

## **POWERSTRETCHING – A Procedure that Protects the Installer!**

By Jim Walker – Reprinted with permission of FLOOR COVERING INSTALLER MAGAZINE

Like cutting and seaming, every carpet has its own unique stretching requirements. The information addresses the powerstretching techniques for tufted, non-patterned carpet with Action-Bac. Refer to the manufacturers' guidelines for woven carpets.

### **Powerstretching, Trimming and Tucking the Carpet**

Powerstretching is not a choice; **it is mandatory**, regardless of the size of the room. Use the kneekicker as a positioning tool **ONLY**. **Never** use a spike! This is not acceptable and voids the manufacturers' warranty. I don't need to remind you that the kneekicker is **NOT** a powerstretcher.

Our customers deserve this finishing technique and in all areas, no matter what the size. The carpet stretches the most in the length. If you do the majority of your stretch in the width, seam peaking is guaranteed. Look at the construction of the carpet. The rows run the length with space between them. If the carpet has bubbles or shows looseness; where does this happen? The path of least resistance is between the carpet rows.

Properly stretched carpet is not loose and displays no wrinkles or holes from malfunctioning tools. The recommended stretch from the CRI for tufted carpet is 1 to 1-1/2% in both length and width. You should always understand the carpet and know how it should be stretched. A thorough knowledge of the backing and carpet with which you are working can prevent you from overstretching that may result in seam peaking.

It is never acceptable to secure the carpet to the tackstrip with staples. This is a shortcut taken by those who are **NOT** carpet installers; they haven't a clue as to professional procedures. Did you ever follow these guys to do the removal for the next installation? The amount of distortion visible on the "pick" of the back makes it obvious to a qualified person if the correct stretching procedures were used.

## **Tools required for powerstretching carpet**

### **Powerstretcher**

Carpet installation tool used to stretch carpet onto tackstrip and to match patterns. It is made with a pinned plate that grips carpet; tubular extensions; a padded end that is used to brace against opposing wall or other structure, and a lever system that multiplies applied stretching force. All carpet must be powerstretched. For woven carpets, during stretching the dimensional stability is much greater than tufted carpet. Great care should be taken not to damage the weave or distort patterns by aggressive powerstretching. The use of a cottonhead is recommended if the carpet being installed is a woven or of loop-pile construction

### **Cottonhead**

Attachment used on a powerstretcher, designed to stretch loop-pile or low-profile carpet to avoid sprouting or possible damage to the face pile.

### **Pattern Stretcher - Restretcher**

This tool does NOT replace the powerstretcher. A double-headed tool with multiple uses that is much smaller and lighter than the powerstretcher. It is designed to assist with aligning patterns and restretching carpet.

### **Deadman**

Designed to use with the powerstretch to achieve pattern alignment and to protect the walls and base.

