

AD SR1

MAIN FEATURES

The AD SR1 safety interface is the dedicated interface system between **EOS4 A**, **EOS2 A**, **Admiral AD**, **Admiral AX BK** and **Vision V** safety light curtains, equipped with solid state self-controlled safety outputs, and the control circuits of the machine.

AD SR1 is equipped with **relay** outputs and makes it possible to have auxiliary safety functions such as **Start/Restart interlock** and **EDM** (External Device Monitoring).



TECHNICAL FEATURES

Model	AD SR1
Safety level	Type 4 according to IEC/TS 61496-2 SIL 3 – SILCL 3 according to IEC 61508 - IEC 62061 PL e – Cat. 4 according to ISO 13849-1
Two-channel inputs for safety light curtains	1
Safety relay outputs	2 NO - 2 A 250 Vac
Response time (ms)	≤ 20
Start/Restart*	manual or automatic Start/Restart selectable on terminal block
External Device Monitoring	external relay control feedback input, selectable
Signalling	LED indication of input/output status and diagnosis
Power supply (Vdc)	24 ± 20%
Electrical connections	on terminal blocks
Operating temperature (°C)	0 ÷ 55
Protection rating	IP 20 for housing IP 2X for terminal blocks
Fastening	rail fastening according to EN 50022-35 standard
Dimensions - h x w x d (mm)	99 x 22,5 x 114

ORDERING INFORMATION (for ordering codes see page 194)

Each AD SR1 safety interface includes:

- Multi-language instruction manual complete with CE declaration of conformity

Safety level: **Type 4 – SIL 3 – SILCL 3 – PL e – Cat. 4**

- 2006/42/EC "Machinery Directive"
- 2004/108/EC " Electromagnetic Compatibility (EMC)"
- 2006/95/EC "Low Voltage Directive (LVD)"
- IEC/EN 61496-1 Ed. 2.1 and IEC/TS 61496-2 Ed. 2 " Safety of machinery - Electro-sensitive protective equipment- General requirements and tests"
- EN ISO 13849-1 "Safety of machinery – Safety-related parts of control systems – Part 1: General principles for design"
- IEC/EN 62061 "Safety of machinery – Functional safety of safety-related electrical, electronic and programmable electronic control systems"
- IEC 61508 "Functional safety of electrical/electronic/programmable electronic safety-related systems"
- IEC/TS 62046 Ed. 2 "Safety of machinery – Application of protective equipment to detect the presence of persons"
- UL (C+US) mark for USA and Canada.



* Safe Start/Restart command according to IEC 61496-1

AD SRM

MAIN FEATURES

The AD SRM safety interface with built-in **Muting** function can be combined with **EOS4, EOS2, Admiral, Vision**, and **Janus** safety light curtains of any resolution and protected height, as well as with the Pharo safety laser scanner.

AD SRM operates with **2 Muting sensors** with simultaneity logic and is equipped with selectable Muting Timeout, **Override** function (with timeout), Muting Enable input, system status signalling output, and all the characteristics necessary for realising Muting protection in compliance with the **most updated regulatory requirements**.

AD SRM also makes it possible to have **auxiliary safety functions** such as **Start/Restart interlock** and **EDM** (External Device Monitoring).



TECHNICAL FEATURES

Model	AD SRM
Safety level	Type 4 according to IEC/TS 61496-2 SIL 3 – SILCL 3 according to IEC 61508 - IEC 62061 PL e – Cat. 4 according to ISO 13849-1
Two-channel inputs for safety light curtains	1
Inputs for Muting sensors	2 - 24 Vdc – PNP or relay – dark-on
Muting Enable input	24 Vdc – PNP or relay
Safety relay outputs	2 NO - 2A 250 Vac
Safety system status indicator output	PNP – 100 mA at 24 Vdc
Muting lamp output	24 Vdc - 0.5-5 W
Response time (ms)	≤ 20
Start/Restart*	manual or automatic Start/Restart selectable on terminal block
External Device Monitoring	external relay control feedback input, selectable
Signalling	LED indications of input/output status, Muting sensor inputs, diagnosis
Muting timeout	30 sec. or infinite, selectable
Override	2 operating modes selectable : - manual action with hold to run - automatic with pulse command
Override timeout min	15.
Power supply (Vdc)	24 ± 20%
Electrical connections	On terminal block
Operating temperature (°C)	0 ÷ 55
Protection rating	IP 20 for housing - IP 2X for terminal block
Fastening	rail fastening according to EN 50022-35 standard
Dimensions - h x w x d (mm)	99 x 35 x 114

ORDERING INFORMATION (for ordering codes see page 194)

Each AD SRM safety interface includes:

- Multi-language instruction manual complete with CE declaration of conformity

Safety level:

Type **4**SIL 3 – SILCL 3
PL e – Cat. 4

* Safe Start/Restart command according to IEC 61496-1

AU SX

MAIN FEATURES

The AU SX control unit, combined with the safety photocells **Ilion** or **Ulisse**, forms a Type 2 optoelectronic safety system that can include from 1 to 4 photocells.

AU SX is equipped with **relay** outputs and makes it possible to have auxiliary safety functions such as **Start/Restart interlock** - with control of the Restart contact - and **EDM** (External Device Monitoring).

Autotest every 5 seconds.



