
Rolling Graphics: Create Graphics on the Cross Section of a Roll Cake



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Food fabrication offers a new dimension to home cooking. We see the design challenge not in automating cooking tasks, but in augmenting the tangible experience, skill building and enjoyment of baking. As an example of such augmentation, we present a novel concept for designing and fabricating roll cakes with custom cross-section graphics.

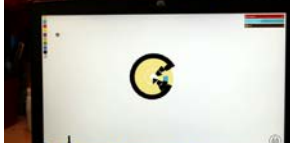
Roll cakes are made by rolling a flat piece of cake into a spiral. In our application, users draw the cross section image of their cake and we calculate a printable template as a guide to color the unrolled cake. Users mix colored batter and use a custom 3D printed nozzle to arrange the batter on the template.

After baking the batter in the oven, users simply roll it into a roll cake and magically their design is shown on the cross-section.

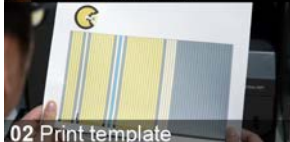
We identified and solved the key difficulties in making graphics such as a consistent layer thickness and aligning the graphics in the spiral. With Rolling Graphics, we expand the potential of food printing with custom graphics and potentially, custom tastes.

Author Keywords

Food fabrication; Roll cake; Custom food print;



01 Design graphics



02 Print template



03 Print batter with a nozzle



04 Roll the baked batter



05 Enjoy the graphic

Authors version. CHI 2018 video showcase:
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