



# CIRCLE SYSTEMS, INC.

## PRODUCT LISTING Fluorescent Material Wet Method

### *Water Media*

**MI-GLOW® 810** - Mi-Glow® 800 fluorescent yellow-green particles premixed with powdered Wetting Agent 100 for use in water media. It is designed to be used with black light to detect discontinuities in finished products. It meets or exceeds AMS 3044 and all applicable industry specifications.

**MI-GLOW® 834** - Mi-Glow® 800 fluorescent yellow-green particles premixed with powdered Wetting Agent 34 for use in water media. It is designed to be used with black light to detect very fine discontinuities in finished products. It meets or exceeds AMS 3044 and all applicable industry specifications.

**MI-GLOW® 778** - Mi-Glow® 800 fluorescent yellow-green particles premixed with liquid Wetting Agent 771 for use in water media. This advanced formulation allows for superior corrosion protection, wetting and particle mobility. It is designed to be used with black light to detect very fine discontinuities in finished products. It meets or exceeds AMS 3044 and all applicable industry specifications.

**MI-GLOW® 798** - Mi-Glow® 798 is Mi-Glow® 800 fluorescent yellow-green particles premixed with a liquid Wetting Agent 791 for use in water media. It is designed to be used with black light to detect very fine discontinuities in finished products. (Note: The liquid wetting agent used in this product has minimal corrosion protection, is Borate free and was developed for overseas applications.) It meets or exceeds all applicable industry specifications.

**MI-GLOW® 218X** - Mi-Glow® 218X is a combination of Mi-Glow® 800 and Mi-Glow® 900 fluorescent yellow-green particles premixed with powdered Wetting Agent 4X for use in water media. It is designed to be used with black light to detect discontinuities in billet inspection. It meets or exceeds all applicable industry specifications.

**MI-GLOW® 318** - Mi-Glow® 318 is Mi-Glow® 800 and Mi-Glow® 920 fluorescent yellow-green particles premixed with powdered Wetting Agent 34 for use in water media. Mi-Glow® 318 is designed to be used with black light to detect forging type discontinuities. It meets or exceeds AMS 3044 and all applicable industry specifications.

**MI-GLOW® 718X** - Mi-Glow® 718X is a combination of Mi-Glow® 800 and Mi-Glow® 900 fluorescent yellow-green particles premixed with liquid Wetting Agent 771 for use in water media. This advanced formulation allows for superior corrosion protection, wetting and particle mobility. Mi-Glow® 718X is designed to be used with black light to detect discontinuities on both machined and unfinished ferromagnetic materials. It meets or exceeds AMS 3044 and all applicable industry specifications.

**MI-GLOW® 788** - Mi-Glow® 788 is Mi-Glow® 800 fluorescent yellow-green particles premixed with a liquid Wetting Agent that is specifically formulated to provide extra corrosion protection, for use in water media. Mi-Glow® 788 is designed to be used with black light to detect very fine discontinuities on both machined and unfinished ferromagnetic materials. It meets or exceeds AMS 3044 and all applicable industry specifications.



# CIRCLE SYSTEMS, INC.

## PRODUCT LISTING Fluorescent Material Wet Method

### *Water Media*

**MI-GLOW® 920LC** - Mi-Glow® 920 fluorescent yellow-green particles premixed with liquid Wetting Agent 771, for use in water media. This advanced formulation allows for superior corrosion protection, wetting and particle mobility. It is designed to be used with black light to detect forging type discontinuities. It meets or exceeds AMS 3044 and all applicable industry specifications.

**MI-GLOW® 920W** - Mi-Glow® 920 fluorescent yellow-green particles premixed with powdered Wetting Agent 34 for use in water media. It is designed to be used with black light to detect forging type discontinuities. It meets or exceeds AMS 3044 and all applicable industry specifications.

**MI-GLOW® 934** - Mi-Glow® 930 fluorescent yellow-green particles premixed with powdered Wetting Agent 34 for use in water media. It is designed to be used with black light to detect forging type discontinuities. It meets or exceeds AMS 3044 and all applicable industry specifications.



# CIRCLE SYSTEMS, INC.

## PRODUCT LISTING Fluorescent Material Wet Method

### *Oil Media*

**MI-GLOW® 800** - Fluorescent yellow-green particles used with CircleSol M, a refined petroleum distillate. It is designed to be used with black light to detect very fine discontinuities in finished products. It meets or exceeds AMS 3044 and all applicable industry specifications.