TECHNICAL FEATURES

Model	AU SX
Safety level	Type 2 according to IEC/TS 61496-2 SIL 2 – SILCL 2 according to IEC 61508 - IEC 62061 PL d – Cat. 2 according to ISO 13849-1
Number of photocells	1 ÷ 4
Safety relay outputs	2 NO - 2 A 250 Vac
Safety system status indicator output	PNP – 100 mA at 24 Vdc
Response time (ms)	≤ 30
Start/Restart*	manual or automatic Start/Restart selectable on terminal block
External Device Monitoring	external relay control feedback input, selectable
Signalling	LED indication of input/output status and diagnosis
Power supply (Vdc)	24 ± 20%
Electrical connections	on terminal block
Operating temperature (°C)	0 ÷ 55
Protection rating	IP 20 for housing - IP 2X for terminal block
Fastening	rail fastening according to EN 50022-35 standard
Dimensions - h x w x d (mm)	99 x 22,5 x 114

ORDERING INFORMATION (for ordering codes see page 194)

Each AU SX module includes:

- Multi-language instruction manual complete with CE declaration of conformity

Safety level: **Type 2 – SIL 2 - SILCL 2 - PL d - Cat. 2**

(with ILION or ULISSE photocells)

- 2006/42/EC "Machinery Directive"
- 2004/108/EC " Electromagnetic Compatibility (EMC)"
- 2006/95/EC "Low Voltage Directive (LVD)"
- IEC/EN 61496-1 Ed. 2.1 and IEC/TS 61496-2 Ed. 2 " Safety of machinery - Electro-sensitive protective equipment- General requirements and tests"
- EN ISO 13849-1 "Safety of machinery – Safety-related parts of control systems – Part 1: General principles for design"
- IEC/EN 62061 "Safety of machinery – Functional safety of safety-related electrical, electronic and programmable electronic control systems"
- IEC 61508 "Functional safety of electrical/electronic/programmable electronic safety-related systems"
- IEC/TS 62046 Ed. 2 "Safety of machinery – Application of protective equipment to detect the presence of persons"
- UL (C+US) mark for USA and Canada.



* Safe Start/Restart command according to IEC 61496-1

AU SXM

MAIN FEATURES

The AUS XM control unit with built-in **Muting function**, combined with the safety photocells **Ilion** or **Ulisse** forms a Type 2 optoelectronic safety system that can include from 1 to 4 photocells.

AU SXM operates with **2 Muting sensors** with simultaneity logic and is equipped with selectable Muting Timeout, **Override** function (with timeout), Muting Enable input, system status signalling output, and all the characteristics necessary for realising Muting protection in compliance with the **most updated regulatory requirements**.

AU SXM, equipped with relay outputs, also makes it possible to have **auxiliary safety functions** such as **Start/Restart interlock** - with control of the Restart contact - and **EDM** (External Device Monitoring).

Autotest every 5 seconds.



TECHNICAL FEATURES

Model	AU SXM
Safety level	Type 2 according to IEC/TS 61496-2 SIL 2 – SILCL 2 according to IEC 61508 - IEC 62061 PL d – Cat. 2 according to ISO 13849-1
Number of photocells	1 ÷ 4
Inputs for Muting sensors	2 - 24 Vdc – PNP or relay – dark-on
Muting Enable input	24 Vdc – PNP or relay
Safety relay outputs	2 NO - 2A 250 Vac
Safety system status indicator output	PNP – 100 mA at 24 Vdc
Muting lamp output	24 Vdc - 0.5-5 W
Muting timeout	30 sec. or infinite, selectable
Override	2 operating modes selectable : - manual action with hold to run - automatic with pulse command
Override timeout (min)	15
Response time (ms)	≤ 30
Start/Restart*	manual or automatic Start/Restart selectable on terminal block
External Device Monitoring	external relay control feedback input, selectable
Signalling	LED indications of input/output status, Muting sensor inputs, diagnosis
Power supply (Vdc)	24 ± 20%
Electrical connections	on terminal blocks
Operating temperature (°C)	0 ÷ 55
Protection rating	IP 20 for housing - IP 2X for terminal blocks
Fastening	rail fastening according to EN 50022-35 standard
Dimensions - h x w x d (mm)	99 x 35 x 114

ORDERING INFORMATION (for ordering codes see page 194)

Each AU SXM module includes:

- Multi-language instruction manual complete with CE declaration of conformity

Safety level:

Type 2

**SIL 2 – SILCL 2
PL d – Cat. 2**

* Safe Start/Restart command according to IEC 61496-1

AD SRO – AD SROA

MAIN FEATURES

The AD SRO and AD SROA relay modules have been especially designed for **interfacing EOS4 X, EOS2 X, Admiral AX, Vision VX/VXL/MXL, Janus** safety light curtains and the **Pharo** safety laser scanner, equipped with **EDM** (External Device Monitoring) feedback input, with the control circuits of the machine.

The module operates with **2 guided contacts relays for safety applications**, driven and monitored directly by the safety sensor.



TECHNICAL FEATURES

Model	AD SRO	AD SROA
Safety relay outputs	2 NO + 1 NC - 2 A 250 Vac *	2 NO - 2 A 250 Vac
Response time (ms)	≤ 20	
Power supply (Vdc)	24 ± 20%	
Electrical connections	on terminal block	
Operating temperature (°C)	0 ÷ 55	
Protection rating	IP 20 for housing - IP 2X for terminal block	
Fastening	rail fastening according to EN 50022-35 standard	
Dimensions - h x w x d (mm)	101 x 35 x 120	

* In AD SRO safety relay each NO safety output line is interrupted twice by the two relays

ORDERING INFORMATION (for ordering codes see page 194)

Each AD SRO / AD SROA Safety interface includes:

- Multi-language instruction manual complete with CE declaration of conformity



WARNING!

AD SRO and AD SROA modules can only be connected to safety sensors equipped with feedback input for monitoring external relays (EDM): EOS4 X, EOS2 X, Janus, Admiral AX (excluding AX BK models with Blanking), Pharo and Vision VX, VXL and MXL ranges.

Please contact Reer for any other type of application.