

Caramelisation

Kitchen

Sugar's stages by temperature, and what each is used for.

Sugar cooked alone, by temperature.

Stage	Temp	Use
Thread	110°C	Syrups
Soft ball	115°C	Fudge, fondant
Firm ball	120°C	Caramels
Hard ball	125°C	Nougat, marshmallow
Soft crack	140°C	Toffee
Hard crack	150°C	Brittle, lollipops
Caramel	160–180°C	Sauce, decoration
Burnt	190°C+	Discard

Caramelisation is sugar breaking down; the Maillard reaction needs protein as well. Onions do both at once.