THE ROMAN CATHOLIC
ARCHDIOCESE OF
ATLANTA

Laudato Si' – On Care for Our Common Home

An Action Plan
for
The Roman Catholic Archdiocese of Atlanta

November 2015

The Canticle of the Sun, St. Francis of Assisi

Most high, all powerful, all good Lord!
All praise is Yours, all glory, all honor, and all blessing.

To You, alone, Most High, do they belong.
No mortal lips are worthy to pronounce Your name.

Be praised, my Lord, through all Your creatures,
especially through my lord Brother Sun,
who brings the day; and You give light through him.
And He is beautiful and radiant in all His splendor!
Of You, Most High, he bears the likeness.

Be praised, my Lord, through Sister Moon and the stars;
in the heavens You have made them bright, precious and beautiful.

Be praised, my Lord, through Brothers Wind and Air,
and clouds and storms, and all the weather,
through which You give Your creatures sustenance.

Be praised, my Lord, through Sister Water;
she is very useful, and humble, and precious, and pure.

Be praised, my Lord, through Brother Fire,
through whom You brighten the night.
He is beautiful and cheerful, and powerful and strong.

Be praised, my Lord, through our sister Mother Earth,
who feeds us and rules us, and produces various fruits with colored flowers and herbs.

Be praised, my Lord, through those who forgive for love of You;
through those who endure sickness and trial.

Happy those who endure in peace,
for by You, Most High, they will be crowned.

Be praised, my Lord, through our sister Bodily Death,
from whose embrace no living person can escape.
Woe to those who die in mortal sin!
Happy those she finds doing Your most holy will.
The second death can do no harm to them.

Praise and bless my Lord, and give thanks, and serve Him with great humility.

Contents

Acknowledgement

We wish to thank Catholic Archbishop Wilton D. Gregory for the opportunity and honor of writing this document to help Catholics and other faith communities throughout Georgia to do their part to implement Pope Francis' Encyclical *Laudato Si'*.

Introduction

On Thursday June 18, 2015, Pope Francis released his environmental encyclical, *Laudato Si''*, or "*Praised Be"* from the words of St. Francis of Assisi's *Canticle of Brother Sun."* In his encyclical, the Holy Father stated that: "*If the simple fact of being human moves people to care for the environment of which they are a part, Christians in their turn realize that their responsibility within creation, and their duty towards nature and the Creator, are an essential part of their faith."* Pope Francis urges that "*all of us can cooperate as instruments of God for the care of creation, each according to his or her own culture, experience, involvements and talents."* This will not be an easy task, however, and will require "*honesty, courage and responsibility,"* as "*humanity is called to recognize the need for changes of lifestyle, production and consumption."* But asserting that "*truly, much can be done,*" he reassures us that "*local individuals and groups can make a real difference."*

Archbishop of Atlanta Wilton D. Gregory responded to *Laudato Si'* with a letter to the Archdiocese in which he wrote *"There are no easy or facile solutions to the challenges we face to protect and preserve resources that belong to all of humanity."* He asked that all of us *"carefully review what Pope Francis says in the encyclical and more importantly to consider what each of us might do to respond to this concern which touches us all."*

In Georgia, we are blessed with abundant natural resources, varied geography, soils and biodiversity. As the largest state east of the Mississippi, it stretches from the Blue Ridge Mountains in the north, across the rolling Piedmont where metro Atlanta lies, to the farm lands of southwest Georgia, and then over the Coastal Plains to the Atlantic Ocean. The north Georgia mountains contain some of the richest biodiversity on earth. Coastal Georgia contains one-third of all the remaining salt marshes on the U.S. East Coast. Water roars over the waterfalls in Rabun County, babbles over rocky shoals in the Chattahoochee River, and meanders placidly between sand bars on the Altamaha. As *Laudato Si'* makes clear, it is our sacred duty to preserve the beauty and bounty of our local ecology for generations into the future.

The Judeo-Christian tradition of care for God's creation

In *Laudato Si'*, Pope Francis draws on his namesake, St. Francis of Assisi (1181-1226) who "whenever he would gaze at the sun, the moon or the smallest of animals, he burst into song, drawing all other creatures into his praise. Indeed, the spiritual tradition of "creation care" has run through our Roman Catholic tradition from its earliest years and begins with the Book of Genesis. The Old Testament is filled with beautiful images of nature and the revelation of God in nature. Citing the Book of Wisdom, the Holy Father observes that: "Creation is of the order of love. God's love is the fundamental moving force in all created things: "For you love all things that exist, and detest none of the things that you have made; for you would not have made anything if you had hated it" (Wis 11:24). He notes that Jesus used nature as a teaching tool many times, describing clouds, planting and harvest, floods, flowering trees, wind, and water. In the High Middle Ages, Hildegarde of Bingen, St. Francis of Assisi, St. Bonaventure, and others raised "creation spirituality" to a high form, and it was Bonaventure who referred to nature as the vestigia, or footprints, of God. Now, Pope Francis, in the face of global environmental degradation, raises the care of creation to a central part of our Catholic faith.

What this document is:

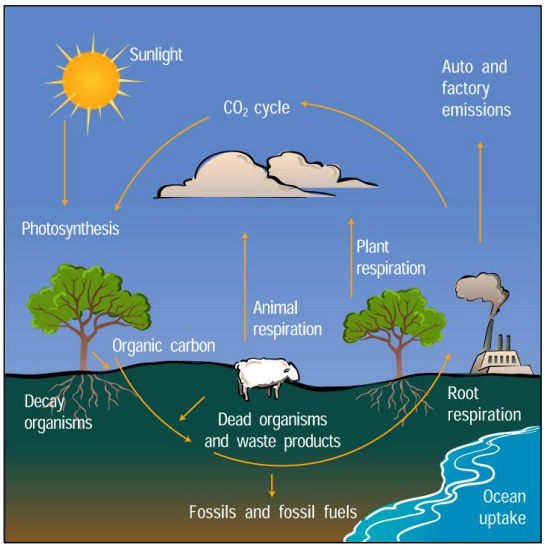
This Action Plan contains a menu of options that parishes and parishioners can take to start the difficult spiritual work of reversing the threat of global climate change and environmental degradation, and existing more sustainably in harmony with God's creation. Because there is so much variety and diversity between parishes in terms of human and financial resources, the menu of options presented here are ranked easy, moderate, and advanced. Everyone is encouraged to go as far as they can in implementing *Laudato Si'*. More importantly, all Catholics are urged by Pope Francis to seek the change of heart that is required to make these actions part of their daily lives.

This Action Plan also provides links to other resources that pastoral staff and parishioners can access to learn more and carry out the actions they select. The links consist of web pages where Catholics can drill deeper into each topic, such as finding out how to get an energy audit for your parish or home; calculating your family's carbon footprint; learning about native plants for your parish or home garden, or how to generate support for national policies that reduce greenhouse gas emissions.

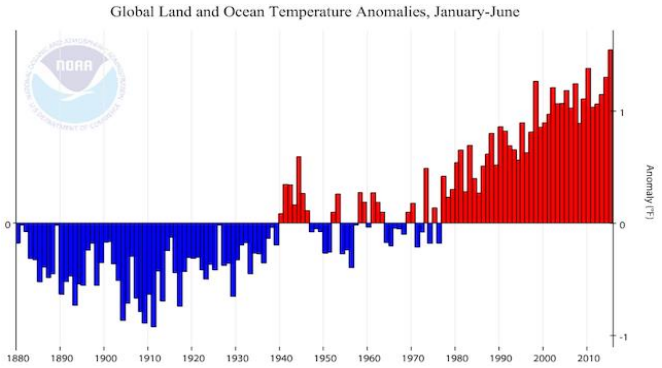
As *Laudato Si'* observes, the most critical environmental challenge that we face is the threat of global climate change. However, as Pope Francis observes "*avoiding the use of plastic and paper, reducing water consumption, separating refuse, cooking only what can reasonably be consumed, showing care for other living beings, using public transport or car-pooling, planting trees, turning off unnecessary lights, or any number of other practices*," are also needed to address our "*responsibility within creation, and [our] duty towards nature and the Creator."*

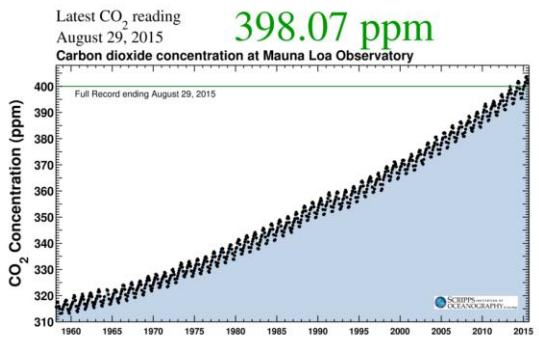
Some may fear that the Pope's encyclical is an attack on our economic values and way of life. To the contrary, His Holiness asserts that: *"business is a noble vocation, directed to producing wealth and improving our world. It can be a fruitful source of prosperity for the areas in which it operates, especially if it sees the creation of jobs as an essential part of its service to the common good."* What Pope Francis asks of us is a "*profound interior conversion"* that will come from *"major paths of dialogue"* and lead us toward a future in which *"all people can prosper personally and economically in harmony with the gifts God has given us in nature."*

Basic science of climate change



As *Laudato Si'* states, climate scientists around the world have clearly shown that the Earth's atmosphere has been heating up rapidly since the early 1800s. Carbon is the main building block of life on Earth, and it is constantly being stored in living things or buried in the ground, or released into the atmosphere and oceans. This is called the "carbon cycle" (pictured). Since the Industrial Revolution (around 1750-1850) our burning of fossil fuels such as coal, oil, and natural gas in our homes, cars, power plants, and factories has released large amounts of carbon dioxide (or CO2) into the atmosphere. The amount of CO2 in the atmosphere is already higher than it has been for more than 800,000 years. Left unchecked, the CO2 in the atmosphere will soon be higher than it has been for many millions of years. A basic physical property of CO2 is that it traps heat in the atmosphere. We know that the Earth's climate shifts naturally due to things like volcanic eruptions and solar activity, but since CO2 traps heat so effectively it is now the main "driver" of climate change. The build-up of CO2 in the atmosphere has already led to global warming, especially in the Arctic regions of Earth; more





severe weather patterns such as heavier storms and longer droughts; and faster melting of Earth's mountain glaciers and ice caps. Temperatures have been rising almost steadily since the late 1970s, and the six-month period from January to June 2015 has been the warmest in 135 years. Other evidence shows that this is being caused by the rising concentrations of CO2 in our atmosphere due to the burning of fossil fuels. If we don't act soon to reduce our generation of CO2 in the atmosphere, global temperatures may rise as much as 8 degrees Celsius (14 degrees Fahrenheit). Climate change is not something that will happen in the distant future, it is happening right now, and it threatens our prosperity, our society, and our very civilization. It is one of the most urgent and complicated problems humanity has ever faced.

Parish Activities and Education

In *Laudato Si'*, the Holy Father "challenges us to examine our lifestyle." He urges us to work together and educate each other on the issues he raises in his encyclical. Environmental education, he says, "seeks also to restore the various levels of ecological equilibrium, establishing harmony within ourselves, with others, with nature and other living creatures, and with God. Environmental education should facilitate making the leap towards the transcendent which gives ecological ethics its deepest meaning."