**MI-GLOW® 920** - Fluorescent yellow-green particles used with CircleSol M, a refined petroleum distillate. It is designed to be used with black light to detect forging type discontinuities. It meets or exceeds AMS 3044 and all applicable industry specifications.





# CIRCLE SYSTEMS, INC.

## PRODUCT LISTING Nonfluorescent Material Wet Method

### *Oil Media*

**MI-GLOW® 106** - Mi-Glow® 106 is black particles for use with CircleSol M, a refined petroleum distillate. It is designed to be used with visible light for finding discontinuities in finished products. Higher particle concentration provides heavier indication buildup for easy detection. It meets or exceeds AMS 3042 and all applicable industry specifications.

### *Water Media*

**MI-GLOW® 820** - Mi-Glow® 106 black particles premixed with liquid Wetting Agent 771 for use in water media. Higher particle concentration provides heavier indication buildup for easy detection. It is designed to be used with visible light for finding discontinuities in finished products. It meets or exceeds AMS 3042 and all applicable industry specifications. Mi-Glow® 820 can be used with Mi-Glow® WCP.

**MI-GLOW® 820D** - Mi-Glow® 106 black particles premixed with powdered Wetting Agent 34 for use in water media. Higher particle concentration provides heavier indication buildup for easy detection. It is designed to be used with visible light for finding discontinuities in finished products. It meets or exceeds AMS 3042 and all applicable industry specifications. Mi-Glow® 820D can be used with Mi-Glow® WCP.



## CIRCLE SYSTEMS, INC.

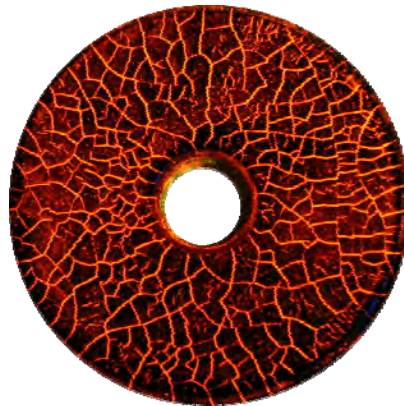
### PRODUCT LISTING Fluorescent & Nonfluorescent (Dual) Material Wet Method

#### *Oil Media*

**MI-GLOW® 600** - Red particles for use in CircleSol M, a refined petroleum distillate. It is designed to be used with visible light for detecting discontinuities found in structural fabrications and weldments. Higher particle concentration provides heavier indication buildup for easy detection. Mi-Glow® 600 can be further enhanced when used with a black light or blue light. It meets or exceeds all applicable industry specifications.

#### *Water Media*

**MI-GLOW® 850** - Mi-Glow® 600 red particles premixed with powdered Wetting Agent 100 for use in water media. It is designed to be used with visible light for detecting discontinuities found in structural fabrications and weldments. Higher particle concentration provides heavier indication buildup for easy detection. Mi-Glow® 850 can be further enhanced when used with a black light or blue light. It meets or exceeds all applicable industry specifications.





# CIRCLE SYSTEMS, INC.

## PRODUCT LISTING CircleSafe® Aerosols

### *Fluorescent: Water Media*

**CIRCLESafe® 778A** - An aerosol spray can of Mi-Glow® 800 fluorescent yellow-green particles, premixed with Wetting Agent 771, formulated in water media. It is designed to be used with black light inspection to detect very fine discontinuities found in finished products and critical, highly stressed component parts. Its ultra-bright, ultra-sensitive particles allow for excellent detection. It meets or exceeds all applicable industry specifications. This aerosol is packaged in a carbon dioxide propellant for odor-free, fume-free, non-combustible inspection. Packaged 12 cans per carton.

### *Fluorescent: Oil Media*

**CIRCLESafe® 800A** - An aerosol spray can of Mi-Glow® 800 fluorescent yellow-green particles and CircleSol M, a refined petroleum distillate. It is designed to detect very fine discontinuities found in finished products and critical, highly stressed component parts. Its ultra-bright, ultra-sensitive particles allow for excellent detection. The carbon dioxide propellant reduces combustible hazard. It meets or exceeds all applicable industry specifications. Packaged 12 cans per carton.

### *Nonfluorescent: Water Media*

**CIRCLESafe® 820A** - An aerosol spray can of Mi-Glow® 106 black particles, premixed with liquid Wetting Agent 771, formulated in water media. It is designed to be used with visible light inspection for detecting discontinuities found in finished products and structural fabrications. Higher particle concentration provides heavier indication buildup for easy detection. It meets or exceeds all applicable industry specifications. This aerosol is packaged in a carbon dioxide propellant for odor-free, fume-free, non-combustible inspection. CircleSafe® 820A can be used with Mi-Glow® WCP. Packaged 12 cans per carton.

