

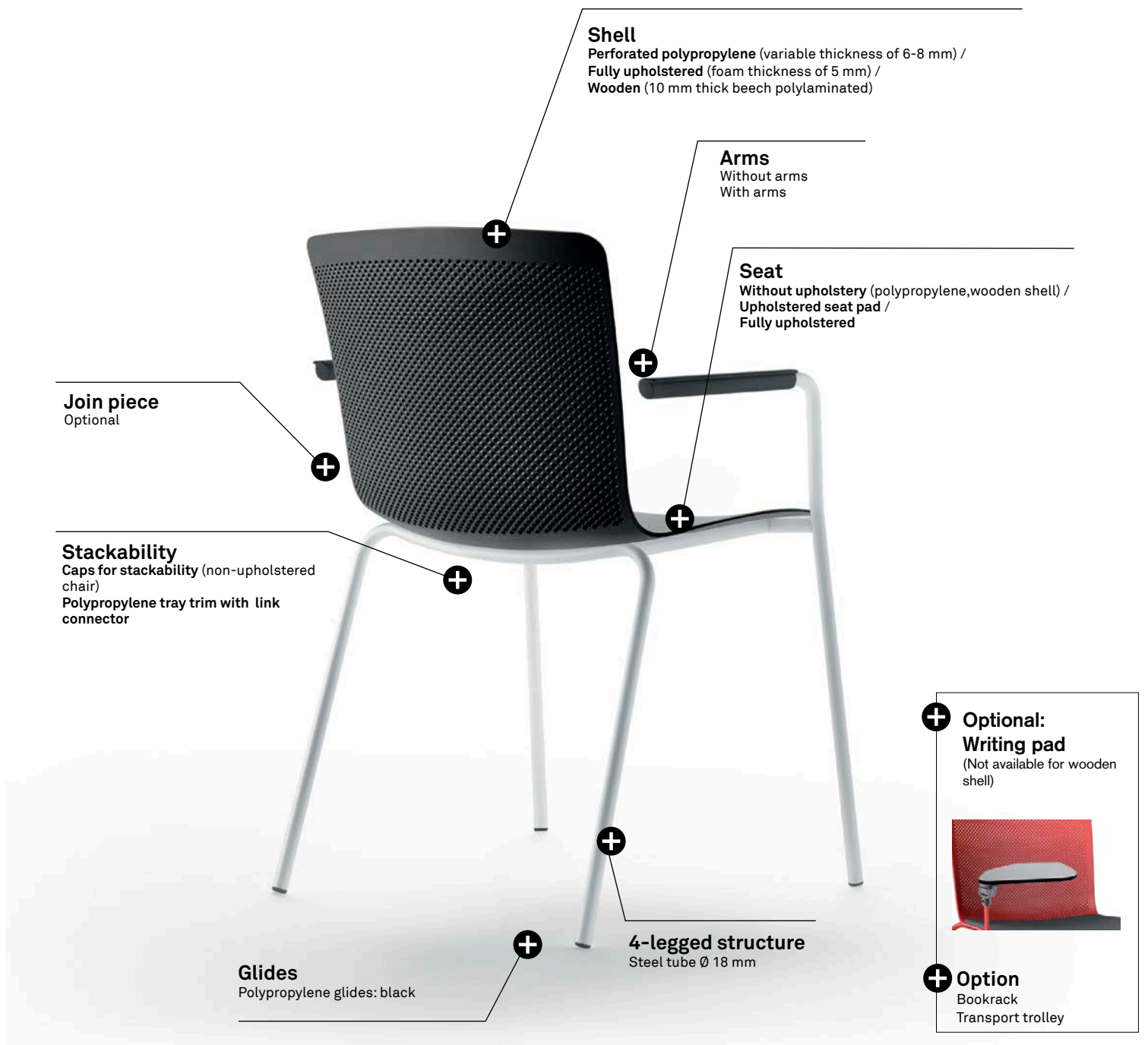
Forma 5

TECHNICAL FEATURES

GLOVE



STATIONARY CHAIR | 4-LEGGED CHAIR



DIMENSIONS

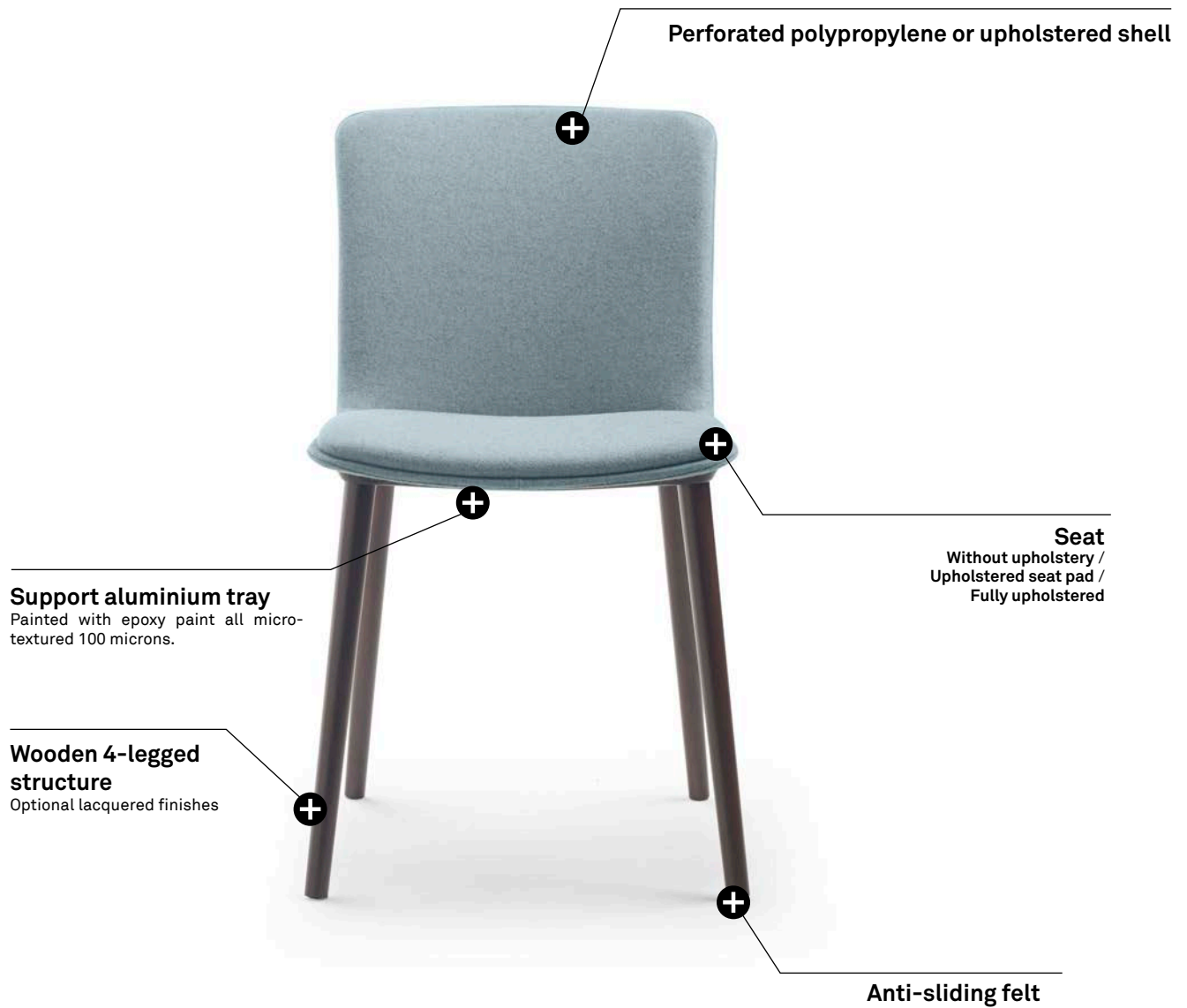
Height	80,4 cm
Seat height	42.9 cm
Width (without arms / with arms)	54 / 58,2 cm
Depth	54 cm
Fabric meters (upholstered seat pad / fully upholstered)*	0,5 / 2,1 m
Weight (without upholstery / upholstered seat pad / fully upholstered / wooden shell)	4,87 / 4,95 / 6,99 / 5,48 kg

* For fully upholstered and two-coloured chairs, it is necessary 1,6 linear metres for the shell and 0,5 for the upholstered seat pad. For single-colour chair, it is necessary 2,1 linear metres.

