

JAY[®] J3 Backs

We've Got Your Back



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Advantages of Solid Backs

Jay is proud to present its revolutionary solid back, the J3. Our Jay product specialists have spent years researching, developing and testing our solid backs so that we can now offer a complete solid back solution appropriate for a wide variety of users, all with a maximum user weight of 136kg.

Solid backs offer users the following benefits:

Clinical advantages of solid backs:

- Provide postural support in optimal anatomical alignment
- Improve pressure distribution to preserve skin integrity
- Improve stability
- Improve positioning
- Improve comfort
- Improve function

Lifestyle advantages of solid backs:

- Style – sleek design
- Confidence – the user can sit tall and proud
- Comfort – the back supports the user, rather than the user having to support themselves

The Jay[®] J3 Backrest was Born

With this in mind, our Jay specialists developed a new solid back that would be the best possible backrest for users, carers and clinicians alike.

The team spent over five years designing, testing and refining a solution to each of these concerns and the result is the revolutionary J3 back: 90% compatibility with all chairs on the market, packed with options and adjustments, easy to understand, easy to use.

Client feedback on conventional solid backs led our Jay specialists to focus on solving three key problems when developing the J3 range:

- Incompatibility with wheelchairs
- Poor fit for users
- Complex handling



Range, Contour & Shapes

The J3 Range Consists of a Multitude of Shapes and Sizes:

- Providing optimal support and fit for adult users
- Eliminating the need for a large catalogue of products
- Eliminating trade-offs (e.g. the size is correct but the hardware won't fit, or the hardware fits but the correct lateral depth is not available)
- Single order form replaces multiple order forms

1: Contour Depth (Lateral Support)

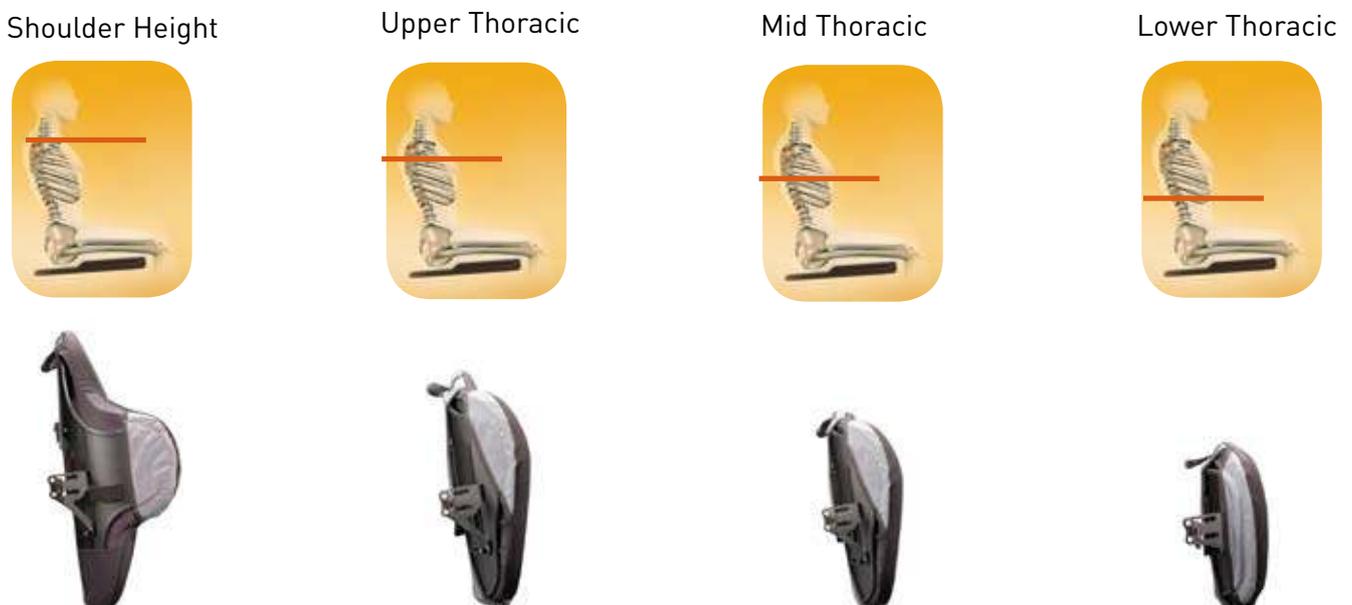
The J3 back offers four contour depths; shallow contour (SC) which provides 5.6cm depth, mid contour (MC) which provides 8cm depth, deep contour (DC) & posterior deep contour (PDC) which both provide 15.3cm depth.

