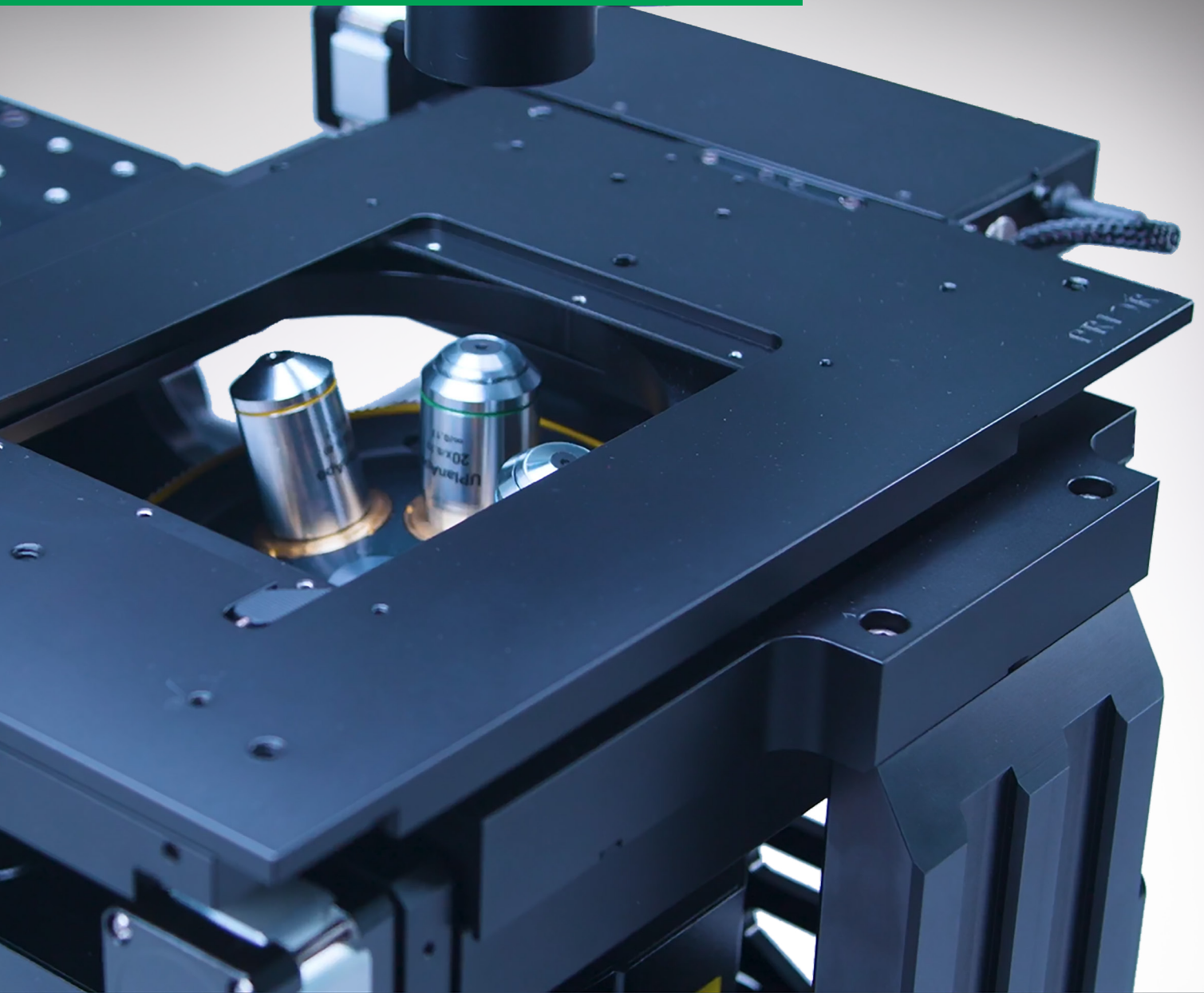


Motorized XY Stages

High-precision positioning for
a range of applications



Precise, accurate and reliable movement for automated imaging

prior.com

ProScan® H100A stage for upright microscopes

Key Features



Travel Range
75 mm x 50 mm



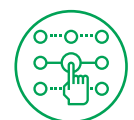
Compact Size
Ideal for installation into OEM projects with limited space.



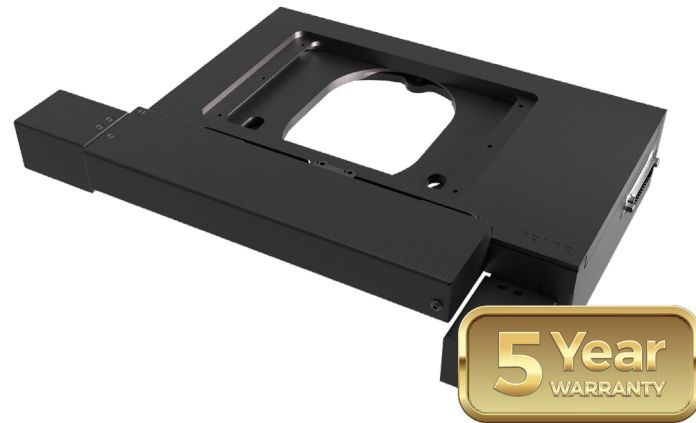
Cost Effective
ProScan-level precision and resolution at a lower price.



Optimized Performance
Intelligent Scanning Technology™ for accuracy and linearity.



Variety of Sample Holders
Can accommodate a range of specimen types.

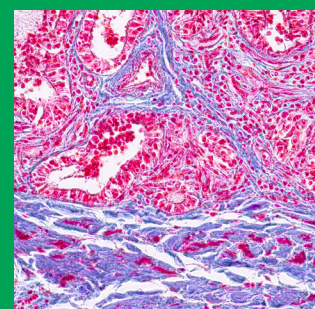


The H100A motorized XY stage provides a cost effective way of accessing ProScan-level high performance accuracy and repeatability with many commercial microscopes.

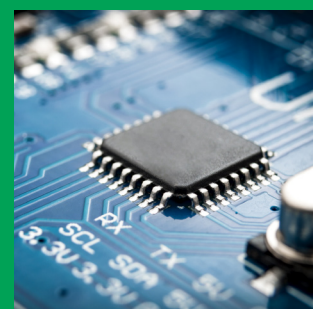
Each individual H100A is tuned with specific parameters that optimize its overall performance, making it equally well suited to higher magnification basic microscopy or higher end imaging techniques, in an efficiently sized format ideal for typical microscopy samples such as slides, filter papers or polished metrology samples. The H100A's low mass compared to the other stages also makes it a good choice for smaller microscope frames.

Its small footprint is ideal for integration into optical table-based experimental setups and OEM instruments. Its 1 mm ball screw and 200 step motors provide an excellent balance of speed and precision for most applications.

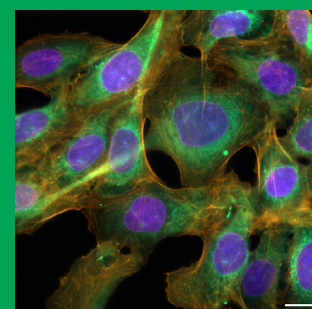
Applications



Slide scanning



Industrial imaging



Fluorescence microscopy

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H100A	Prior OpenStand-U, OpenStand-M, OpenStand-L	No	1 mm / 200 step
H100A (Nikon)	Nikon SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1500	No	1 mm / 200 step
H100Ci	Nikon 50i, 80i, Ni-E, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	No	1 mm / 200 step
H100Ni	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	No	1 mm / 200 step
H100NLV	Nikon LV100ND, LV100NDA, LV150N, LV150NA	No	1 mm / 200 step
H100BX	Evident/Olympus BX43, BX51, BX61, BX53, BX53M, SZX Series	No	1 mm / 200 step
H100AX	Zeiss Axio Examiner, Axioimager 1	No	1 mm / 200 step
H100DM	Leica DMLS, DMR, DM4000, DM5000, DM6000, DM6	No	1 mm / 200 step
H100WM	Motic BA310	No	1 mm / 200 step

Typical combination for slide scanning

Platform	Evident/Olympus BX43	Motic BA310
Stage	H100BX	H100WM
Controller	V31XYZ ProScan III controller	
Joystick	CS200XY ergonomic XY joystick	
Sample holders	H224ARMS slide holder for single or double width slides	

ProScan® H101N2F stage for upright microscopes

Key Features



Travel Range
114 mm x 75 mm



Easy Integration
Ideal for use with customized imaging solutions and OEM projects.