These minimum and maximum dimensions depend on the chosen configuration. Please ask for concrete values in case you need them.

Dimensions in centimeters

STATIONARY CHAIR | WOODEN FIXED 4-LEGGED CHAIR AND POLYPROPYLENE SHELL AND UPHOLSTERED



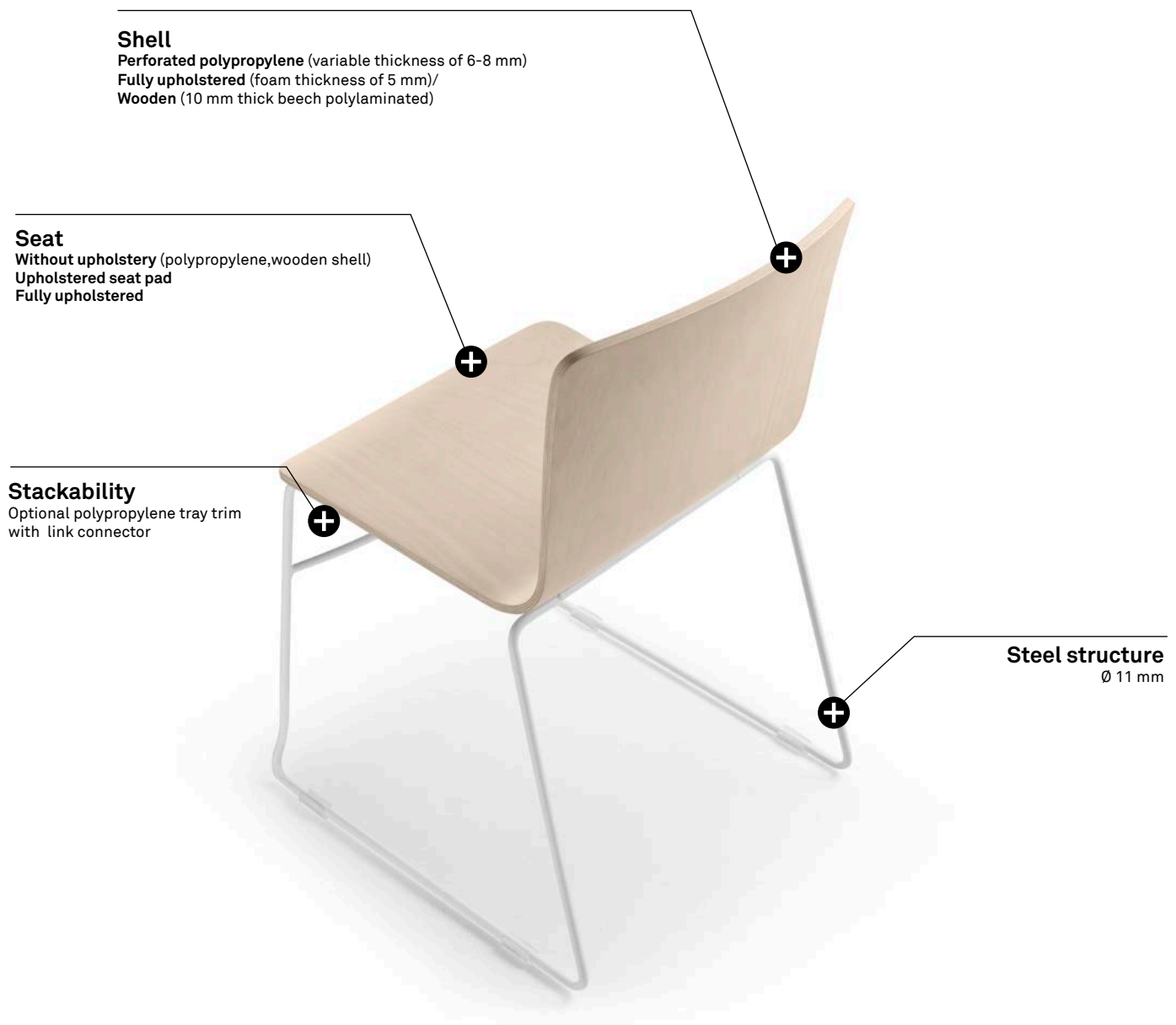
DIMENSIONS

Height	81,5 cm
Seat height	44 cm
Width (without arms / with arms)	45 / - cm
Depth	53,5 cm
Fabric meters (upholstered seat pad / fully upholstered)*	0,5 / 2,1 m
Weight (without upholstery / upholstered seat pad / fully upholstered)	4,41 / 5,93 / 6,53 kg

* For fully upholstered and two-coloured chairs, it is necessary 1,6 linear metres for the shell and 0,5 for the upholstered seat pad. For single-colour chair, it is necessary 2,1 linear metres.

Dimensions in centimeters

STATIONARY CHAIR | FIXED SLED CANTILEVER



DIMENSIONS

Height	80,6 cm
Seat height	42,5 cm
Width (without arms / with arms)	52,1 / - cm
Depth	55,2 cm
Fabric meters (upholstered seat pad / fully upholstered)*	0,5 / 2,1 m
Weight (without upholstery / upholstered seat pad / fully upholstered / wooden shell)	5,95 / 5,98 / 7,99 / 6,48 kg

* For fully upholstered and two-coloured chairs, it is necessary 1,6 linear metres for the shell and 0,5 for the upholstered seat pad. For single-colour chair, it is necessary 2,1 linear metres.

These minimum and maximum dimensions depend on the chosen configuration. Please ask for concrete values in case you need them.

Dimensions in centimeters

STATIONARY CHAIR | FIXED 4-SPOKE



DIMENSIONS

Height	81,1 cm
Seat height	43,6 cm
Width (without arms / with arms)	50,7 / 56,1 cm
Depth	54,6 cm
