



PRODUCT DATA

Sanitrol-MB

NO RINSE FOOD CONTACT SANITIZER AND DISINFECTANT

PEST CONTROL PRODUCTS ACT REGISTRATION NO. 23573 DIN NO. 02073021
FOOD PLANT APPROVED

SANITROL - MB is an economical sanitizer, virucide, fungicide, mildewcide and deodorant, used in a variety of applications. These may include sanitizing food processing equipment, dairy equipment, food utensils, dishes, glassware, sinks, counter tops, cutting boards, refrigerated storage and display equipment. It may also be used on poultry equipment, animal quarters, kennels and other hard non-porous surfaces, without a potable water rinse.

DISINFECTION IN HOSPITALS. NURSING HOMES AND OTHER HEALTH CARE INSTITUTIONS:

For disinfecting floors, walls, countertops, bathing areas, lavatories, bed frames, tables, chairs, garbage pails and other hard non porous surfaces. Add 6 mL **SANITROL-MB** to 1 litre water Apply to previously cleaned hard surfaces. At this use level, **SANITROL-MB** is effective against *Pseudomonas aeruginosa*, *Staphylococcus aureus* and *Salmonella choleraesuis* in the presence of 5% blood serum, when evaluated by the AOAC Use-Dilution Test.

DISINFECTION OF Institutions, INDUSTRY AND SCHOOLS:

Add 6.0 mL of **SANITROL-MB** to 1 litre of water. At 1.75 mL/litre of water use level, the fungicidal effectiveness of **SANITROL-MB** in the presence of 5% blood serum against *Trichophyton mentagrophytes* has been shown, utilizing the AOAC Fungicidal Test. Dishes, silverware, glasses, cooking utensils and other similar size food processing equipment can be sanitized by immersion in a 2 mL/L solution of **SANITROL-MB**. No potable rinse required.

DISINFECTION OF BARBER TOOLS:

Pre cleaned barber tools (such as combs, brushes, razors and scissors), can be disinfected by immersing in a 2 mL/L solution of **SANITROL-MB**.

DISINFECTION OF POULTRY EQUIPMENT. ANIMAL QUARTERS AND KENNELS:

Poultry brooders, watering fountains, feeding equipment and other animal quarters (such as stalls and kennel areas) can be disinfected after thoroughly cleaning by applying a solution of 6 mL **SANITROL-MB** to 1 litre of water. Small utensils should be immersed in this solution. Prior to disinfection, all poultry, other animals and their foods must be removed from the premises. This includes emptying all troughs, racks and other feeding and water appliances. Remove all litter and droppings from floors, walls and other surfaces occupied or traversed by poultry or other animals. After disinfection, ventilate buildings, coops and other closed spaces Do not house poultry, or other animals or employ equipment until treatment has been absorbed, set or dried. All treated equipment that will contact food or drinking water must be rinsed with potable water before reuse.

Sanitrol - MB is effective in hard water areas up to 400 ppm hardness (calculated as CaCO₃).

Areas of application: Hospitals, nursing homes, medical offices, institutions, farms, restaurants, food processing plants, dairies, bars, hair dressing salons, veterinarians, etc.

See label for complete directions before use.

Sanitrol - MB is a "One-Step" Hospital Disinfectant, Virucide, Fungicide, and Sanitizer.

Listed below, and in the following pages, is a summary of the Antimicrobial Claims and a review of the test results.

Claim:	Contact Time:	Organic Soil:	Water Conditions:		
Disinfectant	10 minutes	5%	Deionized		
Organism	ATCC#	Dilution	Replicates		Results
Brevibacterium					
Ammoniagenes	6871	450 ppm	20		0/20
Campylobacter jejuni	29428	450 ppm	10, 10		0/10, 0/10
Citrus Canker USDA	46190	2000 ppm	10, 10		0/10, 0/10
Escherichia coli	11229	450 ppm	20		0/20
Escherichia coli ¹	35150	450 ppm	10, 10		0/10, 0/10
Klebsiella pneumoniae	4352	450 ppm	20		0/20
Listeria monocytogenes	19115	450 ppm	10, 10		0/10, 0/10
Pseudomonas aeruginosa 15442		450 ppm	60, 60, 60, 40	0/60, 0/60, 0/60, 0/40	
Pseudomonas cepacia	17765	450 ppm	10, 10, 10		0/10, 0/10, 0/10
Pseudomonas cepacia	25416	450 ppm	10, 10, 10		0/10, 0/10, 0/10
Pseudomonas cepacia	25608	450 ppm	10, 10, 10		0/10, 0/10, 0/10
Salmonella cholerasuis	10708	450 ppm	30, 30, 30, 30		0/30, 0/30, 0/30, 0/30
Salmonella typhi	6539	450 ppm	20		0/20
Staphylococcus aureus	6538	450 ppm	60, 60, 60, 40		0/60, 0/60, 0/60, 0/40
Yersinia enterocolitica	9610	450 ppm	10, 10		0/10, 0/10