Form "Green Teams" (easy).

There are several ways in which schools and parishes can begin to educate their students, staff, and parishioners on the most important environmental issues. One way is to form a parish "green team," creation care team, or environmental ministry, which would take the lead in not only implementing specific practices, but in developing environmental education materials for Adult Education programs, Young Adult groups, Social Action Committees, and other ministries. Georgia Interfaith Power and Light and the Franciscan Action Network have resources available for development of Green Teams. In schools, students could form Green Clubs, St. Francis Clubs, or *Laudato Si'* Clubs that might serve as role models and leaders for other students. Green Clubs in our Catholic schools can take the lead in creating gardens, composting, recycling, and environmental awareness, working with science, religion, and art teachers to better put *Laudato Si'* into action. "*Good education plants seeds when we are young, and these continue to bear fruit throughout life*," says the Holy Faather.

Bring in expert speakers (easy).

Parishes could enhance their Adult and Young Adult Education programs with speakers who are expert in various environmental fields. Raising environmental awareness *"needs educators capable of developing an ethics of ecology, and helping people, through effective pedagogy, to grow in solidarity, responsibility and compassionate care."* In Georgia, there are many such people of all faiths who can speak to climate science, agriculture, recycling, creation care spirituality, gardening, and water conservation. These folks are in Georgia's biggest businesses such as in the Home Depot Eco-Options Program and the many sustainability programs at Coca Cola , as well as our colleges and universities, and state and local governments. The Archdiocese of Atlanta also provides lists of speakers who can visit parishes for Adult and Young Adult education.

Speak from the pulpit (easy).

As the Holy Father pointed out, we Roman Catholics have a long and rich Biblical and magisterial tradition of "the Gospel of Creation." Pastors and deacons could draw from this tradition in homilies, letters, parish bulletins, and blogs to help parishioners "realize that their responsibility within creation, and their duty towards nature and the Creator, are an essential part of their faith" [36]. Many of the writings of St. John Paul II, Pope Benedict XVI, or "Respect for the integrity of creation" in The Catechism of the Catholic Church are helpful starting points for messages about the importance of respecting and valuing God's gift of nature and the natural environment.

Create or expand your library (easy).

Many parishes, and all schools, have libraries. There are many superb books that could serve as learning resources for any interested parishioner or student, or as the start of a ”creation care” library section. These include books by Passionist Father Thomas Berry, Franciscan nun and Georgetown University Professor Sister Ilia Delio, OSF (pictured), and Jesuit paleontologist Pierre Teilhard de Chardin, S.J. Many other excellent books on the Christian duty to be stewards of God’s Creation have been written, and some are available in the bookstore of the Trappist Monastery of the Holy Spirit in Conyers, GA.

Broaden school curricula (moderate to advanced).

Catholic schools could offer classes in ecology, environmental science, agriculture and other topics that not only prepare students for the growing workforce in alternative energy, climate change adaptation and even growing food, but give them the scientific and ethical backgrounds they will need to live a more sustainable lifestyle. Alternatively, Pope Francis stresses that “our efforts at education will be inadequate and ineffectual unless we strive to promote a new way of thinking about human beings, life, society and our relationship with nature,” existing courses in science, business, social studies, and theology could be updated to include a more robust treatment of the environment, creation care theology, environmental ethics, and environmental economics.

Captain Planet Foundation School Garden

Did you know? The top five universities in Georgia *all* offer majors in environmental science, earth and atmospheric science, ecology, and biology. And there are now as many people working in the solar energy industry in Georgia as there are physicians in Georgia!

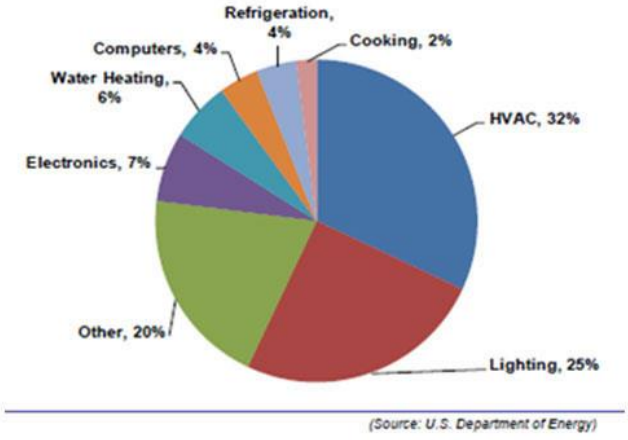
Energy Conservation and Efficiency

For Parishes

Electricity production from fossil fuels is the biggest source of greenhouse gases. Carbon dioxide, a greenhouse gas, is generated when we burn fossil fuels such as coal and oil to heat our homes and fuel our cars. Energy costs are often among the biggest a parish has to face. *Laudato Si'* discusses the need for "*developing renewable and less polluting forms of energy, [and] encouraging a more efficient use of energy*." Pope Francis quotes Pope Emeritus Benedict XVI, who said: "*technologically advanced societies must be prepared to encourage more sober lifestyles, while reducing their energy consumption and improving its efficiency."* In Georgia, we get most of our electricity from the fossil fuels coal and natural gas, but we also get as much as 25% from nuclear power. Reducing a parish's energy use is a straightforward way to reduce its "carbon footprint."

Pursuing energy efficiency for your parish can be as easy as installing a CFL light bulb, as expensive as replacing your HVAC system, or as complicated as changing the way you are billed for electricity. There are many opportunities at all levels for your parish to reduce your energy use. It's important to first understand how your parish uses energy in its buildings and how human behavior impacts energy use. Saving energy saves money. And the money saved can be redirected towards ministries and programs that benefit the larger community.

The HVAC system in your facility accounts for 32 percent of total energy use. Lighting is the second largest energy user in most buildings, using 20 to 30 percent of total energy. Your parish can save considerable money by turning off lights and installing motion sensors on light switches. Water heating and other energy loads can contribute 26 percent or more to your total energy consumption. If your parish or school has commercial cooking equipment, your "Cooking" category is likely to be greater than 2 percent due to the energy used for commercial appliances.



The Cost of Energy

Most parishes use a blend of electricity and natural gas. Natural gas is commonly used in water heaters, kitchens, and for space heating. Electricity is used for lighting, all plug-in equipment, air conditioning and sometimes space heating as well. A typical breakdown of total energy expenditures is represented in the pie chart pictured.

In Georgia, power plants rely on a mix of coal, natural gas, and nuclear energy to produce electricity. Less than 2% is procured from renewable energy sources, mostly hydropower. Implementing energy efficient measures within your parish can reduce greenhouse gases while also saving money.

Did you know? Since coal is the most commonly used fuel for electricity generation, it accounts for 76% of global CO2 emissions. Natural gas accounts for 22% of global CO2 emissions (U.S. Environmental Protection Agency).

A professional energy audit will help determine how a parish uses energy and provide ideas on ways to save energy and money. Georgia Interfaith Power & Light (GIPL), a local faith-based nonprofit organization helps houses of worship reduce their energy footprint. GIPL offers professional energy audits and grants to fund energy efficient upgrades for worship facilities and religious schools. The average energy savings are at least 20% for churches. All parishes within the Catholic Archdiocese of Atlanta are encouraged to sign up for a ***Power Wise Energy Audit*** at www. gipl.org.

Practical Steps to Energy Efficiency

A parish energy audit is the perfect starting point to manage your energy use. Here are the steps you can take to pursue energy efficiency in your parish once the audit results are reported.

Make the commitment (easy).

Your parish's facilities personnel are not the only people responsible for managing energy wisely. A successful energy management program requires the engagement and commitment of multiple stakeholders in your parish community. The parish Green Team can address energy efficiency in your parish. Include those who have an impact on energy use or will be affected by energy management decisions, such as an individual whose passion is creation care and environmental sustainability. Designate a single individual to coordinate the team and follow up with your parish's progress to promote accountability. It will also be very helpful if team members are empowered to make budgeting decisions. This commitment will be most powerful if it is put in writing, agreed to and shared with your entire congregation.

Determine current energy performance (easy).

Creating a baseline of your current energy use allows you to measure progress against these numbers. This will also allow you to compare your current energy performance with the performance of other parishes. There are several metrics by which experts can benchmark your parish's energy performance. These metrics are discussed in detail in your Energy Audit Report.

Set a Goal (moderate).

Once your energy management team commits to energy efficiency and determines how your current performance stacks up to your peers, the next step is to set an energy reduction goal. This goal should be realistic yet challenging. It should be specific in terms of desired energy savings. Deadlines should be established. A clear goal will help rally your parish community and provide a measure against which you can evaluate your progress. An energy reduction goal usually has several parts:

1. A Metric (e.g. total energy use per square ft.)
2. A Baseline (e.g. from a 2009 baseline)
3. A Reduction Amount (e.g. reduce by 15%)

Create your Energy Action Plan (easy to moderate).

An Energy Action Plan specifically spells out how your team will achieve or begin to achieve your energy reduction goal. This is where specific energy conservation measures should be defined. The Action Plan should state who will be responsible for accomplishing each measure and what resources they will have to support them.

Did you know? In 2007, Pope Benedict XVI announced that Vatican City would aim to become the world's first "carbon neutral state" by switching the Paul VI audience hall to solar power (pictured) and planting a forest in Europe.

Implement your Energy Action Plan (easy to advanced).

The implementation process inevitably involves surprises and demands some flexibility. Be sure to keep energy management team members informed of progress and setbacks. Communicate frequently with all congregation stakeholders about your energy management plan so they understand the bigger picture and how it relates to changes they see occurring.

Begin taking concrete steps to reduce energy use, based on your energy audit. For example:

- Swap out incandescent light bulbs with LED or compact fluorescent light bulbs. Old-fashioned light bulbs waste a lot of energy, and actually give off more heat energy than light.
- Install a programmable thermostat that limits when the heating or air conditioning comes on. For example, when no one is in the church or school, the thermostat can be programed to 55° Fahrenheit. During times when people are working, studying and worshiping, stay within the 68-78 zone for winter and summer
- Put inside lights on timers, and both inside and outside lights on motion sensors.
- Replace old appliances with Energy Star appliances.
- Insulate, seal cracks and leaks, and check or replace storm windows.
- Consider replacing single-paned windows with double-paned windows. The return on investment will take only a few years.
- Consider putting rooftop solar panels on the church, rectory, or school…or all of them! Georgia Solar Energy Association can help your parish decide whether solar is best for you and how to enlist the help of Brother Sun.

Did you know? A compact fluorescent light bulb uses 75 percent less energy than a regular bulb and it can last up to four years. And a crack as small as 1/16th of an inch around a window frame can let in as much cold air as leaving the window open three inches (Alliant Energy)!

The Southface Energy Institute in Atlanta can provide *many* more ideas for how to make your parish buildings energy efficient. Their impressive Learning Center and library would be a fantastic place for your parish

energy team to visit and tour. You can even participate in Southface's training programs.

