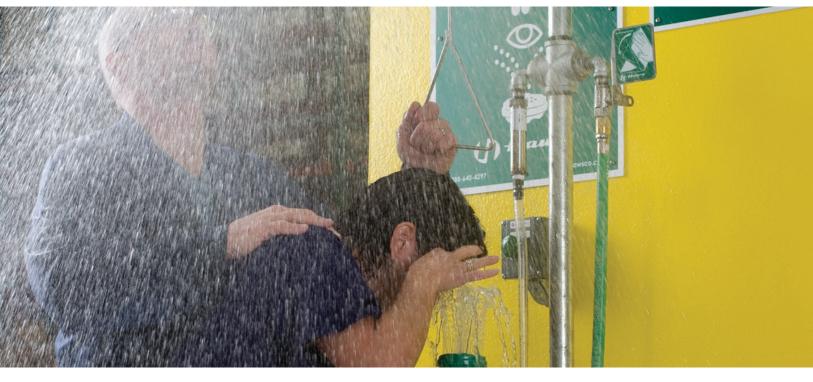
EMERGENCY EQUIPMENT



AXION MSR - MEDICALLY SUPERIOR RESPONSE® PRODUCTS

EYE/FACE WASH :: SHOWERS

COMBINATION UNITS

This catalog represents a small portion of the extensive emergency equipment product line that HAWS CORPORATION® manufactures. Please visit the *Haws* website at www.hawsco.com for a more comprehensive list of products.



ABOUT HAWS®



GLOBAL CUSTOMERS :: GLOBAL VISION :: LOCAL SERVICE

Ingenuity is the *Haws* culture. Every day we work to address your needs and solve your challenges by applying imagination and initiative to make your job easier. *Haws* invents, manufactures and builds standardized and customized emergency response products as well as drinking fountains. With more than 8,000 distribution locations and 250 employees worldwide, we continually focus on quality, service, reliability and complete solution support.

With the invention of the drinking fountain in 1906 by Luther Haws, the Haws Sanitary Drinking Faucet Company formed in 1909 in Berkeley, California. During the 1950's, Haws introduced emergency drench showers and safety eyewashes into its manufacturing line. Establishing headquarters in Sparks, Nevada in 1996, Haws continued expanding, opening global locations Haws AG (Switzerland) in 1985, Haws Manufacturing Pte, Ltd (Singapore) in 1999, and Haws-Avlis (Brazil) in 2001. To this day, Haws Corporation's innovative spirit is driven by third, fourth and fifth generations of the Haws family.

ANSI COMPLIANCE



ARE YOU ANSI COMPLIANT?

EMERGENCY EYEWASH AND SHOWER EQUIPMENT COMPLIANCE

Published by International Safety Equipment Association, ANSI Z358.1 establishes minimum performance and use requirements for eyewash and shower equipment.

SIGNIFICANT REQUIREMENTS FOR SIMULTANEOUS USE INCLUDE:

- Eyewash must deliver a minimum of flushing fluid at 0.4 gallons per minute (1.5L) or 3 gallons per minute (11.4L) for an eye/face wash
- Drench shower must deliver a minimum of 20 gallons of water per minute (75.7L)
- Must be capable of simultaneous use
- Must deliver tepid flushing fluid, defined as 60° -100°F (16° 38°C)

WHY TEPID WATER? Providing The Right Water Temperature Will Provide a Comfortable Flushing Environment and Encourage a Full 15-Minute Flush To:

- Help cool burns
- Help prevent hypothermia
- Help prevent chemical absorption
- Minimize further injury

AXION MSR™



AXION®'s ground-breaking designs continue to change the emergency response landscape by offering the only medically superior response solution in the industry. AXION MSR products provide a complete ANSI compliant safety solution coupled with enhanced victim comfort and injury reduction.

ANSI Z358.1

REQUIRES THAT A CONTROLLED FLOW OF FLUSHING FLUID IS PROVIDED AT A VELOCITY LOW ENOUGH TO BE NON-INJURIOUS TO THE USER (SECTION 6.1.1)

standard eyewash

EYE/FACE WASH

INJURY REDUCTION

Inverted wash streams clear the eye by gently sweeping contaminants away from the eye interior and nasal cavity helping reduce further injury.

INCREASED VICTIM COMFORT

Laminar flow eye/face wash streams provide even, consistent, predictable stream height for greater user comfort, encouraging use for the full 15-minute ANSI Z358.1 requirement.

MEDICALLY SUPERIOR

AXION MSR is the only eye/face wash duplicating the "inside-out" flushing methodology recommended and used by medical professionals.

AXION MSR™



VALVES

INJURY REDUCTION

Redundant anti-scald protection with internal cold water bypass and positive shut off helping reduce further injury.

INCREASED VICTIM COMFORT

Wax-based thermostat technology for fast response time with reliable temperature control.

FAIL-SAFE PROTECTION

Highest cold water bypass flow rate in the industry and lowest internal pressure drop to guarantee functionality.

AXION MSR™:: EYE/FACE WASH



FEATURES & BENEFITS

- Stainless steel bowl with a #2L bright finish or safety green ABS plastic bowl resistant to damage from alkaline, salt solutions, most acids and sun damage
- Integral flow control
- Chrome-plated brass stay-open ball valve with a stainless steel ball and stem
- Signage and dust covers are included with all units
- Units are certified to meet the ANSI Z358.1 Standard for emergency eyewash and shower equipment

Model 7360B-7460B

Wall-mounted eye/face wash includes AXION MSR eye/face wash head assembly. Zero vertical velocity stream engineering with even laminar flow for enhanced victim comfort, stability and effectiveness. Round 11" (28cm) Type 304 stainless steel receptor and aluminum wall bracket for long life. Includes a mesh in-line strainer to collect line debris, and ball valve with stainless steel ball and stem for durability.

Model 7260B-7270B

Wall-mounted eye/face wash and bowl includes the AXION MSR eye/face wash head assembly. Zero vertical velocity stream engineering with even laminar flow. Round 11" (28cm) ABS plastic receptor and aluminum wall bracket. Includes a mesh in-line strainer and ball valve with stainless steel ball and stem.



Model **7324**

Wall-mounted eye/face wash which includes the AXION MSR head assembly. Zero vertical velocity stream engineering with even laminar flow. Chrome-plated brass stay-open ball valve equipped with stainless steel ball and stem, green molded ABS plastic wall bracket, universal sign, and ½" (1.27 cm) inlet. Floor drain is recommended for this unit.



with a stainless steel bowl.

Model 7361-7461.



