

### **Georgia Power: Electricity's Effects on Carbon Emissions**

Georgia Power and its parent company, Southern Company, are the major suppliers of electricity to the Southeast, one of the fastest growing regions in the USA. Within 15 years, the demand for electricity is expected to grow by 30%. At the same time, the Southeast region relies heavily on coal power plants, which have higher carbon emissions. Georgia Power is currently working to reduce their carbon footprint, through changes in technology and policy, while at the same time achieving a balance between energy, economy, and the environment.

Georgia Power is focusing on two methods involving technology: improving old facilities and exploring newer and cleaner options. Georgia Power has been upgrading their coal plants with additional control units to conform to new EPA regulations regarding emissions. They are also in the process of expanding one of their nuclear power facilities, which provides large amounts of essentially carbon-free energy, as well as converting a coal plant to run on natural gas. They have explored renewable energy in the form of biomass, which is comprised of unused resources near the plant (typically wood pieces leftover from industrial applications) and considered carbon neutral.

The policies of Georgia Power are focused on energy efficiency and improving energy usage, despite Georgia's lack of incentive programs for energy. The solar buy-back program allows customers to sell back any power they generate, but do not use, from solar. They have distributed CFLs, offered rebates for energy efficient appliances, and recycled extra refrigerators. Georgia Power also offers free electrical audits of homes to improve efficiency.

Georgia Power has been successful thus far, seeing an 80% decrease in emissions while population increased by 50%. They are currently looking into effective carbon-management techniques to continue their work on improving the environment.