GIPL offers matching grants to assist congregations implementing energy efficient upgrades. These matching grants can be as much as $10,000, and are awarded based on each congregation's needs and estimated energy savings. For more, go to http://www.gipl.org.

Energy saving examples in the Catholic Archdiocese of Atlanta:

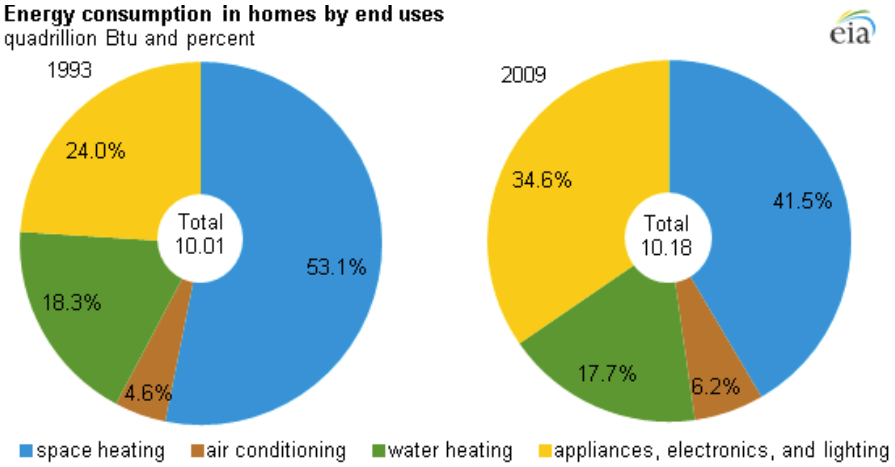
- Catholic Shrine of the Immaculate Conception – Atlanta received a GIPL energy audit in 2010. The Shrine received a GIPL grant of $2089 to install attic insulation in the office area. Estimated savings - $2,204/year.
- St Mary's Catholic Church – Rome received a GIPL energy audit in 2011. Projected savings: $37,615
- St Thomas More Catholic Church – Decatur received a GIPL energy audit in 2013 and received a GIPL grant of $2,000 to help install 45 digitized thermostats. Estimated annual savings: $10,200.
- Immaculate Heart of Mary School – Atlanta had an audit completed by CDH in 2010 and IHM received a GIPL grant of $5,250 to assist in purchasing a new boiler (total cost $37,000). Estimated energy savings: 40%.
- Immaculate Heart of Mary Church – Atlanta received an energy audit in 2011 and received a GIPL grant $4,250 to install direct digital HVAC controls. Savings realized: $4,500/year.

For Homes

In most Georgia homes, space heating, appliances, and lighting make up the bulk of our energy use. Just as there are many ways to conserve energy at church, there are many effective ways to save energy at home. Whether you live in a house or apartment, a mobile home or a renovated loft, conserving energy will benefit our environment and put money in your pocket!

Do the basic stuff (easy to moderate).

- Find out how much energy your home is using with a home energy audit conducted by Georgia Power or your local electricity provider. You can also use the on-line Home Advisor to get started on your own. And since the biggest issue Pope Francis wants us to consider is our greenhouse gas emissions, you can also calculate your home's carbon footprint as part of your family energy assessment to see where you can save energy and make the biggest impact on climate change.
- There are *lots* of easy steps you can take to start saving energy at home. For example, swap out older incandescent light bulbs for energy-efficient compact fluorescent or LED light bulbs. Incandescent light bulbs give off more heat energy than light energy. In fact, only around 5% of the energy given off by a standard 100 watt light bulb is light! Energy-efficient compact fluorescent or LED light bulbs give off more light than heat, and last far longer. They start paying for themselves immediately with direct energy savings.
- Make home energy efficiency second nature. Check to make sure your insulation is properly installed. Seal windows and door frames against leaks and drafts. Turn off electronics when you are not using them.



Turn off lights when you leave a room. Don't use hot water if cold water can do the same task just as well.

- Outdoor lights are very important for home security. It is easy to install motion sensors into existing outdoor light sockets and have the lights come on only when a person (or a raccoon!) moves nearby. You can also buy light fixtures that combine light sensors with motion sensors that come on dimly at sunset, brighten only when they sense movement nearby, and turn off early in the morning. Reducing outdoor lights at night also cuts back on "light pollution," and makes it easier to see lightning bugs and stars.
- When it is time to replace or buy a new appliance, buy energy star appliances such as dishwashers, clothes washers and dryers, water heaters, furnaces, and air conditioning units. Appliances can use a VERY large amount of energy. You can find energy-saving appliances at some Georgia-based retailers such as The Home Depot and Lowes.
- If there is condensation water on the insides of your windows on the Feast of the Assumption (August 15), your AC is probably set too low. If your kids are running around the house in a bathing suit on Epiphany (January 6), turn down the heat. Since space heating and air conditioning make up around half of your home energy use, try living in the "68-78" range. In other words, keep the thermostat at 68° in winter and 78° in summer. To avoid thermostat battles in your home, install programmable thermostats that turn the heating and cooling off when you are not at home or at night. Most are easily self-installed, and save energy immediately.

Impress your neighbors (moderate to advanced).

- The price of rooftop solar panels and systems has plummeted in recent years and continues to decline. Their use is growing rapidly worldwide, including in Vatican City! Rooftop solar is becoming much more common and acceptable, and can have a dramatic impact on your home's carbon footprint. It works by generating electricity from sunlight, which your power company then "buys" back from you. Very recently, rooftop solar was considered unusual (and unusually expensive), but more and more homes and business are using Brother Sun to generate their electricity. Georgia Power can help you determine if rooftop solar is right for you. The Georgia General Assembly recently passed legislation making it easier to finance home solar projects. To learn more about solar energy and if it is right for you, contact the groups like Georgia Solar.
- Rooftop solar water heaters are another way to reduce home energy use. The sun warms water up before it goes into your water heater tank. They are less expensive than solar panels. If you use natural gas for your water heater, rooftop solar water heaters can immediately reduce your carbon footprint.

- Plant native trees to shade the home. Shade is the cheapest way to cool your house. Sturdy shade trees like disease-resistant American elms, poplars, oaks, American basswood, and many other varieties can create shade in a few years and add beauty and value to your property. More information on planting trees can be found in the Landscaping section of this Action Plan.

Remember the past and look to the future (moderate to advanced).

- Even in the hottest times of summer, night-time temperatures in most of Georgia dip into the mid-70s. On those nights, instead of spending money to run the air conditioning unit, why not use your windows and ceiling fans to bring in cool night air? Don't forget about using screens for upstairs windows, and for all your windows consider installing safety pins in the window sashes so that they can be safely locked to open no more than six inches at night for cross-ventilation. Cool night air is free!
- Depending on where you live, consider line-drying some of your clothes in summer. Clothes dryers are usually the most energy-intensive home appliance. Line-drying just a few loads each week can significantly reduce your energy use and save money. Line-drying also saves money on clothes, since they last longer if you don't tumble them in a hot dryer. If you live in a subdivision, be sure to check with your Homeowners Association to see if line-drying is allowed.
- When buying a house, consider its energy usage and energy efficiency. Ask your realtor to show you energy efficient homes, and ask about a prospective home's energy use and efficiency. If possible, consider buying a LEED-certified Home. (LEED stands for Leadership in Energy and Environmental Design).
- Remember the Earth is the only home we have. The words "ecology" and "economy" both come from the Greek word "oikos," which means home. Taking care of our ecology and our economy together is nothing more than good housekeeping! As the Holy Father said: *"Once we start to think about the kind of world we are leaving to future generations, we look at things differently; we realize that the world is a gift which we have freely received and must share with others."*

Purchasing and Recycling

For Parishes

Everything we buy needs some kind of natural resources to make, and aside from food almost everything we buy ends up being thrown away eventually. On average, we throw away more than 4 pounds of garbage every day, mostly paper products and food, but also clothes, toys, rusty tools, furniture, household cleaning products, and lots of electronics. Only about a third of our garbage is recycled, and much of what is left behind is materials such as plastics that will take centuries or millennia to break down in a landfill. This does not include the huge volumes of solid and liquid waste created in the countries where the things we buy are manufactured. Most of those countries do not have the environmental protections that the U.S. does, and waste from that manufacturing as well as garbage tends to pile up in massive quantities in the poorer regions of the world. In the oceans, plastic is accumulating in alarming amounts, where it does not break down or biodegrade; instead, it gets broken into smaller pieces where it is then eaten by birds and other marine creatures, or it washes ashore and litters beaches and coastal waters. All of these problems with garbage and industrial waste, Francis says in his Encyclical, "*are closely linked to a throwaway culture, which affects the excluded just as it quickly reduces things to rubbish"* and he urges us "*to adopt a circular model of production capable of preserving resources for present and future generations, while limiting as much as possible the use of non-renewable resources, moderating their consumption, maximizing their efficient use, reusing and recycling them*."

"Reduce, Re-use, and Recycle" in parishes and schools (easy).

The easiest way to minimize the environmental impact of our standard office operations is to reduce our creation of trash, reuse as many office supplies as we can, and recycle as much garbage as possible. This could also mean purchasing used office furniture or decorations such as pictures, lights, and rugs, and other furnishings. Consider doing a waste audit of your parish office to see what you throw away that could be recycled.

Use recyclable materials, or metal and porcelain utensils and plates for parish events (easy to moderate).

Graduations, weddings, baptisms, weekly potlucks, Lenten fish fries, and other parish events can generate a lot of paper and plastic waste. Reusable or biodegradable utensils and plates can greatly alleviate this, and make every parish festivity a sustainable one. Using reusable utensils and glasses can also substantially cut the cost of these events in the long run.

Purchase supplies made from natural, recycled, or recyclable materials (easy).

- Paper is typically the biggest trash item generated in offices, but so are binders, ink cartridges, and electronics. Simple actions include printing documents on both sides of the paper, buying printer paper made from recycled materials, re-using binders and report covers, printing only when necessary, and taking old electronics such as computer parts to recycling centers. Many electronics stores accept cell phones, computer items, and even TVs for recycling. Similarly, consider donating used office materials

such as furniture and electronics to non-profit charities such as Habitat for Humanity, or Goodwill. The Georgia Recycling Coalition has a plethora of information to help your parish "Green Team" learn about where you can find recycling centers for everything from computers and cell phones to printer cartridges and carpet.

- Purchase environmentally sustainable products and create a green parish or school office. Educate yourself and your staff as much as possible about recycling in schools.

Set up a parish recycling program (moderate to advanced).

Most municipalities have recycling programs. The parish "Green Team" can opt into the program and learn which materials the garbage company will accept for recycling. If recycling is not part of the trash pick-up, or if there is no garbage collection for the parish, then find the nearest facility or drop off location through the Georgia Recycling Coalition.

- Once you know the materials the garbage company collects, find out if the recyclables may be mixed together or must be separated into specific groups (paper, cardboard, glass, aluminum cans, certain types of plastics, etc.).
- If materials must be separated, place separate bins in strategic locations. For example, for glass, plastic and metal containers, place them in the break room and kitchen. Cardboard boxes work well for paper. You can provide a paper recycling box under each desk.
- If your parish has a compost pile, put in a small covered trash can in the kitchen or break room for banana peels, apple cores, coffee grounds, tea bags, paper towels and other food waste.
- For trash destined for the landfill, which should be minimal, put a few containers in central locations that would require employees to get up from their desks to deposit their trash.
- How to Start Recycling at Church provides good information to help your parish get started.

