



# VYBAR 108 Polymer for the Candle Industry



VYBAR™ polymers are hyper-branched polyalphaolefins recognized worldwide for their ability to improve the total performance and value of paraffin wax candles

## Feature

- Hyperbranched structure

## Benefits

- Oil binding in paraffin waxes
- Crystal wax modifier
- Improved surface gloss
- Opacification

## Feature

- Controlled branched length

## Benefits

- Increase/decrease hardness
- Lubricity
- Mold release

VYBAR™ 108 polymer is a new innovative polymer that improves the properties of your paraffin wax candles. VYBAR 108 polymer allows you to achieve higher fragrance loads, eliminate mottling, and improve dye dispersion.

VYBAR 108 polymer can be used as an alternative to microcrystalline waxes and stearic acid.

## Typical Properties

Product	Softening Point °C	Penetration @ 25°C (dmm)	Viscosity @ 99°C (cP)
Test method	ASTM D36 (mod.)	ASTM D3236 (mod.)	ASTM D1321
VYBAR™ 108 polymer	65	6	350

## Recommended Performance and Usage Rates

VYBAR 108 polymer is typically used in paraffin waxes with melt points >55°C. This product is a common component of columns, pillars, tapers, decorative, and votive candles

Addition rates for VYBAR 108 polymer typically range from 0.50% - 2% in these applications.

## Benefits in Candle Manufacturing

- Prevents oil bleed when using high oil content waxes
- Retains fragrance in candles
- Modify the surface appearance of paraffin
- Uniform dye dispersion
- Reduction in candle surface flaws
- Increase opacity
- Achieve higher fragrance loadings

### Performance Data

VYBAR™ 108 polymer is effective at binding up to 10% fragrance oil in paraffin wax candles. Improve your scent throw, reduce surface defects, and improve surface gloss of your candles.

#### Control

- Mottling
- Semi-translucent
- Oil bleed



**Control  
No VYBAR**

**Candle with  
1% VYBAR**

#### Candle with VYBAR™

- Eliminate mottling
- Increase opacity
- Eliminate oil bleed

### Standard product form and packaging:

VYBAR 108 polymer is available in pastille form in 25KG bags

### FDA status:

Please refer to NuCera polymers FDA product guide. For more specific information, please contact your NuCera representative.

[nucerasolutions.com](http://nucerasolutions.com)