(Fixed and swing-away lateral supports are also available - see page 13)



2: Level of Support

Choose from four levels of support, depending on the functional needs and level of trunk stability of the user.



3: Back Height

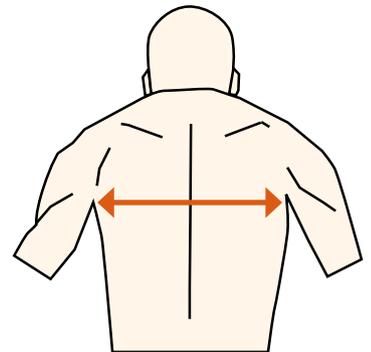
Each level of support within the J3 range offers three back heights: Short (S), Medium (M) and Tall (T)



4: Back Width

The J3 back range also comes in a variety of widths that are selected in accordance with trunk width and chair width, ensuring that the back will fit the user as well as their chair.

The multiple possibilities of the J3 back give therapists and users a choice of over one hundred different backs, in one easy to fit, easy to understand package.



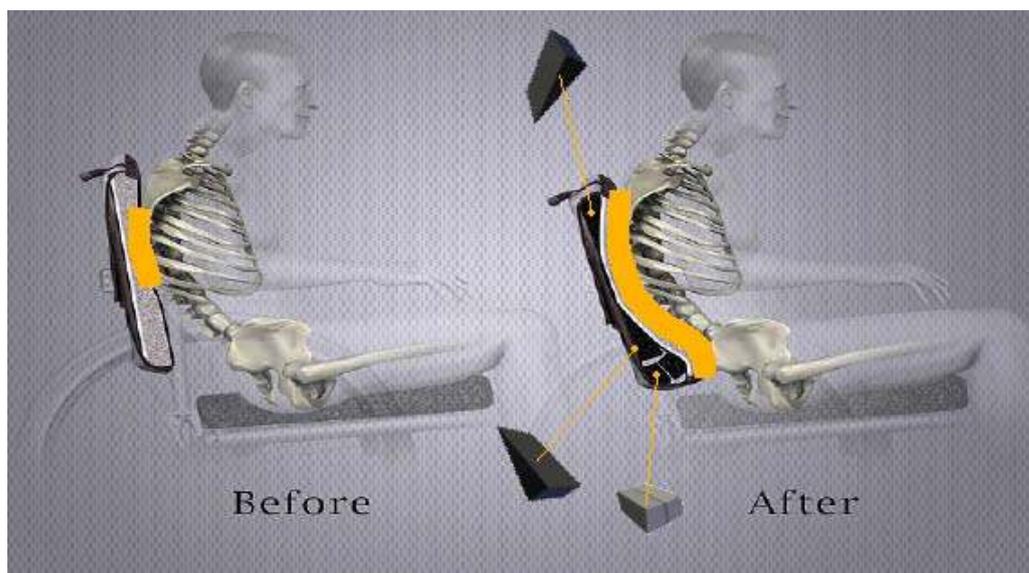
Jay® Spine-Align System

For maximum pressure distribution, correct support and optimal comfort and function, a solid back should reflect an individual's shape. With this idea in mind, the new J3 Spine-Align positioning components were designed to allow clinicians and dealers to define, adjust and refine the shape of the new J3 back in the field.

Spine-Align Positioning Components

- Provide maximum pressure distribution for skin integrity preservation
- Provide optimal support and comfort /sitting tolerance
- Infinite number of custom shapes
- Multiple evaluation kits

To better understand how this system works, let's take a look at an example of a user with a "C" curve posture*.