For Parishioners

Aside from food, we throw away an amazing amount of garbage every day. Many of the things we buy get thrown away in less than one year! Much of this relates to what Pope Francis, echoing Pope Benedict XVI and St. John Paul II, referred to in a 2014 address as our "*throwaway culture*," in which *"…we have a surfeit of unnecessary things, but we no longer have the capacity to build authentic human relationships marked by truth and mutual respect."* The US Conference of Catholic Bishops has called for us to live The Good Life, but from a Catholic perspective that turns aside from what Boston College professor Juliet Schor calls the cycle of "work and spend."

If we embrace the adage that our parents and grandparents had to live by, and which Pope Francis reminded us of in *Laudato Si,'* that "Less is more," we can reduce our environmental impact at home by watching what we buy.

All of the suggested actions listed above for parish and school offices apply to our home purchases. However, we can also make purchasing and recycling decisions that relate to our personal lives.

Reduce, re-use, and recycle (easy)!

- Many small things that we throw away can be recycled – store receipts, shredded personal papers, plastic caps. Before you take out your garbage, see if you can put more materials in your recycling bin than your waste bin. Learn as much as you can about how to reduce, re-use, and recycle at home.
- Instead of throwing clothes away, donate them! St. Vincent de Paul Society, Habitat for Humanity, and Goodwill are eager to receive used clothes.
- Instead of throwing away toys, donate them to those same organizations, or any other charitable organization in your area.
- Repair things that can be repaired rather than buying new ones. Reject the notion that just because it is "cheaper to buy a new one," it is better.
- Take advantage of the recycling program offered by your waste hauler or check with the Georgia Recycling Coalition for recycling centers near you.
- Recycle electronics. Many electronics stores accept cell phones, computer items, and even TVs for recycling. Check with Georgia Recycling Coalition for a drop off location near you.
- Use cloth bags at the grocery store. Every year, literally trillions of plastic bags are manufactured around the world. Instead of using plastic bags, buy cloth bags or bags made from recycled materials.

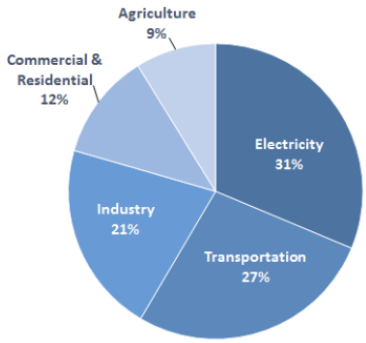
Embrace simple living (easy to advanced).

- Many of the things we purchase were designed to make our lives easier and give us more free time. That hasn't really panned out! Simpler living has measureable health benefits. Save money, reduce stress, reduce clutter, and make time for the truly important things by trying to adopt a simple lifestyle.
- Remember that our purchases have an environmental impact when they are manufactured and again when they are discarded. Try to live simply so that others may simply live.
- Shopping can be fun, but it can also become an addiction. Before buying something, always ask yourself if you need it and if you can afford it. Pope Francis would be very happy for us.
- Get in the habit of looking at your purchases socially and environmentally.
- Forbes Magazine recently featured a list of companies whose products were considered best for the environment.
- Learn what you can about the stores where you shop, and ask that they start stocking goods that are environmentally responsible.
- Try to evaluate as many of your purchases from an environmental perspective as much as you can. For example, products that traditionally came in glass containers (like cooking oil) now come almost increasingly in plastic bottles. Whenever possible, buy the glass container.

Transportation

For Parishes

Cars and trucks are important and valuable parts of our American culture. However, after electricity generation, transportation is the second largest source of greenhouse gases, especially CO_2. This comes from the gasoline and diesel fuel we put in our engines. How much we drive and the type of vehicle we drive has a big impact on our carbon footprint. Although Pope Francis has never been to Georgia, he could have been describing Atlanta when he wrote: *"many cars, used by one or more people, circulate in cities, causing traffic congestion, raising the level of pollution, and consuming enormous quantities of non-renewable energy."* Sadly, around Atlanta, most of us drive alone, and as Georgia's population is expected to grow by 4.6 million people by 2030, mostly in the Atlanta metro area, traffic will make our commutes and our air pollution even worse than they are now. As the Pope reminds us: *"advances have been made in the production of non-polluting energy and in the improvement of public transportation. These achievements do not solve global problems, but they do show that men and women are still capable of intervening positively."*



Source: US EPA

Carpool to Mass, school, and parish meetings (easy).

One way that Catholics can continue to respond positively to *Laudato Si'* is by sharing rides to Sunday Mass, school, and parish events. Some parishes, such as the Shrine of the Immaculate Conception in downtown Atlanta, attract parishioners from as many as 25 different zip codes! Others, especially suburban parishes, have more tightly clustered parishioners. There are many opportunities in each parish for folks to carpool to church or school, and thus reduce their consumption of fossil. Carpooling to church can also serve as an extra way for parishioners to get to know each other and ease parking issues.

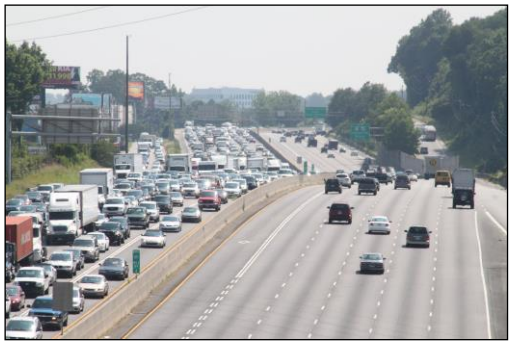


Photo by Rob McDowell

In Georgia, The Clean Air Campaign has years of experience helping Georgians to improve their commute, save money, and improve the quality of our air around Atlanta. Additionally, parishes and parish organizations can develop carpool lists and databases to link parishioners interested in carpooling.

Did you know? About 78% Americans do not carpool to work. The average carpooler can cut out as much as $600 each month on the cost of their commuting drive. By carpooling just twice a week, 1,600 pounds of greenhouse gases can be kept out of the air yearly (South Florida Commuter Services).

Buy an electric or hybrid car for your pastor and parochial vicars (advanced).

Most pastors and parochial vicars live close to their parish, but are required to travel around the Archdiocese for home and hospital visits, meetings, and retreats. And of course, they drive to go shopping, socialize, and relax like the rest of us. Instead of providing the priests with fuel-inefficient cars, parishes who buy cars for their pastors could purchase a gas-hybrid car (Toyota Prius or Honda Civic), an "extended- range electric" car (Chevrolet Volt) that has a gasoline engine if the battery is used up, or an all-electric car (Nissan Leaf). Newer models of many of these cars are bigger and have greater engine power than earlier models. They not only have lower CO2 emissions, but can save tremendous amounts of money on gas. A Prius can go as much as 450-500 miles on one tank of gas, and a Volt can travel thousands of miles between fill-ups! There are many industry guides to help your parish decide which car would be best for your priests.

Install electric car charging stations at churches and schools (advanced).

Credit: Hannah Solar

If the pastor drives an electric car, he will need to plug it in at night to recharge the batteries. But why not encourage parishioners, teachers, and students to drive electric cars to work and church by installing a few charging stations? As these tend to be near buildings that can accommodate them, they can also have the best parking spaces! Georgia Power can install electric charging stations, including special billing rates for electric car users.

Provide premium parking at churches and schools for alternative fuel, electric, and hybrid cars (moderate).

Aside from parking spaces necessarily set aside for the handicapped and the elderly, who doesn't want to park as close to the church or school as possible? Depending on available parking space, parishes could set aside a row of spaces reserved for parishioners, students, and teachers who drive hybrid, electric, or alternative-fueled vehicles. Rewarding parishioners who are committed to the spirit of *Laudato Si'* is one small gesture that can change hearts and minds.

Did you know? In 2005 alone, U.S. drivers wasted 4.2 billion hours and up 2.9 billion gallons of fuel sitting in traffic. That translates into almost *60 billion pounds* of greenhouse gases put into the atmosphere just by traffic congestion (U. S. Environmental Protection Agency)!

For Parishioners

Carpool to work, church, school, etc., or take public transportation whenever possible (easy).

There are so many benefits to carpooling or ride-sharing. It saves money, gives you more time to read, listen to music, chat, or pray. It also cuts down on traffic, which is what makes our commutes so miserable. Carpooling with friends and co-workers strengthens personal bonds in our increasingly tuned-out world. The Clean Air Campaign helps Georgians improve their commute, save money, and improve the quality of our air around Atlanta and north Georgia.

Consider driving an electric, gas-hybrid, or alternate-fueled car, or at least a highly fuel-efficient car (moderate to advanced).

When buying a car or truck, always consider its gas mileage, carbon footprint, and environmental footprint. Buy consistent with your true needs. Driving a fuel-efficient car that minimizes our impact on the environment identifies us as someone who cares about the future, and who identifies with the spirit of *Laudato Si'*. Fuel-efficient cars also save lots of money on gas. Learn as much as you can about fuel efficiency standards, and which cars and trucks rate the highest, so that when you shop for a new car or truck, you can find the one that says you are a snazzy driver *and* someone who cares about creation.

Be mindful of your vacation travel and its carbon footprint (moderate to advanced).

Americans need to take more vacations! However, be careful of your carbon footprint when traveling. Air travel is the most CO2- intensive way to travel, so unless you are going overseas, consider taking a train. Try a local vacation to the coast of Georgia or Florida, or the mountains of north Georgia, North Carolina, or Tennessee. If you need to travel by plane, try and offset your flight's carbon footprint at your destination. When you arrive at your destination, especially if it is a city like Miami, New York, Chicago, or Rome, then use public transportation.

Remember the simple things about fuel efficiency (very easy).

You don't need to warm your car in the morning unless it's a *very* old model. Don't idle while waiting to pick someone up, or waiting outside a store. Avoid using the drive thru. Don't drive around the parking lot looking for a space; pick the first one and get a little exercise! When approaching a red light, start coasting so that when it turns green, you are already moving. Combine shopping trips into one. Keep your tires properly inflated and your engine tuned up.

Did you know? Vehicle emissions are the leading cause of "ground-level ozone," an odorless gas that is a severe irritant to your lungs and throat. In the summer, ozone pollution can be especially bad, and young children and the elderly are most vulnerable. Hospital admissions of children with asthma soar in the summer due to ozone created by vehicle exhausts (National Institutes of Health).

