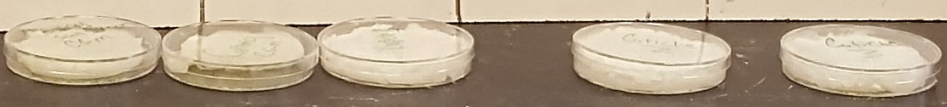


Student Presentation and Sample Examples

Cuticle Example

Mike Jones
 Colby Stewart
 Grace Hutson






Control	Sunscreen Sample	Cuticle 1	Cuticle 2	Cuticle 3
What did you add to this sample? Nothing	What did you add to this sample? We added Copperstone Kids Sunscreen.	What did you add to this sample? We added 5 more grams of Corn Starch and 5 more mL of Glycerin.	What did you add to this sample? Added 5 more grams of Corn Starch	What did you add to this sample? Added 5 more mL of Glycerin
Quantitative Data (Average) 6.96 lux	Quantitative Data (Average) 4.72 lux	Quantitative Data (Average) 4.28 lux	Quantitative Data (Average) 0.7 lux	Quantitative Data (Average) 0.72 lux
Qualitative Data Bright Blue	Qualitative Data Glowing	Qualitative Data Glowing	Qualitative Data It didn't glow much.	Qualitative Data NO glow!



Hair and Fur Example

Mammal hair

What are your samples suppose to represent?		
What did you add to this sample?	<u>Control</u> Quantitative 10g Cornstarch (c) 60ml water (w) 5ml vinegar (v) 5ml glycerin (g) 0.6g Phosphorescence Solid (ps)	Qualitative Brilliant Blue
What sunscreen did you add to this sample?	<u>Sunscreen Sample</u> Quantitative 10g (c) 0.6 (p.s) 60ml (w) Squirtot 5ml (v) Sunscreen 5ml (g)	Qualitative Light Blue
What did you add to this sample?	<u>Sad Sloth #1</u> Quantitative 10g (c) 0.6 (p.s) 60ml (w) 2 strands 5ml (v) of 2 in. 5ml (g) ribbon	Qualitative Slightly glowing
What did you add to this sample?	<u>Sad Sloth #2</u> Quantitative 10g (c) 0.6 (p.s) 60ml (w) 1/2 in. of 5ml (v) string 5ml (g)	Qualitative Very bright
What did you add to this sample?	<u>Sad Sloth #3</u> Quantitative 10g (c) 0.6 (p.s) 60ml (w) 2 in of 5ml (v) string 5ml (g)	Qualitative Sky blue

Scales Example

Macayla
Cassidy
Courtney

Scales

reptiles and fish

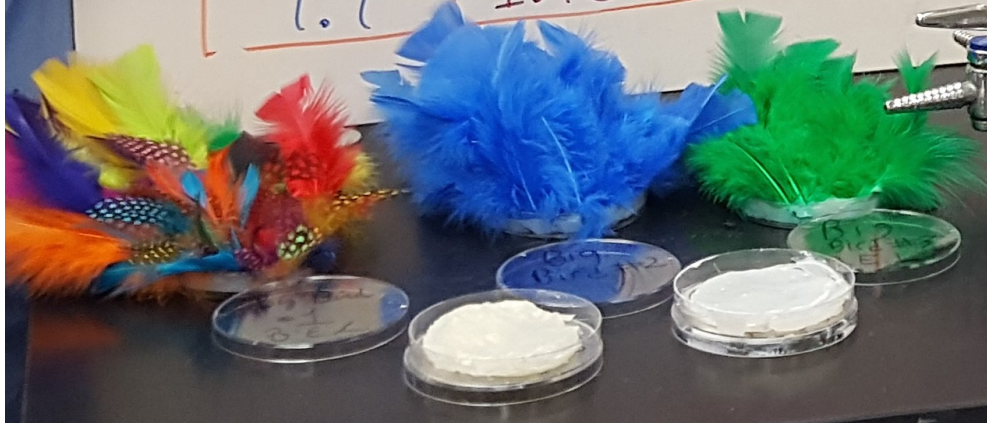



Control	Sunscreen Sample	Sample 1	Sample 2	Sample 3
Nothing	-Babyganics: mineral-based sunscreen, broad spectrum SPF 50+	-30 acrylic nails -same sizes	-about 50 acrylic nails -different sizes	-19 acrylic nails -different sizes
8.4 lux	1.34 lux	3.2 lux	3.26 lux	4.16 lux
glowing	still glowing	still glowing	still glowing	still glowing