Slim Profile Design
User friendly with a completely flat top plate for easy access to the sample.



Fast and Accurate
Excellent combination of speed and resolution.



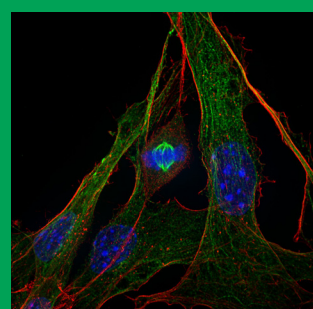
Optimized Performance
Intelligent Scanning Technology™ for accuracy and linearity.

The ProScan H101N2F is a motorized XY stage for upright microscopes and is fully customizable for integration into OEM devices.

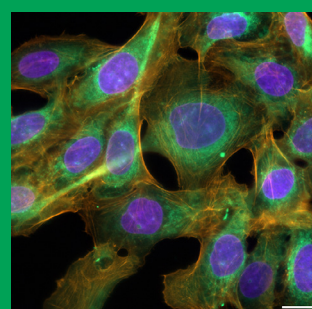
It has a 2 mm ballscrew and 200-step motor for a balance of speed and resolution. Prior's patented Intelligent Scanning Technology (IST) optimizes stage accuracy and linearity.

The H101N2F accommodates a variety of specimen types including glass slides, multiwell plates, semiconductor wafers, and metallurgical samples. A slim profile with a completely flat top plate allows easy access to the sample for loading and compatibility with a wide range of optics.

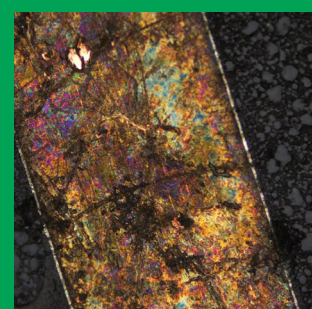
Applications



Confocal and super- resolution microscopy



Fluorescence microscopy



Metrology

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H101N2F	OpenStand-U, OpenStand-M, OpenStand-L	No	2 mm / 200 step
H101E2F	OpenStand-U, OpenStand-M, OpenStand-L	Yes	2 mm / 200 step
H101N2F (Nikon)	Nikon SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1501	No	2 mm / 200 step
H101E2F (Nikon)	Nikon SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1500	Yes	2 mm / 200 step
H101N2Ni	Nikon 50i, 80i, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	No	2 mm / 200 step
H101E2Ni	Nikon 50i, 80i, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	Yes	2 mm / 200 step
H101N2Ci	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	No	2 mm / 200 step
H101E2Ci	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	Yes	2 mm / 200 step
H101N2AZEP	Nikon AZ100	No	2 mm / 200 step
H101E2AZEP	Nikon AZ100	Yes	2 mm / 200 step
H101N2BX	Evident/Olympus BX51, BX61, BX53, BX53M, SZX Series	No	2 mm / 200 step
H101E2BX	Evident/Olympus BX51, BX61, BX53, BX53M, SZX Series	Yes	2 mm / 200 step
H101N2B3	Evident/Olympus BX63	No	2 mm / 200 step
H101E2B3	Evident/Olympus BX63	Yes	2 mm / 200 step
H101N2AX	Zeiss Axio Examiner, Axioimager 1, Axioimager 2	No	2 mm / 200 step
H101E2AX	Zeiss Axio Examiner, Axioimager 1, Axioimager 2	Yes	2 mm / 200 step
H101N2DM	Leica DMLS, DMR, DM4000, DM5000, DM6000	No	2 mm / 200 step
H101E2DM	Leica DMLS, DMR, DM4000, DM5000, DM6000	Yes	2 mm / 200 step

Typical combination for fluorescence microscopy

Platform	Nikon Ni-E	Evident/Olympus BX53
Stage	H101N2Ci	H101E2BX
Controller	V31XYZ ProScan III Controller	V31XYZ ProScan III Controller for encoded stages
Joystick	CS200XY ergonomic XY joystick	
Sample holders	H234F four slide holder	

ProScan® H101N1F stage for upright microscopes

Key Features



Travel Range
114 mm x 75 mm



OEM Customization
Easy integration with customized imaging solutions and OEM projects.



User-friendly Design
A slim profile with a completely flat top plate allows easy access to the sample.



Precision
High step resolution and improved straightness.



Accuracy and Linearity
Intelligent Scanning Technology™ optimizes performance.

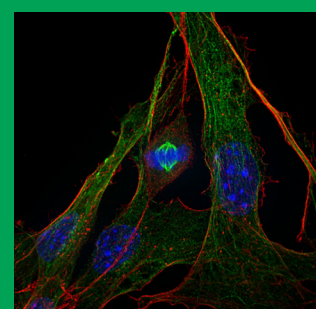


The H101N1F is a motorized XY stage for upright microscopes and is fully customizable for integration into OEM devices.

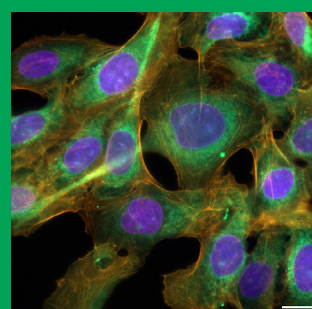
The most accurate and precise, non-encoded, flat top stage, it uses a 1 mm screw pitch and 200 step motor drive configuration to provide two times the resolution of the H101N2F stage. Prior's patented Intelligent Scanning Technology (IST) optimizes stage accuracy and linearity.

A slim profile with a completely flat top plate allows easy access to the sample for loading and compatibility with a wide range of optics. The H101N1F accommodates a variety of specimen types including glass slides, multiwell plates, semiconductor wafers, and metallurgical samples.

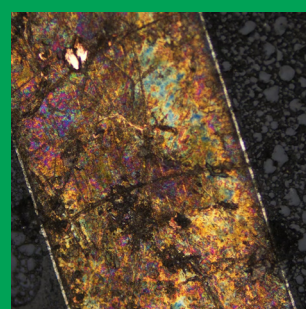
Applications



Confocal and super-resolution microscopy



Fluorescence microscopy



Metrology

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H101N1F	OpenStand-U, OpenStand-M, OpenStand-L	No	1 mm / 200 step
H101E1F	OpenStand-U, OpenStand-M, OpenStand-L	Yes	1 mm / 200 step
H101N1F (Nikon)	Nikon SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1500	No	1 mm / 200 step
H101E1F (Nikon)	Nikon SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1500	Yes	1 mm / 200 step
H101N1Ni	Nikon 50i, 80i, Ni-E, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	No	1 mm / 200 step
H101E1Ni	Nikon 50i, 80i, Ni-E, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	Yes	1 mm / 200 step
H101N1Ci	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	No	1 mm / 200 step
H101E1Ci	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	Yes	1 mm / 200 step
H101N1AZEP	Nikon AZ100	No	1 mm / 200 step
H101E1AZEP	Nikon AZ100	Yes	1 mm / 200 step
H101N1BX	Evident/Olympus BX51, BX61, BX53, BX53M, SZX Series	No	1 mm / 200 step
H101E1BX	Evident/Olympus BX51, BX61, BX53, BX53M, SZX Series	Yes	1 mm / 200 step
H101N1B3	Evident/Olympus BX63	No	1 mm / 200 step
H101E1B3	Evident/Olympus BX63	Yes	1 mm / 200 step
H101N1AX	Zeiss Axio Examiner, Axioimager 1, Axioimager 2	No	1 mm / 200 step
H101E1AX	Zeiss Axio Examiner, Axioimager 1, Axioimager 2	Yes	1 mm / 200 step
H101N1DM	Leica DMLS, DMR, DM4000, DM5000, DM6000, DM6	No	1 mm / 200 step
H101E1DM	Leica DMLS, DMR, DM4000, DM5000, DM6000, DM6	Yes	1 mm / 200 step

Typical combination for live cell imaging

Platform	Evident/Olympus BX63	Zeiss Axioimager 2
Stage	H101N1B3	H101E1AX
Controller	V31XYZ ProScan III Controller	V31XYZE ProScan III Controller for encoded stages
Joystick	CS200XY ergonomic XY joystick	
Sample holders	H473UP universal sample holder H3848 adapter for non-recessed sample holders	

ProScan® H101A stage for upright microscopes

Key Features



Travel Range
114 mm x 75 mm



Optimized Performance
Intelligent Scanning Technology™ (US Patent 7,330,307).