Pedestal unit, includes a Type 304 stainless steel AXION MSR eye/face wash head. Zero vertical velocity stream engineering with even laminar flow. Features a round 11" (28cm) TYPE 304 stainless steel receptor, stainless steel dust cover and 1-1/4" (3.175 cm) stainless stanchion.



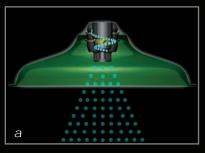
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AXION® :: DRENCH SHOWERS

AXION® NOZZLE

The AXION drench shower nozzle uses the latest in hydrodynamic principles to spin inlet water and break it into smaller, discrete droplets (a). It is designed to minimize the strong physical pressure that drives the water to the outer rim of normal showerheads, making the distribution equal across the entire footprint of the flow (b). This innovative design is featured on a number of shower units providing a comfortable environment by breaking the streams of water into smaller individual droplets.











Model **8122**

AXION drench shower with hydrodynamic shower design. Reduced installation time due to pre-built valve assembly and the ability to mount horizontally or vertically from any wall or ceiling. Solid construction from Schedule 40 hot-dipped galvanized steel make for a durable long-lasting product.



Model **8130**

AXION drench shower with hydrodynamic shower design. Reduced installation time due to pre-built valve assembly and the ability to mount horizontally or vertically from any wall or ceiling. Corrosion resistant Schedule 80 PVC painted safety green.



Model 8111FP

Freeze-protected, wall-mounted drench shower features the AXION showerhead with flow control that delivers dispersed flow for uniform drenching.



Model 8133H

Equipped with Type 304 stainless steel AXION showerhead and features a selfregulating shower stream and universal emergency sign. Reduced installation time due to pre-built valve assembly and unit's ability to be mounted horizontally from any wall.



Model **8123**

AXION hydrodynamic showerhead with Type 304 stainless steel. Universal emergency sign. Vertical or horizontal mount.



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AXION® :: COMBINATION UNITS



Model 8300-8309

Combination shower includes the AXION MSR eye/face wash head assembly, and AXION hydrodynamic shower design. Zero vertical velocity stream engineering with even laminar flow. Features a round 11" (28cm) Type 304 stainless steel bowl. Stainless steel push flag and pull rod, mesh in-line eyewash strainer and ball valves with stainless steel ball and stem. Pipe and fifting: 1-1/4" (3.175 cm). Schedule 40 hot-dipped galvanized steel.



Model 8320-8325

Combination shower includes the AXION MSR eye/face wash head assembly. Features a round 11" (28cm) ABS plastic bowl. Zero vertical velocity stream engineering with even laminar flow. Stainless steel push flag for eyewash activation, stainless steel pull rod for shower activation, mesh in-line eyewash strainer and ball valves with stainless steel ball and stem. Pipe and fifting: 1-1/4" (3.175 cm). Schedule 40 hot-dipped galvanized steel.



Model **8336**

Combination shower includes the AXION MSR eye/face wash head assembly and AXION showerhead. Equipped with Type 316 Stainless Steel ball valves and constructed of PVC pipe and fiftings. Pre-built and fully water/pressure tested. Constructed from corrosion resistant green epoxy finished Schedule 80 PVC.



Model **8330**

AXION MSR eye/face wash head assembly and AXION showerhead, both in stainless steel. In-line 50 x 50 mesh water strainer, 11" (28cm) stainless steel bowl and stainless dust cover. Solid 1-1/4" (3.175 cm) Type 304 Stainless Steel construction.



Model 8317CTFP

Heat-traced combination shower combines an AXION ABS showerhead and AXION MSR eye/face wash head assembly for irrigation. Safety features include: a thermal actuator bleed valve, 120V thermostat cable double wrapped piping, 3/4" (1.905 cm) insulation and outside jacket surrounding piping to prevent freezing down to -30°F (-34.4°C). Top or bottom water supply. Rated Class 1, Division 2.



Model **8317**

Combines the use of an AXION showerhead and AXION MSR eye/face wash. Zero vertical velocity stream engineering with even laminar flow. Solid galvanized-steel construction. Eye/face wash and valve assembly are pre-built and fully water/pressure tested.

AXION® :: COMBINATION UNITS





Model 8300CRP-8309CRP

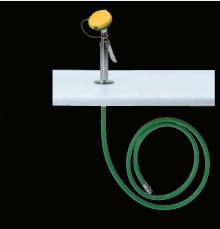
Corrosion-resistant combination shower and eye/face wash features the AXION MSR eye/face wash head assembly and the AXION hydrodynamic shower design. Eyewash streams provide zero vertical velocity stream engineering with even laminar flow. Stainless steel push flag for eyewash activation, stainless steel pull rod for shower activation, mesh in-line eyewash strainer and a round 11" (28cm) Type 304 stainless steel bowl.



Model 8309WC

Barrier-free combination shower eye/face wash, including AXION MSR eye/face wash head assembly. Features a round 11" (28cm) Type 304 stainless steel bowl. Zero vertical velocity stream engineering with even laminar flow. AXION ABS plastic drench showerhead with flow control delivers dispersed flow for uniform drenching. Barrier-free design offers a low profile loop assembly allowing for better wheelchair access as well as a longer pull rod for shower activation.

AXION :: ACCESSIBILITY



Model **8904**

Counter-mounted eye/face wash with AXION eye/face wash and body spray head. Activated with simple squeeze lever operation. 8-foot (244 cm) green hose for extended coverage area to further optimize the irrigation.



Model **8905**

Wall-mounted eye/face wash with AXION eye/face wash and body spray head, and 12-foot (366 cm) yellow recoil hose. Unit is activated with simple squeeze lever operation.



Model 8164

Recessed drench shower with hi-polished stainless steel showerhead and self-regulating shower stream. Reduced installation time as valve assembly is pre-built.









Model **7610**

Barrier-free pull down eye/face wash with AXION MSR head. Easy activation fold-down design. Extended length pull-down arm to accommodate wheelchair access. Activation and deactivation occur at a 30 degree angle limiting splash of water onto counter or wall. Rear mount design allows the sink to remain open to other uses.



Model **7611**

Lab unit is installed in accessible sink locations. AXION MSR eye/face wash head is easily activated by the emergency equipment's swing-out design. Side-mount design allows the unit to be mounted from either side of the sink.



Model 7360BTWC

Barrier-free emergency AXION MSR eye/face wash head assembly. Equipped with an in-line 50 x 50 mesh water strainer and pop off dust cover. Space efficient design allows the unit to be mounted in easily accessible locations while providing a barrier-free installation. The low profile accommodates wheelchair access. Eye/face wash and valve assembly is pre-built and fully water/pressure tested. Unit comes with trap and tailpiece.



wall installation.



