

AC500-S safety PLC

Now fully supported under AC500 V3 platform with Automation Builder 2.6



AC500-S safety PLC is an integrated safety package scalable from a single safety product to complex safety solutions up to SIL 3 and PL e. With Automation Builder 2.6, all AC500-S safety PLC functionality is supported on AC500 V3 CPUs, including the SM560-S-FD-1 and SM560-S-FD-4 safety CPUs.



Seamless look and feel throughout the entire AC500 engineering

The entire AC500-S safety engineering has undergone a restyle to further enhance the experience of an integrated system solution. The new look and feel gives an instant feeling throughout the entire AC500 engineering and development process.

AC500-S Programming Tool

The newly designed programming environment comprises exactly the same functionality as the previous versions.

ABB's unique and longtime life-cycle policy is fulfilled and seamlessly maintained, with full backwards compatibility to support previously installed AC500-S safety applications.

This comprehensive restyle secures the experience from development to a hassle-free and safe ownership and further improves functional safety programming usability.



AC500-S Programming Tool

Provides advanced and integrated safety features for an effective development environment. It uses basic to advanced safety programming features in combination with a PLCopen safety function block library alongside enhancing real-time advanced safety communication.

Safety programming in Structured Text alongside FBD and LD

Programming in Structured Text is essential for simplifying PLC engineering when developing advanced safety applications such as safe positioning.

Safety floating-point and safety trigonometric calculation

Provides faster and more precise calculations to accelerate the development of safety solutions, which in turn improves machine precision and increases productivity when developing safety applications such as restricted safety areas.

Enhanced flexibility with PROFINET/PROFIsafe

Facilitates high-volume, real-time safety data exchange between controller and device as well as controller and controller over wired and open 5G and Wi-Fi technologies. This simplifies the development of advanced safety applications such as collision avoidance in driverless vehicles.

[Material handling brochure](#)



[Material handling video](#)



[AC500-S safety products](#)



[Functional safety with AC500-S](#)

