



FOUNDRY PRODUCTS: Technical Data Sheet

PRODUCT: Furan No-Bake Resins Furan NB™

DESCRIPTION :

This is a two part binder system comprised of the furfuryl alcohol based **Furan NB** resin, and the curing agent, a **Catasol™** sulphonic acid. There are several types of NB resins available (over 30 in total), based on 3 main furfuryl alcohol chemistries. All our furan resins are low in free formaldehyde, 100% free of additive UF resins, and are cooked at high temperatures so that they are reactive enough that the catalyst will almost always be a less than 1.0% free sulphuric acid product. This ensures that the **Furan NB** system is the cleanest, and most user friendly product available anywhere on the planet today – both on the molding and pouring floors.

FIELD OF APPLICATION :

Cores and molds for steel, iron, alloy or aluminium castings. It is particularly suitable for use with reclaimed foundry sands. Exceptionally good performance for very large, thick and heavy section castings; a wide range of work and strip times available through choice of appropriate catalyst. Exhibits superior thru-cure properties which makes the Mancuso Chemicals Ltd.'s **Furan NB** resins, an excellent choice for core and high volume making operations.

METHOD OF APPLICATION (standard):

It is generally used at 0.9 – 1.1% based on sand. Levels of 0.8 % are obtained in foundries with good sand control. When using cold or new sand, levels of 1.2% may be necessary. Hardening is obtained with one of the following catalysts:

- Catasol H6PM or H6PH for slow and long bench life conditions
- Catasol H60 or for normal hardening.
- Catasol H720 or XSA for rapid hardening or in winter.

FURAN NB PRODUCT LINES:

Highly modified resins: These are resins that are co-reacted with phenol in order to produce the most economic furan resins available. 100% 'cooked resin', these resins are often used in large molding operations and are known for a strong, swift thru-cure.

Completely un-modified resins: These resins are designed on a traditional, high FA content resin basis. Often used in pit molding operations, they have generally been replaced by the higher technology 'hybrid resins'.

Hybrid resins: The most technologically advanced furan resins available anywhere; this technology combines the best of all fields of furan resin chemistry. Achieving sharp crisp cures, with the operating environment in mind and at economically viable costs are the result of choosing this form of Furan NB resins.



FOUNDRY PRODUCTS: Technical Data Sheet

SAFETY MEASURES:

Resin and catalyst are to come in contact only in the presence of sand; without the sand a violent reaction takes place. Never store resins in containers that have stored catalysts or other acids and vice versa. It is recommended that the sand/catalyst/resin mixture be handled using rubber gloves to avoid loss of natural oils of the skin.

SHELF LIFE: Good for at least twelve months if not stored in direct sunlight.

** The information presented, while not guaranteed, it is to the best of our knowledge true and accurate. No warranty or guarantee, express or implied, is made regarding the performance or stability of any product, since the manner of use and conditions of storage and handling are beyond our control. No suggestions for product use are intended as and nothing herein shall be construed as a recommendation to infringe any existing patents or to violate any government laws.