Fabric meters (upholstered seat pad / fully upholstered)*	0,5 / 2,1 m
Weight (without upholstery / upholstered seat pad / fully upholstered / wooden shell)	6,85 / 6,93 / 8,97 / 7,46 kg

* For fully upholstered and two-coloured chairs, it is necessary 1,6 linear metres for the shell and 0,5 for the upholstered seat pad. For single-colour chair, it is necessary 2,1 linear metres.

These minimum and maximum dimensions depend on the chosen configuration. Please ask for concrete values in case you need them.

Dimensions in centimeters

SWIVEL CHAIR | WITH GAS MECHANISM



DIMENSIONS

Height	78,5-91,5 cm
Seat height	41-54 cm
Width (without arms / with arms)	61/61 cm
Depth	43 cm
Fabric meters (with upholstered seat pad / fully upholstered)*	0,5 / 2,1 m
Weight (without upholstery / upholstered seat pad / fully upholstered)	9,73 / 10,84 / 11,44 kg

* For fully upholstered and two-coloured chairs, it is necessary 1,6 linear metres for the shell and 0,5 for the upholstered seat pad. For single-colour chair, it is necessary 2,1 linear metres.

These minimum and maximum dimensions depend on the chosen configuration. Please ask for concrete values in case you need them.

Dimensions in centimeters

SWIVEL CHAIR | WITH SELF-CENTRING PISTON



DIMENSIONS

Height	80,5 cm
Seat height	43 cm
Width (without arms / with arms)	61 / 61 cm
Depth	61 cm
Fabric meters (fully upholstered)*	2,1 m
Weight (fully upholstered / wooden shell)	10,35 / 8,74 kg

* For fully upholstered and two-coloured chairs, it is necessary 1,6 linear metres for the shell. For single-colour chair, it is necessary 2,1 linear metres.