=XID∏° advantage™

Haws® Introduces AXION® for All

AXION Advantage is designed to upgrade your facility's emergency eyewash and shower systems. The Medically Superior AXION MSR™ design and technology improves existing emergency equipment with the optimal victim comfort solution while maintaining ANSI compliance.*

Why AXION MSR™?

AXION's revolutionary inverted water flow design sweeps contaminants away from the interior of the eye and the vulnerable nasal cavity making it the only eye/face system that is consistent with standard medical protocols and natural function of the human eye.

Each system includes: an AXION MSR eye/face wash or an AXION MSR eye/face wash and showerhead, connecting hardware options and accessories, complete install instructions, and ANSI Z358.1 compliance and testing guidelines. Proper adaptor will be selected to fit in your current model accordingly.

Model AX13 AXION Advantage eye/face wash upgrade system with green ABS plastic eye/face wash head

Model AX13S AXION Advantage eye/face wash upgrade system with stainless steel eye/face wash head

Model AX14 AXION Advantage eye/face wash upgrade system with green ABS plastic eye/face wash head and showerhead

Model AX14S AXION Advantage eye/face wash upgrade system with stainless steel eye/face wash head and showerhead







AXION MSR offers your facility and users a complete safety solution:

INJURY REDUCTION

Inverted eye/face wash streams clear the eye of foreign liquids by gently sweeping contaminants away from the eye interior and nasal cavity, helping reduce further injury to victims.

INCREASED VICTIM COMFORT

Laminar flow eye/face wash streams provide even, consistent, predictable stream height and circumference for greater user comfort, encouraging use for the full 15-minute ANSI Z358.1 requirement.

ANSI Z358.1 COMPLIANCE

With AXION MSR products installed correctly at your facility and tested for ANSI compliance, you can take comfort knowing your sites will have a Medically Superior Response at that critical moment it is needed.

With four Advantage systems providing the necessary pieces to convert 80% of existing competitive eyewashes and showers, your facility will have the tools to upgrade older Haws products, replace ineffective competitive products and test for continued ANSI compliance.

Upgrading to the Advantage system is easy; simply remove the existing head, select one of the supplied connectors, and attach the AXION Advantage head.

The AXION Advantage system is ideal for:

- Environmental Health and Safety Professionals
- Facility Managers
- Laboratory and Medical Professionals
- Industrial and Manufacturing Facilities
- Schools and Universities
- Heavy Industry
- Business Office and Warehouse Locations





Bradley \$19-310FW with AXION Advantage eye/face wash head





Encon 01050216 with AXION Advantage eye/face wash head





Speakman SE-495 with AXION Advantage eye/face wash head

AXION® eyePOD®



The AXION eyePOD, a faucet-mounted eyewash providing facilities with AXION MSR eyewash irrigation capabilities in an attractive, low cost, compact package.

The sleek, smooth, stainless steel exterior of the eyePOD is easy to clean and use. The polished surface is cosmetically suited for any setting, and the stainless steel construction is rugged enough for any industrial application.

FEATURES & BENEFITS

INVERTED DIRECTIONAL LAMINAR FLOW Zero vertical velocity for maximum victim comfort.

BUILT-IN THERMOSTATIC SAFETY VALVE Automatically shuts off eyewash flows at 100°F (37°C), diverting all water out through the aerator at the bottom of the unit to prevent scalding of the eyes.

EASY INSTALLATION

Standard 55/64-27 thread faucet connection comes with four additional adaptors allowing the *eyePOD* to be used on multiple faucets.

ADAPTERS:

Standard 1/2 gallon faucet outlet flow with second 1-gallon laminar outlet also supplied.

CERTIFIED TO:

NSF61, California Health and Safety Code 11675 (AB 1953), as well as ANSI/ISEA Z358.1 and CSA B125.

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AXION MSR™

FEATURES & BENEFITS

- AXION MSR eye/face wash head assembly
- AXION stainless steel showerhead with hydrodynamic design for equal distribution of water throughout flow
- Valve is designed to make flushing of fluid occur with the pull of a lever
- Pull-down design for wheelchair accessibility
- Eye/face wash and valve assembly is pre-built and fully water/pressure tested
- 18-Gauge Type 304 stainless steel cabinet







Model 8355WCW

Barrier-free, fully-recessed combination unit features the AXION stainless steel showerhead with the AXION MSR eye/face wash. Fully-recessed design with pull-down lever to activate shower. Chrome-plated brass pull-down valve for eye/face wash and easy access in-line strainer.



Model 8356WCDD

Barrier-free, fully-recessed, combination unit features the AXION stainless steel showerhead with the AXION MSR eye/face wash. Wall flush-mount design with pull-down lever to activate shower. Stainless steel drain pan to collect wash waste within cabinet, with day light drain.



Model 7656WCSM

Wheelchair accessible surface-mount unit features the AXION MSR eye/face wash. Stainless steel deepdrawn cabinet, stainless steel surface-mount support enclosure, and polished chrome-plated brass pull-down valve with easy access in-line strainer. Perfect for mounting on block or solid walls which cannot be cut into.



Model 7656WCC

Barrier-free, fully-recessed, wall-mounted unit features the AXION MSR eye/face wash. Chrome-plated brass pull-down valve for eye/face wash and easy access in-line strainer. Stainless steel drain pan to collect wash waste within cabinet.





Model 8356WCSM

Wheelchair accessible surface-mount combination unit features AXION stainless steel showerhead and AXION MSR eye/face wash with a pull-down lever to activate shower. Perfect for mounting on block or solid walls which cannot be cut into. Easy access exterior mounted in-line strainer.



Model 8356WCW

Barrier-free combination unit features the AXION stainless steel showerhead with the AXION MSR eye/face wash. Fully-recessed wall-mount design with pull-down lever to activate shower. Stainless steel drain pan to collect wash waste within cabinet.



Model 8356WCC

Barrier-free, wall-mounted, fully recessed combination shower unit features the AXION stainless steel showerhead with the AXION MSR eye/face wash. Design of the shower allows for flush in the ceiling mounting, or to hang down from the ceiling. Stainless steel drain pan to collect wash waste within cabinet.



Model 8355WCC

Fully-recessed combination shower unit features the AXION stainless steel showerhead with the AXION MSR eye/face wash. Stainless steel deep-drawn cabinet and polished chrome-plated brass pull-down valve with easy access in-line strainer.