Water Conservation

For Parishes

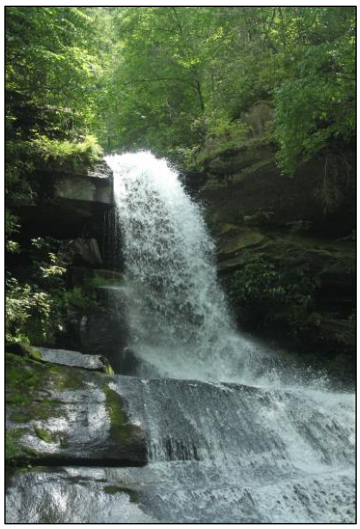


Photo by Rob McDowell

Water is a *caress of God* [84] which you can experience floating down a Georgia river, splashing in the waves on Jekyll Island, or gulping a cool drink on a hot summer day. In most years, Georgia is blessed with abundant water supplies. However, although droughts are a natural part of our southeastern climate, they have become much more frequent and prolonged since around 1980. As we in Georgia know all too well, Pope Francis reminds us that *water supplies used to be relatively constant, but now in many places demand exceeds the sustainable supply, with dramatic consequences in the short and long term.*" Furthermore, as our population in Georgia continues to grow we will strain our water supplies, in spite of its abundance. Pope Francis writes that *access to safe drinkable water is a basic and universal human right, since it is essential to human survival and, as such, is a condition for the exercise of other human rights."* Water, as a precious part of the material universe "*…speaks of God's love, his boundless affection for us."* Climate change has already altered our precipitation patterns, so now our rain comes in heavier downpours and more often. Most climate predictions suggest that we may face even more frequent droughts in the future. Thus, part of our duty as stewards of God's creation is to use our water wisely.

Saving water also saves energy. It takes a lot of electricity to treat drinking water and sewage, and move water around with pumps. (A gallon of water weighs just over 8 pounds). The less water you use in your parish or school, whether for drinking, cooking, bathing, or flushing, the more energy you save and the more you reduce your carbon footprint. More information on using energy conservatively can be found in the **Energy** section of this Action Plan.

Water conservation is actually easy to do. In 2007, then-Governor Sonny Perdue asked north Georgia and the Atlanta region to reduce water use by 10%. The Atlanta area reduced their water use by 20% through a conservation campaign directed by the University of Georgia Extension and the Georgia Environmental Protection Division, and we have not returned to our pre-2007 levels. Water conservation has now become a mindset in Georgia. As our population increases, we must conserve even more. Luckily, there are lots of local resources such as Cobb County's waterSmart program that parishes and individuals can "tap" into to learn how to use water more conservatively. Having experienced several severe droughts in the past decade or so, the Metropolitan North Georgia Water Planning District, which encompasses a large portion of the Catholic Archdiocese of Atlanta, has developed some state-of-the-art water conservation tools that your parish or school can use. In fact, your parish can even take the Water Conservation Pledge and join other homes, schools, and businesses that are committed to conserving water.

Did you know? According to the American Water Works Association, the average price of tap water is only $0.004 a gallon. Bottled water costs nearly 300 times more and is no healthier than tap water. Often it consists of filtered tap water!

Reduce indoor water use by retrofitting kitchen and bathroom plumbing, and repairing leaks (easy to moderate).

- Parish water use occurs in the rectory, church lavatories, school kitchens, etc. An effective way to conserve water in high-traffic areas is to make conservation "automatic" so that the plumbing does the work. This can be done by "retrofitting" high-use plumbing fixtures such as toilets and faucets with low-flow fixtures. For church and school lavatories, install faucets with infra-red sensors that turn off automatically after a few seconds. Additionally, low-flow toilets, dual flush toilets, and waterless urinals are effective ways to reduce water use and are easily installed. Some communities in Georgia offer rebates for low-flow toilet retrofits.
- In the rectory, as with most homes, most water use occurs in the bathroom. In fact, the toilet and shower are the biggest water users. Water Sense toilets and plumbing fixtures can help reduce water use significantly. Also, a leaking or running toilet can waste a tremendous amount of water. Make sure to have the toilet and other fixtures checked periodically for leaks. You can actually do this yourself by adding food coloring to the tank. If color appears in the bowl after 30 minutes, your toilet is leaking. A leaking toilet can waste 200 gallons per day. Lastly, water-saving shower heads and short showers go a long way to keeping water use low!
- In the rectory kitchen, use the dishwasher only when it is full. Don't pre-wash the dishes unless you have an older dishwasher (newer ones don't require pre-washing). For the school or church kitchen consider purchasing an energy and water efficient EnergyStar commercial dishwasher.

Minimize outdoor water use with water wise landscaping (easy to moderate).

Using less water on outdoor landscaping can make an enormous difference. In the Atlanta region, water use increases by as much as 40% in the summer as homes and businesses turn on the sprinklers, mostly for watering lawns. Lawns are typically the biggest water user in any landscape. However, by practicing "xeriscaping," i.e. planting low-water use plants, your parish outdoor water use can be greatly reduced. For more information on Water Wise landscaping, see the chapter on Landscaping.

Use rain barrels for outdoor watering (easy to moderate).

Rooftops are great ways to collect water into rain barrels. In a typical Georgia spring and summer, 10-inches of rain on an average-sized, 1300 square foot roof would yield more than 8,000 gallons of rainwater, and church roofs are usually much bigger than that. In Georgia, there are many local rain barrel resources and distributors, including some local governments who help homeowners with installing and maintaining rain barrels.

Did you know? In the metro Atlanta region, the average daily water use per person is around 102 gallons. In Phoenix, Arizona it is about 115 gallons per person per day, and in Boston is 40 gallons per person per day. The differences are mostly related to outdoor water use!

For Parishioners

ALL of the water conservation actions mentioned above for parishes can be used at home, but here are a few more specific ways to start using water conservatively.
Remember the basics (very easy)!

- Turn off the water when brushing your teeth.
- A leaking or running toilet can waste a tremendous amount of water. Check toilets for slow leaks. You can actually do this by adding food coloring to the tank. If color appears in the bowl after 30 minutes, your toilet is leaking. A leaking toilet can waste 200 gallons of water per day.
- Take shorter showers, and take showers instead of baths.
- Use a dishwasher and washing machine only when they're full.

Upgrade your plumbing (easy to moderate).

- Install low-flow shower heads and faucets
- Toilets are the single biggest water user in most households. Consider replacing your toilet with a low-flush toilet or a dual-flush toilet. Dual-flush toilets have two flush buttons: you push one for liquid waste and both for solid waste. Some communities in Georgia offer rebates for low-flow toilet retrofits.
- When it comes time to replace a dishwasher or clothes washer, invest in a Water Sense dishwasher.
- If you must water outdoor landscaping, invest in water-saving gadgets like an outdoor irrigation timer, drip irrigation systems, and other tools available at most local home-improvement stores.

Reconsider your landscaping (easy to advanced).

Consider replacing some of all of your turf with trees, shrubs, flowers, or grasses like Dwarf Mondo grass that doesn't require water and fertilizer. Using native drought-tolerant plants is called "xeriscaping," and unfortunately many people think it means making your yard look like a desert. Not so! For more information on saving water outdoors, see the Landscaping section of this Action Plan.

Buying and Sharing Food

For Parishes and Parishioners

Food nourishes our bodies and souls giving us strength to work, play, pray and enjoy our families and friends. A shared meal, like breaking bread at communion, is a way to emotionally and spiritually connect with one another. It is chance to share our lives, our hopes, dreams and even a few good jokes. Holidays such as Christmas, Easter and of course Thanksgiving revolve around memorable meals often cooked from recipes handed down through generations. Birthdays, weddings, funerals, and the sacraments of Baptism, Holy Communion and Confirmation usually gather the family around food. Parishes host many events for their flock, from harvest festivals and Knights of Columbus breakfasts to pot-luck dinners and funeral luncheons. What they serve and from where they buy food can have great impact on the earth. In addition, the United States bishops have said greater attention must be given to "*needs of the poor, the weak and the vulnerable… We need to strengthen the conviction that we are one single human family."* Churches often have many programs including food pantries to reach out to those in need. Filling them with nutritious and locally produced food is best for them and the environment.

Did you know? Most food travels 1,500 miles from farm to fork. It is not uncommon for lettuce grown on a California farm to be shipped 3,000 miles to an Atlanta table (World Watch Institute).

Buy locally grown food (easy).

When possible, purchase vegetables, fruits, meats and cheeses grown in Georgia and in the southeast to reduce greenhouse gases emitted during transportation. Agriculture is Georgia's largest industry and our state is the nation's leading producer of chickens, peanuts, pecans, and blueberries. Supermarkets often have food produced in the state labeled *Georgia Grown*. Consider also buying from local farmer's markets. A University of Georgia study states that "if every Georgia household bought $10 worth of food from state farmers, it would add $1.9 billion dollars to the state economy. So support local farmers!

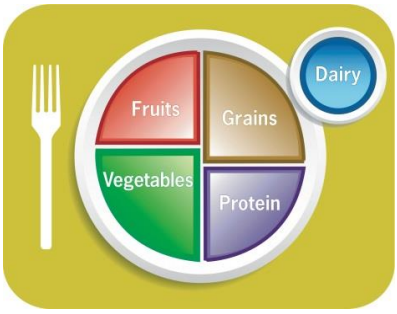
Buy organic and naturally grown food if possible (moderate).

Organic agricultural practices avoid synthetic chemicals when producing vegetables, fruits, meat, fish and dairy. Most synthetic agricultural chemicals are manufactured from fossil fuels, which emit greenhouse gases. Check a product's label to see if it is organic or naturally grown. Georgia Organics contains a list of farms, markets, and restaurants that feature Georgia-grown food.

Shop carefully and use cloth bags (easy).

When stocking up on groceries, choose items with less packaging. Try to buy in bulk and freeze or package food in small portions to reduce cardboard and plastic wrapping. And since plastic grocery bags are a major source of litter, get in the habit of using cloth or recycled fiber bags to pack your groceries.

Eat lower on the food chain (easy).



Producing fruits and vegetables requires less energy and water than most meat. New U.S. Department of Agriculture dietary guidelines recommend that half of our meal should consist of fruits and vegetables. When organizing all those parish pot-luck meals, encourage parishioners to bring mostly vegetables and fruits.

Try to continue "Meatless Fridays" or begin "Meatless Mondays" (easy).

Skipping meat one day a week is good for you, great for our nation's health, and fantastic for the planet. It takes approximately 1,850 gallons of water to produce a single pound of beef, as opposed to just 39 gallons of water to produce a pound of vegetables. Thirty countries and counting have signed on to Meatless Mondays worldwide movement that encourages people to adopt this habit.

Fast during Lent (moderate).

On Lenten fast days, feature a parish meal consisting of a bowl of rice, the staple in many developing countries. Then donate the cost of a full meal to the Catholic Relief Services (CRS) Rice Bowl. Seventy-five percent of the money supports CRS' programs around the world and 25 percent supports hunger and poverty programs in local communities. Additionally, consider fasting one day per month on the holy day of your choice. Fasting is an ancient and integral part of our faith tradition, and studies have shown that periodic fasting is healthy for you.

PLEASE, don't waste food (easy).

Food waste comprises more than 20 percent of garbage in landfills and is a significant source of methane gas – a greenhouse gas - as it rots, according the Environmental Protection Agency. Nationally, we waste almost 40% of all food produced. We can avoid wasting food by not over buying, properly storing it, and eating leftovers before they become scientific experiments. Avoid scraping edible food into the trash. If you have some vegetables and fruits that are past their prime, toss them in a blender with a little local honey and presto – a nutritious smoothie! When those parish meals are finished, take home leftovers or donate them to someone who can use them.