In the 'before' picture a J3 back shallow contour, upper thoracic is attached to the backposts. When the user sits against the back, his support is concentrated in a small area, resulting in peak pressure which may result in compromised skin integrity and discomfort over time. Postural stability is also compromised.

In the 'after' picture, using the angular adjustment capabilities of the new J3 hardware, the backrest angle is realigned to better match the shape of

the spine. Once the angle is set, it is easy to add a medium triangle to the top and a large triangle to the bottom. This results in a back that matches and supports the user, providing optimal pressure distribution whilst improving stability, comfort and function.

The Spine-Align components optimize the J3 back's ability to support and provide prolonged sitting tolerance.

* This is merely an example to show the benefits of the Spine-Align System, this in no way should replace clinical assessment. For further information visit www.jay3seating.co.uk to view the spine alignment video

All J3 backs come complete with a lumbar component for optimal postural alignment of the lumbar sacral spine. Additionally, we offer a series of complete spine alignment kits that can be used during the assessment process again and again to ensure optimum user fit first time.



The Spine-Align box contains all the necessary items to adjust the J3 back to each individual's shape. The box contains over 32 different soft foam components.



Alternatively we have 2 smaller Spine-Align mini kits available

Spine-Align Mini Kit I : 7 pieces



Spine-Align Mini Kit II : 12 pieces



Mounting Hardware

The revolutionary Jay® Mount hardware is easy to fit, easy to remove, compact in size and packed with adjustments.

Five Objectives for Jay® Mount

When developing the Jay Mount hardware, there were five key objectives that the Jay product specialists wanted to accomplish.

1: Accommodate a variety of back-tube diameters.

The new Jay Mount hardware features a revolutionary hinged clamp design that fits 1.9 cm (3/4") to 2.8 cm (1 1/8") tubes. With only one attaching clamp that is compatible with 90% of wheelchairs on the market and no need for additional hardware, the entire ordering and fitting process is simplified.



1.9cm (3/4")
D Type



2.5cm (1")



2.8cm (1 1/8")

2: Provide multiple hardware mounting locations that did not alter the required backrest position.

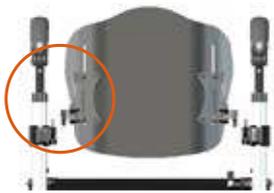
Frequently obstructions such as towel bars and armrest receivers force clinicians, dealers and technicians to make compromises. To maximize compatibility, the unique two-point attachment J3 back hardware occupies as little space as possible and mounts without affecting the user's fit.



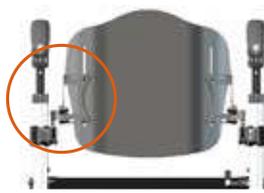
Furthermore unlike other solid backs, the J3 back's vertical position can be adjusted after the hardware location is set.

3: Accommodate individuals who are wide in the hips and narrow in the shoulders using no additional hardware.

Often solid backs fit the chair but not the user. To address this problem the team created 5cm (2") of built-in width adjustment. For example, a 46cm (18") wide chair can now easily accommodate a 41cm (16") wide back.



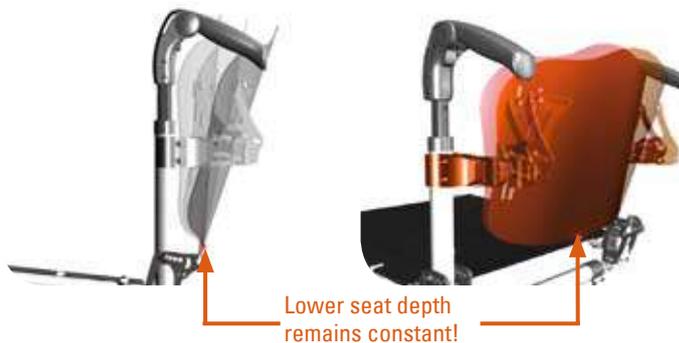
41cm (16") wide shell



41cm (16") shell adjusted to a 46cm (18") wide chair

4: Provide up to 22° of backrest angle adjustability, without reducing seat depth.