Model 7655WCC

Fully-recessed, wall-mounted unit features the AXION MSR eye/face wash. Stainless steel deep-drawn cabinet and polished chrome-plated brass pull-down valve with easy access in-line strainer.

AXION® THERMOSTATIC MIXING VALVES



Our line of AXION thermostatic mixing valves have been designed specifically for tempered water blending in emergency equipment. All systems are a modular, brass design construction with a one-piece casting using internal check stops, oversized valve seats, a shuttle design that virtually eliminates valve binding and funnel technology designed to improve temperature control with better mixing at low flow rates. The series of valves can handle blending for a single eye/face wash to multiple emergency shower and eye/face wash fixtures.

Model 9202E

AXION thermostatic mixing valve that mixes hot and cold water to supply tempered water to emergency eyewash and shower fixtures requiring flow up to 78 GPM (295 LPM). CSA Certified to ASSE 1071 and applicable sections of CSA B125.3.

Model 9201E

AXION thermostatic mixing valve that mixes hot and cold water to supply tempered water to emergency shower and eyewash fixtures requiring flow up to 31 GPM (117 LPM). CSA Certified to ASSE 1071 and applicable sections of CSA B125.3.

FLOW CAPACITIES

MODEL	INLET	OUTLET	MINIMUM FLOW	INTERNAL COLD WATER BY-PASS AT 30PSI DROP					PRE	SSURE	DROP				
					1	2	5	10	15	20	25	30	45	60	PSI
9202E	1-1/4"	1-1/4"			.069	.138	.345	.689	1.03	1.38	1.72	2.07	3.10	4.13	BAR
	·	·	1	50	14	20	32	45	55	64	71	78	95	110	GPM
			4	299	53	76	121	170	280	242	269	295	360	416	L/MIN

MODEL	INLET	OUTLET	MINIMUM FLOW	INTERNAL COLD WATER BY-PASS AT 30PSI DROP					PRE	SSURE	DROP				
					1	2	5	10	15	20	25	30	45	60	PSI
9201E	1-1/4"	1-1/4"			.069	.138	.345	.689	1.03	1.38	1.72	2.07	3.10	4.13	BAR
	,	·	1	20	6	8	13	18	22	25	28	31	38	44	GPM
			4	76	22	30	48	68	83	96	107	117	144	166	L/MIN

FEATURES & BENEFITS

- Lowest internal pressure drop for this class of valve
- Custom shuttle design to virtually eliminate valve binding
- Offering NSF/ANSI 372 AB1953, reduction of lead content, compliance in select models
- Funnel design improves temperature control with better mixing at low flow rates
- Highest Cold Water Bypass flow rate by class in the industry
- Actively suspends hot water when cold water supply is lost to protect against scalding
- Lime and calcium resistant components used throughout the construction
- Extended 3-year warranty





Model 9201EFE

AXION thermostatic mixing valve that mixes hot and cold water to supply tempered water to emergency eyewash fixtures requiring flow up to 12 GPM (45 LPM). CSA Certified to ASSE 1071 and applicable sections of CSA B125.3.

Model 9201EW

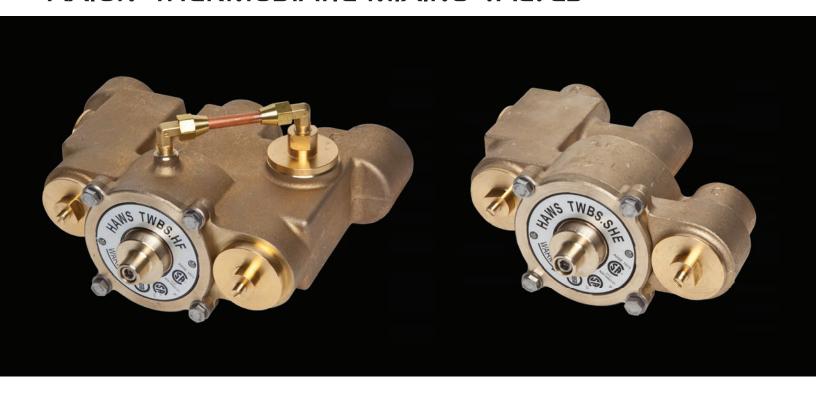
AXION thermostatic mixing valve that mixes hot and cold water to supply tempered water to emergency eyewash fixtures requiring flow up to 10 GPM (37.9 LPM). CSA Certified to ASSE 1071 and applicable sections of CSA B125.3.

FLOW CAPACITIES

MODEL	INLET	OUTLET	MINIMUM FLOW	INTERNAL COLD WATER BY-PASS AT 30PSI DROP	PRESSURE DROP										
					1	2	5	10	15	20	25	30	45	60	PSI
9201EFE	1/2"	3/4"			.069	.138	.345	.689	1.03	1.38	1.72	2.07	3.10	4.13	BAR
	·		1	10	2	3	5	7	9	10	11	12	15	17	GPM
			4	38	8	12	19	26	32	37	41	45	56	64	L/MIN

MODEL	INLET	OUTLET	MINIMUM FLOW	INTERNAL COLD WATER BY-PASS AT 30PSI DROP	PRESSURE DROP										
					1	2	5	10	15	20	25	30	45	60	PSI
9201EW	1/2"	1/2"			.069	.138	.345	.689	1.03	1.38	1.72	2.07	3.10	4.13	BAR
	·	·	1	4	2	3	4	6	7	8	9	10	12	14	GPM
			4	14	7	10	16	22	27	31	34	38	44	53	L/MIN

AXION® THERMOSTATIC MIXING VALVES



Model TWBS.HF

AXION thermostatic mixing valve that mixes hot and cold water to supply tempered water to emergency shower and eyewash fixtures requiring flow up to 78 GPM (295 LPM). Triple redundant anti-scald protection. High Cold Water Bypass flow rate of 79 GPM (299 LPM). Pressure sensing diverter valve provided that sends a pressure signal to open cold water bypass valve if hot water loses pressure. Leadfree brass design CSA certified to ASSE 1071, NSF 61, NSF/ANSI 372, California Health and Safety Code 116875 (AB 1953-2006) and applicable sections of CSA B125.3.

Model TWBS.SHE

AXION thermostatic mixing valve that mixes hot and cold water to supply tempered water to emergency eyewash fixtures requiring flow up to 74 GPM (280 LPM). Redundant anti-scald protection with additional hot shut-off valve providing secondary level of protection. High Cold Water Bypass flow rate of 50 GPM (189 LPM). Lead-free brass design CSA certified to ASSE 1071, NSF 61, NSF/ANSI 372, California Health and Safety Code 116875 (AB 1953-2006) and applicable sections of CSA B125.3.

