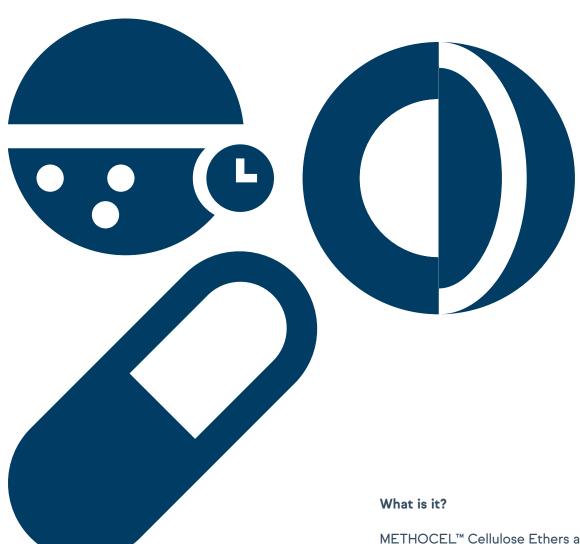
**Pharma Solutions** 

## **METHOCEL<sup>TM</sup>**

Cellulose Ethers - Products that can do it all



METHOCEL™ Cellulose Ethers are water-soluble polymers derived from cellulose. The METHOCEL™ product range encompasses methylcellulose and hydroxypropyl methylcellulose (hypromellose) – each available in different grades. They enable formulators to create reliable tablet coatings, granulation, controlled release matrix formulations and controlled viscosity in liquid formulations.

## **Product Recommendations\***

Application	Grades	Benefits
Tablet Coating	METHOCEL™ LV Premium METHOCEL™ VLV Premium	Glossy coating that is printable, hypo-allergenic, non-tacky and compatible with pigments and dyes
Hard-Shell Capsules	METHOCEL™ LV Premium	HPMC-based capsules are vegetarian (non-animal-derived) and provide good mechanical properties that enable a high-quality, robust end capsule product.
Wet Granulation	METHOCEL™ LV Premium METHOCEL™ VLV Premium	Binding and adhesive properties during granulation step of the manufacturing process for immediate-release tablets
Controlled Release Matrix Tablets	METHOCEL™ Premium METHOCEL™ Premium CR	Deliver consistent drug-release performance
Controlled Release Matrix Tablets, Direct Compression	METHOCEL™ Premium DC2	Improved flow properties, faster processing speed, consistent drug release profile

<sup>\*</sup> Examples only and not representative of a complete list of recommended products or benefits

## **Key Benefits**

- · Water- and organic-soluble: Soluble in binary organic and organic solvent/water systems
- · Film-forming: Form clear, tough, flexible films that are excellent barriers to oils and greases
- Viscosifying: Thicken both aqueous and non-aqueous systems
- · Metabolic inertness: Do not add calories to the diet
- · Thermal gelation: Gel when heated, providing controllable quick-set properties
- · Low taste and odor: Excellent (low) flavor and aroma properties
- Mucoadhesive
- Hydrophilic
- Drug solubilizer