These minimum and maximum dimensions depend on the chosen configuration. Please ask for concrete values in case you need them.

Dimensions in centimeters

STATIONARY CHAIR | HIGH



DIMENSIONS

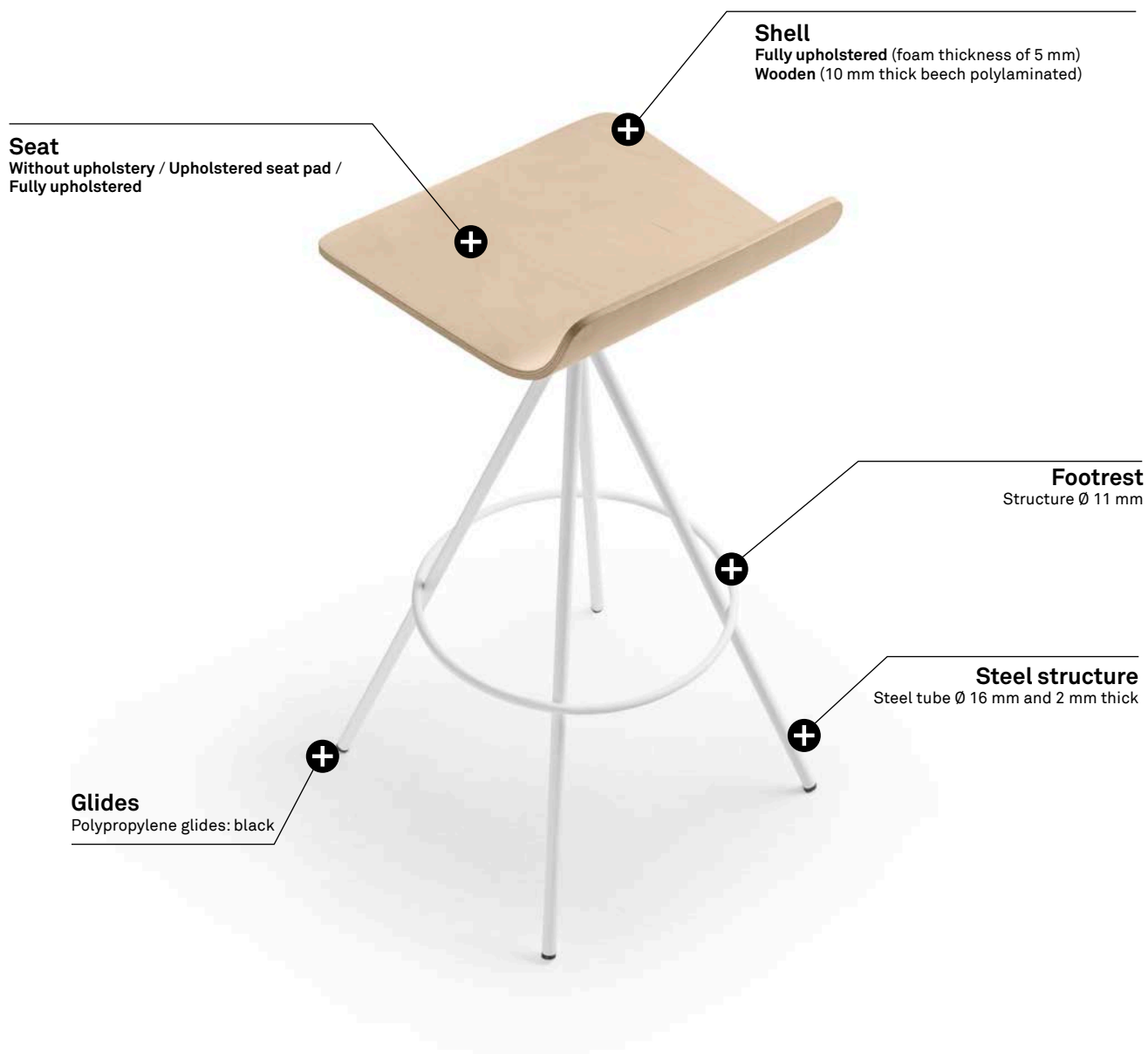
Height	111,8 cm
Seat height	76 cm
Width	51,8 cm
Depth	54,2 cm
Fabric meters (upholstered seat pad / fully upholstered)*	0,5 / 2,1 m
Weight (without upholstery / upholstered seat pad / fully upholstered / wooden shell)	6,37 / 6,45 / 8,49 / 6,98 kg

