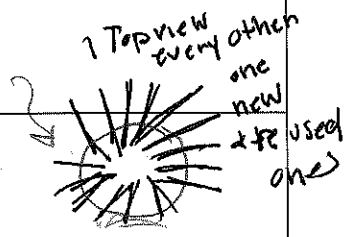
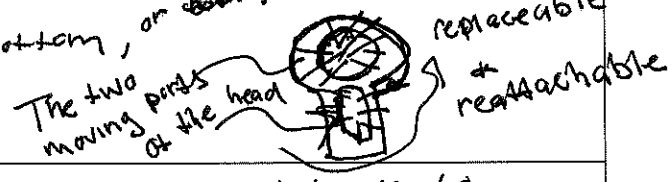
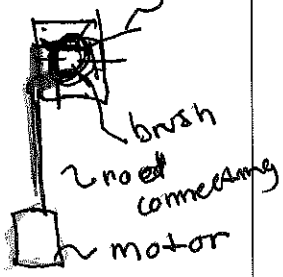
Team 5

Student Name Denise Babilya

	Brush Head Design (form and function)
Concept 1	Recycle the brush heads, after each head is used have a place they can be sent to where the brush heads can be taken apart, the bristles be washed all together and then reserwenin together, if the bristles are too worn done, combine half of the new with half of the old ones, rotating there placement so that it is a combinistion of old + new bristles 
Concept 2	~The head should have two moving parts, one going back & forth, the other in a circular motion, we could make these parts ~~re~~attachable so that the user chooses if he wants the back & forth movent on top or bottom, or ~~both~~ just one motion 
Concept 3	• If reattachable brushes instated, we would have to Make sure there is almost a "magnet" ~or wire on the bottom of the attachable part which would connect to a rod that connects to the motor.  ~ Brush connects through the head down to the motor
Concept 4	~To make the head of the brush longer lasting, market a Special soap solution designed specifically for washing and "reenergizing" the brush head bristles so that they don't need replaced as often.

Student Name _____

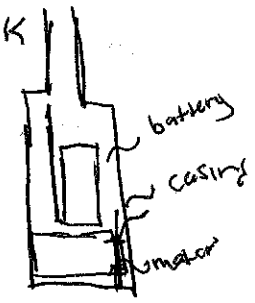
	Brush Head Design (form and function)
Concept 5	~ For the brush head plastic part, use plastic from recycled water bottles ~~And~~
Concept 6	~ Also use plastic for the head from the older heads so to reuse the materials.
Concept 7	~ ~ make sure the bristles are placed at every possible place on the head, especialy around the edges to save plastic.
Concept 8	

Student Name Denise Babilya

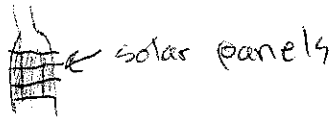
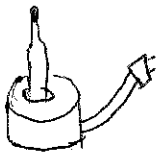
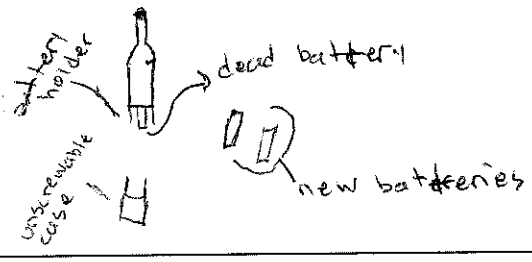
Team 5

	Human Factors Body Design (form)
Concept 1	✓ Recycled plastic can be used plastic from water/soda bottles to make the body of the toothbrush ~ or you could use plasic from recycled yogurt cups in making of the body ~ ~~body~~ recycled ~ all plastic used
Concept 2	✓ To make a nice grip for a handle, ~~to~~ use, recycled Styrofoam ~~to~~ as the grip part of the handle lines where ~~handle would~~ hand would grip, used from Styrofoam = comfortable & sustainable.
Concept 3	✓ Plastic only be used from, quality recycled plastic, none that has or had previous issues because durability is very important.
Concept 4	The plastic should also be thick & durable, even though we want it to be sustainable, we cannot have the plastic being thin & easily breakable because durability is more important. We don't want the toothbrush breaking so the plastic should be thick & durable snap

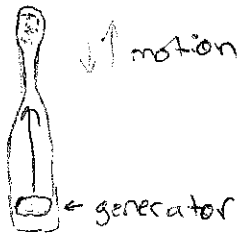
Student Name _____

	Human Factors Body Design (form)
Concept 5	Concerning sustainabity, another possible part the body could be made from is cellvose. (on line read that some toothbrushes made from that)
Concept 6	~ To save the use of some plastic, we could shorten the length of the toothbrush, this would save the amount of plastic used and reduce the cost.
Concept 7	~ Make the casing very form fitting to the battery, non motor ~~were~~ that would be as thick as the casing needed to be, this would cut down on use of plastic + the cost of plastic 
Concept 8	~ put the styrofoam grip casing over a thin layer of plastic ~ so to save money spent on plastic there, the styrofoam would have the same "casing function as the plastic".