Feather Example

Ethan
Brooklyn
Logan
Jasmin

Big Bird

Control	Sunscreen	Big Bird 1	Big Bird 2	Big Bird 3
Added this to show the difference between the 2 variables	<ul style="list-style-type: none"> • Used babygains SpF 50+ • Water Resistant (80min) 	<ul style="list-style-type: none"> • Added 52 Feathers • All shapes & sizes • All colors 	<ul style="list-style-type: none"> • Added 36 Feathers • Blue Feathers 	<ul style="list-style-type: none"> • Added 18 Feathers • Green Feathers
7.7	1.75	1.75	2	3.25

Protein Powder Example

Protein Powder's Effect on UV Intake


Control	Sunscreen Sample	Sample #1	Sample #2	Sample #3
What did you add to Sample?	What sunscreen did you add to this Sample?	What did you add to this Sample?	What did you add to this Sample?	What did you add to this Sample?
10g Corn starch 5ml vinegar 5ml glycerin 60ml water 0.6g phosphorescence solid	10g corn starch 5ml vinegar 5ml glycerin 60ml water 0.6 phosphorescence solid Coppertone Sunscreen	10g corn starch 5ml vinegar 5ml glycerin 60ml water 0.6g phosphorescence solid 10g protein powder	10g corn starch 5ml vinegar 5ml glycerin 60ml water 0.6g phosphorescence solid 5g protein powder	10g corn starch 5ml vinegar 5ml glycerin 60ml water 0.6g phosphorescence solid 8g protein powder
Qualitative	Qualitative	Qualitative	Qualitative	Qualitative
- White - Sticky - Smooth on top	- oily - clear	- tan - Hard - Smooth	- tan - Hard - Smooth	- Tan - Hard - Smooth
Quantitative	Quantitative	Quantitative	Quantitative	Quantitative
6.7, 5.7, 6.7, 4.6, 4.3, <u>6.52</u>	5.5, 5.5, 5.5, 5	.4, .6, .6 6, .6, .6	.6, .9, .7, .8, .7	.5, .5, .5, .6, .6

Melanin Example

Melanin

Presentation, Julee, Taylor, Brian

Control	Sunscreen Samp.	Sample 1.	Sample 2.	Sample 3.
• What did we add? 10 grams corn starch 5 ml vinegar 5 ml glycerin 1 ml water <small>0.6 grams Phorbol myristate 13-acetate</small>	What sunscreen did you add to this sample? Banana Boat SPF 50+	What did you add to this sample? 5 drops of yellow food coloring	What did you add to this sample? 3 drops of yellow food coloring	What did we add to this sample? Add 10 drops of yellow food coloring
Quantitative data .5, .5, .6, .6, .5, .5 = .5	Quantitative Data .6, .5, .5, .5, .5 = .5	Quantitative data .8, .7, .6, .8, .7 = .75	Quantitative Data .8, .8, .8, .8, .7 = .74	Quantitative Data .7, .7, .7, .7, .7 = .7
Qualitative White color, glob, squishy	Qualitative Data White, harder than control, glob	Qualitative yellow, squishier than first two	Qualitative Data light yellow, squishy	Qualitative Data Dark yellow, soft



Structural Coloration Example

Katelyn
 Angel
 Emily

Control	Sunscreen Sample	Sample 1	Sample 2	Sample 3
Nothing	Coppertone babies Sunscreen Spray	1 gram of glitter before heating	1 gram of glitter after heating	2 grams of glitter after heating
5.14 lux	5.82 lux	2.12 lux	.74 lux	.72 lux
glows all the way through	a little bit of glow	tiny bit of glow	Barely a glow	faint glow