Making a Brochure

Length of activity: 1 or 2 - 90 minute classes

Teacher: Jon Chandler, Halifax County High School

Lesson Objectives

Students will be able to:

Synthesize information concisely

Design a brochure that is informative and aesthetically pleasing

By designing their own brochure students will need to highlight the important characteristics of the projects or problems they complete and provide concise text and images to convey their message.

I provide students with a printout of information that is related to the big topic that will be the focus of the brochure. On the printout, there is more information than they could possibility fit on the brochure. The students will have to decide what is important and what is not. You could have students do their own research. I would anticipate needing an extra class to give them time to collect the information they need.

I also provide each student or pair of students a print out with images and logos that are relevant to the brochure topic. Just as with the text driven information, far too many images are given to the students.

Students begin working on organizing the text and images. Have students fold a blank sheet of paper into thirds to make the tri-fold template. This will make six panels. Students should design each panel to cover an important sub-topic, include pictures and use white space as appropriate. Remember one panel is the front cover and another is the back. Students should keep this in mind as they are designing the information they include on the brochure.

I like to do this "old school" with the copy and paste method because it makes students stop and think about what they can fit on the space they have rather than cutting and pasting it quickly on the computer.

Materials Resources

Paper Grading rubric

Printed miscellaneous pictures Peer review rubric

Printout of information related to topic Tri-fold template

Sample (professional) brochures Example of Excessive Info

Sample Brochures

Getting Your Brochure Started

Choose a brochure design (We will use a tri-fold design)

3-6 important sub-topics:		
1.		
2.		
3.		
4.		
5.		
6.		
Designing the brochure:		
Title		
Pictures		
Format and Layout of text		
Front and Back covers		

The big topic to cover:

