## MATERIAL SAFETY DATA SHEET |-----|

\_\_\_\_\_ SECTION 1 - CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

THIS MSDS IS OFFERED IN CANADIAN-FRENCH AND SPANISH UPON REQUEST

PRODUCT NAME : TSP SUBSTITUTE
UPC NUMBER : 7422160001, 7422165070, 7422165080

PRODUCT USE/CLASS : Cleaner

MANUFACTURER:

DAP INC.

2400 BOSTON STREET

BALTIMORE, MD 21224

DAP CANADA CORP.

475 FINCHDENE SQUARE UNIT 5

SCARBOROUGH, ONTARIO M1X 1B7

24 HOUR EMERGENCY:

TRANSPORTATION: 1-800-535-5053 (352-323-3500) MEDICAL : 1-800-327-3874 (513-558-5111)

PREPARE DATE: 11/1/1999 GENERAL INFORMATION:

REVISION NO.: 1 DAP INC. : 1-888-DAP-TIPS (1-888-327-8477)

REVISION DATE: 1/12/2000

SECTION 2 - COMPOSITION/INFORMATION ON INGREDIENTS

WT/WT %

ITEM	CHEMICAL NAME	CAS NUMBER	RANGE
01	Sodium Carbonate	497-19-8	80.0-90.0 %
02	Sodium Metasilicate Anhyd.	6834-92-0	1.0-5.0 %
03	Sodium Dodecylbenzenesulfonate	25155-30-0	1.0-5.0 %
04	Sodium Sequicarbonate	533-96-0	5.0-10.0 %

		E	XPOSURE LIMITS			
	ACGI	H	OSHA		COMPANY	
ITEM	TLV-TWA	TLV-STEL	PEL-TWA	PEL-CEILING	TLV-TWA	SKIN
01	10 mg/m3	N.E.	15 mg/m3	N.E.	N.E.	NO
02	2 mg/m3NaOH	N.E.	2 mg/m3NaOH	N.E.	N.E.	NO
03	N.E.	N.E.	N.E.	N.E.	N.E.	NO
04	10  mg/m3	N.E.	15 mg/m3	N.E.	N.E.	NO

(See Section 16 for abbreviation legend)

Remaining ingredients are not considered hazardous per the OSHA Hazard Communication Standard.

Listed Permissible Exposure Levels (PEL) are from the U.S. Dept. of Labor OSHA Final Rule Limits (CFR 29 1910.1000); limits may vary between states.

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Product Name: TSP SUBSTITUTE
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SECTION 3 - HAZARDS IDENTIFICATION

EMERGENCY OVERVIEW: WARNING! IRRITANT! Causes eye and skin irritation. Exposure to dust may result in build-up of material in eyes, ears, nose, and mouth which may cause irritation, or burns.

## POTENTIAL HEALTH EFFECTS:

EFFECTS OF OVEREXPOSURE - EYE CONTACT: May cause eye irritation.

EFFECTS OF OVEREXPOSURE - SKIN CONTACT: May cause skin irritation.

EFFECTS OF OVEREXPOSURE - INHALATION: Exposure to dust causes irritation to nose, throat, and respiratory system.

EFFECTS OF OVEREXPOSURE - INGESTION: Irritating to mucous membranes of mouth, throat and stomach.

EFFECTS OF OVEREXPOSURE - CHRONIC HAZARDS: Prolonged or repeated inhalation of dust may cause lung damage. Prolonged or repeated exposure may cause severe eye and skin irritation.

MEDICAL CONDITIONS WHICH MAY BE AGGRAVATED BY CONTACT: Asthma and asthma-like conditions may worsen from prolonged and repeated exposure.

PRIMARY ROUTE(S) OF ENTRY: SKIN CONTACT INHALATION

SECTION 4 - FIRST AID MEASURES

EYE CONTACT: Flush with large quantities of water until irritation subsides. Contact a physician.

SKIN CONTACT: Wash with soap and water. If irritation of skin persists, contact a physician.