Excellent Repeatability
Offers sub-micron repeatability at 1 µm or better.



Variety of Sample Holders
Can accommodate a range of specimen types.



OEM Only
Available for contract order, OpenStand systems or OEM customers only.

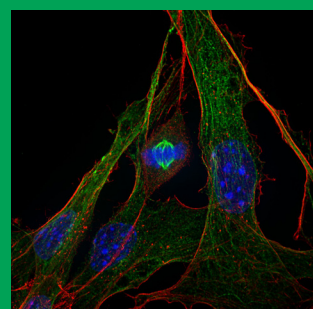


The ProScan H101A is a motorized XY stage for upright microscopes and is fully customizable. Its compact design makes it ideal for integration into OEM devices or customized microscopes.

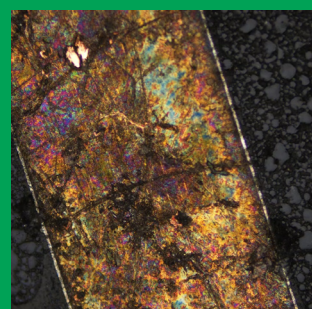
It has a 2 mm ballscrew and 200-step motor for a balance of speed and resolution, offering sub-micron repeatability while also providing 4 times the speed of the H1P4A stage. Prior's patented Intelligent Scanning Technology (IST) optimizes stage accuracy and linearity.

The H101A accommodates a variety of specimen types including glass slides, multiwell plates, semiconductor wafers, and metallurgical samples.

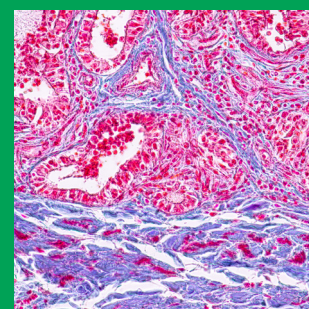
Applications



Confocal and super-resolution microscopy



Metrology



Slide scanning

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H101A	OpenStand-U, OpenStand-M, OpenStand-L	No	2 mm / 200 step
HE01	OpenStand-U, OpenStand-M, OpenStand-L	Yes	2 mm / 200 step
H101A (Nikon)	Nikon SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1500	No	2 mm / 200 step
HE01 (Nikon)	Nikon SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1500	Yes	2 mm / 200 step
H101E50	Nikon 50i, 80i, Ni-E, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	No	2 mm / 200 step
HE01E50	Nikon 50i, 80i, Ni-E, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	Yes	2 mm / 200 step
H101E80	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	No	2 mm / 200 step
HE01E80	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	Yes	2 mm / 200 step
H101AZEP	Nikon AZ100	No	2 mm / 200 step
HE01AZEP	Nikon AZ100	Yes	2 mm / 200 step
H101NLV	Nikon LV100ND, LV100NDA, LV150N, LV150NA	No	2 mm / 200 step
HE01NLV	Nikon LV100ND, LV100NDA, LV150N, LV150NA	Yes	2 mm / 200 step
H101BX	Evident/Olympus BX51, BX61, BX53, BX53M, SZX Series	No	2 mm / 200 step
HE01BX	Evident/Olympus BX51, BX61, BX53, BX53M, SZX Series	Yes	2 mm / 200 step
H101BXWI	Evident/Olympus BX51WI, BX61WI	No	2 mm / 200 step
H101AXIM	Evident/Olympus Axio Examiner, Axioimager 1, Axioimager 2	No	2 mm / 200 step
HE01AXIM	Evident/Olympus Axio Examiner, Axioimager 1, Axioimager 2	Yes	2 mm / 200 step
H101DMLS	Leica DMLS, DMR, DM4000, DM5000, DM6000, DM6	No	2 mm / 200 step
HE01DMLS	Leica DMLS, DMR, DM4000, DM5000, DM6000, DM6	Yes	2 mm / 200 step

Typical combination for slide scanning

Platform	Evident/Olympus BX53	Zeiss Axioimager 2
Stage	H101BX	HE01AXIM
Controller	V31XYZ ProScan III Controller	V31XYZE ProScan III Controller for encoded stages
Joystick	CS200XY ergonomic XY joystick	
Sample holders	H224LP single slide holder H234LP four slides holder	

ProScan® H1P4A stage for upright microscopes

Key Features



Travel Range
114 mm x 75 mm



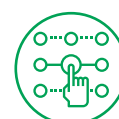
Versatile
Compatible with most brands of upright microscopes.



OEM Customization
Easy integration with customized imaging solutions and OEM projects.



Precision
High step resolution and minimized off-axis motion.



Accuracy and Linearity
Intelligent Scanning Technology™ optimizes performance.

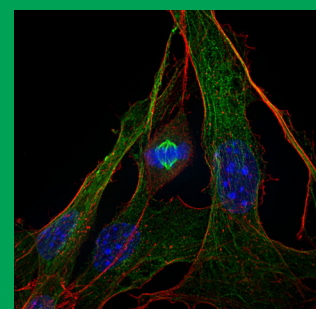


The H1P4A is a motorized XY stage for upright microscopes and is fully customizable for integration into OEM devices.

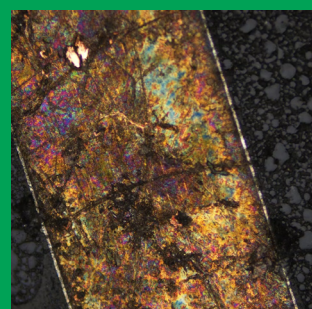
The most accurate and precise stage in the ProScan H101 range, it uses a 1 mm screw pitch and 400 step motor drive configuration to provide four times the resolution of the H101A stage, making it ideal for applications that require reliable, short stage movements. Prior's patented Intelligent Scanning Technology (IST) optimizes stage accuracy and linearity.

The H1P4A accommodates a variety of specimen types including glass slides, multiwell plates, semiconductor wafers, and metallurgical samples. Alternative drive configuration options may be available depending on your region.

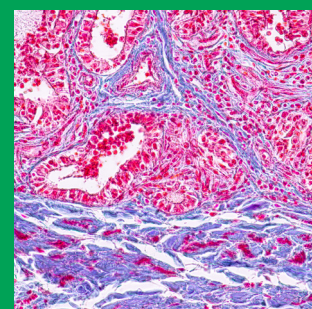
Applications



Confocal and super-resolution microscopy



Metrology



Slide scanning

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H1P4A	OpenStand-U, OpenStand-M, OpenStand-L	No	1 mm / 400 step
HEP4	OpenStand-U, OpenStand-M, OpenStand-L	Yes	1 mm / 400 step
H1P4A (Nikon)	SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1500	No	1 mm / 400 step
HEP4 (Nikon)	SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1500	Yes	1 mm / 400 step
H1P4AZEP	Nikon AZ100	No	1 mm / 400 step
HEP4AZEP	Nikon AZ100	Yes	1 mm / 400 step
H1P4E50	Nikon 50i, 80i, Ni-E, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	No	1 mm / 400 step
HEP4E50	Nikon 50i, 80i, Ni-E, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	Yes	1 mm / 400 step
H1P4E80	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	No	1 mm / 400 step
HEP4E80	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	Yes	1 mm / 400 step
H1P4NFN	Nikon FN1	No	1 mm / 400 step
HEP4NFN	Nikon FN1	Yes	1 mm / 400 step
H1P4NLV	Nikon LV100ND, LV100NDA, LV150N, LV150NA	No	1 mm / 400 step
HEP4NLV	Nikon LV100ND, LV100NDA, LV150N, LV150NA	Yes	1 mm / 400 step
H1P4BX	Evident/Olympus BX51, BX61, BX53, BX53M, SZX Series	No	1 mm / 400 step
HEP4BX	Evident/Olympus BX51, BX61, BX53, BX53M, SZX Series	Yes	1 mm / 400 step
H1P4AXIM	Zeiss Axio Examiner, Axioimager 1, Axioimager 2	No	1 mm / 400 step
HEP4AXIM	Zeiss Axio Examiner, Axioimager 1, Axioimager 2	Yes	1 mm / 400 step
H1P4DMLS	Leica DMLS, DMR, DM4000, DM5000, DM6000, DM6	No	1 mm / 400 step

Typical combination for metrology

Platform	Evident/Olympus BX53M	Nikon LV150N
Stage	H1P4BX	H1P4NLV
Controller	V31XYZ ProScan III Controller	V31XYZE ProScan III Controller for encoded stages
Joystick	CS200XY ergonomic XY joystick	
Sample holders	H230 aluminum plate	

OptiScan® ES111 stage for upright microscopes

Key Features



Travel Range
125 mm x 75 mm



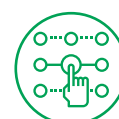
Versatile
Suitable for industrial and life science microscopes.



