



Indofork from Bremels is a leading compounder for tyre companies in India, with the capacity excess of 20000 tonnes annually. We have been doing this highly technical compounding work for the last two decades for all the leading tyre companies in India.

Today the company is steered by young dynamic team of professionals well trained and having adequate educational background and no wonder Indofork from Bremels is poised for a big leap ahead.

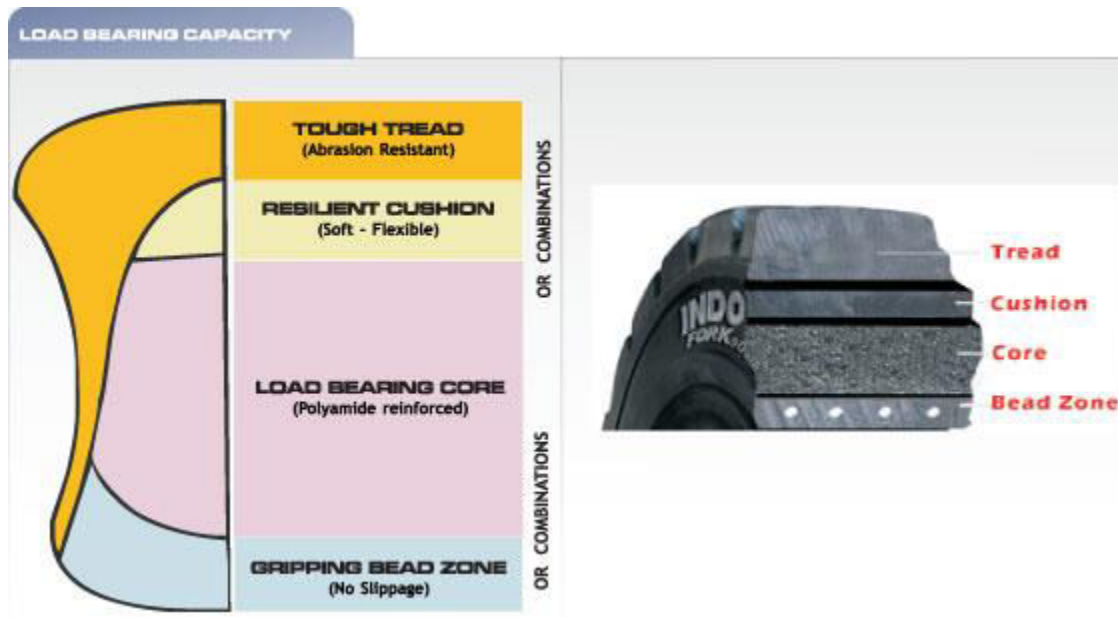
CHOOSE THE YRES

Solid Cushioned Tyres
Press On Band Tyres
Future Range Of Tyres

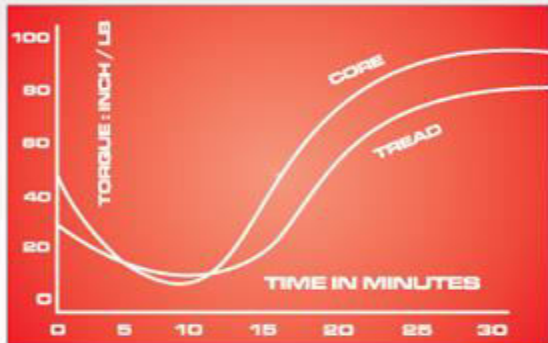
Solid Cushioned Tyres of Indofork make are engineered to provide high load bearing capacities and chemically protected from all deleterious effects of atmospheric oxygen, ozone flex, fatigue and shear. Typical section of Indofork Tyre is shown in fig.1. This is a beadless tyre that provides no slippage and better grip on wheels. It was possible to achieve this with latest techniques of using polyamide reinforcement.

LOAD BEARING CAPACITY

Load carrying capacities of Indofork tyres are property designed for front (load) and rear (steering) wheels for lift trucks and industrial vehicles.