Jay Mount hardware was designed to minimise loss of seat depth. When the J3 back is reclined the lower back position remains constant, resulting in no loss of seat depth. This is a critical feature for users with postural deformities who may require more extreme angles. Jay Mount hardware prevents having to compromise their position in the chair.



NOTE: Depth adjustability of 5cm or 8.2cm (with extended hardware) is also available independent of angle adjustability

5: Make it easy to use.

With Jay Mount hardware the J3 back can be easily removed and attached with a minimal amount of force and limited dexterity. This empowers users to perform these functions independently.

The automatic locking mechanism ensures that the back is securely re-attached first time, every time.



Fitting J3



Easy to mount

Mounting a solid back has always been difficult in the past.

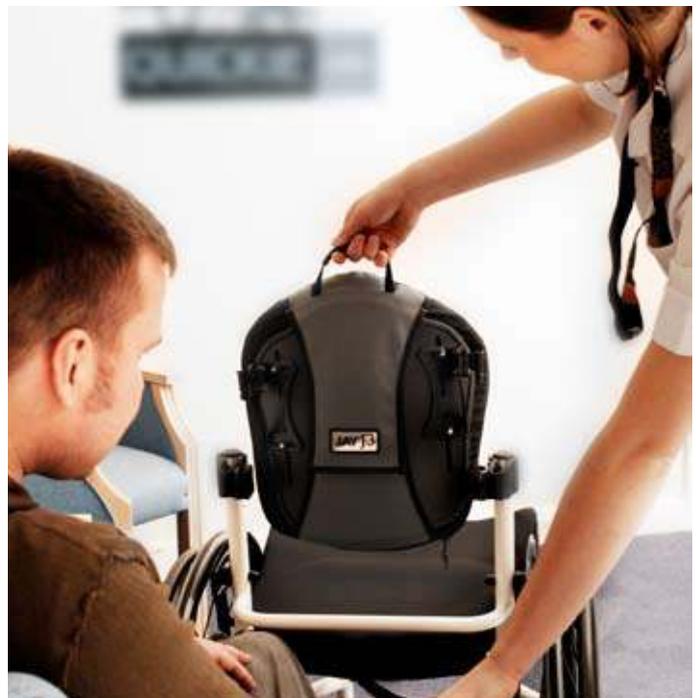
With Jay Mount it has never been easier.

With just two 2 fixing points, excellent height adjustment and the multi-tubing adjustable clamps you can mount around obstructions and on unconventional tubing in seconds.



Easy to attach

Fitting the J3 back couldn't be easier. Simply slide it into the clamps and the back will automatically lock into place.



Easy to adjust

Fine adjustments such as back height, width, depth and angle can all be done whilst the user is seated, ensuring a perfect fit. All adjustment can be made by using the two tools included in the box.



Adjusting the height and width



Adjusting the depth



Adjusting the angle

Easy to release

Releasing the J3 back is quick and simple. Even users with limited dexterity will find the J3 back easy to remove.



Options and Accessories



The J3 back offers a wide range of accessories to enable optimum user positioning in the backrest. Not all J3 backs are capable of mounting the following accessories. Please see the order form for details.

Extended hardware

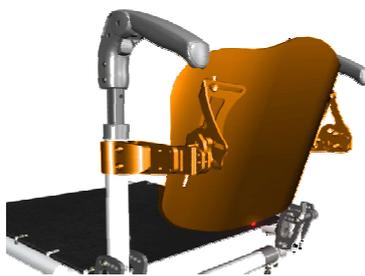
The extended hardware offers more seat depth adjustment:

- The standard clamp offers 5 cm (2") of depth adjustment and two mounting positions
- The extended hardware offers 8.2 cm (3 1/4") of depth adjustment and four mounting positions
- For increased stability, the new four point hardware can support more force to the back.

Hardware depth adjustment provides increased recline **without sacrificing seat depth.**



Standard hardware



Extended hardware



Four point hardware

Headrests

The J3 back can be fitted with headrests. Two types of mount and two types of pad are available. Fitting the headrest onto the back is quick and easy as the J3 back has pre-drilled holes ready for the fitting of headrests.