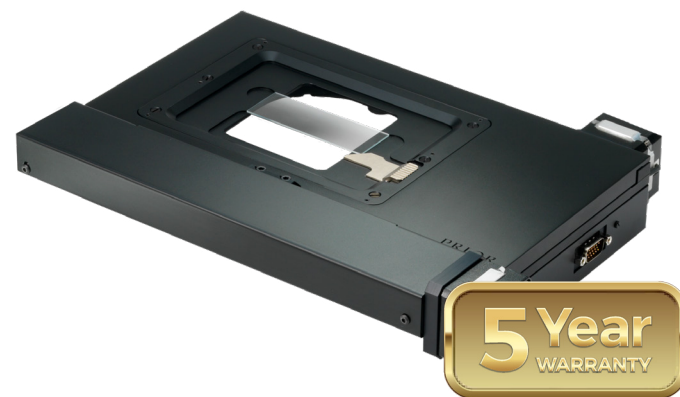
Affordable and User-Friendly
Low cost, easy to set up and easy to use.



Routine Applications
Facilitates routine multiposition imaging and stitching.



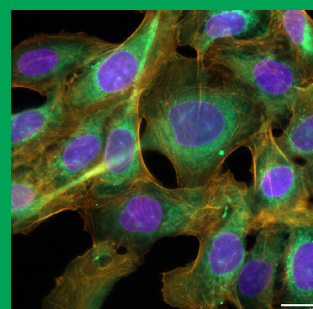
Robust Design
Integrates into large and complex systems.



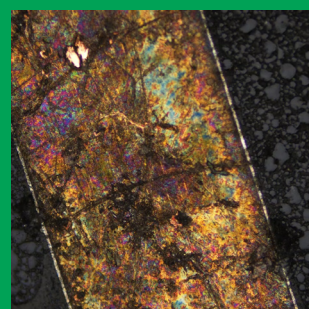
The ES111 is an entry-level motorized XY stage adapted for upright microscopes. It is compatible with Prior's OpenStand and is easily integrated into OEM products or custom microscopes. Featuring a reliable and accurate anti-backlash leadscrew/stepper motor, the stage suits routine imaging applications that do not require sub-micrometer repeatability and is an affordable choice for microscope automation.

It accommodates a variety of specimen types including glass slides, multi-well plates, Petri dishes, and polished metallurgical samples. The ES111 is the ideal stage for introducing basic motorization for any microscopy application - it is currently used for slide scanning, particle analysis, industrial microscopy, fluorescence microscopy, and metrology, both in research and industrial settings.

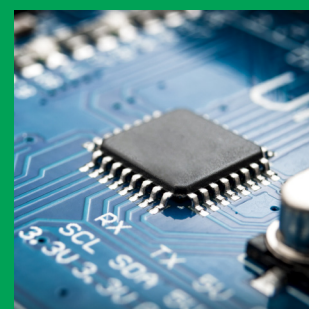
Applications



Fluorescence microscopy



Metrology



Industrial imaging

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
ES111	OpenStand-U, OpenStand-M, OpenStand-L	No	1 mm / 400 step
ES111 (Nikon)	Nikon SMZ18, SMZ25	No	1 mm / 400 step
ES11E50	Nikon 50i, 80i, Ni-E, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	No	1 mm / 400 step
ES11E80	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	No	1 mm / 400 step
ES11NLV	Nikon LV100ND, LV100NDA, LV150N, LV150NA	No	1 mm / 400 step
ES11BX	Evident/Olympus BX51, BX61, BX53, BX53M, SZX Series	No	1 mm / 400 step
ES11PLAN	Zeiss Axioskop 2, Axioskop 40, Axioplan 2, Axiophot 2	No	1 mm / 400 step
ES11AXA1	Zeiss Axioscope	No	1 mm / 400 step
ES11DMLS	Leica DMLS, DMR, DM4000, DM5000, DM6000, DM6	No	1 mm / 400 step
ES11MT5	Meiji 4000, 5000, 6000, 7000, 7500, 8000, 8500	No	1 mm / 400 step
ES111WM	Motic BA310	No	1 mm / 400 step

Typical combination for industrial imaging

Platform	Evident/Olympus BX53M	Nikon LV100ND
Stage	ES11BX	ES11NLV
Controller	ES11 OptiScan III Controller	
Joystick	CS200XY ergonomic XY joystick	
Sample holders	H230 Aluminium plate H220 Glass plate	

ProScan® H138A stage for upright microscopes

Key Features



Travel Range
240 mm x 71 mm



Compatibility
Works with most brands and fully customizable for use in OEM projects.



Fast and precise
Optimized drive configuration with 1 µm or better repeatability.



Variety of Sample Holders
Can accommodate a range of specimen types.



Versatile Design
Extended lateral travel for imaging larger samples or multiple slides.

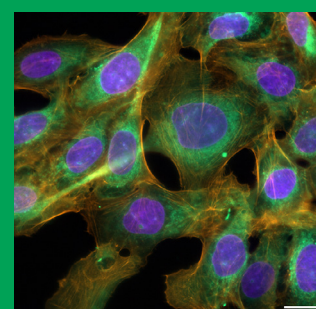


The H138A motorized XY stage is designed for integration into custom microscopes or OEM designs and adapts to different hardware configurations.

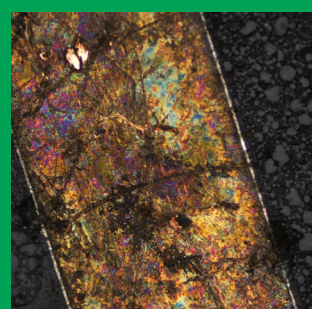
It uses a 2 mm screw pitch and 200-step motor drive to cover its large travel area quickly, and features Prior's patented Intelligent Scanning Technology (IST) to optimize stage accuracy and linearity.

The H138A fits up to eight 75 mm x 25 mm microscope slides and offers extended lateral travel for imaging large samples, such as PCBs, or arrays of multiple samples.

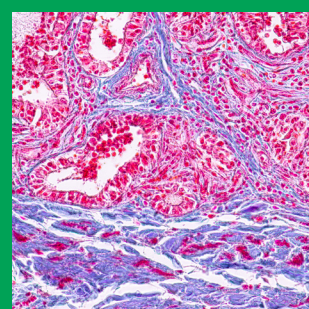
Applications



Fluorescence microscopy



Metrology



Slide scanning

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H138A	Prior OpenStand-U, OpenStand-M, OpenStand-L	No	2 mm / 200 step
HE38	Prior OpenStand-U, OpenStand-M, OpenStand-L	Yes	2 mm / 200 step
H138A (Nikon)	Nikon SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1500	No	2 mm / 200 step
HE38 (Nikon)	Nikon	Yes	2 mm / 200 step
H138E50	Nikon 50i, 80i, Ni-E, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	No	2 mm / 200 step
HE38E50	Nikon 50i, 80i, Ni-E, Ni-U, Ni-L, Ci-E, Ci-L, Ci-S	Yes	2 mm / 200 step
H138E80	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	No	2 mm / 200 step
HE38E80	Nikon 80i, 90i, Ni-E, Ni-U, Ni-L	Yes	2 mm / 200 step
H138AZEP	Nikon AZ100	No	2 mm / 200 step
HE38AZEP	Nikon AZ100	Yes	2 mm / 200 step
H138NLV	Nikon LV100ND, LV100NDA, LV150N, LV150NA	No	2 mm / 200 step
HE38NLV	LV100ND, LV100NDA, LV150N, LV150NA	Yes	2 mm / 200 step
H138BX	Evident/Olympus BX51, BX61, BX53, BX53M, SZX Series	No	2 mm / 200 step
HE38BX	Evident/Olympus BX51, BX61, BX53, BX53M, SZX Series	Yes	2 mm / 200 step
H138AXIM	Zeiss Axio Examiner, Axioimager 1, Axioimager 2	No	2 mm / 200 step
HE38AXIM	Zeiss Axio Examiner, Axioimager 1, Axioimager 2	Yes	2 mm / 200 step
H138DMLS	Leica DMLS, DMR, DM4000, DM5000, DM6000, DM6	No	2 mm / 200 step
HE38DMLS	Leica DMLS, DMR, DM4000, DM5000, DM6000, DM6	Yes	2 mm / 200 step