FLOW CAPACITIES

MODEL	INLET	OUTLET	MINIMUM FLOW	INTERNAL COLD WATER BY-PASS AT 30PSI DROP					PRE	SSURE	DROP				
					1	2	5	10	15	20	25	30	45	60	PSI
TWBS.HF	2″	2"			.069	.138	.345	.689	1.03	1.38	1.72	2.07	3.10	4.13	BAR
			1	79	14	20	32	45	55	64	71	78	95	110	GPM
			4	299	53	76	121	170	280	242	269	295	360	416	L/MIN

MODEL	INLET	OUTLET	MINIMUM FLOW	INTERNAL COLD WATER BY-PASS AT 30PSI DROP	PRESSURE DROP										
					1	2	5	10	15	20	25	30	45	60	PSI
TWBS.SHE	1-1/4"	1-1/4"			.069	.138	.345	.689	1.03	1.38	1.72	2.07	3.10	4.13	BAR
	. ,, .	, .	1	50	13	19	30	43	52	60	68	74	91	105	GPM
			4	189	49	72	114	163	197	227	257	280	344	397	L/MIN

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Model 9201H

Lead-free AXION thermostatic mixing valve that mixes hot and cold water to supply tempered water to emergency shower and eyewash fixtures requiring flow up to 31 GPM (117 LPM). High Cold Water Bypass flow rate of 20 GPM (76 LPM). CSA Certified to ASSE 1071, NSF 61, NSF/ANSI 372, California Health and Safety Code 116875 (AB 1953-2006) and applicable sections of CSA B125.3.

Model TWBS.EWE

AXION thermostatic mixing valve that mixes hot and cold water to supply tempered water to emergency eyewash fixtures requiring flow up to 12 GPM (45 LPM). Redundant anti-scald protection with additional hot shut-off valve providing secondary level of protection. High Cold Water Bypass flow rate of 10 GPM (38 LPM). Lead-free brass design CSA certified to ASSE 1071, NSF 61, NSF/ANSI 372, California Health and Safety Code 116875 (AB 1953-2006) and applicable sections of CSA B125.3.

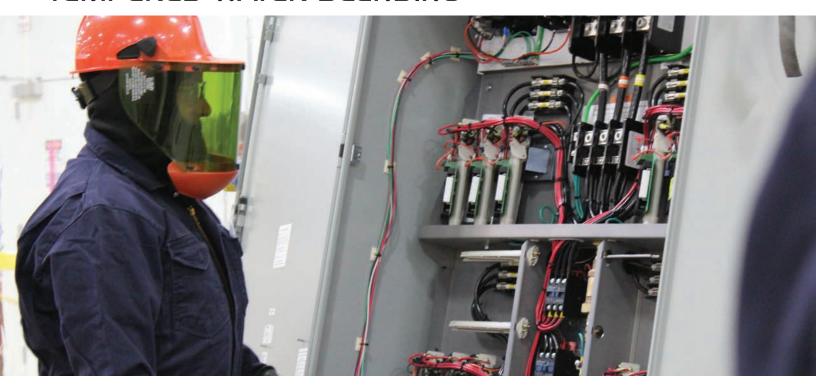
FLOW CAPACITIES

MODEL	INLET	OUTLET	MINIMUM FLOW	INTERNAL COLD WATER BY-PASS AT 30PSI DROP					PRE	SSURE	DROP				
					1	2	5	10	15	20	25	30	45	60	PSI
9201H	1"	1-1/4"			.069	.138	.345	.689	1.03	1.38	1.72	2.07	3.10	4.13	BAR
		,	1	20	6	8	13	18	22	25	28	31	38	44	GPM
			4	76	23	30	49	68	83	95	106	117	144	167	L/MIN

MODEL	INLET	OUTLET	MINIMUM FLOW	INTERNAL COLD WATER BY-PASS AT 30PSI DROP	PRESSURE DROP										
					1	2	5	10	15	20	25	30	45	60	PSI
TWBS.EWE	1/2"	3/4"			.069	.138	.345	.689	1.03	1.38	1.72	2.07	3.10	4.13	BAR
	,		1	10	2	3	5	7	9	10	11	12	15	17	GPM
			4	38	8	12	19	26	32	37	41	45	56	64	L/MIN

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TEMPERED WATER BLENDING





Model **9326**

Tankless Heater Solution, an electric water heating system designed to eliminate the need for large water storage tanks, as well as the continuous energy demand to maintain them at higher temperatures. This system will provide safety showers and eyewashes with an unlimited supply of tepid water, eliminating the "recovery time" needed to reheat large storage tanks after use. Controlled heater package housed in a NEMA 4 enclosure. Also available with a stainless steel enclosure, Model 9327. Models 9326 & 9327 are not for use in freezing environments.



Model TWBS.EW.H

An on-demand, prepackaged, fully-engineered and tested tempering system to provide tempered water instantaneously. Designed to increase cold water temperature by as much as 34°F (19°C) at 4 gpm (15.1 L) flow; suitable for single eyewash application.

EMERGENCY SHOWERS :: SKIDS



Model 8710*

Heated AXION shower and eye/face wash booth supplies tempered water for flushing during emergency situations in all-weather conditions. Can be used as a complete stand-alone decontamination unit and/ or used as a multiple shower feeder. With a number of different hot water supply options, electrical options, blending options and multiunit supply capabilities, it is adaptable to almost any emergency shower requirement.



8780 shown above with additional features than standard model

Model 8780*

Skid-mounted tempering system can supply a number of drench systems or eyewash stations. This single or multiple shower and/or eyewash feeder is designed to operate with a number of tempering and electrical options. The tempered water blending system includes an integral hot water supply, whether stored or supplied by steam, and incorporates fail-safe features like anti-scald protection and full-flow cold water bypass. The electrical system requires 208/240 VAC single phase, 3 wire 40 amp minimum, though it can be easily adapted for other voltages upon request.



Model **8760**

Skid-mounted AXION combination decontamination and tempering system can be used as a complete stand-alone or as a multiple shower feeder. Comes with a tempered water blending system that includes an integral hot water supply, and incorporates fail-safe antiscald protection and full-flow cold water bypass. Unit can operate with a number of tempering and electrical options.



Model 8730

Completely enclosed AXION shower and eye/face wash with all-weather foam insulated booth and an internally mounted space heater. During an emergency, a flow switch activated alarm is sounded and a flashing warning light is triggered. Model is customizable to almost any emergency shower requirement.



