

00479                    **Exploring Recipes to Thicken Liquid Supplements and Comparing Visual Judgement of Fluid Thickness With IDDSI Syringe Flow Test**

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**Aims:** Patients with dysphagia are often recommended thickened fluids to prevent aspiration during swallowing. Supplements vary in thickness and composition, hence thickening liquid supplements can be more challenging than thickening water. This study (1) Explored recipes to thicken a supplement that is thicker than water, and (2) Investigated the accuracy of visual judgment of fluid thickness categories (e.g. thin, nectar-thick, honey-thick), amongst speech therapists (STs).

**Methodology:** Twenty STs were instructed to prepare 100ml of Resource 2.0 vanilla supplement to nectar consistency using their own recipes. They tested the thickness of their end-product and the original supplement 3 times each using the International Dysphagia Diet Standardisation Initiative (IDDSI) Syringe Flow Test. These readings were compared with their visual perception of the fluid consistency of the original supplement. Investigators also visually judged the end-products for homogeneity.

**Result:** Syringe Flow Test showed that Resource 2.0 supplement should be classified as nectar-thick at baseline. Ninety-five percent of STs visually perceived the supplement to be thinner than it was. Seventy-five percent of STs thickened the supplement the same way they would thicken water. Eighty percent of STs added a waiting time of 10 to 30 minutes after mixing. Syringe Flow Tests on the end-products showed 45% were of target fluid consistency, while 55% were too thick. Eighty percent of the end-products were judged to be non-homogenous.

**Conclusion:** Inaccurate visual judgement could result in inaccurate thickening of supplements served to patients. An inaccurate fluid consistency could pose an aspiration risk to patients with dysphagia. Hence, an objective measurement of fluid consistency, such as the IDDSI Syringe Flow Test, is recommended instead of visual judgement. Waiting times advised by STs and the non-homogeneity of their thickened supplement also question the practicality of their recipes. It is hence necessary to explore thickening supplements differently from water.