

2006 Western Kentucky Physics Olympics

The Do-Ahead Project HAN SOLO In CARBONITE

Each team will need to create “sugar glass” to simulate the carbonite in which the provided Han Solo figurine is to be encased. Sugar glass is made by bringing a sugar, syrup, and water mixture to “Hard Crack” candy stage (310 F or 155 C), pouring it into the mold, and letting it solidify.

Materials:

- * saucepan or pot
- * Candy Thermometer
- * rectangular mini loaf pan (e.g., Durable Foil 5 5/8” x 3 3/16” x 1 15/16”, from WalMart)

Ingredients for making Sugar Glass:

- * 1/3 c. Water
- * 3 Tbs White Corn Syrup (e.g., Karo)
- * 2/3 c. Sugar

Lightly brush rectangular mini loaf pan with oil, making sure the oil does not pool.

Bring 1/2 cup of water to a boil in a 1 to 1.5 quart sauce pan.

Add 1 cup of sugar, 5 tablespoons of corn syrup. Stir until completely dissolved.

Bring to a boil at high heat.

Without stirring, continue cooking at high heat until mixture reads 310 F on candy thermometer (about 8 minutes).

Lay the Han Solo figurine into the prepared loaf pan and pour in the sugar mixture.

Put it in the refrigerator for at least 30 minutes until set.

Notes:

- * Keep it out of moist areas and direct sun; like a lollipop it will become sticky or soft.
 - * The sugar glass can have sharp edges/points when broken, be careful when handling.
- (Sugar glass recipe adapted from “You Can with Beakman: Science stuff you can do”, by Jok Church, p 61, 1992 Andrews McMeel Publishing, ISBN 0-8362-7004-5)