This is such a beautiful place, Scorpion! We are so fortunate to live in this watershed!

Watershed? I thought we lived in Lynchburg!!

This is Lynchburg, Scorpion! A watershed is an area over which surface water flows to a collection place, like a creek, pond, river, or ocean.

Wow! I never knew that Virginia had watersheds!

Lots of things shed water, like an umbrella! But a watershed actually catches water! Watersheds catch rain and snowfall and channel them into streams, creeks and rivers.

This map shows the Chesapeake Bay and its watershed, which includes 6 states! The bay receives about half its water volume from the Atlantic Ocean and the rest from more than 100,000 streams and rivers.

We should be careful with rivers, streams and lakes. They carry everything to the Chesapeake Bay!
I love this lake! It's an awesome place to have some fun!

I'm glad you like it, Scorpion. Lakes play a very important part in our ecology!

Ecology? I don't think I know that word! I remember that the root word "ology" means the study of something!

That's correct, Scorpion! And the prefix "ecos" means life so it is the study of living things and their environment! A lake is part of the watershed that we have been learning about.

A lake is a large body of water contained within a body of land. Most lakes on earth are fresh water. Most lakes have a natural outflow in the form of a river or stream. This is how the lake is connected to the watershed!

Many lakes are manmade. This means that they are constructed for hydro-electric power supply, recreational uses, agricultural use or to supply drinking water to homes and businesses. This lake is an example of such a lake!

Wow! The watershed really does have connections!

Lakes are more than fun and games!
A reservoir refers to an artificial lake. The water is stored for various uses. Many times it is used to provide drinking water to nearby communities.

I get it ... the water is "reserved" for a special use! I bet that's where the word reservoir comes from!

Reservoirs are created by building a very sturdy dam. This dam is usually made out of cement, earth, rock, or a mixture of all. Once the dam is completed, a stream is allowed to flow behind it and eventually fill it to capacity. Reservoirs can come in a wide variety of shapes and sizes and can either be natural or manmade.

It sure takes a lot of work for a glass of water!

See how well lakes provide for us Scorpy? Let's learn more about the watershed in Virginia!

I sure have enjoyed lakes and reservoirs! I can't wait for more!
Hey! I'm standing in water here! Who turned on the hose??

No one turned on the hose, Scorpy. You are seeing firsthand another part of the watershed. You're standing in groundwater. Groundwater is water that is found inside the ground. It comes from rain, snow, sleet, and hail that soaks into the ground.

I have really liked learning about watersheds but it's nice to get away from the water for a while and get back on dry land!

So you think you're on dry land, huh? Let's try a little experiment, Scorpy.

After the precipitation soaks into the ground it reaches the saturated zone. And the top of this zone is the water table. The water table can be near the ground's surface or hundreds of feet below!

Remember this summer when you dug a hole in the sand at the beach? As you were digging, water filled up the hole! That was groundwater. The water in lakes, rivers, and oceans is called "surface water" because it's on the surface. If it's below the surface, it's called "groundwater."

That makes sense! The top of the saturated zone is the table... and tables have tops!

Wow! I thought I was just playing in the sand! I had no idea that I was discovering groundwater!
BOY, IS IT NICE TO RELAX A BIT BY THE RIVER! LEARNING ABOUT WATERSHEDS HAS BEEN A LOT OF WORK!

YES, IT HAS BEEN SCORPY, BUT WE'RE NOT QUITE DONE YET! RIVERS ARE ANOTHER VERY IMPORTANT PART OF WATERSHEDS HERE IN VIRGINIA.

A RIVER IS FRESH WATER THAT FLOWS ACROSS THE SURFACE OF THE LAND. IT FLOWS IN A "CHANNEL." THE BOTTOM OF THE CHANNEL IS CALLED THE "BED" AND THE SIDES OF THE CHANNEL ARE CALLED "BANKS." A RIVER FLOWS TOWARD ANOTHER RIVER, AN OCEAN, A LAKE, OR ANOTHER LARGE BODY OF WATER SUCH AS THE OCEAN.

OR EVEN THE CHESAPEAKE BAY!!!

A RIVER'S SOURCE OF WATER MAY BE RAINFALL, MELTING SNOW, A SPRING, OR THE OVERFLOW OF A LAKE. STREAMS THAT FLOW AT A RIVER SOURCE ARE THE HEADWATERS AND ARE THE RIVER'S HIGHEST ELEVATION. MOST RIVER HEADWATERS BEGIN IN HILLS OR MOUNTAINS, BUT AS THE RIVER FLOWS DOWNSTREAM, IT GAINS MORE WATER FROM OTHER STREAMS, RIVERS, SPRINGS, ADDED RAINFALL AND OTHER WATER SOURCES.

SO THAT'S WHY RIVERS ARE LARGER ... WATER IS ADDED TO THEM AS THEY FLOW DOWNSTREAM!!

RIVERS HAVE ALWAYS BEEN IMPORTANT FOR TRAVEL, TRANSPORTATION, AND TRADE ROUTES. MOST EARLY SETTLEMENTS WERE BUILT ALONG MAJOR RIVERS. FARMERS USE RIVERS TO IRRIGATE CROPS AND PROVIDE WATER FOR THEIR LIVESTOCK. INDUSTRIES USE WATER TO POWER THEIR MACHINES.

RIVERS ARE REALLY IMPORTANT FOR SURE! I AM GLAD TO LEARN ABOUT WATERSHEDS! I GUESS YOU "SHED" SOME LIGHT ON THEM FOR ME!