- Jay standard mount (A)
- Jay flip back mount (B)
- Jay standard pad (C)
- Jay contour pad (D)

In addition to the Jay headrests, we offer a universal headrest mount, which will enable the fixing of any other headrest.



A



B



C



D

Crash tested

All J3 backs that can accommodate headrests have been tested and approved for transit against relevant ISO standards.



Standard fixation mount



Universal headrest mount



Jay standard headrest and standard pad



Jay flip back headrest and contoured pad

Laterals

Two types of laterals are available on the J3 back; fixed and swing-away. One of the key features we offer is to allow you to order a fixed lateral on one side and a swing-away on the other side. This assists users who transfer regularly from one side. Both types of laterals are available in six sizes: 10 x 10cm, 10 x 12cm, 10 x 15cm, 15 x 10cm, 15 x 12cm, 15 x 15cm.



Angle adjustable swing-away laterals accommodate a wider variety of positioning needs



Fixed lateral mount

Harness and Chest Straps

A harness and chest straps are available as accessories for the J3 back. They are available in four sizes, from small (S) to extra large (XL). Eight laser-cut starter holes are in the shell to be used for attaching the harness to the shell. The "goal post" harness guides are made out of durable, secure aluminium.



Ordering the J3 Back

To make ordering your J3 back as easy as possible, we have developed the J3 smart part number process.

All product codes within the J3 range will begin with



To determine the rest of the J3 smart part number, you can follow this quick four step reference guide.

STEP 1: Contour Depth

Step 1 will determine contour depth. Decide how much lateral support is needed:

Shallow Contour (SC), Mid Contour (MC), Deep Contour (DC) or Posterior Deep Contour (PDC)

Assess Lateral Stability Requirement (SC, MT or DC)
 Assess Posterior Stability Requirement (LT; MT; UT or SH)
 Assess appropriate backrest height (Short, Medium, Tall)
 Determine client trunk width across the sternum; and cross check with backpost width.
 Assess for options and 'velcro' positioning inserts

	Shallow Contour / SC Moderate Lateral Support				Mid Contour / MC Medium Lateral Support				Deep Contour / DC Full Lateral Support				Posterior Deep Contour PDC Full Lateral Support					
Width	31	36	41	46	51	31	36	41	46	51	36	41	46	51	36	41	46	51
Chair backcane widths (Measured from outside of backcane to outside of backcane)	31 - 36	36 - 41	41 - 46	46 - 51	51 - 56	31 - 36	36 - 41	41 - 46	46 - 51	51 - 56	36 - 41	41 - 46	46 - 51	51 - 56	36 - 41	41 - 46	46 - 51	51 - 56
Back height	£ XXX												£ XXX					
Client max trunk width (cm)	28	33	38	43	48									28	33	38	43	
Short (S) - 17		○	○	○														
Med (M) - 20	○	○	○	○										○	○	○		
Tall (T) - 24	○	○	○	○										○	○	○		
Lower Thoracic (LT)	£ XXX				£ XXX								£ XXX					
Client max trunk width (cm)	28	33	38	43	48	24,5	29,5	34,5	39,5	44,5					28	33	38	43
Short (S) - 30	○	○	○	○	○	○	○	○	○	○					○	○	○	○
Med (M) - 34	○	○	○	○	○	○	○	○	○	○					○	○	○	○
Tall (T) - 38	○	○	○	○	○	○	○	○	○	○					○	○	○	○
Mid Thoracic (MT)	£ XXX				£ XXX				£ XXX				£ XXX					
Client max trunk width (cm)	28	33	38	43	48	24,5	29,5	34,5	39,5	44,5	28	33	38	43	28	33	38	43
Short (S) - 42		○	○	○			○	○	○		○	○	○	○				
Med (M) - 46	○	○	○	○		○	○	○	○		○	○	○	○	○	○	○	○