Compost food scraps (moderate).

Rather than toss corn cobs, banana and potato peels, apple cores, and those moldy leftovers into the garbage destined for the landfill, compost them. The section on landscaping provides resources on how to get started. Homemade compost can be used to fertilize plants, save money on potting soil, and reduce trips to the retail gardening center.

Avoid drinking bottled water (easy).

Instead of supplying bottled water at events, ask parishioners to bring their own cup or supply cups made of recyclable material and pitchers of tap water. Producing bottled water actually uses a great deal of water. In fact, it takes three times more water to make each plastic bottle as it does to fill it. Bottled water is also far more expensive than tap water (more than 300 times more expensive!) and it is no healthier than tap water. Ironically, more than one-third of all bottled water sold is actually filtered tap water. The production of bottled water also uses an enormous amount of energy – the equivalent of what it takes to fuel 1.5 million cars

annually. In addition, transporting bottled water across thousands of miles spews carbon dioxide into the air, complicating our efforts to combat global climate change.

Support the local food pantry or food bank (easy).

Many communities and churches manage food pantries to help low-income families, children, immigrants, seniors, and others who lack the resources to afford enough food to sustain a healthy life. Many do this in partnership with the Atlanta Community Food Bank. Together they provided food to 755,000 metro Atlanta residents in 29 counties in 2014. You can donate to the Food Bank or find one of its 600 local partner organizations near you to support.

Grow food in your backyard, school yard and church yard (moderate to advanced).

The ultimate fast food can be grown just steps from your back door. In most of Georgia, food can be grown year round. For help on how to plant, when to plant and what to plant, contact the University of Georgia Extension in your county. Extension agents, Master Gardeners, and publications can assist both novice and advanced gardeners in growing fruits, vegetables and even chickens. For more information, see Chapter on Landscaping (community gardens) and Making *Laudato Si'* About Young People (school gardens).

Join the local food movement (moderate).

Hop on board the local food bandwagon by joining one of the many organizations that can connect you to farmers, markets and local food establishments in Georgia. Georgia Organics is a statewide organization that supports the movement and has many resources for everyone from farmers to eaters to chefs.

Give Thanks (easy).

The Holy Father reminds us to say grace before meals. "*I ask all believers to return to this beautiful and meaningful custom. The moment of blessing, however brief, reminds us of our dependence on God for Life: it strengthens our feeling of gratitude for the gifts of creation: it acknowledges those who by their labors provide us with these goods.*"

Did you know? From our farms to grocery stores to dinner tables, 30 percent of the food we grow is never eaten. At 2.8 trillion pounds, that's enough food to feed three billion people, the people that go to bed hungry every night (National Geographic Magazine).

Creating Sustainable Landscapes

For Parishes and Parishioners

Gardening connects us to nature – "*the caress of God*." In his magnificent song, Canticle of the Sun, St. Francis of Assisi understood and appreciated our connectedness to nature with his words, *"Praise be to you, my Lord, through our Sister, Mother Earth, who sustains and governs us, and who produces various fruit with colored flowers and herbs."* Many studies show the physical, emotional, spiritual, and environmental benefits of planting and caring for a garden. However, what we plant and how we care for our landscapes determines whether it enhances or harms the environment. By using sustainable gardening practices, parishes and parishioners can create an oasis for people and wildlife around their churches and homes and restore local ecosystems. Georgia has a robust Master Gardener Extension Volunteer program that can be a good source of expertise for the church garden.

Connect the church landscape with urban forests (moderate).

If the church or home is adjacent to or contains an urban forest or woods, connect the parish landscape with it. Maintain trees on church property, and if possible mimic the nearby wooded property on the church landscape. Creating a wildlife corridor is essential for wildlife and bird migration and movement.

Create a water-wise landscape (moderate to advanced).

Georgia has experienced several severe droughts recently, so creating a water-wise garden is a must. A water-wise garden can reduce water use by as much as 50 percent in the summer. This can be accomplished by grouping plants according to water needs. High water use areas (which you should limit to only10 percent of the landscape) require frequent watering and are typically small beds of annuals such as pansies and petunias. Moderate water use areas (about 20 percent of your garden) need occasional watering and include perennials and small shrubs. Low water use (60 – 70 percent of the landscape) such as established trees and shrubs are watered by Mother Nature. Learn as much as you can about environmentally friendly landscape practices from the Georgia Cooperative Extension.

Source: U.S. EPA

Plant trees (moderate).

In *Laudato Si''*, Pope Francis recommends planting trees. Trees are the lungs of the earth. They "inhale" the carbon dioxide produced by burning fossil fuels and exhale oxygen. When trees are strategically placed, their shade cools us, our homes, and our communities. They reduce storm water runoff in cities and towns, they reduce soil erosion, moderate the immediate climate of cities and downtowns, provide windbreaks, and purify the air we breathe and the water we drink. Trees provide habitat for a myriad of creatures from lightning bugs and butterflies to squirrels. Consider selecting a native oak for your parish or home landscaping. The University of Georgia Extension can help you select from a variety of native trees for your yard.

Did you know? Trees in urban areas of the United States remove an estimated 711,000 tons of toxic pollutants from the air each year (U.S. Forest Service).

Reduce lawn size (advanced).

While grassy lawns make safe and attractive surfaces on which to play, picnic and stroll, landscape managers and homeowners should be practical about choosing a lawn size that suits the church needs. According to the University of Georgia, lawns should not occupy more than 40 percent of a landscape. They are "monocultures" (one species of plant) and require significant maintenance. Lawns need frequent mowing – which spews greenhouse gases into the air – regular watering, chemical fertilizers, and, if a homeowner wants a weed-free lawn, weed killers. Improperly applied lawn chemicals frequently run off the land surface during heavy rains and pollute streams, rivers, and lakes. Lawns also do not provide habitat to wildlife.

Prepare the soil well and compost (moderate).

Georgia soils can range from red clay in the north to sand in the south. Neither works well for growing plants. However, both can be improved using compost. Composting is simple and valuable for keeping carbon locked up in soil and out of the atmosphere. A compost pile requires a small plot of land, at least 4 feet by 4 feet (preferably away from your neighbor's property) where yard debris and vegetable scraps can be deposited in a ratio of 3 to 1 and turned periodically. The University of Georgia Extension can show you how with their composting publication.

Plant native plants (moderate).

Choose a variety of native plants and trees for your church and home landscape, because natives are adapted to a particular region with its temperature ranges, soil, altitude, and rainfall patterns. In Georgia, this means that they are adapted to our frequent droughts and need less water. Native plants restore biodiversity to a landscape: insects that share an evolutionary history with native plants select those plants for food and in turn become food for many native birds, reptiles, amphibians and mammals that make Georgia so environmentally rich. Click here for a list of Georgia native plants.

Use correct planting procedures (moderate).

Like people, plants need to be placed in the right environment to thrive. If they are stressed, they become diseased and a target for insect pests and diseases that can weaken or kill them. Choose native plants or those adapted to the garden site. Plants like either sun or shade, dry or wet soils, rich soil or can tolerate poor soils. The plant tag has information about the plant's needs as well as how far apart to space them and when to plant them. To keep the weeds down, mulch beds with wood chips, pine bark and pine straw. For more information, see Environmentally Friendly Landscape Practices.

Minimize chemical use *(*moderate).

Pesticides and fertilizers should be used carefully, in the right amounts, when the plant requires it and never before a rain storm. In Georgia, research shows that urban watersheds are more polluted with pesticides than rural ones where farmers live. Spraying pesticides also kills beneficial insects such as honeybees that pollinate our flowers. Natural pest control can be achieved by using native plants to attract beneficial insects and other predators that feed on the pests. Homemade compost goes a long way to providing nutrients for a home or church garden. The University of Georgia Extension publication on environmentally friendly landscape practices referenced previously can help gardeners manage their landscapes using natural means.

Create a wildlife habitat (moderate to advanced).

By restoring native plants to your landscape and linking to other natural areas nearby, you increase the native habitat size. The Holy Father suggests *"leave room for wandering and migrating species by creating biological corridors."* This is necessary for species that need a considerable range in which to live and reproduce. To create a wildlife habitat:

- Eliminate or reduce pesticide use
- Reduce lawn size
- Remove non-native invasive species like kudzu, privet, and mimosa. Learn the invasive species of Georgia http://www.gaeppc.org/
- Have a ready supply of clean water such as a bird bath or pond
- Conserve natural areas on the property
- Furnish food sources such as native trees, shrubs, flowers, and vines to provide the foliage, nectar, pollen, berries, seeds, and nuts that many species of wildlife require
- Provide protective cover for wildlife including brush and rock piles, leaf litter, and dense shrubs

The Audubon Society and National Wildlife Federation have developed certification programs for those interested in having a wildlife habitat in their home and church yards.

Plant for pollinators (moderate to advanced).

Pollination is an essential process for the planet's ecological survival. Honeybees alone pollinate a third of the nation's food supply. The U.S. Department of Agriculture reported U.S. beekeepers are losing 33 percent of their honeybee colonies annually due to a syndrome known as colony collapse disorder. The cause is attributed to loss of habitat, pesticide use, bee pests such as the Varroa mite, malnutrition, and pathogens. To stage a comeback for pollinators, plant nectar-and pollen-producing plants for prolonged blooming. A list of plants can found in Bee Conservation in the Southeast. Take the Million Pollinator Garden Challenge by registering your pollinator garden.

Consider a community garden (advanced).

Most churches have parishioners who struggle with food insecurity and rely on food banks. Typically food banks offer canned goods, which can be high in sodium and sugar and lacking in some important vitamins. A community garden can supplement canned food. Ask parishioners with home gardens to bring in their excess produce to a local food bank. For information on how to start, plant, and maintain a community garden, see University of Georgia Extension publications, click Community Gardens.

Become a Georgia Master Gardener (advanced).

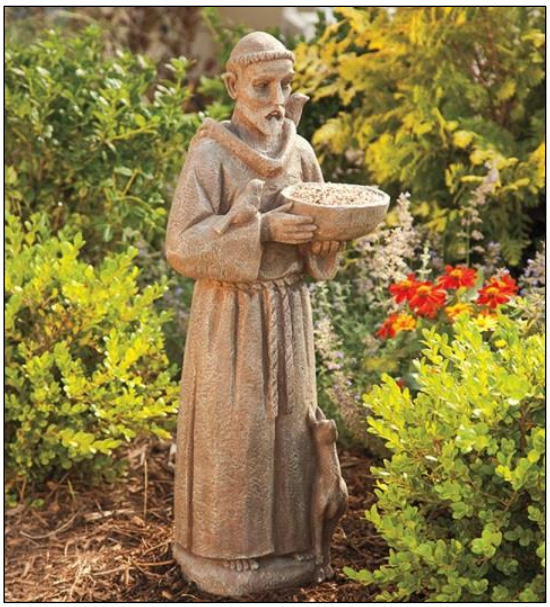
The University of Georgia Cooperative Extension Service has a Master Gardener program that rigorously trains gardeners in sustainable gardening practices. They, in turn, volunteer for projects throughout their communities. These projects include creating gardens at schools, homeless shelters, community centers, battered women's shelters, drug rehabilitation facilities and senior centers. Contact your county Extension office to learn about the Georgia Master Gardener Extension Volunteer program.