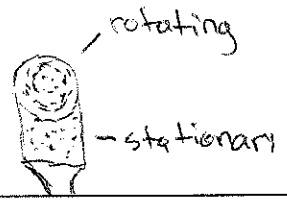
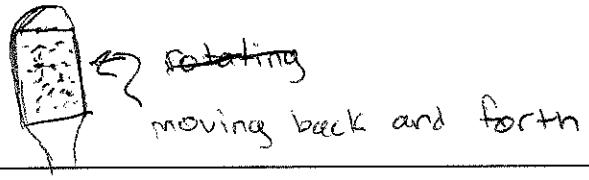
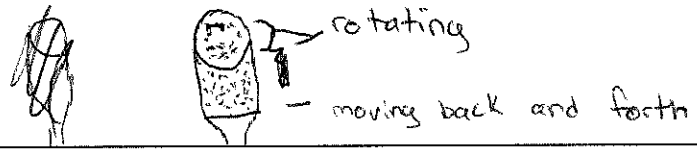
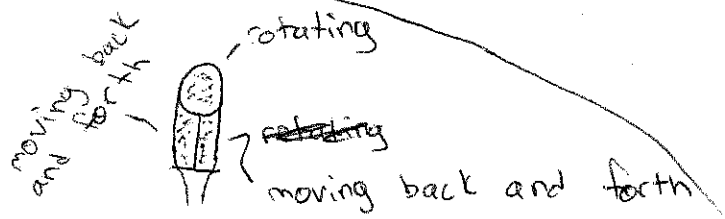
Student Name Paul Omelko

	Power generation and power accessories (function)
Concept 1	solar powered - have mini solar panals attached to the back of the toothbrush body. 
Concept 2	rechargable battery - use a rechargable battery as its power ~~sorce~~ source, having it placed in a charging dock 
Concept 3	replacable batteries - use replacable batteries 
Concept 4	plug-in - the toothbrush plugs in directly into the wall

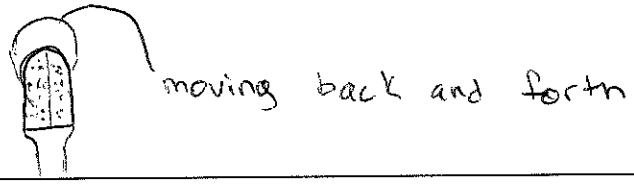
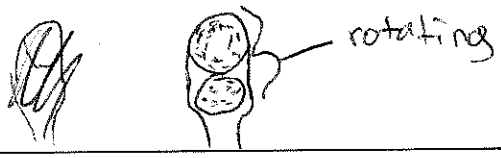
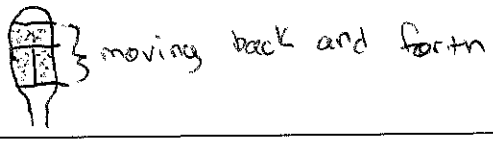
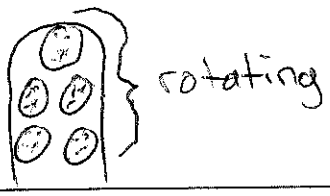
Student Name _____

	Power generation and power accessories (function)
Concept 5	- mechanically powered - the motion cause by the ~~to~~ rushing powers a mini generator and that powers the head 
Concept 6	
Concept 7	
Concept 8	

Student Name Paul Omelko

	Brush Head Design (form and function)
Concept 1	1 moving circular head and 1 stationary head - the moving circular part will be at the top and the stationary part will be rectangular and right below the circular head 
Concept 2	1 moving linear head - the moving linear head will be at the top and have a rectangular body 
Concept 3	1 moving circular head and 1 moving linear head - circular head will be on top with the linear moving head right below it. 
Concept 4	1 moving circular head and 2 moving linear heads - moving circular head on ~~top~~ top and two linear moving heads below it 

Student Name _____

	Brush Head Design (form and function)
Concept 5	2 moving linear heads - two linear heads placed side by side 
Concept 6	2 moving circular heads - two circular, moving heads one on top and one on the bottom 
Concept 7	3 linear moving heads - ~~have~~ one linear moving head on top and two below it, side-by-side 
Concept 8	multiple moving circular heads - have about 4 or 5 moving circular heads 