* For fully upholstered and two-coloured chairs, it is necessary 1,6 linear metres for the shell and 0,5 for the upholstered seat pad. For single-colour chair, it is necessary 2,1 linear metres.

These minimum and maximum dimensions depend on the chosen configuration. Please ask for concrete values in case you need them.

Dimensions in centimeters

CONICAL DRAUGHTSMAN



DIMENSIONS

Height	86 cm
Seat height	75 cm
Width	43 cm
Depth	43 cm
Fabric meters (upholstered seat pad / fully upholstered)*	0,5 / 0,5 m
Weight (without upholstery / upholstered seat pad / fully upholstered)	6,01 / 6,56 / 6,84

These minimum and maximum dimensions depend on the chosen configuration. Please ask for concrete values in case you need them.

Dimensions in centimeters

SHELL

POLYPROPYLENE SHELL:

Polypropylene shell with upholstery: polypropylene with 30% glass fibre and variable thickness of 6-8 mm. It incorporates a matrix rounded holes in the backrest getting lighter and breathable structure.

Upholstered seat pad for polypropylene shell: The seat area can optionally carry a upholstered seat pad composed of foam thickness of 10 mm and 30 kg/m³ density, upholstered in the fabric chosen. The upholstered seat pad is stitched with a serger, stapled and screwed onto the seat.

Polypropylene shell fully upholstered: the fully upholstered version is composed of foam thickness of 5 mm and 30 kg/m³ density, it is upholstered with a fiber layer linked to the shell. The seat area carry a upholstered seat pad composed of foam 30 kg/m³ density, upholstered in the fabric chosen but another colour may be chosen. The upholstered seat pad is stitched with a serger, stapled and screwed onto the seat.

For the non-upholstered 4-legged version, the bottom of the seat has blocks in its standard version, to protect the chair when stacking. The upholstered chairs do not carry these blocks. Both non-upholstered, upholstered seat pad and fully upholstered chairs can carry optionally a polypropylene tray that also protects the stacked chairs and it can connect chairs. The chair with sled structure can optionally use the polypropylene tray under the seat. Without this chair tray, sled base chair can not be stacked. The shell is embedded in the metal structure of 18 x 2 mm serving as chair support.

WOODEN SHELL: the wooden shell version, 10 mm thick beech polylaminated shell. The shell is screwed to the structure.

The shape mimics the plastic shell to create uniformity in the series. The seat area can optionally carry a seat pad composed of foam thickness of 10 mm and 30 kg/m³ density, upholstered in the fabric chosen. The seat pad is stitched with a serger, stapled and screwed onto the seat.



Shell



Upholstered seat pad



Fully Upholstered



Wooden shell

STRUCTURE



1



2

1. METAL FIXED 4-LEGGED: structure made of steel tube 18.2 mm Ø painted with epoxy paint all micro-textured epoxy 100 microns. Round glides finished in black colour. Stackability: 5 units without stacking cart.

2. WOODEN FIXED 4-LEGGED: support aluminium tray painted with epoxy paint all micro-textured 100 microns. This part sets 4 cylindrical and slightly conical legs made of varnished beech wood. These legs have anti-sliding felt under their bases. Optional lacquered finishes



3



4

3. FIXED SLED CANTILEVER: solid structure Ø 11 mm steel tube, curved. Semitransparent glides made of polypropylene, one on each side of the chair. Painted with epoxy paint all micro-textured 100 microns.