Research the topic

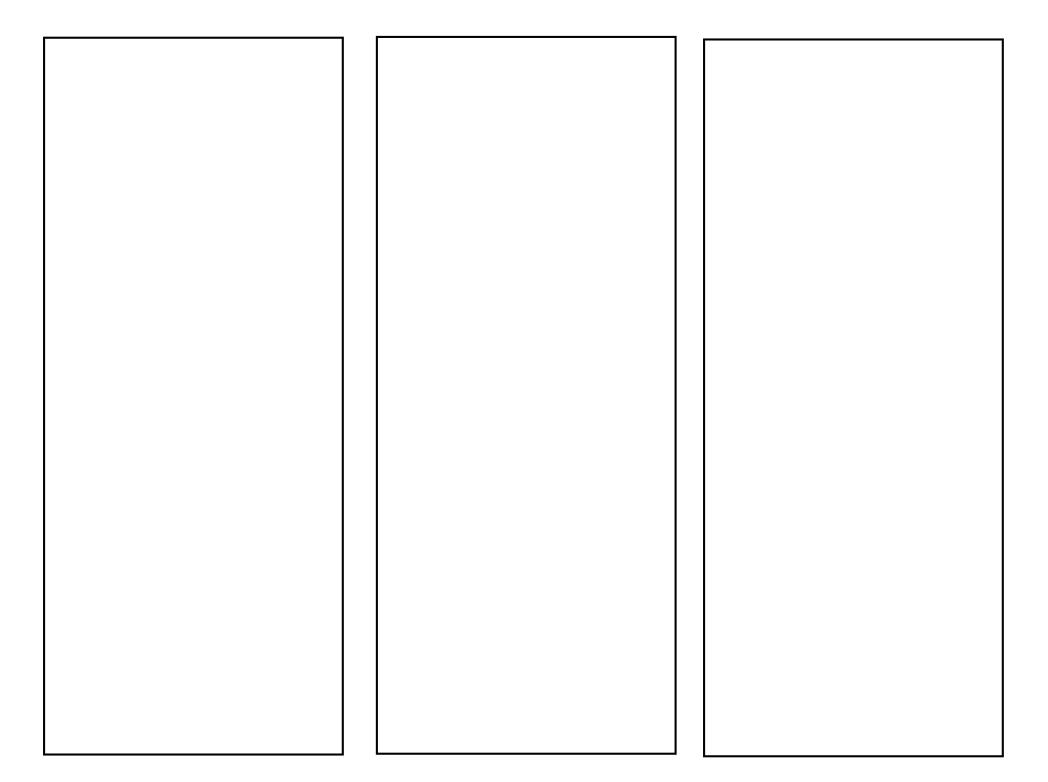
Brochure Rubric

Group:	Is the topic covered well? (5 points)	
Is the brochure appealing? (5 points)		
Are the images appropriate?	Are all sub-topics covered?	
Are the images sized well?	Is there enough information?	
Is text large enough to read?	Is text grammatically correct?	
Group:	Class:	
Is the brochure appealing? (5 points)	Is the topic covered well? (5 points)	
Are the images appropriate?	Are all sub-topics covered?	
Are the images sized well?	Is there enough information?	
Is text large enough to read?	Is text grammatically correct?	
Group:	Class:	
Is the brochure appealing? (5 points)	Is the topic covered well? (5 points)	
Are the images appropriate?	Are all sub-topics covered?	
Are the images sized well?	Is there enough information?	
Is text large enough to read?	Is text grammatically correct?	
Group:	Class:	
Is the brochure appealing? (5 points)	Is the topic covered well? (5 points)	
Are the images appropriate?	Are all sub-topics covered?	
Are the images sized well?	Is there enough information?	
Is text large enough to read?	Is text grammatically correct?	

Peer Review Rubric

Complete a rubric for each brochure and provide at least one thing you like best about the brochure and one thing that could be improved. When you have reviewed each brochure, rank them from your favorite to your least favorite by numbering the margin beside the title.

Is the brochure appealing? (5 points) Are the images appropriate?	Is the topic covered well? (5 points) Are all sub-topics covered? Is there enough information?	
Is text large enough to read?		
Brochure Title:		Points:
Favorites:	Improvement: _	
Brochure Title:		Points:
Favorites:	Improvement: _	
Brochure Title:		Points:
Favorites:	Improvement:	
Brochure Title:		Points:
Favorites:	Improvement:	
Brochure Title:		Points:
Favorites:	Improvement:	
Brochure Title:		Points:
Favorites:	Improvement:	



Example of the excessive information I give the students:

PERMEABLE PAVERS OVERVIEW

Permeable pavers are one of the most environmentally friendly paving solutions that are available to builders, landscaping contractors, engineers, and property owners. They are available in three types, namely: grass, interlocking concrete, and porous concrete. These paver types provide different benefits and are applied in various outdoor areas in public, private, and commercial properties.

Grass pavers allow water to drain through their hollow centers and enrich the soil underneath. They are also very decorative and can make for a truly verdant and pleasant driveway or patio. Porous concrete pavers, on the other hand, have pores all over where water is channeled through and help conserve good quality water.

Meanwhile, interlocking concrete permeable pavers work pretty much like grass pavers in the sense that they also have a void, which can be filled with soil and vegetation. They also allow water to seep straight into the soil and not into waterways where they can bring pollutants that can degrade water quality.

Permeable pavers have been gaining popularity because of their proven benefits such as reduced installation costs, increased water quality, decreased storm water runoff, and prevention of soil erosion and flooding. The various applications also mean that it's possible to use them not only in one specific outdoor area but in several areas in a property. They also eliminate the need to install costly retention and drainage systems, while at the same time help property owners save on pricey compliance regulations.

All of these great benefits ultimately make permeable pavers among the most preferred paving options in use today.

PERMEABLE PAVERS APPLICATIONS

Permeable pavers are carefully laid piece by piece after proper site preparation, which includes excavating the area and then installing a layer of gravel. Once the gravel surface is done, a Geotextile fabric is then laid over the surface and then poured with a layer of sand. Afterwards, the paver units are installed by hand or using special machinery. The holes or voids will be filled with washed gravel, sand, pea gravel, or soil to finish the process.

Accordingly, pervious or permeable pavers are commonly used or applied in the following areas:

- Parking lots (public, private, and commercial)
- Residential and commercial garages
- Public parks
- Playgrounds (commercial and residential)
- Public, private, and commercial gardens
- Pedestrian paths
- Walkways
- Commercial and residential driveways
- Fire lanes
- Patios (public, private, and commercial)
- Golf cart lanes
- Boat parking areas
- Emergency access lanes

All of these applications just show how versatile and beneficial pervious pavers can be to property owners and contractors alike. However, it is vital to note that entrusting the installation to professionals is tantamount to ensuring years of service from the various paved surfaces where such paver types will be used.

