

## **Military Technologies**

**Technical Data Sheet** 

Revision #5 - 09/20/2018
Supersedes all previous versions

## CARC

<u>Chemical Agent Resistant Coating</u> **For the MILSPRAY Aerosol Touch-Up Kit** 

MIL-DTL-64159B Type-III

Water Dispersible Aliphatic Polyurethane Chemical Agent Resistant Polymeric Flattened Low VOC

Meets the requirements of: MIL-DTL-64159 T-II • MIL-DTL-64159A T-II/T-III • MIL-DTL-64159B T-II/T-III



## **DESCRIPTION**

- MIL-DTL-64159B Type-II packaged in a Type-III portable format
- · Water Dispersible Chemical Agent Resistant Coating
- Military Approved and Batch Certified

GENERAL INFORMATION				
Methods:	MILSPRAY Aerosol application.			
Mix Ratio:	Pre-portioned volumes of parts A,B,&C give the exact 2: 1: $^1/_2$ blend ratio in each kit. Use the full contents of each bottle.			
Reduction:	None. Specially formulated for the MILSPRAY Aerosol.			
Special Reduction:	Specific applications may require additional reductions. Add up to 1/3 fl oz detonized water (2 tsp).			
Cleaner:	Immediate cleanup with soap and water.			
Intended Use:	This ITAR regulated product is manufactured, distributed, and intended for authorized Military and Industrial use ONLY. With proper application, this coating enhances visual and infrared camouflage, provides resistance to chemical and biological agent contamination, and meets decontamination requirements as outlined in MIL-DTL-64159.			

los										ds)	BLENDE	D 2:1:1/2
MILSPRAY Aerosol Part Number	NSN (GSA) Order Directly From MILSPRAY	FED-STD-595C	Color Name	Gloss Max @ 60°/85°	Viscosity Range (KU)	Density (Lb/Gal)	Solids (% by Volume)	Solids (% by Weight)	VOC - Minus H20 (Max. LB/Gal)	VOC - Minus H20 (Max. LB/Gal Solids)	Blended Solids % by Volume	Blended Solids (% by Weight)
		N/A	Component B			8.94	69.23	75	2.23	3.2		
MDB0430051	8010-01-546-7589	30051	Brown 383	1.0 / 3.5	55-100	10.33	32.65	45.69	0.96	1.50	38.44	47.54
MDB0431136	8010-01-546-7591	31136	Aircraft Red	3.0 / 8.0	55-100	10.17	36.61	48.09	0.88	1.30	40.70	48.91
MDB0433303	8010-01-547-1876	33303	Sand	1.6 / 4.0	55-100	10.22	34.35	46.49	0.94	1.40	39.41	47.99
MDB0433446	8010-01-546-7587	33446	Tan-686A	1.6 / 4.0	55-100	10.15	33.32	45.25	0.97	1.50	38.82	47.29
MDB0433531	CALL	33531	Tan / Sand	1.6 / 4.0	55-100	10.23	33.57	45.89	0.96	1.50	38.96	47.65
MDB0433538	8010-01-547-1878	33538	Aircraft Yellow	3.0 / 8.0	55-100	10.03	36.61	47.35	0.88	1.20	40.70	48.49
MDB0434031	CALL	34031	Aircraft Green	0.6 / 1.2	55-100	9.61	31.18	40.35	1.03	1.50	37.60	44.49
MDB0434088	8010-01-547-1880	34088	Olive Drab	3.0 / 8.0	55-100	9.77	31.27	41.43	1.10	1.60	37.65	45.10
MDB0434094	8010-01-546-7585	34094	Green-383	1.0 / 3.5	55-100	10.22	31.51	44.18	0.98	1.50	37.79	46.67
WFB0435044	8010-01-546-7592	35044	Aircraft Insignia Blue	3.0 / 8.0	55-100	10.54	33.48	47.33	0.93	1.40	38.91	48.47
WFB0435237	CALL	35237	Blue Gray	3.0 / 8.0	55-100	10.30	33.64	46.36	0.99	1.50	39.00	47.92
MDB0436231	8010-01-547-1882	36231	Interior Aircraft Gray	3.0 / 8.0	55-100	10.70	35.18	49.54	0.87	1.30	39.88	49.74
MDB0436300	8010-01-547-1884	36300	Aircraft Gray	3.0 / 8.0	55-100	10.29	32.86	45.66	0.95	1.50	38.56	47.52
MDB0436375	CALL	36375	Medium Gray	3.0 / 8.0	55-100	10.39	34.99	47.90	0.93	1.40	39.77	48.80
MDB0437030	8010-01-546-7588	37030	Black	1.0 / 3.5	55-100	10.15	33.32	44.45	0.96	1.50	38.25	46.83
MDB0437031	CALL	37031	Interior Aircraft Black	0.6 / 1.2	55-100	10.27	36.81	48.71	0.84	1.20	40.81	49.26
MDB0437038	8010-01-546-7588	37038	Aircraft Black	1.0 / 3.5	55-100	10.15	32.32	44.45	0.96	1.50	38.25	46.83
MDB0437875	8010-01-547-1888	37875	Aircraft White	3.0 / 8.0	55-100	11.41	37.97	54.69	0.81	1.20	41.48	52.68
MDB04CAM0	8010-01-546-7590	Mixed Case: 34094 • 37038 • 30051		1.0 / 3.5	55-100	See Individual Colors Noted Abo			ve			
MDB04CAM0AC	8010-01-546-7590	Mixed Case	e: 34094 • 37038 • 30051	1.0 / 3.5	55-100		Se	e Individu	al Colors I	Noted Abov	ve	