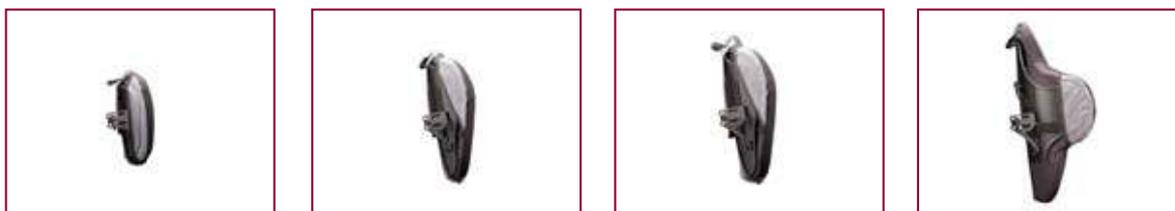
Item Nr. construction:
 J3 SC LT S 41 (This is only an example)
 J3: J3 Back
 SC: Shallow Contour
 LT: Lower Thoracic
 S: Short (Height cm)
 41: Chair Backrest Width (cm)



STEP 2: Level of Support

Step 2 will determine Level of Support.

Choose from Lower Thoracic (LT), Mid Thoracic (MT), Upper Thoracic (UT) or Shoulder Height (SH).



1. Assess Lateral Stability Requirement (SC, MT or DC)
 2. Assess Posterior Stability Requirement (LT; MT; UT or SH)
 3. Assess appropriate backrest height (Short, Medium, Tall)
 4. Determine client trunk width across the sternum, and cross check with backpost width.
 5. Assess for options and 'velcro' positioning inserts

5

8

15

15

	Shallow Contour / SC Moderate Lateral Support					Mid Contour / MC Medium Lateral Support					Deep Contour / DC Full Lateral Support				Posterior Deep Contour PDC Full Lateral Support			
Jay 3 Backrest Width																		
Width	31	36	41	46	51	31	36	41	46	51	36	41	46	51	36	41	46	51
Chair backcane widths (Measured from outside of backcane to outside of backcane)	31 - 36	36 - 41	41 - 46	46 - 51	51 - 56	31 - 36	36 - 41	41 - 46	46 - 51	51 - 56	36 - 41	41 - 46	46 - 51	51 - 56	36 - 41	41 - 46	46 - 51	51 - 56
Back height																		
Client max trunk width (cm)	£ XXX														£ XXX			
Short (S) - 17	28	33	38	43	48													
Med (M) - 20	○	○	○	○	○													
Tall (T) - 24	○	○	○	○	○													
Lower Thoracic (LT)																		
Client max trunk width (cm)	£ XXX					£ XXX												
Short (S) - 30	28	33	38	43	48	24,5	29,5	34,5	39,5	44,5					£ XXX			
Med (M) - 34	○	○	○	○	○	○	○	○	○	○								
Tall (T) - 38	○	○	○	○	○	○	○	○	○	○								
Mid Thoracic (MT)																		
Client max trunk width (cm)	£ XXX					£ XXX					£ XXX				£ XXX			
Short (S) - 42	28	33	38	43	48	24,5	29,5	34,5	39,5	44,5	28	33	38	43	28	33	38	43
Med (M) - 46	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○
Tall (T) - 50	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○
Upper Thoracic (UT)																		
Client max trunk width (cm)	£ XXX					£ XXX					£ XXX				£ XXX			
Short (S) - 42	28	33	38	43	48	24,5	29,5	34,5	39,5	44,5	28	33	38	43	28	33	38	43
Med (M) - 46	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○
Tall (T) - 50	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○

Item Nr. construction:

J3 SC LT S 41 (This is only an example)

J3: J3 Back
 SC: Shallow Contour
 LT: Lower Thoracic
 S: Short (Height cm)
 41: Chair Backrest Width (cm)



J3 SC LT _ _

Ordering the J3 Back

STEP 3: Back Height

Step 3 will determine back.

