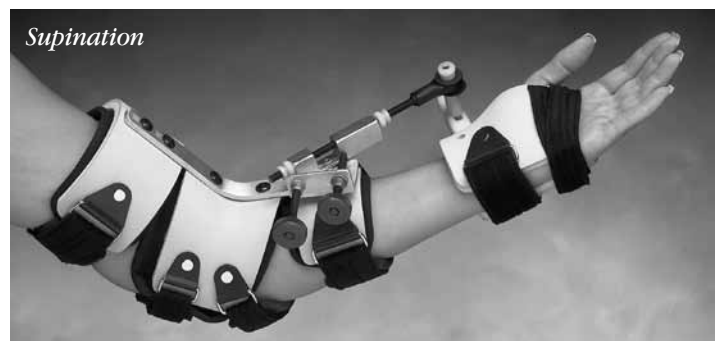
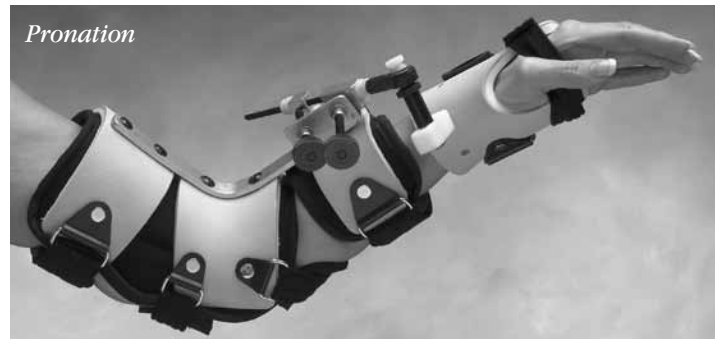
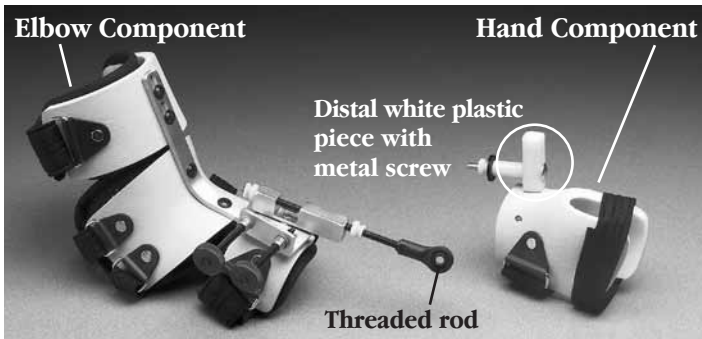




Progress™ -PLUS Pronation/Supination Orthosis



Indications:

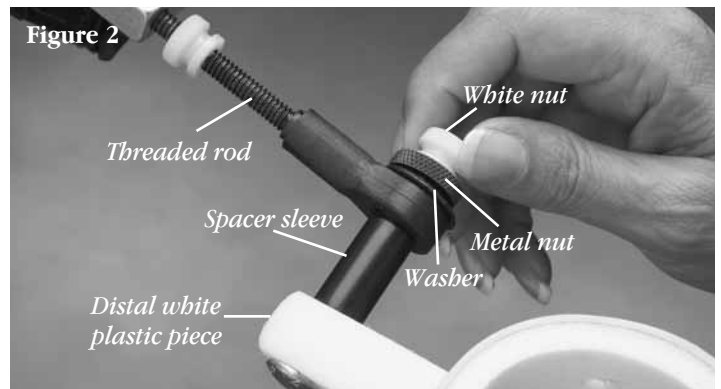
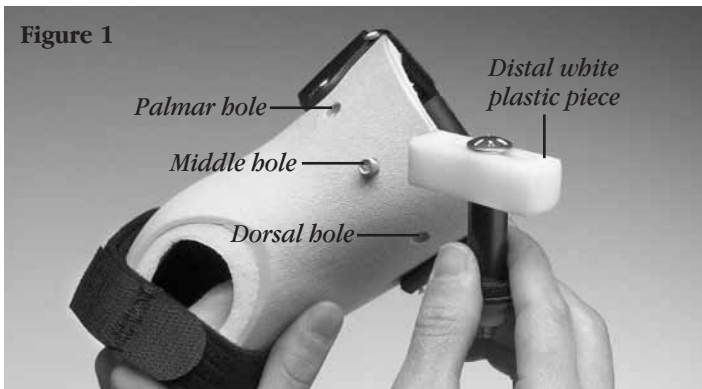
Use for static or static-progressive positioning of the forearm to maintain or improve rotational motion that has been reduced by contractures from neurological disorders, muscle hypertonicity, or orthopedic conditions. Recommended for serial splinting to increase ROM or postoperatively to limit or prevent forearm motion. Infinite adjustability allows the forearm to be held statically in any position between full supination and pronation.

Description:

The Progress™-PLUS Pronation/Supination Orthosis is comprised of:

- Elbow component
- Hand component

Instructions:



1. Set up the hand component for the desired resting position.
The component comes assembled to allow almost full range of motion. Check the location of the distal white plastic piece on the hand component. If end-range supination or pronation is desired, relocate the white plastic piece to the hole location as indicated in **Figure 1**. Do not over-tighten the set-screw inside the hand component. This piece should be able to rotate slightly.

2. Attach the hand component to the elbow component.
Remove the white nut, metal nut and washer from the end of the screw on the hand piece. *Do not* remove the spacer sleeve from the screw. Place the end of the screw into the hole of the threaded rod that extends from the elbow component. Rescrew the nuts and washer into place. (**Figure 2**).

