

## Parafilm® M All-Purpose Laboratory Film Specs

### Permeability

- Oxygen: (ASTM 1927-98) 150 cc/m<sup>2</sup> d at 23°C and 50% RH
- Carbon Dioxide: (Modulated IR Method) 1200 cc/m<sup>2</sup> d at 23°C and 0% RH
- Water Vapor: (ASTM F1249-01)
  - o Flat: 1 g/m<sup>2</sup> d at 38°C and 90% RH
  - o Creased: 1 g/m<sup>2</sup> d at 38°C and 90% RH

### Effects of Common Reagents

- Potassium Permanganate
  - o 5%: No apparent effect except permanent dark brown coloration in 18 hours
  - o 0.1%: Same as 5% except slightly less color
- Iodine solution (0.1N)
  - o No effect except staining brown in 18 hours
- Ethyl Alcohol (95%)
  - o No apparent effect except some face whitening in 24 hours
- No apparent effect in 24 hours:
  - o Hydrochloric Acid conc. (12N) dil. (5n)
  - o Sulphuric Acid conc. (36n) dil. (5n)
  - o Nitric Acid conc. (16n) dil. (5n)
  - o Sodium Hydroxide conc. (22%)
  - o Ammonium Hydroxide conc. (28% NH<sub>3</sub>)
  - o Salt (NaCl) solution (20%)
  - o Isopropyl Alcohol (99%)
- Not recommended for use with chlorinated, non-polar aliphatic and aromatic solvents
- Film becomes soft and sticky at about 130°F to 150°F (68°C)