COMPOUND TESTING

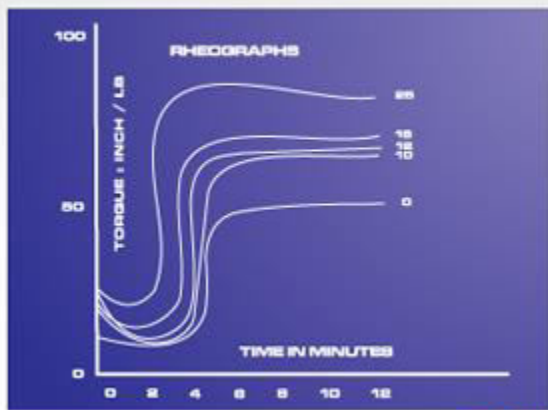


Zoom

Compound Testing:

All **Indofork** compounds are tested on an advanced model of a Rheometer to control Initial viscosity, Minimum viscosity, Scorch time, Optimum cure time and behavior after completion of cure. Figure shows typical curves of a tread compound and core. Every batch is tested to ensure that it is within specified limits.

STIFFNESS WITHOUT BRITTLINESS :

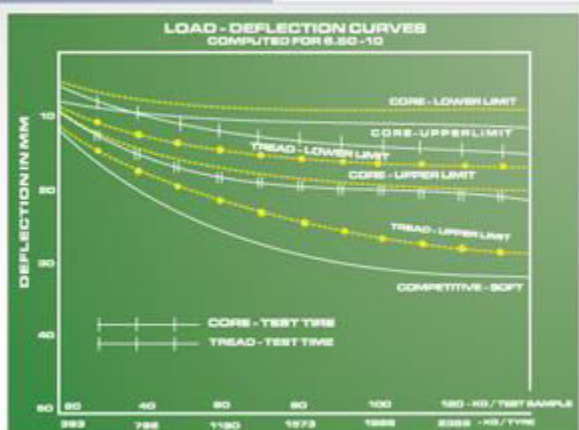


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Stiffness without brittleness:

When hardness of a compound goes up in conventional compounding the stock tends to be brittle. In Solid tyre it would show layer separation and / or chunking or chipping. Monsanto Co. in USA developed a new concept of using fiber web to reinforce rubber. **Indofork** core is based on such fiber web. Typical influence of web on rubber matrix is seen in the figure. A properly compounded stock is further added with 10 to 25 parts of such a web material. Results are self explanatory.

LOAD - DEFLECTION CURVES :

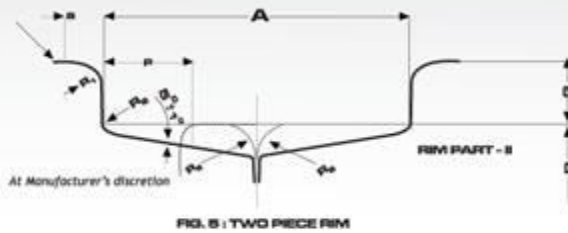


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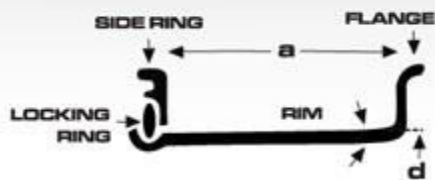
Load – deflection curves:

Ultimate performance of good solid tyre depends on load – deflection characteristics of its individual components. When put together they offer ultimate load – deflection properties to the finished tyre. Figure shows how **Indofork** tyre components behave under specific loads. For general comparison we have taken load- deflection characteristics of two leading European tyres, one is the toughest (competitive tough) and other is by far the best cushioned (competitive soft). Combination of **Indofork** components ensure that the final tyre stays within these best European limits.