INHALATION: Remove to fresh air. Contact a physician immediately.

INGESTION: DO NOT INDUCE VOMITING. Give the victim one to two glasses of water or milk. Never give liquids to an unconscious victim. Contact a physician or Regional Poison Control Center immediately.

COMMENTS: Medical Emergency Phone Number is 1-800-327-3874

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SECTION 5 - FIRE FI	GHTING MEASURES
FLASH POINT: N.A.	LOWER EXPLOSIVE LIMIT: N.A. UPPER EXPLOSIVE LIMIT: N.A.
AUTOIGNITION TEMPERATURE: N.E.	
EXTINGUISHING MEDIA: CO2 DRY CHEMICAL	FOAM
UNUSUAL FIRE AND EXPLOSION HAZARDS: Ma	terial will not burn.
SPECIAL FIREFIGHTING PROCEDURES: Use wa	ater spray to cool exposed surfaces.
SECTION 6 - ACCIDENTAL	RELEASE MEASURES
SPILL OR LEAK PROCEDURES: Sweep up excinto containers.	ess powder. Place remaining powder
SECTION 7 - HANDLI	
HANDLING INFORMATION: KEEP OUT OF REACTION excessive heating and freezing. Available dusts of this product.	
STORAGE INFORMATION: Keep container cl	osed when not in use.
OTHER PRECAUTIONS: None.	
SECTION 8 - EXPOSURE CONTRO	 LS/PERSONAL PROTECTION
ENGINEERING CONTROLS: Provide sufficies maintain exposure below PEL and TLV. Winechanical ventilation (local or general below PEL and TLV.	hile mixing, provide sufficient
RESPIRATORY PROTECTION: A respiratory page 1910.134 and ANSI Z88.2 requirements musconditions warrant a respirator's use.	
EYE PROTECTION: Goggles or safety glas	ses with side shields.
SKIN PROTECTION: Gloves recommended for	r repeated or prolonged contact with

OTHER PROTECTIVE EQUIPMENT: Provide eyewash and coveralls if body contact may occur.

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Product Name: TSP SUBSTITUTE Revision Date: 1/12/2000 Page 4 SECTION 8 - EXPOSURE CONTROLS/PERSONAL PROTECTION \_\_\_\_\_ HYGIENIC PRACTICES: Follow all MSDS/label precautions even after container is emptied because they may retain product residues. SECTION 9 - PHYSICAL AND CHEMICAL PROPERTIES BOILING RANGE : N.A. VAPOR DENSITY : N.A. ODOR : Low odor APPEARANCE : White powder EVAPORATION RATE: N.A. SOLUBILITY IN H2O : Dispersible SPECIFIC GRAVITY : 1.1 VAPOR PRESSURE : N.A. PHYSICAL STATE : Powder (See Section 16 for abbreviation legend) SECTION 10 - STABILITY AND REACTIVITY CONDITIONS TO AVOID: Excessive heat and freezing. INCOMPATIBILITY: Strong oxidizers and caustics. HAZARDOUS DECOMPOSITION PRODUCTS: Normal decomposition products, i.e. COx, HAZARDOUS POLYMERIZATION: Will not occur under normal conditions. SECTION 11 - TOXICOLOGICAL PROPERTIES

STABILITY: This product is stable under normal storage conditions.

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Sodium Carbonate LD50 Rat Oral : 4090 mg/kg Rat Inhalation: 2300 mg/kg/2hr.

Sodium Metasilicate Anhyd. LD50 Rat Oral : 1280 mg/kg

SECTION 12 - ECOLOGICAL INFORMATION

No Information Available.