### *Nonfluorescent: Oil Media*

**CIRCLESafe® 820AX** - An aerosol spray can of Mi-Glow® 106 black particles and CircleSol M, a refined petroleum distillate. It is designed to be used with visible light inspection for detecting discontinuities found in finished products and structural fabrications. Higher particle concentration provides heavier indication buildup for easy detection. The carbon dioxide propellant reduces combustible hazard. It meets or exceeds all applicable industry specifications. CircleSafe® 820AX can be used with Mi-Glow® WCP. Packaged 12 cans per carton.

### *Nonfluorescent & Fluorescent (Dual): Water Media*

**CIRCLESafe® 850A** - An aerosol spray can of Mi-Glow® 600 red particles and liquid Wetting Agent 771, formulated in water media. It is designed to be used with visible light inspection for detecting discontinuities found in structural fabrications and weldments. Higher particle concentration provides heavier indication buildup for easy detection. CircleSafe® 850A can be further enhanced when used with a black light or blue light. It meets or exceeds all applicable industry specifications. This aerosol is packaged in a carbon dioxide propellant for odor-free, fume-free, non-combustible inspection. Packaged 12 cans per carton.



## CIRCLE SYSTEMS, INC.

### PRODUCT LISTING CircleSafe® Aerosols

#### *Nonfluorescent & Fluorescent (Dual): Water Media*

**CIRCLESAFE® 850AX** - An aerosol spray can of Mi-Glow® 600 red particles and CircleSol M, a refined petroleum distillate. It is designed to be used with visible light inspection for detecting discontinuities found in structural fabrications and weldments. Higher particle concentration provides heavier indication buildup for easy detection. The carbon dioxide propellant reduces combustible hazard. It meets or exceeds all applicable industry specifications. CircleSafe® 850AX can be further enhanced when used with a black light or blue light. Packaged 12 cans per carton.



## CIRCLE SYSTEMS, INC.

### PRODUCT LISTING White Contrast Paint

**MI-GLOW® WCP** - A specially formulated, fast drying white contrast paint, used to create a consistent background on the component surface in a visible magnetic particle inspection. When dry, the white contrast paint is resistant to the wet method baths used for inspection, but is easily removed from the demagnetized component surface with acetone. Mi-Glow® WCP can be used with any of the Mi-Glow® and CircleSafe® visible particle materials. Packaged 12 cans per carton or in a five-gallon pail.



# CIRCLE SYSTEMS, INC.

## PRODUCT LISTING Ready-To-Use-Sprays

### *Fluorescent: Water Media*

**MI-GLOW® 778S-RTU** - A Ready-to-Use water bath packaged in a hand-held spray bottle. The water bath contains Mi-Glow® 800 fluorescent yellow-green particles premixed with liquid Wetting Agent 771. It is designed for revealing very fine discontinuities in finished products using black light. It meets or exceeds all applicable industry specifications.

### *Fluorescent: Oil Media*

**MI-GLOW® 800LS-RTU** - A Ready-to-Use oil bath packaged in a hand-held spray bottle. The bath contains Mi-Glow® 800 fluorescent yellow-green particles and CircleSol M, a refined petroleum distillate. It is designed for revealing very fine discontinuities, such as those found in finished products for the aerospace industry and other critical applications, using black light. It meets or exceeds all applicable industry specifications.

### *Nonfluorescent: Water Media*

**MI-GLOW® 820S-RTU** - A Ready-to-Use water bath packaged in a hand-held spray bottle. The water bath contains Mi-Glow® #106 black particles and liquid Wetting Agent #771. It is designed to be used with visible light for revealing discontinuities on machined component parts. It meets or exceeds all applicable industry specifications.

### *Nonfluorescent: Oil Media*

**MI-GLOW® 820LS-RTU** - A Ready-to-Use oil bath packaged in a hand-held spray bottle. The bath contains Mi-Glow® 106 black particles and CircleSol M, a refined petroleum distillate. It is designed to be used with visible light for revealing discontinuities on machined component parts. It meets or exceeds all applicable industry specifications.

### *Nonfluorescent & Fluorescent: Water Media*

**MI-GLOW® 850S-RTU** - A Ready-to-Use water bath packaged in a hand-held spray bottle. The bath contains Mi-Glow® 600 red particles and liquid Wetting Agent 771. It is designed to be used with visible light for revealing discontinuities found in structural fabrications. Mi-Glow® 850S-RTU can be further enhanced when used with a black light or blue light. It meets or exceeds all applicable industry specifications.

