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**TITELBLAD
TITLE PAGE**

TITEL
TITLE

: COATINGS CONTAINING AN
: INSECTICIDE AND FUNGICIDE FOR
: USE ON WOODEN SURFACES.

DOKUMENTNOMMER
DOCUMENT NUMBER

:
: K-STD-0011
: (SUPERCEDING KA 3169)

OPSOMMING
SUMMARY

: FINAL COATING ON WOODEN
: ARTICLES TO PRESERVE IT
: AGAINST ATTACKS FROM FUNGI AND
: INSECTS.

SLEUTELWOORDE
KEY WORDS

: INSECTICIDE
: FUNGICIDE
: WOODEN PACKAGING
: COATING

DMS: B11

INFORMATION

DATE: 2023-07-12

ISSUED BY: ..

IMPLEMENTERINGSDATUM
DATE OF IMPLEMENTATION

JUNE 1990

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Klassifikasie
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GOEDKEURINGSBLADSY

APPROVAL PAGE

NYWERHEIDSVESTING
INDUSTRIAL DEVELOPMENT

OPGESTEL DEUR
COMPILED BY PACKAGING COMMITTEE

NAGESIEN DEUR
CHECKED BY J.A.S. HOLIDAY

HANDTEKENING
SIGNATURE

CHAIRMAN
PACKAGING COMMITTEE

1991-07-15

DATUM
DATE

HANDTEKENING
SIGNATURE

C. ARMY - D. MUNITION

1991-08-6

DATUM
DATE

HANDTEKENING
SIGNATURE

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ARMSCOR

HERSIENINGSGESKIEDENIS

AMENDMENT HISTORY

DOK UITG DOC ISSUE	DATUM DATE	VERANDERDE SEKSIE/HOOFSTUK/BLADSY SECTION/CHAPTER/PAGE ALTERED	VERANDERINGSVOORSTELNO CHANGE PROPOSAL NO	NAGESIEN CHECKED	
				NAAM NAME	PAR INIT
THIS DOCUMENT ORIGINATES FROM KA 3169				CHAIRMAN	
A.	1990-02-28	CONCEPT		PACKAGING COMMITTEE	
B.	1990-06-30	FINAL CONCEPT			
1.	1991-06-11	RELEASE			

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INHOUDSOPGAWE

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 1. SCOPE :

This specification covers the requirements for a coating for wooden surfaces. The coating shall contain an insecticide and fungicide for the long term preservation of wooden packaging items.

 2. APPLICABLE DOCUMENTS :

The following documents of the latest issue in effect on date of invitation for bids or request for proposal form a part of this specification to the extent specified herein. In the event of a conflict between the documents referenced herein and the content of this specification, the contents of this specification shall be the superceding requirement.

 2.1 Specifications

BS 381C; Colour tints for paint application.

 2.2 Standards

Not applicable.

 2.3 Drawings

Not applicable.

 2.4 Reference documents

2.4.1 Book: Threshold Limit Values and Biological Exposure Indices for 1989-1990 by the American Conference of Governmental Industrial Hygienists (ACGIH).

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3. REQUIREMENTS :

3.1 General material requirements

The materials used in the coating shall be as specified herein. Materials not specified shall be selected by the contractor and shall be subject to all provisions of this specification.

3.1.1 Character or quality

3.1.1.1 Viscosity

The suggested working viscosity should be between 14 and 18 seconds using a number 4 Ford cup.

3.1.2 Formulation

The manufacturer can formulate any coating to conform to this specification.

3.1.3 Product characteristics

3.1.3.1 Application properties

The coating shall be capable of being applied to obtain a dry film which shall be continuous, smooth and uniform in colour and appearance. The drying time of the paint film whether applied by spraying or dipping shall not exceed four hours.

3.1.3.2 Insecticide and fungicide

When tested by the CSIR the coating shall contain sufficient insecticide and fungicide so as to prevent deterioration of coated wooden products for a period of at least two years.

3.1.3.3 Colour

The colour of the coating, when dry, shall conform to BS 381C, tint 499, service brown, unless otherwise specified in the purchasing document or on the applicable item drawing.

3.1.4 Chemical, electrical and mechanical properties

The manufacturer can make up any coating that will conform to this specification.

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3.1.5 Environment conditions

The wooden article, coated with this coating can be stored above ground, in a ventilated store, or in an underground storage facility. In the underground facility the temperature may vary between 30 and -10°C with a relative humidity of 100%. No direct sunlight may fall on the item where it can be stored for a period of five years.

3.1.6 Toxic products and safety

The paint shall contain not more than 1,0% by mass, calculated on the total composition, of any of the following:

Soluble heavy metals, when determined in accordance with ISO 6713.2 and ISO 3856/1 to 4.

Any volatile organic solvents with a TLV-TWA below 100 ppm as referred to in the Threshold Limit Values and Biological Exposure Indices for 1989-1990 (ACGIH).

The coating shall present no abnormally high levels of toxicity, and shall be certified by the Department of Health to this effect.