4. FIXED 4-SPOKE BASE: steel tube 18 mm leaving a plate located on the lower part of the seat and open to provide proper support. Painted with epoxy paint all micro-textured 100 microns. Round glides finished in black colour. We also offer the option with casters that allows the assembly of 4 casters of Ø 50 mm.



5



6

5. SPOKE SWIVEL BASE AND GAS-PISTON MECHANISM: Polyamide star 64 base has outer radius of 64 cm and with five arms of rectangular section. Swivel chairs incorporate height adjustment by gas. Casters that allows the assembly of 5 casters of Ø 50 mm with soft wheel in option.

6. SWIVEL CHAIR WITH SELF-CENTRING PISTON: Polished aluminium flat base with 4 polypropylene glides and the arms of rectangular section. The outer radius of 70 cm. It has a self-centring piston that returns the chair to its original position after use.



7



8

7. HIGH CHAIR: solid structure Ø 11 mm for the footrest and steel tube 16.2 mm thick. Painted with epoxy paint all micro-textured 100 microns. Round glides finished in black colour.

8. CONICAL DRAUGHTSMAN: solid structure Ø 16 mm and steel tube 2 mm conical thickness and Ø 11 mm ring rod for the footrest. Painted with epoxy paint all micro-textured 100 microns. Ø 16 mm polypropylene glides.

ARM AND WRITING PAD

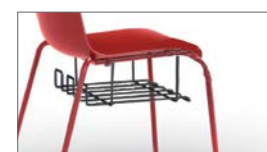
ARMS: Optional arms with polypropylene armrests, 158 mm long by 18 mm wide, covering \varnothing 18 mm tube and 2 mm thickness that has its origin in the structure. Available for 4 legs and 4 spoke-base structure.

WRITING PAD: 13 mm thick kompress top writing pad with a 220 x 335 mm writing surface. The aluminium anti-panic mechanism allows placing the writing surface horizontally and vertically and its adjustment is placed on the side of the user. Left and right rotation. The pad ergonomics may be adapted to the user needs. It is also possible to adjust the distance from the user to the top. Allows stackability.



ACCESSORIES

CONNECTOR: for two polypropylene chairs. This piece joins two chairs by the side. It is always incorporated to the seat (it can not be ordered separately of the chair) and it is removable by introducing it in the groove of the adjoining chair's seat. Only available for 4-legged and sled base chairs.



BOOKRACK: 5 mm diameter steel rod bookrack. Easy placement, just hanging it from the seat. It rests hanged from the seat by a fitting screwed to the shell. The chairs with bookrack are not stackable. Black finished. Only available for 4-legged chair.



TROLLEY: for stack chairs is made of polypropylene injection mould, 99 x 58 x h:50 cm. It includes 4 casters, 2 of them with locking mechanism, made of galvanized steel sheet.

OPTIONS



Five colours for structure and shell. It may be combined to create monochrome or bicolour chairs.



Beech wooden finish for shell.



Aluminium structure for chair with wooden legs. There is available five finishes.



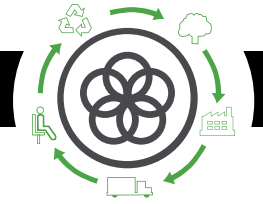
Combination of different colours for shell and flat of fully upholstered chairs.

PACKING

As standard, the chair goes assembled and protected with a plastic packing. For further packaging options, please ask us.

UPHOLSTERY

Seat and backrest available for all the fabrics range of Forma 5, including a wide range of fabrics (yarn, fireproof fabrics) and leathers. The Group 1, 2, 3 and 5 fabrics of Forma 5 are supplied by the manufacturer company Camira. Although our fabrics brochure includes a selection of the Camira fabrics, if the customer requires another specific, Forma 5 will upholster any of its fabrics in any fabric from Camira catalog.