PERMEABLE PAVERS PHOTOS

Browse our gallery to see photos of the various applications of permeable pavers in commercial and residential properties. These photos will also give you ideas on how these pavers can be used in your own property.







Photo 5



Photo 7



Photo 2



Photo 4



Photo 6



Photo 8



Photo Description:
Permeable Pavers

Note: Click on the thumbnail images to see the larger sized photos.

RESOURCES

Below is a list of Permeable Pavers Resources throughout the United States.

.: Manufacturers of Permeable Pavers:

Find Permeable Pavers Manufacturers in the USA »

.: Suppliers of Permeable Pavers:

Find local Permeable Pavers Dealers in your area »

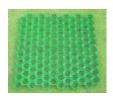
PERMEABLE PAVERS COME IN SEVERAL TYPES OF MATERIALS

About Permeable or Pervious Pavers

When it rains, water hits a road or a pavement that is not permeable and will automatically flow downwards to a low point, normally a drain of some type. Then this water is transported through pipes and flows into rivers, streams and channels. After heavy storms and rainfall, the water will flow through the channels at amazing speeds and will in turn take with them a lot of sediment, pollutants, chemicals and oils into our catchment areas.



High speeds of water flow will also increase the risk of flooding, erosion and perhaps even damages to the natural environment. The consequences are serious for both human beings and our natural flora and fauna. Storm water runoff can cause grave environmental problems.



If more and more homeowners, contractors, builders, designers and architects were to use Permeable Pavers for their driveways, street pavements, public grounds, parks and parking lots, then we could help protect our precious natural resources, such as water, the natural environment and all the flora and fauna that go into it.

DIFFERENT TYPES OF PERMEABLE PAVING SURFACES

When choosing the types of permeable paver that's best for your particular application, there are a few things to consider, like what the area will be used for and how you want the overall appearance to look.

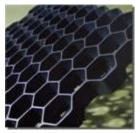
Mulches

Mulches are good for areas that will not be used very much at all. They are a good pervious material and are cost effective and readily available, they are also extremely easy to install and do not require the help of a professional. You can purchase mulches such as; pebbles, barks, gravel or sod, it's up to you.



They are also available in a wide range of colors, so there is something for all individual tastes. Mulches do however require regular maintenance and you will also have to top up their levels quite often.

Grass Pavers



Grass Pavers are becoming very popular, for they have great permeable qualities. They are made with voids on the pavers, which is where once installed, grass or vegetation is planted inside and allowed to grow through it. The pavers themselves can be made from plastic, concrete or gravel, and can be used in high traffic areas. They allow grass to grow where it would normally not be a possibility.

Interlocking Concrete Pavers

There are a range of Interlocking Concrete Pavers that are also Permeable Pavers. These are made to resemble a type of grid, where each paver interlocks into each other but has a void or a hole in the surface. This is where it is possible to plant vegetation or fill it with other pervious materials like gravel or mulches. These voids allow for the filtration of rainwater back into the sub-soils, rather than in our waterways.



INSTALLING PAVERS OVERVIEW

Aside from choosing the design for your property improvement project using different pavers, you should also know how to properly install them (should you wish to do it DIY style). As it is, installing pavers can be quite an enjoyable and fun activity that you can do with your family or friends. But DIY or not, these are the steps that should be observed when installing paver materials:

- Plan or layout the paved area It's key to first have a graphic idea of your work area. Make a rough sketch
 of the area where you will lay the pavers, taking into careful consideration the space that the driveway,
 garden, and other features will occupy. Then, layout the area by using wood, hose, and other markings.
 Make sure that the area will have a gradient or slope to prevent ponding or pooling.
- Calculate the needed pavers Simply measure the length and the width of the area to be covered; then multiply the length and the width to get the total square meters or square feet of pavers that you have to buy. Add about 5-10 percent to the total to compensate for the pavers that would have to be cut.
- Excavate Dig down the area where you'll place the pavers. Make sure to go down one inch every 4 feet to create the slope or gradient that you need. Use a compacting machine to compact the excavated area.
- Lay the base materials You may use gravel, limestone, or crushed stone. The thickness depends on your soil if it's clay, the base materials should be thicker.
- *Place edgings* Edgings keep the pavers in position and prevent them from separating from one another. You may use steel, precast concrete, or plastic.
- Apply the sand bedding The sand bedding will be the material where the pavers will be set into. Make sure to apply just the right amount of sand so that the pavers will not sink into the base material.