3.1.7 Tackiness

When tested in accordance with 4.4.5 no tackiness shall occur.

3.1.8 Identification and marking

A label with the following minimum information shall be attached to the drum/container:

COATING, WOODEN SURFACES, CONTAINING FUNGICIDE AND INSECTICIDE.

Colour:

Manufacturer:

Batch number:

Date of manufacture:

Expiry date:

Direction for use.

Standard: K-STD-0011

Order number:

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3.1.9 Workmanship

This section is not applicable to this specification.

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3.2 Qualification

This coating must be qualified by the C.S.I.R., Department of Health and Department of Agricultural and Technical Services, for compliance to this specification and to ruling national regulations/laws.

4. QUALITY ASSURANCE PROVISIONS :

4.1 Responsibility for inspection

Quality assurance provisions shall be done in accordance with ACSA/DP 5 : "Quality assurance requirements for procurement programmes involving aspects of manufacture, supply and delivery/ installation".

Unless otherwise specified in the contract or purchase order, the supplier is responsible for the performance of all the inspection and testing as specified herein. Except as otherwise specified the supplier may utilize his own facilities or any commercial laboratory acceptable to Armscor. Armscor reserves the right to perform any of the inspections set forth in the specification where such inspections or tests are deemed necessary to assure supplies and services conform to prescribed requirements.

4.2 Special Tests and Examinations

This section is not applicable to this specification.

4.3 Quality Conformance Inspection

The following tests and examinations shall be performed to verify conformance to requirements of Section 3 as indicated in the verification cross reference matrix, Table 1, page 11.

4.3.1 Verification method

According to the verification cross reference matrix, will acceptance of the paint be based upon inspections, reviews of analytical data, demonstrations or tests.

Inspections and review of analytical data will be performed by the person appointed to accept the paint. In the case of Armscor it will be the appointed Quality Assurance Representative (QAR).

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4.3.2 Certification of conformance

The manufacturer of the coating shall supply, with each batch, a certificate of conformance to this specification.
The certificate of conformance shall at least state:

The name of the company.
The batch number and date of manufacture.
State that the coating conforms to this specification.
Issuing date.

The certificate of conformance must be issued by the Technical Director or designated person.

The certificate from the C.S.I.R. and the Department of Health (refer to paragraph 3.2) must be attached to this certificate of conformance.

4.4 Test methods

4.4.1 Viscosity

Fill the Ford cup with the ready to use coating to the required level. Determine the time for the coating to empty the cup.

4.4.2 Colour test

Compare a dry coated item with the standard sample according to specification BS 381 C, or to the specification specified in the purchase document.

4.4.3 Insecticide test and fungicide test

The test must be performed by the C.S.I.R., refer to paragraph 3.2.

4.4.4 Toxic products and safety

This test will form part of the qualification performed by the Department of Health, C.S.I.R. Refer to paragraph 3.2.

4.4.5 Tackiness

Two test specimens shall be dipped in paint and left to dry separately for a maximum of four hours. The two specimens shall then be joined and clamped together for one hour. No adhesion shall occur when separated.

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4.4.6 Identification and marking

The label shall be clearly legible with the letters a minimum height of between 15 and 20 mm. Refer to the requirements 3.1.7 for the wording of the label. The information must be complete, but are not limited to 3.1.7.

A visual inspection shall be done to ensure that the label remains adhered to the drum/container until the expiry date of the coating under normal handling and storage conditions.

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TABLE 1 : VERIFICATION CROSS REFERENCE MATRIX :

Verification method:

1. Inspection.
2. Review of analytical data.
3. Demonstration.
4. Test.

Section 3 Requirement	Verification Method				Classification			Section 4 Verification
	1	2	3	4	Critical	Major	Minor	
3.1.1.1				X			X	4.4.1
3.1.3.2				X		X		4.4.3
3.1.3.3	X						X	4.4.2
3.1.6				X	X			4.4.4
3.1.7	X					X		4.4.5
3.1.8	X							4.4.6

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5. PREPARATION FOR DELIVERY

5.1 Preservation and packaging

Packaging

The coating shall be packed in 20, 25 or 200 litre drums. The drums will be durable to withstand normal shocks during road transport and loading and off loading procedures, and must comply to National health and transport regulations.

5.2 Marking

The label on the container as described in 3.1.7 shall be visible on the container.

6. NOTES

6.1 Intended use

This coating shall be used by the suppliers of wooden articles (pallets, containers, boxes) as a final coat. The coating shall preserve the wood against attacks from fungi and insects as commonly expected in underground storage facilities.

6.2 Ordering data

Procurement documents should specify at least the following:

- a. Title, number, issue and date of this specification.
- b. Description of the item.
- c. Litres required.
- d. Packaging, packing and marking requirements if other than those required by this specification.

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6.3 Beneficial comments

Beneficial comments (recommendations, additions, deletions) and any other pertinent data which may be of use in improving this document should be addressed to:

The Divisional Manager
Logistics
Private Bag X337
PRETORIA
0001

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