Setting Options	Desired Resting Position
1. Plastic piece in the middle hole	Preset, for most range of motion
2. Plastic piece in the palmar hole	For supination > 75°
3. Plastic piece in the dorsal hole	For pronation > 75°

3. Apply the hand component to the hand.

- Place the hand component around the wrist with the opening on the ulnar side of the hand and the contoured section over the palmar arch. Use a heat gun to soften and trim the Kydex® shell for slight changes in fit.
- Wrap the distal strap through the web space and around the hand. The sticky back hook pieces can be relocated a few times for optimal strap placement. Secure the wrist strap using the D-ring. To shorten the strap, remove the Velcro® Y-Strap Tab (Figure 3) from its end, cut the strap and return the strap end between the two hook pieces of the tab.



Figure 3

4. Apply the elbow component to the anterior arm (Figure 5).

- Turn the large thumb screws in the adjustment hardware so that the screw ends are positioned clear of the threaded rod hardware.
- Move the white nuts to both ends on the threaded rod, away from the hardware.
- Place the elbow component on the anterior arm with the orthosis bend in alignment with the elbow crease. The elbow is held fixed at approximately 60° flexion. Fasten the three elbow straps around the arm using the corresponding D-rings. Adjust the neoprene pads (attached by Velcro® hook) on the straps for optimum comfort.

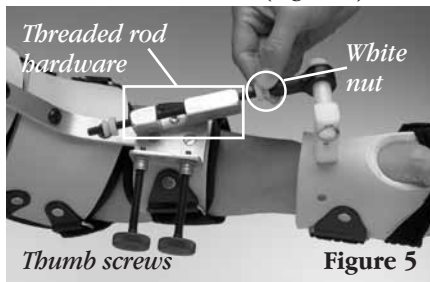


Figure 5

5. Achieve the desired forearm position.

- To rotate the forearm into position, turn the large thumb screws in opposite directions until both screws are against the adjustment hardware. The thumb screw that protrudes out can be removed if not needed for rod stability later.

For Pronation: the proximal thumb screw is screwed farther into the adjustment hardware (Figure 6). Spacer sleeve/rod should be pushing from the dorsal side (Figure 6a).

For Supination: the distal thumb screw is screwed farther into the adjustment hardware (Figure 7). Spacer sleeve/rod should be pushing from the palmar side (Figure 7a).

- To adjust the length between the elbow and hand component, move the two white plastic nuts located on the threaded rod. Slide the rod forward or backward until the hand component is in good alignment. Lightly tighten the two nuts against the adjustment hardware when finished. (Figure 5) If a shorter distance is needed, the distal white nut can be removed from the rod. The rod will need to be removed from the hardware in order to do this. **Note:** A shorter rod distance is needed when the hand is in a neutral position versus a longer distance when the hand is at the end range.



Figure 6

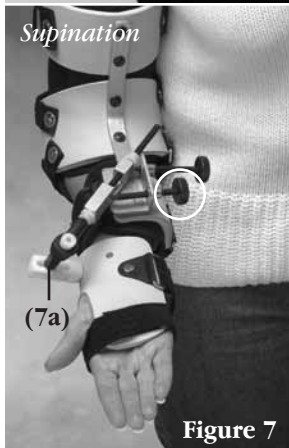


Figure 7

5. Achieve the desired forearm position. (Continued)

- To adjust the alignment/tilt of the hand component, loosen and slide the metal screw side-to-side in the slot of the hand component's distal white plastic piece. Tighten the white nut on the end of the metal screw when finished. (Figure 8)

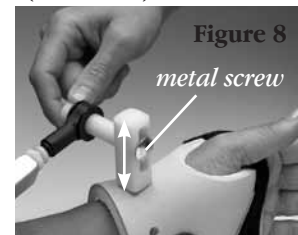


Figure 8

6. Refasten the straps and adjust the neoprene pads for a better fit.

- Trim the straps and pads if needed (see Figure 3 for tips on trimming straps). Neoprene pads should fit next to (not over) the liner edges. (Figure 9)



Figure 9

7. Continued static progressive positioning.

Make minor adjustments as needed to increase range and maintain a comfortable fit. Try the following steps during each positional change to achieve desired results:

- To gain greater forearm rotation, adjust the large thumb screws.
- To set the appropriate distance between the hand and the elbow components, adjust the threaded rod position.
- For better alignment of the hand to the elbow component, slide the metal screw side-to-side in the distal white plastic piece.
- To progress into the desired range of pronation or supination, move the distal white plastic piece to another hole on the hand component (see settings in Figure 1). (Figure 10) **Note:** Washers, spacer sleeve, and nuts may need to be repositioned or removed to achieve proper fit.



Figure 10

Wear and Care Instructions:

Initially wear the orthosis for one hour on and one hour off. Increase the wear time as necessary based on the medical condition. Note any potential pressure areas and adjust the fit accordingly. Repeatedly adjust the thumb screws to provide static progressive changes over time. A medical professional should fit the orthosis.

The orthosis can be surface-cleaned using mild soap and water. The elbow component liner can be hand washed and air dried.

Ordering Information:

Elbow Component		
Left	Right	
NC14040-1	NC14040-2	Small
NC14040-3	NC14040-4	Medium
NC14040-5	NC14040-6	Large
Hand Component		
Left	Right	
NC14041-1	NC14041-2	Small
NC14041-3	NC14041-4	Medium
NC14041-5	NC14041-6	Large
Replacement Elbow Liner		
NC14040-12L		Small
NC14040-34L		Medium
NC14040-56L		Large

To be used under the guidance of a qualified medical professional.