Typical combination for slide scanning

Platform	Evident/Olympus BX53	Zeiss Axioimager 2
Stage	H138BX	H138AXIM
Controller	V31XYZ ProScan III Controller	V31XYZE ProScan III Controller for encoded stages
Joystick	CS200XY ergonomic XY joystick	
Sample holders	H238LP 8 slide holder	

ProScan® H117 stage for inverted microscopes

Key Features



Travel Range
114 mm x 75 mm



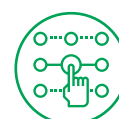
Adaptable
Directly compatible with most major microscope brands.



Efficient Design
Flat top design facilitates easy sample loading.



Exceptional Performance
Default configuration optimized for resolution and repeatability.



Flexible
Works with piezo stages, stage top incubators and other peripherals.

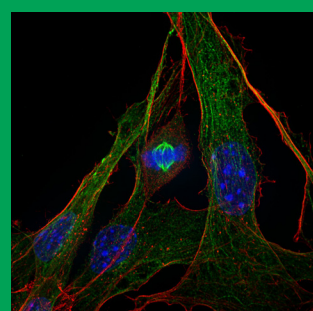
The ProScan H117 motorized XY stages are compatible with Nikon, Evident/Olympus, Zeiss, Leica, and Accuscope inverted microscopes and Prior's OpenStand-V imaging platform.

The stages offer exceptional stability and high-resolution movements making them ideal for experiments that require precise movements, such as well plate scanning or time-lapse imaging.

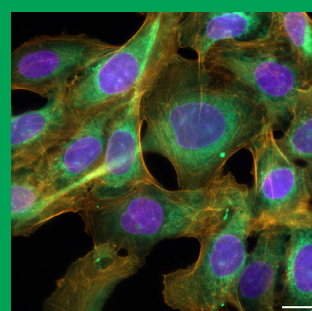
A flat top plate allows easy access to the sample for loading, compatibility with many stage-top incubation systems, and enables the use of peripheral equipment around the sample for complex imaging operations.

Whilst typically configured with a 1 mm screw pitch and 400 step motor for maximum resolution, the stages are also available with a 2 mm screw pitch and 200 step motor for applications requiring higher throughput.

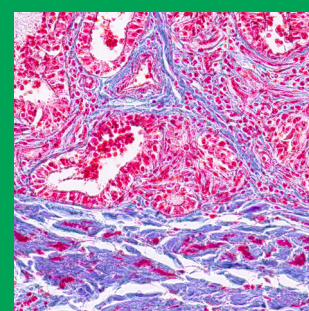
Applications



Confocal and super-resolution microscopy



Fluorescence microscopy



Slide scanning

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H117P1N4	Nikon Ti-U, Ti-E, Ti2-A, Ti2-U, Ti2-E, Ts2R TE2000	No	1 mm / 400 step
H117E1N4	Nikon Ti-U, Ti-E, Ti2-A, Ti2-U, Ti2-E, Ts2R TE2000	Yes	1 mm / 400 step
H117N1E4	Evident/Olympus IX85	No	1 mm / 400 step
H117E1E4	Evident/Olympus IX85	Yes	1 mm / 400 step
H117N2E2	Evident/Olympus IX85	No	1 mm / 200 step
H117E2E2	Evident/Olympus IX85	Yes	1 mm / 200 step
H117P1I4	Evident/Olympus IX71, IX81	No	1 mm / 400 step
H117E1I4	Evident/Olympus IX71, IX81	Yes	1 mm / 400 step
H117N1XD	Evident/Olympus IX71, IX73, IX83	No	1 mm / 400 step
H117E1XD	Evident/Olympus IX71, IX73, IX83	Yes	1 mm / 400 step
H117P1L4	Zeiss Axio Observer 7 Accuscope EXI-600	No	1 mm / 400 step
H117E1L4	Zeiss Axio Observer 7, Accuscope EXI-600	Yes	1 mm / 400 step
H117P1D4	Leica DMI8, DMIR, DMI4000, DMI5000, DMI6000B	No	1 mm / 400 step
H117E1D4	Leica DMI8, DMIR, DMI4000, DMI5000, DMI6000B	Yes	1 mm / 400 step

Typical combination for well plate scanning

Platform	Evident/Olympus IX85	Leica DMI8
Stage	H117N1E4	H117E1D4
Controller	V31XYZ ProScan III Controller	V31XYZE ProScan III Controller for encoded stages
Joystick	CS200XY Ergonomic XY Joystick	
Sample holders	H223XRNC Well plate holder	

ProScan® HLD117 stage for inverted microscopes

Key Features



Travel Range
121 mm x 81 mm



Fast, Accurate, Repeatable
Highest speed, resolution and repeatability of any non-piezo Prior stage.



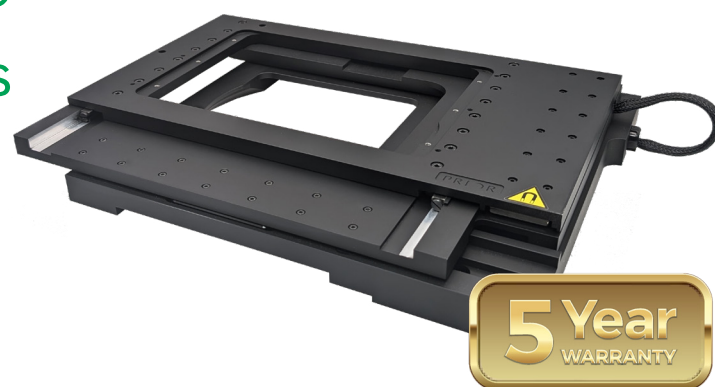
Smooth and Quiet
Ultra quiet and smooth operation even at high speeds of up to 300 mm/s.



Compatibility
Works with Evident/Olympus and Nikon microscopes and software.



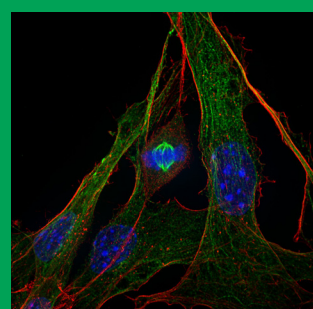
Works With Piezo Stages
Directly compatible with NanoScan SP series piezo stages.



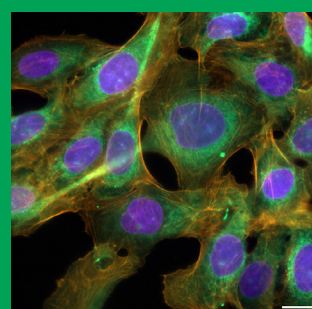
The HLD117 stages are adapted for Nikon and Evident/Olympus inverted research microscopes. They are also suitable for OEM devices and customized research applications. These stages are the most accurate and repeatable stage Prior offers providing controlled constant velocity for continuous motion scanning or stitch mosaicing. They are suitable for long-term time-lapse imaging, high-content screening, and point-to-point imaging.

The stages use low-friction linear drives for exceptional acceleration and deceleration, and operate at higher speeds than stepper motor stages. They feature 50 nm linear encoders for enhanced long-range accuracy and linearity. The flat top plate allows easy access to the sample for loading and ensures compatibility with a wide range of optics.

