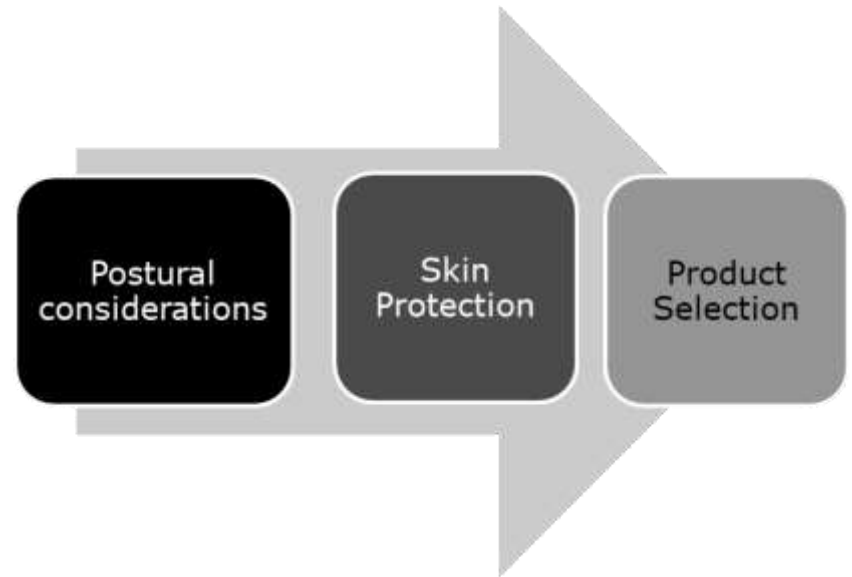


# MAT Assessments

Effective  
Efficient  
Successful



Amy Bjornson  
amy.bjornson@sunrisemedical.com.au  
Clinical Director  
Sunrise Medical

# 5 P'S FOR SUCCESS



**P**romote Function

**P**rovide Rest

**P**rotect the skin

Ensure **P**hysiologic function

**P**revent further deformities



# Making It Real



Encourage resting posture

REST IS BEST



# Making It Real

Allow transitions into task specific postures



# Making It Real



## Allow for Gross Motor tasks



# THE WHOLE ASSESSMENT

## Patient Demographics

- Age
- Diagnosis / prognosis / co-morbidities

## Medications

## Special needs

- Respiratory, GI, orthotics
- Communication devices or other assistive technology

## Surgical History / plans

## Physical status

- Strength, neuromotor, tone
- ROM

## Sensation / skin integrity



# THE ASSESSMENT

## Cognition / behaviour

- Integrate, sequence, retain
- Judgement

## Visual limitations

## Performance requirements

- Home environment
- Types of terrain – indoors / outdoors
- Inclines, ramps
- Travel distance

## Transport

## Functional skills



# THE ASSESSMENT





# THE ASSESSMENT





# MAT STEP 1 – REVIEW CURRENT CHAIR

- Look for areas of high pressure/shear
- What do you like most and least about the posture?
- What does the client like most and least?

**Create a problem list and a priority list!**







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■ IMPROVING PEOPLE'S LIVES ■







# MAT STEP 2 – SUPINE ASSESSMENT

Assess available movement at the pelvis

- Anterior / posterior pelvic tilt
- Lateral superior / inferior movement
- Rotation

