Throughout his 35-year career as a federal researcher, McMahan L. Gray has worked to provide advanced solutions to the nation's most difficult energy challenges. Gray's most recently led the development of basic immobilized amine sorbent (BIAS) technology, which was originally designed to capture carbon dioxide from fossil fuel-based power plants. However, Gray theorized that that the technology could do much more. So, he challenged his team to apply their unique skills and abilities to adapt the technology for use in a new product that can use BIAS technology to remove heavy metals like lead from drinking water. This research resulted in the development of technology that could be applied to treat municipal and industrial wastewater on a large scale. Gray has also provided service to America's historically black colleges and universities by serving as a program chairman and technical reviewer for a range of projects. Finally, in the community of Pittsburgh, he has served as the Senior Pastor of the Second Baptist Church of Penn Hills for 24 years and is married to Tometta Gray and has a son Thomas Gray.