Model 8720

Heated enclosed emergency decon shower and eye/face wash with overhead water storage for areas with no water supply. All-weather foam insulated booth made of a membrane encapsulated stainless steel structure with bright yellow elastomeric chemically resistant waterproof coating, protected with UV inhibitors. The internal booth temperature is maintained by an natural convection 2.5 Kw space heater. Over-head 450-gallon (1703 L) tank is made of stainless steel, and the water temperature is maintained by an immersion heater.

*Variable tank size options, steam heat exchanger or optional electrical classifications available. Instantaneous hot water heater also available.

PORTABLE EYEWASHES



Model 7500 FEATURES & BENEFITS

CONSTRUCTION

FDA approved high-density green polyethylene tank provides the light and durable construction required in a portable unit.

MOUNTING

J-shaped stainless steel wall bracket makes for a well constructed portable mount for easy removal and re-mount

EYEWASH

Pulling down the eyewash arm will begin flushing the 16 gallon portable at .4 gpm (1.5 L) during the required 15 minutes, creating a full patterned flushing of the eyes.

DESIGN

Tank comes complete with a wide-fill opening and threaded cap for quick inspection, cleaning, and filling. Unit also comes equipped with top and side handles making relocation simple.

Model **7500**

Model 7500 portable gravity operated eyewash shall include a FDA approved high-density green polyethylene 16 gallon (60.6 L) tank, ABS plastic eyewash heads with .4 gpm (1.5 L) flow rate over 15 minutes, yellow pull-down activation arm, integral handles on top and sides, wide-fill threaded cap, label-mounted operation and maintenance instructions, and a stainless steel wall bracket. Additive not included - Order separately.

Where the eyes of any person may be exposed to injurious or corrosive materials, when suitable facilities for quick flushing of the eyes needs to be provided and a continuous supply of water is not available. Although the 7500 may be installed in a wide variety of locations, it is ideal for the remote and low traffic areas where protective measures are still needed. Emergency eyewash facilities shall be in unobstructed and accessible locations that require no more than 10 seconds for the injured person to reach. Model 7500 is certified by CSA to meet the ANSI Z358.1 Standard for Emergency Eyewash and Shower Equipment.

OPTIONS

Water Additive: Model 9082, 'sterile' bacteriostatic preservative for use in portable eyewash stations. One 5 oz. (148 ml) bottle will preserve 5 to 20 gallons (18.9 to 75.7 L) of potable water for up to three months. Four bottles per carton.

Waste Container: Model 9009 is a twenty gallon (75.7 L) wastewater container constructed of tough yellow polymer resin. Unit is used to collect water during weekly testing of emergency equipment.

Thermal Protection Jacket: Model 9125 is a white thermal protection jacket for 7500 series gravity eyewashes.

PORTABLE EYEWASHES



Model 7501FP

Freeze-protected 9-gallon (34.1 L) portable gravity-fed eyewash. Eyewash features a thermostatically controlled heater for operating in conditions to -30° F (-34° C), and FDA approved high-density green polyethylene tank that provides for full 15 minutes of flushing at .4 GPM (1.5 LPM). Electrical requirements are 120V/720W, unit is supplied with an eight-foot power cord. Optional bacteriostatic additive permits water storage for up to three months.







Model 7601.10.2

Pressurized, portable eyewash and body spray combining the use of twin ABS plastic eyewash heads with a green ABS face and body-spray head. Features a 13-gallon (49.2 L) ASME rated stainless steel tank. Protective measures include: air pressure gauge, pressure relief valve, and tire-type air fill valve. Includes a 6-foot (2m) hose. Uses optional 9008 cart for site transport.

Model 7601.37

Air pressure operated, portable eyewash and body spray provides a reliable source of safety for irrigation. Combines the use of twin ABS plastic eyewash heads with a face and body spray head. ASME rated 37-gallon (140 L) stainless steel tank. Protective measures include: air pressure gauge, pressure relief valve, and tire-type air fill valve. Includes a 6-foot (2m) hose. Uses optional 9008 cart for site transport.

Model 7602.15

Air pressure operated, 15-gallon (56.78 L) personal portable eyewash, providing a reliable source of safety for the irrigation process. Protective measures include: air pressure gauge, pressure relief valve, tire-type air fill valves. Uses optional 9008 cart for site transport.

Model **9082**

Sterile bacteriostatic preservative for use in portable eyewash stations. One 5 oz. (148 ml) bottle will preserve 5 to 20 gallons (18.9 to 75.7 L) of portable water for up to three months. Four bottles per carton.

ACCESSORIES



Model SP829SS

AXION stainless steel drench showerhead with integral flow control. 10-5/8" (27cm) stainless steel drench showerhead with hydrodynamic design delivers dispersed flow for uniform drenching.



Model SP829

10-5/8" (27cm) ABS green plastic drench AXION showerhead delivers dispersed flow for uniform drenching. Hydrodynamic design minimizes the strong physical pressure that drives the water to the outer rim making the distribution equal across the entire footprint of the flow.



Model SP65SS

AXION MSR stainless steel eye/face wash head with inverted directional flow, integral flow control, and laminar flow enhanced comfort, stability and effectiveness.

(Not for use with freeze resistant models). Green ABS plastic option available, Model SP65.



Model SP154DPDT

Flow switch for use with the 9001 and 9001EXP alarms. AC, 125/250 volts, 5 amps, double pole, double throw.



Model 9001EXP

Emergency alarm and light system that is operated by a double-pole, double-throw flow switch. Can be mounted to pipe or wall. Class 1, Division 2, Groups B, C and D.



Model 9001

Emergency alarm and light system that is operated by a double-pole, doublethrow flow switch when the emergency shower or eyewash is in operation. System can be mounted to pipe or wall.



Model **9020**

3-sided sign for combination shower and eyewash units. Can be wall mounted for 2-way visibility, upright for 3-sided visibility.



Model SP157B

Brass automatic thermal actuator scald protection bleed valve opens when internal water temperature in emergency equipment exceeds 95° F (35° C). 1/2" (1.27 cm) NPTF inlet and outlet.



Model SP158B

Brass automatic thermal actuator freeze protection bleed valve opens when internal water temperature in emergency equipment falls below 36° F (2.2° C). 1/2" (1.27 cm) NPTF inlet and outlet.



Model SP170

Test card with space for date and initials of inspector. 25 per pack. Includes zip ties.



Model 9015

Eyewash gauge and 6 in. (15cm) ruler. 6 per pack.



AXION MSRTM DECONTAMINATION UNITS



Model 8605

Specifications

Booth: Reinforced molded fiberglass, enclosed on three sides, alkali and acid resistant, bright white finish.