Assess effects on other body segments

Consider tone, spasticity

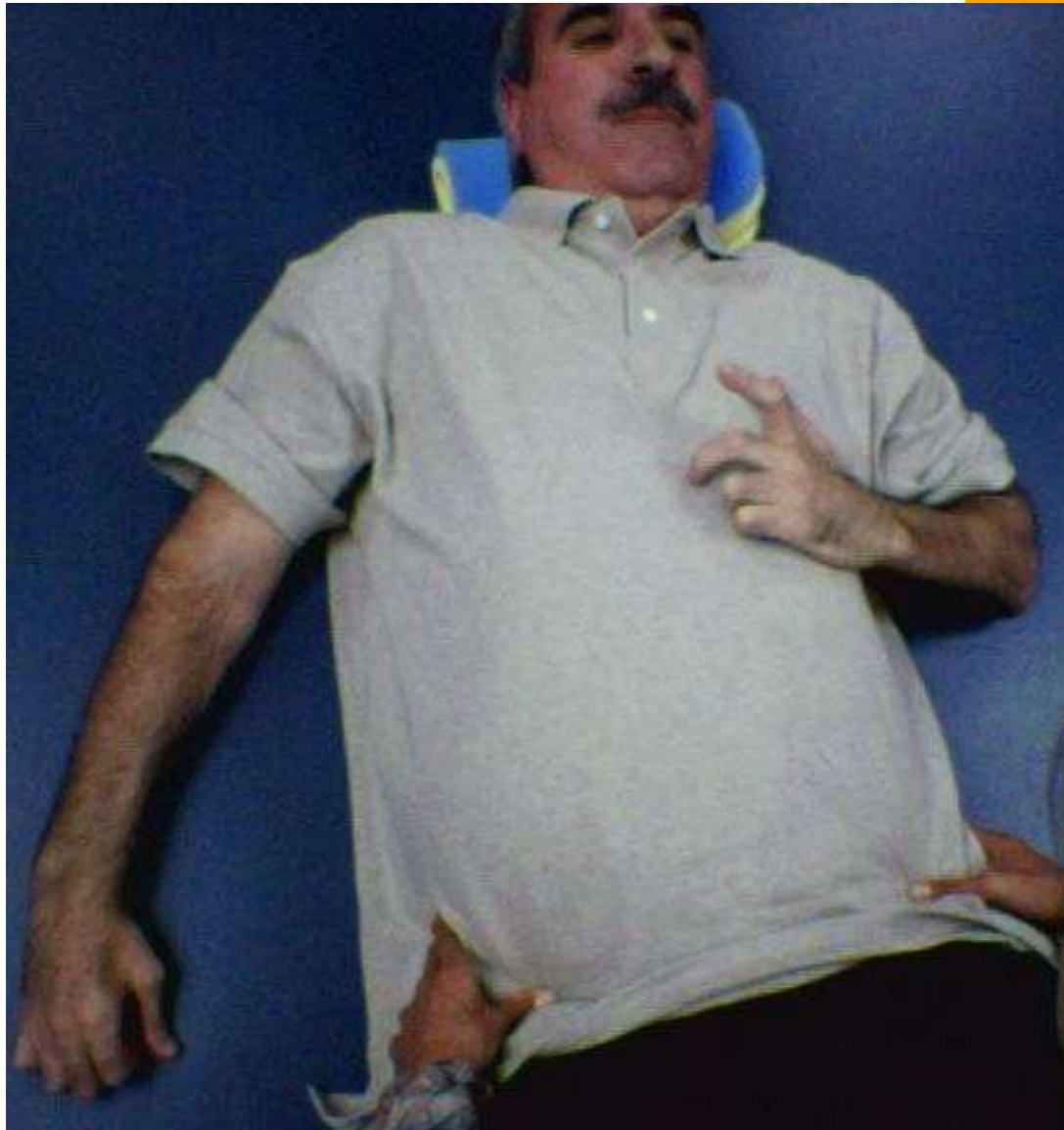
Assess comfort/ tolerance

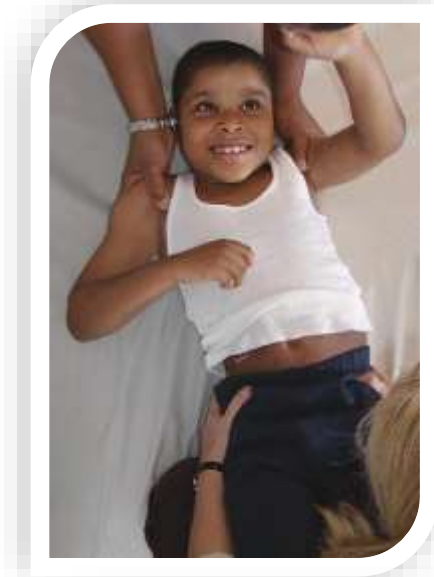
Assess ROM lower limbs



# CONSIDERATIONS FOR SUPINE MAT EVAL

- **Plinth is not available** - a full length transfer board on a soft bed can be used for a short duration. Consider their skin integrity and time taken for completion of this part of assessment
- **Current pressure injuries** - delay supine assessment until such time all wounds have healed
- **Urinary catheter** - should be emptied prior to supine assessment.
- **Bariatric clients** - Monitor breathing
- **Spasms** – may be common for clients with SCI when initially positioned in supine

