HYSPAN BARCO STRUT JOINTS AND VIBRASNUBS

Hyspan Barco "Ball Type" Flexible Strut Joints

Advantages:

Double Acting—Handles both tensile and compressive loads. Accommodates push, pull and slide movement with positive control.

Precision Built—Factory machined to close tolerances and rigidly inspected. Reduces the possibility of dangerous errors in field construction.

Lower Cost—Lower initial cost compared to other motion control and restraint methods, and economical operation.

Maintenance Free—Permanently lubricated. No adjusting or service required.

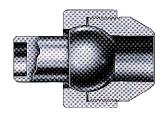
Simple—Simplifies structural designing and eliminates the need for special struts, tie-rods, or clevis-and-pin arrangements which are not as flexible, and are subject to stress and binding.

Safety—High load carrying capacity for reliable service in severe conditions, combined with easy calculation of proper sizes to promote safety in structural design.

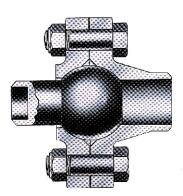
HYSPAN BARCO "Ball Type" Flexible Strut Joints function as positive restraints in process systems where the restraint is required in one direction, yet some movement must be allowed in other directions. This is accomplished by using a flexible ball type joint located at each end of a solid strut.

HYSPAN BARCO "Ball Type" Flexible Strut Joints may be applied for static or dynamic loads. They are equally rated for tensile or compressive loads. The most common uses are:

- 1. structural sway bracing for hot stacks and pipes;
- 2. supports or hangers for horizontal piping;
- stability supports for tall or slender towers, structures or vessels;



BB-35500-XXFOR SIZES: ³/₄" x 1"; 1" x 1¹/₄"; 1¹/₂" x 2"; 2" x 2¹/₂"; 3" x 4"



BB-35000-XX FOR SIZES: 5" x 6"; 6" x 8"; 10" x 12"

 restraints to direct and control thermal expansion away from components that should not be stressed, such as turbine nozzles and pump flanges.

HYSPAN BARCO "Ball Type" Flexible Strut Joints have been used for years by many leading engineering and construction firms. Compared to other restraint methods like sliding plate guides, A-frames or clevis-and-pin arrangements "Ball Type" Flexible Strut Joints are simple to apply, economical to erect and less cumbersome.



Table 1 Standard sizes - Inches(mm)

Ball End Inches mm	³ / ₄ (20)	1 (25)	1 ¹ / ₂ (40)	2 (50)	3 (80)	5* (125)	6* (150)	10 (250)	
Pipe Schedule Ball End	160	160	80	80	80	80	80	120	
Casing End Inches mm	1 (25)	1 ¹ / ₄ (32)	2 (50)	2 ¹ / ₂ (65)	4 (100)	6 (150)	8 (200)	12 (300)	
Pipe Schedule Casing End	80	80	80	80	80	80	80	80	

^{*}Sizes: 5" (125mm) x 6" (150mm); 6" (150mm) x 8" (200mm); 10" (250mm) x 12" (300mm) available on special order only, other sizes carried in stock.