

Go-Bar Snack Bar Maker

Silver B



Why do we need one?

- 14% increase in US snack bar sales in 2010
- More control over ingredients for health and allergies
- 250,970 tons of snack bars consumed in the US in 2010
(Euromonitor International)

What does it do?

- Takes in solid ingredients and a binder
- Assembles them into a cereal bar
- Requirements:
 - Fast
 - Simple to operate
 - Easy to clean



What else is like it?

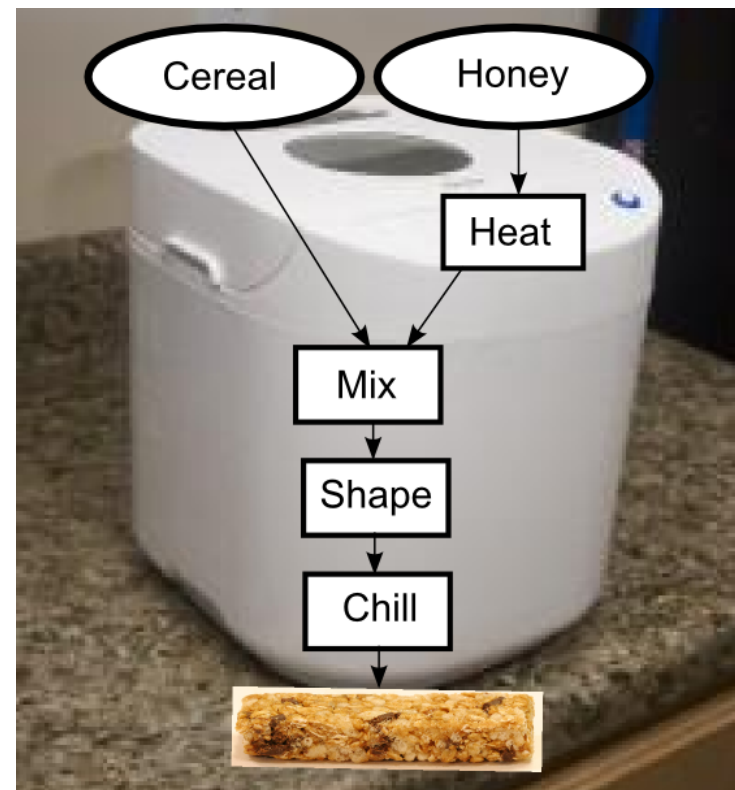


Counter space	90-120 in. ²	100-250 in. ²	170-230 in. ²	<~200 in. ²
Volume	1200-2000 in. ₃	1500-3000 in. ³	1800-3700 in. ₃	<~2500 in. ³
Price	\$25-200	\$50-250	\$30-130	<~\$150

Making Snack Bars Fast

Chilling method:

1. Heat binder (honey)
2. Mix solid ingredients with binder
3. Form into bar
4. Chill in freezer



Liquid Heater

- Heats liquid ingredients to make less viscous
- Tested thermal strip to heat honey





Mixer

- Wet and binding ingredients combined
- Experimented with horizontal and vertical mixing
- Moving parts require cleaning

Shaper

- Compress bar before chilling
- Extrusion is simpler than compacting





Chiller

- Chill mixture until solid
- Chill quickly in small volume
- Use existing freezer technology

The Future of Go-Bar

- Different recipes: ability to handle difficult ingredients
- Self cleaning: reduce the amount of work of the user

