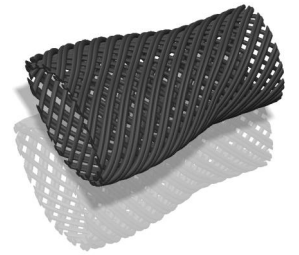


# Expandable Sleeve



## LANGOFLEX PA

The LANGOFLEX PA braided sleeve is obtained by tubular braiding of polyamide 6.6 monofilaments.

LANGOFLEX PA is very resistant to abrasion, and ensures solid and durable protection for cables, wiring harness cables, tube and hoses.

LANGOFLEX PA is easily installed and can be used in extreme conditions (temperature, moisture, mechanical stresses, etc...) and

consequently in all industries, especially the automotive industry.

LANGOFLEX PA stretches beyond its original diameter, which with its flexibility makes it easy to install and provides a very compact design that fits on irregular shapes.

A dense (**LANGOFLEX PA-D**) and a high density (**LANGOFLEX PA-HD**) versions of this sleeve are available.

## Characteristics

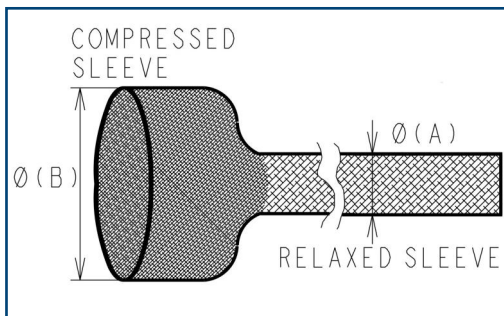
**Colors:** black and gray. Other colors upon request.

Physical properties	Specification	Unit	Value
Continuous temperature of use (3000h)	-	°C (°F)	-40/125 (-40/257)
Peak temperature (240h)	-	°C (°F)	150 (302)
Melting point	ISO 11357-3	°C (°F)	260 (500)
Abrasion resistance	ISO 6722 SAE ARP 1536 RSA 36 05 035	cycles	15220 56700 MG4 (A&C), MG1 (E)
Flammability	SAE J 369 D45 1333	-	self-extinguishing type B (self-extinguishing)
Chemical resistance	SAE J 2192 D47 1924	Resists to chemicals and automotive fluids (oils, coolant, battery liquid, brake fluid, fuels, windshield washer, urea...)	

## Dimensions

The following sizes are for the LANGOFLEX PA version.

Diameter is measured over a mandrel. Length for cut pieces are measured in a relaxed position.



Designation	Nominal A Ø (mm)	Maximum B Ø (mm)
LANGOFLEX PA 04*	4	6
LANGOFLEX PA 06	6	9
LANGOFLEX PA 07	7	11
LANGOFLEX PA 10	10	16
LANGOFLEX PA 12	12	18
LANGOFLEX PA 14	14	21
LANGOFLEX PA 16	16	25
LANGOFLEX PA 18	18	35
LANGOFLEX PA 25	25	38
LANGOFLEX PA 30	30	45
LANGOFLEX PA 40	40	55
LANGOFLEX PA 50	50	70
LANGOFLEX PA 60	60	80

\*Use of Langoflex PA-D 04 (European market only)

## Approvals

- Direct: Audi, Daimler, Ford, General Motors, Opel, Peugeot-Citroën, Seat, Skoda, Volkswagen.
- Via Tier-1: Jaguar/Land Rover, John Deere, Porsche, Volvo Cars Corp.

## Packaging

LANGOFLEX PA is delivered in coils or in cut lengths upon request.

Data and photos for information only. Delfingen makes no warranties as to the accuracy or completeness of this information. Delfingen reserves the right to make changes in materials or processing without notification.

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