Measuring a Patient for a Broda Chair

Measuring for proper fit of a chair is important for patient safety and comfort.

The patient should be measured in a seated position.

The measurements of the patient’s seat depth, seat height and back length added together should be within about 1” of the patient’s overall height. (with the exception of bariatric patients, as they may have increased seat depth in a seated position)

**Seat Width**

Measure the patient across (not around) the widest part of the hips or thighs while the patient is seated. There should be about an extra 0.5” of space on each side for proper fit in a chair.

*Example:* If a person measures 18” across the widest part of the hips or thighs, then a standard 20” Broda chair is the correct fit. Keep in mind that the “play” in the side pads gives you some latitude in the width of the Broda chairs. The upper side pads actually decrease the seat width by 0.5” on each side.

**Seat Depth**

Measure from the back of the buttocks, along the thigh, to the back of the knee, while the patient is seated. There should be an extra 2-3” clearance between the back of the knee and the front of the seat.

*Example:* If the measurement is 19”, the standard Broda seat depth of 17” is the correct fit.

**Seat Height** (for the Pedal Chair or 587 Wheelchair)

For chairs in which the patient can foot propel, the seat height should be adjusted to match the length of the lower leg. With the knee bent at a 90° angle, measure from the back of the knee to the bottom of the heel. The patient should have a proper foot on floor position for foot propulsion.

*When measuring for seat height, the following should be taken into account:*

- Is the chair user or will the chair user be wearing shoes?
  1. How much seat tilt is going to be used? (In the deepest tilt position for the 587 Wheelchair, there will be minimal amount of lifting under the knee)
  2. If a solid seat pan is used with a pressure relief cushion on the 587 Wheelchair, the thickness of the seat cushion must be considered when determining the seat height

The seat height on the Pedal chair is adjustable from 12.5” to 17.5” in one inch increments. The seat height on the 587 is adjustable from 14” to 20” in one inch increments.

Broda Elite, Basic and Midline chairs are for non ambulatory patients who do not require a foot on floor position. They have a length adjustable legrest (with footrest) to accommodate various leg lengths. The legrest length can be adjusted to 16”, 18”, 20” and 22”.

**Back Length**

Measure from the bottom of the buttocks to the top of the head while the patient is seated. The patient’s head should rest on the back of the chair. 32” is the standard back length on most Broda chairs.

**Armrest Height**

Broda chairs have an adjustable armrest height that will allow the user to properly set the height for the patient. To determine correct armrest height, the patient should be seated in a comfortable position with the elbow at a right angle. Measure from the seat just under the elbow and add 1” for the correct armrest height.

**Items to Consider when Measuring Bariatric Patients for a Broda Chair**

Measuring bariatric patients for a Broda chair may involve additional steps to measuring for a standard chair:

**Seat Depth**

Broda chairs have a standard seat width of 18” or 20” and a standard seat depth of 17”. Often when a wider seat width is required (22” – 28”) for a bariatric patient, the seat depth needs to be increased as well. This is to accommodate the patient’s gluteal shelf which may cause them to sit further toward the front of the chair.

**Trays**

For bariatric patients that require a tray, it is important to determine that the tray will properly fit in front of the patient with adequate space. While the patient is seated, measure from their back, across to the front of their torso. Be sure to measure to the deepest point to ensure proper fit of the tray.