### *Nonfluorescent & Fluorescent: Oil Media*

**MI-GLOW® 600LS-RTU** - A Ready-to-Use oil bath packaged in a hand-held spray bottle. The bath contains Mi-Glow® 600 red particles and CircleSol M, a refined petroleum distillate. It is designed to be used with visible light for revealing discontinuities found in structural fabrications. Mi-Glow® 600LS-RTU can be further enhanced when used with a black light or blue light. It meets or exceeds all applicable industry specifications.



## CIRCLE SYSTEMS, INC.

### PRODUCT LISTING Nonfluorescent Dry Powder Method

**SIRCHEM® DRY POWDER 61** - A highly refined nonfluorescent gray magnetic powder used for dry method magnetic particle inspection. It is designed to be used in visible light to reveal minute discontinuities on fabricated components or weldments such as bridges, pipes, large tanks, machinery and equipment. It meets or exceeds AMS 3040 and all applicable industry specifications.

**SIRCHEM® DRY POWDER 63** - A highly refined nonfluorescent red magnetic powder used for dry method magnetic particle inspection. It is designed to be used in visible light to reveal minute discontinuities on fabricated components or weldments such as bridges, pipes, large tanks, machinery and equipment. It meets or exceeds AMS 3040 and all applicable industry specifications.

**SIRCHEM® DRY POWDER 66** - A highly refined nonfluorescent yellow magnetic powder used for dry method magnetic particle inspection. It is designed to be used in visible light to reveal minute discontinuities on fabricated components or weldments such as bridges, pipes, large tanks, machinery and equipment. It meets or exceeds AMS 3040 and all applicable industry specifications.

**SIRCHEM® DRY POWDER 68** - A highly refined nonfluorescent blue magnetic powder used for dry method magnetic particle inspection. It is designed to be used in visible light to reveal minute discontinuities on fabricated components or weldments such as bridges, pipes, large tanks, machinery and equipment. It meets or exceeds AMS 3040 and all applicable industry specifications.

**SIRCHEM® DRY POWDER 91** - A highly refined and bonded nonfluorescent gray magnetic powder used for dry method magnetic particle inspection. It is designed to be used in visible light to reveal discontinuities on fabricated components or weldments such as bridges, drill pipes, large tanks and machinery. This specially bonded iron based powder is designed to minimize "dustiness" and provide clear, sharp discontinuities. The decrease in dusting allows for a safer inspection area. It meets or exceeds AMS 3040 and all applicable industry specifications.





## CIRCLE SYSTEMS, INC.

### PRODUCT LISTING Nonfluorescent & Fluorescent (Dual) Dry Powder Method

**SIRCHEM® DRY POWDER 73** - A highly refined red magnetic powder used for dry method magnetic particle inspection. It is designed to be used in visible light and black light to reveal minute discontinuities on fabricated components or weldments such as bridges, pipes, large tanks, machinery and equipment. It meets or exceeds AMS 3040 and all applicable industry specifications.

**SIRCHEM® DRY POWDER 75** - A highly refined green magnetic powder used for dry method magnetic particle inspection. It is designed to be used in visible light and black light to reveal minute discontinuities on fabricated components or weldments such as bridges, pipes, large tanks, machinery and equipment. It meets or exceeds AMS 3040 and all applicable industry specifications.

**SIRCHEM® DRY POWDER 93** - A highly refined and bonded orange/red magnetic powder used for dry method magnetic particle inspection. It is designed to be used in visible light, black light and blue light to reveal discontinuities on fabricated components or weldments such as bridges, drill pipes, large tanks and machinery. Dry Powder 93 possesses a unique characteristic in that discontinuities in visible light are red and under black light or blue light the discontinuities fluoresce orange. This specially bonded iron based powder is designed to minimize "dustiness" and provide clear, sharp discontinuities. The decrease in dusting allows for a safer inspection area. It meets or exceeds AMS 3040 and all applicable industry specifications.

**SIRCHEM® DRY POWDER 95** - A highly refined and bonded green magnetic powder used for dry method magnetic particle inspection. It is designed to be used in visible light, black light and blue light to reveal discontinuities on fabricated components or weldments such as bridges, drill pipes, large tanks and machinery. Dry Powder 95 possesses a unique characteristic in that discontinuities in visible light are a distinct green and under black light or blue light the discontinuities fluoresce a sharp green. This specially bonded iron based powder is designed to minimize "dustiness" and provide clear, sharp discontinuities. The decrease in dusting allows for a safer inspection area. It meets or exceeds AMS 3040 and all applicable industry specifications.