Sanitrol - MB meets requirements for hard surface virucidal claims in hospital and medical environments

Claim:	Contact Time:	Organic Soil:	Water Conditions:			
Virucide	10 minutes	5%	Deionized			
Organism Results	Source of Virus or ATCC#	Host System; Cytopathic Effect	Contact Time	Dilution	Replicates	Log 10 Reduction
Avian Influenza	Turkey/WIS SPAFAS LAB	Embryonated Chicken Eggs	10 Min.	450 ppm	4	99.99%
Canine Distemper	VR-128	Vero CCL-81	10 Min.	450 ppm	2	99.99%
Herpes Simplex Type 1	HSV-1 Sabin	Human Epithelioma #2 cells; lytic cytopathic effect	2 Min.	450 ppm	8	>3.0
Herpes Simplex Type 2	HSV-2 Sabin	Human Epithelioma #2 cells; lytic cytopathic effect	2 Min.	450 ppm	8	>3.0
Infectious Bronchitis (Arkansas 99)	Arkansas 99	Embryonated Chicken Eggs	10 Min.	450 ppm	4	99.99%
Influenza A2/ Hong Kong	ATCC 68-H3N2	MDCK cells; lytic cytopathic effect	2 Min	450 ppm	4	>4.5
Marek' Disease	SB-1	Primary chick embryo fibroblasts (PCF)	10 Min,	450 ppm	4	99.99%
Newcastle' Disease	VR 108	Fetal bovine serum	10 Min.	450 ppm	4	>3.0
Pseudorabies Virus	VR-135	MDBK Cells	10 Min.	450 ppm	2	99.99%
Vaccinia	Wyeth strain	H. Ep. #2 cells fed with EMEM95CS5; Cytopathic Effects	2 Min.	450 ppm	8	>3.0

Sanitrol - MB is an effective fungicide for nonporous inanimate hard surfaces when diluted 1:164 in the presence of 5% organic soil.

Claim:	Contact Time:	Organic Soil:	Water Conditions:			
Fungicide	10 minutes	5%	Deionized			
Organism	ATCC#	Dilution	Replicates	Results 5 Min	10 Min	15Min
Trichophyton	9533	450 ppm	4	4	+	0
Mentagrophytes		(0.78 oz/gal)				0

Sanitrol - MB is an effective Food Contact Sanitizer against the above listed bacteria on hard non-porous surfaces when diluted as indicated in synthetic hard water.

Claim:	Contact Time:	Organic Soil:	Water Conditions:		
Sanitizer Food Surfaces	60 seconds	Pre-clean	Varies in CaCO ₃ ppm		
Organism	ATCC#	Dilution	Water Conditions	Replicates	Results % Reduction
Escherichia coli	11229	150 ppm	400 ppm	4	>99.999
		(0.25 oz/gal)			
Staphylococcus aureus	6538	150 ppm	400 ppm	4	>99.999
Campylobacter jejuni	29428	200 ppm	500 ppm	4	>99.999
		(0.34 oz/gal)			
Escherichia coli	11229	200 ppm	500 ppm	4	>99.999
Escherichia ₁ coli	35150	200 ppm	500 ppm	4	>99.999
Klebsiella Pneumoniae	4352	200 ppm	500 ppm	10	>99.999
Listeria monocytogenes	19115	200 ppm	500 ppm	4	>99.999
Salmonella choleraesuis	10708	200 ppm	500 ppm	4	>99.999
Shigella sonnei	11060	200 ppm	500 ppm	4	>99.999
Staphylococcus aureus	6538	200 ppm	500 ppm	4	>99.999
Yersinia enterocolitica	9610	200 ppm	500 ppm	4	>99.999
Escherichia coli	11229	400 ppm	1000 ppm	10	>99.999
Staphylococcus aureus	6538	400 ppm	1000 ppm	10	>99.999

Sanitrol - MB is effective as a Non-Food Contact Sanitizer against the above listed bacteria on hard, non-porous surfaces when diluted as indicated.