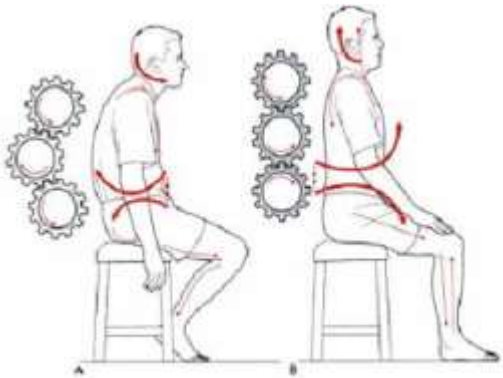






# SUPINE MAT ROM

- Hip flexion
- Hip ab/adduction
- Hip rotation
- Knee extension
- Ankle dorsiflexion















Right hip flexion ~ 120°



Left hip flexion ~ 145°





Right knee extension  
~ 110°



Left knee extension  
~ 120°





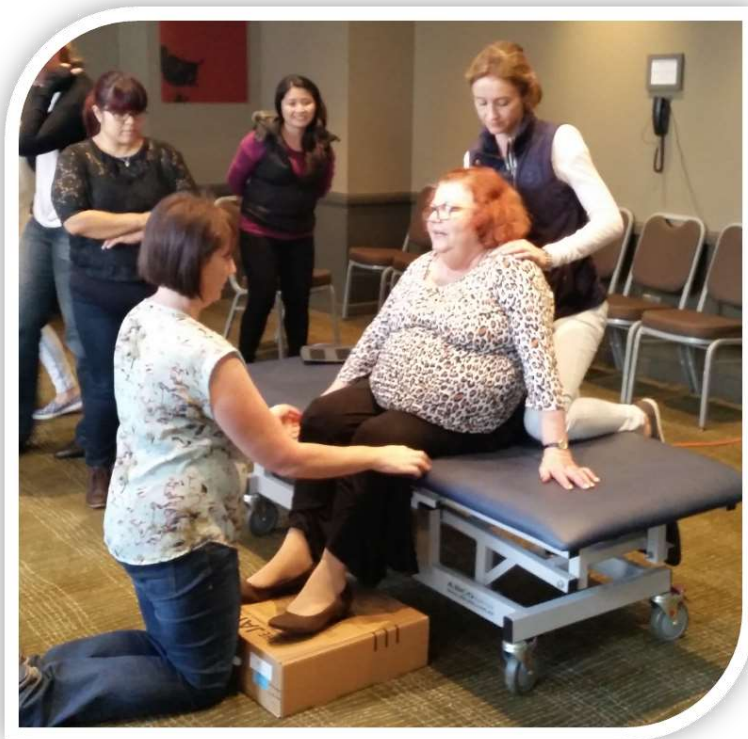




# MAT EVALUATION STEP 3

## Sitting assessment

- Sitting balance
- Confirm findings from supine







# MAT EVALUATION STEP 4



- Simulate postural supports
  - Skin protection
  - Postural support
  - temp/ humidity/ shear at seating interface
- Consider frame type
  - What can you delete from the list of options?
- Configure chair close to what you think the client will need

# HAND SIMULATION





Simulate correction with lateral support and L build-up

# SITTING BALANCE











# MAT – STEP 4 SIMULATION



# WHY THE ASSYMETRY

Is it stability related?

Is it used for gross motor function?

Is it tone related?

Pain related?

Is it ROM / body shape related?



# POSTURAL TENDENCY



# WHAT MUST BE PRESENT TO IMPROVE POSTURAL ALIGNMENT AT REST

- Flexibility
- Tolerance of correction
  - Skin, function, comfort
- Ability to position or be positioned consistently

# FIXED OR FLEXIBLE

Flexible - which direction?

