

## Tape Debate: Water-Based Acrylic vs. Hot Melt Adhesive Packaging Tape

### Case:

What is the difference between ACRYLIC and HOT MELT carton sealing tape? While both tapes have their separate features and benefits, they both will work for every day general purpose carton sealing in room temperature environments. The main differences come when there are extreme temperature range environment and, very rigid corrugated flaps. Their properties are discussed below:

#### Advantages of Water Based Acrylic Carton Sealing Tape:



- 1.) Wider temperature range** (Able to be used in the freezer or hot temps) - Acrylic tape has a service temperature of -10F to 200F vs. 30F to 122F of hot melt.
- 2.) Resistant to yellowing from UV light sources** – Will not yellow when exposed to sunlight or UV sources
- 3.) Longer shelf life** – Acrylic can go years with retaining initial performance
- 4.) Seal strength improves over time** – Acrylic adhesive has properties that will absorb into the corrugated over time
- 5.) Pricing advantage** – At the time of this study, the price of acrylic compared to equal thicknesses of hot melt were more affordable

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#### Advantages of Hot Melt Carton Sealing Tape:



- 1.) Great quick initial tack** – Hot melt's quick tack property helps to adhere to dirty, dusty, and soiled substrates or plastics.
- 2.) High sheer** – Hot Melt has greater sheer to allow for better use on rigid corrugated boxes as well as overstuffed/under filled boxes.
- 3.) Consistent & easy release** – The release coat used on hot melt allows for the tape to dispense with a consistent release through the entire tape length