Claim:	Contact Time:	Organic Soil:	Water Conditions:		
Sanitizer Non-Food	60 seconds	Pre Clean	1100 in CaCO ₃ ppm		
Organism	ATCC#	Dilution	Replicates	Results % Reduction	
Klebsiella pneumoniae	4352	200 ppm	10	>99.999	
Staphylococcus aureus	6538	200 ppm	10	>99.999	

Summary of Antimicrobial Efficacy - Etiology²

Pathogenic Microorganism Description

Avian Influenza Virus	A highly contagious virus which can cause up to 100% mortality in domestic fowl. Spread through direct or indirect contact with each other or equipment or humans
Brevibacterium ammoniagenes	Gram positive bacteria environmental contaminant. Associated with industrial contamination.
Campylobacter jejuni	Gram negative bacteria associated with acute gastroenteritis. Spread by anal/oral route of infection, resulting in diarrhea outbreaks.
Canine Distemper Virus	An RNA virus causing fever, lack of appetite, and depression leading to more serious symptoms such as coughing, vomiting, diarrhea, and death in canines.
Citrus Canker	A highly contagious disease for citrus crops caused by bacteria which can defoliate crops as well as reduce fruit quality and cause premature fruit drop.
Escherichia coli	Gram negative bacteria spread by anal/oral route of infection, resulting in diarrhea outbreaks. Associated with urinary tract infections and bacteremia.
Herpes Simplex Type 1 & 2	Lipophilic (enveloped) DNA virus, may result in oral mucocutaneous lesions. Associated with most orofacial herpes and HSV encephalitis.
Infectious Bronchitis Virus – Arkansas 99	Effects are loss of egg production in chickens.
Influenza A2/Hong Kong	Lipophilic (enveloped) RNA virus. Causative agent in viral flu. Causes flu epidemics in nearly 2 of every 3 years.
Klebsiella pneumoniae	Gram negative bacteria associated with severe pneumonia, bacteremia and urinary tract infections.
Listeria monocytogenes	Gram positive (rod shape) bacteria. Considered a potent food pathogen. Found in raw meat and poultry. Infections can result in meningitis or sepsis.
Marek' Disease Virus	A chicken herpes virus causing abnormal cell growth on peripheral nerves and central nervous system of fowl, causing paralysis. Spread by dander on feather follicles, it can be excreted in saliva and can enter respiratory system.
Newcastle' Disease Virus	A viral infection in poultry transmitted by inhalation of infectious aerosols which can affect humans.
Pseudomonas aeruginosa	Gram negative bacteria identified as a major cause of hospital acquired (nosocomial) infections. Causes wound infections (especially burn), meningitis, pneumonia and eye infections. Required for Hospital Disinfectants.
Pseudomonas cepacia	Gram negative bacteria identified as a cause of hospital acquired (nosocomial) infections. Causes septicemia, meningitis, endocarditis, pneumonia, eye wound and urinary tract infections, especially with the chronically ill.
Pseudorabies Virus	A extremely contagious herpes virus causing rapid death in animals. Also known as Aujeszky' Disease
Salmonella typhi	Gram negative (rod shaped) bacteria directly spread by anal/oral route of infection; indirectly (including food, hands, flies) spread by contaminated food and inanimate objects Causative agent for typhoid fever.
Salmonella choleraesuis	Gram negative bacteria associated with acute gastroenteritis and septicemia. Required for Hospital Disinfectants.
Shigella sonnei	Gram negative bacteria causing Shigellosis (bacillary dysentery). Highly infectious food borne illness spread primarily by oral-fecal route. Unsanitary food handling and contaminated water are most common causes of contaminated food.
Staphylococcus aureus	Gram positive bacteria identified as a major cause of hospital acquired (nosocomial) infections. Colonizes food and secretes enterotoxins which cause food poisoning after ingestion. Causes wound infections, septicemia, endocarditis, meningitis, osteomyelitis and pneumonia. Required for Hospital Disinfectants.
Trichophyton mentagrophytes	Athlete's foot fungus. Found in shower and dressing rooms.
Vaccinia	Lipophilic (enveloped) DNA poxvirus; causes poxvirus infections.
Yersinia enterocolitica	Small gram negative coccobacilli. A zoonotic agent, infections can be passed from animals to humans. A potent food pathogen. Infections can cause abdominal pain, diarrhea, and fever.

² Microbiology, D. Kingsbury and G. Wagner Harwal Publishing 1990