## CIRCLE SYSTEMS, INC.

### PRODUCT LISTING Underwater Inspection Method

**MI-GLOW® UNDERWATER 1** - Red particles pre-mixed with a powdered Wetting Agent for use in underwater inspection. These particles are large for better enhancement of large weld discontinuities. The particles can be used with visible light, black light and/or blue light.

**MI-GLOW® UNDERWATER 528** - Red particles pre-mixed with a powdered Wetting Agent for use in underwater inspection. These particles are finer and lighter, allowing them to remain in suspension longer and enhance finder discontinuities. The particles can be used with visible light, black light and/or blue light.





## CIRCLE SYSTEMS, INC.

### PRODUCT LISTING Odorless Inspection Oil

**CIRCLESOL M** - A high flashpoint, refined petroleum distillate specifically designed for use in magnetic particle inspection. It meets or exceeds AMS 3161 and all applicable industry specifications.

**MI-GLOW® 800L** - Mi-Glow® 800L is a pre-proportioned combination of Mi-Glow® 800 fluorescent yellow-green particles and CircleSol M, a refined petroleum distillate, packaged ready-for-use in five-gallon cans. It is designed to be used with black light to detect very fine discontinuities in finished products. It meets or exceeds AMS 3045 and all applicable industry specifications.





## CIRCLE SYSTEMS, INC.

### PRODUCT LISTING Water Conditioning Agents

**ANTIFOAM 3** - A concentrated, silicone-based defoamer for water-based systems, used to reduce excessive foaming. It should be added sparingly, per manufacturer's recommendations.

**CLEANER 500** - Cleaner 500 is a mild alkaline cleaner excellent for use in cleaning out an oil-based or water-based system prior to going to the water-based system or in between baths. This cleaner can be used undiluted or can be diluted up to one gallon cleaner to 25 gallons of water.

**CORROSION INHIBITOR 7** - A concentrated corrosion inhibitor used to supplement a water bath system with additional corrosion protection. See Technical Bulletin for recommended usage.





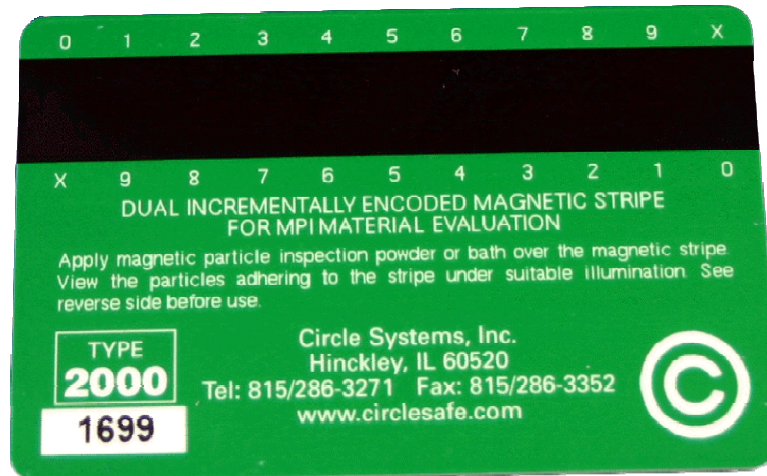
## CIRCLE SYSTEMS, INC.

### PRODUCT LISTING Accessories

#### *Magnetic Stripe Cards*

**TYPE 2000 MSC** - This card is recognized as a tool for evaluation of fluorescent wet method baths in ASTM E-709-01 "Standard Guide for Magnetic Particle Examination," Paragraph 20.6.8 and Appendix X4; as well as in ASTM E-1444-05 "Standard Practice for Magnetic Particle Testing," Appendix X7.3.

**TYPE A MSC** - This card is a high coercivity magnetic stripe card that assists in evaluating the quality of fluorescent magnetic particle baths and Sirchem® Dry Powders. The card acts as a test piece and supplement to the ASTM D-96 settling tube, Ketos ring and other tests of magnetic particle materials.



#### *Magnetic Particle Equipment Accessories*

**REFERENCE BLOCK TYPE 1 (MTU-3)** - The Reference Block is a permanently magnetized steel disc containing coarse and fine cracks that have been induced onto the surface through a special treatment. The surface is then ground and coated. The disc is used to test the performance of the magnetic particle materials and lighting environment being used and to check the sensitivity of the materials on a daily basis for material degradation and/or bath contamination. A reference photograph accompanies the Reference Block so the existing bath can be compared to indications from an optimum system.

A comprehensive selection of magnetic particle equipment accessories is available. Please call for details.