

Two basic measurements for the quality and feel of the foams are Density and IFD. There is not one combination that is considered the perfect foam for Marine. This depends on the customer's preferences and the feel they are trying to create.

The IFD is the firmness of the foam. This is typically measured by the pounds it takes to compress a 4" x 15 x 15 piece 25% of its thickness. A foam that would take 15-25 pounds would be considered "soft" and easily compressed where a piece that would take 60-70 pounds would be considered "firm" and hard to compress.

The Density is the weight of a cubic foot (12 x 12 x 12") of the material. This is basically the measurement of the quality of the foam. A less dense product 1# - 1.4#, is more likely to "breakdown" or lose its thickness and support quicker than a denser product, 1.5# and up. Typically, this is the cost driver on materials as well, the higher the density, the better the product, higher costs.

Many different combinations of these measurements are being used. Low IFD for a soft feel, but at a higher density for better quality, to very high IFD's with lower density's to get a very firm feel. In our experience we have had great success with customers using a higher IFD material, usually in the 55 - 75 range at a minimum 1.5# density in the seats. This helps "kick out" the vinyl covers, give it a good full look and helps with support within the boats. The backs can usually be softer or lower IFD for a softer feel for users leaning into them.

Many customers use combinations as well. Like a very firm, higher density product as a base for support, but with a low density, low IFD glued to this for a softer initial feel. Again, there are many different combinations of foam grades that can be used in the marine industry depending on manufactures preferences and cost constraints.

In each case if the foam is used for marine upholstery, we do recommend that these materials are treated with a biocide additive. Marine foam should pass ASTM I428 and G21 tests with 0 growth.