Shower Head: 10" ABS Shower Head

Activation: Rigid stainless steel pull rod operates a stay open type ball valves that is equipped with stainless steel stem on it.

EYE/FACE WASH

Heads: SP65 Axion ABS plastic anti-surge eyewash heads in Safety Green. Dust cover protect heads and automatically release with water pressure.

Activation: Stainless steel push flag operates a stay open type ball valve that is equipped with a stainless steel stem

Sign: Universal emergency sign included

Stream Control: Steady water flow under varying pressures assured with automatic pressure compensation devices.

DETAILS

Supply: 1" NPT (F)

Waste: 3" NPT, inside caulk





Model 8605SS

Specifications

Booth: Stainless steel 304 panels, with #4 finish, enclosed on three sides.

Grate: Based grate is stainless steel 304

Shower Head: 10" stainless steel head

Activation: Rigid stainless steel pull rod operates a stay open stainless steel 316 ball valve.

EYEWASH

Heads: Axion stainless steel anti-surge eyewash heads. Dust cover protect heads and automatically release with water pressure.

Activation: Stainless steel push flag operates a stay open type 316 stainless steel ball valve.

Sign: Universal emergency sign includad

Stream Control: Steady water flow under varying pressures assured with automatic pressure compensation devices.

DETAILS

Supply: 1" NPT (F) Waste: 3" chulk



FREEZE RESISTANT COMBINATION UNITS



Specifications

Shower Head: 10" ABS plastic in Safety

Green

Activation: Rigid stainless steel pull rod operates a stay open ball valve that is equipped with a stainless steel stem.

Standard: 9" diameter floor flange with 1-1/4" hot dip galvanized steel pipe.

Jacket: Safety Green, UV resistant, ABS plastic with removable polyethylene foam insulation. Includes elastomeric seal for added weather protection.

Voltage: 220V, 50 Hz, single phase.

Eye/Face Wash

Heads: SP65 Axion ABS plastic anti-surge eyewash heads in Safety Green. Dust cover

protect heads and automatically release with water pressure.

Activation: Stainless steel push flag operates a stay open ball valve that is equipped with a stainless steel ball and stem.

Electric cable: Reliable self-regulating heat cable with external braid, guards against overheating and cold spots.

Thermostat: The temperature control thermostat shuts off heat at 8C-11C.

Bleed Valve: SP157A scald protection bleed valve. Automatic thermal actuator bleed valve opens when internal shower water temperature reaches above 35C. Valve fully opened at 43 C and closes at 35C.

Supply: 1-1/4" NPT (F)





Model wash heads co tect heads and water pressure.

Specifications

Shower Head: 10 "stainless steel shower

head

Activation: Stainless steel step on treadle operates a stay open type ball valves.

Eye/face wash

Receptor: 11" stainless steel with #7 bright finish on exterior.

Heads: Twin patented stainless steel eyewash heads come with dust cover to protect heads and automatically release with water pressure.

Activation: Stainless steel push flag operates a stay open type ball valve that is equipped with a stainless steel stem.

Sign: Enlarge Universal emergency sign included to provide high visibility.

Stream Control: Steady water flow under varying pressures assured with automatic pressure compensation devices.

Water tank: 1200 liters refillable tank for 15 minutes shower activation to meet ANSI standard.

Electric cable: Reliable self-regulating heat cable with external braid guards against overheating and cold spots. Insulation is added for better weather protection.

Thermostat: Thermostat control shuts off heat at around 25C

Junction box and electric details: Junction box is IP66,Unit is explosion proof

Voltage: 230VAC, 50Hz Single phase

Freeze protection valve: Flushes water through line when internal water temperature drops below 2C. Close at 7C

Scald protection valve: Automatic thermal actuator bleed valve opens when internal shower temperature reaches above 35C Valve fully open at 43C and closes at 35C.

DETAILS

Supply: 1-1/4" NPT M Waste: Open Haws

FIRST AID STERILE EYE RINSE SOLUTION

The state of the s

Specifications

Haws Anodyne[™] First aid eye rinse 0.9% Sodium Chloride. Provides immediate irrigation to the eye when plumbed or self-contained emergency eyewash stations are not readily available.

Extended 36 months shelf life from date of manufacture provides a long lasting product.

Units available in two sizes.

7516C:2 x 16oz (500ml) sterilized isotonic buffered solution with hanger and sign







Specifications

Haws Anodyne™ First aid eye rinse 0.9% Sodium Chloride. Provides immediate irrigation to the eye when plumbed or self-contained emergency eyewash stations are not readily available.

Extended 36 months shelf life from date of manufacture provides a long lasting product.

Units available in two sizes.

7532C:2 x 32oz (1000ml) sterilized isotonic buffered solution with hanger and sign



Model 7532C

Specifications



Haws Anodyne[™] First aid eye rinse 0.9% Sodium Chloride. Provides immediate irrigation to the eye when plumbed or self-contained emergency eyewash stations are not readily available.

Extended 36 months shelf life from date of manufacture provides a long lasting product.

7516C.Box:2 x 16oz (500ml) sterilized isotonic buffered solution in a thermostatic and dustproof box produced in EPS (expanded polystyrene). Come with a mirror and wall mounting kit.

Model 7516C.B



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ANSI Z358.1: YOUR CHECKLIST FOR COMPLIANCE

By Casey Hayes
Director of Haws Integrated

Workplace safety has seen impressive improvements over the past several decades due in part to evolving regulations that identify acceptable risk parameters, along with standards that address requirements for personnel safeguards and emergency response. Recent innovations include enhanced water drench patterns, eyewash units designed to deliver inverted water flow for a medically superior wash, and advanced remote management.

BETTER METHODS:: BETTER RESULTS

Current technology helps minimize injury associated with industrial chemical exposure.

Emergency shower and eyewash requirements – *Location, Function, Maintenance* – are identified in ANSI Z358.1 Standard. In its current form, ANSI Z358.1 provides the most specific and useful guide for preparing to meet most workplace spill, splash and blown particulate incidents. This document provides an abbreviated checklist to help identify some of the significant requirements included in ANSI Z358.1; it is not intended to be an interpretation of the entire ANSI Standard.

Current standards (ANSI Z358.1 sections 4.6.2 & 4.6.5) require weekly activation of emergency showers and eyewashes to confirm proper operation, along with a thorough annual inspection. Many companies opt to contract with outside firms for routine and annual inspections as an added measure of assurance and risk mitigation.



