


FROM	NAME & TITLE	Matthew W. Garbark, Acting Director	CITY of BALTIMORE <i>MEMO</i>	
	AGENCY NAME & ADDRESS	Department of Public Works 600 Abel Wolman Municipal Building		
	SUBJECT	City Council Resolution 19-0179R		

February 20, 2020

TO:

Housing and Urban Affairs Committee

INTRODUCTION

I am herein reporting on City Council Resolution 19-0179R introduced by Council Member Henry, President Scott, Council Members Dorsey, Burnett, Cohen, Bullock, Pinkwtt, Clarke, and Reisinger.

PURPOSE

The purpose of the Resolution is to request representatives from BGE; the Departments of Transportation, Housing and Community Development, Police, Fire, and Public Works; the Mayor's Office of Emergency Management; and the Mayor's Deputy Chief of Staff for Public Safety to discuss protocols and best practices for planned power outages.

BRIEF HISTORY

The Department of Public Works operates and maintains three water filtration plants and two wastewater treatment plants that serve the City and surrounding counties. All of these plants are operated 24 hours a day, 7 days a week. The water distribution system relies on pumping stations and elevated tanks to circulate potable water, and has chlorination stations located throughout the system to maintain an acceptable level of chlorine in the distribution system. While a large portion of the wastewater collection system is driven by gravity, pumping stations are needed to overcome topography and other barriers in delivering the flow to the treatment plants. The Headworks project at the Back River Wastewater Treatment Plant, when completed, will require constant pumping to deliver the wastewater flow to the treatment processes.

The water filtration and wastewater treatment plants need to maintain operations around the clock, as loss of these vital facilities due to power outages would have a direct impact on public security and health. For outages caused by weather-related events or other unanticipated disruptions, it is standard practice to have at a minimum a two weeks' supply of all necessary chemicals at our treatment and filtration facilities in case delivery could not occur. In addition, dual power feeds are established at these facilities, where possible, to ensure that loss of electricity from one grid would allow drawing power from another. Should all power be lost, generators are the temporary backup source until power can be restored.

The Honorable President and Members
of the Baltimore City Council
February 20, 2020
Page 2

In the case of planned outages, a local BGE contact provides advance notification to key personnel at the wastewater treatment plants, pumping stations, and water filtration plants. As noted above, our plants have dual power feeds that would enable the Department to switch to the grid that is unaffected by the planned outage. In the unusual circumstance that both grids were impacted by the outage, or if a secondary power feed is not available at a particular location, on-site or portable generators are employed to keep treatment, filtration, and pumping station systems functioning without interruption.

As a point of interest, the Department has developed and is expanding energy resiliency projects such as solar arrays and combined heat and power plants at these facilities to lessen reliance on traditional power sources. For example, a 1 MW of solar photovoltaic is installed at the Back River Wastewater Treatment Plant, as well as a 2 MW combined heat and power system that provides an average of 15 percent of the electricity needed at the plant, and captures heat to supplement the plant's processes. The engines use biogas containing high levels of methane created by the digesters at the plant. This gas would otherwise be flared without any benefit.

AGENCY/DEPARTMENT POSITION

Representatives of the Department of Public Works will attend the hearing on this resolution to answer any questions the Council Committee may have on City Council Resolution 19-0179R.

Should the Committee have any questions prior to the hearing, please do not hesitate to contact Ms. Marcia Collins at 410-396-1960, or via email at Marcia.Collins@baltimorecity.gov.



Matthew W. Garbark
Acting Director

MWG:MMC