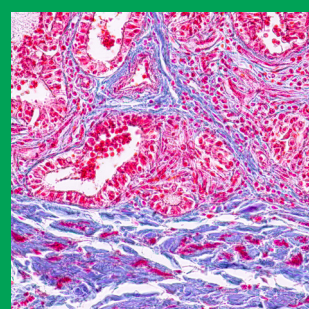
Applications



Confocal and super-resolution microscopy



Fluorescence microscopy



Slide scanning

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
HLD117NN	Nikon Ti-U, Ti-E, Ti2-U, Ti2-A, Ti2-E	Yes	High precision linear DC servo
HLD117IX	Evident/Olympus IX73, IX83, IX85	Yes	High precision linear DC servo

Typical combination for confocal microscopy

Platform	Evident/Olympus IX83	Nikon Ti2-U
Stage	HLD117IX	HLD117NN
Controller	VLD31XYZG ProScan III Controller	
Joystick	CS200XY Ergonomic XY Joystick	
Sample holders	H473XR universal sample holder	HLD324 adapter plate H473XR universal sample holder

ProScan® H105 stage for upright microscopes

Key Features



Travel Range
154 mm x 154 mm



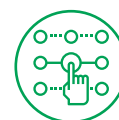
Easy Integration
Suitable for customized imaging solutions and OEM projects.



Fast and Accurate
Excellent combination of speed and resolution.



6-inch Travel
Supports 6-inch semiconductor wafers and industrial samples.



User-friendly Design
Easy access to samples and loading for a wide range of optics.

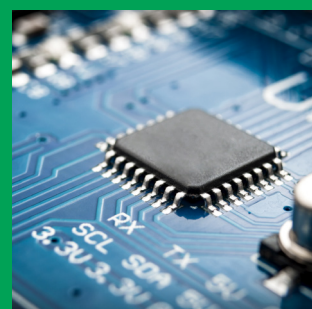


The ProScan H105 motorized XY stages are designed for upright industrial microscopy and are compatible with the Prior OpenStand platform and Nikon, Evident/Olympus and Zeiss microscopes.

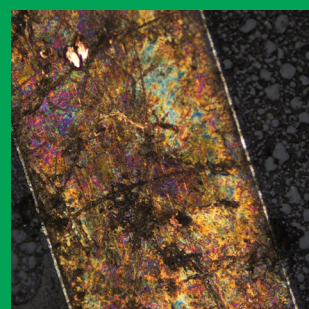
With 154 mm x 154 mm XY travel, these stages are optimized for scanning 6-inch semiconductor wafers. The slim design enables use in transmitted light applications.

The H105 stages features Prior's patented Intelligent Scanning Technology (IST) to enhance accuracy and linearity together with a 2 mm ballscrew for speed to cover large surface areas quickly for fast, efficient scanning.

Applications



Industrial imaging



Metrology



Semiconductor inspection

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H105/2U	Prior OpenStand-L, OpenStand-U, OpenStand-M	No	2mm / 200 step
HE05/2U	Prior OpenStand-L, OpenStand-U, OpenStand-M	Yes	2mm / 200 step
H105/2U (Nikon)	Nikon L200N, L200ND, L300N, L300ND, SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1500	No	2mm / 200 step
HE05/2U (Nikon)	Nikon L200N, L200ND, L300N, L300ND, SMZ18, SMZ25, SMZ800, SMZ1000, SMZ1270, SMZ1500	Yes	2mm / 200 step
H105/20L	Evident/Olympus MX50, MX51, MX61, MX61L, MX63, MX63L	No	2mm / 200 step
HE05/20L	Evident/Olympus MX50, MX51, MX61, MX61L, MX63, MX63L	Yes	2mm / 200 step
H105/2ZL	Zeiss Axiotron 2	No	2mm / 200 step
HE05/2ZL	Zeiss Axiotron 2	Yes	2mm / 200 step

Typical combination for semiconductor inspection

Platform	Evident/Olympus MX63	Zeiss Axiotron 2
Stage	H105/20L	HE05/2ZL
Controller	V31XYZ ProScan III Controller	V31XYZE ProScan III Controller for encoded stages
Joystick	CS200XY Ergonomic XY Joystick	
Sample holders	HWC15V 6-inch wafer chuck with vacuum tubing	

ProScan® H105NL/2 stage for upright microscopes

Key Features



Travel Range
154 mm x 154 mm



Versatile
Directly compatible with upright and metrology microscopes.



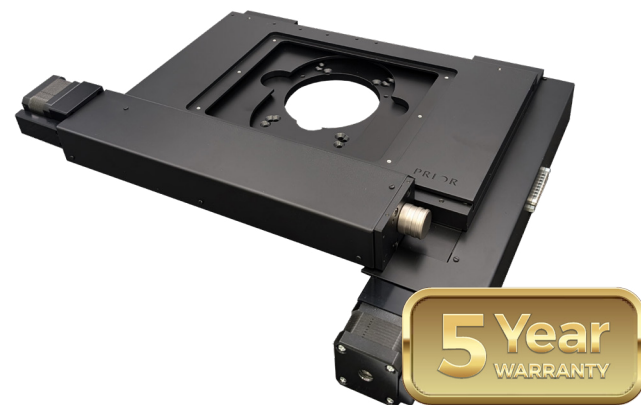
Reliable and Efficient
Enhanced accuracy, linearity and speed for scanning industrial samples.



6-inch Travel
Supports 6-inch wafers on small industrial microscopes.



Customizable
Additional clearance for easy integration into customized systems.

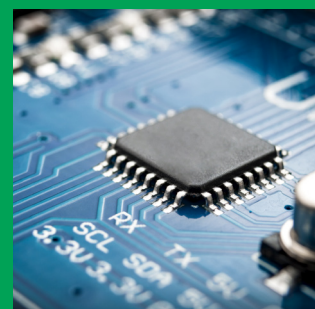


The ProScan H105NL/2 motorized XY stage is compatible with Nikon LV100 and LV150 upright microscopes.

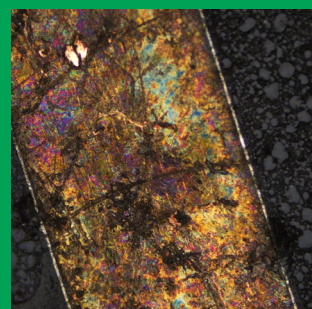
It is optimized for scanning 6-inch semiconductor wafers and other industrial samples. This travel range and high-precision motorized control are normally only available on larger systems.

The H105NL/2 features Prior's patented Intelligent Scanning Technology (IST) to enhance accuracy and linearity together with a 2 mm ballscrew for speed.

Applications



Industrial imaging



Metrology



Semiconductor inspection

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H105NL/2	Prior OpenStand-U, OpenStand-M	No	2 mm / 200 step
H105NL/2 (Nikon)	Nikon LV100ND, LV100NDA, LV150N, LV150NA	No	2 mm / 200 step

Typical combination for industrial imaging

Platform	Nikon LV100D
Stage	H105NL/2
Controller	V31XYZ ProScan III Controller
Joystick	CS200XY Ergonomic XY Joystick
Sample holders	H231NL aluminium plate H227NL glass plate

ProScan® H105N2F stage for upright microscopes

Key Features



Travel Range
154 mm x 154 mm



User-friendly Design
A slim profile with a completely flat top plate allows easy access to the sample.



Reliable and Efficient
Intelligent Scanning Technology™ optimizes performance.



Optimized Scanning
Supports 6-inch semiconductor wafers and other industrial samples.



OEM Only
Available for contract order, OpenStand systems or OEM customers only.

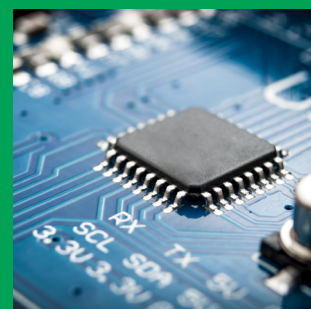


The ProScan H105N2F is a motorized XY flat-top stage optimized for scanning 6-inch semiconductor wafers and other industrial samples reliably and efficiently.

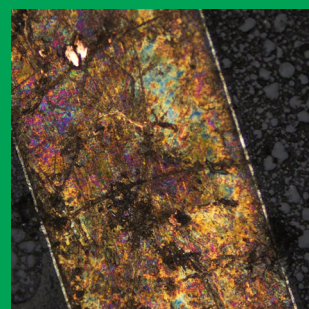
It is fully customizable for integration into OEM devices but also mounts directly onto Nikon and Evident/Olympus industrial microscopes and Prior OpenStand platform.