Each level of support in step 2 is offered in three back heights: Short (S) Medium (M) or Tall (T)

1. Assess Lateral Stability Requirement (SC, MT or DC)
 2. Assess Posterior Stability Requirement (LT; MT; UT or SH)
 3. Assess appropriate backrest height (Short, Medium, Tall)
 4. Determine client trunk width across the sternum, and cross check with backpost width.
 5. Assess for options and 'velcro' positioning inserts

Shallow Contour / SC
Moderate Lateral Support

Mid Contour / MC
Medium Lateral Support

Deep Contour / DC
Full Lateral Support

Posterior Deep Contour / PDC
Full Lateral Support

Jay 3 Backrest Width

Width	31	36	41	46	51	31	36	41	46	51	36	41	46	51	36	41	46	51
Chair backcane widths (Measured from outside of backcane to outside of backcane)	31 - 36	36 - 41	41 - 46	46 - 51	51 - 56	31 - 36	36 - 41	41 - 46	46 - 51	51 - 56	36 - 41	41 - 46	46 - 51	51 - 56	36 - 41	41 - 46	46 - 51	51 - 56

Back height

Client max trunk width (cm)	28	33	38	43	48	£ XXX					£ XXX			
Short (S) - 17	○	○	○	○	○	○					○			
Med (M) - 20	○	○	○	○	○	○					○			
Tall (T) - 24	○	○	○	○	○	○					○			

Lower Thoracic (LT)

Client max trunk width (cm)	28	33	38	43	48	£ XXX					£ XXX			
Short (S) - 30	○	○	○	○	○	24.5	29.5	34.5	39.5	44.5	£ XXX			
Med (M) - 34	○	○	○	○	○	○	○	○	○	○	○			
Tall (T) - 38	○	○	○	○	○	○	○	○	○	○	○			

Mid Thoracic (MT)

Client max trunk width (cm)	28	33	38	43	48	£ XXX					£ XXX				£ XXX			
Short (S) - 42	○	○	○	○	○	24.5	29.5	34.5	39.5	44.5	28	33	38	43	28	33	38	43
Med (M) - 46	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○
Tall (T) - 50	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○

Upper Thoracic (UT)

Client max trunk width (cm)	28	33	38	43	48	£ XXX					£ XXX				£ XXX			
Short (S) - 53	○	○	○	○	○	24.5	29.5	34.5	39.5	44.5	28	33	38	43	28	33	38	43

Item Nr. construction:
 J3 SC L T S 41 (This is only an example)

J3: J3 Back
 SC: Shallow Contour
 LT: Lower Thoracic
 S: Short (Height cm)
 41: Chair Backrest Width (cm)



J3 SC LT S _

STEP 4: Back Width



Step 4 will determine the back width.

Measure the widest part of the user's trunk that will be covered by the back. Reference the chart below to select the width that works best for the user.

1. Assess Lateral Stability Requirement (SC, MT or DC)
 2. Assess Posterior Stability Requirement (LT; MT; UT or SH)
 3. Assess appropriate backrest height (Short, Medium, Tall)
 4. Determine client trunk width across the sternum; and cross check with backpost width.
 5. Assess for options and 'velcro' positioning inserts

Shallow Contour / SC
Moderate Lateral Support

Mid Contour / MC
Medium Lateral Support

Deep Contour / DC
Full Lateral Support

Posterior Deep Contour
PDC Full Lateral Support

Jay 3 Backrest Width

Width	31	36	41	46	51	31	36	41	46	51	36	41	46	51	36	41	46	51
Chair backcane widths (Measured from outside of backcane to outside of backcane)	31 - 36	36 - 41	41 - 46	46 - 51	51 - 56	31 - 36	36 - 41	41 - 46	46 - 51	51 - 56	36 - 41	41 - 46	46 - 51	51 - 56	36 - 41	41 - 46	46 - 51	51 - 56
Back height	£ XXX																	
Client max trunk width (cm)	28	33	38	43	48													
Short (S) - 17	○	○	○	○	○													
Med (M) - 20	○	○	○	○	○													
Tall (T) - 24	○	○	○	○	○													
Lower Thoracic (LT)	£ XXX																	
Client max trunk width (cm)	28	33	38	43	48	£ XXX					£ XXX				£ XXX			
Short (S) - 30	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○
Med (M) - 34	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○
Tall (T) - 38	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○
Mid Thoracic (MT)	Laterals, headrest & harnesses available																	
Client max trunk width (cm)	£ XXX					£ XXX					£ XXX				£ XXX			
Short (S) - 42	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○
Med (M) - 46	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○
Tall (T) - 50	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○	○