While ANSI Z358.1 establishes many additional requirements, the standards identified above are commonly overlooked. Each month, OSHA publishes a recap of noted violations and related fines levied against companies; financial penalties for non-compliance often begin at \$100,000 and can exceed \$1 million. However, a claim for excessive injury due to a non-compliant drench shower or eye/face wash presents significantly higher risk: incurring a \$213,000 OSHA fine for a "blocked eyewash" is a small fraction of the risk exposure if an employee were permanently injured due to improper emergency response equipment.

COSTLY ERRORS

In today's "lawsuit lottery" business climate, even a rich imagination is no match for jury-based settlements.

The American National Standards Institute (ANSI) introduced tepid water as an emergency wash requirement in ANSI Z358.1-1998. ANSI further clarified tepid water standards in 2004 and identified a specific temperature range in 2009. Most emergency shower/eye/face wash units across North America do not yet comply with significant code provisions for tepid water.

ANSI Z358.1: YOUR CHECKLIST FOR COMPLIANCE

By Casey Hayes Director of Haws Integrated

TEPID WATER

Tepid water is essential for emergency shower/eye/face washes to provide medically suitable results. When drench water is outside of the required operating temperature, an injured worker is unlikely to utilize the full 15-minute wash cycle. A shortened cycle does not provide the thorough 15-minute rinse specified on most MSDS documents. Failing to rinse away chemicals and other contaminants causes prolonged worker exposure to injurious material causing more severe injuries and longer recovery times and hospital stays.

Why tepid water? If an emergency wash unit provides water that is too hot or too cold (above 100° F or below 60° F), an injured worker may be exposed to additional serious injury.

TOO HOT = SCALDED

If the water is too hot the biological response is for pores in the skin to open, potentially causing increased contaminant absorption. Excessively hot water may also cause severe scalding and trigger an increased chemical reaction, an example of this is the delicate eye tissue which can be damaged at temperatures above 105° F.

TOO COLD = HYPOTHERMIA

If the water is too cold, a worker exposed to hazardous material is unlikely to stay in long enough for a medically effective decontamination or may compound their chemical exposure with severe hypothermia.

JUST RIGHT = BEST RESULTS

ANSI Z358.1 Standard for Emergency Eyewashes and Shower Equipment defines tempered (tepid) water as "A flushing fluid temperature conducive to promoting a minimum 15-minute irrigation period. A suitable range is 16-38° C (60-100° F)".

Today, simply providing emergency showers and eyewashes is not enough. It is necessary to inspect, test, and monitor emergency wash system readiness and performance. Each unit must be accessible, usable, and tepid-water equipped.

For more information on a full range of ANSI-compliant emergency eye/face wash and shower solutions and water tempering systems, visit www.HawsIntegrated.com.

To arrange for a detailed inspection of your emergency wash systems, contact Haws Integrated, 888.640.4297.





ANSI Z358.1 SAFETY EQUIPMENT ANNUAL MINIMUM PERFORMANCE CHECKLIST

2014 REVISIONS INDICATED IN O	RANGE. Requirements for Weekly Testin	g are Indicated with (w).
All shower units shall be inspecte Recommended Testing Flow Pres	d annually to assure conformance with ANS ssure is 30 psi (+ .5 psi – .0 psi).	il Z358.1.
LOCATION Emergency equipment shall be activated weekly. Safety station shall be accessible within 10 seconds of hazard,	SHOWER Showerhead must be 82 to 96 inches (208.3 cm - 243.8 cm) above the surface floor of user. (Sec. 4.1.3, 7.1) Shower must deliver minimum of 20	
approximately 55 ft./16.8 m. (Sec. 4.5.2, 5.4.2, 6.4.2, 7.4.2) (w) Safety station shall be located on the same level as the hazard and the path of travel shall be free of obstructions. (Sec. 4.5.2, 5.4.2, 6.4.2, 7.4.2) (w)	gallons (75.7L) per minute and provide a column of water 20 inches (50.8 cm) wide at 60 inches (152.4 cm) above the surface floor of user. (Sec. 4.1.2, 4.1.4, 7.1) Shall be designed so that the flushing flow remains on without the use of the operator's hands. The valve shall be	
Emergency equipment location shall be well lit and identified with a highly visible sign. (Sec. 4.5.3, 5.4.3, 6.4.3, 7.4.3) (w)	simple to operate and go from "off" to "on" in one second or less and actuator can not be more than 69 inches (173.3 cm) from the surface floor of user. (Sec. 4.2, 7.2) (w)	
All employees subject to exposure to hazardous material should be instructed in the location and proper use of emergency equipment. (Sec. 4.6.4, 5.5.4, 6.5.4, 7.5.4)	EYEWASH / EYE/FACE WASH Must provide a means of controlled flow to both eyes simultaneously at a velocity low enough to be non-injurious. (Sec. 5.1.1, 6.1.1, 7.1) (w)	
COMBINATION UNIT Combination unit components shall be capable of operating simultaneously and shall be positioned so that components may be used simultaneously by the same user. (Sec. 7.3, 7.4.4) (w)	Eye/face wash equipment must deliver minimum of 3 gallons (11.4 L) per minute of water for 15 minutes. (Sec. 6.1.6, 7.1) Eyewash only must deliver minimum of .4 gallon (1.5 L) per minute of water for 15 minutes. (Sec 5.1.6, 7.1) Outlets shall be protected from airborne contaminants. (Sec. 5.1.3, 6.1.3, 7.1) (w)	
DRENCH HOSE Drench hose must deliver a controlled flow of flushing fluid at a velocity low enough to be non-injurious. (Sec. 8.2.1)	The flushing fluid of an eyewash – eye/ face wash shall cover the areas between the interior and exterior lines of a gauge at some point less than 8 inches (20.3 cm) above the eyewash nozzle.	
A drench hose can only be considered an eyewash – eye/ face wash if it meets performance requirements in Sec. 5 and/or 6. TEMPERATURE	(Sec. 5.1.8, 6.1.8, 7.1) Flushing fluid flow pattern should be 33 to 53 inches (83.8 cm - 134.6 cm) from the surface floor of user and minimum of 6 inches (15.3 cm) from wall.	
Deliver tepid flushing fluid.* (Sec. 4.5.6, 5.4.6, 6.4.6, 7.4.5) *Suggested temperature range – above 60° F (16° C) and below 100° F (38° C).	(Sec. 5.4.4, 6.4.4, 7.1) Shall be designed so that the flushing flow remains on without the use of the operator's hands. The valve shall be simple to operate and go from "off" to "on" in one second or less. (Sec. 5.2, 6.2, 7.2) (w)	Model 8300-8309

AXION MSR...

...the Medically Superior Response®

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