Toward correction?

Through midline?

To midline?



In the direction of destructive postural tendency?









# Facilitating Posture

- Support posterior and lateral pelvis
- Support thoracic spine
  - Height and shape required
- Ischial contour in cushion
- Appropriate loading thru femurs



## Shapes, Angles, Orientation

# APPROPRIATELY CONFIGURED ACTIVE MWC



# PELVIC OBLIQUITY



# ADD OBLIQUITY BUILD UP





## Amber

- T8 Paraplegia
- Active – going to Uni
- Living independently

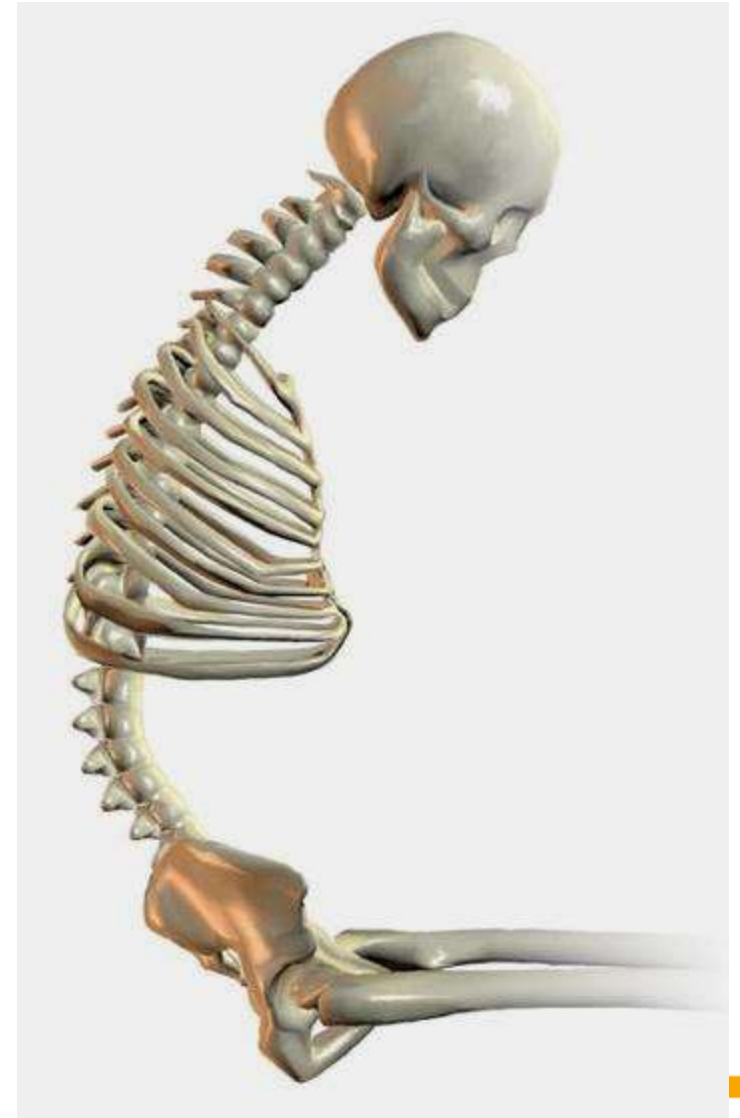