- Lay down the pavers Carefully lay the pavers down according to your desired pattern. You can choose
 from basket weave, fan, herringbone, running bond, and other unique patterns. Make sure to follow the
 manufacturer's guide when installing pavers. After setting them properly, use a mechanical compactor to
 help establish a nice joint with the sand bedding.
- Fill up joints with sand Use dry, fine-grained sand to fill up the joints.

Seal the paver surface – Apply a sealing agent over the entire paved surface so that you'll have an easy time cleaning it. It will also keep the pavers' appearance looking great even after several years, as well as protect the surface against skid marks, grease, grime, moss, algae, and oil.

BENEFITS OF CLAY BRICK PAVERS

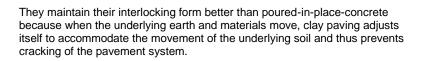


There are many benefits inherent for each different type of paver material. This page addresses the benefits of clay brick pavers only. The other types of materials have their own unique benefits which are discussed on other pages within www.PaverSearch.com.

Durability and Strength

Clay brick pavers have an ability to withstand an extremely high level of loading and are suited to many different types of landscaping applications, such as, pedestrian walkways, vehicle driveway accesses within residential, commercial and municipal construction projects.

Flexible Integrity





Long Term Cost Benefits

Clay paving provides an easy repair and recycle solution. If they ever become damaged or stained, it is simply a matter of lifting off the damaged paver and replacing it with a new one. Just like replacing a small piece of a jigsaw puzzle. Therefore, the overall maintenance and replacement cost is significantly lower than other forms of paving materials, such as asphalt.

Non-Slip Surface

They are slip resistant and skid resistant due to their natural textured surface and highly abrasive characteristics. They provide an excellent solution for heavily trafficked wet areas, such as swimming pool pathways and outdoor areas. Municipal bodies use them for highways and pedestrian footpaths.

Fast Installation

Clay paving materials can be laid in any type of moderate weather condition which helps to keep the cost of installation, time management and budgeting issues in check. The installation process is relatively simple, quick and easy, so they are ready to be trafficked upon immediately after the installation process is finalized.



Environmental Responsibility

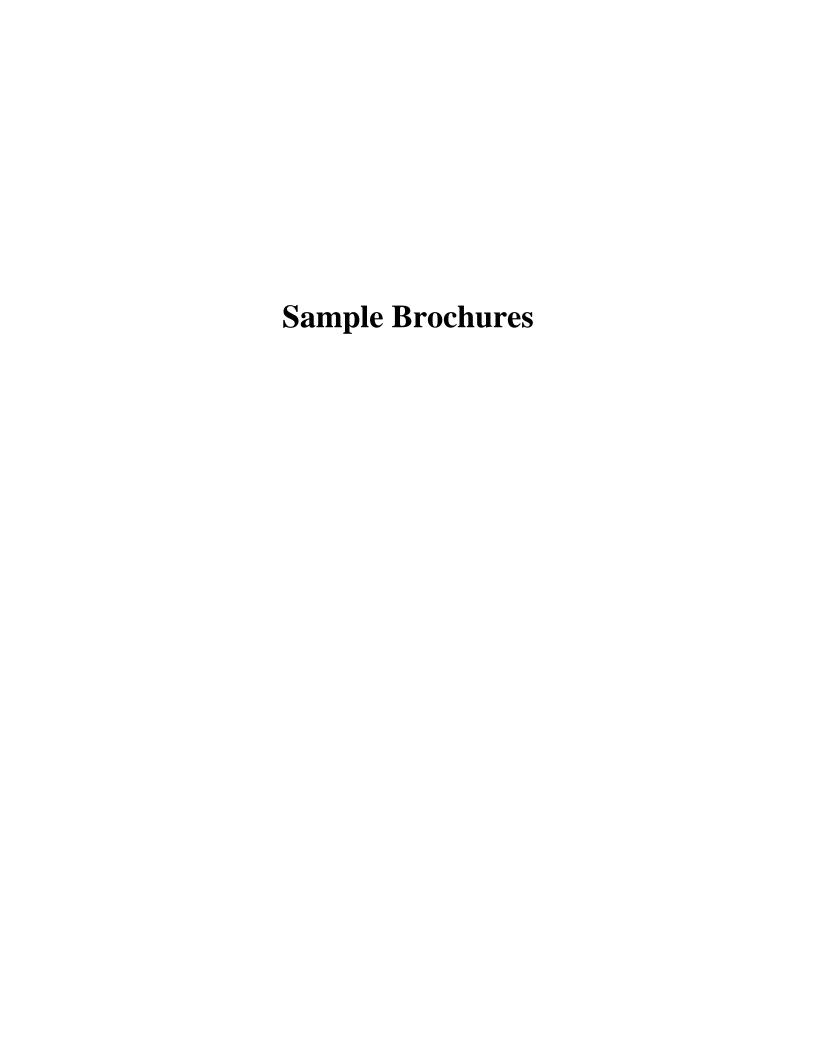
They are made from a natural clay material from the earth's soil. It will not lose any of its color or finish over the long term which means that it's a solid investment that appreciates the value of your property.