Life Cycle Analysis
GLOVE PROGRAM



RAW MATERIALS						
	4-legged metal				4-legged wooden	
	Polypropylene shell and upholstered seat pad		Wooden shell		fully upholstered shell	
	Kg	%	Kg	%	Kg	%
Steel	3,90	52	2,66	45	1,51	19
Plastic	3,48	46	0,2	3	3,87	48
Wood	-	-	3,10	52	-	-
Aluminium	-	-	-	-	1,15	14
Upholsteries / Filling material	0,16	2	-	-	1,5	19
% Recycled materials	22%		20%		44%	
% Recyclable materials	98%		97%		92%	

Ecodesign

Results reached during the life cycle stages



MATERIALS

Steel

15%-99% recycled material.

Plastic

30%-40% recycled material.

Wood

Woods with 70% recycled material and certified with PEFC/FSC and E1.

Aluminium

60% recycled material.

Paintings

Podwer painting without COV

Staff material

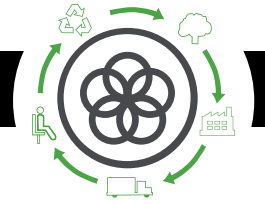
Without HCFC and certified by Okotext.

Upholsteries

Without COV emissions and certified by Okotext.

Packings

100% recyclable with inks with no solvents.



PRODUCTION

Raw materials use optimization

Board, upholstery and steel tubes cut.

Renewable energies use

reducing the CO2 emissions. (Photovoltaic pannels)

Energy saving measures

in all production process

COV global emission reduction

of the production processes by 70%.

Podwer painting

ecovery of 93% of the non deposited painting

Glue removal from the upholstery

The facilities have an internal sewage for liquid waste.

Green points

at the factory

100% waste recycling

at production process ans dangerous waste special treatment.



TRANSPORT

Cardboard use opmitization

of the packings

Cardboard and packing materials use reduction

Flat packings and small bulks to optimize the space.

Solid waste compacter

which reduces transport and emissions.

Light volumes and weights

Transport fleet renewal

reducing by 28% the fuel consumption.

Suppliers area reduction

Local market power and less pollution at transport.



USE

Easy maintenance and cleaning

without solvents.

Forma 5 guarantee

The highest quality

for materials to provide a 10 year average life of the product.

Useful life optimization

of the product due to a standarized and modular design.

The boards

with no E1 particle emission.



END LIFE

Easy unpacking

for the recyclability or compound reuse.

Piece standarization

for the use.

Recycled materials used for products (% recyclability):

Steel is 100% recyclable.

Plastics are from 70 to 100% recyclable.

Wood is 100% recyclable.

Aluminium is 100% recyclable.

With no air or water pollution

while removing waste.

Returnable, recyclable and reusable packing

Product recyclability:

98% (polypropylene shell); 97% (wooden shell) or 92%; (wooden legs yfully upholstered shell)

CHAIR MAINTENANCE AND CLEANING GUIDE

LINES FOR A CORRECT CHAIR CLEANING AND MAINTENANCE, CONSIDERING THE DIFFERENT MATERIALS:

FABRICS

- 1 Vacuum often.
- 2 Rub the dirty spot with a wet cloth with PH neutral soap.
Test first on a hidden spot.
- 3 Dry foam for carpets can be alternatively used.

PLASTIC PIECES

Rub the dirty spots with a wet cloth with PH neutral soap.

Do not use abrasive products in any case.

METAL PIECES

- 1 Rub the dirty spots with a wet cloth with PH neutral soap.
- 2 Polished aluminium pieces can have their polish bak by covering and rubbing them with a dry cotton cloth.

LEGAL TERMS

CERTIFICATE

Forma 5 certifies that the Glove program has passed all tests provided by our intern Quality Department, as well as the Technological Research Center (TECNALIA) with "satisfactory" results:

UNE-EN 16139:20133: "Furniture - Strength, Durability And Safety - Requirements For Non-Domestic Seating"

UNE-EN 1022:2005: Home furniture. Seats. Stability determination.

UNE-EN 1728:2013 : "Furniture Seating Test methods for the determination of strength and durability"

Developped by JOSEP LLUSCÀ