Its flat top plate allows easy access to the sample for loading and ensures compatibility with a wide range of optics. Prior's patented Intelligent Scanning Technology (IST) to enhance accuracy and linearity, together with a 2 mm ballscrew for speed.

Applications



Industrial imaging



Metrology



Semiconductor inspection

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H105N2F	Prior OpenStand-L, OpenStand-U, OpenStand-M	No	2 mm / 200 step
H105E2F	Prior OpenStand-L, OpenStand-U, OpenStand-M	Yes	2 mm / 200 step
H105N2F (Nikon)	Nikon L200N, L200ND, L300N, L300ND	No	2 mm / 200 step
H105E2F (Nikon)	Nikon L200N, L200ND, L300N, L300ND	Yes	2 mm / 200 step
H105N20L	Evident/Olympus MX61, MX61L, MX63, MX63L	No	2 mm / 200 step
H105E20L	Evident/Olympus MX61, MX61L, MX63, MX63L	Yes	2 mm / 200 step

Typical combination for semiconductor inspection

Platform	Evident/Olympus MX63	Nikon L300ND
Stage	H105N20L	H105E2F (Nikon)
Controller	V31XYZ ProScan III Controller	V31XYZE ProScan III Controller for encoded stages
Joystick	CS200XY Ergonomic XY Joystick	
Sample holders	HWC15V 6-inch wafer chuck with vacuum tubing	

ProScan® H116 stage for upright microscopes

Key Features



Travel Range
255 mm x 215 mm



Easy Integration
Slim design for customized imaging solutions and OEM projects.



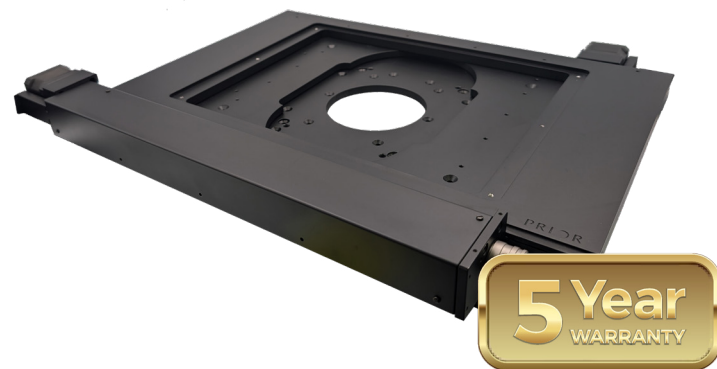
Optimized Performance
Enhanced accuracy and linearity with Intelligent Scanning Technology™.



Heavy Samples
25 kg load capacity for large heavy samples.



8-inch Wafers
Wafer inspection, with extra X-axis travel range for easy sample loading.

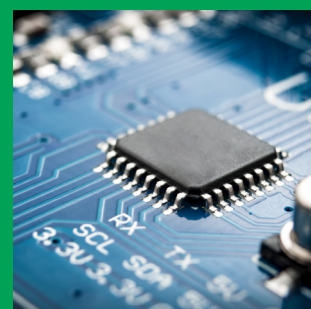


The ProScan H116 motorized XY stages for upright industrial microscopy are compatible with Prior's OpenStand-L platform and are fully customizable. The stages are compatible with transmitted light applications and provide easy access for loading samples.

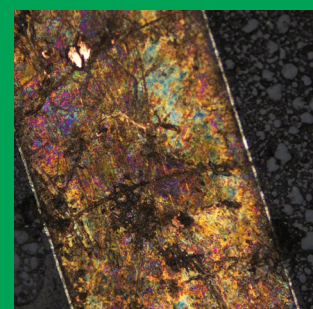
They have a long travel range and 25 kg load capacity for scanning large heavy samples reliably and efficiently, including 8-inch semiconductor wafers, flat panel displays and printed circuit boards up to 200 mm in diameter.

The H116 features Prior's patented Intelligent Scanning Technology (IST) to enhance accuracy and linearity together with a 2 mm ballscrew for speed. The encoded stage option features linear encoders for exceptional long-range repeatability. Other drive configurations for increased speed may be available based on your region.

Applications



Industrial imaging



Metrology



Semiconductor inspection

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H116/2	Prior OpenStand-L	No	2 mm / 200 step
HE16/2	Prior OpenStand-L	Yes	2 mm / 200 step
H116/2 (Nikon)	Nikon L300N, L300ND	No	2 mm / 200 step
HE16/2 (Nikon)	Nikon L300N, L300ND	Yes	2 mm / 200 step
H116/2-8	Nikon L200N, L200ND	No	2 mm / 200 step
HE16/2-8	Nikon L200N, L200ND	Yes	2 mm / 200 step
H116/20L	Evident/Olympus MX61, MX61L, MX63, MX63L	No	2 mm / 200 step
HE16/20L	Evident/Olympus MX61, MX61L, MX63, MX63L	Yes	2 mm / 200 step

Typical combination for semiconductor inspection

Platform	Nikon L200N	Evident/Olympus MX63L
Stage	H116/2-8	HE16/20L
Controller	V31XYZ ProScan III Controller	V31XYZE ProScan III Controller
Joystick	CS200XY Ergonomic XY Joystick	
Sample holders	HWC20V 8-inch wafer chuck with vacuum tubing	

ProScan® H112 stage for upright microscopes

Key Features



Travel Range
302 mm x 302 mm



12-inch Travel
Supports semiconductor applications
and enhanced long range repeatability.



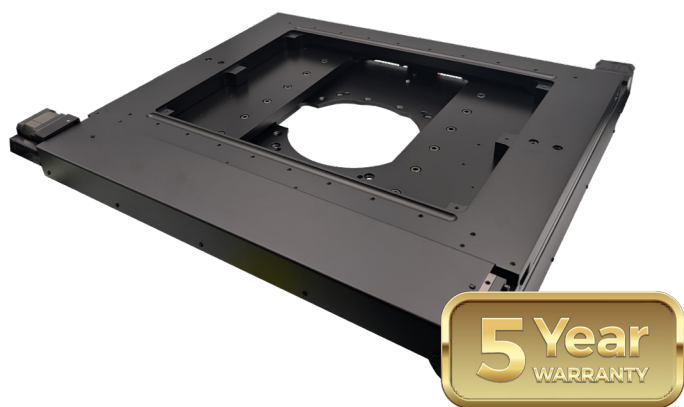
Fast and Accurate
Enhanced accuracy and linearity with
a 2 mm ballscrew for speed.



Illumination
Compatible with transmitted light
applications.



Efficient Design
Lightweight and slim design
facilitates easy integration.

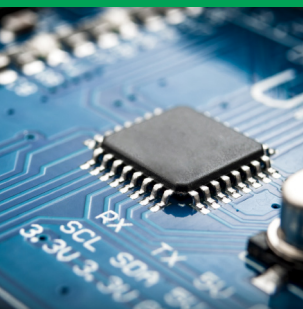


The H112 motorized XY stage is compatible with Nikon and Evident/Olympus upright industrial microscopes, Prior's OpenStand-L, and is easily integrated into custom microscopes.

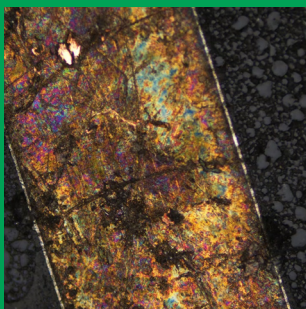
The stage is designed for scanning large areas such as 12-inch semiconductor wafers, flat panel displays, and printed circuit boards.

It offers the longest travel range of any of Prior's XY stages and also suits scanning heavy samples with a maximum load capacity of 25 kg.

Applications



Industrial imaging



Metrology



Semiconductor inspection

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H112/2ST	Prior OpenStand-L Nikon L300N, L300ND Evident/Olympus MX61L, MX63L	No	2 mm / 200 step
HE12/2ST	Prior OpenStand-L Nikon L300N, L300ND Evident/Olympus MX61L, MX63L	Yes	2 mm / 200 step

Typical combination for semiconductor inspection

Platform	Evident/Olympus MX63L	Nikon L300N
Stage	H112/2ST	HE12/2ST
Controller	V31XYZ ProScan III Controller	V31XYZE ProScan III Controller for encoded stages
Joystick	CS200XY Ergonomic XY Joystick	
Sample holders	HWC30V 12-inch wafer chuck with vacuum tubing	

ProScan® H117N1M4 stage for Nikon MA200

Key Features



Travel Range
114 mm x 75 mm



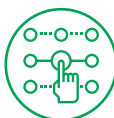
Compact Design for MA200
Flat top facilitates easy sample loading and mounting position for circular Nikon sample mounts.