Color Integrity

They also maintain their color consistently and permanently throughout the product and will not be affected by any form of ultraviolet light. There are no problems associated with dark colors, shininess or reflective light. The beauty and rich color of clay pavers is an inherent property of clay material – color is NOT added as an artificial dye or pigment during the manufacturing process. Therefore, the integrity of the clay material is maintained and is the main reason why they will never fade over the long term.

Low Maintenance

Cleaning clay pavers is done with some detergent, water and a scrubbing brush. Most of the time they require little maintenance and can be expected to last for generations to come. There are streets in the City of Boston, United States that have been in use for 200 years.



Advantages of Grass Pavers and Turf Pavers



Environmentally Friendly

A major benefit of grass and turf pavers is that they allow the drainage of storm water back into the underground soil.

Turf and Grass Pavers Grid System

The grid system is made from plastic, and most companies' use 100% recycled plastic material in the production of the grids.

Easy Installation

The grid system requires no tools for assembly, and can simply be cut into corners. If your surface is uneven or slopping, you don't have to do a thing, the grid system will go straight on top of any surface.

Aesthetic Advantage of Grass and Turf Pavers

Grass / turf pavers have an aesthetic advantage as well. Lush green grass will continue onto the driveway for example, hence your front lawns can remain uniform, without being damaged. The grid system will enable you to protect your lawns, even when parking cars on it!

Grass / Turf Pavers Maintenance

After installation of grass / turf pavers, maintenance is very minimal.

How can you help the SVBG and the students of Halifax County







Simply contact Mr. Jon Chandler at the phone number or address below. We can utilize cash, materials, and/or equipment. All donations are tax-deductible and greatly appreciated.

1087 Bellevue Rd., Halifax, VA 24558

Tel: 434 575 2077 Fax: 434 572 2979

E-mail: djchandler@embarqmail.com

How can I get involved

Become a member of the Southern Virginia Botanical Garden and Environmental Education Center.

check us out at

www.svbg.org

Welcome To The National FFA & CSX







"LIVING TO SERVE" Green Solutions to Stormwater Runoff Permeable Paths Project

developed By

Halifax County High School FFA

hosted by



The Southern Virginia
Botanical Gardens &
Environmental Education Center

located in South Boston, Virginia

HCHS FFA Wins \$2,000 National FFA "Living to Serve" Grant

The National FFA partnered with CSX provided funds for the Living to Serve Environmental Grants. These grants are designed to support FFA chapters in implementing year-long service-learning projects that address local environmental needs.

The Halifax County High School FFA is the only FFA chapter in Virginia to be awarded a 2014-15 "Living to Serve Grant". Mr. Chandler and the Horticulture students will partner with the Halifax County Master Gardeners and the Southern Virginia Botanical Garden and Environmental Education Center to provide "Green Solutions to Stormwater Runoff". The HCHS Horticulture students will install three demonstration sections as part of the ADA wheelchair paths inside the Southern Virginia Botanical Garden. Our goal is to inform the public as to the importance of reducing stormwater runoff and demonstrate the benefits of the numerous "Green" solutions such as grass pavers, reinforced grass grid systems, and interlocking brick pavers. All of these surfaces are water permeable and prevent Stormwater Runoff.

