SNAPSHOOT
ENGINEERED FOR A SAFER TOMORROW

현장을 이해하고, 필요한 솔루션을 연결합니다.

산업안전 · 추락방지 시스템
산업용 소재 · 건축자재
제품 제안부터 공급·시공·설치·교육까지



COMPANY INFORMATION

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TECHNICAL DOCUMENTS

인증서 · 데이터시트 · 기술자료

제품의 규격과 성능, 인증 및 적용 조건을 확인하기 위한 자료입니다.

ABOUT SNAPSHOOT

제품 공급을 넘어, 현장에 맞는 해결책으로

스냅슛은 산업현장의 작업 환경과 요구 조건을 바탕으로
적합한 제품과 시스템을 제안합니다. 현장 실사를 통해 설치 조건을 확인하고,
공급부터 시공·설치 및 사용 교육까지 필요한 과정을 함께합니다.

추락방지 시스템

안전대부착설비 · 수평·수직 라이프라인
레일 시스템 · 리지드 포스트

밀폐공간 진입·구조 솔루션

데빗암 · 삼각대 · 구조용 윈치
윈치 안전블록 · 구조장비

산업안전 보호구

전신형 안전대 · 랜야드 · 안전블록
작업 환경에 맞춘 개인보호구

산업용 소재·건축자재

산업용 테이프 · 접착제 · 기능성 소재
구조용 스크류 · 목조건축 자재

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홈페이지 바로가기 →
문서 라이브러리 바로가기 →
시공사례 바로가기 →
문의하기 →

본 페이지는 스냅슛의 자료 제공 안내용 표지입니다. 첨부된 인증서 및 기술자료의 발행 주체, 인증 대상과 적용 범위는 해당 원문을 기준으로 확인해 주세요.

Technical Data Sheet

3M™ Thermal Transfer Printable
Retro-Reflective Label Material 3929

Product Details

Product Description

3M™ Label Material 3929 thermal transfer printable retro-reflective film with 3M™ Adhesive 200 on a clay-coated paper liner is designed for long range bar code scanning. When bar code printed, the retro-reflective facestock extends the maximum and minimum scanning distance of long range scanners.

NOTE:3M is unable to specify a maximum scanning distance with this material because of the differences between long range scanners.

Product Features

• Designed for use with long range scanners available from Symbol Technologies, PSC and Hand Held Products. The maximum and minimum scanning distance of these scanners will increase with the use of this material. The range at which a bar code can be scanned is dependent on the bar code width; i.e.,a 75 mil bar code will scan at a longer distance than a 50 mil bar code. Scanners not designed for long range scanning may not be able to scan bar codes printed on this product – specific bar code verifiers and scanning device recommendations can be obtained from the wide choice of suppliers selling in the marketplace.
• Fan folding is not recommended, roll-to-roll is the preferred continuous printing process.

Technical Information Note

The following technical information and data should be considered representative or typical only and should not be used for specification purposes.

Typical Physical Properties

Attribute Name	Value
Adhesive Type	200 high performance acrylic
Facestock	Topcoated retro-reflective film
Conformability	Conforms to large diameter simple curved surfaces.
Die-Cutting	Rotary

Attribute Name	Value
Adhesive Thickness	0.026 mm (1 mil)
Facestock Thickness	0.123 mm (4.8 mil)
Liner	78# clay-coated paper
Liner Thickness	0.114 mm (4.5 mil)

Typical Performance Characteristics

180° Peel Adhesion

Temperature: 23 °C (73 °F)
Test Method: ASTM D3330

Dwell Time	Substrate	Value
10 min	Stainless Steel	Destructs Upon Removal N/cm [1]
10 min	Polycarbonate (PC)	Destructs Upon Removal N/cm [1]
10 min	Polypropylene (PP)	Not recommended for low surface energy substrates N/cm [1]
72 h	Stainless Steel	Destructs Upon Removal N/cm [1]

Dwell Time	Substrate	Value
72 h	Polycarbonate (PC)	Destructs Upon Removal N/cm [1]
72 h	Polypropylene (PP)	Not recommended for low surface energy substrates N/cm [1]

[1] 304 mm/min (12 in/min)

180° Liner Release

Value
50 g/in [1]
20 g/in [2]

[1] 300 in/min

[2] 90 in/min

Attribute Name	Value
Minimum Application Temperature	10 °C (50 °F)
Long Term Temperature Resistance	177 °C (300 °F) [1]
Minimum Long Term Temperature Resistance	-40 °C (-40 °F) [1]

[1] Long Term (day, weeks)

Attribute Name	Value
Note	Calipers are nominal values

Typical Environmental Characteristics

Environmental Resistance

Indoor use only as outdoor use has not been evaluated. The rate at which the scanning distance decreases due to facestock discoloration when used outdoors is not known.

Printing

Printable with resin-based thermal transfer ribbons such as Sony 4070, Iimak SP-330, Zebra 5095, Sato Premier I and Ricoh B110C.

Handling/Application Information

Application Examples

- Warehouse bin labeling and shelf marking
- Long-range scanning of bar codes in indoor environments

Application Techniques

For maximum bond strength, surface should be clean and dry. A typical cleaning solvent is heptane or isopropyl alcohol.* For best conditions, application surface should be at room temperature or higher. Low temperature surfaces (below 50°F [38°C]) can cause the adhesive to become so firm that it will not develop maximum contact with the substrate. Higher initial bonds are achieved through increased rub down pressure.
*Consult the manufacturer's MSDS for proper handling and storage of solvents.

Storage and Shelf Life

Store under normal conditions of 16° to 27°C (60° to 80°F) and 40 to 60% relative humidity in the original packaging, out of direct sunlight. For best performance, use this product within 24 months from date of manufacture.

Available Sizes

Attribute Name	Value
Splices	May contain an unusually high number of splices.

Information

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ISO Statement

This product was manufactured under a 3M quality system registered to ISO 9001 standards.

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