Become a citizen scientist (moderate).

From retirees to home-schooled kids, people of all ages and abilities can contribute to the advancement of science. By helping supply the tens of thousands of data points required to understand sweeping ecological changes, citizen scientists can contribute data for bird migratory patterns and population trends, the influence of non-native species on native species, and the effect of climate change on plants and animals. For citizen science involving birds, contact the Cornell Lab of Ornithology. Bumblebee Watch was inaugurated by the Xerces Society and other partners to track and conserve North America's bumblebees. FrogWatch USA is a citizen science program of the Association of Zoos and Aquariums (AZA) that provides individuals, groups, and families with an opportunity to learn about wetlands in their communities and to report data on the calls of frogs and toads.

Create a meditation garden (advanced).

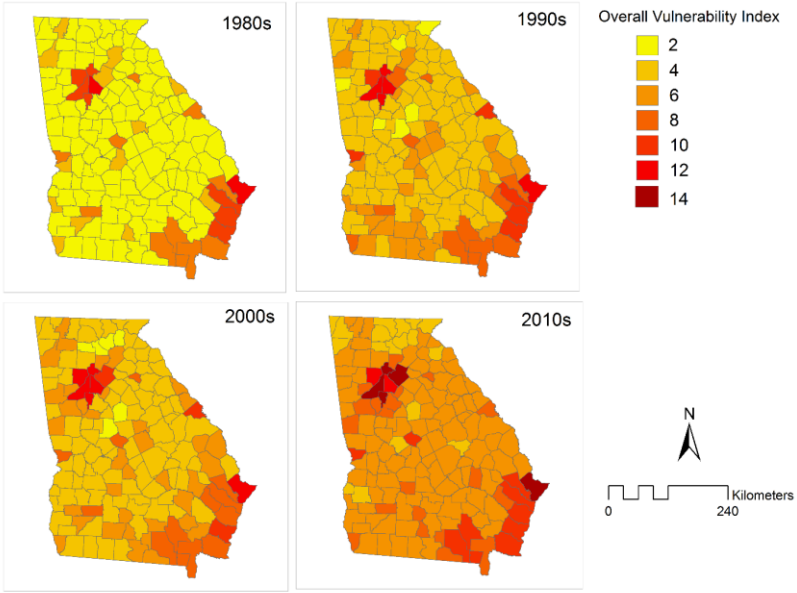
Make a peaceful retreat with a bench for everyone to enjoy nature and pray. Consider adding a statue of St. Francis to remind parishioners of his connection with the earth. To help people meditate and pray, perhaps have a weatherized container with St. Francis prayers including Canticle of the Sun. In our over-stimulated lives, reflect on the Catechism, which teaches us: "God wills the interdependence of creatures. The sun and the moon, the cedar and the little flower, the eagle and sparrow: the spectacle of their countless diversities and inequalities tells us that no creature is self-sufficient. Creatures exist only in dependence on each other, to complete each other, and in the service of one another."



Assisting Climate Vulnerable Populations

As the Holy Father states: "*Climate change is a global problem with grave implications: environmental, social, economic, political, and for the distribution of goods. It represents one of the principal challenges facing humanity in our day."* [25] He correctly points out that: "*both everyday experience and scientific research show that the gravest effects of all attacks on the environment are suffered by the poorest"* because they lack the resources to adapt and the access to social services that could help is severely limited. Even in our own country, severe weather events like hurricanes and floods trap people in their homes and communities, where they suffer hunger and thirst for weeks, unable to reach help. As climate change progresses, we can expect more frequent and longer heat waves, hotter nights, more frequent floods, and other weather conditions that present severe threats to the health and lives of the elderly, poor, homeless, or transient who often live in crowded conditions in cities. This includes also seasonal agricultural workers, who already have to labor under some of the harshest conditions Georgia experiences, and first responders such as fire fighters, EMTs, and police departments who are likely to be increasingly put in harm's way.

A recent U.S. Forest Service-funded study at the University of Georgia quantified how vulnerable the state of Georgia has become to climate change and weather extremes from 1975 to 2012. Researchers looked at climate vulnerability at the county level in terms of weather-climate events such as floods, droughts, and heat waves; socio-economic factors, and the resilience of communities to adapt to weather events. They weighed the impacts of these events, social vulnerability, geographic location, and other factors to produce a county-by-county index, presented as maps (pictured). As a result, adjacent counties may exhibit high climate vulnerability for very different reasons.



The maps reveal many interesting results related to climate vulnerability and social justice. First, they show that the entire state has become more vulnerable to climate change since the 1980s and may become more vulnerable in the future. Second, the most vulnerable areas now and in the future are the metropolitan Atlanta and other major urban areas (e.g. Columbus, Macon, Augusta, and Savannah), coastal regions, and parts of South Georgia. The causes for high levels of community vulnerability in these regions vary. In the urban counties, there is a larger

percentage of socially vulnerable people (e.g., minorities, poor, young, elderly, homeless) who are exposed to extreme heat and urban flooding. Coastal communities are more vulnerable to flooding and inundation caused by sea-level rise, which already floods roads used by emergency services and for evacuation. Some counties in the southern part of the state have higher vulnerability because of the increased intensity and frequency of drought, which strains domestic water supplies. Also, these counties and their residents tend to rely on agriculture for their livelihood. These counties are also a part of the South's Black Belt, a region of counties with high African-American populations and a history of often-extreme poverty.

Overall, Georgia is a microcosm for the great challenges that the world faces. In many other countries, similar patterns of vulnerability exist: the least able to adapt to climate change…the most marginalized segments of society…are the most vulnerable to its effects and will suffer the most. Clearly, climate change stands as an issue of science, but also one of justice and fairness. Pope Francis confirms this, writing: *"we have to realize that a true ecological approach always becomes a social approach; it must integrate questions of justice in debates on the environment, so as to hear both the cry of the earth and the cry of the poor."* Therefore, our actions to slow climate change and reverse global environmental deterioration should be viewed as acts of mercy and compassion, just as much as our volunteer work with poor communities or our contributions to organizations such as Catholic Relief Services are.

Know who in your parish and community are most vulnerable (easy).

- Know which parts of your community are most vulnerable to flooding and storm damage.
- Communicate with municipal or county social service departments to make sure that your vulnerable parishioners are known to them. Encourage vulnerable parishioners to participate in Low-Income Home Energy Assistance Programs available through the U.S. Department of Health and Human Services and the Georgia Department of Human Services (DHS).
- Collaborate with government agencies on disaster preparedness, and have these agencies visit your parish or school.

Provide assistance to vulnerable populations and areas (easy to advanced).

- Develop a list of vulnerable parishioners, and make sure they have access to cool or warm spaces, home air conditioning and heating, social services, or evacuation when needed.
- Have parish fundraisers that raise money for window air conditioning units and space heaters.
- Collaborate with local farmers to provide cool refuges for farm workers during heat waves.
- Develop a phone or visitation list for parishioners or staff to check on vulnerable parishioners during and after extreme weather events. Include weather event alerts before such events, to make sure vulnerable parishioners' needs are anticipated.
- Provide temporary "cool refuges" or "warm refuges" for the most vulnerable members of your parish and community at churches and schools. This could include creating shady green spaces on parish or school grounds or in vulnerable communities, or temporary homeless shelters during severe heat or cold events.
- Develop list of parishioners who would be tasked with visiting or evacuating the most vulnerable before severe weather events occur.

Did you know? Older people are more vulnerable to temperature extremes and have a significantly higher mortality risk in extreme weather events, because of increased susceptibility to disease, the effects of stresses on the food and water supply, and reduced ability to mobilize quickly (American Society on Aging).

Making *Laudato Si'* for Young People

For Parishes

Today's children will inherit the earth we leave them. The Holy Father says, "*Once we start to think about the kind of world we are leaving to future generations, we look at things differently; we realize that the world is a gift, which we have freely received and must share with others*." Therefore, we have a moral and intergenerational obligation to address climate change and natural resource degradation and to leave a habitable earth in which our children can thrive. Young people tend to be more concerned about the climate than their elders, and "*they wonder how anyone can claim to be building a better future without thinking of the environmental crisis and the sufferings of the excluded [213]*. Therefore, any parish program that addresses reducing their carbon footprint, or living lifestyles consistent with *Laudato Si'* could engage the young members of the parish. "*In the family we first learn how to show love and respect for life: we are taught …respect for the local ecosystem and care for all creatures."*

Tap into US EPA's Eco-portal for eco-activities (easy).

U.S. EPA's web site contains a database packed with fun activities for students that includes games, quizzes, and cool stuff that teach lessons in energy, air, water, recycling, chemicals, waste, and environmental health. NASA, the National Institute of Environmental Health Sciences and National Wildlife Federation have all contributed activities. In addition, the site contains information on how to conduct a waste audit for the school, pack a waste free lunch, and the life cycle of a soccer ball. For more information about these activities, visit Eco-portal.

Join the Georgia Green and Healthy School Program (moderate).

Self-guided assessments for teachers and students assist and support schools in understanding and practicing environmentally sound principles. To participate, students and teachers conduct school-based investigations on one or more of the six assessment areas (air, energy, facility management, school grounds, solid waste, and water). Results of this program include cost-saving measures that can save schools thousands of dollars a year in energy, water, maintenance, and other costs. For more information, see Green and Healthy Schools .

Catch the Cycle School Recycling Program (easy to moderate).

Developed by the Georgia Recycling Coalition, A Guide for Implementing a School Recycling Program is comprehensive and instructive in helping teachers and students set up a school recycling program in Georgia. Above all, use paper made of recycled content. Find out more at Catch the Cycle

Join the Recycle Bowl Competition (easy to moderate).

This nationwide recycling Keep America Beautiful competition is for elementary, middle and high-school students. Join Recycle Bowl .

Incorporate environmental lessons into Sunday School classes (moderate).

Make creation care part of your child's spiritual growth. For example, in Sunday School**,** plant a seed in a paper cup filled with soil to show how new life begins, make signs to remind family members to shut off

lights, and draw a picture of creation on paper made of recycled content. For more lessons and scripture readings, see Catholic Climate Covenant and Interfaith Power and Light web sites.

Walk, bike, and carpool to school (easy).

If school is within walking distance – a mile or less – and sidewalks are present, have students dress for the weather and walk to school**.** If bike paths are accessible, biking is another great option. If school buses are not available, encourage moms, dads, and caregivers to form.

Create a schoolyard habitat (advanced).

National Wildlife Federation's "How-To Guide" for Schoolyard Habitats® walks teachers through the steps to creating a successful and sustainable wildlife garden, provides information on teaching in an outdoor classroom, and offers resources to help create and maintain a habitat. This excellent teaching tool will help students understand ecosystem function.

Cultivate a school garden (moderate to advanced).

The University of Georgia Cooperative Extension has a School Garden Resource Center that contains everything a teacher needs to know to put in a school garden. From how to build a raised bed to what to plant and how, soil considerations and natural pest management, it's all there. In addition, more than 700 lesson plans for K-12 in all core subjects from math to science to social studies and language arts are available. Training workshops are provided in the summer for teachers.