## Key points:

- Jay 3 with Shims
- Jay X2 with fluid 1" obliquity build up



# POSTERIOR PELVIC TILT



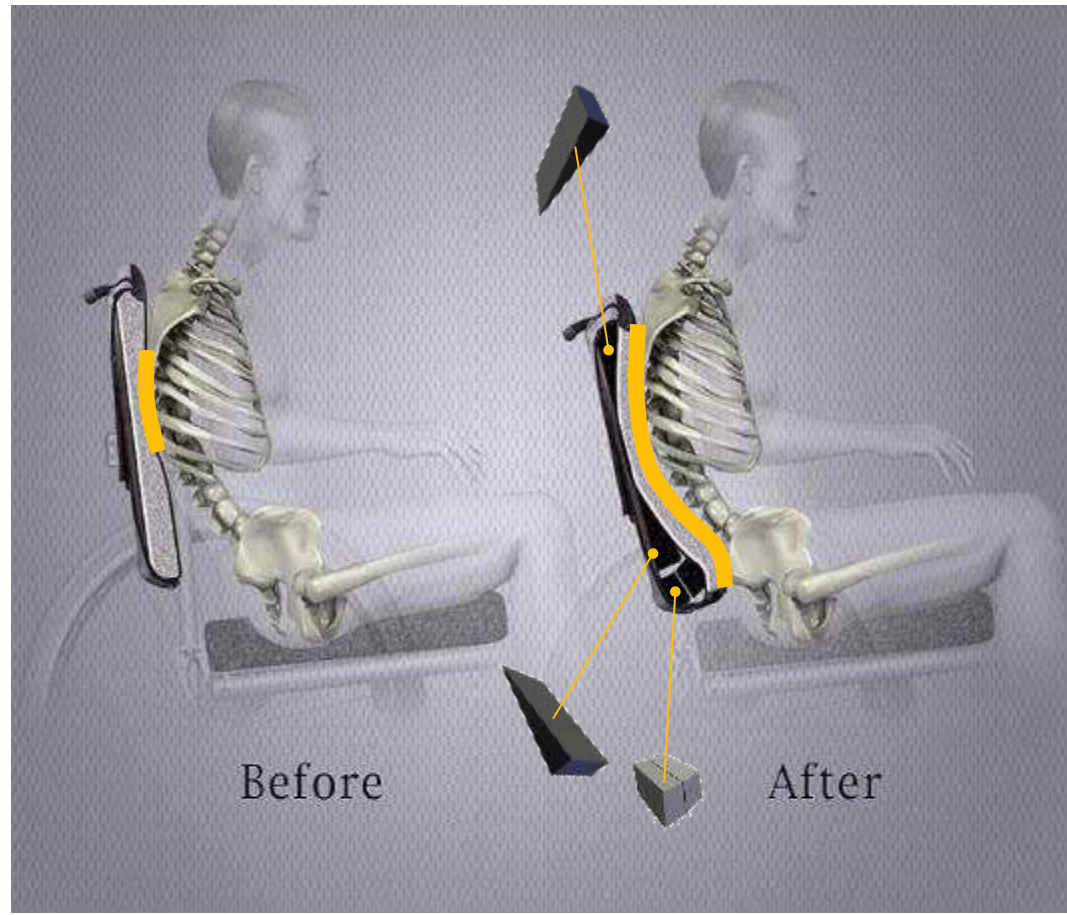
# REDUCE POSTERIOR PELVIC TILT



Don't Forget:  
you need the  
Ishial shaping in  
the cushion



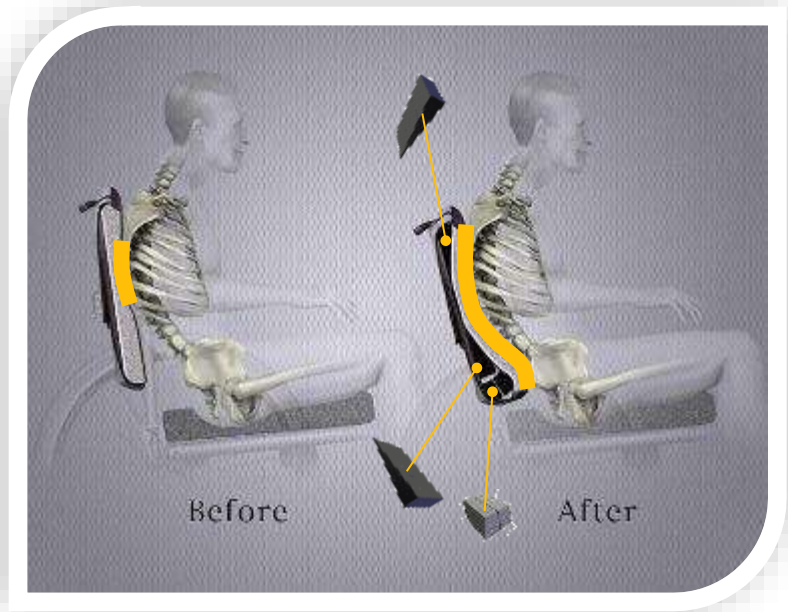
# FIXED POSTERIOR PELVIC TILT



# FIXED POSTERIOR PELVIC TILT



## Accommodate





- Neck and back pain
- Skin issues
  - GT
  - Sacral
- Poor mobility



## Key points:

- Jay 3 PAM™ backrest sacral shims
- Jay J2 cushion
- GT cutouts
- New Chair!!!