Student Name Michael Proscia

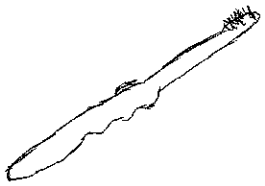
Human Factors Body Design (form)

Concept 1

- Quite a few people wanted a slim but weighty toothbrush. If we cut the amount of plastic and streamline we can get that slim look and the weight will come from the motor inside and battery

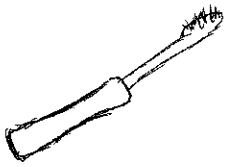
Concept 2

- Grip holds were considered appealing during surveys so including them would be helpful and reduce the used of plastic



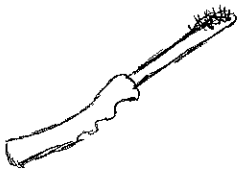
Concept 3

- For those who do not like the soft ~~grip~~ edges of the more streamlined toothbrush a squarer look could be better. We can slightly curve the main body in order to provide grip and conserve plastic

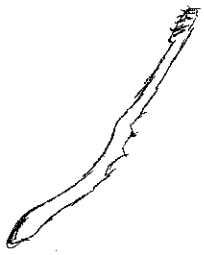


Concept 4

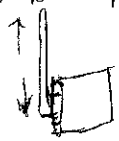
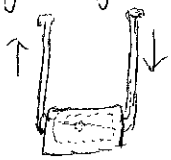
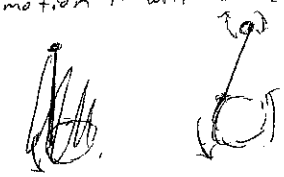
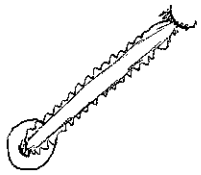
- Similar in ~~design~~ design to concept 3 however this includes grips instead of just the curved body.



Student Name _____

	Human Factors Body Design (form)
Concept 5	– a banana shape handle with grips 
Concept 6	
Concept 7	
Concept 8	

Student Name Michael Proscia

	Energy mechanism for brush head (function)
Concept 1	- Instead of the side to side motion of the original, I want to create a motor with an up and down motion. I feel that this will save energy in the whole brush because with the side to side motion energy must be used in order to stop the metal rod and redirect it. With this new motion when the rod bottoms out the motion stops and could go right back up. 
Concept 2	- Similar to the first design except instead of one rod there are two that can go into either side of the brush head and lock in. When one side goes up it will force the other side down and it will repeat. This will give that half circle motion that many desire and should be a relatively easy mechanism to make. 
Concept 3	- This design will allow for a full circular motion of a brush head and a side to side motion in another ~~accessory~~ motion for the head. The rod will be connected to a mechanism similar to a train wheel and will be locked into a part of the circle part of a brush head. As the rod goes in motion it will move each head. This is similar to a train wheel 
Concept 4	~~- have a type of connecting pice connected to~~ - have a giant gear be attached to a motor and connect with a gear in the head in order to make the motion of the brush head occur 

Student Name _____

	Energy mechanism for brush head (function)
Concept 5	
Concept 6	
Concept 7	
Concept 8	

Student Name Sean Ging

	Power generation and power accessories (function)
Concept 1	- Replacable battery - unscrew bottom - two batteries for longer lasting use - not as sustainable as rechargable
Concept 2	- Rechargable with plug into wall - connects to brush with port on bottom of brush - one hour charge - 2 week use
Concept 3	- Rechargable with built in battery supply (no need to be charged) - battery powers motor - light on brush indicates when battery is running low and needs charged
Concept 4	- Recharging station - dock for brush to be placed on when not in use - shuts off automatically when brush is fully charged so no power is wasted

Student Name _____

	Power generation and power accessories (function)
Concept 5	- small calcular sized solar panel to assist in recharging
Concept 6	
Concept 7	
Concept 8	

Student Name Sean Ging

	Energy mechanism for brush head (function)
Concept 1	- Motor in middle of brush vibrates metal rod moving brush head - similar to example brush
Concept 2	- motor oscillates metal rod connected to brush head - moves brush head up and down - top part of head moves in circular motion back and forth
Concept 3	- one circular brush head - connected to oscillating rod - full circular motion
Concept 4	- circular motion of motor - vibrates brush head directly - can be incorporated with any type of head

Student Name _____

	Energy mechanism for brush head (function)
Concept 5	
Concept 6	
Concept 7	
Concept 8	