

# Why use an emulsifier?

## Emulsifiers - Extraction Liquids

Simply put, an emulsifier transforms the rinse water into an effective rinsing solution. Water on it's own is neither a good cleaner nor rinsing agent, mainly due to it's high surface tension and the presence of hard water salts.

- The **surface tension** of water is more than 3 times higher than oily grime.
- Water's **poor wetting** ability prevents it from penetrating into the middle of the carpet yarn.
- The **hard water salts** in water, hinder the rinse water from mixing with the prespray/soil residues.
- Because of water's high surface tension, it **dries in little droplets** instead of spreading evenly over the substrate (called sheeting). This droplet formation makes drying slower.

Dishwasher manufacturers recommend the use of a rinse aid to improve the water's rinsing properties. Rinse aids promotes quicker and even drying so the crockery is spot free. In exactly the same way an emulsifier (extraction liquid) conditions the clean water in your portable or truck mount to be a highly effective rinsing agent.

- **Emulsifiers** dramatically lower the surface tension of water.
- **Emulsifiers** enable the rinse solution to quickly penetrate deep into the carpet yarn and flush out deep set soiling.
- **Emulsifiers** emulsify the prespray/soil residues releasing them for easy rinsing
- **Emulsifiers** cause the remaining moisture to "sheet" on the fibre for faster drying.

## Prespray/Soil Residues – the primary cause of rapid resoiling

It only takes 1-2ml / Lt of emulsifier to transform water into this high performance rinsing solution. This excellent rinsing ability removes a higher quantity of emulsified soiling in a shorter space of time, leaving significantly less detergent/soil residues in the carpet which in turn dramatically reduces resoiling propensity. Professional cleaners typically comment on emulsifiers, saying:

*"Carpets are coming clean noticeably quicker"*  
*"The carpets I clean are drying approximately 20% faster"*  
*"I am getting carpets 15-20% cleaner than before"*

## Maximising cleaning, Minimising residue