# POSTURAL COLLAPSE









## Key points:

- Jay 3 PDL backrest
- Sacral block
- Jay Fusion
- Large Adjusta-plush

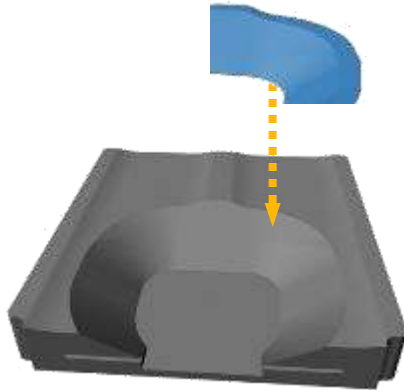


# PELVIC ROTATION





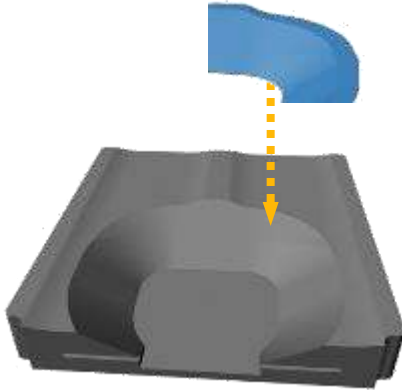
# REDUCE THE ROTATION



- Posterior lateral wedge in backrest
- Anterior well reducer in cushion



# ACCOMMODATE FIXED ROTATION



- Adjust well shape to match pelvic shape
  - Reduction ring
  - Fluid supplement pads



# 7 year old CP - Adam

Using standard stroller

- Skin breakdown pelvis
- Trouble breathing
- Not able to sit >2 hours
  - Lies in bed
- Increasing tone and motor control issues