Item Nr. construction:

J3 SC LT S 41 (This is only an example)

J3: J3 Back
 SC: Shallow Contour
 LT: Lower Thoracic
 S: Short (Height cm)
 41: Chair Backrest Width (cm)

RECAP: Example of smart part number

J3 SC LT S 41

- J3 J3 back
- SC Shallow contour
- LT Designed for supporting the back through the lower thoracic spine
- S Short height back in the lower thoracic position
- 41 Designed to fit wheelchairs of 41 to 46cm

Other Products in the Jay® Backrest Range

Jay® Fit / Paediatric

The Jay Fit System was developed to accommodate a child's growth as well as their changing functional seating needs.

The Jay Fit System is the premier seating system available today, offering children an effective clinical intervention early in life for improved function later in life. The system is available for frame widths from 10" to 16" and seat depths from 8" to 20" with room to grow.

Jay® J2 Plus / Bariatric

The Jay J2 Plus back is a bariatric, bi-angular back with a weight capacity of 295kg specifically designed to address the pelvic and trunk stability needs of bariatric clients.

With two back shells covering widths of 20"-23" and 23"-26", the client's size is easily accommodated.



Frequently Asked Questions



1. **Q: I have a user with a trunk width of 33cm (13") but the hips/seating width is 44cm (17"). I do not see a backrest that will work.**
A: Use the next widest backrest and use the shim to narrow.
2. **Q: What is the relationship of the position of the deep contour to the user's torso height?**
A: The DC laterals are anthropometrically designed to support the rib cage as it relates to the user's torso height (S, M, L). As the shell gets taller, the majority of the growth is added to the lower portion in order that the lateral is able to support the rib cage on the taller torso.
3. **Q: Does the maximum user weight for the J3 back range change between back types and sizes?**
A : No, all J3 backrests regardless of shape or size have a maximum user weight of 136kg.
4. **Q: We know we can fit a 41cm (16") back to an 46cm (18") chair but can a 56cm (22") back fit a 51cm (20") chair if mounted forward of the back canes?**
A: No, the mounting bracket shape does not allow reverse mounting to allow a wider back on a narrow chair. We plan to look into this issue with future projects.
5. **Q: Where should the hardware be mounted on the back?**
A: One of the key advantages of the Jay®Mount hardware is that it can be mounted virtually anywhere. If the customer wants further direction, we recommend mounting it higher on the back tubes or at the midpoint.
6. **Q: Is the hardware metric or standard?**
A: The J3 Back is a pan European product, and therefore we have chosen to use metric tools. We ship with each back the metric tools necessary for assembly. This includes a J3 Back 4mm allen key and a 10mm combo wrench.
7. **Q: Can the J3 back be used during transit?**
A: All J3 backs that can accommodate headrests are fully crash tested and approved to ISO standards.
8. **Q: Can the back be used on a power chair with 50 degrees of recline?**
A: The back can be used on chairs capable of tilt and/or recline, but cannot exceed 60 degrees from vertical in any combination of tilt and/or recline.
9. **Q: How can I be sure that a two point attachment is as strong as a four point?**
A: The entire J3 back range including all headrests and accessories has been extensively tested up to 100,000 cycles with the max user load and has passed!

We've Got Your Back !



Built to Last

The entire Jayback range has been subject to rigorous testing, facing 100,000 cycles with maximum user load, to ensure that our backrests will not fail in the field.

Additionally, Sunrise Medical and the University of Michigan have developed a completely new standard in crash testing solid backs. As a result, we can proudly say that the J3 back and all of the relevant options have been fully crash tested.

The Complete Seating System

The benefits of our Jay back range, or any solid back, can only be truly maximised through use in conjunction with the adequate pelvic support. Please ask for details on our extensive Jay cushion range.



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