The National FFA and CSX "Living to Serve" Grants promote "Service-Learning", a method of teaching and learning that challenges students to research, develop, and implement solutions to identified environmental needs in their school or community.

"Living to Serve" is the last line of the FFA motto and it signifies the vital role that service plays in our organization. Our "Living to Serve" project will begin in September and run through April. The HCHS FFA invites our community to visit the SVBG.

BENEFITS OF CLAY BRICK PAVERS



Durability and Strength

Clay brick pavers have an ability to withstand an extremely high level of loading and are suited to many different types of landscaping applications.

Flexible Integrity

They maintain their interlocking form better than poured-in-place-concrete.

Long Term Cost Benefits

Clay paving provides an easy repair and recycle solution. If they ever become damaged or stained, it is simply a matter of replacing it with a new one.

Non-Slip Surface

They are slip resistant and skid resistant due to their natural textured surface and highly abrasive characteristics.

Fast Installation

The installation process is relatively simple, quick and easy, so they are ready to be trafficked upon immediately after the installation.

Environmental Responsibility & Color Integrity

They are made from a natural clay material from the earth's soil. It will not lose any of its color or finish over the long term

Low Maintenance

Most of the time they require little maintenance and can be expected to last for generations to come.

INTERLOCKING CONCRETE PAVERS



Design Flexibility

The many shapes, patterns, and colors of interlocking concrete pavers allow for design creativity, as well as delineation of pavement areas.

Many Shapes and Colors

Color can be used to match a theme or for practical purposes. For example, light colored pavers offer a cooler surface around patios and pool decks.

Initial Paver Installation Cost

Generally, interlocking concrete pavers are less expensive than other types of pavement.

Paver Strength

Concrete pavers are extremely dense units which possess exceptional strength and durability.

Easy Repair and No Cracks

They can be lifted and replaced without hassle.

Maintenance

Broken pavers can be easily replaced without patches. Pavers are easy to maintain.

Winter Durability & Snow Removal

Snow can be plowed, blown or shovelled just like asphalt or concrete pavements. The chamfered (bevelled) edge of pavers will prevent you from catching an edge with the plow or shovel.

Easy Water Management

These are permeable interlocking pavers, where vegetation is planted between the grid systems.

Select no more than 6 types of plants and group them in repeating masses.



At least three of these should be evergreens. The other three should have



colored bark or some kind of texture. This gives you something to look at year round. Annuals should be used in large groups to add color. I like to buy hanging baskets. I take the hangers off and place them in the mulch around my existing plants. This





Interested in helping

The Southern Virginia
Botanical Gardens and
Environmental
Education Center

We accept donations of all types including time, money, and materials. All donations are tax deductible.

Contact Us

Located inside Edmonds Park South Boston VA

http://svbg.org/

President
Mr. Jonathan Chandler
434 575 5370
djchandler@embarqmail.com

1087 Bellevue Rd Halifax ,VA 24558





Curb Appeal

Jonathan Chandler SVBG

Five tips to improve Curb Appeal 1. PICK UP



Even the best maintained home looks bad with trash and debris laying around. Everything from junk cars to yard waste should be removed or stored properly.

2. CLEAN WHAT'S LEFT





Most people would not drive their car without washing it once in awhile. Houses are no different. They need a bath at least once a year. Pressure washing is cheap and easy to do yourself. Remember to clean windows, fences, driveways, and sidewalks.

3. PAINT



There is

nothing

like a fresh coat of paint to dress up a home's appearance. Don't forget the front door. It should be a focal point, a bright inviting color should be selected.

The first three tips are the easiest and cheapest things to do. Tips 4 and 5 may take more money and time to accomplish.

4. ADD STRUCTURE / INTEREST







Some homes have natural structural interest and some not so much. However, we can add these elements if they do not exist. Simply adding shutters to a home changes the look dramatically.

5. LANDSCAPING

This is where I feel home owners have the most trouble. Unlike painting or adding dormers there is no end to up keeping a landscape. A large well maintained landscape is a great thing if someone else is doing the maintaining.

KISS "kept it simple stupid"



Start SMALL. Nothing is worst than a landscape someone has pored tons of money into only to find out they can't keep up the

maintenance.



Select your plants wisely meaning durable,



low water and slow growing.