# CONTRACTURE CUT



Leg length Cut - right

Contracture Cut



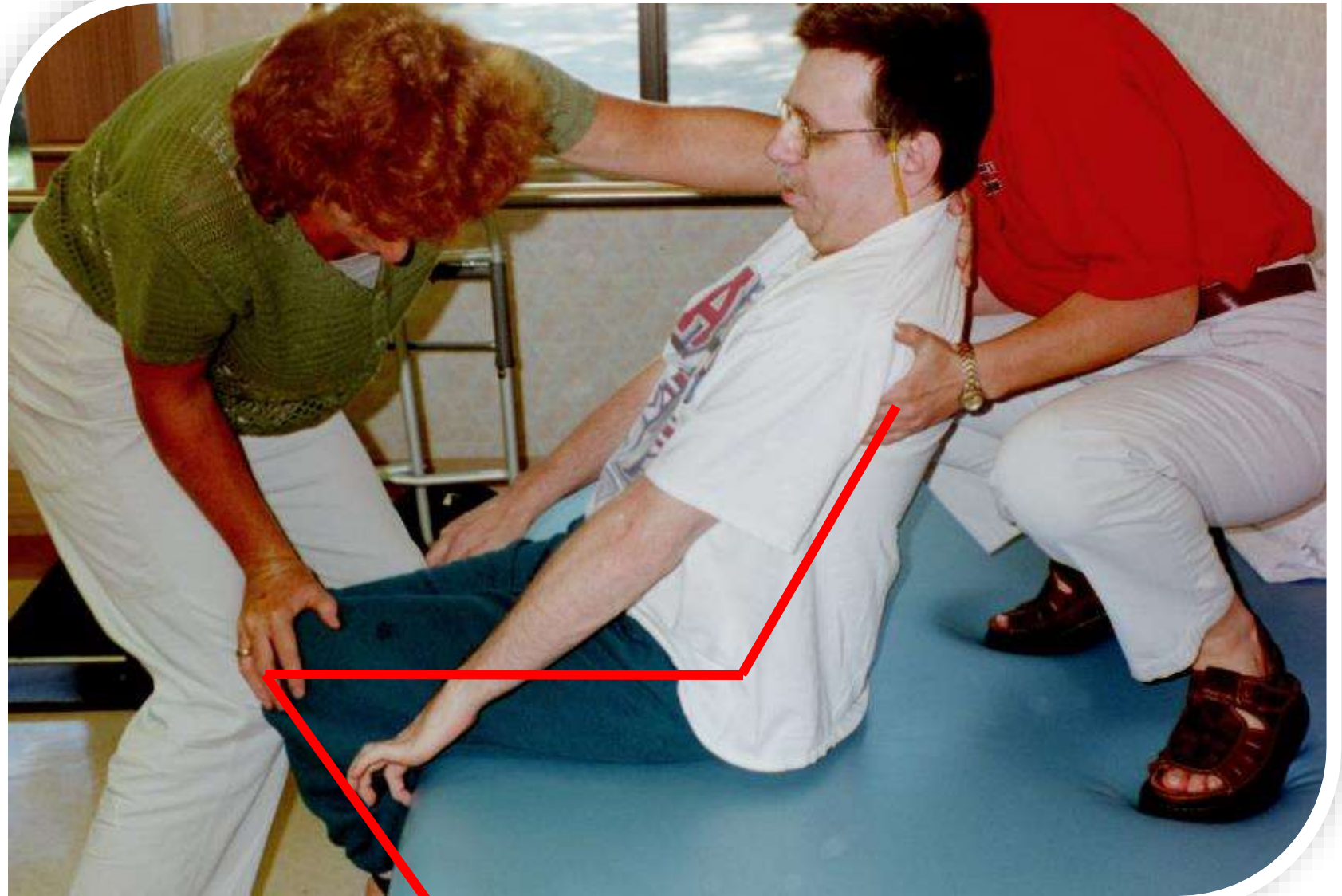


- Zippie TS
- Jay GS cushion
- Jay Fit backrest  
Posterior Deep shape
- Whitmyer SOFT
- Custom footrests

# 45 YEAR OLD TBI - RAY



- Standard wheelchair
- Sliding out, injuring self and staff



# LEG TROUGH CUT



## Clinical Usage

- Accommodate hip extension contracture
- Protect residual limb
- Increase contour around upper leg



[JAY J2® Series Cushions](#)

[JAY Fusion® Cushion](#)

[JAY Easy® Cushion](#)

[JAY J3® Cushion](#)

[JAY Lite Cushion](#)

[JAY GS® Cushion](#)

# CONTRACTURE CUT



## Clinical Usage

Accommodate tight  
hamstrings

Allow bent knee position



[JAY X2<sup>®</sup> Cushion](#)

[JAY J2<sup>®</sup> Series Cushions](#)

[JAY Zip<sup>®</sup> Cushion](#)

[JAY Ion<sup>®</sup> Cushion](#)

[JAY Union<sup>®</sup> Cushion](#)

[JAY Fusion<sup>®</sup> Cushion](#)

[JAY BasicPRO<sup>®</sup> Cushion](#)

[JAY Basic Cushion](#)

[JAY GO Cushion](#)

[JAY Soft Combi<sup>®</sup> P Cushion](#)

[JAY Easy<sup>®</sup> Cushion](#)

[JAY J3<sup>®</sup> Cushion](#)

- Tolerating sitting majority of day
- Stable, less sliding

Quickie IRIS with contracture platform

- Jay 3 PD backrest
- Jay Fusion  
Contracture cut  
Leg troughing







Seating / JAY / JAY Your Way

## JAY Your Way

Your seat is an important factor in your overall comfort, and we have made it a priority to provide seating designed to meet your specific needs. With JAY Your Way, JAY products are easily modified to meet your comfort needs and also your individual styles. From clinical improvements to colored covers, JAY Your Way modifies cushions and backs specifically to address unique individual needs and preferences. Do you need additional support? A cushion to fit perfectly on your chair?



