

SIMPLY UNIVERSAL

For 20 to 4000 T Injection Molding Machines

INNOVATION

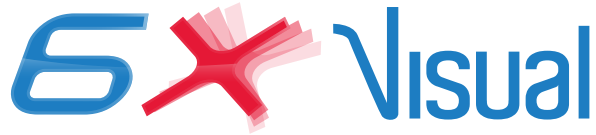
6X Visual: Range of 6-CNC axes' robots



- 6X - 60
- 6X - 90
- 6X - 160
- 6X - 200
- 6X - 340

YOUR FREE CHOICE IN ROBOTS

The alliance of two leaders in the robotics market:
Sepro Robotique and Stäubli
For greater power and flexibility



6X Visual or 5X Line

THE CHOICE IS YOURS

- 5X Line is a range of 5-CNC axes' Cartesian robots, designed for universal and complex applications and easily operated with the Visual 3 control system.
- 6X Visual is a range of 6-CNC axes' polyarticulated robots for your plastic injection molding applications, simple to program thanks to Visual 3.

Both ranges can be mounted on IMMs or on peripherals to complete your parts.

6X Visual and 5X Line

AN INNOVATIVE OFFER

Sepro Robotique and Stäubli have joined forces to multiply the possible types of robots for the plastics industry and can offer you an original and unique choice between Cartesian and polyarticulated robots.

Try both technologies: 5X Line and 6X Visual are both driven by the same Visual control system.



6X Visual's power comes from the technological alliance of the **Stäubli 6-axis polyarticulated arm** and the **Sepro Visual 3 control system platform**.

6X Visual is a range of 6-axis polyarticulated robots, designed to equip your injection molding machines and/or complete parts outside the IMM.

The 6X Visual offer comprises 5 robot sizes to meet the specific needs of the plastics industry.

- For Simple Pick-and-Place or complex path tracking applications, the 6-axis polyarticulated robot is as easy and quick to start up as a 3-axis robot, thanks to the powerful and user-friendly Visual 3 control system.
- These robots are used for unloading directly from the IMM or on peripherals for post processing plastic parts.

TECHNICAL ADVANTAGES

- Small and medium-sized arms (6X-60 to 6X-200) with a closed and naturally clean structure (ISO 5 and IP 65), adapted to clean room applications for the medical and electronic industries.
- The large-sized arm, 6X-340, specially adapted to offer a large work envelope for IMMs up to 4000 T.
- The arms can be mounted on the IMM platen to take up less floor space or next to the IMM to work with the peripherals.
- Reduced maintenance - oil changed every 20 000 hours only.




6X and Visual 3, THE PERFECT COMBINATION FOR A UNIVERSAL, AUTOMATION SOLUTION:

- The speed and precision of Stäubli articulated arms for the most complex applications.
- Easy programming and use thanks to the Visual 3 control system.
- For Sepro customers already familiar with the Visual environment, a short training course is sufficient to use an installation with a polyarticulated robot from the 6X Visual range.

The assurance of high performance and simplicity!


HIGH PERFORMANCE

- The standard Path Tracking function can be used to demold undercut parts following curved paths, or flame treat parts.
- Thanks to the fast 20 ms PLC function, you can check intelligent peripheral systems, including external CNC axes.
- Use the Software pack on your PC to create, edit and manage your programs in a Windows environment. 
- The Digital vacuum switch is available as standard on Visual 3 to program and save your part grip settings for each mold.

REALLY SIMPLE - it's so easy

- See what you're creating in 3D: with the Simple Pick-and-Place module, create your cycle by answering the questions the system asks you and see the result immediately in 3D on the video.
- When fine-tuning, the Joystick makes delicate settings in the mold possible.