Did you know? Schools where students participate in school gardens show a significant increase in science achievement scores (Klemmer, HortTechnology).

Schedule field trips to 4-H outdoor environmental centers (moderate).

Five outdoor environmental centers from the mountains to the sea, offers students hands on lessons in an outdoor classroom in a variety of ecosystems. Operating September through May, the program offers high-quality day and residential educational experiences. The research-based curriculum correlates to Georgia Performance Standards. To learn more, visit the 4-H web site.

Plant a class tree (moderate).

At graduation, have each class plant a tree to do their part to mitigate climate change. Returning students can see how much it has grown. Read the Lorax by Dr. Seuss and learn the lessons of destroying trees for economic gain and the impact on the surrounding ecosystem.

Offer Sunday school field trips (moderate).

Schedule trips to visit nature centers, parks, zoos, and the aquarium. Walk in the woods guided by a naturalist to learn the elements of a forest and their function in supporting the ecosystem. Learn to identify trees, shrubs, and flowers.

Celebrate St. Francis Day (advanced).

Encourage students to bring in their pets for the blessing of the animals. Discuss the life of the St. Francis and his focus on simplicity and respect and love for the earth's creatures.

For Families

Lead by example (easy to moderate).

Children learn from the example set by parents and caregivers. Inside and outside the home, use earth friendly practices. A few examples from other sections in this Action Plan include:

- Inside — Turn off the lights when the room is not in use. Keep the temperature at 68° F in the winter and 78° in the summer. Use energy saving appliances and run the dishwasher and washing machine only with full loads. Conserve water. Buy ONLY what you need and recycle and reuse everything from food, cans and glass to clothes and food. Live simply.
- Outside — Plant native plants, particularly trees to bring back biodiversity. Create a water wise garden as described in the landscape section. Reduce the lawn to minimize watering, and the potential for overusing chemicals. Grow vegetables and fruits organically to show children where food comes.

Plant a native tree when your child is born (moderate).

As it grows it can provide shade for their play and become habitat for wildlife. Trees absorb carbon dioxide exhaled by humans and give off life oxygen required by humans for respiration. Read The Lorax by Dr. Seuss, a very powerful story about the impact to the ecosystem of cutting trees all the trees to manufacture goods.

Encourage children to help with garden chores (easy to moderate).

Nothing teaches a child more about nature than planting, weeding, mulching, mowing, turning the compost pile, and managing pests in the garden. Put in butterfly and pollinator gardens to encourage young people to learn the life cycle of a butterfly and importance of pollinators. If possible, grow food organically too. Tomatoes, peppers, squash, zucchini, and blueberries are fairly easy to grow in Georgia. When children grow food children, they learn the cycle of farming from seed to harvest. To learn more about home gardening, visit the University of Georgia Extension publication web site. The Vegetable Garden Calendar shows what to grow each month. As Ecclesiastes 3:2 reminds us, there is a time to plant and a time to harvest. It is important to observe the planting schedule for all plants.

Did you know? One in three bits of food requires pollination (Royal Society of Biological Sciences).

Become a Junior Master Gardener (moderate).

If your child has an interest in gardening, many counties offer a Junior Master Gardener program with nature related activities in outdoor classrooms such as school and community gardens and nature centers. For more information, contact your county Extension office .

Explore the great outdoors (moderate).

Take young people to hike, bike, camp, canoe, swim, fish, hunt, horseback ride and more amidst Georgia's splendid natural resources in the many Federal and State Parks scattered throughout the state. Paddle down the Chattahoochee River, bike along the Atlanta Beltline, climb Stone Mountain and the Appalachian Trail which originates in Georgia, hike to Amicalola Falls and go boating through the Okefenokee Swamp to see alligators up close and personal. Georgia State Parks web site makes it easy find a location and activities for you and your family to enjoy.

Visit botanical gardens, nature centers, the aquarium, and city parks (easy to moderate).

Georgia's long growing season and varied temperatures and terrain provide fertile opportunities to showcase the fauna and flora of each region. The Atlanta Botanical Gardens and Piedmont Park provide urbanites an oasis in the heart of Atlanta. The State Botanical Gardens located in Athens and associated with the University of Georgia conducts many educational programs for children through senior citizens. Chattahoochee Nature Center, Columbus Botanical Gardens, Coastal Botanical Gardens near Savannah and many others appeal to gardeners and nature lovers alike who want to unplug and connect with nature.

Volunteer to maintain Georgia's many natural treasures (easy to moderate).

As a family, become a friend of the park or garden to help maintain the many state and local parks and nature centers and trails. Clean up your waterway through Rivers Alive. Conduct stream monitoring through Georgia Adopt a Stream. Many environmental non-profits such as the Nature Conservancy, Georgia Conservancy, Georgia Wildlife Federation, Trees Atlanta, Southface, and all the river keepers rely on volunteers to help them advocate for Georgia's natural resources. During the last 15 years of Rivers Alive, 370,000 volunteers removed 9.2 million pounds of trash from 26,300 miles of streams, rivers, lakes, beaches and wetlands.

Source: Rivers Alive

Political Action

For Parishes and Parishioners

In 1789, Thomas Jefferson stated that whenever things get so far wrong as to attract their notice, the people, when well informed, may be relied on to set them right. As a result of citizen action, the U.S. Congress has enacted some of the most comprehensive environmental legislation in the world to clean up our air, water, and land. New environmental challenges face us. Climate change and overconsumption of natural resources are taxing the earth's capacity to provide prosperity and security for future generations. Pope Francis states, "*political institutions and various other social groups are entrusted with helping to raise people's awareness. So too is the church*." The "Green Team" should stay informed on these critical environmental issues and develop a menu of options for getting parishioners engaged in moving society to address them. According to a 2015 Reuters poll, 66 percent of respondents said they felt governments were obligated to reduce greenhouse gas emissions, while 72 percent felt they had a personal responsibility to reduce their carbon footprint. While this Action Plan has many individual actions people can take to reduce their environmental footprint, it also critically important for people to let our elected officials know we care about "*our common home.*" Consider participating in Catholic Day at the Capitol.

Become informed about environmental issues (easy).

The parish "Green Team" or green point person should become informed about the current issues facing the local community, region, state and nation. Southeast Green outlines current southeastern environmental issues on their web site. They have an outstanding weekly newsletter. To subscribe, e-mail Beth Bond: beth@southeastgreen.com

Encourage parishioners to lobby their elected representatives (moderate).

Pastors, please encourage your parishioners to call, write or e-mail their elected officials when critical environmental decisions are being made at the local, state and national level. The Catholic Climate Covenant, a national organization, helps Catholic communities support sensible, faith-informed climate policies. They provide parishes an easy way to get involved with advocacy on climate change.

Parishioners, become involved at the local, state and national level. Each person who takes the time to communicate their opinion is counted. Phone calls and written letters count the most, whereas on-line petitions are often disregarded. Politicians respond to the will of the people. By creating a groundswell of interest in protecting the planet, political leaders will eventually respond accordingly. The Citizens' Climate Lobby creates the political will for a livable world by empowering individuals to exercise their personal and political power. Join! It's free!

Support products and businesses that are ethical and sustainable (moderate).

Consumer movements have wielded considerable power in the U.S. and across the world. Parishes should buy from those businesses that demonstrate environmentally ethical and sustainable practices. When enough consumers boycott a business for unethical practices, the business can change or lose market share. The Holy Father argues that "*a change in lifestyle could bring healthy pressure to bear on those who wield political, economic and social power."*

Support candidates who support the environment (moderate).

Let your voice be heard by voting for elected officials who have a good track record supporting environmental issues. To know how your national politicians vote, sign up at Congress.org and you will receive an online newsletter with their recent votes. The Georgia Conservancy provides weekly legislative updates on the status of environmental legislation during the Georgia General Assembly session.

Get involved in environmental projects (easy to advanced).

Pope Francis says "*society is also enriched by a countless array or organizations which work to promote the common good and to defend the environment, whether natural or urban. Around these community actions, relationships develop or are recovered and a new social fabric emerges.*" Parishes can support and sponsor some community project such as a community garden, park or river clean-up, insulting low income homes to be more energy efficient, or even beautifying the parish grounds. Make your parish visible in enhancing the natural environment.

Did you know? In 1999, Dupont abandoned their plan to mine titanium near the Okefenokee Swamp due to strong opposition from Georgia's environmental community concerned about how mining would affect the Swamp's ecology (U.S. Secretary of the Interior Bruce Babbitt).

Join or support an environmental group (moderate).

Georgia has many environmental organizations each dedicated to some aspect of protecting its natural resources. If you are interested in conserving bird habitat, then join the Audubon Society. If you want to reduce the summer heat in Atlanta and restore green space heat, then support Trees Atlanta. Nearly every river has a river keeper or organization that relies on volunteers to keep it clean. Eco-USA.net has a state-by-state listing of environmental organizations and what they do that can help guide your decision.

Conclusion

I want to thank the expert scientists at the University of Georgia for their diligence in preparing this exemplary Action Plan in response to Pope Francis' Encyclical Letter, On Care for Our Common Home (*Laudato Si'*). Designed for all of us, the ideas and concepts presented herein – some simple; others more challenging and complex – can contribute greatly to protecting and restoring our natural resources for ourselves and for those who follow us.

In a world that is so busy, we must remind ourselves each day that an important component of our personal stewardship is the care of this fragile planet we share. Each of us is called to contribute according to our ability and means.

Though we may wonder at times if our actions as individuals or even as the Catholic community in the state of Georgia can have an appreciable impact, the answer is: Absolutely! The Holy Father tells us that "…local individuals and groups can make a real difference. They are able to instill a greater sense of responsibility, a strong sense of community, a readiness to protect others, a spirit of creativity and a deep love for the land. They are also concerned about what they will eventually leave to their children and grandchildren."

How can we protect our world and its societies for future generations? Live a life dedicated to simplicity in the spirit of St. Francis and look out for our most vulnerable brothers and sisters.

My sincere hope is that you will see yourself throughout this Action Plan and are moved to action immediately. Pope Francis addressed *Laudato Si'* to "every person living on this planet." Let us renew our commitment to our community, our planet, and to one another as we work to implement this Action Plan in our common home!

Wilton D. Gregory, Catholic Archbishop of Atlanta

A prayer for our earth

All-powerful God, you are present in the whole universe
and in the smallest of your creatures.
You embrace with your tenderness all that exists.
Pour out upon us the power of your love,
that we may protect life and beauty.
Fill us with peace that we may live
as brothers and sisters, harming no one.
O God of the poor,
help us to rescue the abandoned and forgotten of this earth,
so precious in your eyes.
Bring healing to our lives,
that we may protect the world and not prey on it,
that we may sow beauty, not pollution and destruction.
Touch the hearts
of those who look only for gain
at the expense of the poor and the earth.
Teach us to discover the worth of each thing,
to be filled with awe and contemplation,
to recognize that we are profoundly united
with every creature
as we journey towards your infinite light.
We thank you for being with us each day.
Encourage us, we pray, in our struggle
for justice, love and peace.

Laudato Si', On Care for Our Common Home

Source: NASA