845 Towbin Avenue . Lakewood, NJ 08701 . Phone: 732-886-2223 . Fax: 732-886-2250 Email: customerservice@milspray.com . Website: www.milspray.com . Cage Code: 3NXK3

## DIRECTIONS FOR USE

	<u>DIRECTIONS FOR USE</u>		
Step 1 "Part A"	Prior to opening the large MILSPRAY "Part-A" bottle:  a. Shake the container vigorously for 30-seconds <u>AFTER</u> the agitation ball dislodges  b. Swirl the container rapidly in a circular motion for 10-seconds minimum  c. Vigorously shake the container in an up & down motion for 10-seconds minimum  d. Swirl the container rapidly in a circular motion for 10-seconds minimum	MICSPRAY	MILSPRAY
Step 2 "PartB"	Remove the cap from the small "Part-B" bottle  a. Puncture the aluminum seal with the enclosed spout tip then attach it to the bottle  b. Place the tip of the Part-B spout on the foil seal of the large MILSPRAY bottle  and gently push until the spout has fully penetrated the seal. Gently squeeze the  "Part B" bottle several times until all contents are fully dispensed into the large  MILSPRAY bottle.  c. Replace the cap on the large MILSPRAY bottle and shake vigorously for 2-minutes		ANG.
Step 3 "Deionized Water"	Remove cap from the "Deionized Water" bottle:  a. Puncture the aluminum seal with the enclosed spout tip then attach it to the bottle  b. Place tip of the Deionized Water bottle through the existing hole in the foil  seal on the large MILSPRAY bottle and dispense all contents into the large  MILSPRAY bottle.  c. Replace cap on large MILSPRAY bottle. Shake vigorously for 30-seconds minimum.	Tarker.	and a
Step 4 "Assembly"	Firmly insert small siphon tube into bottom of aerosol unit and twist to seat it securely.  a. Remove the cap on the fully mixed large MILSPRAY bottle  b. Lightly insert the aerosol unit through the foil seal.  c. Using the thick, rigid portion of the siphon tube housing, expand the foil opening by		

moving the sprayer back and forth randomly in the bottle.

For best Results, apply uniformly in one direction with 50% overlap.

\* Photos for demonstration only – please wear gloves, eye protection, and appropriate Personal Protection Equipment (PPE).

SURFACE PREPARATION

Pre-treatment: A-A-59745 Zinc RICH, TT-C-490 Zinc Phosphate, DOP-P-15328 wash primer, MIL-C-8514 wash primer, MIL-C-5541 conversion primer, or MIL-A-8625 Anodization. Consult MIL-DTL-53072 or your statement of work for pre-treatment requirements.

Primer: MIL-PRF-23377, MIL-DTL-53022, MIL-DTL-53030, MIL-PRF-85582D or MIL-P-53089. Consult MIL-DTL-53072 or your statement of work for primer requirements.

Masking: Prior to application, properly protect and mask all adjacent surface areas that are NOT to be coated.

When finished, dispose of in accordance with

local base

regulations.

APPLICATION & CURE TIME					
Temperature / Humidity:	Recommended temperature range of 55°F - 90°F. Recommended relative humidity range of 10% - 80%.				
Film Thickness	4.0-5.5 mil WFT/1.8-2.2 DFT *WARNING: 1.8 mil DFT minimum required for CARC protection				
Pot Life:	4 hours after mixing. *High temperature and high humidity levels will decrease the potlife.				
Dry Time:	45-60-Min. (Dry to touch), 4-6-Hours (Dry Hard), 6-8-Hours (Dry-through) at 77°F and 50% Relative Humidity, full cure in 7 days.				
Recoat:	Min: 8-10 hours, Max time: 7-10 days for clean surfaces. Scuff sand and clean as needed.				

<u>STORAGE</u>					
Shelf Life:	This product must be used by the labeled expiration date to be in compliance with Military specifications.				
Suggested:	Store away from direct sunlight at 50-85°F @ 50% relative humidity. Higher temps & humidity for extended periods of time will reduce shelf life. Store at room temperature in dry and adequately ventilated area. Keep all containers tightly sealed.				

SAFETY				
P.P.E., Handling, Spills, and Disposal:	Proper Personal Protective Equipment (PPE) should be worn at all times when working with this coating. Consult the Material Safety Data Sheets (MSDS) for guidance.			
CAUTION:	The Surgeon General requires airline respirators to be used unless air sampling shows exposure to be below standards. Then, either chemical cartridge respirators or airline respirators are required. Avoid contact with skin and eyes. Use with adequate ventilation. For other safety recommendations, refer to the Material Safety Data Sheet (MSDS). Keep containers closed.  NOTE: THE INFORMATION PROVIDED WITHIN IS FOR REFERENCE ONLY. Each application is specific in nature and the consumer must be aware of environmental and application factors which may adversely affect the integrity of the coating. Refer to MIL-DTL-53072C for more information.			