
Pos.	Art.No.	Qty.	Description
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01	d003677200		ENGEL INJECTION MOULDING MACHINE duo 23050/1650 WP US
02	d010502600		Engel North America molding machine package: <ul style="list-style-type: none">- Nozzle body with interchangeable tip, 3/4" radius and 5/16" orifice. Nozzlebody-to-tip thread is 1-1/4"-12UNF-2B. Barrelhead-to-nozzle body thread 2-1/2"-8UN-2A- Mechanical safety device for closing- 480V/3P/60cy incoming voltage and 480V barrel heat with 120V nozzle heat- Electrical equipment for USA and Canada- ANSI B151.1 compliant- Solid purge guard cover, with PC-window- SPI mold mounting and ejector pattern- Hydraulic ejector (platen ejector as option from 2200 US to), ejector holes are counter bored through holes for 3/4" screws.- Emergency stop function bE10, not to open safety gate behind moving plate (bE10)- Tool kit containing allen and open end wrenches

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		<p>Injection unit: Short design with 2 hydraulic-cylinders for injection, direct drive of screw Specific injection pressure switchover Barrel removal to the top Ceramic heaterbands regulated traverse cooling</p> <p>Barrel in bi-metallic-execution M3, higher abrasion- and corrosion resistant, working range up to 350 degrees C</p>
03	d050503210	additional price for nickel-based bi-metallic barrel M9, additional tungsten carbide (WC) reinforcement for highest abrasion- and/or corrosion resistance, working range up to 350 degrees C
04	d050505390	barrel L/D 25 - 160 mm incl. 1 additional barrel heating
05	d050513725	Barrier-screw S13 with B-mixing head L/D 25 - diameter 160 mm incl. check valve R9
06	d050542350	hydraulic shut off nozzle radius 35mm, barrelhead thread M98x6, nozzle orifice 8 mm incl. control cylinder with watercooling, adapter, heaterband, thermocouple, hydraulic, software and electronic
07	d059050400	insulating pads for heaterbands
08	d059050910	Machine hopper, located on moveable hopper support with integrated adaptor for auxiliary devices Attention: Manual filling of the hopper only by using ladder with platform conforming to the standards EN 201/20xx, available at ENGEL if required
09	d059051100	magnetic grid

Pos.	Art.No.	Qty. Description
10	d059051800	speed controlled electrical screw drive nominal motor value 140 kW torque 18600 Nm 60 % by working of operating time from cycle Hint: for FI fused voltage network the main supply situation has to be discussed with the customer.
11	d059051905	additional price for electrical screw drive in US-execution
12	d059070160	Maintainance and service platform (fixed ladder with platform) for manual filling of the hopper according EN ISO 14122 1-4 and EN 201/20xx. - Price on Request (ES 7050/. - ES 11050/.) Clamp unit: Fully hydromech. clamp unit in 2-platen exec. 4 short stroke pressure pads on nozzle side 4 adjustment nuts on ejector side 2 fast movement cylinders placed diag. Hydraulic platen ejector, Platen stroke dependent on mold height. Moveable platen guided on base. Clamp force: 15000 kN (1650 US Tons) Technical data and standard equipment according to data sheet
13	d100053020	corepull single on movable platen (Euromap 13 / AN-147)
14	d100053025	corepull additional on movable platen
15	d100053030	corepull single on fixed platen (Euromap 13 / AN-147)
16	d100053035	corepull additional on fixed platen
17	d100053046	pressure release for all corepulls on movable platen

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18	d100053047	pressure release for all corepulls on fixed platen
46	d100053132	automatic tie bar pulling device on standard operator side Hydraulic: electrically adjustable variable displacement pump with pressure and volume regulation Closing movement with position controlled proportional valve injection with servo valve for injection speed and holding pressure parallel movement for ejector, corepull, injection unit forward during opening, closing
45	d150053060	N-execution
20	d150070550	ecodrive - innovative speed controlled drive concept with servodrive and operating point optimization (for best overall efficiency through servodrive speed control adjustment and pivoting angle of variable pump). Program ecograph is necessary in addition (according price list). Electric: integrated control cabinet Connection for heating and power not separated
21	d200001750	potential free contact for color feeder active during dosing wired on 4pin HTS
22	d200001800	ejector protection on 4-pin HTS
23	d200002550	control cabinet execution dust proof / increased cooling capacity including 2 air conditioning units
24	d200003150	interface for conveyor belt execution with switchable socket

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25	d200071010	Electrical Outlet (Volts/Phase/Hertz) 115V/1P/60H, 15 AMP Duplex
26	d200071090	Electrical Outlet (Volts/Phase/Hertz) 460V/3P/60H, 20 AMP
27	d200071100	Electrical Outlet (Volts/Phase/Hertz) 460V/3P/60H, 30 AMP
		Control:
28	d250000155	CC200 control package including: <ul style="list-style-type: none"> - "Windows" style display with 15" TFT-color Touch Screen - Data storage via USB interface - Ethernet network interface - Freely programmable cycle sequence supported by graphical symbols - Screen pages configurable - e-help - Notepad - Alarm Messaging via Email - weekly timer - Micrograph - Microplast - PD-log Screen text english: EN spanish: ES
29	d250001800	ecograph for energy analysis of IMM
30	d250002150	"Autoprotect"-precision mold protection alternatively speed or pressure monitored incl. pressure sensor
31	d250002160	"Autoprotect"-injection monitoring alternatively speed-, pressure- or cavity pressure monitored
32	d250003165	Interface for integrated ENGEL robot

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			incl. 1 triggered receptacle for conveyor belt, 3 Phases, 15 AMP
33	d250004010		program optimum motor capacity control during feeding
34	d250004080		mold parallelism measurement
35	d250011400		program "virt mould" for viewing and revising of parameter settings and for process opti- mization on PC incl. simulation
			General: Machine without oil filling (Start-up with zinc containing oil) Machine description english
36	d300053027	3	Pneumatic air supply maintenance unit (Filter/Regulator) 1x FAP 1x BAP 1x machine
37	d300053029	4	magnetic air valve 2/2-ways, R1/4 inch mounted on stationary platen
38	d300053030	3	magnetic air valve 2/2-ways, R1/4 inch mounted on moving platen
39	d300053040		machine support pads
40	d300065490		Painting Standard
41	d300080000		If the machine will be delivered with robot, it will not be installed onto the machine for pre-acceptance at ENGEL Austria
42	d390007350		pneumatic shut off nozzle control 6-fold
			Additional equipment:
47	d400012979		Interface for magnetic quick mold mounting system Euromap 70.0