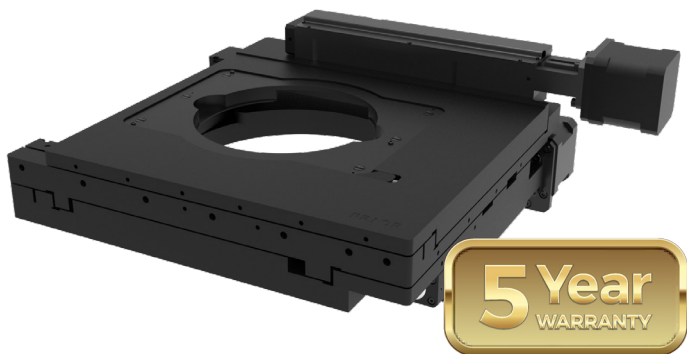
Stitching Large Images
High step resolution for industrial samples at high magnification.



Exceptional Performance
Default configuration optimized for resolution and repeatability.



Precise Positioning
Ideal for keeping features of interest at the centre of the field of view.

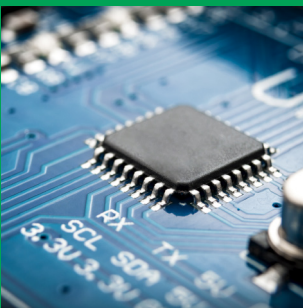


The ProScan H117N1M4 motorized XY stage is compatible with the Nikon MA200 inverted microscope.

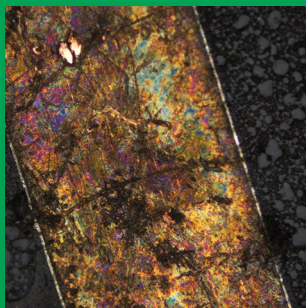
The stage features a mounting position for circular Nikon sample mounts and is designed to be compact to match the design of the MA200 frame.

It uses a 1 mm ballscrew, 400-step motor drive configuration to provide high step resolution. This makes the H117N1M4 a good choice for stitching large images of industrial samples at high magnification.

Applications



Industrial imaging



Metrology

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
H117N1M4	Nikon MA200	No	1 mm / 400 step
H117E1M4	Nikon MA200	Yes	1 mm / 400 step

Typical combination for metrology

Platform	Nikon MA200	
Stage	H117N1M4	H117E1M4
Controller	V31XYZ ProScan III Controller	V31XYZE ProScan III Controller for encoded stages
Joystick	CS200XY Ergonomic XY Joystick	
Sample holders	H649 industrial sample holder	

ProScan® HT1111LC

industrial stage

Key Features



Travel Range
108 mm x 108 mm



Integration Support
Full DLL/SDK available for use with OEM software integration.



Fast and Accurate
Optimized for accuracy and linearity.



Heavy Loads
Supports up to 100 kg mass or point load.



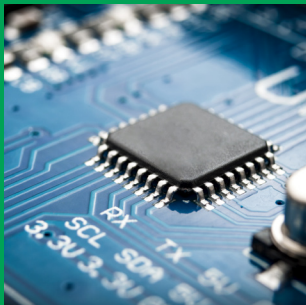
Resilient Design
Tough, scratch resistant coating.



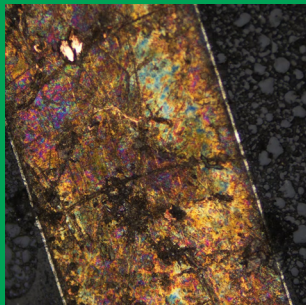
The HT1111LC industrial hardness testing XY stage can withstand point loads of up to 100 kg without compromising its positioning performance.

This high load capacity makes it well suited to other heavy-duty industrial applications or as a microscope translation stage.

Applications



Industrial imaging



Metrology

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
HT1111LC	Prior OpenStand-U, OpenStand-L, OpenStand-M	No	2 mm / 400 step

Typical combination for industrial imaging

Platform	OpenStand-U	
Stage	HT1111LC	
Controller	V31XYZ ProScan III Controller	V31XYZE ProScan III Controller for encoded stages
Joystick	CS200XY Ergonomic XY Joystick	
Sample holders	H230B aluminum plate with M4/M6 hole pattern	

ProScan® HT11 Series heavy duty stages

Key Features



Travel Range
108 mm x 108 mm



Heavy Duty Applications
Suitable for whole animal imaging and customized industrial assemblies.



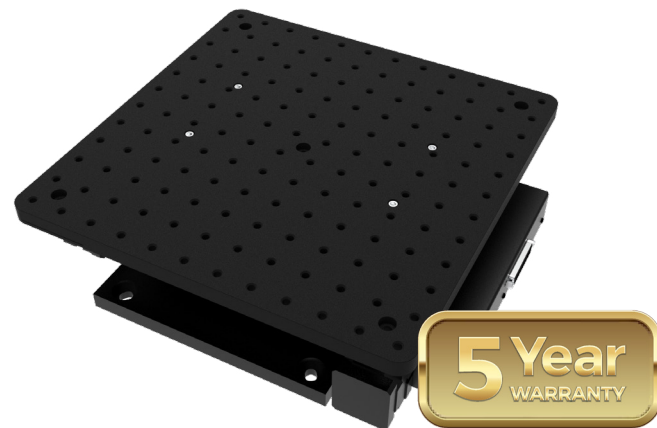
Supports Large Loads
Load capacity of up to 100 kg enables complex equipment to be translated.



Large Surface Areas
300 x 300 mm or 600 x 600 mm M6 tapped breadboard top plate.



Compatibility
Mounts directly to M6 or ¼-20 breadboards.

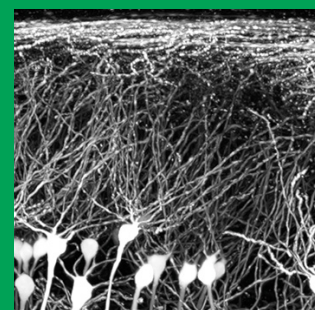


The HT11 Series is ideal for automated XY scanning of larger samples and is underpinned by the technology from Prior's hardness testing stages.

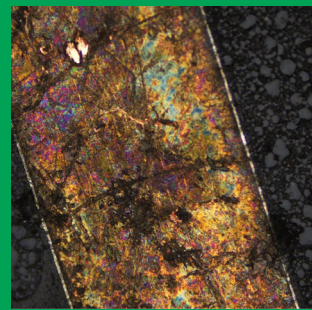
The HT11300KT and HT11600KT have surface areas of 300 x 300 mm and 600 x 600 mm respectively, with both capable of supporting loads of up to 100 kg to enable large and complex equipment to be translated.

The HT11600KT is also directly compatible with live animal neuroscience equipment, including the Neurotar Mobile HomeCage Large.

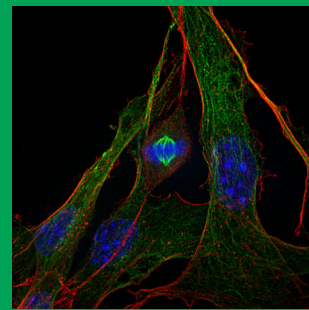
Applications



Physiology



Metrology



Confocal and super-resolution microscopy

Specifications



Order codes and compatibility

Part number	Compatibility	Encoding	Drive configuration [screw pitch / motor]
HT11300KT	Prior OpenStand-L Evident/Olympus FVMPE	No	2 mm / 400 step
HT11600KT	Evident/Olympus FVMPE	No	2 mm / 400 step

Typical combination for physiology

Platform	Evident/Olympus FVMPE
Stage	HT11300KT
Controller	V31XYZ ProScan III Controller
Joystick	CS200XY Ergonomic XY Joystick

Discover more...



Queensgate Nanopositioning

Piezo-driven, flexure guided positioning stages for high-speed, high precision applications.



Prior OpenStand

Customized optical systems that evolve with development work. Fast-track platforms for prototyping and proof concept.



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