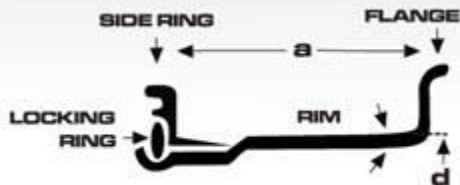
TWO PIECE RIM :



THREE PIECE RIM:



FOUR PIECE RIM:



CLICK (EASY FIT) TYRES

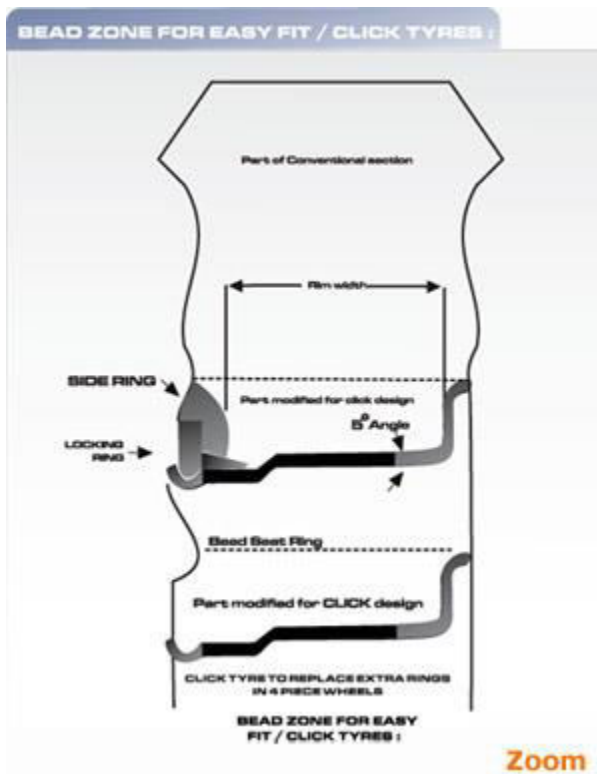
Development of Easy Fit or Click tyres is extremely helpful in getting the right fitment with substantially higher ease of fitment. In order to understand the designing of the Bead zone of the Click tyres one must study various types of rims that are generally available for the mounting of conventional tyres.

2 Piece Rim: This is a very common design. Typical 5.00 – S – 12 Rim is shown in the figure. This assembly has only two parts dividing the total rims in the center. While all conventional **Indofork** solid Cushioned tyres will fit this rim, the Easy fit or Click tyres will not fit into this assembly.

3 Piece Rim: This is shown in the figure. The total assembly consists of the Locking Ring, the Side Ring and the Main Rim. The Locking Ring locks the tyre and the side Ring into the rim slot. The tyre bead has to be shaped to suit this and naturally conventional bead tyres will not fit this fit.

4 Piece Rim: Figure shows the assembly of this rim. It consists of Main Rim, Locking Ring and Side Ring. Again the Bead zone has to be specially designed. When all the extra components viz. the Side Ring, Bead Seat Ring and Locking Ring are removed, what remains is the rim for Easy fit/ Click tyres.

Bead zone of an Easy fit / Click Tyre:
This tyre fits into the rim of four components without making use of three components as shown in the figure.



NON-MARKING

Non – marking solid cushioned Tyres do not leave marks on the floor like many black tyres do. It is not the black color alone that does this but many ingredients used in the compounding of the tyre components also contribute heavily in developing the marks which are actually the stains.

Thus a high quality non – marking tyre has not only to avoid use of carbon black but has to take care of other materials that develop stains.

Generally in rubber compounds oils, softeners, accelerators, antioxidants, retarders and fillers are used that can be staining. In **Indofork** Tyres carbon blacks are totally eliminated for use as reinforcing fillers and are substituted by equally effective non black silica based material of highest quality. In fact, commercially this fine particle sized precipitated silica is also known as ‘White carbon’.

Aromatic, Highly aromatic and natural staining oils are dropped in favour of a non–staining paraffinic oil and stiffness as well as abrasion resistance is highly improved with the usage of a high styrene resin.

Antioxidants selected and other compounding ingredients are of non staining nature which makes the complete tyre Non – staining hence Non – Marking.

These tyres are available in light gray or off-white colour.

Companies handling soft drinks, alcoholic beverages, fruit juices and solid food products obviously prefer non – Marking Tyres.