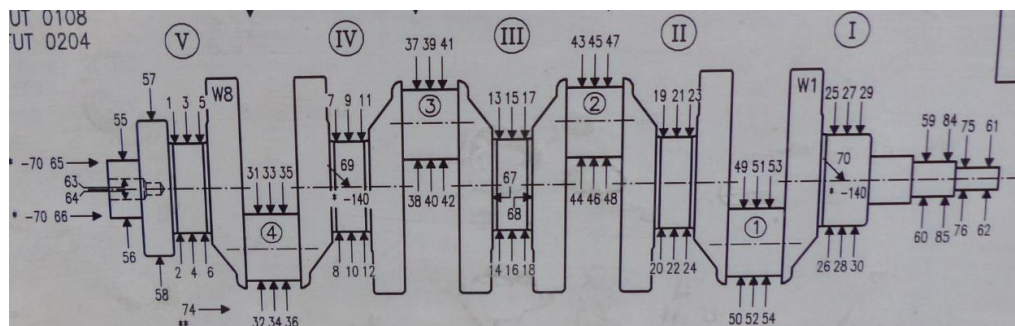




OP 200 WACHE Final Washer



OP 210 MARPOSS M110 Final Measuring and Classification



Contact: andreas@maynards.com

All Information and prior Sale reserved. Our actual T&Cs apply.

A Buyers Premium of 15% applies to all Sales.

Machinery and Equipment become offered "as is, where is",
ex location/foundation Hungary.