## **Cushion Plays an Important Role**

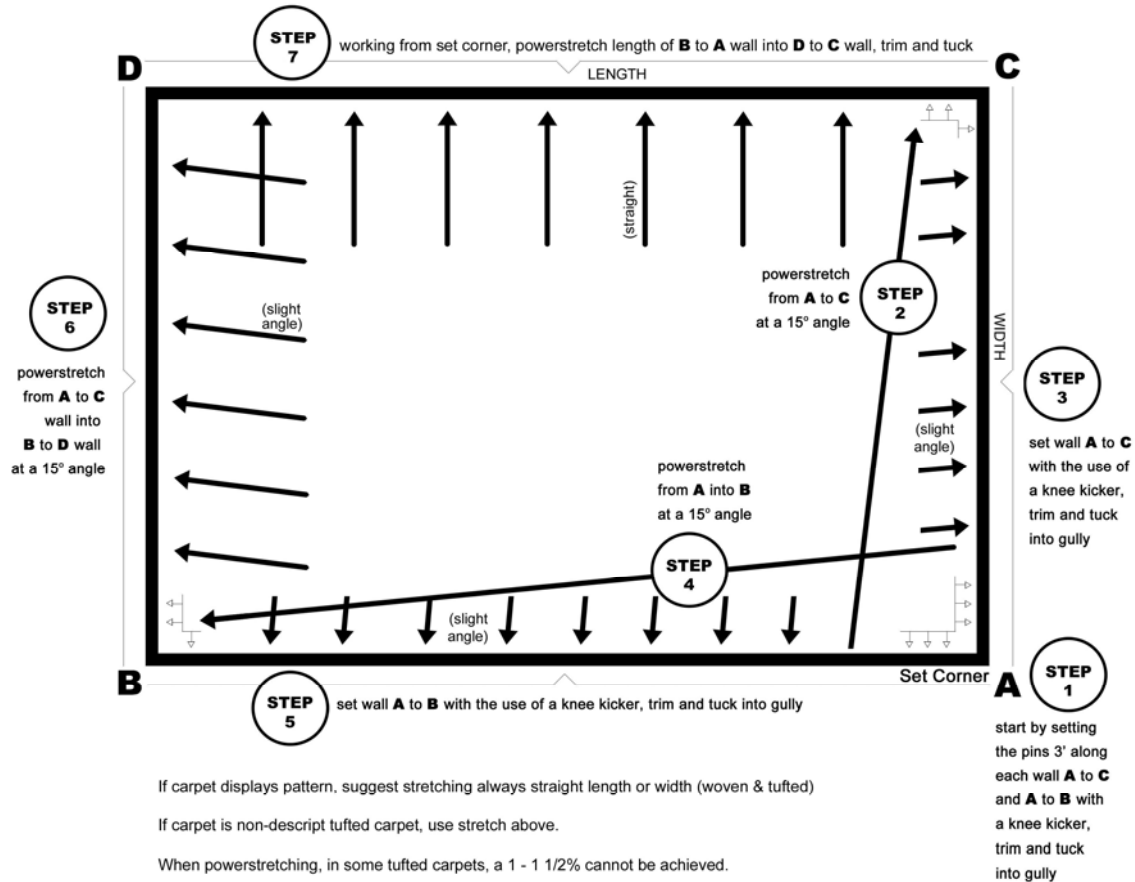
The manufacturer's specified cushion must be installed under the carpet type to achieve a satisfactory installation that holds the stretch. Looseness that results from an installation over the improper cushion is NOT an installation problem. Cushion seams are NEVER placed directly under carpet seams. The cushion must be properly secured to avoid movement during the powerstretching procedures.

## **Powerstretching Procedure for Tufted – Non-Patterned Carpets– Action-Bac**

- A 2-way stretch is used.
- Attempt to stretch 1 to 1-1/2% in length and width at a 15-degree angle
- Select a corner and set that corner.

- Stretch from the set corner and securely hook it on the tackstrip.
- Set this wall, stretch and securely hook at a 90-degree angle.
- Go back to the set corner, working down the wall opposite to the first stretching wall.
- Continue stretching procedure

STRETCHING DIAGRAM for non-patterned ACTION-BAC tufted carpets



### Finishing the Powerstretching Procedure

Use a wall trimmer next to the wall to avoid damage to the wood. This procedure is also used to properly trim and tuck the carpet into the gully and seal the carpet onto the tackstrip. It is the installer's responsibility to protect the base and wood.

### Restretching

If restretching should become necessary, the rooms are to be emptied of all furniture to achieve the proper stretch. Start the stretching procedure by placing the deadman in the

center of the room. Stretch one-half of the area, reposition the deadman and stretch in the opposite direction.

The use of professional installation techniques protects you and ensures you of a healthy career. The National Institute of Occupational Safety and Health (NIOSH) in publication 90-104 ([www.cdc.gov](http://www.cdc.gov)) states: “WARNING: Serious knee injuries frequently result when carpet installers use a kneekicker to install carpet. They should use a powerstretcher, a safe alternative to the kneekicker. Approximately 100,000 carpet installers (1985) make up less than .06% of the workforce, but file 6.2% of all workers’ compensation claims for knee injury. The area just above the kneecap absorbs the impact. The average impact of the “stretch” of carpet using the kneekicker is 675 pounds, about 3 to 5 times the body weight. The powerstretch procedure produces no trauma to the knee.”

Work wisely, and a healthy career awaits you. Always be proud of the skills involved in using the proper techniques to provide your customers with an installation they can be proud of for many years.