# JAY Your Way | Sunrise Medical

# HIGH TONE ISSUES





## Key points:

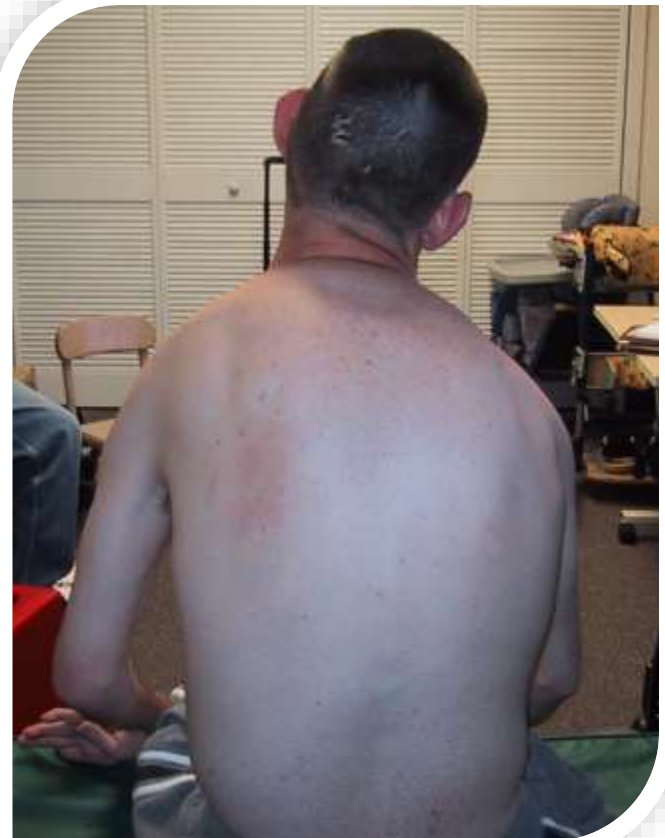
- Jay GS
- Fluid segmentation
- Longer well
- Jay Fit Backrest
- Thoracic laterals



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MEDICAL.



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# XABIAN

- Undiagnosed movement disorder resulting in severe global dystonia
- No limits regarding joint range and prefers 90° upright posture
- Xabian is very bright and wants to be able to engage more at school and increase participation both in the classroom and outdoors with family and friends
- Issues around arms getting caught in areas of the chair which causes pain, stress and anxiety



# CASE STUDY

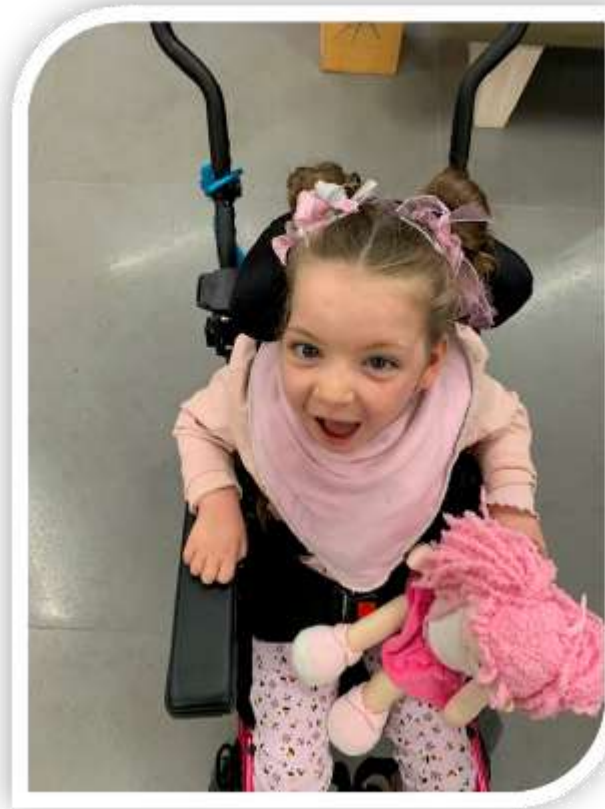












Thanks for Attending

[Amy.bjornson@sunrisemedical.com.au](mailto:Amy.bjornson@sunrisemedical.com.au)