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Product Name: TSP SUBSTITUTE Revision Date: 1/12/2000	Page 5
SECTION 13 - DISPOSAL CONSIDERATIONS	
WASTE MANAGEMENT/DISPOSAL: Dispose of according to Federal, State, Local Standards. This product does not meet the definition of a haz waste according to U.S. EPA Hazardous Waste Management Regulations, Section 261. Do not reuse empty containers. State and Local regulations/restrictions are complex and may differ from Federal regulations. Responsibility for proper waste disposal is with the ow the waste.	and ardous 40 CFR
EPA WASTE CODE - If discarded (40 CFR 261): None.	
SECTION 14 - TRANSPORTATION INFORMATION	j
DOT PROPER SHIPPING NAME: Not Regulated by D.O.T.	ı
DOT HAZARD CLASS: NONE	
DOT UN/NA NUMBER: NONE PACKING GROUP: NONE	
SECTION 15 - REGULATORY INFORMATION	j
U.S. FEDERAL REGULATIONS: AS FOLLOWS -	
OSHA: Hazardous by definition of Hazard Communication Standard (29 C 1910.1200)	!FR
SARA SECTION 313: This product contains the following substances subject to the repor requirements of Section 313 of Title III of the Superfund Amendments Reauthorization Act of 1986 and 40 CFR Part 372:	

----- CHEMICAL NAME ----- CAS NUMBER WT/WT % RANGE No SARA Section 313 components exist in this product.

TOXIC SUBSTANCES CONTROL ACT:

This product contains the following chemical substances subject to the reporting requirements of TSCA 12(B) if exported from the United States:

----- CHEMICAL NAME ----- CAS NUMBER No information is available.

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SECTION 15 -	REGULATORY	INFORMATION

----- CHEMICAL NAME ----- CAS NUMBER

NEW JERSEY RIGHT-TO-KNOW:

The following materials are non-hazardous, but are among the top five components in this product:

----- CHEMICAL NAME ----- CAS NUMBER No non-hazardous materials are among the top five components.

PENNSYLVANIA RIGHT-TO-KNOW:

The following non-hazardous ingredients are present in the product at greater than 3%:

----- CHEMICAL NAME ----- CAS NUMBER No non-hazardous ingredients are present greater than 3%.

CALIFORNIA PROPOSITION 65:

WARNING: The chemical(s) noted below and contained in this product, are known to the state of California to cause cancer, birth defects or other reproductive harm:

----- CHEMICAL NAME ----- CAS NUMBER No Proposition 65 chemicals are known to exist in this product.

INTERNATIONAL REGULATIONS: AS FOLLOWS -

CANADIAN WHMIS: This MSDS has been prepared in compliance with Controlled Product Regulations except for use of the 16 headings.

CANADIAN WHMIS CLASS: Class D2B; Class C

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SECTION 16 - OTHER INFORMATION

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HMIS RATINGS - HEALTH: 2 FLAMMABILITY: 0 REACTIVITY: 0

PREVIOUS MSDS REVISION DATE: 11/1/1999.

REASON FOR REVISION:

SECTION 1: Addition of Canadian address

VOC less water, less exempt solvents: 0 g/L (Calculated) 
VOC material 0 g/L (Calculated)

LEGEND: ACGIH - AMERICAN CONFERENCE OF GOVERNMENTAL INDUSTRIAL HYGIENISTS

N.A. - NOT APPLICABLE N.E. - NOT ESTABLISHED

PEL - PERMISSIBLE EXPOSURE LIMIT
NTP - NATIONAL TOXICOLOGY PROGRAM

SARA - SUPERFUND AMENDMENTS AND REAUTHORIZATION ACT OF 1986

STEL - SHORT TERM EXPOSURE LIMIT

TLV - THRESHOLD LIMIT VALUE(8 HR. TIME WEIGHTED AVERAGE OR TWA)

VOC - VOLATILE ORGANIC COMPOUND NJRTK - NEW JERSEY RIGHT TO KNOW LAW

N.D. - NOT DETERMINED

MSDS# 79401

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This data is offered in good faith as typical values and not as a product specification. No warranty either expressed or implied, is hereby made. The recommended industrial hygiene and safe handling procedures are believed to be generally applicable. However, each user should review the recommendations in specific context of the intended use and determine if they are appropriate.

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