MAKE YOUR DAILY ROUTINE EASIER

- Consult the online documentation in full screen mode at any time.
- Transfer information from one team to another using the notepad function.
- Thanks to the USB key, operators, setters, programmers and maintenance staff have direct access to the relevant data. 
- Troubleshooting assistance from Sepro's Hotline: with the USB key, download and send the relevant information via internet for remote assistance.



	6X-60		6X-90		6X-160		6X-200		6X-340
Mold clamping force - Indication metric Ton	20 - 100 T		80 - 200 T		150 - 500 T		500 - 1300 T		1000 - 4000 T
Mold clamping force - Indication US tons	22 - 110 t		88 - 220 t		165 - 551 t		551 - 1433 t		1102 - 4409 t
Version	6X-60	6X-60L	6X-90L	6X-90XL	6X-160	6X-160L	6X-200	6X-200L	6X-340
Maximum load (kg)	9	5	15	12	34	28	130*	80*	165
Nominal load (kg)	3,5	2	6	5	20	14	100*	60*	
Radius of action (mm)	670	920	1200	1450	1710	2010	2194	2594	3450
Repeatability (ISO9283)	+/- 0,02	+/- 0,03	+/- 0,035	+/- 0,04	+/- 0,05	+/- 0,05	+/- 0,06	+/- 0,10	+/- 0,10
Protection category (*wrist)	IP65		IP65 (*67)		IP65 (*67)		IP65 (*67)		
Work zone (°) / Max speed (°/s)									
Axis 1	+/- 180 / 435		+/- 180 / 400		+/- 160 / 200		+/- 180 / 150		+/- 180 / 85
Axis 2	+/-127,5 / 410	+/-127,5 / 385	+147,5-130 / 390	+147,5-130/350	+/-137,5 / 200		+/-120 / 150		-50 +170 / 90
Axis 3	+/-142,5 / 540	+/-152,5 / 500	+/-145 / 420	+/-145 / 410	+/-150 / 255		+/-145-140 / 150		-18,8-288 / 110
Axis 4	+/- 270 / 995		+/- 270 / 540		+/- 270 / 315		+/- 270 / 260		+/- 270 / 130
Axis 5	+132,5 - 122,5 / 1065		+140 - 115 / 475		+120 - 105 / 360		+/- 120 / 260		+/- 125
Axis 6	+/- 270 / 1445		+/- 270 / 760		+/- 270 / 870		+/- 270 / 400		
Type of installation									
Side Entry Ground	✓	✓	✓	✓	✓	✓	✓	✓	✓
Side Entry Ceiling	✓	✓	✓	✓	✓	✓	✓ (1)	✓ (1)	
Top Entry (on IMM's fixed plate)									✓
Floor-standing control cabinet	✓	✓	✓	✓	✓	✓	✓	✓	✓
VISUAL 3 control system	✓	✓	✓	✓	✓	✓	✓	✓	✓
Path tracking	✓	✓	✓	✓	✓	✓	✓	✓	✓

(1) For ceiling option consult/contact Sepro

For over 30 years, Sepro has been selling Cartesian robots for the plastics industry worldwide. Sepro strives constantly to develop a fully global offer to answer the needs of the world's plastic industry market.

Stäubli is an innovative Swiss group specialized in 3 main sectors, whose common feature is mechatronics: fabric machines, connection systems and robotics. Stäubli robots are designed and manufactured in France and used in industries such as plastics, automotive, machine tools, medical or food processing and cover all types of applications.

SEPRO AND STÄUBLI SHARE THE SAME, MAIN VALUES :

- Customer satisfaction
- Quality of marketed products
- Technological advance
- Local customer service worldwide.

WHY CHOOSE SEPRO ?

- Sepro manufacturer n°1 in Europe - Major performer in North and South America
- Main supplier in the Automotive Industry in Europe and the USA - global leader for IMMs over 800T
- A full line of robots from 3 to 6 axis with one unique and user-friendly control
- Over 25,000 installations worldwide



YOUR FREE CHOICE IN ROBOTS

www.sepro-robotique.com